House of Commons

Environmental Audit Committee

Reducing greenhouse gas emissions from deforestation: No hope without forests

Fifth Report of Session 2008–09

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The Environmental Audit Committee

The Environmental Audit Committee is appointed by the House of Commons to consider to what extent the policies and programmes of government departments and non-departmental public bodies contribute to environmental protection and sustainable development; to audit their performance against such targets as may be set for them by Her Majesty's Ministers; and to report thereon to the House.

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Halting the destruction of tropical rainforests has long been an environmental cause célèbre, but an area of forest the size of England continues to be lost each year. This gives rise to around 17 per cent of global greenhouse gas emissions, greater than global emissions from transport. Addressing deforestation is as essential as decarbonising electricity or transport if we are to avoid dangerous climate change. A failure to act on deforestation could double the cost of avoiding dangerous climate change to 2030.

Deforestation is caused by a range of factors, many of which are exacerbated by a growing global population and increasing consumption. Halting deforestation requires:

- support for rainforest nations to help them manage their development so that it does not allow continued deforestation;
- management of the demand for commodities whose production encourages deforestation; and
- the introduction of a mechanism to pay developing countries for maintaining, and in due course recreating, their forests.

The UK needs to act in all three areas if its policies on deforestation are to be successful. Ignoring any one undermines the effectiveness and durability of action in the other areas.

Supporting rainforest nations

We welcome the Government's long-term support for forest governance in rainforest nations. The Government must ensure that wider official development assistance, including that which is delivered bilaterally through arms-length bodies like CDC Group plc, or multilaterally through bodies like the World Bank, helps to halt deforestation and avoid dangerous climate change. The Government must ensure that the multilateral forestry funds to which it contributes deliver more effective responses to deforestation. More resources should be given over to work on forests, given that action on deforestation promotes both development objectives and climate change mitigation.

Managing demand

The Government must ensure that demand for agricultural commodities and timber in the UK is met without directly or indirectly causing deforestation. The Government should also lead the reform of agriculture globally towards more sustainable patterns of land use where growing demand for commodities can be met at the same time as halting deforestation. As part of this work the Government must:

- remove subsidies that contribute to deforestation, such as biofuels policy;
- develop sustainability standards for agricultural commodities;
- implement and enforce government timber procurement; and,
- seek an EU-wide ban on illegal timber imports combined with robust sanctions.

Illegal timber imports are still a fact of life within the UK timber trade.

Paying for forests

The UN's climate change negotiations appear to be focused on the creation of a payment mechanism, even though deforestation will continue unless action is also taken on the supply- and demand-side causes of deforestation.

We have found that there is disagreement about where funding for a forest payment mechanism should come from. At this stage we believe that forest credits should not be permitted in the EU Emissions Trading Scheme. The Government must look at alternative sources of funding, including the hypothecation of EU ETS revenues. A forest payment mechanism will fail to protect rainforests, and hasten the global extinction crisis, unless effective safeguards exist to prevent primary forests from being converted to plantations. Protection of biodiversity and local communities should be a precondition of a country being eligible for forest payments; robust environmental safeguards need to be built into any international agreement on deforestation.

Conclusion

Failure to halt deforestation will lead to greenhouse gas concentrations in the atmosphere exceeding safe levels, even if industrial emissions are reduced to zero. Failure to end deforestation quickly could double the cost of avoiding dangerous climate change to 2030. The economic, environmental and development case for immediate action on deforestation is clear. Success is possible only if the international community works together effectively.[1] In the medium-term, the focus must be wider than just deforestation. Globally we must find a more sustainable way to use land that encompasses agriculture, forestry, development, biodiversity and climate change.

1 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008

1 Introduction

Why are forests important?

1. Halting the destruction of tropical rainforests has long been an environmental cause célèbre but the destruction of forests continues. Rainforests contain nearly ninety per cent of the world's terrestrial biodiversity and are the home to some 60 million people.[2] The UN's Food and Agriculture Organisation has calculated that around 13 million hectares of forest, an area approximately the size of England, are lost each year.[3]

2. When trees decay or are burned the carbon dioxide they have stored as they grow is released. Deforestation also causes carbon stores held in soil to be released. Around 17 per cent of global greenhouse gas emissions come from deforestation; it is the third largest source of greenhouse gases emissions behind energy supply and industry and ahead of transport. Even if industrial emissions of carbon dioxide were reduced to zero, emissions from deforestation would raise concentrations of greenhouse gases in the atmosphere above the level at which dangerous climate change becomes more likely. In his Review of the Economics of Climate Change Lord Stern said, "without prompt action emissions from deforestation between 2008 and 2012 are expected to total 40Gt CO_2, which alone [is] greater than the cumulative total of aviation emissions from the invention of the flying machine until at least 2025".[4] Forest loss can also lead to local climatic changes that result in further forest loss; this raises the prospect of entire forests dying with consequential releases of greenhouse gases and a negative impact on climate change.[5]

3. The relationship between forests and the climate goes further than simply the emission of carbon that occurs when they are cleared. Met Office research suggested that present-day CO_2 concentrations would be higher were it not for tropical forests acting as a 'sink' for carbon. Tropical forests appear to have soaked-up around 10 per cent of the carbon emitted since the Industrial Revolution, and they continue to take up carbon today. Research suggests that every year each hectare of rainforest draws down around three tonnes of carbon dioxide.[6] So for each hectare of rainforest that is cleared there are emissions associated with the loss of trees, emissions from the soil and a loss of sink capacity.

4. The Eliasch Review found that preserving forests could cut by as much as half the cost of climate change mitigation by 2030.[7] It calculated that the net benefits of halving the emissions from deforestation to 2030 could equate to net saving of $3.7 trillion.[8] McKinsey and Company found that substantial cuts in deforestation and the expansion of forests into marginal land are required to prevent dangerous climate change. The McKinsey analysis

2 Ev 15

3 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 21

4 HM Treasury, *Stern Review on the Economics of Climate Change*, October 2006, p 547

5 Ibid, p 24

6 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 21

7 Ibid, xii

8 Ibid, p 69

implied that deforestation would have to be halted in Asia and Latin America, and 70 per cent of deforestation prevented in Africa, by 2025. It would also require new forests to be established on 330 million hectares of land, equivalent of reforesting an area of land the size of India.[9] They found that this can be achieved at relatively low cost—€2 to €30 per tonne of CO_2 equivalent (tCO_2e).[10] This compares to costs of €575 to €800 tCO_2e being spent today supporting the conversion of sugar beet to biofuel in the EU.[11]

5. Halting deforestation is as essential a part of preventing dangerous climate change as decarbonising electricity or transport. A huge attraction of forest protection is that no new technology is required to achieve substantial reductions in emissions at a very low cost. Globally we must first slow and then halt deforestation within 15 years and establish new forests across a significant area of land. This needs political will in both rainforest and developed countries.

International negotiations

6. Negotiations for a successor to the UN Framework Convention on Climate Change (UNFCCC) Kyoto Protocol, which expires at the end of 2012, include plans for an international forest protection framework to reduce emissions from deforestation and forest degradation (often referred to as a REDD mechanism). Formal decisions on this will not be taken until the conference at Copenhagen in December 2009, but discussions have started about how this might be taken forward.

7. We launched this Inquiry on 17 July 2008 to help inform the debate on how to reduce emissions from deforestation. We also took this opportunity to follow up some of the recommendations we made in our 2006 Report into sustainable timber.[12] We received written and oral evidence from a range of sources including individuals, NGOs, trade associations and the Government. We are grateful to all those who contributed to our inquiry; they are listed at the end of our Report.[13]

9 McKinsey & Company, *Pathways to a Low-Carbon Economy*, p 11

10 Ibid, p 120

11 When the costs of subsidies across the EU are factored in. Global Subsidies Initiative, *Biofuels—At what cost? Government support for ethanol and biodiesel in the European Union*, October 2007, p 3

12 Environmental Audit Committee, Second Report of Session 2005–06, *Sustainable Timber*, HC 607-I

13 See pages 37 and 38

2 Deforestation and sustainable land use

The causes of deforestation

8. The Eliasch Review identified five underlying factors driving deforestation:

- Population growth
- Rising income
- Changing diets
- Policy incentives
- Land tenure and governance.[14]

9. Pressures on forests are expected to intensify. The global population is predicted to increase 50 per cent by 2050, to 9 billion people. A growing population and rising incomes have led to growing consumption of meat and dairy products, which take much more land to produce than vegetables; 1kg of beef takes 100 times more land to produce than the same weight of potatoes.[15] 30 per cent of the earth's land surface is now given over to livestock. About 33 per cent of the world's arable land is used to produce livestock feed. Livestock production is a major cause of deforestation in the Amazon.[16]

10. Climate change might add further to land use pressure, either because agricultural yields could fall or because of demand for biomass to provide low-carbon fuel. The Government's Chief Scientific Adviser, Professor John Beddington, recently warned that as the population grows demand for food and energy will jump 50 per cent by 2030.[17]

Changing the global approach

11. The Eliasch Review argued for a global change in the way that land is used, based on "a sustainable system of global production which can meet increasing demand for commodities and lead to reduced carbon emissions, better livelihoods for the poor and preservation of non-carbon ecosystem services such as biodiversity".[18] It identified three 'levers' available to policy makers to achieve this change:

- Carbon finance (to provide a financial incentive to keep forests);
- Supply-side policies (to discourage in-country policies and practices that facilitate or otherwise lead to deforestation); and

14 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 36

15 Ibid, p 38

16 Food and Agriculture Organisation of the United Nations, *Livestock's long shadow: Environmental issues and options*, 2006

17 "World faces 'perfect storm' of problems by 2030, chief scientist to warn", The Guardian, 18 March 2009

18 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 52

- Demand-side measures to support sustainable production (to help shift economic incentives away from deforestation).

12. The Eliasch Review recognised that each rainforest nation would need to ensure its growth and development strategies put all three of these policy levers into use.[19] A similar approach was put forward in the UN's Millennium Ecosystem Assessment (MEA), which we reported on in January 2007.[20]

13. Some witnesses thought that climate change negotiations side-lined supply- and demand-side issues focusing instead on the development of a payment mechanism.[21] Huw Irranca-Davies MP, Minister for the Natural and Marine Environment, Wildlife and Rural Affairs, Defra, recognised that the negotiations should address issues other than the development of a payment mechanism. He said reforms would need to be driven by rainforest nations but the high-level engagement by a large number of rainforest nations gave him cause for optimism that these wider issues might be addressed.[22]

14. **An agreement on reducing emissions from deforestation and forest degradation will be required if the UNFCCC conference in Copenhagen in December 2009 is to be a success. We are concerned by evidence that the negotiations are focusing solely on the development of a payment mechanism. An agreement at Copenhagen must include a decision that the global community will also act on both the supply- and demand-side causes of deforestation. In particular, the UK and other developed countries must reduce the impact of their consumption patterns on deforestation and forest degradation.**

15. In the remainder of this Report we consider the key political action required in terms of:

- Support for rainforest nations to ensure their development does not lead to deforestation;
- policies to shift demand away from commodities that lead to deforestation; and
- a system to compensate developing countries for maintaining forests.

19 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 214

20 Environmental Audit Committee, First Report of Session 2006–07, *The UN Millennium Ecosystem Assessment*, HC 77

21 Ev 172

22 Q 188 [Mr Irranca-Davies]

3 Supporting rainforest nations

Governance

16. Key to tackling deforestation is effective governance in rainforest nations. This includes effective forest management but also wider reforms of governance including the establishment of effective and independent judicial systems, legal and tax reforms, and action on issues associated with land tenure.[23]

17. Chatham House estimated that some $550 million to $3.7 billion would be required over the next five years to reform governance in the forty rainforest nations that might participate in a mechanism to pay for reduced deforestation.[24] But it cautioned that its analysis was based on projects that had often failed to achieve the desired outcome; the actual costs of successfully addressing governance problems could be larger.[25] Five years might be enough time for some countries to undertake the necessary reforms, but others will need longer.[26] Chatham House also cautioned that governance reforms are unlikely to succeed without the political will to implement change, and this was unlikely to be forthcoming "unless some of the overwhelming current economic incentives for deforestation are reduced".[27]

18. When we visited Cameroon we saw first hand that poor governance prevents sustainable forestry management. Although Cameroon has some of the most developed forestry laws and policies in the region these are undermined by:

- a lack of enforcement of legislation;
- ineffective or corrupt collection of forest revenues;
- ineffective distribution of benefits to local communities; and
- a lack of land tenure rights for local communities.

The recent Tropical Forest Tenure Assessment published by the Rights and Resources initiative found that reform of land tenure in the Congo basin was proceeding very slowly and would take 260 years to achieve the levels of recognised ownership or rights by local communities as in the Amazonian countries; if reforms were increased to match the pace of reform in Amazonian countries it would take only sixteen years.[28]

19. In October 2008, a European Commission Communication recognised that there would need to be financial support for developing countries to undertake the necessary reforms, but that this support would be 'performance-based and provided on the basis of

23 Q 93

24 Ev 58

25 Ev 58

26 Q 98

27 Ev 58

28 Rights and Resources Initiative, Tropical Forest Tenure Assessment: Trends, Challenges and Opportunities, May 2009

verified results'.[29] The UK Government is pressing for financial support to be linked to reductions in deforestation.[30] Joan Ruddock MP, Parliamentary Under-Secretary of State Department for Energy and Climate Change (DECC) recognised the challenges in this area but argued that there was cause for optimism given the strong signals being sent by a number of countries that they were willing to make a forest agreement work.[31]

20. Countries that face the greatest governance challenges might not be able to participate in a forest payment mechanism from its start.[32] This could lead to 'leakage'—protecting forests in one country could increase deforestation in a country that is not participating, so that emissions are not reduced overall. To ensure that countries with major governance problems are not excluded from a payment mechanism a sectoral approach could be taken—rewarding countries for initiating reforms that will protect forests rather than only for changes to deforestation rates. For example, countries could be rewarded for successfully implementing the legal reforms necessary, even if these do not result in verifiable emissions reductions.

21. **The UK Government must lobby for an agreement in Copenhagen that includes a mechanism to support capacity building and effective governance in rainforest nations. The Copenhagen agreement must reduce the economic drivers of deforestation.**

Bilateral support for good forest governance

22. DfID has a five-year, £24 million, Forest Governance and Trade Programme that "aims to tackle the problems of illegal logging in developing countries and the associated international trade in illegally logged timber".[33] A number of witnesses and the Rights and Resources Initiative (a coalition of international, regional and community organisations engaged in conservation, research and development) commended this work, and the Government's involvement in moving forward the EU's Forest Law Enforcement, Governance and Trade (FLEGT) Programme.[34]

23. Funding for forest governance is increasingly being channelled through multilateral organisations, such as the recently launched £50 million Congo Basin Forest Fund (CBFF) (managed by the African Development Bank) and the Forest Carbon Partnership Facility (FCPF) (managed by the World Bank). Michael Foster MP, Parliamentary Under-Secretary of State, DfID, argued that while bilateral projects give the government very tight control and ownership of projects, they can be resource intensive for both the donor and recipient countries. By channelling funds through multilateral organisations such as the World Bank "you get more effective and efficient use of money [and] you get much wider coverage of your particular project because more money is banded together under one

29 European Commission Communication, *Addressing the challenges of deforestation and forest degradation to tackle climate change and biodiversity loss*, 17 October 2008

30 Q 229

31 Q 186 [Joan Ruddock]

32 Q 104

33 "Forest Governance and Trade Programme (2006–11)", *Department for International Development*, 24 April 2009, www.dfid.gov.uk

34 Q 157

roof".[35] The Minister acknowledged that it was essential to have clear oversight of multilateral funds. The Government is represented on the governing bodies of the CBFF and FCPF.

24. **We recognise the benefits of channelling funding through multilateral organisations, but the Government must ensure that these organisations effectively deliver its aims. More resources should be given to bilateral activity on forestry related issues, especially as development objectives and climate change objectives are well aligned in measures to reduce emissions from deforestation.**

25. A disadvantage of a shift to funding through multilateral organisations might be the loss of civil service expertise. We have raised concerns about the loss of environmental experts at DfID and FCO over the past few years.[36] We have been concerned that this might damage the ability of these departments to integrate environmental issues into their broader work programme.[37] Robin Webster, Friends of the Earth, argued that there needs to be more support for departments working in forest governance:

> […] there are under-resourced and struggling parts of [the Government] and parts of the European Commission working on the FLEGT process which have developed considerable expertise on this over the years in terms of working on issues like governance, issues like land tenure, how you work intensively with one country in order to tackle these issues. If that had more resource—and it is about finance, it is about expertise, it is about a real sharing of knowledge, it is about a long-term commitment and process—that is the way we can start to tackle these issues, rather than a headlong rush into a carbon market process.[38]

26. DfID plans to close its bilateral programme with Cameroon in 2011. When we were in Cameroon some interlocutors thought that this closure indicated a lack of UK Government commitment to tackling environmental issues in the region. This is of considerable concern given the need to encourage the Cameroonian government to protect the Congo Basin forest—the second largest rainforest after the Amazon.

27. **We caution against further reductions to UK bilateral activity in significant rainforest nations. The UK must be able to work effectively on environmental issues in its bilateral relationships. Outsourcing environmental work may lead to a reduction in civil service expertise and the UK's effectiveness in this field. The Government must ensure it retains an appropriate level of expertise.** We welcome the call by the International Development Committee for DfID to re-establish engagement in the forestry sector.[39]

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35 Q 254

36 Environmental Audit Committee, Tenth Report of Session 2005–06, *Trade, Development and Environment: The Role of DFID*, HC 1014; Environmental Audit Committee, Fifth Report of Session 2006–07, *Trade, Development and Environment: The Role of FCO*, HC 289

37 Environmental Audit Committee, Fifth Report of Session 2006–07, *Trade, Development and Environment: The Role of FCO*, HC 289

38 Q 50

39 International Development Committee, Fifth Report of Session 2008–09, Sustainable Development in a Changing Climate, HC 177, para 51.

The Forest Carbon Partnership Fund

28. The Forest Carbon Partnership Fund (FCPF) was launched by the World Bank in 2007 to assist developing countries in reducing emissions from deforestation and degradation, and to influence global thinking about how to achieve this as part of a UNFCCC agreement. The process was meant to be fully integrated with other sectors and existing programmes, especially with regard to biodiversity and development.[40] Saskia Ozinga, of FERN (a forest NGO), told us that there has been a failure to ensure that FCPF work was complementary to other good governance processes and that it had caused a shift in focus from governance reform to a debate simply about how to channel funds to developing countries in the quickest way possible.[41] FERN and the Forest People's Programme claimed that:

> […] the process has been rushed, is implicitly linked to a market based REDD, is dominated by central governments, and has so far involved little or no consultation with indigenous peoples, local communities or civil society organisations. Furthermore […] the World Bank's forest fund is not following its own rules or safeguard policies.[42]

29. In February 2009, the World Resources Institute published a review of the governance plans of countries participating in the FCPF. This found that several governance issues were "generally and conspicuously" missing:

- inadequate consideration of law enforcement requirements;
- limited analysis of existing land tenure issues and potential obstacles to reform;
- a lack of attention given to achieving coordination across sectors with few countries acknowledging "potential conflicts between policies to reduce deforestation and policies in the agricultural or infrastructure sectors"; and
- inadequate consideration of how to manage and disburse REDD payments, "significantly [raising] the risk of corruption and elite capture".

The review concluded that the countries participating in the FCPF need to focus more on overcoming governance difficulties.[43]

30. **We welcome the Forest Carbon Partnership Facility and hope that it will influence thinking on how to reduce emissions from deforestation and forest degradation. If implemented effectively, the strategies that are developed under it could play a key role in helping rainforest nations shift to more sustainable land use. We are concerned, however, that action being taken under it could be undermining work the Government**

40 "Forest Carbon Partnership Facility: a framework for piloting activities to reduce emissions from deforestation and forest degradation", *The World Bank*, 6 May 2009, http://wbcarbonfinance.org

41 Q 160

42 "World Bank's forest and carbon fund is failing forests and peoples", *Forest Peoples Programme*, 1 December 2009, www.forestpeoples.org

43 "A Review of 25 Readiness Plan Idea Notes from the World Bank Forest Carbon Partnership Facility", *World Resources Institute*, February 2009, www.wri.org

has done elsewhere to improve forest governance. In its response to this Report the Government should make clear what action it has taken to address these criticisms.

Forest dependent people

31. Around 1.6 billion people rely "heavily" on forest resources for their livelihoods, including "60 million indigenous people living in the rainforests of Latin America, Southeast Asia and West Africa".[44] Any changes to forest governance, or access to forest resources, could have a large impact on such people. Fiona Watson, of Survival International, pointed out that indigenous peoples are "possibly the most marginalised of any groups; people who have very little and in some cases no access to any information about potential developments on their land and what their rights are under national let alone international law".[45] She argued that forest carbon payments could lead to a land grab, with governments or others seeking to restrict access to forests leading to an erosion of forest dependent peoples' rights.[46]

32. Charlie Kronick of Friends of the Earth saw the protection of forests and the protection of forests peoples as being mutually reinforcing. He pointed to evidence that one of the most effective and cheapest methods for protecting forests is to protect the rights of indigenous peoples to their land.[47] The Eliasch Review found that lack of clear and secure land tenure is a "major factor driving deforestation in many nations".[48] It found that "only when property rights are secure, on paper and in practice, do longer-term investments in sustainable management become worthwhile".[49]

33. A number of witnesses were concerned that the international climate change negotiations were failing to consult forest dependent peoples or take into account the potential impacts of a forest payment mechanism on them. Tom Griffiths of the Forest Peoples Programme pointed out that indigenous peoples' representatives had protested that governments "had not paid heed" to them, noting "[a]lthough there had been some mention by the EU, and, indeed, the UK, actual firm commitments were not forthcoming at Poznan [which] is a real concern [to] indigenous peoples and groups that support them".[50] Robin Webster of Friends of the Earth agreed that only "lip service" had been paid to the issue in both the negotiations and the FCPF.[51] Saskia Ozinga of FERN argued that "recognition of rights [of local communities and indigenous peoples] should be a precondition for any programme or REDD scheme coming into operation".[52] Survival International also called for the Government to ratify International Labour Organisation Convention 169 (ILO 169), which recognises tribal peoples' rights to:

44 Food and Agriculture Association of the United Nations, *Forest-based Poverty Reduction: A Brief Review of Facts, Figures, Challenges and Possible Ways Forward*, 2002

45 Q 155

46 Q 155 [Ms Watson]

47 Q 45

48 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 44

49 Ibid

50 Q 156

51 Q 45

52 Q 159

- the land they traditionally use and live on
- meaningful consultation about projects affecting them
- freedom from discrimination.[53]

34. The Government recognised that in order to protect local people "we clearly have to strengthen rights and governance".[54] The DFID Minister believed that the UNFCCC negotiations recognised the needs of local communities and indigenous peoples and that in Poznan there had been a "very clear commitment" to consultation with such groups. The Government was seeking to ensure that the rights of local people to their land were established, and that part of this process would be to ensure effective governance more widely.[55] Joan Ruddock MP, Parliamentary Under-Secretary of State, DECC, cautioned that it was a challenge negotiating on this issue with sovereign states but that the Government hoped that a deal at Copenhagen "will have an element in it which recognises the rights of indigenous peoples".[56] The Committee is aware of new British technologies that could play an increasing part in helping local communities to map their forests and secure their land rights.

35. **We welcome the Government's wish to ensure that forest peoples' rights are recognised in the agreement at Copenhagen. We believe that eligibility for forest payments should be conditional on the protection of local communities. Commitment to a rights based approach might be evidenced by ratification of International Labour Organisation Convention 169 on Tribal and Indigenous Peoples; the UK Government should encourage rainforest nations to sign and ratify this treaty.**

Wider aspects of development policy

36. In 2006 we concluded that DfID's climate change policy lacked coherence, saying: "On one hand it highlights the seriously detrimental impacts of climate change […] on the other hand it is directly and indirectly responsible for very significant emissions[…] through the projects it funds".[57]

37. The Eliasch Review acknowledged the difficulties associated with balancing infrastructure development and the environment. It found that the "rigorous application of environmental and social impact assessments [are] a key means to expose the inevitable trade-offs between different policy objectives, make decisions in the full knowledge of the likely impact on deforestation and rural livelihoods, and put in place mitigation strategies where necessary".[58] It also found negative impacts will only be avoided if forestry objectives are mainstreamed into national growth and development strategies.

53 "International Law", *Survival International*, 7 May 2009, www.survival-international.org

54 Q 215

55 Q 215

56 Q 188

57 Environmental Audit Committee, Tenth Report of Session 2005–06, *Trade, Development and Environment: The Role of DFID*, HC 1014

58 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 58

38. DfID, through CDC Group plc (CDC), invests in developing country infrastructure projects. CDC aims "to maximise the creation and growth of viable businesses in poorer developing countries, through responsible investment and mobilising private finance". Its Investment Policy "requires it to[…] follow best practice in corporate governance and business ethics, as set out in its Business Principles".[59] In August 2007 a subsidiary of CDC was granted a concession to "develop, finance, build and operate" a dam in Cameroon at the Memve'ele waterfalls on the Southern edge of the Campo Ma'an National Park. The project was to be located close to the park's "richest part in terms of wildlife", which was to be "seriously affected by the dam construction".[60] The park is home to gorillas, elephants and other endangered species.[61] CDC said it was "confident that there have been high environmental, social and governance standards in place throughout [its] involvement with the Memve'ele dam", that the proposed dam was a "relatively small, run-of-river hydro project and most of the area where the dam would be located has already been designated for forestry concessions". On 6 April 2009 CDC informed us that "unfortunately, due to lack of progress on a number of issues, Globeleq [the CDC subsidiary company] have just informed the Prime Minister of Cameroon that it is withdrawing from development of this project".[62]

39. The National Audit Office has pointed out that DfID uses CDC's financial performance as the principle indicator of development impact. It noted financial performance was not necessarily correlated with environmental and social performance or wider economic improvements. It recommended "DFID should[…] require CDC to provide validated, summarised information on the extent of actual adherence to business principles across its portfolio".[63]

40. **UK development assistance could increase greenhouse gas emissions and deforestation if not managed effectively. We urge DfID to ensure that the programmes and projects it funds bilaterally, including through arms length bodies such as CDC, and multilaterally, through organisations such as the World Bank, assist progress towards a low-carbon global economy and halt deforestation. We recognise that in certain cases projects that lead to managed increases in emissions and deforestation might be defended on development grounds; indeed many developing countries claim a right to increase their emissions because they are not responsible for current greenhouse gas concentration levels. But the need to reduce emissions, including those from deforestation, must now be included within developing countries' national development and growth plans; DfID should ensure that development assistance contributes to the development of a low-carbon economy.**

59 "CDC—promoting the private sector in the developing world", *DfID*, 29 April 2009, www.dfid.gov.uk

60 "Kudu-Zombo News", *WWF*, August 2008, www.panda.org

61 "Conservation of the Campo-Ma'an National Park and its Surroundings", *WWF*, November 2005, www.panda.org

62 Ev 121

63 National Audit Office, Session 2008–09, *Investing for development: the Department for International Development's oversight of CDC Group plc*, HC 18

4 Managing demand

41. The UK must play its part in ending the economic incentives for deforestation and increasing those that promote sustainable land use. The Joint Nature Conservation Committee (JNCC), the Government's statutory adviser on national and international nature conservation, recently found that UK investments in the forestry, fisheries and agriculture sectors are "highly significant from an ecosystem impact perspective".[64] The JNCC plans to provide further analysis of the data. The Government's Chief Scientific Adviser has launched a UK Foresight Programme project on Global Food and Farming Futures to take a "global view of the food system; considering issues of demand, production and supply as well as broader environmental issues".[65] The impact of trade flows on deforestation rates has been recognised in the European Commission's Communication on deforestation, which stated that the Commission would assess the impact of international trade policy and agreements and "study[…] the impact of EU consumption of imported food and non-food commodities (e.g. meat, soy beans, palm oil, and metal ores) that are likely to contribute to deforestation. This could lead to considering policy options to reduce this impact".[66]

42. **We welcome the Joint Nature Conservation Committee's work on the UK's global impact on biodiversity. This, combined with the Foresight Project on Global Food and Farming Futures, must be used by the Government to identify how to reduce the deforestation that results directly and indirectly from UK demand for commodities. This work should consider the consumption of all imported commodities that affect deforestation. The Government should take account of and engage with work being done on these issues by the European Commission.**

43. Below we explore some of the policy measures that the Government should use to mitigate the impact of UK consumption of globally traded commodities.

Agricultural commodities

Global agriculture reform

44. There is a relationship between agricultural commodity demand and the rate of forest clearance. The Eliasch Review cautioned that improvements in agricultural productivity could increase profitability and "pressure to deforest could increase in the areas where the more intense practices are applied".[67] Responses to the food crisis must take account of the need to protect forests. Demand for food is expected to increase dramatically in future and must be met in ways that do not increase pressure on forests. Failure to tackle this issue will

64 Joint Nature Conservation Committee, *The biodiversity footprint of UK Foreign Direct Investment*, Spring 2009

65 "Global Food and Farming Futures", *Foresight*, May 2009, www.foresight.gov.uk

66 European Commission Communication, *Addressing the challenges of deforestation and forest degradation to tackle climate change and biodiversity loss*, 17 October 2008

67 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 54

raise substantially the cost of reducing emissions from deforestation and climate change mitigation more widely.[68]

45. Recent agricultural commodity price increases, and related social impacts, have led to pressure to improve global food security and reform the global agriculture sector. Such reform must not undermine efforts to halt deforestation. Improved food security and environmental protection can be achieved in harmony. Agricultural productivity in many regions can be increased and more food produced on existing agricultural land. 50–70 million hectares of pasture land in Brazil could be released for crop production by intensifying the very low density of cattle per hectare in parts of the country.[69] Reforms to global agriculture, such as a move away from feeding cereals to livestock, new technology and the removal of damaging subsidies, could enable the world to "feed the entire projected population growth alone by becoming more efficient while also ensuring the survival of wild animals, birds and fish on this planet".[70]

46. The Government has created the Council of Food Policy Advisors to advise on food security, and has commissioned reports on food security that bring these issues together.[71] Internationally, the UN's High-Level Task Force (HLTF) on the Global Food Security Crisis, established in April 2008, has drafted a Comprehensive Framework for Action (CFA). In it UN bodies and other relevant international organisations set out their view of what the response to global food security issues should be. It stressed the need to remove damaging agricultural subsidies, the need to reassess biofuel policies, and the need to boost smallholder productivity.[72] The G8 nations have agreed to support a Global Partnership on Agriculture and Food to coordinate and implement international efforts on food security and other actions identified by the CFA. A joint statement by G8 leaders said that this partnership "could provide efficient and effective support for country-led processes and institutions and for local leadership, draw on the expertise in existing international organizations and, in particular, ensure monitoring and assessment on progress". As part of this partnership, "a global network of high-level experts on food and agriculture would provide science-based analysis, and highlight needs and future risks".[73] The G8 leaders said that they would:

> Ensure the compatibility of policies for the sustainable production and use of biofuels with food security and accelerate development and commercialization of sustainable second-generation biofuels from non-food plant materials and inedible biomass; in this regard, we will work together with other relevant stakeholders to develop science-based benchmarks and indicators for biofuel production and use.[74]

68 McKinsey & Company, *Pathways to a Low-Carbon Economy*, p121

69 Renewable Fuels Agency, *The Gallagher Review of the indirect effects of biofuels production*, July 2008, p 37

70 "'Green revolution' can ensure enough food for entire world—UN environment agency", *United Nations Environment Programme*, 17 February 2009, www.un.org

71 "Food Security: DEFRA Discussions", DEFRA, May 2009, www.defra.gov.uk

72 High-Level Task Force on the Global Food security Crisis, *Comprehensive Framework for Action*, July 2008

73 "G8 Leaders Statement on Global Food Security", *Global Donor Platform for Rural Development*, 8 July 2008, www.donorplatform.org

74 Ibid

47. The Government believes that there is a "solid donor consensus on the need for more and better support for food security, social protection and agricultural development and for a global mechanism to help deliver a comprehensive and co-ordinated international response to hunger".[75]

48. There is a direct link between agricultural commodity prices and the rate of forest clearance. If agricultural commodity prices rise inexorably, the cost of reducing emissions from deforestation will also increase as it will cost more to prevent forests from being converted to farmland. Failure to reform the global agricultural system will increase the total cost of climate change mitigation. A response to the food crisis that leads to deforestation will exacerbate climate change.

49. **A fundamental reassessment of the way in which the global agricultural system functions is needed. It is critically important that the Government's response to the global food crisis includes strong support for a global change in sustainable land use and an end to deforestation.**

50. **While we welcome the Government and G8 response to the global food crisis and its call for a Global Partnership on Agriculture and Food, we are very concerned that the G8 has failed to address the need for sustainable production of agricultural commodities. It failed to act on agricultural subsidies, biofuel subsidies and other damaging trade-distorting measures. This suggests that the G8 countries are not committed to solving the developing ecological and food security crisis in a sustainable way.**

Sustainability standards for agricultural commodities

51. We concluded in 2006 that there was a need to develop sustainability indicators for globally traded commodities "to lead [to] more sustainable trade".[76] At the time the Government rejected this argument, citing political difficulties in achieving such standards, but following the rush for biofuels the political debate has evolved. Now that the environmental risks of the policy have been recognised, there has been a concerted effort to create standards for commodities used as biofuels.

52. As we noted in our 2008 report into biofuels, "an interesting environmental benefit that might come from a sustainable biofuels market could be the better regulation of all internationally traded agricultural commodities". We argued that the potential rewards associated with a sustainable biofuels market in the EU could "create economic conditions which would assist in securing international sustainability standards for agricultural products more widely". We also recognised that removing damaging agricultural subsidies in the EU would facilitate a global agreement on such standards.[77]

53. Recent figures from the Renewable Fuels Agency indicate that 20 per cent of transport biofuels used in the UK meet environmental sustainability standards, falling short of the

75 HC Deb, 12 February 2009, col 2305W

76 Environmental Audit Committee, Eleventh Report of Session 2005–06, *Outflanked: The World Trade Organisation, International Trade and Sustainable Development*, HC 1455

77 Environmental Audit Committee, First Report of Session 2007–08, *Are biofuels sustainable?*, HC 76-I, p 11

Government's target for 30 per cent of biofuels to meet such standards over the year.[78] Nevertheless, the fact that some companies are meeting sustainability standards gives us hope that such standards can successfully be created and applied.

54. Defra research is looking at the impact of various agricultural commodities on deforestation. The Government is also "stepping up engagement with South East Asian governments and other stakeholders who have an interest in this, including the round table on sustainable palm oil".[79] The Defra Minister thought that working on the sustainability of biofuels might be a way to improve the sustainability of commodities more widely, but told us that the Government had "not come to firm conclusions on [this]".[80]

55. Charlie Kronick, of Greenpeace, and Robin Webster, of Friends of the Earth, both thought that there was an important role for mandatory sustainability standards in preventing land use change but that these would need to be part of wider action otherwise two markets would simply develop—one for sustainable commodities and one for unsustainable commodities.[81]

56. The Renewables Obligation requires electricity suppliers to provide a proportion of their electricity from renewable sources. Under the Obligation, suppliers are granted a Renewables Obligation Certificate (ROC) for each megawatt hour (MWh) of eligible renewable output generated.[82] 3 million ROCs were issued for output generated using biomass or energy crops in 2007–08, some 35 per cent of the total issued. As from 1 April 2009, electricity generators will be required to report on the sustainability of the biomass they use, although this is mainly an information gathering exercise. The earliest tighter controls might be introduced would be 2010.[83] In the meantime this policy is adding to greenhouse gas emissions by stimulating deforestation.

57. **We are concerned that the Renewable Transport Fuels Obligation and the Renewables Obligation are stimulating deforestation. Potentially damaging biofuels should not be promoted until the technology improves, robust mechanisms to prevent damaging land use change are introduced and international sustainability standards are agreed. The Government must ensure its policies do not stimulate or accelerate deforestation.**

58. **It is wrong to apply sustainability standards to commodities used for biofuels but not for food and we recommend that the Government develops sustainability standards for all agricultural commodities. The Government should work on ending damaging agricultural subsidies in the EU and other developed countries so that standards can be agreed. A mechanism that rewards countries for not converting forests to agricultural use will make it possible to reach international agreement on sustainability standards.**

78 "RFA reports progress on biofuel sustainability, but poor performers drag RTFO below target", Renewable Fuels Agency, 15 January 2009, www.renewablefuelsagency.org

79 Q 244

80 Q 246

81 Q 67 & Q 68

82 "Renewables Obligation", *OFGEM*, May 2009, www.ofgem.gov.uk

83 Department of Energy and Climate Change, *Reform of the Renewables Obligation: Government Response to the Statutory Consultation on the Renewables Obligation Order 2009*, December 2008

The timber trade

59. The UK has a large impact on the global timber trade—it is the world's fifth largest importer of crude wood products, and the third largest importer of paper products. We last looked at the UK timber trade in 2006. We found that illegal logging and the international trade in illegally logged timber leads to environmental damage and undermines efforts to manage forests sustainably. It also undermines the work done on improving governance in rainforest nations. We recommended that the Government introduce a ban on illegal timber imports.[84]

60. We asked witnesses whether the situation had improved since we last looked at this issue. WWF told us that, while the Government has been "pro-active" in supporting supply-side measures through the EU's Forest Law Enforcement, Governance and Trade (FLEGT) Programme, there "has been no tangible progress on tackling illegal timber since the [last] EAC report" because not enough had been done to tackle demand.[85] Chatham House found evidence to suggest that "implementation is lagging behind commitment".[86] WWF claimed that roughly 7.5 per cent of UK timber imports are from illegal sources, making the UK the world's third largest importer of illegal timber and Europe's largest,[87] although these figures are difficult to verify given the covert nature of illegal logging.[88]

61. **Three years ago we called for legislation to ban imports of illegal timber. No ban was introduced and illegal timber remains an unacceptable part of the UK timber trade; it is possible that the UK is one of the world's largest importers of illegal timber and illegal timber products. This failure to ban illegal timber means that the UK is undermining efforts to improve forest governance and contributing to deforestation and its associated emissions.** The Government can act on this demand in two key ways—immediately through government procurement of sustainable and legal products and in the longer-term by enforcing a requirement that timber products are imported only from legal and sustainable sources.

Public sector procurement

62. Government procurement policies can quickly develop a large market for sustainable and legal timber. When we last looked at this issue we commended the Government on the "significant progress" it had made in improving timber procurement, although we had some concerns about coverage and implementation of the policy.[89] From 1 April 2009 the Government has required all timber and timber products used on the Government estate to be from legal and sustainable sources or licensed under the EU Forest Law Enforcement,

84 Environmental Audit Committee, Second Report of Session 2005–06, *Sustainable Timber*, HC 607-I

85 Ev 60

86 Ev 64

87 Ev 99

88 Ev 67

89 Environmental Audit Committee, Second Report of Session 2005–06, *Sustainable Timber*, HC 607-I

Governance and Trade initiative.[90] It also has a key target, "strongly supported by Ministers", to encourage more local authorities to adopt the policy.[91]

63. Chatham House told us that public sector procurement policies aimed at excluding illegal and unsustainable timber products were already proving valuable. Duncan Brack, from Chatham House, thought that the establishment of a central body to oversee central government timber procurement policy, the Central Point of Expertise on Timber (CPET), was "proving successful".[92] But progress in other areas was limited; he pointed out that local authority action on this issue remains "limited and patchwork".[93] A recent report found that six out of ten local authorities do not have a timber procurement policy.[94] Greenpeace UK thought that a lack of monitoring and enforcement of government timber procurement rules meant that illegal timber and unsustainable timber "almost certainly continues to find its way onto Government construction sites".[95] WWF was particularly critical of policy implementation:

> There has been no tangible progress on sustainable procurement of forest products by UK government departments as a whole. [T]his is down to lack of practical action to address the problem and inadequate resourcing to meet sustainable procurement policy commitments. There is a gap between administrative and political agendas, and apart from the CPET […] mechanism, which has struggled to deliver change or appropriate engagement; no specific efforts have been made to bridge this gap. It is not a government priority at an operational level and does not specifically figure in local authority goals for action on sustainability.[96]

64. A review conducted by CPET in 2008 found that implementation of policy was still "incomplete", and that awareness of procurement policy amongst government personnel was "relatively limited".[97] It recommended that the Government consider the introduction of a monitoring system, possibly with spot-checks, to improve compliance, and that it should seek to encourage local authorities to adopt a procurement policy.[98] It also pointed out that "there are no implications for those that fail to deliver the policy, even where lack of compliance is identified [resulting] in very limited incentives for companies to strive to adhere to the timber procurement policy".[99]

65. Following CPET's review, Defra "started to pilot new monitoring and reporting systems to track timber purchases within the department". It told us that its aim is "to share successful approaches with Whitehall partners in order to develop a new system for

90 HM Government, *Strategy for Sustainable Construction*, June 2008

91 "The UK Government's Timber Procurement Policy", *Central Point for Expertise on Timber*, March 2008, www.proforest.net

92 Ev 59

93 Ev 60

94 Ev 90

95 Ev 12

96 Ev 104

97 "Government failing to meet its own timber rules", *ENDSReport*, June 2008, p 7

98 Central Point of Expertise on Timber, *Construction Sector Project: Policy implementation and reporting*, June 2008

99 Ibid

recording and reporting volumes of timber purchased throughout central government over the next year".[100] It stressed that it:

> […] is determined to continue improving its performance on purchasing sustainably produced forest products, moving to fully sustainable sources and encouraging others to do the same. The information we have indicates that implementation remains patchy. Some departments and agencies are ahead of others but it is clear that there has been a significant move over the last 12–18 months and growing commitment to ensure full implementation. The achievements made will be used to inform and develop sustainable procurement practice more generally, including the recently established Centre of Excellence for Sustainable Procurement (CESP).[101]

66. **The Government has a policy framework to ensure the procurement of legal and sustainable timber by central government but it has been poorly enforced. We welcome Defra's development of a timber monitoring and tracking system to address this problem; an effective system is needed across Whitehall at the earliest opportunity. The Government should consider introducing penalties to motivate departments and companies to implement policy. The Government must also insist that local authorities and the wider public sector adopt timber procurement policies.**

Beyond the public sector

67. Chatham House said the "vast bulk of timber illegally harvested […] is also traded and consumed outside the remit of the new public procurement policies, supply chain controls of governments, and companies in sensitive western markets[,] reducing their potential impact".[102] Additional measures are therefore required to address imports of illegal timber more widely. The European Commission has recognised this in its proposals for a system of due diligence:

> This proposed regulation asks operators to take concrete steps to minimise the risk of putting illegally harvested timber and timber products on the EU market. Operators will use the due diligence system, thus enabling them to ascertain the legality of the products […] The proposed regulation will make it an obligation for traders to identify the country of origin of their timber, and ensure that timber they sell has been harvested according to the relevant laws of that country.[103]

68. Duncan Brack, from Chatham House, thought that the European Commission's due diligence proposal would help to reduce illegal timber imports, but only if improvements were made to the draft regulation; it would fail in its current form. He pointed out that the rules would only apply at the port of entry into the EU; once a timber shipment had been granted legal status by a Member State, there would be no further checks applied to the goods. He argued that if a Member State fails to introduce effective customs controls, it could become a channel for illegal timber to enter into the EU.[104] The Environmental

100 Ev 103

101 Ev 104

102 Ev 67

103 "Forest and FLEGT", *European Commission*, October 2008, http://ec.europa.eu

104 Ev 72

Investigation Agency pointed out that the Commission's proposal focuses on "operator behaviour", "rather than the actual problem [of] illegal timber", and that the proposal "does not prohibit illegal timber, meaning illegal timber will remain legal in the EU market if the regulation is passed without amendment".[105] It also thought that there could be large variations between countries in the way the proposals could be applied, increasing the risk of illegal imports continuing.[106] Friends of the Earth welcomed the due diligence proposal but thought that clear sanctions needed to be applied:

> The proposal should […] be amended to explicitly make trading in illegal timber and timber products or the placing of these on the market a punishable offence. It should specify the different levels of offence (e.g. trading or marketing of illegal timber products, failure to put in place a due diligence system, insufficient implementation or weak due diligence systems) and spell out strong deterrent sanctions.[107]

69. The European Parliament's Committee on Environment, Public Health and Food Safety has made recommendations to strengthen the proposal "including the introduction of a requirement that operators place or make available on the market only legally harvested timber or timber products, at all points in Community market supply chains: in effect a prohibition on selling illegal products".[108] The amendments also proposed increasing regulatory oversight by the Commission. On these proposals Defra commented:

> […] we are currently minded to seek the inclusion of a prohibition on placing illegally harvested timber on the Community market. We believe that making it an offence to place illegally harvested timber on the Community market could strengthen the Regulation, and send a clear message to operators that such activity was no longer acceptable, creating a level playing field for importers across the EU. It would also enable enforcement authorities to take action where evidence of the trade in illegal timber had been brought to their attention. However, the UK believes that such a prohibition should apply only to operators who first place timber or timber products on the Community market, and that the onus on proving such an offence should remain with the authorities.[109]

70. **We support the Government's desire to strengthen the current EU proposals on control of the illegal timber trade. The Government must work with the EU to make it an offence to place illegal timber and timber products onto the market and to introduce robust sanctions to enforce these rules.**

105 Ev 117

106 Ibid

107 Ev 21

108 DEFRA, *Public Consultation on the European Commission's Proposal for a Due Diligence Regulation*, 1 April 2009

109 Ibid

5 Paying for forests

Where should funds come from?

71. A system to pay compensation to developing countries for not converting their forests into economic wealth was one of the three key policy levers identified in the Eliasch Review. Payments for reducing deforestation could be an important source of income for rainforest nations and could help to create the political motivation to act on deforestation, and help to change the economic incentives for deforestation. The international climate change negotiations have focused on this issue more than any other.

72. Witnesses suggested a number of ways to fund a forest payment mechanism. Some suggested that carbon markets should be used, while others believed that developed country governments should pay into a fund. Other funding sources could include:

- the partial auctioning of international emission credits normally assigned for free to each country; $150 billion could be raised each year if 40 per cent of credits were auctioned at $30–40 per tonne
- a levy placed on emission trading transactions. A $3 per tonne levy on the EU ETS until 2012 would raise $570 million. A form of this already exists; a 2 per cent levy is placed on CDM credits for the Adaptation Fund managed by the UN. This will generate $160–950 million by 2012
- a levy on international activities that cause climate damage; 5 euros per ticket on international flights could generate 10 billion euros per year

73. The Carbon Market Investors Association and SFM Ltd argued that only carbon markets could deliver the scale of funds required to halt deforestation. They said actions to protect forests should earn carbon credits that could be traded in emissions trading schemes alongside credits earned from industrial sources. The Eliasch Review also recommended a market-based approach.[110] It found that forest carbon credits should be permitted in the EU ETS, albeit with limits is placed on their use.[111] WWF supported a market-based approach, but only if developed countries accepted reduction targets greater than 25–40%.[112] Barry Gardiner MP, Co-Chairman of the GLOBE Dialogue on Land Use Change & Ecosystems, thought that a hybrid approach using both private and public funds would be the way forward. He criticised the UNFCCC negotiations for only focusing on markets as solutions.[113]

74. The European Commission has rejected the use of forest credits in the EU Emissions Trading Scheme (EU ETS) before 2020 and would then permit their use only if it could be demonstrated to be effective. The Commission was concerned that cheap forest credits would destabilize emissions trading schemes by lowering the carbon price. The

110 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008, p 75

111 Ibid, p 229

112 Ev 154

113 Q 132

Commission suggested that Member States could use credits based on reductions in emissions due to degradation and deforestation to meet their non-traded sector commitments, which would have the benefit of trialing the use of these credits. It proposed that a Global Forest Carbon Mechanism (GFCM) should be established to fund governance changes in developing countries, to establish policies for addressing deforestation and to reward reductions in emission due to degradation or deforestation. The Commission indicated that this could be funded using 5 per cent of auction revenues from the EU ETS, providing some 2 billion euros per annum by 2020. More recently, the European Parliament's Environment Committee proposed that 12.5 per cent of auction revenues for Phase III of the EU ETS be spent on forest protection.

75. Other witnesses were concerned that a market-based approach might undermine a move to a low-carbon economy if cheap credits enabled developed countries to defer action on reducing emissions.[114] If buying forest credits was cheaper than paying to reduce their own emissions then industry might stop trying to reduce its emissions and that could undermine efforts to reduce emissions globally. It might also have a detrimental impact on global efforts to reduce emissions if funding for low-carbon development in developing countries was diverted to pay for forest protection.[115]

76. We asked Ministers which approach they supported. Michael Foster MP, the DFID Minister, argued that public funds would not be enough on their own, and that there was "a general view that it has got to be a combination of private and public money and the market is one way in which we can lever in the private funding that is necessary".[116] Joan Ruddock MP, the DECC Minister, stressed the Government's view that public funds could not "possibly provide the level of sustainable funding that would be required. The estimates are between £10 billion and £20 billion a year to halve deforestation by 2030. We think those sums are just beyond the collecting pot and we are going to have to find a market mechanism to do that".[117]

77. We agree with the European Commission that forest credits should not be included in the EU ETS at this stage. This should only happen, if at all, after the impact of such credits has been tested. We also agree with the Government that public finance will not deliver the scale of funds required and that additional funding sources are necessary. Whether international discussions lead to a market-based system of payments or a system funded by another source of revenue there need to be significant improvements in governance and reforms to legal systems and land-ownership if the payments are going to work.

78. **A system to pay for sustaining forests is vital. But such a system could be counter-productive if it allowed developed countries to continue emitting unsustainable levels of greenhouse gases or if it diverted funds away from projects that enable developing countries 'leap-frog' carbon intensive development.**

114 Ev 97

115 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008

116 Q 191

117 Q 192

79. **We do not believe that a forest payment system based on carbon markets will avoid these problems at present. Forest credits should not be allowed in the EU Emissions Trading Scheme at this stage and should be considered only in the future after the impact of such credits has been tested.**

80. **The Government must suggest ways to pay for sustaining forests. These should include non-market funding sources, such as the hypothecation of a percentage of EU Emissions Trading Scheme revenues and how forest credits could help to meet non-traded sector emission targets.**

81. **In the search for a suitable mechanism to pay for forests, the Government must also examine the supply- and demand-side issues we have identified. A forest payment mechanism by itself will not stimulate the necessary governance reforms in all countries. The Government must consider how to link payments for forests to reform of governance in rainforest nations. It must also act bilaterally to build capacity and the necessary institutions in rainforest nations. Rainforest nations with severe governance problems will find it extremely difficult to reduce emissions and they could be rewarded for making verifiable efforts to develop independent judicial systems and reform legal, fiscal and land tenure systems that will help halt deforestation in the future.**

Wider impacts of a payment mechanism

82. A payment mechanism could herald a new age of forest protection and enhancement if countries are motivated to halt the deforestation of primary and natural forests, as well as establish new forests in a way that enhances biodiversity, mends ecosystems and delivers sustainable forest products. But a payment mechanism for forests will not protect rainforests unless safeguards are in place to prevent primary forests from being converted to plantations. Controls are needed to stop global biodiversity loss being exacerbated by a forest payment mechanism.

83. A forest payment mechanism could lead to natural forests being replaced by tree plantations if payments were made solely on the basis of forest area, or net deforestation rates. Palm oil plantations fit the UNFCCC definition of forests (which only specifies area, tree heights and density) and they could be eligible for payments.[118] Forests could be replaced by plantations with no loss of payments but biodiversity would suffer, in addition to the loss of a carbon sink and the release of greenhouse gases. Even if areas of savannah or heathland are converted to forest plantations there will be biodiversity loss and other environmental damage.[119]

84. Global Witness thought that such impacts could be avoided if payments were graded with credits derived from forests of higher biodiversity value would be worth more, and forests "slated for conversion or under concession agreements with industrial logging companies" receiving nothing.[120] Greenpeace said that "if carbon finance mechanisms are

118 "What is a forest?", *REDD-Monitor*, November 2008, www.redd-monitor.org

119 Secretariat of the Convention on Biological Diversity, *Draft Findings of the Ad Hoc Technical Expert Group on Biodiversity and Climate Change*, November 2008

120 Ev 114

to be effective in reducing emissions from deforestation, they must not support the replacement of natural forests with plantations and must not subsidize the expansion of industrial logging, agri-business and other destructive practices into intact forest areas".[121]

85. The challenge is to ensure that controls do not prevent reforestation, restoration and afforestation—such activities should still receive significant support as they are also critical in mitigating climate change. They can reduce pressure on natural forests and, if implemented sensitively, can lead to habitat recreation and biodiversity improvements.[122] Eric Bettelheim, said that failure to create new forests would prevent deforestation targets from being reached:

> It takes at least a decade from the initiation of a plantation to its first harvest. Even if we started today to plant new forest, that is sustainable forests, in the form of plantations of one kind or another, with fast-growing species, in ideal conditions, we would not meet [targets to halve deforestation by 2020]. So the reality is that, if we are to achieve REDD in any meaningful sense, we have to embark simultaneously on a massive shift in an underlying forest product industry. The acreage and the yields from that acreage will have to increase substantially over the coming decades if we are to, in fact, reduce the harvest from the native forest.[123]

86. The Eliasch Review said that experience from the CDM "suggests that there is little appetite for establishing mandatory sustainability standards within UNFCCC mechanisms" and that "primacy of national sovereignty in decision-making about land use means that an international agreement on climate change will not be prescriptive in how nations choose to tackle deforestation".[124] The Review suggested that credits should be made on the carbon content of forests, which would normally be greater in old forests. It also said that credits generated by programmes that deliver wider environmental aims, such as biodiversity protection, "could be given preferential treatment in the international compliance or other markets".[125] But regulation must not be so complicated that it leads to transaction costs so high that countries are discouraged from participating in any scheme.[126]

87. Huw Irranca-Davies MP, the Minister of State at Defra, recognised these concerns. He indicated that the Government would seek to ensure that any payment mechanism would work on a basis that puts "the emphasis on primary forests rather than clearance of forest and then replanting".[127] The Minister seemed optimistic that sustainability would be included in the Copenhagen agreement. He pointed to work that Defra Chief Scientist, Dr

121 Ev 9

122 Secretariat of the Convention on Biological Diversity, *Draft Findings of the Ad Hoc Technical Expert Group on Biodiversity and Climate Change*, November 2008

123 Q 78

124 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008

125 Ibid, p 191

126 Q 85

127 Q 207

Bob Watson, was doing to describe practical solutions to the potential biodiversity impacts of a payment mechanism.[128]

88. **We recommend that payments to forest nations to reward reforestation, afforestation or avoided deforestation are designed to protect primary and natural forests. Biodiversity safeguards should be built into any agreement reached at Copenhagen in December. Restoration, reforestation and afforestation will also be significant contributors to halting dangerous climate change and should receive significant support. Balancing these objectives without making a scheme that is so complex that participation is discouraged is the key dilemma in drawing up any international agreement.**

128 Q 207

6 Conclusion

89. Failure to halt deforestation will raise greenhouse gas concentrations in the atmosphere above safe levels, even if industrial emissions are reduced to zero. Failure to end deforestation quickly could double the cost of avoiding dangerous climate change to 2030. The economic, environmental and development case for ending deforestation is overwhelming. Success is only possible if the international community works together effectively.[129] In the long-term, the focus must be wider than just deforestation. Globally a more sustainable way to use land that encompasses agriculture, forestry, development, biodiversity and climate change is essential.

129 The Eliasch Review, *Climate change: Financing Global Forests*, October 2008

Conclusions and recommendations

Deforestation and sustainable land use

1. An agreement on reducing emissions from deforestation and forest degradation will be required if the UNFCCC conference in Copenhagen in December 2009 is to be a success. We are concerned by evidence that the negotiations are focusing solely on the development of a payment mechanism. An agreement at Copenhagen must include a decision that the global community will also act on both the supply- and demand-side causes of deforestation. In particular, the UK and other developed countries must reduce the impact of their consumption patterns on deforestation and forest degradation. (Paragraph 14)

Supporting rainforest nations

2. The UK Government must lobby for an agreement in Copenhagen that includes a mechanism to support capacity building and effective governance in rainforest nations. The Copenhagen agreement must reduce the economic drivers of deforestation. (Paragraph 21)

3. We recognise the benefits of channelling funding through multilateral organisations, but the Government must ensure that these organisations effectively deliver its aims. More resources should be given to bilateral activity on forestry related issues, especially as development objectives and climate change objectives are well aligned in measures to reduce emissions from deforestation. (Paragraph 24)

4. We caution against further reductions to UK bilateral activity in significant rainforest nations. The UK must be able to work effectively on environmental issues in its bilateral relationships. Outsourcing environmental work may lead to a reduction in civil service expertise and the UK's effectiveness in this field. The Government must ensure it retains an appropriate level of expertise. (Paragraph 27)

5. We welcome the Forest Carbon Partnership Facility and hope that it will influence thinking on how to reduce emissions from deforestation and forest degradation. If implemented effectively, the strategies that are developed under it could play a key role in helping rainforest nations shift to more sustainable land use. We are concerned, however, that action being taken under it could be undermining work the Government has done elsewhere to improve forest governance. In its response to this Report the Government should make clear what action it has taken to address these criticisms. (Paragraph 30)

6. We welcome the Government's wish to ensure that forest peoples' rights are recognised in the agreement at Copenhagen. We believe that eligibility for forest payments should be conditional on the protection of local communities. Commitment to a rights based approach might be evidenced by ratification of International Labour Organisation Convention 169 on Tribal and Indigenous Peoples; the UK Government should encourage rainforest nations to sign and ratify this treaty. (Paragraph 35)

7. UK development assistance could increase greenhouse gas emissions and deforestation if not managed effectively. We urge DfID to ensure that the programmes and projects it funds bilaterally, including through arms length bodies such as CDC, and multilaterally, through organisations such as the World Bank, assist progress towards a low-carbon global economy and halt deforestation. We recognise that in certain cases projects that lead to managed increases in emissions and deforestation might be defended on development grounds; indeed many developing countries claim a right to increase their emissions because they are not responsible for current greenhouse gas concentration levels. But the need to reduce emissions, including those from deforestation, must now be included within developing countries' national development and growth plans; DfID should ensure that development assistance contributes to the development of a low-carbon economy. (Paragraph 40)

Managing demand

8. We welcome the Joint Nature Conservation Committee's work on the UK's global impact on biodiversity. This, combined with the Foresight Project on Global Food and Farming Futures, must be used by the Government to identify how to reduce the deforestation that results directly and indirectly from UK demand for commodities. This work should consider the consumption of all imported commodities that affect deforestation. The Government should take account of and engage with work being done on these issues by the European Commission. (Paragraph 42)

9. A fundamental reassessment of the way in which the global agricultural system functions is needed. It is critically important that the Government's response to the global food crisis includes strong support for a global change in sustainable land use and an end to deforestation. (Paragraph 49)

10. While we welcome the Government and G8 response to the global food crisis and its call for a Global Partnership on Agriculture and Food, we are very concerned that the G8 has failed to address the need for sustainable production of agricultural commodities. It failed to act on agricultural subsidies, biofuel subsidies and other damaging trade-distorting measures. This suggests that the G8 countries are not committed to solving the developing ecological and food security crisis in a sustainable way. (Paragraph 50)

11. We are concerned that the Renewable Transport Fuels Obligation and the Renewables Obligation are stimulating deforestation. Potentially damaging biofuels should not be promoted until the technology improves, robust mechanisms to prevent damaging land use change are introduced and international sustainability standards are agreed. The Government must ensure its policies do not stimulate or accelerate deforestation. (Paragraph 57)

12. It is wrong to apply sustainability standards to commodities used for biofuels but not for food and we recommend that the Government develops sustainability standards for all agricultural commodities. The Government should work on ending damaging agricultural subsidies in the EU and other developed countries so that standards can be agreed. A mechanism that rewards countries for not converting forests to

agricultural use will make it possible to reach international agreement on sustainability standards. (Paragraph 58)

13. Three years ago we called for legislation to ban imports of illegal timber. No ban was introduced and illegal timber remains an unacceptable part of the UK timber trade; it is possible that the UK is one of the world's largest importers of illegal timber and illegal timber products. This failure to ban illegal timber means that the UK is undermining efforts to improve forest governance and contributing to deforestation and its associated emissions. (Paragraph 61)

14. The Government has a policy framework to ensure the procurement of legal and sustainable timber by central government but it has been poorly enforced. We welcome Defra's development of a timber monitoring and tracking system to address this problem; an effective system is needed across Whitehall at the earliest opportunity. The Government should consider introducing penalties to motivate departments and companies to implement policy. The Government must also insist that local authorities and the wider public sector adopt timber procurement policies. (Paragraph 66)

15. We support the Government's desire to strengthen the current EU proposals on control of the illegal timber trade. The Government must work with the EU to make it an offence to place illegal timber and timber products onto the market and to introduce robust sanctions to enforce these rules. (Paragraph 70)

Paying for forests

16. A system to pay for sustaining forests is vital. But such a system could be counter-productive if it allowed developed countries to continue emitting unsustainable levels of greenhouse gases or if it diverted funds away from projects that enable developing countries 'leap-frog' carbon intensive development. (Paragraph 78)

17. We do not believe that a forest payment system based on carbon markets will avoid these problems at present. Forest credits should not be allowed in the EU Emissions Trading Scheme at this stage and should be considered only in the future after the impact of such credits has been tested. (Paragraph 79)

18. The Government must suggest ways to pay for sustaining forests. These should include non-market funding sources, such as the hypothecation of a percentage of EU Emissions Trading Scheme revenues and how forest credits could help to meet non-traded sector emission targets. (Paragraph 80)

19. In the search for a suitable mechanism to pay for forests, the Government must also examine the supply- and demand-side issues we have identified. A forest payment mechanism by itself will not stimulate the necessary governance reforms in all countries. The Government must consider how to link payments for forests to reform of governance in rainforest nations. It must also act bilaterally to build capacity and the necessary institutions in rainforest nations. Rainforest nations with severe governance problems will find it extremely difficult to reduce emissions and they could be rewarded for making verifiable efforts to develop independent judicial

systems and reform legal, fiscal and land tenure systems that will help halt deforestation in the future. (Paragraph 81)

20. We recommend that payments to forest nations to reward reforestation, afforestation or avoided deforestation are designed to protect primary and natural forests. Biodiversity safeguards should be built into any agreement reached at Copenhagen in December. Restoration, reforestation and afforestation will also be significant contributors to halting dangerous climate change and should receive significant support. Balancing these objectives without making a scheme that is so complex that participation is discouraged is the key dilemma in drawing up any international agreement. (Paragraph 88)

Annex

Environmental Audit Committee Visit to Cameroon, 18–23 January 2009

Participating Members:

Mr Tim Yeo, in the Chair

Colin Challen	Jo Swinson
Mr David Chaytor	Dr Desmond Turner
Mark Lazarowicz	Joan Walley

YAOUNDÉ

Monday 19 January

Breakfast with Heads of Mission of donor countries

President of the National Assembly, Parliamentarians

Working lunch with COMIFAC

Secretary General and officials, Ministry of Finance

Prime Minister

Reception with representatives of Government, Academia and Civil Society

Tuesday 20 January

Minister of Forestry and Wildlife

Minister of Environment and Nature Protection

Roundtable lunch with Civil Society

KRIBI

Wednesday 21 January

Tour of Campo Ma'an Technical Operational Unit

Meeting with WWF field officers

Visit to community forest project

Visit to local saw mill

Thursday 22 January

Tour of Wijma Sawmill

Visit to Forest Governance Facility Project

DOUALA

Friday 23 January

Douala Port

Local councillors and community leaders, Idenao

Formal Minutes

Tuesday 16 June 2009

Members present

Mr Tim Yeo, in the Chair

Colin Challen	Dr Desmond Turner
Mark Lazarowicz	Joan Walley

Reducing greenhouse gas emissions from deforestation: No hope without forests

Draft Report (*Reducing greenhouse gas emissions from deforestation: No hope without forests*), proposed by the Chairman, brought up and read.

Ordered, That the draft Report be read a second time, paragraph by paragraph.

Paragraphs 1 to 89 read and agreed to.

Annex and Summary agreed to.

Resolved, That the Report be the Fifth Report of the Committee to the House.

Ordered, That the Chairman make the Report to the House.

Written evidence, reported and ordered to be published on 9 December, 21 April and 28 April, was ordered to be reported to the House for printing with the Report.

Ordered, That embargoed copies of the Report be made available, in accordance with the provisions of Standing Order No. 134.

[Adjourned till Tuesday 23 June at 10.00am

Witnesses

Tuesday 9 December 2008

Page

Mr Johan Eliasch, Prime Minister's Special Representative on Deforestation and Clean Energy, **Mr Jonathan Brearley,** Director, and **Mr Graham Floater,** Deputy Director and the Eliasch Review Team Leader, Office of Climate Change — Ev 1

Mr Charlie Kronick, Senior Climate Campaigner, Greenpeace and **Ms Robin Webster,** Senior Campaigner, Friends of the Earth — Ev 23

Tuesday 16 December 2008

Mr Eric Bettelheim, Executive Chairman, Sustainable Forestry Management Ltd, and **Mr Abyd Karmali,** President, Carbon Markets and Investors Association (CMIA) — Ev 46

Mr Duncan Brack, Associate Fellow, and **Ms Alison Hoare,** Associate Fellow, Energy, Environment and Development Programme, The Royal Institute of International Affairs, Chatham House — Ev 68

Tuesday 10 February 2009

Barry Gardiner, MP, Senior Commission Member, International Commission on Land Use Change and Ecosystems, GLOBE International — Ev 74

Tuesday 24 February 2009

Mr Tom Griffiths, Co-ordinator, Finance, Programme, Forest Peoples Programme, **Ms Saskia Ozinga,** Campaign Co-ordinator, FERN and **Ms Fiona Watson,** Campaign Co-ordinator, Survival International — Ev 87

Tuesday 3 March 2009

Mr Michael Foster MP, Parliamentary Under-Secretary of State, Department for International Development, **Joan Ruddock MP,** Parliamentary Under-Secretary of State, Department for Energy and Climate Change, and **Huw Irranca-Davies MP,** Minister for the Natural and Marine Environment, Wildlife and Rural Affairs, Department for Environment, Food and Rural Affairs — Ev 106

List of written evidence

List of Reports from the Committee during the current Parliament

The reference number of the Government's response to each Report is printed in brackets after the HC printing number.

Session 2008–09

First Report	Work of the Committee in 2007–08	HC 108
Second Report	Environmental Labelling	HC 243
Third Report	Pre-Budget Report 2008: Green fiscal policy in a recession	HC 102 (HC 563)
Fourth Report	Reducing CO_2 and other emissions from shipping	HC 528

Session 2007–08

First Report	Are biofuels sustainable?	HC 76-I & -II (HC 528)
Second Report	Reducing Carbon Emissions from UK Business: The Role of the Climate Change Levy and Agreements	HC 354 (HC 590)
Third Report	The 2007 Pre-Budget Report and Comprehensive Spending Review: An environmental analysis	HC 149-I & -II (HC 591)
Fourth Report	Are Biofuels Sustainable? The Government Response	HC 528 (HC 644)
Fifth Report	Personal Carbon Trading	HC 565 (HC 1125)
Sixth Report	Reaching an international agreement on climate change	HC 355 (HC 1055)
Seventh Report	Making Government operations more sustainable: A progress report	HC 529 (HC1126)
Eight Report	Climate change and local, regional and devolved government	HC 225 (HC 1189)
Ninth Report	Carbon capture and storage	HC 654
Tenth Report	Vehicle Excise Duty	HC 907 (HC 72)
Eleventh Report	The Exports Credit Guarantee Department and Sustainable Development	HC 929 (HC 283)
Twelfth Report	Greener homes for the future? An environmental analysis of the Government's house-building plans	HC 566 (Cm7615)
Thirteenth Report	Halting biodiversity loss	HC 743 (HC 239)

Session 2006–07

First Report	The UN Millennium Ecosystem Assessment	HC 77 (HC 848)
Second Report	The EU Emissions Trading Scheme: Lessons for the Future	HC 70 (HC 1072)
Third Report	Regulatory Impact Assessments and Policy Appraisal	HC 353 (HC 849)
Fourth Report	Pre-Budget 2006 and the Stern Review	HC 227 (HC 739)

Fifth Report	Trade, Development and Environment: The Role of FCO	HC 289 (HC 1046)
Sixth Report	Voluntary Carbon Offset Market	HC 331 (HC 418)
Seventh Report	Beyond Stern: From the Climate Change Programme Review to the Draft Climate Change Bill	HC 460 (HC 1110)
Eighth Report	Emissions Trading: Government Response to the Committee's Second Report of Session 2006–07 on the EU ETS	HC 1072
Ninth Report	The Structure of Government and the challenge of climate change	HC 740 (HC 276)

Session 2005–06

First Report	Greening Government: the 2004 Sustainable Development in Government Report	HC 698
Second Report	Sustainable Timber	HC 607 (HC 1078)
Third Report	Sustainable Procurement: the Way Forward	HC 740
Fourth Report	Pre-Budget 2005: Tax, economic analysis, and climate change	HC 882 (HC 195)
Fifth Report	Sustainable Housing: A follow-up report	HC 779
Sixth Report	Keeping the lights on: Nuclear, Renewables, and Climate Change	HC 584 (HC 196)
Seventh Report	Sustainable Development Reporting by Government Departments	HC 1322 (HC 1681)
Eighth Report	Proposals for a draft Marine Bill	HC 1323 (HC 1682)
Ninth Report	Reducing Carbon Emissions from Transport	HC 981
Tenth Report	Trade, Development and Environment: The Role of DFID	HC 1014 (HC 197)
Eleventh Report	Outflanked: The World Trade Organisation, International Trade and Sustainable Development	HC 1455 (HC 354)
Twelfth Report	Transport Emissions: Government Response to the Committee's Ninth Report of Session 2005–06 on Reducing Carbon Emissions from Transport	HC 1718

Session 2005–06

First Report	Greening Government: the 2004 Sustainable Development in Government Report	HC 698
Second Report	Sustainable Timber	HC 607 (HC 1078)
Third Report	Sustainable Procurement: the Way Forward	HC 740
Fourth Report	Pre-Budget 2005: Tax, economic analysis, and climate change	HC 882 (HC 195)
Fifth Report	Sustainable Housing: A follow-up report	HC 779
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Twelfth Report	Transport Emissions: Government Response to the Committee's Ninth Report of Session 2005–06 on Reducing Carbon Emissions from Transport	HC 1718

Oral evidence

Taken before the Environmental Audit Committee

on Tuesday 9 December 2008

Members present

Mr Tim Yeo, in the Chair

Mr David Chaytor
Martin Horwood
Jo Swinson
Dr Desmond Turner
Joan Walley

Witnesses: **Mr Johan Eliasch**, Prime Minister's Special Representative on Deforestation and Clean Energy, **Mr Jonathan Brearley**, Director, and **Mr Graham Floater**, Deputy Director and the Eliasch Review Team Leader, Office of Climate Change, gave evidence.

Q1 Chairman: Good morning and welcome to the Committee. This is the start of our inquiry into forestry so we are very glad to have you here for the first session and thank you for making the time to come in. Would you like to kick off by giving us the headline points from your Review so that we can get the scene set?

Mr Eliasch: I would be very pleased to do that. First of all let me introduce Jonathan Brearley, who is the Head of the OCC, and Graham Floater who is also part of the OCC and is now the Deputy Director and Team Leader of the Review. The Review itself was an independent review on global deforestation, its effect on climate change, the costs to the global economy, the importance of carbon to climates and international support for reducing deforestation. Its objectives were to assess the evidence on methods of financing global forests which can produce carbon emissions from forests, reduce poverty and preserve biodiversity and other eco-systems. Saving forests is critical to tackling climate change. Deforestation accounts for somewhere around 17% of global carbon emissions and if you put this in context it is roughly the same as what the US emits, now probably overtaken by China, so you are looking at a big chunk of emissions. What we have to keep in mind here is that with such a big challenge this is an area where, if it is not addressed, it is virtually going to be impossible to meet the targets that we have set for combating climate change. In that context what the Review found was that we could have additional climate change damage to the tune of $1 trillion a year, which is a staggering amount, by the year 2100. We also found that by tackling deforestation one could effectively halve the cost of tackling climate change, or alternatively one could increase the targets by an additional 10% and go deeper, which is a very important finding in the context of overall climate change initiatives, and that is by 2030. The curve here is quite important because this would represent that you could reduce the total cost by 40% if you go up to 2040[1]. We also found that by 2030[2] the net benefit, i.e. if you take the net present value of the savings in terms of damages and the costs of addressing deforestation would be roughly $3.7 trillion, which is obviously a significant amount of money in relation to the global economy. We also found that the target we should aim for is to halve deforestation by 2020 and to make the sector carbon neutral by 2030, and that would be achieved by reducing deforestation to the tune of 75% and through aforestation and reforestation projects. We also tried to ascertain how one could finance this. We found that there are a few building blocks here which are critical to achieving the mechanism. The first is that we need to build capacity in these countries so that the rainforest countries are geared up to tackling the problem. With that we need advanced measuring techniques. We need to set the emissions base lines at the national level, and that also includes new forest growth, so that the forest can be paid for by the net emissions reductions. We also think that that would more or less reduce perverse incentives. One of these is that if you are not careful some countries might think that it could even be in their interests to induce deforestation because you would set the base lines at a more advantageous level for them going forward. We also found that in the medium term we will need a combination of finance from carbon markets and other funding initiatives and that is to do with the fact that we need a gradual, smooth transmission and carbon markets could not on their own provide the finance, so we will have here a funding gap and the gap needs therefore to be met through other funding sources which would have to be predominantly public finance. The other thing we identified as very important was strong governance and effective mechanisms for the distribution of finance. We also believe that it is vital that the forest communities are very much part of the solution and this is, I would say, a big opportunity to address poverty reduction in as many as 40 countries. You are looking at a huge number of people.

Q2 Chairman: Thank you. What has been the Government's reaction so far? Have they indicated that they are going to accept your recommendations?

[1] *Note by Witness:* The year should be 2050, not 2040.
[2] Note by Witness: The year should be 2200, not 2030.

Mr Eliasch: The Government have, I believe, welcomed the Review. They are obviously looking into it. What one has to keep in mind here, is that this is very much a platform for the negotiation phase, that we are in as the lead negotiator for the European Union and I would not quite expect the Government to give an official response that might prejudice future negotiations.

Q3 Chairman: What sort of indicators have you had from other governments in other parts of the world, if any?
Mr Eliasch: We have had official communication from the government of Norway, which is today the biggest donor country for this area, which was positive. We have had positive reactions from Indonesia, Papua New Guinea, Costa Rica and British Guyana, who have made official statements to the fact that they very much welcome the Review, and we have also had informal views from a number of organisations and also other countries.

Q4 Chairman: What about Brazil because Brazil has had a resistance to using carbon markets in the past and Brazil is rather crucial to the whole future of this issue? Have you had any communication on how they view your recommendations?
Mr Eliasch: We have not had any formal indications of how they view the Review but it is interesting that last week they announced that they want to set a target to reduce deforestation to 30% by 2020. It obviously falls short of our recommended target of 50%[3] but this is a step in the right direction.

Q5 Mr Chaytor: Can I pursue the question of the target that you set? What was the basis of the figure of 50% by 2020?
Mr Eliasch: I would start from the other target, which is to make the sector carbon neutral, how quickly can we achieve that realistically. That was the starting point and by working backwards in order to achieve that target it would be realistic to try to get to 50% reduction in deforestation by 2020.

Q6 Mr Chaytor: You start with the carbon neutral target of 2030. Why so long, 22 years? What was the basis of your figure of 2030 as the earliest point at which carbon neutrality could be achieved? What are the factors at play here?
Mr Floater: I think there is a balance here. Obviously, we would like to see the most ambitious targets that we can achieve realistically and the modelling that we did to get to that with the global carbon market was that you could attain a 75% reduction in deforestation by 2020[4] and make the sector carbon neutral if you included aforestation and reforestation as well. In terms of the timing, one has to balance the stringency of targets with the realities of capacity building and getting mechanisms in place in countries to be able to achieve that target, so ultimately it is partly a judgment but it is a judgment based on the stringency of targets and also the realities of getting there.

Q7 Mr Chaytor: Of the various factors you have mentioned—capacity building, the timescale, the growth of carbon markets, which are the most unreliable factors? Which issues are most likely to mean that this will not be achieved by 2030?
Mr Floater: There are a number of factors involved. There needs to be political will on the part of the international community because this involves the transfer of finance and also on the part of rainforest nations themselves because they are the recipients. Ultimately rainforest nations need to take a lead on that. There are various factors. The political factors are probably more important here than the economic factors.

Q8 Mr Chaytor: Just pursuing the reference to Brazil that was made earlier, Brazil made a statement last week that it wants to establish a fund and it has announced a target of 70% deforestation but only Norway has agreed to contribute to the fund and the fund is for one year at a time, so what is your assessment of the political will underlying this because it is okay, as you say, to have a fund but if nobody is contributing to the fund it does not get very far? What is your assessment of the Brazilian statement last week?
Mr Floater: I think it shows why we need a number of different funding mechanisms, as Johan has set out, including carbon markets.
Mr Brearley: If I could add to that, at the moment you are right: Norway has made a large contribution. I think we are reasonably optimistic in the short term on the capacity building funding we might need, but obviously that is subject to strong political decisions by a number of countries.

Q9 Mr Chaytor: Could you tell us a little bit more about reforestation because it does not necessarily follow that reforestation would fully compensate for a longer timescale over stopping deforestation, does it, because it depends on the nature of the reforestation, surely? What is the balance between the emission cuts that can be achieved by a process of reforestation as against those which can be achieved by a process of halting deforestation?
Mr Floater: What we did in the analysis was to look at emissions rather than rates of deforestation *per se*. You have to start with rates of deforestation and then calculate the emissions that come from that, and equally look at the different processes of aforestation, reforestation and restoration and calculate the sequestration rates that come from that. The figures that we have put forward in the Review are based on a balance between the emissions reductions from deforestation, particularly in tropical rainforests, with the sequestration of carbon dioxide from aforestation and reforestation, and that is how you get the sector carbon neutral by 2030.

[3] *Note by Witness:* The recommended target should be 25% by 2030, not 50%.
[4] *Note by Witness:* The 75% reduction in deforestation should be attained by 2030, not 2020.

Q10 Mr Chaytor: But this must surely be unpredictable because it depends on the nature of the reforestation and the location of the reforestation. Is there a simple methodology or ratio that people can understand, or is the modelling just too detailed and too specific and it is not possible for the average intelligent *Guardian* reader to appreciate?

Mr Floater: It is not simple in terms of there is no one simple equation, but what is important is understanding the different forest types, the amount of carbon stored in the different forest types, both within the vegetation but also in the soil, and what carbon emissions the different land use changes will result in. The IPPC have guidelines for measuring at different levels of confidence, which is quite a large guide, but that is basically what we would recommend people use.

Mr Eliasch: What is important to keep in mind here is that, if you take Atlantic forests, you have, let us say, 19 tonnes of carbon[5] stored per hectare, whereas in the rainforests it goes as high as 400 tonnes per hectare. What is very important is to get forestry conducted in a sustainable manner globally and that is something that follows with the governance. Most countries have requirements for sustainable forest management plans, and most notably Brazil have very strict regulations here, but they are not always followed and it is very difficult to police because you are dealing with huge land areas which are impossible to patrol, so in the end you have to rely on the goodwill of the local communities and the local forestry agencies. In terms of reforestation, if you take Atlantic forests, of course, you can easily replant trees in local areas but in the rainforest, once you have clear cut, a piece of land, that soil is very quickly going to be destroyed because the sun is so strong, so it is very important that clear cutting is avoided and that management plans are followed. Usually you can cut, let us say, a cubic metre per hectare every 20 years because that does not impact the soil and it does very little damage if you conduct it in that manner throughout as part of a management plan. You can achieve a high degree of new trees, which is important, and at the same time have sustainable forestry operations which provide jobs for the local communities. It is about getting the whole balance right.

Q11 Dr Turner: Mr Eliasch, the European Commission has said that the international negotiations should not seek to include the forestry sector in carbon markets until 2020. It argues that there are too many risks associated with these credits and that they could undermine the European ETS. Can you see a way round those issues and can you design a forestry credit scheme which would satisfy the European Commission?

Mr Eliasch: Let me start off and then I will pass over to Graham here who used to work for the Commission and is very knowledgeable about their position. Yes, we do believe that if we have the political support and the political will to make this happen we can come up with a formula that will work for the financing of forests and also the implementation of them. It does not make any sense to throw money at something where you do not have the systems in place to invest the money. That is why we are saying here that the first step is not to say, "Okay, from now on the global forests are part of the carbon markets and we are all going to buy carbon credits with proceeds that will go to these countries", and that is that. We say the first step here is to have a proper framework in place and this includes monitoring and it includes governance mechanisms because in a lot of these countries you have issues with weak legal systems, land titles, et cetera. There are many things that need to come together but once you have a robust, stable system it is like any other kind of security: if you have a tradeable which is fungible, which is well defined, which is robust in the set-up, investors will have confidence in that security and they will buy. If you look at the European Commission's position here, it is a question of timing: how quickly can we gear up and get this done.

Mr Floater: The Commission has proposed to halt global forest loss by 2030 and reduce tropical deforestation in gross terms by 50% by 2020, so these are very similar targets to the ones we set out in the Eliasch Review. They have also set out the importance of testing the inclusion of forest credits in the carbon market, so we are pleased about that. As you say, I think the question here is the same for the European Commission as it is for ourselves, ensuring that you have a well designed framework that is achievable. One point here is the transition. We set out in the Review the importance of a global carbon market to provide the demand that is needed to finance reductions in deforestation but you have to get from where we are now to that point in time and that means a transition. You can take a big bang approach and just go for a carbon market straightaway. The problem with that is that you risk flooding the market with credits. We also looked at alternative funding mechanisms that did not include the carbon market at all, but the scale of finance we did not feel was sufficient. So the conclusion that we came to was a third option, which is a smooth transition from here to 2030 with certain quantity limits which will first of all mean that there will be little or no impact on the EUA price, which is obviously a concern; secondly, that the emissions reductions are genuine and additional, and that can be done with national base lines with a proper framework through capacity building if required, and also reduce the risk of reversals. Again, you need a proper mechanism in place. We have set these things out in the Review and one thing that we are in agreement with the Commission on is that these do need to be set out for a well designed system.

Q12 Dr Turner: The European Commission have been really rather unkind about forest credits, likening them to the sub-prime mortgage market. What would happen to the carbon market if there was a massive defaulting on forestry credits?

[5] *Note by Witness:* There are in fact 90 tonnes of carbon stored per hectare, not 19.

Mr Floater: I think there is an important distinction to be made here between voluntary credits that we see at the moment and credits that will be part of a compliance market. There are a number of very good schemes that are out there at the moment that are linked to the voluntary market but there have been some concerns over other projects. We have set out in the Review that first of all you need national base lines in order to ensure net emissions, taking account of deforestation and also aforestation and reforestation, are taken account of at the national level, and that payment in arrears means that you can see the real reductions that you are paying for.

Q13 Dr Turner: That is one of the reasons why we are so keen on avoiding deforestation. It is not simply the emissions that are directly involved by burning off large tracts of forests but the function of the rainforests as the world's most important carbon sink. On the other hand, of course, there is the very real possibility that the rainforests themselves may be damaged and lost through climate change. Are we taking an undue risk in relying too much on the sink capacity of rainforests?

Mr Floater: The calculations that we do in the Review are based solely on emissions from deforestation and sequestration from aforestation and reforestation and restoration. We did not take account of the sink effects in the modelling because of the scientific uncertainties that currently exist, but clearly forests have an important part to play with the sink effect and we showed that if, under business as usual, deforestation rates continue, the atmospheric CO_{2e} concentration will rise by about 30 parts per million. We are already at 433 parts per million based on 2006 figures. If we are going to meet a target to get anywhere close to keeping temperature rises below or around two degrees we really have to act and act quickly to address the problem of deforestation.

Mr Brearley: These uncertainties are not unique to forest credits and the carbon market. Under any system you will have to have a robust way of understanding and banking the emissions savings that we are making. One important thing for you is between the financing mechanism, how the money gets there, and the governance system you need to have in place, no matter where your funding comes from. Essentially, under any funding mechanism we will have to be sure of the emissions savings that we are making and we have set out in the Review the way you might do that. If we do not make that work, a dual finance system, the task of us tackling global climate change becomes much more difficult.

Q14 Dr Turner: I take all the points you make on the finance systems; that is good. I just come back to the question of how important you assess the risk of actual damage to the rainforest itself by changing weather patterns resulting from global warming. If rainfall over Brazil decreased catastrophically, for instance, the rainforest may not maintain itself and so on. How great do you feel these risks are?

Mr Floater: The point I was trying to make was that if we do not address deforestation then those sorts of risks will increase, so this should be an added reason for us acting urgently on reducing deforestation.

Mr Eliasch: What you see in the Amazonas today is not a threat to the rainforest itself but what happens is that on the one hand you get a much more impactive hurricane season and it can be plotted against deforestation activity in the area. The other part of it is that you get droughts in the southern half of South America as a consequence and that has to do with the change of weather patterns and how cloud formations break up when they get to the Amazonas with the prevailing winds there. You can already see this but it does not impact on the rainforest itself.

Q15 Martin Horwood: It is common ground that the development of what you call a robust saving system and effective governance is absolutely essential, but how will those necessary changes in governance be made? What are you suggesting there?

Mr Eliasch: It is a question of lots of building blocks that need to be put in place in countries with rainforest. I would say it differs greatly from country to country. Some countries have strong judicial systems. Some countries have more people already in place equipped to be part of the solution. It is not one size fits all here. It is very much about adapting to different regions, different countries and cultures. What we know is that you need proper measuring techniques. You need ways to measure the reductions in a universally recognised way. There are a number of things here where we know we have common objectives. The implementation of other parts will differ depending on the region you are in.

Q16 Martin Horwood: Who is going to pay for all this quite fundamental structural change, all this advice and expertise and development to take place in advance of the system itself being set up?

Mr Eliasch: That is for public funding, governance, to do over the next few years and before we do that the process of actively reducing deforestation in our opinion will clearly take place.

Mr Brearley: Our point in the Review is that this capacity building, this funding phase that we talk about, is absolutely fundamental to the success of our scheme. There are a number of things you have to do around measuring and monitoring but also around how we are going to manage funds. We have set out some examples in the Review but this has to be part of the international discussions. We have set out some costs on how much that might be. It is not really our job to say exactly where that money should come from but if that money does not come forward then the rest of that process, whether you do it with public funding or through Parliament, is very much a threat, and if that is a threat then your ability to tackle global climate change is a threat.

Q17 Martin Horwood: It would be interesting to hear how you think it can be funded given that it is such a critical building block in the whole plan. Have you got any particular opinions on that?

Mr Floater: We have said that that we need up to $4 billion over five years to fund capacity building in 40 forest nations. These sorts of estimates are difficult and Chatham House and their associated colleagues have done a very good job of producing the background paper that provided those figures. Norway has already committed $2.5 billion to reducing deforestation emissions over five years. There are a number of other countries, donor countries, who are committed to helping this process. The UK is one. Others include Australia and Germany, so there is a will out there but these are significant amounts of funding.

Q18 Martin Horwood: Given the scale of the challenge do you think it is realistic for this significant change to be achieved in time for the new ETS Phase III?
Mr Floater: With the political will, yes. We should not underestimate the challenges here. There are three fundamental aspects to this. It needs to be part of a wider development policy. Some of the issues cannot be tackled simply by looking at deforestation alone. Secondly, it needs full participation of forest communities; and thirdly, it needs the necessary political will, as I said, from forest nations and also from the international community. It requires strong incentives from the international community for the rainforest nations to have the confidence that there is a financing mechanism that will work.

Q19 Martin Horwood: If we were in a position in 2013 where some nations were ready and others clearly were not and we went ahead with some would we not have this traditional issue of leakage that you might find more rapid deforestation in the countries that were not included, so in a sense it would undermine the whole scheme? Would that be right?
Mr Floater: I think it is important that the international community through negotiations in Poznan and next year in Copenhagen get as comprehensive a deal as possible in order to make sure that it can happen.

Q20 Martin Horwood: Can I ask you about another governance issue, which is about the land rights of indigenous tribal peoples? They do not receive an awful lot of mention in the Review. Would you first of all acknowledge that there are rights there to be recognised as in a sense we are commodifying their living environment, but, secondly, that it is a potentially quite neglected part of the possible solution in that if you firm up land rights you will improve the importance of land rights and encourage more governments to sign up for things like ILO169 and that could be quite an effective tool in helping to protect the forests themselves? Would you agree with that?
Mr Floater: It is fundamental that there is full participation from forest communities and that includes indigenous peoples. Forests are home to about 350 million people and about 60 million indigenous people, and one thing that we wanted to get across in this Review is that all of those people, many of them very poor, are important in this process. Over 90% of those living on less than one dollar a day depend on forests for their livelihood. In terms of addressing specifically the rights of indigenous peoples, on page 195 of the Review we talk about Articles 18 and 19 of the UN Declaration on the Rights of Indigenous Peoples, and, as I say, it does need to be fundamental, but we also have to recognise that there are many other forest communities who need to be taken into account as well.

Q21 Martin Horwood: Forgive me, I missed that on page 195 but it is quite a slight reference. The issue about poverty reduction as part of this package and the number of people living on one dollar day is a slightly misleading one, is it not, when you are dealing with indigenous tribal peoples who are living in the forest because in a sense they do not live on anything a day in monetary terms? They often have quite a sustainable lifestyle as it is without needing to be part of the money economy, so the protection of their rights is a much more important thing than incentivising poverty reduction because in that sense they are not really poor in the same way as a community on the margins of the forest. You do not talk a lot about their land rights as part of the solution, do you?
Mr Eliasch: Of course their land rights are as important as everybody else's land rights, and we do emphasise that in the Review. If you take a country like Brazil, they have an institute called FUNAI which is dedicated to looking after indigenous people. This is a formula which, if that is managed properly, is highly recommendable and also for the rest of the rainforest nations to adopt a similar type of system to protect their rights.

Q22 Chairman: Can we go back to the issue of credits? You argue in the report that if you allow credits into the EU ETS, provided you have got the right supplementarity limit and the right emissions reduction targets, which I think might be a fairly big assumption but I imagine you can do that, then it does not have the effect of reducing the carbon price. However, a high carbon price is regarded as essential to drive all sorts of investment in low carbon technologies crucial to what is going on in the energy sector, the transport sector and so on. There is still nevertheless a risk, is there not, that if forestry credits came in they would have a depressing effect on the carbon price?
Mr Eliasch: In our opinion, with supplementarity limits of 50% and a gradual smooth transition, and this is based on evidence from modelling, we do not think it would have an impact. I would say that the underlying thesis here is that in any market there will always be investors into that. It will always attract capital flows if you have an attractive proposition. As part of that we need a currency, a security that is robust and stable pricing mechanisms—like in any economic system that is based on open market principles that will prevail. It is not a question of flooding; it is a supply and demand situation.

Mr Brearley: Can I just add that this is not unique to the forestry debate actually, there is lot of cheap abatement in countries outside of Europe and the same issues apply. Essentially what we say is that by setting supplementarity limits you can make a judgment between that and your targets about where you think your EUA price might end up. The trade-offs you make in forestry are exactly the same as the trade-offs you make in other low carbon technologies across the developed and developing world.

Q23 Chairman: Yes, it is just potentially that they are rather big. That is why it is so important that the scope is so enormous?

Mr Brearley: Absolutely. That is why we describe a transition where essentially you have a slow transition into the market and therefore you have a slow supply of credit. That is not unique. If you look at the potential of other sectors, for example, I believe with the associated costs there you will find we did have a similar scale of issues.

Mr Floater: Could I come back to your specific question about the price impact. The modelling that we did showed that if you allow forestry credits into the international market, if the supplementarity limit in the EU ETS is already set and that level is below 50% then there will be no impact on the EUA price. The reason is, that although the average cost would go down, the carbon price is set by the marginal cost—the most expensive part of the abatement—and for that reason it would have no impact on the price. There would be implications for the international credit market, and we looked at that again. I think there is an assumption that forest credits are extremely cheap and much cheaper than credits in other sectors. We found that the reality is more complicated than that. If you allow forest credits into the international market it could make up about 34% of that market; but with stronger developed country targets and supplementarity limits in place you would be able to keep your price at a level that would be a strong incentive for investment in new technologies; it would support a high level of technology transfer to developing countries; and it would also fund the significant forestry abatement that we need.

Q24 Chairman: A 50% limit which you suggest, do you think that is the right one?

Mr Floater: We have not suggested what would be an appropriate level; that would have to be based on a number of different decisions for other sectors, because that is a decision on the level for international credits as a whole. The only thing that we did was to ask ourselves, at whatever level it is already set at if you then included forestry credits what would happen? Anything below about 70% would have very little impact.

Q25 Chairman: The Climate Change Committee reported last week and suggested that 73% of our 80% emission reduction target is likely to be most cost-effectively delivered domestically. What do you think that implies about the role of a carbon market for delivering funds for forestry?

Mr Floater: It is important to make the distinction between the ETS and non-ETS. What the Committee on Climate Change is suggesting is that in the intended budget case—this is the case that they put forward in the eventuality of a global deal—up to 20% of the required emissions reductions could be achieved through offset credit purchase. That is outside of the EU ETS; and so the report is compatible with the findings in our report.

Q26 Joan Walley: Just looking at offsetting, a large proportion of our emission reduction target places considerable faith in international credits; but it has been difficult verifying emission reductions from industrial sources. What we wondered is what evidence you have to show that forest credits will not be even harder to verify and easier to manipulate? Have you got evidence to show that it will not be even harder to verify the forest credits that there would be? If you actually look at what is happening at the moment, it is very difficult to verify and manipulate the credits that there are; and we just feel with the forestry situation you are embarking on something that would be even harder to verify.

Mr Eliasch: With all types of credits you have similar types of challenges. The implementation period is not something we can switch on overnight; it will take some time here, and that is why we are saying that it is so incredibly important to start capacity-building now because it is a big task and it is going to take time.

Mr Brearley: This was a surprise for me when we embarked on the Review, because one of the biggest questions I had when we started was: how are we going to understand what we are delivering here. Graham can give you the detail, but the surprise for me was, with the combination of satellite technology and with capacity on the ground, actually we feel we can be approaching measurements as accurate as we are in other sectors. If you look at what we do in Europe and our assessment of our own accuracy, then we are not that far off in forestry and we do not expect to be.

Mr Eliasch: If you have the science right from the start the actual measuring and monitoring is very easy because you see it—it is right there in front of you from above and you can see progress.

Mr Floater: This has been a concern, and understandably so. As I mentioned before, the IPCC guidelines are not that simple because you have to understand the type of forest you are working with, the amount of carbon stored and the land use change as well. Over recent years there has been a significant advance in techniques in order to quantify the carbon stored and the emissions that would be produced under different land use changes. Chapter 10 of the Review goes into some detail looking at the evidence, which concludes that the confidence for the estimates of emissions in the forest sector can be around about the same as other sectors. As Johan says, that requires capacity-building on the ground

on a country by country basis, and that is why it is very urgent that we get this capacity-building up and running.

Q27 Joan Walley: As well as having to do that capacity-building there is also going to be a cost to that as well, is there not, which is going to presumably be offset against whatever the cost for setting up the whole market process is?
Mr Eliasch: Yes, obviously, but if you look in the big context here the capacity-building is small.
Mr Floater: We estimated it would be about $50 million for a sample of 25 forest nations to set up national forest inventories, with a further $7–17 million needed for annual running costs. That is relatively small compared to the $4 billion we were talking about overall.

Q28 Joan Walley: Let me just try and understand this a little bit more. Let us assume then that the UK is buying emission credits from the countries that themselves have not got binding carbon targets, and in those countries the overall emissions are actually growing. How can we justify our Government treating those credits, which are actually growing in another country because there are not binding targets, from actually reducing our net emissions? Is there not a contradiction somewhere at the heart of that? It is okay for us, but it is going to offset that growing elsewhere.
Mr Eliasch: The starting proposition here is that everybody is part of an agreement—whatever the trade performance, that is number one. Number two, with forestry in particular this is a big opportunity to actually address developing nations' poverty, or need to reduce poverty, which goes hand in hand with forests—there is close linkage. That is the second part of this. The third part is that to effectively get the funding to these countries, and also for developed nations to fulfil their targets they are going to have to buy in carbon credits from other countries. Lastly, if you have a global scorecard for how this is going, where it is measured or just like we are here today, we are being audited, then this is something that can work.
Mr Floater: Your specific question was, if emissions are increasing then why should we be buying credits? What we set out here is that you set a national baseline and it is important to be at the national level, and it is the reduction below that baseline that has to be measured and verified that results in the credits. You are only buying additional reductions in forest emissions.

Q29 Joan Walley: Can I just clarify then that all of the arguments you are laying out in your report are dependant upon a new starting point, presumably through what is going on in Poznan at the moment and then in the future to Kyoto?
Mr Floater: Yes.
Mr Brearley: Just to look at that wider framework, essentially if you look at what we would hope for in the Review from Kyoto, it is basically a process by which countries make some form of commitment in exchange for some kind of funding mechanism. We focussed here on forestry and what we say is that the commitment that needs to be made, not a binding cap but a commitment, is to come in under your national baseline, under national business as usual emissions. Essentially that is what you get funding exchange for. Essentially if you can get into that framework—which is not about a cap and trade mechanism, the full cap or national cap for developing countries but does allow us to begin to pay for things which are additional—then I think you are in the right sort of space. Again, I would just point out that this is an issue for forestry, but it is an issue in every other sector as well. It is exactly the same question.

Q30 Joan Walley: How would you stop, for example, a developing country from spending any revenues that were raised through these avoided deforestation schemes; how would you stop a developing company spending the money that they would then get on energy-intensive industrialised investment?
Mr Eliasch: They would have a problem with their targets that they would have to sign up with if they did that.

Q31 Joan Walley: How have you actually considered how you would avoid that happening?
Mr Brearley: I think we would have to look to the wider global agreements to begin to deal with other sectors. That is where you would expect them to be binding. That is where you would expect the international response to that action.

Q32 Joan Walley: Assuming that developing countries agree to such a target in the negotiations, how much scope will there be for trading in forest credits given that they would need to reduce emissions themselves?
Mr Floater: By that, do you mean that there is a difficulty in reducing industrial emissions at the same time?

Q33 Joan Walley: Given that the developing countries will want to be going ahead and reducing their own emissions, what is the effect of buying the credits in going to be on their need to reduce?
Mr Floater: The effect of a source of finance going to developing countries through forest credits will mean that they have more funding to reduce deforestation at a greater rate. It should have no effect on their ability to reduce industrial emissions.

Q34 Jo Swinson: In your report you are quite clear that the measures to halt deforestation and reduce deforestation will be successful only if there is a global step change in the way land is used and commodities are produced. How do you think you would actually be able to take that forward with governments to achieve that step change? What is important to make sure that happens?
Mr Eliasch: First of all, the whole deforestation issue revolves around one thing, and that is: how do you make the standing tree worth more than the cut down tree; and how do you implement that in a

process such that it is acceptable to all the stakeholders? That leads on to the fact that forestry operations need to be sustainable. It needs to be in balance with a country's need for more agricultural lands, whatever the pressures are here for more land. It is taking into account all pressures on land and trying to achieve the right balance with the funding that is required in order, through what we propose here, through various funding mechanisms, to also have an economic balance that justifies not doing things in some areas, and doing the right things in other areas.

Mr Brearley: What we did in the Review was focus on financial incentives, and I think that is fundamental to getting a change in production away from deforestation and to more sustainable practices. I do think there is a lot more work to do, to think about how we change agricultural methods and agricultural practices to become more productive. I do think that is fundamental to the answer and not something that we looked at in perhaps as much detail as we would have liked.

Q35 Jo Swinson: You mentioned the financial incentives, do you think that the financial resources identified through your approach would actually be able to help to fund that change to more sustainable land use, or would money have to be found from some other kind of measures?

Mr Brearley: I think the financial incentives that we set out help that because that changes the economic incentives on access, but it is not enough just to do that. I am not sure whether the answer on how we improve production in less productive land elsewhere is just about funding. It is also about increasing our understanding and use of technology, for example. I do think there is a lot more to be thought about and to be done in that area.

Mr Floater: Also this is not just about sustainable land use; it is not just about more efficient and more sustainable production of agricultural commodities; it is also about more sustainable timber production; it is also about infrastructure policies at a regional and national level, which is why the national level approach is so important; and it is also about conservation of areas that include indigenous peoples and also include wildlife. All of these have to be a part of the solution. In terms of the costs, we commissioned work on the opportunity costs to update those from the Stern Review, to take account of higher commodity prices currently and projected, and found that the estimate was around about $7 billion per year to halve deforestation. We then commissioned two other pieces of work to look at the rents that you would get if you were to fund this with a single carbon price. What that means is that within those rents there is an added amount of funding that could be used to address a shift to more sustainable production.

Q36 Jo Swinson: Do you think it should be up to countries that participate in this scheme to spend the money as they see fit; or do you think that part of the funds that they get through keeping a forest standing should be directed specifically towards a move to more sustainable land use?

Mr Floater: First of all, we have to understand that there is a national sovereignty issue here, and that nations must take a lead in the policies that they have—partly because of the importance of reducing intra-national leakage, so that you address emissions at the national level; partly for additionality reasons; but also in terms of national sovereignty. At Poznan and at Copenhagen it is going to be nation states which are negotiating a deal. There are a number of different ways in which you can distribute finance and, as I say, some of those will need to be targeted at the national and regional levels to shift whole economies out of land use that results in deforestation into, for instance, new technology sectors or other sectors that do not impact so much on the forests.

Q37 Jo Swinson: Finally, you mentioned the move towards increased production and so on is not hugely mentioned in your report. To what extent have the negotiations, at these climate change negotiations, realised that this is not just about avoiding deforestation but is about these other land use issues that go with it?

Mr Floater: There is certainly a good understanding amongst the UK negotiators whom I have talked with. In terms of more generally I could not say, but I think there needs to be a realisation that these elements have to be taken into consideration, and I hope they will be.

Q38 Chairman: Unfortunately, we are running out of time. There are various other issues we might have covered because your report does raise a lot of very interesting matters, but I think we are going to have to wind up here. Thank you very much for coming in this morning, it is much appreciated. We will be working on the subject now for a few weeks and I hope we will come up with something worthwhile ourselves in due course.

Mr Eliasch: Thank you very much.

Memorandum submitted by Greenpeace UK

SUMMARY

Tropical forest destruction is responsible for about one fifth of global greenhouse gas emissions. Protecting tropical forests is vital to helping tackle climate change, preserving biodiversity and protecting the livelihoods of millions of forest dependent peoples. Negotiations taking place during 2009 in the run up to Copenhagen will decide how successful efforts are in reducing emissions from deforestation and degradation. Currently there a number of approaches on the table, which could play a positive or negative

role, largely depending on which approach is chosen. The main risk associated with the approach of governments who favour a fully tradable market offsets approach for forests is that it allows developed countries to reduce their emissions by offsetting them in developing countries, effectively buying their way out of reducing emissions at home. Carbon markets must remain stable if they are to be effective in driving emissions' reductions. If cheap forest credits were directly traded with other carbon units, there is a real risk they could "flood" or otherwise destabilize the markets. This could bring down the price of carbon, reducing incentives to invest in clean and renewable energy technologies.

Greenpeace believes that any financing mechanism that is developed must:

— provide sufficient annual funding to tackle tropical deforestation and make money available immediately;

— ensure that providing funding for reducing deforestation is in addition to industrialized nations taking action to reduce their own emissions;

— include all countries with tropical forests, protect biodiversity values and the rights and livelihoods of indigenous peoples, as well as maintaining carbon values;

— protect against leakage via national-level reductions in deforestation;

— not directly include forest offset credits in the carbon markets; and

— not support the replacement of natural forests with plantations and not subsidize the expansion of industrial logging, agri-business and other destructive practices into intact forests.

1. *The role financial mechanisms might have in helping to address emissions from land use change*

1.1 Tropical forest destruction is responsible for about one fifth of global greenhouse gas emissions. Protecting these forests is vital to help tackle climate change, preserve global biodiversity and protect the livelihoods of millions of forest peoples.

1.2 Following on from reports such as the Economic Impacts of Climate Change by Sir Nicholas Stern, there is now an emerging consensus that that future policy to tackle this issue must include measures that seek to stop tropical deforestation. This is true both for places under immediate threat like the Brazilian Amazon and Indonesia, and in areas where deforestation is currently low like the Congo.

1.3 Protecting biodiversity has always been an objective of the UNFCCC. And now, tackling climate change through deforestation is on agenda for the upcoming meetings in Poznan in December 08 and in Copenhagen in December 09. Negotiations taking place during 2009 will decide how successful these efforts are in reducing emissions from deforestation and degradation (REDD). Currently there a number of approaches on the table, which could play a positive or negative role, largely depending on which approach is chosen.

1.4 A number of proposals, including that of the Coalition of Rainforest Nations (CfRN), led by Papua New Guinea (PNG), are pushing for a scheme which would include forest offset credits in the carbon markets. Meanwhile there are other approaches, such as that taken by Brazil, who would prefer a "fund based approach". Due to the problems and limitations with these approaches, Greenpeace believes that a hybrid approach, which includes elements of both these options but also protects against the limitations of the carbon markets, is the only way to achieve real emissions reductions and to find the necessary funds to deliver significant emissions reductions.

1.5 Greenpeace believes that any financing mechanism that is developed must:

— Provide sufficient annual funding to tackle tropical deforestation and make money available immediately.

— Ensure that providing funding for reducing deforestation is in addition to industrialized nations taking action to reduce their own emissions.

— Include all countries with tropical forests.

— Protect biodiversity values and the rights and livelihoods of indigenous peoples, as well as maintaining carbon values.

— Protect against leakage via national-level reductions in deforestation.

— Not directly include forest offset credits in the carbon markets.

— Not support the replacement of natural forests with plantations and not subsidize the expansion of industrial logging, agri-business and other destructive practices into intact forests.

1.6 Please see attached proposal "Forests for Climate" for more detail.

2. *The environmental and social risks and benefits of using such financial mechanisms*

2.1 To prevent dangerous climate change, we need a global effort to end forest destruction, as well as a revolution in the way we produce and use energy.

2.2 The main risks associated with the approach of governments who favour a fully tradable market offsets approach for forests (as per the CFRN) are that it allows developed countries to reduce their emissions by offsetting them in developing countries. NGOs have been very critical of mechanisms that have taken this approach in the past, like the Clean Development Mechanism, because it enables developed countries to buy "certified emissions reductions units" (tradable carbon credits) in return for financing carbon reduction projects in developing countries, effectively buying their way out of reducing emissions at home.

2.3 Moreover, forests are more than carbon. Any financing mechanism must distinguish between ancient forests that have stood for thousands of years and industrialized tree plantations planted twenty years ago. Linked to this is the fact that biodiversity and the rights of indigenous and forest dwelling people must be valued. It would be perverse to support a system to protect the earth's climate that did not protect its biodiversity or respect the rights of its inhabitants.

2.4 These risks can be avoided if an approach similar to that set out in Greenpeace's "Forests for Climate" proposal is adopted.

3. *The use of land use change credits in carbon markets and in meeting emission targets*

3.1 Greenpeace believes that a mechanism for reducing emissions from deforestation and degradation could play a role in meeting emissions' targets as part of a Kyoto + agreement by helping providing an immediate and reliable stream of funding for tropical forest protection. However, we do have serious concerns about the role of land use credits in the global carbon markets.

3.2 Firstly, as stated above, we believe that any mechanism must not allow companies in developed countries to simply offset their emissions in developing ones. Secondly, land use credits must not be directly traded within international and European carbon markets. Carbon markets must remain stable if they are to be effective in driving emissions' reductions. If cheap forest credits were directly traded with other carbon units, there is a real risk they could "flood" or otherwise destabilize the markets. This could bring down the price of carbon, reducing incentives to invest in clean and renewable energy technologies. For example, recent studies have shown that allowing forest credits into the European Trading Scheme (ETS) could crash the price of carbon by almost 50%.[1]

3.3 Greenpeace rejects the idea of directly including forest offset credits in the ETS and other carbon markets. This is due to concerns set out above about equating fossil carbon emissions (industry) with biological carbon emissions (forest destruction), because it allows developed countries to offset their carbon emissions instead of reducing them. A high carbon price is needed on the international market to ensure that developed countries both take real action to tackle emissions at home and provide sufficient funds for tropical forest protection. This could be achieved by developed countries buying newly created forest emissions reductions units at auction or by setting a price linked to the world market price for carbon.

The actual amount of tropical forest credits will be derived from the emissions' reduction targets of Annex 1 countries in the post 2012 agreement.

3.4 Developing countries with tropical forests would make commitments to protect their forests in exchange for the opportunity to receive these funds, which would be aimed at capacity-building efforts and national-level reductions in deforestation emissions.

3.5 It should be noted that funding alone is not sufficient to address deforestation. Many forest rich countries have insufficient capacities and inadequate governance systems to protect their forest and improve the livelihoods of local communities and people and these issues must also be addressed.

4. *The World Bank's Forest Carbon Partnership Facility*

4.1 The World Bank has dedicated US $300 million to this facility including for capacity building in 20–30 countries to assess national carbon stocks and for "compensating" emissions' reductions in five tropical forest countries. It is currently piloting a series of different policy approaches to meet these objectives.

4.2 Whilst Greenpeace welcomes the World Bank's recognition of the need for significant funding for forest protection, we are concerned about their preference for market based approaches and their refusal to oppose the granting of funds to the logging industry and agribusiness, which could potentially open up intact ancient forest areas to new destructive practices whilst claiming to preserve forests.

[1] Reducing deforestation and trading emissions : Economic implications for the post-Kyoto Carbon Market', N.Anger and J.Sathaye, (2008)

4.3 Greenpeace is also concerned about the Bank's previous track record, in failing to consult with or respect the rights of indigenous communities. Any REDD initiative must ensure the participation of and core benefits for indigenous peoples and other forests dwellers. Without this approach, there is a high risk that, especially in countries with weak governance, the main beneficiaries of REDD mechanisms will be central governments, foreign consultants and large conservation organisations.

4.4 An example of these problems is the Readiness Plan Information Note (R-PIN) from the Democratic Republic of Congo (DRC), which has been submitted to the FCPF in order to gain funds. It is based on poorly conducted research and written by outside consultants who have a commercial interest in participating in future REDD programs in the DRC. There has been no input from Congolese civil society, it contains no data about pygmies in the area concerned, and contains no meaningful demographic data. It also oversimplifies the causes of deforestation in the Congo by blaming small scale farmers and forest dwellers for deforestation whilst pointing to the industrial logging sector as a solution to the problem. An official review by the Technical Advisory Panel (TAP) has questioned the credibility and country ownership of this proposal, since large parts of it are exactly "identical with that of another Central African country."[2] Despite this, it is expected that the FCPF will approve this proposal.

4.5 Finally, it is not clear how essential forest values such as biodiversity, watershed protection and other forest services are taken into account within the FCPF.

5. *The role of technologies such as remote sensing in the verification of land use change credits*

5.1 Forest cover and loss can be measured with some success by technology, for example, Global Positioning System (GPS). However, cloud cover is a challenge in the tropics and measuring degradation (rather than forest destruction) is very difficult.

6. *The success or otherwise of Government efforts in reducing emissions from international land use change*

6.1 The Stern Review, commissioned by the UK Government, has been instrumental in gaining international recognition of deforestation's contribution to climate change and the need to act to protect forests, particularly as part of the international climate regime. The Government, via DfID, has provided £50 million to go directly to projects that protect forests in the Congo Basin (we set out some concerns around this in question 7, below) in recognition of the importance of protecting tropical forests. Having said this, we believe that the UK Government could take much more of a leadership role in pushing forest protection in international meetings and believe that support for a solely markets based solution undermines their credibility on this issue.

6.2 On 15 October Johan Eliasch, the Government's advisor on forest and climate, is expected to announce his recommendations on the role the UK Government should play on this issue. It is expected that it will take a pro carbon markets approach. Please see questions 2 and 3 for our concerns about what this would mean and question 1 for the elements Greenpeace believe need to be included in any such financial mechanism moving forward to avoid these and other concerns.

6.3 In addition we have been disappointed with the position of the UK Government in relation to protection of key tropical forest areas:

CONGO

6.4 The DRC has the largest intact forest areas remaining, but risks losing more than 40% of its forest by 2050 due to industrial logging.[3] This would release roughly the equivalent amount of CO2 as the UK's CO2 emissions over the last 60 years[4]. Despite a moratorium on the granting of new logging concessions in the DRC and the UK Government previously publicly supporting its extension until land-use planning was in place (attached document), their position has recently weakened. At a time when international pressure is critical to protect this rainforest, such a move is unhelpful in the extreme. Greenpeace is calling on the Government to back the recent call of the DRC's Environment Minister Eundundu to continue this moratorium for another three years. This statement needs to be confirmed by the DRC's President to become law.

[2] http://carbonfinance.org/Router.cfm?Page=FCPF&FID=34267&ItemID=34267&ft=DocLib&ht=42503&dtype=42506&dl=0
[3] Carving Up the Congo, Greenpeace p. 1
[4] Carving Up the Congo, Greenpeace p. 1
[5] Cooking the Climate, Greenpeace p.1

INDONESIA

6.6 Every year, 4% of global greenhouse gas emissions are released by the logging and burning of Indonesia's peatland rainforests.[6] The main driver for this destruction is palm oil. Following a campaign launch in April, Greenpeace released a report "How Unilever's suppliers are Burning up Borneo" showing how Unilever, the world's biggest users of palm oil, is sourcing this commodity from companies who are clearing rainforest and peatlands, critical carbon stores for the global climate and crucial for the survival of forest dependant people and endangered species. (See attached report). Since then, Unilever has taken the bold move of calling for an immediate moratorium on the expansion of palm oil into rainforests and peatlands in South East Asia. Greenpeace and Unilever are now working together to build a coalition of palm oil users, growers, traders and processors and investors that support the moratorium.

6.7 In June, Greenpeace wrote to the UK Government asking them to publicly support the moratorium and encourage the Indonesian Government to follow suit and to prioritize peatland protection in the fight against climate change. In a letter to Greenpeace dated 21 July (see attached document 7), they avoid taking any responsibility for this issue stating that the "EU's market share [of palm oil] is reportedly just 17%" and say that "the Round Table on Sustainable Palm Oil (RSPO) will deliver the necessary change." They state this despite the fact that even Unilever, the chair of the RSPO, acknowledges that in its current form the RSPO is not stopping deforestation in Indonesia. Key members of the RSPO are engaged in ongoing destruction of rainforest and peatland areas.

7. *The Congo Basin Forest Fund*

7.1 Greenpeace welcomes the UK Government's commitment to provide £50 million in funding to protect the Congo Basin forests. However, there is neither an explicit strategy or detailed criteria to show the type of projects this fund will support. Greenpeace believes it important that this money goes to projects that improve capacity and governance, support local communities and those that protect the most important areas of rainforest from a carbon and biodiversity perspective.

8. *The interaction of carbon finance mechanisms with the timber trade*

8.1 If carbon finance mechanisms are to be effective in reducing emissions from deforestation, they must not support the replacement of natural forests with plantations and must not subsidize the expansion of industrial logging, agri-business and other destructive practices into intact forest areas.

8.2 The UN definition of forests includes plantations. Accepting this definition in RED negotiations could allow the replacement of forests with plantations in the name of storing carbon. The potential for such perverse incentives demands that biodiversity be addressed in addition to carbon.

8.3 Support for industrial logging and other destructive practices in intact forests starts the cycle of deforestation and loss of carbon values and needs to be excluded from RED agreements.

9. *Government progress on tackling illegal timber since the EAC 2006 Report on sustainable timber*

See answers to questions 10 and 11.

10. *Government sustainable procurement of forest products*

10.1 Since the introduction of the original policy in 2001, Greenpeace has on numerous occasions exposed the Government for its failure to live up to its own standards (Cabinet Office—2002, Home Office—2003, Admiralty Arch—2006). Whilst the Government has taken some steps to improve its sourcing, such as the establishment of the Central Point of Expertise on Timber (CPET), the development of weak guidelines combined with a lack of monitoring and enforcement means that illegal timber and unsustainable timber almost certainly continues to find its way onto Government construction sites.

10.2 The UK Government should improve the implementation of its policy to procure only legal and sustainable timber. Recommendations include:

— Appointing a person on each project to track and monitor the timber coming on site. This means checking each timber consignment coming onto site. The new FSC project certification system provides a good mechanism for how this could be practically achieved.

— Financial penalties should be included in all contracts for when there are failures to implement the Government's procurement policy and should be sufficient enough to act as a deterrent.

[6] Cooking the Climate, Greenpeace p.1

— A practical system of spot checking on government construction sites should be introduced to ensure compliance on government building sites.

— Targets should be set year on year for improving the government's procurement record and monitoring by Government departments and a way of publicly reporting on progress should be introduced.

— Social criteria should be included in the assessment of sustainable forest management.

11. *The success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan, and Government support for it*

11.1 In October 2005, the European Commission adopted a package of voluntary measures to address the illegal timber trade, focusing on voluntary partnership agreements (VPAs) between the EU and timber producing countries. Currently the EU is negotiating such VPAs with several countries including Cameroon, Ghana, Congo, Indonesia and Malaysia. Whilst voluntary agreements can be a useful instrument to help countries with valuable forest resources to manage them better, they are not sufficient on their own. This is because:

— they will not address trade through third party countries, such as China, where laundering of illegal and destructively logging timber is rampant;

— they do not cover all timber producing countries; and

— if negotiated with producer governments where corruption and weak governance are common and without meaningful civil society participation, VPAs may legitimise destructive practises.

11.2 Urgent legislation at an EU level is needed. The EU Commission is due to vote on a legislative proposal to tackle illegal logging on 15 October. Greenpeace is urging that the legislation should place onus on companies involved in the timber trade to prove that they only deal in wood from legal sources. Penalties should be imposed on those who do not comply with the law. We are also seeking a standardised system that can be used to check products in order to verify that they use legal wood. At present, the indications are that the UK Government will support this call for legislation and Greenpeace will continue to urge the UK Government to support the strongest possible legislation containing all the elements set out above.

October 2008

Memorandum submitted by Friends of the Earth

1. Friends of the Earth & Forests: Friends of the Earth England Wales and Northern Ireland has identified climate change and the loss of biodiversity as the two greatest environmental threats we face, standing out in scope, urgency and because of the amount of people they affect. Forest protection represents a major part of our work to address both these environmental threats; since deforestation, especially in developing countries, destroys vital biodiversity and is responsible for massive emissions of greenhouse gases—roughly 18% of emissions worldwide.

2. Friends of the Earth is part of an international federation of 70 national member groups across the globe. Friends of the Earth member groups work with local communities to preserve forests and uphold community and indigenous rights to manage forest resources and secure sustainable livelihoods. Members identify and implement both traditional and innovative practices to restore and protect native species, secure access for communities and monitor protected areas. Members develop and support alternative income generation projects, such as the small-scale trade in non-timber forest products, that ensure sustainable livelihoods that do not endanger biodiversity.

Introduction

3. We believe that the most effective way we can address deforestation, to prevent dangerous climate change, conserve biodiversity and safeguard the sustainable use of forests by local communities and indigenous peoples, is through political change. There are three interlinked aspects to this.

4. Firstly, we need to secure a global agreement that addresses forest and climate objectives in a coherent manner. Any agreement within the UN Framework Convention on Climate Change should have the explicit support of; the UN Convention on Biodiversity (CBD) Expanded Program of Work on Forest Biodiversity; be fully in line with the UN Declaration on the Rights of Indigenous Peoples (UNDRIP); and be integrated with international and national implementation policies under these instruments.

[7] Geist H and Lambin E, 2002. "Proximate causes and underlying driving forces of tropical deforestation" BioScience Vo. 52(ii) pp 143–150

5. Secondly, we need policy changes to reduce the economic pressure to clear forests and especially the demand for agricultural products such as timber, pulp, palm oil and soy. Studies of the causes of deforestation have identified land clearance for agriculture as a factor in over 90% of cases[8]. Global assessments suggest that the demand for agricultural land could lead to the clearance by 2030 of an area of land equivalent to all the farmland in Canada, the United States and Mexico combined[9].

6. Thirdly, we need improvements to forest governance in developing countries, especially to protect and enhance the rights of communities who depend on the forest and to help these communities to use their rights to protect it.

The Role Financial Mechanisms might have in Helping to Address Emissions from Land Use Change

7. Financial mechanisms to address emissions from land use change are often assumed to be synonymous with carbon markets, but this is not the case. It is, in fact, a contentious point within the current UNFCCC post-2012 debate, with significant variations in positions between the principle countries engaged in REDD negotiations within the UNFCCC.

8. The issue of whether or not REDD should be linked to carbon markets needs to be given extremely careful consideration. There are a range of potential ethical concerns and practical problems linked directly to the use of carbon markets as a source of REDD finance.

9. The question of how much REDD might cost is a contentious issue itself with specific policy implications. Sums in the tens of billions of dollars are regularly referred to, creating an incentive for most governments to speed ahead with REDD negotiations without paying sufficient attention to whether REDD will really work; and what unexpected impacts it might have.

10. Commonly quoted figures in this region need to be treated with great caution (not least because there are very significant methodological difficulties in estimating the costs of climate change mitigation[10]. Research based on the market price of exported commodities such as soy, palm oil or timber, for example, yield high figures, but these are not necessarily representative of the real lost income streams to national governments or local communities, in terms of concessions, tax and export tariff revenues, jobs and value-added industries.

11. The type of methodology giving very high cost estimates imply that companies currently engaged in deforestation activities and associated export commodities would be compensated for lost profits. Whether or not this "full cost" approach is used is critical, since the scale of income required for REDD is often used to justify the use of carbon markets (on the basis that no other funding source can generate finance on this scale). [See Appendix 1 for examples of high cost estimate methodology]

12. It is clearly difficult to accurately pinpoint the real levels of funding required to stop emissions from deforestation in developing countries, but it is likely that true "costs" may not be nearly as expensive as some commentators have argued. This may have implications for final decisions about the source and mechanisms of REDD finance.

13. Countries that propose linking REDD into carbon markets have done so for a number of reasons, including, variously:

14. the fact that industrialised countries have frequently reneged on previous commitments to provide voluntary financial assistance to developing countries;

15. a belief that carbon markets are the best and most cost-effective option given the scale of financing being considered[11];

16. as a way for developing countries to participate in climate change mitigation; and

17. a desire to link funding directly to emissions reductions in Annex 1 countries because of "moral synergies"[12].

18. Apart from the fact that there is a real question about the scale of funding actually required, the first argument is entirely valid. Funds raised to date for existing UNFCCC and Kyoto Protocol financing mechanisms, for example, are miniscule compared with the figures being discussed in relation to REDD; and Northern governments have reneged on many similar financial commitments in the past.

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[8] Geist H and Lambin E, 2002. "Proximate causes and underlying driving forces of tropical deforestation" BioScience Vo. 52(ii) pp 143–150

[9] L. Braat & P. ten Brink et al, 2008. "The Cost of Policy Inaction: The case of not meeting the 2010 biodiversity target" Alterra, Wageningen UR, Brussels Final Report, Executive Summary p. 4 http://ec.europa.eu/environment/nature/biodiversity/economics/index_en.htm

[10] Trines (2007). Investment flows and finance schemes in the forestry sector, with particular references to developing countries/needs, a report for the Secretariat of the UNFCCC, Final Report, corrected version, 24 July 2007, Eveline Trines. http://unfccc.int/files/cooperation_and_support/financial_mechanism/application/pdf/trines.pdf

[11] Regulatory markets generated US$5.3 billion in 2006. Voluntary carbon markets are smaller at present, although growing rapidly. They generated US$92 million in 2006. Both are expected to grow significantly) (EcoSecurities, 2007)

[12] Myers (2007). Policies to Reduce Emissions from Deforestation and Degradation (REDD) in Tropical Forests, an examination of the issues facing the incorporation of REDD into market-based climate policies, Erin C Myers, December 2007, http://ideas.repec.org/p/rff/dpaper/dp-07-50.html

19. However, most of these arguments can be countered by the fact that there are other potential sources of funding under consideration in the UNFCCC that do not rely on voluntary contributions from the North or carbon markets, such as the establishment of a fund under the authority of the UNFCCC through global carbon taxes and/or contributions of industrialised countries based on a proportion of GDP. These seem to offer some very practical alternatives without many risks specific to carbon markets.

The Environmental and Social Risks and Benefits of Using such Financial Mechanisms

20. Whether REDD benefits local communities and successfully protects biodiversity, and the extent to which REDD activities are able to conserve carbon (especially without contributing to project-level leakage) remains to be seen. There is at least a theoretical possibility that communities could benefit from REDD, and some clearly hope to do so.

21. But experiences to date, with increasing commodity prices (especially for agrofuels, such as palm oil or soya), Clean Development Mechanism (CDM) and voluntary carbon offsets, and payments for environmental services (PES) schemes, indicate that this optimistic outcome is hardly justified, especially for already marginalised communities living in the forests. Land prices are increasing, and some people are being pushed off their existing territories, often from farmland to the forest frontier, which is worsening the deforestation crisis.

22. In the case of REDD there is also extreme uncertainty over who would receive REDD funds. If REDD had national coverage in participating countries, then it would be governments that stand to significantly increase their income, as compared with current tax revenue streams (and they thus have a vested interest in pursuing this option); but this could be at the expense of Indigenous Peoples and local communities currently benefiting from forests and often existing at the whim of the state for recognition of land rights. Furthermore, there is no guarantee that those funds would be used for the development of fair and sustainable societies.

23. On the other hand, a project-based REDD could increase the chance of funds being directed towards communities, but only if they are able to compete or negotiate with large and often predatory commercial investors and carbon traders. This is complicated by difficulties relating to official languages used and technical complexity. Furthermore, if it is communities and/or companies that benefit or are entitled to the funds, this could lead to increasing tension and violence between communities, especially for those communities without formal land rights.

REDD, land values and impacts on Indigenous Peoples

24. Either way REDD could clearly trigger a rapid expansion in lands set aside for avoided deforestation, without regard for the customary and territorial rights of Indigenous Peoples, as governments seek to protect an increasingly valuable resource from "outside" interference, violently or otherwise.

25. Some 1.6 billion people rely on forests, including 60 million Indigenous Peoples, who are entirely dependent upon forests for their livelihoods, food, medicines and/or building materials (FAO, 2008). These people have already been severely impacted by both deforestation, largely to grow crops and agrofuels for export, and by CDM reforestation and afforestation projects. Often having no formal land title, many have been forcibly and even violently ejected from their ancestral territories. If the value of standing forests increases (regardless of the reason why) they may increasingly face governments and companies willing to go to extreme lengths to wrest their forests away from them.

26. Furthermore, commodifying forest carbon is inherently inequitable, since it may discriminate against people, and especially women, who previously had free access to the forest resources they needed to raise and care for their families, but cannot afford to buy forest or alternative products[13].

Loss of national sovereignty over natural resources

27. If REDD is financed through carbon markets, this could determine the way in which funds can be used at the national and local levels, and could effectively remove developing countries' sovereignty over their own natural resources. This is one of the reasons underlying Brazil's opposition to the use of carbon markets to fund REDD and is the reason why it has proposed an alternative funding mechanism.

[13] GFC (2008). Life as Commerce: the impact of market-based conservation mechanisms on women. Simone Lovera, for Global Forest Coalition, 2008, www.globalforestcoalition.org/img/userpics/File/Impacts-marketbasedconservationmechanisms-on-woman.pdf

Ex-post payments and liability contracts

28. Carbon finance is also likely to disadvantage small players, since most payments will either be "ex-post payments" (paid after the delivery of credits, because of the uncertainty associated with REDD), or will have stringent risk assessments and contractual liability arrangements attached to them[14]. Both scenarios would be particularly onerous for smaller projects.

REDD and market volatility

29. Markets are notoriously volatile, and opportunity costs/compensation could easily vary wildly from one day to the next. Any sudden increase in timber prices (as timber supplies fall, for example) could greatly reduce the area of forest that could be protected, if it suddenly becomes more profitable to harvest the timber than maintain an avoided deforestation agreement with a given level of funding. This is in complete contrast to the predictable and stable funding that the Coalition for Rainforest Countries is requesting.

REDD credits could flood existing carbon markets

30. One key concern, that even those in favour of carbon markets are worried about, is whether cheap and plentiful REDD credits could flood carbon markets, causing the price of carbon to crash. This would damage other climate change mitigation efforts that are dependent upon the price of carbon.

High likelihood of leakage

31. An enduring concern in relation to REDD is whether it can address "leakage" concerns. A project-level approach, for example, could mean that deforestation activities simply shift to another area in the same country (depending on the specific drivers in question). Similarly, there are also concerns about whether the use of "protected areas [will] reduce deforestation overall or merely displace the pressure elsewhere"[15].

32. Kevin Conrad of the Rainforest Coalition, and many others thus argue that REDD should be nationally-based[16]. However, even a national level approach could see deforesting activities shifting to countries that are not participating in REDD (and this is, of course, even more of a concern during any stage when REDD activities are being piloted in a restricted number of countries).

33. One obvious solution to this predicament is to involve as many countries as possible in a REDD agreement. Even so, a question would still remain about possible leakage from tropical forests to boreal and temperate forests, should REDD focus on developing countries only. Ultimately, of course, the only solution is to remove the underlying drivers of deforestation.

34. Any agreement on forests must also recognize that "leakage" encompasses more than just displacement of carbon emissions. The social and environmental problems associated with deforestation will inevitably shift if the underlying causes of deforestation are not addressed.

Forests are not permanent

35. There are obvious risks associated with the fact that forests, or at least trees, are impermanent by nature, and forests fires and die-back (whether natural or caused by climate change) could impede reductions in deforestation rates. From an investor's points of view this is a significant challenge to guaranteed profit-generation and the reason why ex-post payments are likely to be preferred.

36. In other systems, this is resolved by the use of short-term and long-term temporary credits (tCERs and lCERs respectively), which have to be renewed at the end of a given period, or if forest stocks disappear for any reason. Thus the liability for the project rests with the purchaser (although purchasers can also insure against credits expiring unexpectedly). However, temporary credits generate less income, so the sellers may prefer to shoulder liability themselves and sell more expensive permanent credits. One way round this is to save a certain proportion of all credits to be banked in trust or reserve accounts against future losses (and this has been proposed by members of the Coalition for Rainforest Nations)[17].

[14] Ecosecurities (2007). Policy Brief: REDD Policy Scenarios and Carbon Markets (p4, Supply-side scenarios of future REDD markets), EcoSecurities Briefing, December 2007, Oxford, UK. www.ecosecurities.com/Assets/10043/pubs%20-%20redd%20policy%20brief%20ecosecurities%20(background%20version)_je%20v1.pdf

[15] UNEP-WCMC (2007). Protecting the future: carbon, forests, protected areas and local livelihoods. Extended abstract. Prepared by Lauren Coad, Alison Campbell, Sarah Clark, Katharine Bolt, Dilys Roe and Lera Miles for UNEP-WCMC, December 2007, www.unep-wcmc.org/climate/pdf/Coad%20et%20al%202007%20Bali%20summary.pdf

[16] Asia Cleantech (2008). Avoided deforestation credits head for the voluntary carbon markets. 7 January 2008 by Ron Mahabir http://asiacleantech.wordpress.com/2008/01/07/avoided-deforestation-credits-head-for-the-voluntary-carbon-markets/

[17] SBSTA (2008). Views on outstanding methodological issues related to policy approaches and positive incentives to reduce emissions from deforestation and forest degradation in developing countries, FCCC/SBSTA/2008/Mics.4/Add.1, 21 May 2008, http://unfccc.int/resource/docs/2008/sbsta/eng/misc04a01.pdf

37. A key point here is that these problems really only apply to systems funded through carbon markets or other similar processes in which levels of positive incentives are determined by carbon stock levels or deforestation reduction rates.

Plantations are not forests!

38. As long as plantations are included within the FAO's definition of forests[18] there is a very real risk that REDD will be used to fund the expansion of plantations, even though it is now recognised that plantations store only 20% of the carbon that untouched old growth forests do[19].

Can REDD work in the absence of clear land tenure?

39. REDD refocuses attention on a key moral dilemma—who, if anyone, do forests belong to? And who has the rights to sell forest credits? It is certainly clear that in the absence of secure land rights, Indigenous Peoples and other forest-dependent communities have no guarantees that they will receive any form of REDD "incentive" or reward for forest conservation. There are also territorial disputes and claims in many of the countries eligible to participate in REDD; REDD could inflame these debates and/or lead to increased state or corporate control over forests. There is some evidence to suggest that the redistribution of land in land reform programmes is already being impeded by increasing land and commodity prices[20].

40. However, it seems that, from a carbon finance point of view, investors are more likely to favour low-risk projects or countries, where land tenure is not a contentious issue. Some might argue that this is, in theory at least, one area where carbon finance might have a positive benefit, encouraging the resolution of land tenure issues. However, there still remains a very strong possibility that such "resolution" would actually deny the rights of local communities and Indigenous Peoples (and there are anecdotal reports of such developments emerging already).

The use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

41. Critically, establishing a new mechanism to further institutionalise international carbon offsetting is likely to discourage industrial emissions reductions, making it less likely to avoid dangerous climate change. Furthermore, because of complex methodological problems, linking REDD to carbon markets could even mean that credits are purchased from REDD projects that do not successfully deliver on their deforestation goals, meaning that the Northern emissions may not actually be offset. This would lead to unacceptable risks of passing critical climate tipping points. At best, a market REDD mechanism will create the opportunity for offsetting necessary reductions of industrial emissions, and at worst, enable an increase in global emissions, as has been already observed through projects credited through the UN Clean Development Mechanism—the only other UN-mandated North-South carbon trading instrument.

42. It is becoming increasingly clear that steep reductions in emissions from both industrial and forest sources are urgently required—not either, but both. Latest emission scenarios from the Tyndall Centre for Climate Change Research illustrates this imperative, using the latest available scientific data combined with international-standard scenario modeling (please see the attached report). This research clearly suggests that any failure to achieve at least 40% industrial emissions reductions by 2020 in industrialised countries, as well as achieving an urgent halt to deforestation globally, will almost certainly result in dangerous and possibly catastrophic climate change. It is totally without scientific credibility for industrialised countries to even consider off-setting their own emissions reductions, unless domestic-only emissions targets at least 40% by 2020 are achieved. Funding for international efforts to halt deforestation are urgently needed, however this must be additional to domestic reductions in the order of 40% by 2020, and not in place of them.

The World Bank's Forest Carbon Partnership Fund

43. The World Bank's Forest Carbon Partnership Facility has been hastily established and has been beset with controversy. Concerns relate to the design process failing to adequately involve potentially affected local communities [see Appendix 2]; conflicts in the bank's portfolio by increasing its lending to fossil fuel projects throughout 2007[21] while simultaneously venturing into climate mitigation financing; and through institutionalising a global mechanism to reduce emissions from deforestation in advance of UNFCCC negotiations, thereby undermining efforts underway in the UNFCCC.

[18] FAO (2008). Forests and poverty reduction, website as at 10 July 2008 www.fao.org/forestry/site/livelihoods/en/

[19] Palin et al. (1999). Carbon Sequestration and trace gas emissions in slash-and-burn and alternative land uses in the humid tropics, Palin et al., ASB Climate Change Working Group, CGIAR, Final Report, Phase II, www.asb.cgiar.org/pdfwebdocs/Climate%20Change%20WG%20reports/Climate%20Change%20WG%20report.pdf

[20] GFC (2008b), Forests and the Biodiversity Convention: Independent Monitoring of the Implementation of the Expanded Programme of Work, Summary, May 2008, www.globalforestcoalition.org/img/userpics/File/IndependentMonitoring/ForestandtheBiodiversityConventionSummary.pdf

[21] Redman, J. (2008). Dirty is the New Clean, Sustainable Energy and Economy Network, http://www.ips-dc.org/reports/#780

The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

44. Monitoring and verification of deforestation are difficult, although officials claim that technologies have improved sufficiently to proceed with REDD. There is also some discussion about whether methodologies should be based on those already developed in the Good Practices Guidance (GPG) for Land Use, Land Use Change, and Forestry (LULUCF)[22]; and the Revised 1996 Intergovernmental Panel on Climate Change (IPCC) Guidelines for National Greenhouse Gas Inventories, which are used by Annex I countries.

45. However, even if methodologies are deemed sufficient, cost could still be a stumbling block, because of:

46. the cost and availability of satellite imaging;

47. the cost of "ground truthing", which is particularly important if degradation is to be included (still a contested point, for precisely this reason); and

48. the fact that the cost of installing monitoring and verification systems are up-front costs, whereas income through carbon financing is likely to be ex post.

49. Many methodological problems are not simply technical issues but have significant implications for policy making.

50. Monitoring and verifying the carbon content and emissions reductions of forests is particularly complex and expensive. Policies to stop deforestation, as opposed to trading in emissions reductions, do not necessarily require such a complex and expensive monitoring and verification system.

The success or otherwise of Government efforts in reducing emissions from international land use change.

51. UK emissions resulting from land use change are significant but inadequately understood. The greatest emissions will be from imported products which result from land use change overseas as most land conversion in the UK has already occurred. [The exception to this is in peatland conversion which is beyond the scope of this work.]

52. Two key commodities will feature heavily in any inventory of UK emissions from global land use change and forest loss: biofuels and animal feeds. The former is a relatively new area of concern and there has been a rapid conversion of land for biofuel production in response to market and policy signals. This will be contributing highly dangerous levels of emissions. Of equal importance are the emissions resulting from current and new land use change related to production of animal feed (primarily soya) for animals destined for UK consumption.

Impacts of Consumption

53. Biofuels: Carbon dioxide emissions from land use change could "completely negate any emissions savings from biofuels"[23]. Clearing land to grow biofuels creates additional greenhouse gas emissions from the cleared vegetation and from the soil. This creates a "carbon debt" that needs to be offset by the carbon savings from substituting fossil fuel with biofuel. Biofuel from soya has a "payback time" for this carbon debt of up to 1,000 years (if replacing forest)[24], which is one of the worst payback times of all biofuel crops. Soya is the most widely used feedstock for biofuel used in the UK. (45% of UK biofuel made from soy in April/May 2008, source: RFA monthly reporting). Both the OECD and the United Nations have expressed concern that their impacts may be worse then for petrol and diesel[25] and that the impacts will be felt most severely in developing countries.[26] For example, it is estimated that the total requirement for land for biofuels, if all major countries and regions were to attain their stated targets to 2020, would be between up to 166 million hectares[27].

54. Animal feeds: We import significant levels of soya from South America to feed UK livestock and European livestock destined for UK consumption. This relates to over 30% of total Brazilian and 25% of Argentinean soya harvest and represents 10.6 billion hectares of land use. Over 80% is used for pig and poultry meat. A proportion of this is grown in areas where forests are being destroyed to produce the product. For instance the equivalent of 164,401 hectares of Malasian land and 520,952 hectares of Brazilian land are used to produce oil palm and soya bean oil for biofuels respectively. Taking our total use of soya we need approximately 14,071,096 hectares of land for EU consumption[28].

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[22] IPCC-NGGIP. Revised 1996 Intergovernmental Panel on Climate Change (IPCC) Guidelines for National Greenhouse Gas Inventories, www.ipcc-nggip.iges.or.jp/public/gl/invs1.html

[23] Review of the Indirect Effects of Biofuels—the "Gallagher review" http://www.dft.gov.uk/rfa/reportsandpublications/reviewoftheindirecteffectsofbiofuels/executivesummary.cfm

[24] See H K Gibbs (2008): Carbon payback times for crop-based biofuel expansion in the tropics: the effects of changing yield and technology http://www.iop.org/EJ/abstract/1748-9326/3/3/034001

[25] http://www.foeeurope.org/publications/2007/OECD_Biofuels_Cure_Worse_Than_Disease_Sept07.pdf

[26] http://esa.un.org/un-energy/pdf/susdev.Biofuels.FAO.pdf

[27] Review of the Indirect Effects of Biofuels—the "Gallagher review" http://www.dft.gov.uk/rfa/reportsandpublications/reviewoftheindirecteffectsofbiofuels/executivesummary.cfm

[28] Profundo Economic Research, 2008 unpublished

Measuring and Reporting

55. Biofuels: So far emission from indirect land use change have not been taken into account in current standard values for green house gas emissions from biofuels. No universally accepted method exists so far to measure and address emissions from indirect land use change. There is a danger that the UK nominally meets targets for renewable energy through imported biofuels, which could result in an overall increase in emissions rather than a reduction. These would effectively represent a case of the UK exporting its emissions at the cost of producer countries.

56. Food: The UK greenhouse gas inventory calculated UK's food contribution at 33MTCeq (18.5% of UK total)[29]. This only refers to emissions resulting in the UK. It does not include the embedded emissions from imports. Measuring and predicting the emissions related to land use change are notoriously difficult. However some studies are beginning to reveal just how huge the emissions may be. A preliminary calculation of our UK food consumption gives a figure of 43.3MTCeq (19% of UK total)[30]. This represents a very significant level of absolute emissions and includes emissions related to land use change.

57. What the Government must do is take a consumption based approach and start to measure the detail of embedded emissions and target total emissions from food and biofuel consumption. Areas for policy reform to tackle this should include: climate and biofuel policy; agricultural subsidies targeted to support domestic protein feed production and low impact livestock systems; Government investment in development initiatives (see Appendix 3); Government procurement of food particularly meat and dairy; education and awareness on food impacts; and research and development investment on low impact diets.

The Interaction of Carbon Finance Mechanisms with the Timber Trade

58. The principal way in which carbon finance mechanisms are likely to interact with the timber trade is through payments to managed forests; for the carbon sequestered within forests, or for the increase in forest cover and additional carbon sequestered as a result. Where re-forestation has taken place this has principally been through the expansion of tree plantations.

59. The social and environmental impact of tree plantations are of great concern and include the depletion of water sources due to changes in the hydrological cycle; deterioration of rivers and streams; air and water pollution due to the use of pesticides and other agrochemicals; the displacement of entire communities when their land is occupied by plantations; violations of human, labour and environmental rights; differentiated impacts on women; the deterioration of cultural diversity; widespread violence; and the critical loss of biodiversity.

60. There is a significant risk that carbon finance mechanisms will play a role in increasing the growth of tree plantations, both through reforestation and the conversion of natural growth forests.

61. A move towards payments of this type are likely to be disproportionately directed towards large business operators, as they will be best placed to cope with the necessary bureaucracy that would be associated with carbon finance mechanisms. Community based forest management approaches would be unlikely to be able to benefit relatively from finance mechanisms and so be disadvantaged despite the numerous social and environmental side benefits they bring.

62. Financing for forest conservation should pay for programmes that support traditional forest stewardship by local communities and Indigenous Peoples, cover the actual costs of monitoring and protecting forest ecosystems, and compensate for benefits lost to governments and local communities when activities destroy forests.

Government Progress on Tackling Illegal Timber Since the EAC 2006 Report on Sustainable Timber

63. Whilst we welcome some of the efforts the government has made on sustainable timber, we are disappointed by the lack of progress that has been made to date, especially in either the EU or UK legislation to tackle the illegal timber trade. The scale of the deforestation requires a much greater sense of urgency than has been apparent, both on specific illegal timber policy instruments, and on the wider issues identified within this submission.

64. Many of the report's specific recommendations are dealt with elsewhere within this submission. Here however we would like to highlight one particular area:

65. Destructive activities of UK companies overseas: Our assessment is The UK government has failed to address the situation of UK companies making a profit at the unreasonable expense of people and the environment abroad. Current mechanisms in place, mostly voluntary and unenforceable, are inadequate to hold these companies to account for their adverse impacts. Legal suits are extremely difficult to successfully pursue.

[29] Garnett T 2008
[30] DEFRA figures quoted in Cooking up a storm Food Climate Research Network, University of Surrey, September 2008.

66. In the follow up to the Companies Act 2006, the government has not produced clear guidance for companies on how to report on their social and environmental impacts, we hope that the government will use the opportunity of the planned review in 2009 to ensure this takes place. Currently only a small number of companies need to report, we believe this should be mandatory for all medium-large public and private businesses. These reports should be independently audited.

67. Additionally, whilst there has been government support for the Ruggie process at the UN, much more needs to be done, to ensure that victims of UK corporate abuse, on human rights, and environmental grounds are able to adequately seek redress from UK companies, where there is a failure of governance in the host country. Currently, the OECD guidelines do not have the necessary teeth, and UK tort process is fraught with obstacles.

68. The success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan, and Government support for it: Friends of the Earth is broadly supportive of the EU's FLEGT Action plan, however we have concerns over the speed at which additional measures legislation has been forthcoming and also, with respect to Voluntary Partnership Agreements, at the quality of some stakeholder consultations, whether the definitions of legality will be broad enough, whether all products are included, and the enforcement and quality of traceability mechanisms for timber.

69. Voluntary Partnership Agreements: We fully support the approach which Voluntary Partnership Agreements can adopt in addressing and supporting timber producing countries as an opportunity within producing countries to drive change in the forest sector by: strengthening governance, improving and better implementing forest and environmental laws, enabling dialogue between government and civil society. Any solution which does not attempt to address the underlying issues of weak governance, corruption and land tenure is doomed to failure.

70. Addressing weak governance is never a simple task, but involving the many parties and stakeholders, from timber traders and forest based communities and relevant government departments in an open transparent and accountable process is crucial to the success and sustainability of any reforms, which come about as part of the VPA process.

71. We cautiously welcome the signing of the VPA with Ghana. The agreement enforces the requirement for communities to provide written consent before logging takes place on their land. It also commits Ghana to a participatory review of forest policy, regulation and institutions. Another positive aspect is that all timber products are included in the agreement. Its potential is largely due to the fact that it has been developed with reasonable participation of civil society and clearly recognizes communities' rights over their land and resources and the need for forest law reform. This agreement should set a bar for future VPA processes particularly around stakeholder participation. Whilst the agreement forms a road map, the true measure of its success will be upon delivery.

72. Regrettably, the VPA process in Malaysia has not been as heartening, indeed some civil society groups have felt unable to continue to participate in the process since March 2008. Alongside process issues, there are also many issues of substance that have not been adequately addressed, such as land tenure and access rights. It is imperative that the UK government, through its influence on the European Commission ensure that such VPA processes are not allowed to undermine the potential of VPAs and FLEGT in a race to the bottom.

73. However VPAs, even if perfectly implemented will not be sufficient alone to curb illegal and destructive logging significantly at a global level. The current structure of the EU Licensing Scheme does not prevent the import of around 90% of illegally harvested wood products into the EU. [See Appendix 4 for details of the potential shortcomings that could undermine the original intentions of the EU to control illegal timber imports]

74. For this reason it is imperative that we see rapid action to develop and implement strong additional measures.

75. Additional Measures: As a priority, the UK government must work with other member states to strengthen the draft legislation in the following areas in order to be effective:

76. Ensuring the legislation contributes to tackling global environmental problems and to protecting the livelihoods and rights of forest dependent communities: We are seriously concerned about the proposal's weak contribution towards the objective of halting deforestation and mitigating climate change, reducing biodiversity loss, alleviating poverty and protecting indigenous peoples' rights.

77. For instance, the proposed legislation fails to require that all legal timber is produced supporting the three pillars of sustainable forest management and multilateral environmental agreements. It does not go beyond existing national standards. "Legally harvested timber" is defined in the narrow context of national laws on regulating forest conservation and management and trade in timber (products). This possibly excludes a range of national laws on environment, labour and community welfare as well as around tenure use and rights to land and resources. This also ignores equally relevant regional and international conventions and agreements that the EU and major forest-rich countries have signed throughout the years.

78. To improve the environmental credentials of the law, the Parliament and member states should include provisions to help move towards stronger environmental and social standards for legally produced timber, and prevent the marketing of timber from endangered and sensitive areas. For instance, timber from "forests undisturbed by human activity" and from "forests from conflict areas" should be prevented from entering the supply chain, and timber from "other natural and primary forests" should be required to meet additional conditions and criteria. There are already ongoing negotiations in relation to sustainability criteria for the above categories under the Renewable Energy Directive.

79. Making it explicitly an offence to import, sell or possess illegal timber, and asking for proof of legality, not just assurances that control systems are in place: The proposed regulation rightly places responsibilities on forest-based industries and operators. They will need to assess and manage the risk of legality in relation to the timber and timber products they wish to sell. By requiring companies to perform due diligence and by setting standards and systems for risk management and legality verification, the proposed legislation has the potential to generate significant systemic changes in the way companies operate.

80. Regrettably, however, operators are not required to systematically prove the legal origin of their products at the first point of sale on the European market (eg with a label code). The legislation merely requires them to have due diligence systems in place to assess and manage the risks illegally harvested timber, not to ensure the legal origin of every product sold to consumers. This should be corrected.

81. The proposal should also be amended to explicitly make trading in illegal timber and timber products or the placing of these on the market a punishable offence. It should specify the different levels of offence (eg trading or marketing of illegal timber products, failure to put in place a due diligence system, insufficient implementation or weak due diligence systems) and spell out strong deterrent sanctions.

82. Equipping the regulator with tools and teeth to control timber products, detect illegalities and investigate crime: National control authorities should also be given the teeth to control timber products traded in or placed on the market, detect illegalities and investigate crime. For the moment, their action is merely limited to controlling the diligence systems and not the trade and marketing of timber and timber products itself. The due diligence approach must therefore be supplemented by introducing criminal law components and an additional control approach building on the principle of legality and the role of competent authorities.

83. Establishing a robust public monitoring system to assess the performance of private schemes: The proposed legislation is over-reliant on private-based systems of legality verification and risk management. Environment groups are concerned that some of the existing schemes are not robust enough and therefore may not provide reliable proof of legality. An EU public monitoring system needs to be put in place to assess and supervise the long-term performance of approved schemes on the ground. The proposed regulation should specify who will assess private schemes and how, and who will initiate an appeal system in case of a drop in performance and how. Legislation should also set up a mechanism to settle disputes and manage complaints. The establishment of an EU public monitoring system would be beneficial as it would provide an incentive for private schemes to maintain good performance at all levels. It would also prevent misleading information to be given to European consumers and public authorities.

84. Creating a reliable mechanism to determine the level of risk that timber derives from illegal sources and determine measurements to be taken in cases of high risk regions: While the proposed legislation requires operators to use risk management tools to direct monitoring and control efforts towards high risk suppliers, it does not specify who determines the level of risk, on what grounds and with what aim.

85. In a weak interpretation of the proposal, risk could simply be assessed by operators or industry federations, which effectively means self-regulation. Weak risk analysis aside, this could lead to legal uncertainties and unfair competition between companies based in different member states. The proposal should be amended to include: i) an obligation to label all wood products with information on the species, country and forests of origin; ii) provisions for a Commission or member states'-managed public database(s) that keep(s) record of the names of logging companies and operators convicted of illegal activities; iii) stipulating a list of existing information sources that operators can use to assess risk levels; iv) guidance for the use of risk management tools; and v) clear rules on third party verification as a mandatory supplementary measure in high risk cases. The creation of a strong and reliable EU risk management system and mandatory supplementary measurements is essential to make it harder for high-risk operators to sell timber and timber products on the European market.

86. Ensuring all control systems and procedures are water-tight, including FLEGT licence and CITES documentation: By considering the FLEGT licence and CITES documentation as sufficient evidence of due diligence, the EU intends to create an incentive for countries to join FLEGT voluntary partnership agreements or to list more tree species on the CITES lists. This is generally a valid approach. However, the EU should first ensure that neither of these systems have loopholes that can be used to launder illegal timber. National authorities should be given the right to control and investigate allegations of infringement to FLEGT licence and work on the better enforcement of CITES regulation.

87. Improving the current range of product coverage: Wood products for energy production should be included within the scope of the regulation as they should both be legal and sustainably produced. Having different regulations for wood products (sustainability criteria for energy products and legality criteria for other wood products) will disturb the market and create loopholes.

APPENDIX 1

The Stern Review, even though it is still rather low compared with some other estimates, exemplifies the "full cost" approach to REDD, as its figures are based on total lost income or cost to GDP. It states, for example, that the Net Present Value of income "ranges from $2 per hectare for pastoral use to over $1,000 for soya and oil palm, with one off returns of $236 to $1,035 from selling timber." (Grieg-Gran, 2006, quoted in Stern 2006, Chapter 25:543). It is also interesting to note that others, such as EcoSecurities, calculate how much money can be "generated" by selling REDD credits on the carbon markets, rather than considering "costs". Thus EcoSecurities, for example, estimates that a 10% reduction in the world's deforestation rate could generate between US$ 3–9 billion per year, and a 50% reduction somewhere between US$15–45 billion (EcoSecurities, 2007).

APPENDIX 2

On the impacts of the Forest Carbon Partnership Facility on indigenous peoples' rights to land and resources, some specific criticisms from the NGO Forest Peoples Programme include:

> Governance arrangements that allow input from indigenous peoples on invitation only and on a no voting rights basis;
>
> Oversight for safeguard application is entrusted to the secretariat and there is no allowance for a grievance or redress mechanism for indigenous peoples;
>
> There is no commitment to uphold human rights and the charter does not require the Bank to uphold standards in the UN Declaration on the Rights of Indigenous Peoples; and
>
> Plans to allow low-impact logging and plantation development in the emission reduction programmes will mean business as usual.

APPENDIX 3

According to work carried out by ex-World Bank environmental chief, Robert Goodland, the World Bank has funded detrimental livestock projects to the tune of $672 million. These 22 projects are predominantly in South America (9), but Asia (5) and Eastern Europe (5) also feature heavily. With a $90 million loan, the International Finance Corporation [the private sector lending arm of the World Bank] are funding one of Brazil's leading meat processors and exporters to expand by 20%. [The Bertin Amazon Cattle Ranching project is the IFC's largest single livestock project and the injection of money has helped Bertin gain an additional $450 million of loans and re-financing from the Inter American Development Bank (IADB).] Together this money is funding a 20% expansion in production; increasing cattle slaughter from 7,000 to 16,000 heads per day and leather processing from 19,600 to 31,000 hides per day.][31][9]

Local campaigning groups identify significant environmental damage as a result of these publicly funded projects. No studies or consultations have been conducted of the areas involved (and if they have, they are not releasing them); the specific sites for development have not been publicly identified; the project is taking account of previous illegalities in land-use and deforestation and will continue to contribute to these further; and, emissions of 56 million tonnes of CO2 will be released by the project over the ten years and this does not include those unidentified developments/sites.

The World Bank produced a Livestock Strategy document in 2001 which proclaims that the World Bank will not fund projects which promote industrialisation of farming or are detrimental to small or local farmers (amongst other things). The IFC have refused to acknowledge the strategy, stating that the document hasn't been officially endorsed by the World Bank board.

The World Bank board must update and ratify the livestock strategy and the IFC must IFC publicly acknowledge and apply the current livestock strategy. The UK government must take steps to ensure this happens and all funding for intensive livestock operations is phased out.

APPENDIX 4

Risk of circumvention: Timber and wood products imported by the EU, via a third party country such as China and Russia, are not addressed, despite these two countries currently being the main suppliers to the EU market in timber products.

Limited product coverage: secondary processed products, such as paper and furniture, which represent about 55% of the total trade in timber products, will not be covered by the voluntary scheme, at least not initially.

Risk of laundering: If the partner country has no national legislation to control the import and sale of timber and timber products from non-partner countries, any illegal timber imports could be mixed with the legal domestic production of the partner country, and then exported to Europe with a valid legality licence.

[31] IFC's Recent Livestock Projects, Bob Goodland, Pers Comm, 2007

Geographical scope: Not all producer countries are likely to sign VPAs. Some large timber producing countries such as Brazil, whether because of soveriengty concerns or lack of the political will, have stated their disinterest. Additonally the incentives for producer countries with limited trade with the EU are small.

13 October 2008

Witnesses: **Mr Charlie Kronick**, Senior Climate Campaigner, Greenpeace and **Ms Robin Webster**, Senior Campaigner, Friends of the Earth, gave evidence.

Q39 Chairman: Good morning and welcome. Just so you can judge the pace of what we are going to do, we hope to finish at about 12 o'clock because some colleagues have got other commitments they have to go to. With regard to the last session, is there anything you would like to say about any of the evidence we received from Mr Eliasch and his colleagues?

Mr Kronick: What is amazing to me about the Eliasch Review and the work that Greenpeace, and Friends of the Earth I am sure, has done is that a lot of the basic assumptions are the same, which is that deforestation and forest protection is an essential part of responding to climate change; that there are some absolute fundamental issues around the role of offsets around what the carbon price can and cannot deliver. I think where it starts to diverge is then how you interpret those basic assumptions. If I was just going to make one point, I think the points that Mr Eliasch particularly made more strongly were that carbon is just another commodity, and if you can replace soya beans, palm oil and timber and the revenues that accrue from the exploitation of that commodity with a well-regulated market in carbon and address the issue of opportunity costs the problem will be solved, and I do not think that is true. I think it is a fundamental misunderstanding of the role of forest protection in climate protection. It is not a question of either/or; it is not a question if we can just find some ways to make the delivery of climate change — If he is talking about up to 2030 I would consider that the medium-term to long-term to make them more economically efficient. To Greenpeace it is a completely inadequate response to the problem.

Ms Webster: What I would add to that is, I think you heard quite a lot over the last hour about the robustness of frameworks, and the capacity-building periods and "We must put these in place before we get the markets". Yesterday I was talking to one of my colleagues who is following the negotiations in Poznan at the moment and there is a very long distance between the kind of economic theory you are hearing and actually what is happening in Poznan at the moment. The distance between politics and economic theory is absolutely huge. I think this is where a lot of our concerns come from. You may say, "If we had a robust carbon market; if we had these in place; if we had decent capacity-building this could work"; but when you are in a situation where you do not—and where what you are doing is putting in place a system where you are essentially looking at vast amounts of money and enormous incentives to governments to proceed very, very rapidly with this—this is where a lot of these dangers are going to come from. In monitoring Eliasch's findings I think that is what we have got to think about—the difference between the theories they are developing and the practice we are going to see in politics.

Q40 Chairman: Of course that gap exists in a whole range of aspects of the climate change challenge right now so we will not go down that route just now! Would you like to say what you think about the Eliasch targets. Are they hopelessly inadequate in their ambition?

Ms Webster: When they are looking at deforestation and the target there I do not think they are hopelessly inadequate. They are talking about addressing the scale of the problem which is there. I think there are some things which I would take issue with. When we are actually looking at the immediate term—I am sure those of you have also looked at some of the climate science, as we have, a recent report coming out from the Tyndall report—they are looking at what may happen in emissions by looking at global peak and decline in emissions by 2015. That means really unprecedented changes in energy; really unprecedented changes in land use change like agriculture; and really unprecedented changes in deforestation. These are enormous changes we are looking at. We do have to start a balance when we are thinking about these things. For example, I have some concerns when they are talking about getting to carbon neutral by 2030, and balancing aforestation and deforestation, which again I think seems to ignore some of the politics. If you think if you get to 75% deforestation then we can have some level of deforestation proceeding and it is not going to be a problem, this is starting to ignore some of the politics of actually if you start to construct roads going through areas and commercial logging, that this is a real runaway process and something that is very, very hard to control and very hard to balance with aforestation, which often means talking about plantations and whether that in practice is really going to be something which is realistic. Yes, I think they have tackled and said, "Look, this is a really urgent issue, and this is something which we need to be tackling in the very short term", and I think the Eliasch Revue does take that on.

Mr Kronick: I think I take a slightly different view—in that if you focus on the absolutely key areas of Indonesia, particularly around the peatland forests which are now being exploited for palm oil, or the Amazon, the Brazilian Amazon particularly—that their targets are really inadequate. Our view, supported largely by the science, is that there should be a halt to deforestation by 2015, particularly in those key areas, and looking at protecting the forests of Congo, for example, as soon as possible thereafter. I think that is one of the fundamental

problems with the Eliasch Review, which is trying to make their targets compatible with their ideas about when the market might be mature enough to deliver their targets; whereas, if you look at the back to reality peak and decline, the targets around deforestation have to be much more ambitious.

Q41 Chairman: Given that in every aspect of the solution to climate change achieving the targets is extremely challenging, in terms of decarbonising transport, low carbon energy and so on, you would think that deforestation was one of the easiest ones to deliver. Given all the new technology there really is better enforcement of what is going on, on the ground. Why can it not be done, as you say, by 2015?
Mr Kronick: If he had only waited I would have asked him that right now!
Ms Webster: One of the things we have to think about here is that they talk about the "preparatory period", a four or five-year preparatory capacity-building period, and I think when you are tackling deforestation actually that is not a preparatory period. I would say that five-year period is actually extremely optimistic. In terms of when they are looking at cases—"In five years' time we are going to have good enough governance structures; land tenure issues are going to be fixed; actually then we will be able to proceed with a full-scale carbon market"—I would say that is optimistic. We need to be thinking about over a five or 10 year period of actually focussing on fixing those problems in the countries. That is actually what is going to make the difference. I felt that some of the answers you got from Eliasch were rather superficial: "Yes, we do talk about the rights of indigenous people on page 95. This is something which is mentioned and we do consider it to be fundamental", but it is thin in analysis and how that needs to be focussed on in the short-term and just seen as a preparatory period before you get on with the real stuff, and I think that is a very dangerous approach.

Q42 Joan Walley: Can you help us understand this in terms of the whole framework we are looking at, because we have got Poznan taking place now and we have got this whole financing approach which we just heard from the previous witnesses; yet two weeks ago we had evidence from James Hansen who suggested to us that the science is telling us that global warming is actually speeding up far greater than we ever imagined. I do not quite see how we can make sure, that the way we view forests, the way that we view the need to have reduced atmospheric carbon, and how we need to reduce that, how we are really plotting out the right role for forestry or deforestation in the whole global approach towards how we tackle climate change. Do we need to have a fresh approach towards the role of forests?
Mr Kronick: There is almost no approach to the role of forests at the moment, so I guess in that sense we are getting a fresh approach. I think I understand your question to mean, and my sense is that there is genuine mismatch between the politics at the moment and the scale of ambition that the politics will be able to deliver; and what people like Jim Hansen were saying is the reality of the atmospheric concentrations. They are on divergent paths.

Q43 Joan Walley: My question really is: what does this mean for the role of forests in all of this, given that it has had very little acceptance and understanding, and all the demand side issues like illegal timber coming in; all of those things have not really been addressed?
Mr Kronick: I think you are right to focus on demand side issues and it is not just for illegal timber, but equally importantly for the agricultural products—palm oil and soya particularly, both because of the increase in meat production, but also because of the absolute key aspects, and particular aspects of Indonesian forests. What it says beyond having to deal with the issues of the drivers of deforestation, which the Climate Convention is probably not particularly well-suited to do, is that there is an unwillingness to acknowledge that it has to be, "Yes, and . . . ". In other words, as Robin pointed out really clearly, there has to be transformation of energy infrastructure in developed and developing countries; there has to be a fundamental rethink about the way we deliver transport; but it as to be as well as protecting the forests; as long as it still in a kind of value chain of "Where can we economically deliver these marginal abatements", which was the issue which can mask the impact on the carbon prices, focussing on marginal abatement.

Q44 Joan Walley: What I am really getting is, what is the role of forestation or deforestation in all of this; or what should it be?
Mr Kronick: Our view is very simple: as well as reducing emissions from industrial sources, power stations and transport you have to protect forests. You cannot trade them off; you cannot offset them; they both have to happen in the same timeframe. That is why I think there is a big gap between the politics, certainly at the EU level where there is argument about how quickly and to what extent can you bring levels of offsets into the EU ETS, and actual emissions reductions.
Ms Webster: One thing I would add to that answer, certainly I would very much back-up and talk about the frustration of the idea of marginal abatement curves, and we must take the most cost-efficient measures in tackling climate change. We are going to have to tackle everything, and that is very, very clear. As soon as you start talking about the most cost efficient measures you are going down a very dangerous route there. I think one element of this debate which really concerns us is that we have not actually been trying to tackle deforestation for no time at all; this is something that we have been trying to tackle for decades and decades, and there has been progress made. Over the last 10 to 15 years the FLEGT process; over the last five years the expertise which exists within DFID, within this Government, is there has been a great deal of thought and effort put into issues around how you tackle governance; how you tackle land tenure; issues of consultation

with indigenous people; the rights' based approach; the ways in which you do make a difference to tackling deforestation. But there is a real concern, with the logic we are going down now with the REDD progress, that all that expertise built up painfully over years, and years, and years, existing within this very Government is being ignored; and that you now have under-resourced departments in DFID who really find it very hard to take their work forward, at the same time as enormous amounts of money and effort are being thrown into the REDD process. If you are looking at taking your investigation forward, I think that would be an interesting part of it, to think: is our Government using its expertise correctly in developing this process? Are we listening to the expertise from all the departments of government, not just from one part of it?

Q45 Martin Horwood: One of the areas of expertise and one of the issues which has been under-developed for a long time is that of indigenous peoples and land rights. You heard Mr Eliasch's response to my question on that. Do you think there is a risk of that expertise being lost in particular, and the land rights and the issues surrounding indigenous and tribal peoples being ignored in this process?

Ms Webster: It is not just a risk—it is happening. I had a phone conversation yesterday with my colleague who is working in Poznan at the moment and she said they are being ignored at the moment. We have seen numerous declarations from indigenous people against the REDD process, and you can really see why. I was following REDD in Bali last year as well and we fought tooth and nail, and a bit of lobbying, and at the end of two weeks managed to get a sentence in the foreword about the rights of indigenous people. That is really the status that it has. There has very much been lip service paid to the process. These pilot projects which are being run by the Forest Carbon Partnership Facility, these so-called R-PINs, 25 of them have been taken forward over the last year and they were assessed in quite an interesting document by the NGO-FERN, and really none of them had paid sufficient attention to land rights using consultation with indigenous people. Lip service has been paid to this, and I think that was pretty evident actually from Eliasch's response to your question: "Yes, we do think it is very important and it is mentioned in the report" and on we go. It is: what is the centre of the logic to how you answer the question? The centre of the logic when you are coming from the perspective of: how do we finance this; how do you pay the polluter, so you stop polluting—rather than starting from the point of: how are we going to stop deforestation; and who are the people we should be talking to, to make that happen?

Mr Kronick: Increasingly there is evidence that the best thing you can do (and certainly the cheapest thing you can do in terms of forest protection) is to identify through quite simple things—we have done it; Greenpeace has done it in the Amazon with handheld GPS—demarcate the areas where indigenous peoples live, so there is a clear understanding of where it is you are talking about that you are trying to protect. Some recent work in the States shows it was an order of magnitude cheaper than even Stern's projections—$3.50 per hectare, as opposed to $3,500 per hectare just with simple demarcation. There is a huge amount that can still be done before you even get to the question of discussing what would the role of a carbon market be.

Q46 Dr Turner: One of the governance issues that is very important is clearly land tenure. One can think of several examples where this underlies the problems. Might a drive internationally to improve land tenure in the countries concerned help also to defend the rights of forest people?

Ms Webster: It is very much wishful thinking to think that would happen. The reason why, particularly as forest campaigners we would say this, working with our networks of campaigners over the 70 Friends of the Earth groups around the world, many of whom work directly with communities who are affected by deforestation, they would be absolutely cynical in response to a question like that. The history of deforestation and governance over the centuries has been, an increase in the value of the forest to the state does not increase in the rights that they give to local people—quite the reverse. The real fear that there is is that this is going to result in what my colleagues would call a "corporate land grab" from the global south; this is what they see coming at them with this issue. If you start to increase the value of it to the private sector, historically you have immensely powerful corporations in relation to the rights of the local people, whose rights are not given credence by the state. It is very likely they could just be thrown off that land in order to create a system whereby you can say that this is being protected. I am sure Eliasch would respond to that and say, "If we had good issues around governance with a stable system etc", but the fact is that is not the situation in these countries.

Q47 Dr Turner: I have to say that is totally at odds with the explanation from your Brazilian colleague of the mechanics of the deforestation process in Brazil, so we are just going to have to differ there. You do not think there is any help for indigenous peoples either from better governance in the form of more strictly controlled land tenure, or whether they would benefit from carbon markets?

Ms Webster: If the project was focussed specifically on a project whereby you have a focus on developing land tenure and actually tackling these issues, much as some of the FLEGT process has tried to do that, and it was not seen as a brief precursor to getting the carbon market going—if, for example, the system was that a country almost had to bid for some of the finances available to show this is the way in which we are going to start to tackle these problems—then I think you might start to see a system tackling these issues; but when it just seen as a brief precursor to a huge amount of money coming in five years I cannot see it working.

Mr Kronick: I do not think there is any question that providing resource from developed and developing countries is one of the objectives of these markets, both through any kind of climate protection regime or generally in the sense that that is what a commodity market can do. I guess the question that we would raise is: it is not the value of the finance—we would definitely agree there is value in the finance; my question would be the value of the carbon market and its role in fully fundabcredits to deliver that. The Greenpeace proposition (which is not the be all and end all– although it is long enough to seem like the be all and end all) links the price of an emissions reduction unit, however it is allocated, to the highest possible auction prices from the carbon market. With sufficient governance you can make anything work and we are certainly hoping that the role of the carbon markets, if it is clearly identified, can provide some additionality. Our big question is the fact that they are not currently doing it. By linking the value of deforestation credits, which we do not believe should be traded in the global carbon markets, to a higher price in the carbon market at least you get a sustainable level of finance over time. I think the real question—and I do not think any of the current propositions, whether it is ours or Eliasch's or anybody who is advocating the carbon markets—is how do you deliver the money effectively to the communities that really need it? That is an open question, and I do not think there is an answer to it.

Q48 Dr Turner: You have offered lots of negative criticisms to mechanisms that everybody else has put forward to address this problem. What would you do? What would you advocate that we do to ensure, firstly, that the poor are not going to be evicted from or denied access to forests; which goes hand in hand with preventing deforestation? Serve the rights of the indigenous peoples and you prevent deforestation at the same time. How would you go about it then if you pour scorn on what everyone else is trying to do?
Mr Kronick: I am trying to limit my scorn pouring, I think! We made a very comprehensive proposition, both into the international process and into its committee called TDERM, Tropical Deforestation Emission Reduction Mechanism, and it is quite simply requiring, as part of developed countries' or any country that takes on emission reduction obligations, to assign a portion of that obligation to funding avoiding deforestation. We think the best way to do that is to take revenues from auctioning in a tightly regulated and clearly capped carbon market, and take between five and 10% of those revenues and put them towards forest protection through an agency that would be similar to the one set up under the Montreal Protocol, which was designed to make sure there was a fair distribution of resources around ozone depleting chemicals between developed and developing countries and signatories to that Protocol; and that those resources and cash, basically, would be made available to protect both the forests and the interests and livelihoods of the forest dwelling communities. Before you ask the detailed question of how that would work, I would be the first person to admit that we do not have a detailed way of allocating and distributing those funds; but we really do think that at least a UN-related body is a very good place to identify those mechanisms.

Q49 Dr Turner: It all comes back, whether you like it not, to governance?
Mr Kronick: It does. I could not agree more.

Q50 Dr Turner: The countries with the biggest deforestation programme have the biggest obvious defects in governance. If you can address governance you have a much better chance of addressing deforestation and obviously the rights of indigenous peoples. Do you think it is an appropriate use of any rewards or incentives devoted to avoiding deforestation to use those for improving governance in the affected countries?
Mr Kronick: Absolutely.
Ms Webster: In answer to your question, I think we would need to think about concentrating on the short-term. In the next five to 10 years, as I mentioned earlier there are under-resourced and struggling parts of our department and parts of the European Commission working on the FLEGT process which have developed considerable expertise on this over the years in terms of working on issues like governance, issues like land tenure, how you work intensively with one country in order to tackle these issues. If that had more resource—and it is about finance, it is about expertise, it is about a real sharing of knowledge, it is about a long-term commitment and process—that is the way we can start to tackle these issues, rather than a headlong rush into a carbon market process.

Q51 Mr Chaytor: Do you have a total figure of the resource that would be needed by 2030? Presumably you think the Eliasch range of $17–28 billion is too much; but would you have a figure of your own to concentrate our minds?
Ms Webster: This is an unusual situation as I am usually in front of committees asking for more money and it seems strange to be the other way round. No.

Q52 Mr Chaytor: What would 5% of the EU ETS auction revenues bring in?
Ms Webster: Those are quite interesting proposals. I personally would not wish to tie us, having not done an intensive investigation into what kind of level of finance would be needed. I do very much question those numbers which come under Eliasch particularly, as I mentioned before, that a lot of them are based on the idea of opportunity costs—the money you do not get from investing in palm oil, for example. How on earth is that going to work? How is that going to work in 15 years and 20 years' time? Are we still going to be subsidising for not investing in polluting? It is very analogous to some of the proposals that come from Saudi Arabia through negotiations, of not being paid for taking out their oil. It is a pretty crazy system. The issue around governance is not so much about the finances; it is

about the expertise; it is, as you are talking about, these GIS systems—sometimes the stuff which costs the least money can have the most effect.
Mr Kronick: The revenues from allocating a certain proportion of auction allowances could be greater.

Q53 Mr Chaytor: Specifically agreed. In the plan you have put forward—TDERM—you specifically referred to 5% of the auction revenue, which is exactly the same as the proposal put forward by the European Commission. What would that bring in?
Mr Kronick: Again, depending on the carbon price, I cannot remember the exact figure but it is upwards of— No, I am not going to make it up because I would just feel stupid. I will happily find out and send it on to you.

Q54 Mr Chaytor: Does it not reduce the credibility of the position of both of your NGOs if you have not got a headline figure? The merit of the Eliasch report is that it is very, very, very specific within a range of $17–28 billion. The methodology is detailed; they put forward different scenarios and they produce this range. Just saying "We need more money" reduces the credibility of it.
Mr Kronick: Some people are saying we need less. For us the issue is not the amount; obviously it needs to be sufficient or adequate but it is not a question of, "Let's come up with a system that comes up which absolutely maximises the amount of cash". If an element of it is stability of forest protection and not depending on the relationship with the carbon markets, I think that is a key distinction between us and Mr Eliasch's approach—scornful or otherwise. I think it is about what you want the mechanism to deliver; it is not just the sheer amount of money; it is about how it delivers it; it is about the stability it gives to forest protection; and also the effect that it has on infrastructure transformation. For us, that is one of the other fundamental issues of allowing large quantities of offsets into any trading scheme, whether it is the EU ETS or any incipient ones that grow up in the United States.

Q55 Mr Chaytor: Coming back to the method of raising the funds, you have specifically referred to a percentage of the auction revenues, but have you considered any other form of public financing; or do you think it is credible that another form of public financing could generate the revenues?
Mr Kronick: My colleagues, who are much more expert than I am, have suggested that it is unlikely you will get the level of revenue needed just from voluntary contributions into a fund, which is why we have tried to develop something that is not the be all and end all but a hybrid approach, particularly in the context of an emissions reduction regime that is really demanding; in other words, with a very, very tight cap, you would genuinely derive pretty substantial revenue even from a percentage of an auction of emissions allocations. We are more confident that that will deliver it. But goodwill could spring up in unlikely places—I just would not want to have to count on it to protect the climate or the forests.
Ms Webster: You might find it interesting to speak to those who have been putting forward the Norwegian proposal that was proposed in Bali last year to find out if they have actually managed to spend all the money yet. When you are trying to deal with these issues it does feel like the wrong question to us. Trying to say how much money is there going to be, and how we are going to go round and getting that money is not the right way to start answering the question.

Q56 Mr Chaytor: Leaving on one side the total amount, are there any circumstances in which you would accept that forestry credits could be included within the trading system?
Ms Webster: I do not think it is the right way to go. Our conversation is probably now to go on talking more about issues around offsets and looking, for example, at the energy package at the moment of 15% of that being delivered through offset credits. Again, you come back to the question here of what is this going to do to industrialised emissions in developed countries; and the need that we have to reduce our emissions and it has got to be additional. If you were ever to introduce it into carbon markets you would have to guarantee additionality. If we look at where the politics is at the moment, we are just not in that situation.

Q57 Jo Swinson: Just sticking on the issue of including forestry credits or not in the EU ETS, we have just heard from Johan Eliasch that the view of their report was that because of the level of the supplementarity limits in Phase 3 that it would not actually lower the carbon price. What is your response to that?
Ms Webster: I am not an expert on the details of the modelling. It seems somewhat at odds with other evidence which has emerged, particularly when you are looking at the massive amount of credits which are going to be available through forest systems. Again, talking about a robust system and how you are going to limit the amount of forest credits which come out, within the politics of what we are seeing at the moment—for example, you can see it is quite likely that inclusion of forests into the carbon market could be used as a bit of a sweetener to bring the USA in, because the logic behind that is, "Here is a huge offset mechanism available, so it is going to make it a lot easier for you to reduce your emissions"—it is just the potential which is in there to flood the carbon market is enormous. I would not wish to comment on the details of the modelling which Eliasch has done.
Mr Kronick: I could not comment on the modelling either but I think we can comment on the question. They focussed very specifically on if you have got a high level imports of CDM credits with whatever the marginal abatement cost is and add on top of that forest credits, which may be cheaper, the economic theory is that marginal abatement costs will mean that the forest credit costs will rise to that level rather than be pushed down—which would be great if it was true but there is no way of knowing. I think the real issue though is that of offsets themselves. There

is a European-wide NGO position that is very clear: if you are going to include offsets in the EU ETS, CDM as well as forest offsets, it should be above the 30% domestic reductions that would be a result of signing on to a global deal on carbon in Copenhagen. In other words, you are talking about levels of reduction of 40%, or even 45%, from 1990 levels by 2020, at which point, a) it is a largely fanciful discussion but even within reality then you could make an argument, I think, for including those offset credits, a small proportion of which might be forest credits. I think there are other questions that one then has to ask particularly of the CDM in general and forest credits in particular. If we start to reduce the options for low cost mitigation in developing countries by hoovering them up now we are actually imposing a financial burden on those developing countries down the road; because if we get the most cost-effective emissions reductions now at good market prices they do not, which then puts a pressure on development. It brings you right back to what the Chairman pointed out, which is that there are a lot of compelling reasons to make the overwhelming majority of our emissions reductions domestically. I guess the only place where we differ with Dr Turner, if you are going to include those offsets we would push the target up quite significantly higher.

Ms Webster: Could I just make an additional comment on offsets. The position that Friends of the Earth has moved to is that we need a 40% reduction by 2020 completely domestically in industrialised countries. We have not brought that question out because we are crazy greenies; it is because we are looking at the science. In response to the science, that is what needs to happen in industrialised countries. The political situation we are looking at at the moment in the EU is that we are coming to the end of the negotiation of the energy package; they are looking at probably a most likely 20% reduction by 2020, 30% in the context of an international negotiation, 50% of that delivered through CDM. Twenty per cent is much the most likely figure, and even that is being threatened by certain interests in the EU at the moment; part of that is gone through offsets. That is actually the scale that we are not responding to the science.

Q58 Jo Swinson: You really think the Committee on Climate Change has got it wrong with this assessment last week?

Ms Webster: The Committee on Climate Change did come out for one of the first times and actually questioned offsets, which was something. That is starting to see the process of thought there; but I do not think anybody in public debate is really looking at the level of that science at the moment, which is starting to think about feedback effects, the stuff which is coming through recently, and saying, "What does this really, really mean in the short-term?"

Q59 Chairman: Putting aside a lot of what you have just said with which I largely agree, I find your reluctance to endorse a much more urgent target for ending deforestation quite extraordinary. You are quite willing to talk about a 40% cut domestically achieved in carbon reductions, which everyone knows is one of the most vast policy changes, and yet you dismiss the idea of saying that we should end deforestation by 2020 as being too ambitious. It does not make any sense at all?

Ms Webster: I am sorry, I may perhaps have misrepresented myself at the beginning, particularly when Charlie was talking about the need for the complete stopping of commercial deforestation in some hotspots. For example, our colleagues in Friends of the Earth working in Indonesia have been campaigning for a moratorium on logging for some time in Indonesia, and I think we would very much agree with that. I suppose what I was trying to do (and I do think we are in a bit of a fix as well) was balance the reality with what needs to happen with the urgency of what is facing us. I think the fear you have here is that you are so overwhelmed with the urgency of something that you rush headlong into something which is not going to work. That is the kind of Catch 22 we are stuck in. We need to put as much effort into that capacity and we need to throw resources into that. If that is going to take five to 10 years there is no point going through another process which is not going to work. That was the dichotomy I was trying to express in my response.

Q60 Chairman: Just going back to an answer of yours, Charlie, a moment ago, you were rather dismissive of the notion that the developed world might go round hoovering up the low-hanging fruit. Are not the interests of the globe served by achieving reductions by the most urgent available method? Never mind that it creates a financial issue down the road, if the only way to achieve very rapid reductions is through investment maybe through credits by rich countries is that not a good thing?

Mr Kronick: I think investment in emission reductions anywhere is a good thing. I think the mechanism by which they are delivered has to be equitable. If you look at the greenhouse development rights framework, for example, that has been put forward by EcoEquity in the United States, you can express it however you like, but the reality is that you could end up with emissions targets for a country like the UK by 2050 of 125%; in other words, taking the economic responsibility for investing in those emissions reductions in developing countries as part of your domestic obligation. At that point I think the equity should be at least openly transparently a part of the negotiation. If it is a question, because of your power in the marketplace as a powerful buyer, that you can go and make the most economically advantageous decisions for your economy, I think that raises real equity questions and, ultimately, it will have an impact on the efficiency of the whole global framework.

Q61 Chairman: We should not allow the resolution of those equity questions to delay making the investment?

Mr Kronick: Absolutely, we should not allow book-keeping questions to prevent UK and other developed countries from actually making the reductions they need to make.

Q62 Chairman: If we are going to use credits at all in relation to forestry issues, do you think we can ever have a system that is sufficiently robust that they can be verified properly?
Mr Kronick: I think that is where I would really agree with Eliasch. I think with the combination of improved satellite technology and ground mapping you can get a generally good idea of both what the baseline is and what the changes in those baselines are. It depends far less on the technology than it does a) on governance issues but b) general political will to protect the forests in order to protect the climate.

Q63 Chairman: On the question of using credits, is it legitimate to count the use of credits as a way of achieving our targets if those credits come from countries which do not themselves have binding targets?
Mr Kronick: I think it is a nonsense.

Q64 Dr Turner: Eliasch's own report recognises the carbon markets would not be successful without a shift to more efficient and sustainable use of land globally. How important do you think, with respect to avoiding deforestation, the efficient and sustainable use of land is in the process of avoiding deforestation? In other words, land which may have been afforested previously which has been in agriculture for some time and has vast acreages and millions of hectares of land in Brazil, for instance, which are not being used in the most efficient and sustainable manner. If they were, do you think that would reduce the pressure on forests?
Ms Webster: If it could work, yes. One question that we have not discussed too much yet is the issue around global demand for land and the consumption effects on deforestation. It is a little bit of a nonsense to think that we can produce a global fund for tackling deforestation without tackling the drivers of deforestation. Studies of deforestation have identified land clearage for agriculture as a factor in 90% of deforestation. For example, the expansion of biofuels is going to create even more pressure there. When you are talking about more efficient use of land, these are the realities we are identifying. It has got to be identifying the drivers, that consumption has got to be part of the solution. That does mean, for countries like ours, looking at our consumption; looking at the policies of our Government; for example, intensive farming in this country, with chickens being fed on soy which is connected to rainforest destruction in Brazil; otherwise the question of leakage is absolutely inevitable, that it is going to be displaced to somewhere.

Q65 Dr Turner: Surely one of the benefits of having forests incorporated in carbon markets is that it provides a finance stream to provide incentives towards sustainable land use?

Ms Webster: Again, if it is effective. What we are always coming back to is looking at what actually is going to work. This is why you look at the centrality of issues around land tenure, working with indigenous people, and we have got considerable evidence which is showing that if you use these bottom-up approaches they are more effective ways of conserving biodiversity. This is why you always have to come back to those approaches.
Mr Kronick: The thing I would add to that is, I would start with the objective and then develop the mechanism. I think what has happened with the global carbon market, certainly within the UK Government now, is that they are an article of faith and they will be the thing that delivers not just the bulk of our reductions but they are the heart of climate change policy. I would suggest if you are looking to improve food security in developing countries, or to identify better ways of protecting land tenure, or trying to improve revenues for particular communities, I would look at those objectives and then try to find the mechanism that best delivers them. I think there is little evidence that global commodity markets, for example, in Brazil have delivered huge amounts in terms of benefits for forest peoples and forest communities. They are very good for the governor of certain provinces, and it possibly good for the national exchequer—there is no question about that in terms of revenue flows. The question is: how do you link general and economic activity to improvements in wellbeing for those people, and that is not clear. I think it is pretty clear that there is no evidence that the carbon market would be the thing that is going to deliver it.

Q66 Dr Turner: One possible level is sustainability criteria for imported agricultural products. How big a role do you think effective sustainability criteria in that area could have?
Ms Webster: It does have a role to play, absolutely, which is when we are looking at the issues of consumption in this country; but there has been some distraction sometimes for environmental campaigners as well when you are looking at sustainability criteria and creating separate sustainable streams, for example, of forestry. It does have a role to play but it is not going to be the be all and end all. This is why some of those streams have got to stop. This is why we have, for example, campaigned against the biofuels target being included in the Renewables Directive at EU level, and not campaigned for them to be imported as sustainable biofuels, because we just do not think there is the space for that to happen. If you create a sustainable source of biofuels somewhere it is going to leak to somewhere else. That is where you are actually talking about the amount you are importing.

Q67 Dr Turner: If you regard sustainability standards as being an instrument, how do you think we could address the obvious problem—if some countries, like the EU countries, are observing sustainability standards and others are not—of the

development of a two-tier market, so that the impact of sustainability standards would not be felt as it should?
Mr Kronick: You are right, it is an issue. It is an issue in palm oil already, for example, in that there is a willingness to observe the standards amongst some European companies and much less so amongst Chinese companies. Greenpeace is in favour of sustainability criteria as part of an overall attempt to actually meet an environmental objective. If you focus on the tool as opposed to the outcome you could very easily end up with a situation where the bodies, entities and countries who are willing to adhere to them do, and those that do not. But then if it is the only mechanism you have in place it is unlikely to deliver the outcome.

Q68 Dr Turner: I think it is a given on this Committee that we never think there is a single magic bullet and, to quote our old friend Dave King, "You need every tool in the box". Do you think it is realistic to ever negotiate sustainability standards which would be effective in preventing land use change?
Ms Webster: I think it is realistic but it is only a tool in the box and it should not be seen as a silver bullet. I would put your response back at you, yes.

Q69 Mr Chaytor: Could you give us a quick assessment of the EU's Forest Law Action Plan and its successes and limitations?
Ms Webster: It successes, and quite a lot of what are talked about, are issues of working specifically on issues around land governance and land tenure. There is a lot of work and thinking which has gone into that. I think that is some expertise that the REDD debate needs to pick up. The issues around sustainability criteria have perhaps been where it has fallen down. It is only a way of monitoring the imports of timber, but not actually binding rules that ensure we are not using illegal timber, and that is a major flaw in the process. We would also go back to the issues of the resource that has been put into it. You have a few people struggling within the Commission to make this happen. It has been going through the EU for five years. I have been working on the EU energy package as well, and the comparison of speed with how quickly something has gone through and the fact it is going to take another couple of years before it is seen to be implemented; it is not something that has been given enough priority within the EU to be as effective as it could be.
Mr Kronick: The other thing I would add to that is that due diligence is not enough. The idea that if you say you are doing your best but your best is not good enough that is okay, it is not okay; and it would be just as equally applied to avoided deforestation credits or anything else.

Q70 Mr Chaytor: What were the reasons for the EU holding back on a complete ban on illegal timber? What are the major factors?
Mr Kronick: I am not an expert on EU timber policy.

Q71 Mr Chaytor: If it were to be revised in the future what would be the most important additional elements to include in FLEGT?
Ms Webster: I think what was just highlighted—talking about issues of due diligence and actually making this a law about how much is imported. The amount of resource which has gone into it has also got to be a major part of that.

Q72 Joan Walley: Finally, it has been an issue over many years and one which we have slightly covered in our previous report about how successful you think government procurement policies currently are in respect of sourcing sustainable and legal timber. Given the improvements that have been made, what further improvements still needs to be made on that?
Mr Kronick: My colleagues who camped out on top of Admiralty Arch and in the Cabinet Office have views about the past performance of government procurement. Because I do not work on it directly I cannot answer specifically.

Q73 Joan Walley: The point was that the direct action perhaps helped to promote awareness of the need to be sourcing sustainable and legal timber in respect of procurement. Are you not feeling more assured that that has now been incorporated into procurement practices? Presumably it is not so much of an issue for you; or is it still?
Mr Kronick: We are sure that it is now at least known that there are some issues around procurement. I never try to predict the future about future procurement. I am afraid I would be misleading the Committee because I just do not know enough about it—I am really sorry.

Q74 Joan Walley: Are you saying government practices have been successful then? That they are now likely to be?
Mr Kronick: No, the only thing I can definitely say is successful is that we highlighted their failings in the past. I cannot; I just do not know is the short answer.
Chairman: Thank you very much for coming in.

Tuesday 16 December 2008

Members present

Mr Tim Yeo, in the Chair

Mr Martin Caton
Martin Horwood
Mark Lazarowicz
Mr Ian Liddell-Grainger
Dr Desmond Turner

Memorandum submitted by the Sustainable Forestry Management (UK) Limited

EXECUTIVE SUMMARY

- Forest conversion and destruction, primarily in the tropics, account for the release of over six billion tonnes of CO_2 on an annual basis, representing some 20% of annual global GHG emissions. Deforestation is by far the largest source of emissions from the developing world aside from China and India. Tropical and sub-tropical forestry and land-use also offer over 30% of the climate mitigation that is available at reasonable cost between now and mid-century.
- Without a major contribution from tropical and sub-tropical forestry, the mid-century goal of climate stabilisation cannot be achieved. At the same time, there is a growing gap between demand and supply of wood products from natural forests. Demand is increasing for both industrial wood products, fuel wood and charcoal due to population and economic growth in the developing world. This growth in demand will continue for the next several decades. To achieve a significant reduction in tropical deforestation there must be a concomitant and a significant increase in afforestation and reforestation to both mitigate climate change while also meeting rising global demand for forest products. This requires a profound structural shift from the present situation in which over 80% of wood is harvested from native forests.
- Most of this change must occur in the developing world where rural populations are dependent on forest and agricultural areas for survival. Rising demand for tropical agricultural commodities for export must also be met. In the absence of real, stable and long-term financial incentives, continued conversion of forest land to agricultural use and illegal logging will not only continue but accelerate.
- Fortunately, even modest carbon prices ($<$\$20 per tonne CO_2e) can fundamentally change the economics of tropical forestry and land-use to promote conservation, sustainable forest management, improved agriculture and to incentivise investment in reforestation and afforestation. This, however, is dependent on market regulations being adopted by the world's carbon markets that allow the carbon storage capacity of all forests, including plantations, to be fully valued.

The role financial mechanisms might have in helping to address emissions from land use change

1. The carbon markets under a mandatory cap and trade approach are the only conceivable method by which the amount of capital required to address climate stabilisation can be delivered. Of course, regulation, taxation, and standards have a role to play but these should be complementary to the carbon market. The IPCC put the forestry and land use sector into the climate context and the Stern Review put it into an economic context. The contribution of land-use change and forestry, and the two are intimately involved with one another, to greenhouse gas emissions amounts to over 30% of annual global greenhouse gas emissions and provide over 30% of mitigation at less than €40 per $MtCO_2e$.The emissions from deforestation alone are greater than those contributed by the global transportation sector.[1]

2. The opportunity cost of reduced deforestation was identified in a subsequent study by Lord Stern. The study concluded that estimates of the opportunity cost of halving global deforestation reached as much as \$33 billion annually.[2] This number, which implies a cost of \$66 billion a year to stop deforestation, does not include the cost of establishing and maintaining plantations and managing existing forests on a sustainable basis to replace the lost supply from native forest harvest. The cost of such measures will be, at least, as much as \$66 billion. Annual investment in the forest sector of at least \$100billion for the next several

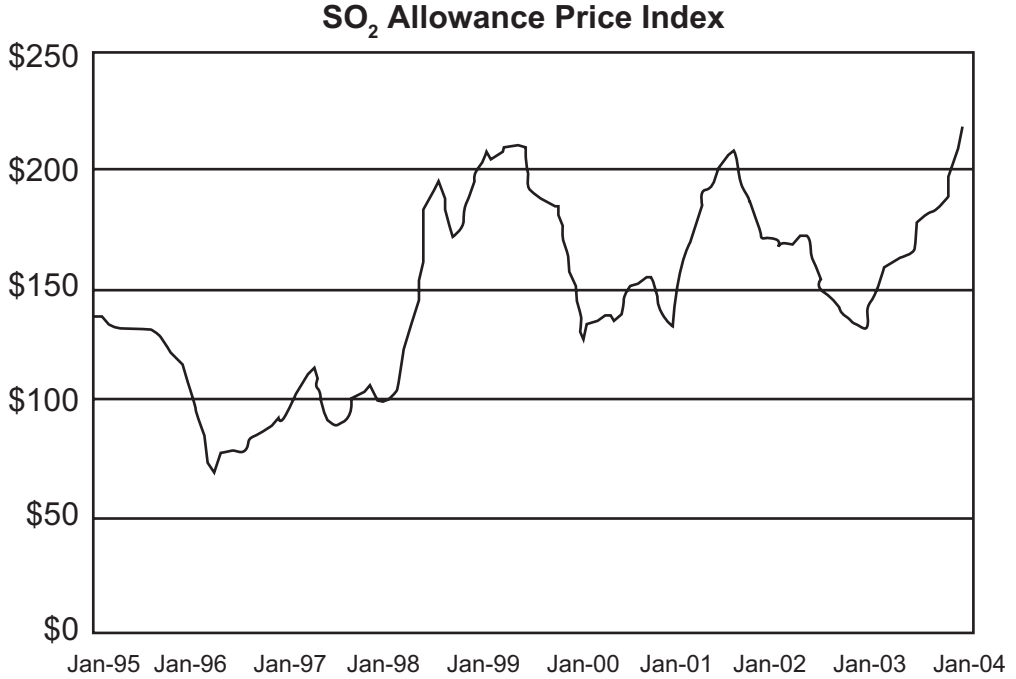
[1] Stern, Nicholas, 2006, "Stern Review: The Economics of Climate Change", November 2006: Watson, Robert et al. eds." Land Use, Land-Use Change, and Forestry. A Special Report of the IPCC", Cambridge University Press 2000.
[2] Stern, Key Elements of a Global Deal on Climate Change, London School of Economics and Political Science, 2008

decades will, in our view, be required to shift supply to sustainable sources. Although there are various proposals for public sector funding, donor governments and agencies show little sign of being able to contribute funding necessary at that level for the required period.[3]

3. Private sector capital is therefore essential to make any appreciable difference. The only source of capital on this scale is from mandatory emissions reductions schemes. The voluntary market and the public sector will never provide more than a small fraction of what is required. Cap and trade carbon markets should therefore be the preferred policy tool to tackle greenhouse gas emissions, in that it will deliver climate stabilisation goals most effectively, with greatest efficiency (at lowest cost), and most equitably.[4]

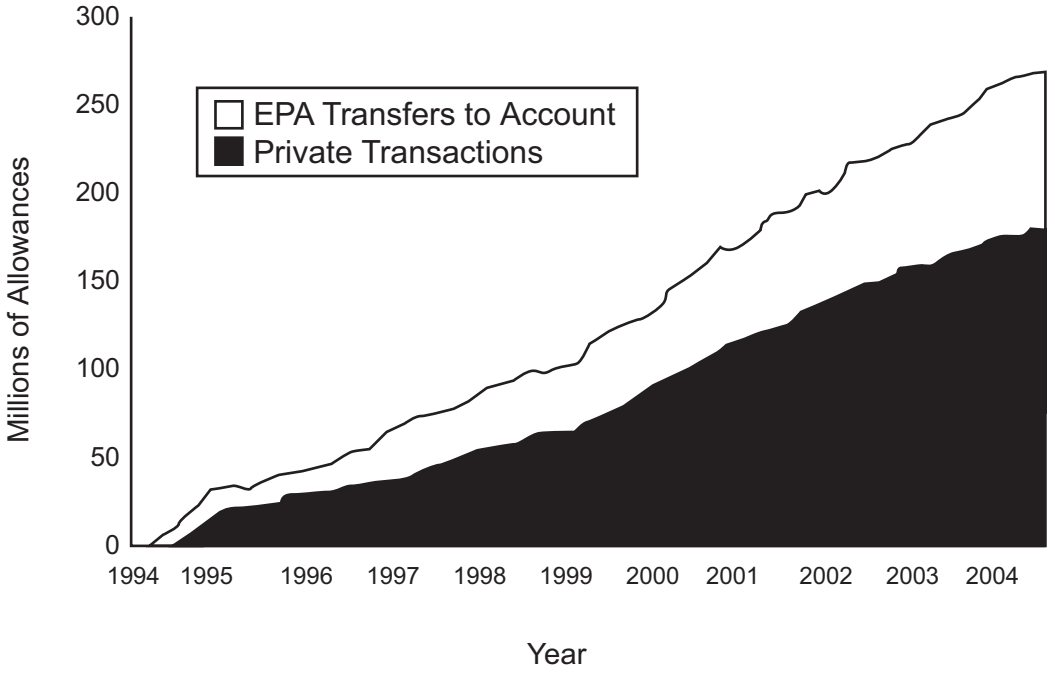
4. One of the primary concerns of policymakers in the design of an effective carbon trading scheme is to ensure that the cost of compliance does not jeopardise the competitiveness of those sectors of the economy bearing them, while ensuring that the environmental goals of the scheme are achieved. Cap and trade schemes have already demonstrated their efficiency.[5] Forest-based credits are essential to keeping the cost of compliance at a reasonable level.[6] A second concern of policy makers is to ensure that carbon prices are high enough to encourage a transition to low carbon technologies. Forest credits are not, as sometimes asserted, "cheap" and they will not "flood" the market or reduce compliance costs to such an extent that they will reduce incentives for industrial change. The best estimate is that they could potentially reduce overall compliance costs by some 13%.[7]

5. The use of trading emissions credits to achieve environmental outcomes is no longer new. It is instructive to look at the success of the US SO_2 market, the precedent for the greenhouse gas market. When a trading scheme was initially proposed as a method for bringing down the levels of sulphur dioxide (the cause of "acid rain"), many economists and industry representatives predicted that the cost of a tonne of SO_2 would be far greater than that which would be delivered by "top-down" governmental regulation and that the environmental benefits of reduced SO_2 emissions would take years to accrue. Informed estimates prior to trading predicted costs per tonne in the thousands of dollars.[8] The success of the SO_2 market, in terms of price and speed of compliance refuted both of these fears. As the figures below show, trading has increased substantially over the life of the program, while prices remained significantly lower than expected. The environmental benefits are now clear to all observers (see maps overleaf). The latest compliance report compiled by the US EPA shows compliance with the program at 100%, and the benefit cost analysis shows a 40:1 benefit/cost ratio ($122 billion: $3 billion).[9]



[3] Castro, G. and I. Locker. 2000. Mapping Conservation Investments: An Assessment of Biodiversity Funding in Latin America and the Caribbean. Washington, D.C.: Biodiversity Support Program.
[4] *op. cit.* Stern, Key Elements of a Global Deal on Climate Change
[5] See: "US EPA Acid Rain Program 2004 Compliance Report."
[6] A Cost Curve for Greenhouse Gas Reduction, *The McKinsey Quarterly* (February 2007).
[7] Pedro Piris Cabezas and Nathaniel Keohane. "Reducing Emissions from Deforestation and Degradation in Developing Countries (REDD): Implications for the Market." Environmental Defense: 22 May 2008. http://www.edf.org/documents/7975_REDDandCarbonMarketAnalysisReport_EDF_0508.pdf
[8] See Bohi, Douglas and Dallas Burtraw, "SO_2 Allowance Trading: How Experience and Expectations Measure Up," Resources for the Future Discussion Paper, February 1997. ICF Consulting forecast prices at $1,500 per tonne at the inception of trading.
[9] See: "US EPA Acid Rain Program 2004 Compliance Report."

Figure 8: Cumulative SO2 Allowances Transferred (through 2004)



Source: EPA

Figure 16a: Annual Mean Ambient Sulfur Dioxide Concentration, 1989 through 1991

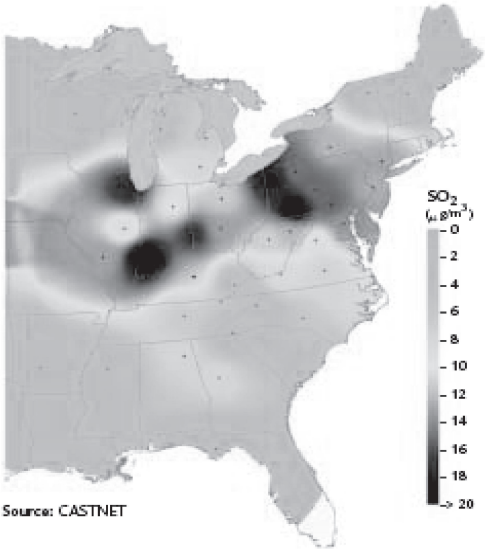
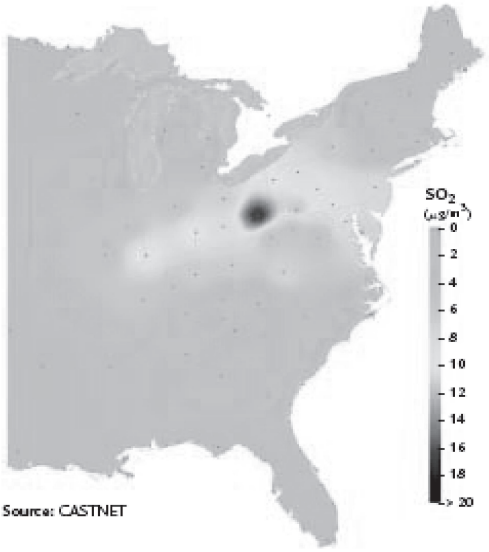


Figure 16b: Annual Mean Ambient Sulfur Dioxide Concentration, 2002 through 2004



6. A global carbon market is more complex than the national SO_2 market. However, the principles underpinning the market are identical: price discovery and emissions trading can deliver the environmental benefits of reduced industrial pollutants at the lowest cost to industry and to society, it can do so in the near to medium term. Unlike various favoured technologies, biological sequestration is available almost everywhere and at a reasonable cost. A critical component of the SO_2 scheme was that it did not prescribe how the reductions were made only what had to be achieved. A fatal flaw in both the Kyoto and EU trading schemes is that they seek to prescribe how reductions must be made—for example, by restricting or banning the use of forest and land-use based carbon credits. The result is both to artificially increase costs and to cause perverse side effects such as continued tropical deforestation coupled with reforestation in temperate zones such as the United States. (see map below in Paragraph 29)

The environmental and social risks and benefits of using such financial mechanisms

7. In the absence of private sector, market-based financing mechanisms there will be no change in the fundamental economics of land-use and forest management in the developing world. Unless that change occurs the current trends will continue regardless of environmental and social side effects, most of them negative.[10] If, alternatively, such mechanisms are used, the most carbon rich areas will be preserved because they become more valuable and land-use policies will be adjusted to take advantage of the additional value of carbon sequestration. In other words, such mechanisms will shift priorities to preserve intact forests because they have many times more carbon than any other areas and thus enhance conservation goals immeasurably in terms of bio-diversity, fresh water resources, local weather stabilisation and soil preservation.

8. The social benefits of stabilising the environments in which the poorest and most vulnerable people live has been amply demonstrated by the work of the Green Belt Movement, among many others, which resulted in a Nobel Peace Prize. The risk of continued unsustainable practices are also clear: continued deforestation, desertification, flooding and the inevitable displacement of people turned into environmental refugees. One of the greatest advantages of markets and private sector investment is they require the payments to reach the people who ensure the sequestration and continued storage of the carbon. This, in turn, requires land tenure to be secured by those people and they receive the payment for their services. Contrary to many rumours of "land grabs," our real experience is that the potential value of carbon storage to poor communities and indigenous people accelerates the resolution of such issues in their favour. Markets and investors will not purchase or seek credits from sources which are the subject of dispute nor from sources, which result from the abuse of human rights.

9. There is, in contrast, a substantial risk that government-led initiatives will be subject to political incentives, as opposed to economic, leading to a diversion of funds to non-productive use, reduced amounts actually received by local people and communities and will tend to favour vested interests. Governments have a poor record in conservation. Most "protected areas" in the developing world are, in fact, unprotected not least as a result of inadequate financial and human resources because government funding is both inefficient and subject to competing priorities. Public sector funding also tends to be relatively short term. It is essential that payments for carbon sequestration and storage persist and are received by local people for decades to come. If the payments are interrupted, by government diversion or otherwise, there will be an immediate reversal of behaviour and reallocation to alternative use: timber and agriculture.

10. The social and conservation benefits of tropical forest preservation, restoration and sustainable management are multiple and have been extensively documented.[11] These include providing both climate mitigation and the means of adaptation to climate change, particularly for the world's most vulnerable people. All other financial mechanisms have been tried: government to government grants, multi-lateral loans, foreign aid, charitable donations, not-for-profit organisations; debt for nature swaps; purchases of land by wealthy philanthropists; and all have failed. The only financing mechanism yet to be tried is market-led private sector investment. The environmental and social risks of not trying it and repeating past failures are far greater than the risks of doing so.

The use of land use change credits in carbon markets and in meeting emissions targets

11. Soon after publication of the Stern Review, Vattenfall AB and McKinsey & Company published the results of studies that put the economics of land use into a business context; it put forestry and land-use, and particularly in the tropics and sub-tropics, where 90% of deforestation occurs, onto a price curve in comparison with other climate mitigation strategies. The result has been a fundamental reversal of strategy and rapidly growing awareness that mankind cannot reach its goal of climate stabilisation by mid-century without a radical reduction in deforestation and a radical increase in reforestation and afforestation, particularly in the tropics and sub-tropics. This requires a fundamental change in land-use policy.

12. The McKinsey analysis has exhaustively examined potential abatement scenarios for reduction of emissions to 31 $GtCO_2e$/yr at a cost below 40 €/tCO_2e[12]. Reductions to 450 ppm at a price less than 40 €/tCO_2e require the inclusion of abatement opportunities from avoided deforestation, reforestation, and agriculture. Forestry and agriculture represent over 30% of the available mitigation potential to deliver on this target. Beyond business-as-usual, the potential 2030 abatement from reducing deforestation is $\sim$3.3 $GtCO_2e$/year, from reforestation is 3.4 $GtCO_2e$/year, and from agriculture 1.5$GtCO_2e$/year.[13] This total, of over 8$GtCO_2e$/year, is larger than potential abatement from any other sector including the industry and energy sector. Without forest and agricultural offsets, achievement of emissions reductions targets at an acceptable cost is simply impossible.

[10] See "The Economics of Ecosystems and Biodiversity, an interim report," published by European Communities, May 2008
[11] See FAO Millennium Goals; also see Millenium Ecosystem Assessment at www.millenniumassessment.org
[12] Vattenfall, 2007, Global Mapping of Greenhouse Gas Abatement Opportunities up to 2030 http://www.vattenfall.com
[13] A Cost Curve for Greenhouse Gas Reduction, *The McKinsey Quarterly* (February 2007).

13. One of the myths of the debate about forests is that they are "cheap" sources of carbon offsets. As McKinsey has demonstrated, this is simply not true.[14] The costs of forest activity vary widely. Avoided deforestation in Indonesia, for example, is among the most expensive of all sources of offsets as it competes with the use of the land for oil palm plantations. The cost of afforestation and reforestation throughout the tropics vary from hundreds to thousands of dollars per hectare and this does not take into account the political risk presented by many developing countries. The related myth is of "flooding".[15] Both myths need to be discarded if a rational approach to climate change is to be adopted.

14. While the European Union is considering the proposed Parliamentary amendments to include forest credits for the first time,[16] it should be noted that all other emissions trading systems have adopted rules that incorporate forest-based credits. In New Zealand, forestry is the first sector covered and the inclusion of agriculture is contemplated in the future[17]; in Australia, the New South Wales ETS includes offsets from forestry and it is almost certain that the proposed national scheme will as well;[18] in the United States the Regional Greenhouse Gas Initiative (RGGI) makes provision for forestry credits as does the Western States Climate Initiative which provides that covered installations may use forest credits for up to 49% of their compliance obligation.[19] Both the US Senate and the House of Representatives have now included provisions for international forest carbon credits in draft legislation.[20] Finally, it should not be forgotten that the Kyoto Protocol's CDM and JI flexible mechanisms both include, in principle, the use of forestry credits and that all Annex 1 countries are entitled to include their forest and agricultural carbon sinks in their national accounts for this purpose.[21]

The World Bank's Forest Carbon Partnership Fund

15. The World Bank has been instrumental in leading the development of carbon markets. The Prototype Carbon Fund and its successors, the Bio-Carbon and Community Carbon Funds have lead the way for many years. The Forest Carbon Partnership can serve the same function in respect to tropical deforestation. Pioneering efforts such as these are essential but cannot (and are not designed to) marshal the scale of resources required to solve problems of this magnitude. The pathfinder role is of critical importance to developing policy approaches, to reducing emissions associated with deforestation, and to supporting the development of strong institutions and frameworks, particularly in the developing world. Without investments in local and national institutions, legal and other governance frameworks, and enhanced technical capacity, developing countries' ability to participate in and benefit from carbon markets in a timely and efficient manner—if at all—will be significantly hindered. Investments in national and local institutions will allow for adequate levels of engagement by all sectors of society, increasing the likelihood of success for any national-level emissions target. Information and lessons learned must be shared within and across regions. Appropriate public policy and legal reforms, including land use policies and land tenure, must be addressed to ensure the widest participation particularly of lesser developed countries. The World Bank is well suited to this role.

16. The FCPF should be used to build capacity in those countries requiring technical help in establishing and monitoring land-use and deforestation baselines. Funds should be used for terrestrial carbon and biomass inventory techniques, regulatory and monitoring structures, land tenure resolution, delineating the role of protected areas, and encouraging improvements to agricultural productivity. The long-term value for climate, biodiversity, and livelihoods from these types of investments will far exceed the costs. In addition, the knowledge and capacity generated can be directed toward complementary programs in the development and environmental management sectors, and used to support achievement of the Millennium Goals and those of the other Rio Conventions.

The role of technologies such as remote sensing in the verification of land use change credits

17. Concerns over measurement of carbon biomass have been addressed over recent years. The science and technology is now both strong and coherent in accurately assessing long-term gains and losses of biomass carbon and other emissions from the forest and land use sector. Landholders and government agencies now measure and monitor forest status and growth using a combination of techniques including direct field measurements, satellite and aerial photography and computer modelling. Many protocols for measuring and monitoring carbon project benefits exist.[22] The Good Practice Guidance for Land Use,

[14] Ibid.
[15] Supra n.7.
[16] See European Parliament Environment Committee Doyle compromise Amendments
[17] See Ministry for the Environment, "The Framework for a New Zealand Emissions Trading Scheme," September 2007
[18] See Australia Department of Climate Change, "Carbon Pollution Reduction Scheme Green Paper," July 2000
[19] Western Climate Initiative Design Recommendations for the WCI Regional Cap and Trade Program—September 2008
[20] See Boxer-Lieberman-Warner Climate Security Act, Senate Bill 3036 and the Dingell Boucher Draft House Bill at http://energycommerce.house.gov/Climate_Change/CLIM08_001_xml.pdf
[21] See Kyoto Protocol, Articles 3.3, 3.4 and Article 5.
[22] Brown, S. O Maseru, J Sathaye. 2000. "Project-based activities" in R. Watson, I Noble, and D.Verardo (eds), Land Use, Land-Use Change and Forestry; "Special Report to the Intergovernmental Panel on Climate Change", Cambridge University Press, Chapter 5 and see The Revised 1996 IPCC Guideline for National Greenhouse Gas Inventories and MacDicken, 1997, A guide to monitoring carbon storage in forestry and agroforestry projects, Winrock International Institute for Agricultural Development

Land-Use Change and Forestry (GPG-LULUCF)[23] produced by the IPCC provides methods and guidance for estimating, measuring, monitoring and reporting on carbon stock changes and GHG emissions. It is consistent with guidance for other sectors and can be used to quantify changes in GHG from a diverse range of forestry and land-use management practices. The guide assists in the production of inventories for the sector that neither "over" nor "under" estimates. It supports the development of inventories that are transparent, documented, consistent over time, complete, comparable, assessed for uncertainties, subject to quality control and quality assurance, and efficient in the use of resources.

18. Measuring and monitoring deforestation emissions at the national level is practical, reliable, and cost-effective. A combination of remote sensing and field-based surveying is an appropriate methodology to ensure an adequate level of accuracy. In the last decade, advances in computer modelling have created the possibility for nearly every country to monitor its deforestation rates to a high degree of accuracy. Broad deforestation can be measured with a margin of error of just 0.5%, and up to a 10% error margin for illegal logging.[24] Even with these relatively small margins of error, the principle of conservativeness prevails both in the Kyoto Protocol and in the IPCC GPG-LULUCF.[25] The argument that carbon measurement is not accurate enough to justify forest credits' participation in emission trading schemes no longer holds water.

Field-based monitoring of biomass

19. In order to reliably measure and monitor biomass, countries must develop a network of permanent biomass plots including the range of major rainfall and elevation gradients, using standardized methodologies.[26]

Remote Sensing monitoring of forest cover

20. Countries can conduct comprehensive, high-resolution baselines of deforestation patterns that can be updated every two or more years. This is a cost effective methodology given the availability of Landsat and similar satellite data, and the availability of free data for circa 1975, 1990, 2000 and expected for 2005. Because these data have a resolution of 30 meters, clearings of one hectare in size can be observed. In addition, these data enable the creation of a nearly complete global baseline of deforestation patterns and rates, with better coverage in more recent years.[27]

21. With modest investment in capacity building and committed international coordination, all countries can be capable of precise and comprehensive monitoring of deforestation and resulting CO_2emissions, with updates every two to five years.[28] This would produce additional benefits for countries, such as allowing countries to deliver required information to the other Rio Conventions, including the Convention on Biological Diversity(CBD).

22. International coordination for measuring and monitoring forest carbon is already underway. The Group on Earth Observations (GEO) is linking together environmental monitoring systems, data sets, and models to produce the Global Earth Observation System of Systems (GEOSS), which will be the world's most scientifically and technologically advanced and robust monitoring system to ensure the availability and sustainability of repetitive long-term observations and reliable methodologies for measuring forest carbon. This global system aims to make its remote sensing tools and results universally available and importantly, will render national data in a comparable format.[29] The GEO comprises 73 countries and the European Commission.

[23] IPCC, 2003, Good Practice Guidance for Land Use, Land-Use Change and Forestry, http://www.ipcc-nggip.iges.or.jp/public/gpglulucf/gpglulucf.htm

[24] Tollefson, Jeff, Nature, "Save the Trees," Volume 452, 6 March 2008

[25] See "GOFC-GOLD, 2008, Reducing greenhouse gas emissions from deforestation and degradation in developing countries: a sourcebook of methods and procedures for monitoring, measuring and reporting," GOFC-GOLD Report version COP13-2, (GOFC-GOLD Project Office, Natural Resources Canada, Alberta, Canada)

[26] Conservation International currently operates an international network of field stations in tropical and sub-tropical forests, called the Tropical Ecology, Assessment and Monitoring (TEAM) network. This network has adopted standardized methodologies for monitoring changes in biomass at local, regional and global scales. TEAM also has implemented standardized methods for evaluating the impacts of climate change and land cover change on tree species diversity. For more information on TEAM, visit: http://www.teamnetwork.org. See also the RAINFOR project: http://www.geog.leeds.ac.uk/projects/rainfor/.

[27] The availability of the 2005 Landsat data is contingent upon the continued support of the Landsat Continuation Program of the United States National Air and Space Administration (NASA). CI encourages the continued availability and low cost of Landsat and similar imagery.

[28] In fact, Brazil's Instituto Nacional de Pesquisas Espaciais (INPE) is already engaged in monitoring annual change in forest cover in the Amazon using Landsat data, through its Project PRODES. See PRODES website for more detail: http://www.obt.inpe.br/prodes/index.html.

[29] See Group on Earth Observations, "How the Group on Earth Observations (GEO) is advancing global collaboration on monitoring forest carbon," June 2008

The success or otherwise of Government efforts in reducing emissions from international land use change

23. The history of emissions from land-use change since 1992 speaks for itself. No government in the developing world has reduced such emissions. On the contrary, such emissions are rising and are projected to continue to rise. Indonesia and Brazil are, respectively, the third and fourth largest emitters of greenhouse gases and almost all of this is due to deforestation and land-use change. Deforestation and land-use change are the overwhelming source of emissions from the developing world excluding India and China. This is true of the latter two countries largely because of almost complete deforestation and conversion to agriculture of their native forests prior to 1992.

24. The lesson is clear: Government action cannot, except in totalitarian societies (and even there only for limited periods), change the underlying forces of demand and supply for timber and agricultural products. Indeed, governments are responsible for exacerbating the situation through perverse subsidies which encourage conversion of forest to agriculture. These subsidies now extend to biofuels and to the translocation of populations to remote areas to relieve population pressures.[30] Only those countries with very small populations relative to forest and land area (such as Surinam and Guyana) or those which have suffered from persistent violence (such as Congo and parts of Indonesia), have been able thus far to resist the pressures of increasing timber and agricultural demand. Most of those countries are now also likely to succumb to the same land-use patterns seen in other countries; as they respond to global demand unless the fundamental change in values, which a carbon market can provide, are delivered to them.

The Congo Basin Forest Fund

25. In our view the Congo Basin Fund has the advantage of concentrating a large-enough sum to begin to make a difference in an area of the world where it is difficult for the private sector to operate efficiently. The key question is what will the funds be used for? If used to establish the necessary legal, administrative, technical and scientific infrastructure to enable the countries of the area to attract private sector capital to the forest and carbon forest sectors, it will be money well spent. It is particularly important that the granting and supervision of forest concessions be radically improved to ensure that real sustainable use of this vital resource is achieved. This requires, above all, greatly increased efforts in respect to governance, enforcement and training as well as improvements in the environment for foreign investors.

26. Land-use policy as a whole needs significant improvement in the Congo Basin not only in respect to forest management but in respect to agro-forestry and agriculture in order to reduce pressures on existing forests and to increase agricultural yields. Indigenous people, particularly forest dwellers, must see direct benefits of good stewardship of carbon-rich resources and be given the means to enforce their land rights. The non-timber forest products and services can be of enormous value but need to be the subject of substantial work. The eco-tourism potential in the area, for example, is substantial but again requires the active participation of the private sector. The Congo Basin Fund, if focused on establishing the public sector framework necessary for the private sector, as opposed to trying to substitute for it, can be of significant benefit. To do so, however, it must be managed by people with private sector experience and disciplines. It should be, in our view, used as a means to leverage private sector capital to enable the countries in the area to manage themselves towards low-carbon development, not to become dependent on a new form of foreign aid.

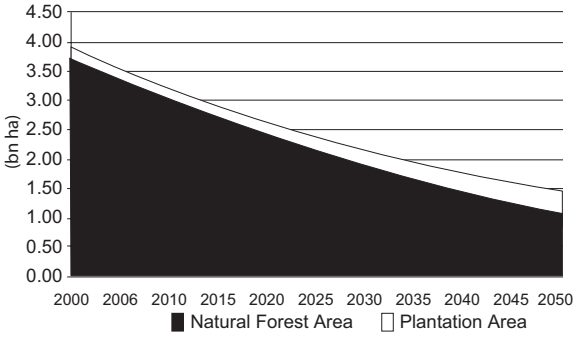
The interaction of carbon finance mechanisms with the timber trade

27. In any assessment of the need for carbon forestry in the developing world it is critical to understand that without it the laws of supply and demand will overwhelm, as they have for decades, all other efforts to address the loss of native forests. Projected world demand for industrial round wood and sawn wood will be met partially by an increase in plantation forestry, particularly in the developed world; the balance of timber supply together with consumption of wood for fuel will, unless forest carbon offset projects are incentivised, continue to be met through the destruction of native forests in the developing world. At current rates of exploitation the tropical forests will be largely exhausted by 2050 and will have ceased to be intact ecosystems.[31]

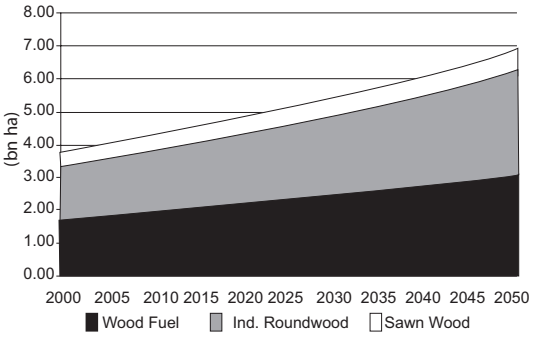
[30] The Brazilian Minister of the Environment has recently reported that the Government of Brazil is the leading source of deforestation in the Amazon. See: http://news.bbc.co.uk/1/hi/world/americas/7643346.stm

[31] "State of the World's Forests 2005", "Global Forest Resource Assessment 2005", FAO 2006, and SFM research

Total Forest Area (World)



Total Wood Consumption (World)



28. Recent trends show an alarming picture of changes in the world's wood growing stock.[32] Deforestation is concentrated in the poorest areas of the world along the tropical and sub-tropical belt. As can also be seen, reforestation is increasing in the temperate forests of the developed world. In other words, the world's most important forests, measured in terms of carbon sequestration, as well as other environmental services such as bio-diversity and fresh water, are being destroyed and the least important are being restored.

29. Total global forest area in 2005 was 3.95 billion hectares, just over 30% of the world's land area. Tropical forests account for some 6% of the world's land area. Deforestation, mostly due to land conversion to agriculture, runs at nearly 13 million hectares annually and almost all of it in the tropics. Net forest loss (including temperate forests) from 1990–2000 was 8.9 million hectares annually; from 2000–05 this slowed a net loss of 7.3 million hectares per year due to reforestation in the Northern Hemisphere but deforestation is increasing in the Southern Hemisphere. South America and Africa have recently shown the largest annual net loss of forest by far, 4.3 and 4.0 million hectares respectively.

30. Forest plantations are being planted at an increasing rate though they make up only about 4% of total forest area, or about 140 million hectares. About 78% of forest plantations are established for wood and fibre production (known as "productive plantations"); the other 22% have been established for water and soil conservation. From 2000–05, productive plantations increased by 14 million hectares (about 2.8 million hectares annually). Productive plantations currently stand at about 109 million hectares or about 2.8% of the total global forest area, up from about 1.9% in 1990. Ten countries account for 73% of productive forest plantations with China, the United States, and Russia accounting for more than half of the total.[33] At 2000–05 rates, the rate of plantation establishment would have to increase by 2.6 times in order to offset global net forest loss of 7.3 million hectares per year. This, of course, ignores the differences in biodiversity and productivity between North and South and the crucial role which tropical forests play in the lives of the rural poor in the developing world.

[32] Kauppi, Pekka, "The Forest Identity", University of Helsinki, 2006
[33] Food and Agricultural Organisation of the United Nations, "Global Forest Resources Assessment 2005: Progress towards sustainable forest management," FAO Forestry Paper 147, Rome 2006.

Demand for Wood Products

31. Consumption of wood products is dominated by the use of wood for energy, industrial uses and for sawnwood. Disparities between regions are significant; fuel for wood is the primary use in Africa while it is a relatively minor energy source in North America. The US, on the other hand, is the largest market for industrial uses of wood. On a global basis, fuelwood accounts for about 46% of overall consumption with industrial roundwood and sawnwood accounting for the other 54%. In the developing world, however, wood is the primary source of energy, constituting 87% of wood use in Africa, 68% in Asia, and 54% in Latin America and the Caribbean.[34] There is a growing disparity between demand for wood and what can be supplied by natural forests:[35] Wood consumption is also set to rise in some regions as governmental biomass energy targets take effect in the next decades.

32. Consumption of wood products is set to increase dramatically in the developing world due to economic and population growth and rising standards of living. From 2000–05, China's imports of logs increased by 500%, from 5 to 25 million m^3 annually; total imports of forest product increased by 300% from 1997–2004. Some predict that China will face an annual RWE (roundwood equivalent) shortage of 120 million m^3 by 2010. India's population will grow to about 1.25 billion people by 2020, 70% of whom will be between the ages of 16 and 65. By 2020, it is estimated that India will face a shortage of industrial log supply of 20–70 million m^3. Likewise, consumption of industrial roundwood in Latin America is forecast to grow from 120 million m^3 in 1990 to over 200 million m^3 by 2020.[36]

33. It is clear that curbing deforestation will restrict the supply of wood flowing to the market from natural forests. Therefore it is also clear, that given projections of population growth and increased global purchasing power, that the area of productive plantations must be dramatically increased to satisfy the increased demand for wood products.

34. The market is responding to the need for an increase in wood supply from plantations. In 2000, plantations supplied about 35% of harvested roundwood, a figure forecast to grow to about 45% by 2030 and to about 50% by 2040. In volume terms, roundwood production was about 331 million m^3 in 1995 and is projected to increase to 906 million m^3 by 2045.[37] However, even with an increased supply of industrial roundwood from plantations, the FAO has concluded that present plantation development is not sufficient to offset growing consumption, deforestation and declining harvests from native forests.[38] Clearly additional incentives are required. The logical incentive is valuing carbon.

35. Globally, consumption of woodfuel was 1.8 billion m^3 in 2000[39] and is expected to grow by about 1.3% annually. The International Energy Association forecasts that in 2030, 2.6 billion people will rely on traditional biomass for cooking and heating, nearly all of which will be produced and consumed locally.[40] This ignores demand from the developed world for biomass fuel a significant part of which must come from imported wood and agricultural products.

36. Government policy which combines energy security and climate change concerns could also have an effect on wood demand. The European Union, for instance, has set policy targets for the use of renewables in the energy supply of 12% by 2010 and 20% by 2020. As wood is a major part of the renewables base, meeting these ambitious targets will increase the demands of the forestry sector. In fact, a wood supply deficit of 185 million m^3 by 2010 and up to 448 million m^3 by 2020 is forecast if the EU achieves the goals of its renewables policy.[41]

Carbon Credits and Deforestation

37. Credits from avoided deforestation and reforestation allow a real commercial alternative value to be placed on tropical forests if they are integrated into carbon credit trading systems in a fungible and transparent manner. The carbon market can in many cases "tip" the balance of economics in favour of forest conservation. According to the World Bank's most recent study of the subject, the world loses annually about 12 million hectares of tropical forest; tropical forest value cleared to pasture is worth between $200–500 per hectare. Based on its average CO_2 storage per hectare of 500 tonnes, its value as a carbon store is between $1,500–10,000 per hectare (@ $3–20/t$CO_2$).[42] Even at the low range of carbon prices, continued deforestation would become unprofitable in many land systems:[43]

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[34] Food and Agricultural Organisation of the United Nations, "State of the World's Forests 2007," FAO Rome 2007.
[35] Resource Information Systems Inc. and Hancock Timber Resource Group research, October 2000.
[36] op. cit. Nillson and Bull
[37] Sampson, R. Neil et. al., Millennium Ecosystem Assessment, "Ecosystems and Human Well-Being: Current States and Trends—Chapter 9—Timber, Fuel, and Fiber."
[38] FAO, "Role of Forest Plantations as Substitutes for Natural Forests in Wood Supply—Lessons Learned from the Asia-Pacific Region," Forest Plantations Thematic Paper Series, United Nations Food and Agriculture Organization (FAO), Rome, Italy, 2001.
[39] FAO, 2003b: State of the World's Forests 2003, FAO, Rome, Italy.
[40] IEA (International Energy Agency), 2002a: World Energy Outlook, 2002, IEA, Paris, France.
[41] UNECE, FAO, University Hamburg, "Wood Resources Availability and Demands—Implications of Renewable Energy Policies—a first glance at 2005, 2010, and 2020 in European countries," 19 October 2007.
[42] *op. cit.* Chomitz
[43] *op. cit.* Chomitz

Illegal Logging

38. Illegal logging must first and foremost be understood as an economic activity in which the participants are responding to demand for a commodity. Illegal logging costs developing countries worldwide around US$15 billion a year in lost revenue[44]. It also causes deforestation, environmental degradation and biodiversity loss measured at many times that.[45] It damages livelihoods and is associated with corruption, organised crime and the fuelling of armed conflicts. But like the trade in illegal drugs, it is pointless to ignore the underlying demand for the product. Fortunately there is a lawful way to meet the demand and on a cost-competitive basis by valuing the carbon in both existing forests and planted trees. This will incentivise governments, providing new resources to improve law enforcement and to incentivise private sector enterprises to expand their activities in developing countries.

39. The economic and environmental consequences of illegal logging can be extensive. By definition, reliable statistics on illegal activities are difficult to gather and quantify. The Center for International Forestry Research (CIFOR) has made some estimates of the costs and volume of illegal logging activities in various countries:

- In Indonesia, as much as 50 million cubic meters of timber are estimated to be illegally cut-down each year.
- At least one-fifth of Russia's annual timber harvest is taken illegally, and illegal harvesting may account for as much as 50% of the total in East Asia.
- In Cambodia in 1997, the volume of illegally harvested logs was ten times that of the legal harvest.
- In Cameroon and Mozambique about half of the total annual timber harvest is illegal.
- In Brazil, an estimated 80% of timber extracted each year in the Amazon is removed illegally.[46]

40. In monetary terms, the estimated value associated with the production of illegal roundwood, lumber, and plywood products was $23 billion in 2002. About $5 billion of these products entered world trade, about 7% of the value of world trade in primary wood products ($69 billion). In volume terms, illegal logging represents approximately 8–10% of global wood products production. This number does not include secondary wood products, furniture, or pulp and paper; including these products would suggest that illegal logging has an even greater impact on the global forestry industry. Most illegal wood products are used domestically. In aggregate, it is estimated that 8% of the world's roundwood is illegally sourced; in export markets, estimates are that 12% of softwood roundwood, 17% of hardwood roundwood, and up to 23% of plywood are illegally sourced.[47]

41. Aside from its direct economic impacts, illegal logging can affect the resource base in a way that makes future legal commercial exploitation unattractive for project developers:[48] The environmental impacts of illegal logging are also severe. Illegal logging can be responsible for a host of environmental problems, ranging from deforestation, habitat destruction, loss of biodiversity, loss of watershed protection, and carbon emissions. Crediting forests with payments for carbon emission reductions provides a sustainable alternative and can reduce the incentive for illegal logging and its negative repercussions.

42. If the rate of tropical deforestation is to be swiftly reduced and if we are to achieve atmospheric carbon stabilization in the medium term, the rural poor of the developing world must be provided with sustainable, alternative ways of life. To accomplish this it must be based on a reliable long-term supply of compensatory payments and incentives, which substitute for illegal logging as well as other lawful forms of forest degradation.

Government progress on tackling illegal timber since the EAC 2006 Report on sustainable timber

43. SFM is not in a position to comment on this.

Government sustainable procurement of forest products

44. Encouraging public sector purchase of environmentally certified forest products has been useful in encouraging timber producers and distributors to move towards sustainable practice. Of even greater potential is encouraging the public, not least by government example, to make similar demands. There is evidence of major forest product companies responding to such demand and it should be encouraged.

[44] World Bank: http://web.worldbank.org
[45] The Economics of Ecosystems & Biodiversity, Interim Report, European Communities, October 2008.
[46] See http://www.cifor.cgiar.org/publications/Corporate/FactSheet/illegal_logging.htm
[47] Seneca Creek Associates LLC and Wood Resources International LLC, "Illegal Logging and the Global Wood Markets—The Competitive Impacts on the US Wood Products Industry," prepared for American Forest & Paper Association., November 2004.
[48] Nillson, Stan and Gary Bull, "Global Wood Supply Analysis," presentation to 46th Session of the FAO Advisory Committee on Paper and Wood Products, May 31, 2005, Vancouver, Canada.

The success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan, and Government support for it

45. SFM is not in a position to comment on this.

13 October 2006

Memorandum submitted by the Carbon Markets and Investors Association (CMIA)

1. Executive Summary

- Measures to address deforestation, afforestation and reforestation should be a key element of climate change policy, given the contribution to global greenhouse gas emissions resulting from deforestation, and the scale of the sector's potential to achieve carbon sequestration.
- The CMIA anticipates that progress will be made at international level to develop more workable financial mechanisms to incentivise afforestation and to halt deforestation, but notes that the existing regime has been wholly inadequate in this regard.
- To achieve maximum effectiveness, a range of policy tools and both public funding and private sector finance is likely to be required. Public funding should be focused on policy development and capacity building in relevant developing countries, with private finance focusing in the short term on pilot projects and thereafter on larger scale project and programmatic activities.
- To attract private investment, any scheme will need to develop robust but useable modalities and methodologies, that apply standards equivalent in terms of rigour to those applicable in non-forest related CDM. In that context, forest related credits should be valued no differently from those derived from industrial projects. Given the location of these projects, in order to attract private sector engagement, it will be important to ensure direct project crediting, instead of or in conjunction with country-level crediting.

2. The Role Financial Mechanisms might have in helping to Address Emissions from Land Use Change

2.1 To bear any realistic prospect of success, policies aimed at mitigating climate change have to address the forestry sector, and the potential solutions that this sector offers. According to the IPCC[49], "forestry" accounts for 17.4% of global annual greenhouse gas emissions, essentially as a result of the burning or decomposition of tropical forests. The proportion associated with the broader category of landuse change is around 30%. Modelling undertaken for the UK's Eliasch Review suggests that the global economic cost of climate change caused by deforestation could reach $1 trillion a year by 2100. It is therefore a material part of the problem. However, if engaged upon at scale and in an effective manner, reduced deforestation, afforestation and reforestation could provide a relatively rapid contribution to the global portfolio of low carbon measures required to reduce GHG emissions.

2.2 For both positive and negative reasons, therefore, deforestation, afforestation and reforestation should be a key element of climate change policy. Notwithstanding this, the international policy community has been very slow to grasp the nettle. Accordingly, current investment levels in relation to activities in the productive forestry sector that can make a contribution to climate change mitigation (tree plantations and sustainable management of natural forests) are far too low to have any meaningful impact. For non-productive tree planting and forest conservation only philanthropic funding exists, which is not nearly enough to change global deforestation trends.

2.3 Carbon markets can provide an effective incentive for increased investment in productive forestry activities, non-productive tree planting and forest conservation through the creation of a tradable asset: the certified CO_2 emission avoidance from forests or removal into forests, also called "carbon credit". CMIA believes that the engagement of the carbon markets is critical to the success of mitigation action in relation to land use change and forestry. This conclusion is one that has also been reached by Mr Eliasch.

2.4 There was some debate in the recent Accra meetings as to whether actions in this area should be financed through public or private funding. The CMIA anticipates that significant contributions from both will be required. Public funding will be very important for initial capacity building and the development of national programmes, while the private sector offers the only realistic long term source of finance, at the scale needed to achieve climate stabilisation and also offers the potential for near term project-specific and programmatic funding. There are likely to be some circumstances in this sector where public and private co-financing could prove particularly effective. For example, a facility drawn from public funds could be used to partly underwrite private sector investments in cutting edge (and therefore inherently high risk) avoided deforestation, afforestation or reforestation projects. Such combined approaches might leverage a much larger amount of money from private investors than would otherwise be the case.

[49] 2007

2.5 Forest-based carbon credits are an effective policy tool to support sustainable forestry around the world. Given the size of the carbon market relative to public finances such as official development assistance, a market-based regime offers the greatest potential source of financing for forest conservation. Forest-based carbon credits offer the most effective and flexible means of providing the necessary incentives and investment for developing countries to curb deforestation and also engage in the necessary sustainable reforestation and afforestation. Private sector buyers, particularly in the wake of recent market instability, are also likely to focus more heavily on diligencing the assets they are acquiring, thereby increasing the reliability of the overall approach.

3. Barriers to an Effective Market

3.1 That said, in order to participate at scale, the private sector needs a reasonably clear and straightforward regulatory framework to generate forest based carbon credits (whether that framework is genuinely regulatory, or quasi regulatory through a voluntary standard to address quality assurance issues). It also requires secure contracts with its sellers and certainty that credits will be issued at the appropriate juncture.

3.2 The key barrier to private sector engagement in this aspect of the climate change agenda lies in the aggregate effect of the following factors:

- the opportunity cost associated with avoiding or reducing deforestation, relative to pricing of credits,
- the lack of demand for forest-based carbon credits resulting from their exclusion from the EU-ETS,
- the absence to date of any regulated market at all for REDD, and virtually no such market for A/R projects (and the temporary crediting system for CDM A/R), and
- the lack of the necessary legal framework, institutional knowhow and credible contracting parties in many relevant developing countries.

3.3 The opportunity cost of reduced deforestation was considered in a study carried out by Lord Stern. He concluded that global estimates of the opportunity cost of halving deforestation ranged between $3 billion and $33 billion annually.[50] Internationally, nationally and at local level there are a range of well-established drivers for deforestation, including the demand for commodities such as timber, palm oil and other crops, and local needs for subsistence farming or for employment in these cropping businesses. In addition, the fixed costs associated with forest related carbon projects are significant and front loaded. They involve systems to permit the development of baselines, protection of the territory, monitoring, enforcement and other institutional costs.[51]

3.4 Reform of the Clean Development Mechanism insofar as it addresses forestry is essential to increase the flow of investment in reforestation, afforestation and avoided deforestation in the developing world. At present, the CDM rules might best be described as showing institutional bias against the forest sector. Existing rules make it virtually impossible to pursue afforestation and reforestation projects on anything other than a charitable basis. For example:

- Capping afforestation and reforestation to just one percent of an Annex-I country's annual compliance requirement over the first commitment period has discouraged investment in these projects.
- The issuance of temporary credits in which the buyer maintains a liability makes tCERs unattractive to most buyers.[52] This is a route that has been rejected by most national and regional schemes that accept forestry related credits.
- Limiting A/R projects to lands deforested or in agricultural use prior to 1990 which remain deforested at a project's inception excludes from the system any credit for regeneration or replanting of forests destroyed since 1990. Between 125–195 million hectares of deforested land is now ineligible for crediting.
- Overly tight definitions of "forest" which includes many areas where projects might usefully be located; and
- More generally, the time in the Kyoto Protocol First Commitment Period is too short for projects in the A/R forestry sector, which sequester most of the relevant carbon only a number of years after the start of planting.

3.5 With regard to avoided deforestation, rules need to be developed which avoid the unnecessary complications associated with the existing A/R regime and address issues associated with contracting with least developed countries. It is essential that market regulators create long-term market certainty and apply robust rules and modalities to address some of the issues inherent in avoided deforestation. In particular, to

[50] Stern, Key Elements of a Global Deal on Climate Change, London School of Economics and Political Science, 2008 page 25 et seq.
[51] Potvin, Guay, Pedroni, Is reducing emissions from deforestation financially viable? Climate Policy 8 (2008) 23–40
[52] Post-Kyoto: The international context for progress on climate change. http://www.iea.org/textbase/speech/2008/Philibert_TestimonyUKparl.pdf

generate credits project activities need to show a proven climate benefit by reducing greenhouse gas emissions. Carbon credits exchanged in a market must be independently verified according to rules and modalities that ensure that each credit truly represents the emission reduction or removal of one tonne of CO_2e. Private sector engagement will also mean that the regime needs to allow direct project crediting, instead of or in conjunction with country-level crediting.

3.6 Africa is more affected than any other region by the limitations imposed on crediting carbon sequestered through forestry and agriculture. Africa emits less greenhouse gases than any other continent and is likely to suffer significantly from the effects of climate changes attributable to emissions from industrialized countries. The carbon market has largely bypassed Africa. The lack of African CDM projects is due in large part to the rules of the carbon market which so heavily regulate agricultural and forestry projects.

3.7 Many developing countries, particularly in Africa, currently lack much of the infrastructure they need to ensure the full realisation of the potential of carbon markets for them. In order to be market-ready for a post-2012 carbon market, they urgently need to develop their own capacity to reap those benefits, and many are fully aware of this. There are some essential elements to a functioning market and capacity building should focus on them:

- Assistance to measure, monitor and verify their carbon stocks.
- Assistance to develop and implement systems of land tenure and registration.
- Assistance with administration, provision for pass through of credit related income to local communities and public accountability.
- Assistance with law enforcement.

The public sector and multinational institutions have a key role to play in relation to this and a role in which they have extensive expertise. If the available resources from the public sector were utilised for this purpose, the developing world, and in particular the least developed countries, would be better placed to benefit from a scaled-up carbon market.

3.8 There are a range of other technical issues associated with forestry related credits, such as non-permanence (principally relevant to afforestation and reforestation rather than avoided deforestation), leakage and additionality. These can be effectively addressed through project design and/or carbon accounting solutions. Sufficient literature and experience now exists, in large part as a result of experience developed on individual projects in the voluntary market, for these issues to be important but not excluding factors for forestry solutions in carbon markets. It should be recognised however that leakage will be an issue particularly in the rollout of any avoided deforestation national programmes.

4. The Environmental and Social Risks and Benefits of Using such Financial Mechanisms

These mechanisms will require effective management of the environmental and social issues associated with land use. Forest initiatives can really work only if there is local buy-in to them and if local communities have income earning opportunities associated with the project for the life of the project, through sharing in carbon and other revenue flows and/or through the inclusion of sustainable timber sales or other crops. Unless this is planned into a project, the opportunity cost of deforestation will not have be adequately addressed and the project will be at risk directly or through leakage. In this regard the evolving interest in other eco-system services (biodiversity offsets, watershed rights, water resource rights, eco-tourism and pharma) offers additional income and the potential to create environmental and social benefits.

The CMIA consider that carbon credits exchanged in a market should credibly demonstrate net positive environmental and socio-economic impacts. The translation of this requirement into contractual terms varies. Some of the sustainability requirements imposed, for example, under World Bank funds can be very onerous, since these typically involve a representation that IFC Performance Standards (a set of detailed requirements focused on private sector relatively large scale industrial projects) have been satisfied. It may be that more focused, simpler sustainability principles should be adopted and more rigorously enforced. Projects may also have the ability to deliver other important environmental benefits, notably ecosystem services, including soil protection, erosion control, water purification, reduced flooding, agricultural pollination, local rainfall and biodiversity protection and human development benefits such as increased resilience to climate change. From an investor perspective such additional benefits offer some attractions given that a monetary value is likely to be put in future years and that they increase the sustainability credentials of the project.

It is essential for the proper operation of any carbon market that carbon credit producers and sellers should also possess clear legal title to the credits. This is a relatively big ask in many developing countries. It requires host countries to ensure that land tenure and relevant laws regarding carbon credit ownership are clear and transparent. Land tenure, government rights, informal rights and clan rules on eligibility for land rights can be very sensitive in many jurisdictions. There can also be competing drivers, with the government

wanting to retain valuable rights to grant timber or mineral concessions, and a need to clarify how these interrelate with land, tree and carbon ownership. These sensitive issues are unlikely to be resolved rapidly, particularly in some of the least developed countries where clan conflicts have arisen.

The growing market for timber, biomass and agricultural crops also has to be factored into any designs for forest related carbon mechanisms in order to enable sustainable timber and agricultural production.

5. The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

5.1 It is important to be clear that sustainable forestry and agriculture are not substitutes for the deep reductions that industrialised countries will have to make. However, the combination of new market-based mechanisms for deforestation and an effective regime for crediting afforestation and reforestation under the UN Framework Convention on Climate Change will greatly increase the ability of developing countries to contribute to climate change mitigation. An effective regime will also provide these countries with an important source of income that will enhance their own prosperity, stability and their long-term transition to sustainable development and low carbon economies.

5.2 To develop this market, the CMIA considers that it is essential that regulators create a robust demand for forestry credits through enabling market liquidity. Sellers should be able to access a broad number and range of buyers. Linkages between markets and, exchangeability or "fungibility" of forestry credits with credits from other sectors are essential to achieve this. The latter requires credits from this sector to be accepted as permanent while ensuring that non-permanence risk is dealt with in a prudent way through risk-discounting, buffering, replacement commitments and/or insurance solutions.

5.3 The CMIA endorses the recommendation of the Eliasch Review as to the need for inclusion of the forest sector in global carbon markets. We anticipate that this is feasible provided that stringent emission limits and supplementarity limits are applied. It would have the effect of accessing significant funding from the public and private sectors. Eliasch suggests that $7 billion could be generated in relation to the forest sector in the carbon markets in 2020, leaving $11–19 billion to be sourced elsewhere (eg public funding) with a view to halving deforestation.

5.4 In this context the CMIA welcomes the recommendation from the European Parliament's environment committee that countries should be allowed to offset up to 5% of their total emission reduction commitments through carbon reductions achieved in forest related CDM projects. Provided the rules, modalities and methodologies for forestry projects are robust, the CMIA believes that the eligibility of resulting credits should not be capped. While historically concerns were raised about the risk of the market being flooded with forest related credits, this concern does not appear rational given the hurdles associated with valuing forests for their global environmental contribution outlined in the rest of this submission.

6. The World Bank's Forest Carbon Partnership Fund

The CMIA welcomes the FCPF for the capacity building, staged approach it is adopting in relation to this area. There will be a need to ensure that the FCPF is flexible in its approach to different developing countries, such that the approaches agreed through its processes fit with the culture and objectives of the relevant state. Some developing countries have raised concerns about the lack of flexibility of the World Bank and other agencies and NGOs, causing them to explore other alternatives with the private sector.

As indicated earlier, the CMIA believes that the FCPF and other initiatives offer a route to address and correct the lack of existing government capacity to manage these new markets in the least developing countries. However, as recommended by Lord Stern, there should be streamlining of such initiatives to minimise unnecessary duplication of effort. Over time, the responsibility for oversight of these initiatives should migrate to the UNFCCC.

7. The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

Technical concerns over the measurement of carbon biomass have been addressed over recent years. The science and technology is now both strong and coherent in accurately assessing long-term gains and losses of biomass carbon and other emissions from the forest and land use sector. Landholders and government agencies now measure and monitor forest status and growth using a combination of techniques including direct field measurements, satellite and aerial photography and computer modelling.

Measuring and monitoring deforestation emissions at the national level is practical, reliable, and cost-effective. A combination of remote sensing and field-based surveying is an appropriate methodology to ensure an adequate level of accuracy. In the last decade, advances in computer modelling have created the possibility for nearly every country to monitor its deforestation rates to a high degree of accuracy. Broad deforestation can be measured with a margin of error of just 0.5%, and up to a 10% error margin for illegal logging.[53]

[53] Tollefson, Jeff, Nature, "Save the Trees," Volume 452, 6 March 2008

International coordination for measuring and monitoring forest carbon is already underway. The Group on Earth Observations (GEO) is linking together environmental monitoring systems, data sets, and models to produce the Global Earth Observation System of Systems (GEOSS), which will be the world's most scientifically and technologically advanced and robust monitoring system to ensure the availability and sustainability of repetitive long-term observations and reliable methodologies for measuring forest carbon. This global system aims to make its remote sensing tools and results universally available and importantly, will render national data in a comparable format.[54] The GEO comprises 73 countries and the European Commission.

8. The Success or Otherwise of Government Efforts in Reducing Emissions from International Land Use Change

As indicated elsewhere, the treatment of emissions from land-use change to date has not been an area of great progress internationally. It is to be hoped that the increased focus that is now evident will generate a more effective international regime.

In this context, the CMIA welcomes the Government's Eliasch Review published on 14 October into the potential for international financing to reduce forest loss and associate climate change impacts. The CMIA endorses the key conclusions of the Eliasch Review and its suggestion that the Government work to mobilise international action on the issue.

9. The Congo Basin Forest Fund

The Congo Basin Fund concentrates a sufficiently large sum to have effect in an area of the world where it is difficult for the private sector to operate efficiently. The key question is how these funds will be used. If used to establish the necessary legal, administrative, technical and scientific infrastructure to enable the countries of the area to attract private sector capital to the forest and carbon forest sectors, it will create a very useful framework to enable further investment. It is particularly important that the granting and supervision of forest concessions is improved in order to ensure that sustainable use of this vital resource is achieved. This requires, above all, greatly increased efforts in relation to governance, enforcement and training as well as improvements in the environment for foreign investors.

Land-use policy as a whole needs significant improvement in the Congo Basin not only as regards forest management but in respect of agro-forestry and agriculture in order to reduce pressures on existing forests and to increase agricultural yields. For true progress to be made, indigenous people, particularly forest dwellers, need to see direct benefits from the good stewardship of carbon-rich resources and be given the means to enforce their land rights. Non-timber forest products and services could be of a significant contribution but need to be the subject of substantial work. The eco-tourism potential in the area, for example, is material but requires the active participation of the private sector.

The Congo Basin Fund, if focused on establishing the public sector framework necessary for the private sector, as opposed to trying to substitute for it, has the potential to be of significant benefit. However, to maximise its effect, it needs to be led and managed by people with private sector experience and skillsets. It could then be used to leverage private sector capital to enable the countries in the area to manage themselves towards low-carbon development, rather than relying on a new form of foreign aid and expertise.

October 2008

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[54] See Group on Earth Observations, "How the Group on Earth Observations (GEO) is advancing global collaboration on monitoring forest carbon," June 2008

Witnesses: **Mr Eric Bettelheim**, Executive Chairman, Sustainable Forestry Management Ltd, and **Mr Abyd Karmali**, President, Carbon Markets and Investors Association (CMIA), gave evidence.

Q75 Chairman: Good morning and welcome to the committee. Thank you very much for coming in. This is our second session on forestry and we are grateful to you for giving up the time to give evidence. Could I start off with a fairly general question? There is no rocket science involved in dealing with deforestation—it is not like carbon capture and storage where we are waiting for a technological breakthrough—and it is agreed pretty well, I think, on that serious question, that it is incredibly important to the process of dealing with climate change. Why do you think the world has been so slow to start acting in an effective and decisive way?

Mr Karmali: I think, from our perspective, the main reason is that during the time of the negotiations of the Kyoto Protocol—if you recall we are talking about 1995 to 1997—there was much less robustness in the science of deforestation. The technologies available to monitor deforestation were far less advanced and, given the latest findings at the time of the Intergovernmental Panel on Climate Change, there was less urgency and, thus, more of a focus on where emissions were felt to be more easily reduced, namely the industrial sectors in the developed countries. I think that is the principal reason.

Mr Bettelheim: I think there was a series of influences on the process. The first was (and it begins in the structure of the Kyoto Protocol) by separating the developed from the developing world, in terms of obligations under the Protocol, the world was split into two parts, those that had to do something and those that did not, and this is understandable both because of the sense of historical responsibility for industrial emissions and climate change, and, secondly, something which I hope this committee will be focusing on, the other goal of the Kytoto Protocol, indeed, of the Treaty, was sustainable development and the need of the developing world to continue to overcome poverty. It was seen that if their emissions were restricted at that point that their economic growth would be restricted and defeat one of the principal goals of the Treaty. The result of that, however, was, in a sense, perverse. What it did was it encouraged the continuation of deforestation as a source of economic growth—production of food, production of timber, exports and so on—in the tropics and subtropics in the developing world and encouraged regrowth of forest in the North. So the biologically most diverse and important forests, important for many other reasons including dependence of poor people, the biodiversity involved, and so on, we had the result, over the last decade or so, of the destruction of the most important forests and the recovery and increase of the least important. This whole process was exacerbated, this rather narrow focus, solely on industrial emissions, not because we did not know the importance of deforestation to the climate change equation—that was demonstrated by the IPCC as early as 2000—but because there was also ideological resistance, particularly by a small part of the NGO community, which have apparently been very influencial, but a small group of the NGO community, like Greenpeace, Friends of the Earth, WWF, argued vehemently, and politically very successfully, both in Europe and in the international negotiations, against these kinds of credits because they were a "cop-out", they "let industry off the hook". More recently it was referred to as a "mediaeval indulgence" by which you can buy your way out of your responsibility. Fortunately, as a result of the Stern Review, the work of McKinsey and the political initiative of the Rainforest Nations Coalition, the world began to realise that that narrow focus and that ideological view was not going to lead to a successful strategy to deal with climate change, and I think the Bali Declaration recognised that. Unfortunately, the process of developing policy for REDD and, indeed, for biological carbon storage, including afforestation and reforestation, is stuck in the same old system, the Kyoto process, and that system is very unwieldy, very slow and I think the fault lines that have developed in the negotiations, most recently in Poznan, demonstrate that this split between developing and developed worlds has not been overcome. Ironically, in my view, the best way to overcome it is by crediting forests in the developing world, because it allows for sustainable development, it moves them on to a path of low carbon development. At the same time it lowers the cost to northern industry, an issue which was much neglected until the recent financial crisis, if I may say so, for their compliance in the early to medium term. I think now, even if not before, it is obvious that industry cannot tolerate a very high cost of carbon in the near term but that too was felt to be an important part, certainly of European policy, although not the policy in Australia, New Zealand and the United States, where a more balanced view of how to start these systems has emerged. So I think the logic is now overwhelming. There are still various objections raised—issues about indigenous people, about governance, which I understand is one of the topics your the committee wishes to address today—but in each case these are relatively small issues which can be dealt with in a relatively straightforward way. Again, it is not rocket science, it does not take a technological break-through, it takes good policy development, and that should be possible now, I think, given that there is a worldwide consensus, including, I may say, in the scientific community, in the conservation community and the human development community that crediting forests and forest-planned areas in the developing world is absolutely critical if we are to in fact achieve the twin goals of the Treaty, namely to mitigate climate change and to allow for sustainable development. The politics of this has created an inertia on the topic and a resistance to change which is profound, and that resistance was most recently demonstrated in the position of the European Commission, which dug in its heels in spite of the evidence, despite all the advances in technology, in monitoring and measurement of biological carbon, despite the consensus internationally and refused to allow these credits into the ETS. Indeed, Her

Majesty's Government, when pressed on the issue of the announcement of the Eliasch Review, similarly did not press the issue in the Council of Ministers. So the urgency of this topic, the importance both to development and to climate mitigation, is apparent and is obvious to any objective observer, and yet the policy machinery continues to grind exceedingly slowly, with the result that there is no money, no private sector funding for this at this time, and the reason is very simple: because the policy decisions, the regulatory decisions have not been made and so the uncertainty as to whether these credits will ever have a value has effectively frozen investment in the sector.

Q76 Chairman: Has Poznan moved us on at all?
Mr Bettelheim: Only to a very small degree, if at all. I think the results of Poznan illustrate that the Kyoto process, in particular what is called the SBSTA process (Subsidiary Body for Scientific and Technical Advice) is riddled with the same conflicts and the negotiations foundered on the CDM (Clean Development Mechanism) again over how much is the North going to give the South in order to get a deal? A derisory amount of money was thrown into an adaptation fund, infuriating the developing world. I mean $60 million was proposed for the entire developing world for adaptation. It is absurd, in my view, but that was what could be achieved, but this conflict between developing world and developed world, on both emissions cuts and on the strategy that should be used, continues in those negotiations and essentially freezes them.
Mr Karmali: I think I have a bit more of an optimistic view of what emerged in Poznan, although I would agree that, given the transition time that we are in for the US administration, many countries did not really reveal their full set of cards and certainly were unwilling to give any of those cards up. So this particular problem was characterised by a focus on some fairly mundane issues in the big scheme of things, although, of course, to many participants some important issues nonetheless, but none of the bigger questions were really challenged. Some referred to this as the punctuation COP (conference of the parties) with lots of hours spent debating minutia of various sentences. Sometimes we were wondering whether we were talking about the stimulation of action or the simulation of action. Specifically on REDD there was a little bit of progress. The focus on indigenous people came through at this meeting and is clearly going to be a focus of the work of SBSTA going forward. Beyond that, I would say the decisions that were taken were to focus on the next set of critical issues to be taken, namely what is the reference emission scenario to be used for national level inventories, which is a critical foundation for setting up a REDD mechanism, secondly, how specifically to promote the participation of indigenous people and then, thirdly, an acceptance of the IPCC guidance from 1996 on land-use change and forestry, which seems fairly obvious but is, nonetheless, important because it once and for all focuses in on one objective source of methodology for coming up with the baselines which will then determine how many credits a particular country has earned. So slow progress, but because REDD is going to be part of a package deal—if there is to be a successor agreement to Kyoto. Unfortunately REDD could not progress too far in advance of the other critical issues, namely what the new targets would be, how the adaptation fund should be set up and what sort of mechanisms will be in place for technology transfer?

Q77 Chairman: We had evidence last week from Eliasch, and his review's aim said, "Halving deforestation by 2020, carbon neutrality by 2030. Do you think those goals are sufficiently ambitious?
Mr Bettelheim: Speaking, perhaps, on behalf of those involved in the wood business, I think they are extremely unlikely to be achieved.

Q78 Chairman: Unlikely?
Mr Bettelheim: Unlikely to be achieved, and I think that the costs are underestimated by approximately 50%. I would like to explain why I am of that view. First of all, most people do not understand what forests are used for and how mankind is using them today and what transition is required if we were to reduce deforestation in the tropics and sub-tropics. For example, first of all, over 80% of the wood supply of the world comes from native forest today—that is something of the order of three and a half billion cubic metres of wood every year. There is no substitute for wood. If you are to reduce the harvest, that is if you are to reduce deforestation, that is reduce the harvest from native forests, you have to increase the supply from somewhere else. The population is growing; standards of living are rising. That means that the demand for wood products is only going to continue to increase to mid-century. It takes at least a decade from the initiation of a plantation to its first harvest. Even if we started today to plant new forests, that is sustainable forests, in the form of plantations of one kind or another, with fast-growing species, in ideal conditions, we would not meet those targets. So the reality is that, if we are to achieve REDD in any meaningful sense, we have to embark simultaneously on a massive shift in the underlying forest product industry. The acreage and the yields from that acreage will have to increase substantially over the coming decades if we are to, in fact, reduce the harvest from the native forest. That is one of the key among other factors. Let me, firstly, compliment the committee on taking up the role of industry and the timber business in this whole equation, because, in my view, much of the REDD debate, much of the climate change debate, takes place in a bubble which ignores real world factors like supply and demand, such as I have just illustrated to you. The second key issue to understand is that half of the wood that is harvested from the world's forests is used for fuel, overwhelmingly, by the world's poorest people. That means if you reduce their supply of wood for fuel they cannot heat their homes and they cannot cook their food. The other half—and I appreciate it is not precisely 50:50, it is about 48%—of the world's

wood supply goes for fuel for poor people. There is some increasing use of it in coal-fired generation, and so on but that is trivial. The remainder is industrial wood. Fifty-two per cent of native forests are used. Fifty two per cent of the wood supply comes from native forest for industrial use: timber, paper and pulp, and so on. Of that supply, that 52%, only 20% of the total comes from plantations; the rest comes from native forest harvest. So when you look at the real world of forest use and then you factor in two further issues, one is the need for increased food supply, because we are going to have three billion more people on the planet, and that takes land, that means converting forest into agriculture and increasing the yields for that agriculture, that is, again, an area that has been ignored under the Kyoto process. Agriculture is a form of carbon storage if it is done correctly and is sustainable; it is a form of carbon loss if it continues on the current basis. Finally, when you look at the global statistics of available land, people usually ignore the fact that much of it is already so degraded through desertification and topsoil loss that it is not suitable for agriculture and certainly not for forestry. So we have a very quickly shrinking availability of land. In my lifetime it will shrink from five hectares a person to 1.5 hectares a person on the planet—that is by mid-century—to feed ourselves, to produce the wood we need, the energy we need, and that is not something that is readily or very often noticed in these debates. So, to come back to your question, Chairman, in my view (and I think Lord Stern will soon be publishing an article on this topic) $70 billion is not nearly enough to compensate for the halving of deforestation by mid-century, it is probably more like $150 billion, and that only takes care of compensating people for not cutting. You then have the massive investment to shift the world from taking 80% of its wood from native forests to plantations, and that shift will take decades and will not cost hundreds of billion, it will cost trillions of dollars of investment. It costs between $1,500 and $4,000 per hectare to establish a plantation. That is just the establishment cost. You then have to manage and harvest it and market that product. So you are talking about thousands of dollars per hectare to increase and to create an alternative supply to the supply that we have been given free by mother nature in the existing forests, and unless those factors are taken to into account, there cannot be a real realistic policy for dealing with deforestation.

Q79 Mark Lazarowicz: Can I pursue a question on the costs involved, that is both Mr Bettelheim and Mr Karmali? Obviously we are talking about such ranges that it is very difficult to give any kind of decision, clearly, but Eliasch talks about something between $17 and $28 billion a year over a period of 15 years up to 2020, to be half by that period. Mr Bettelheim, it is difficult to put your figures side by side against the Eliasch figures, but can you in a bit more detail explain your differences with Eliasch as far as his figures over that 15-year period, which is, by my sums, getting around about $400 billion over a 15-year period?

Mr Bettelheim: Let me try and address it in two parts. First, what that supposes is that in 15 years, which is basically the time it takes to establish, grow and harvest a plantation, so maybe a plantation and a half—there is, I think, a 10-year rule that is about right for fast-growing species—if you assume that we start planting today and you want to reduce deforestation by half in 15 years or 20 years, you understand the scale of the exercise that is required because what you are doing is you are saying that we are going to replace 25% of the world's supply with new plantations in 15 years. I do not think that is realistic. There is no capital available for that kind of investment and I do not think it will be forthcoming any time soon, unless (and this is the key unless) there are carbon credits for afforestation and reforestation at a price high enough to overcome the risks, and remember these are long-term investments, investing in the developing world on that scale. Not even the mining industry invests on that scale in land in the developing world, and that is a very experienced industry at doing so. Almost the entire developed, that is sophisticated, industrial industry in the timber business is in the northern hemisphere, with a few exceptions. So we are talking about not only planting an enormous area of ground immediately, you are also talking about stimulating that investment, the additional price in value, such that you can attract capital on the order of magnitude that I have discussed. In respect of the precise question you asked about the Eliasch Report, many observers (and Eliasch is not alone in this) take what they call an opportunity cost analysis of what is the current use to which this land on the edge of a forest or in the vicinity of a forest is being used, and it varies enormously. It varies from subsistence farming up to very sophisticated oil palm and soya bean and cattle ranching on a commercial scale. There is no one-size-fits-all, it is a very complicated tapestry of different land uses, but my basic objection to it is one which I think almost any farmer would make. Farmers respond exceedingly quickly to price signals. You will recall there was a rice crisis this year. Does anybody know what happened to it? It disappeared, because farmers planted more. The same will be true if you create demand for palm oil. Land owners, private or public, indigenous or communal, will respond to that price signal. Commodity prices are unpredictable, certainly agricultural prices are likely in the long-term to rise as more and more demand is placed on it by rising standards of living and increased population and, generally speaking, the opportunity cost will rise over time; it will not stay constant. So if you look at a farmer, for example, in Mato Grosso, where we, indeed, are engaged, and you tell him, "I will pay you 10 dollars a tonne not to cut your forest because you are only getting nine dollars a tonne from your cattle ranching", and you can do that calculation, which is what economists in ivory towers do, and he will respond by saying, "I hear there is this big demand for ethanol, and I can

plant sugar here", or, "There is this big demand for oil palm and I can plant that here." So a simple-minded opportunity cost analysis is fundamentally flawed, and I am afraid in this regard I disagree with the Eliasch calculation, bearing in mind that I think it is an excellent study and well worth using as a basis of policy, but it does lead to a different quantification of what land can be used for and what the value of that land is and what you have to pay as a result to encourage a sustainable use of that land at the same time as meeting the worldwide demand for agricultural products.

Q80 Mark Lazarowicz: I would be interested in Mr Karmali's views on these figures, if he differs in any way or wishes to expand on it.

Mr Karmali: I think the calculations themselves, based on the opportunity cost methodology, are sound. Halving rates of deforestation would mean taking us from 30[1] million hectares a year loss to 6.5 million hectares a year lost, and if you assume roughly 400 tonnes of carbon, sorry CO_2, per hectare at a price of $10–15 a tonne, that is how you build up to the Eliasch Review estimate. I agree wholeheartedly with Mr Bettelheim's point that that is fine on a static analysis, but we are in the world of increasing population, increasing scarcity of land and, therefore, one assumes increasing prices for agricultural commodities. One can counteract that by saying, "Yes, but we are also in a world likely to be increasingly scarce in terms of allowable CO_2 to be emitted and, therefore, perhaps the $C0_2$ price will rise just as the agricultural commodity prices are rising." If you pursue the opportunity cost approach, you need to consider dynamic changes on both sides, but the principal point is that one has to take an holistic view and look at the revenue that the owner of the land can generate per hectare. Is it going to come from timber? Is it going to come from sustainable softs? We argue that with a carbon market for avoiding deforestation, as an example, there could be a successful countervailing force but it would need to be a pretty compelling one and there would need to be a lot of long-term certainty that the market for forestry carbon was going to be there for the longer term.

Q81 Mark Lazarowicz: The comments you are both making seem to be not a million miles away from the position in some of the NGOs who are critical of some of the proposals, in the sense that they take the view that carbon credits are a distraction from tackling some of the current deforestations. How would you set out the balance between the two types of approach to the issue?

Mr Karmali: I think what is important to keep in mind is that the challenges in forestry carbon, the real challenge, is getting at the underlying driver of deforestation, and some of that is going to be through providing countervailing price signals, through a long-term price of CO_2, some of it is to remove some of the perverse incentives—agricultural subsidies, for example, in some cases energy subsidies—and securing land tenure rights. I think those are the three pillars that need to be looked at as part of an entire package, and without one of those this whole approach is not going to be successful.

Mr Bettelheim: Could I add to that? I think what Abyd has just said is very important to understand. You do need an holistic approach to landscape management, and one of the problems with the Kyoto Protocol and the REDD discussions today is trying to slice up the landscape into different categories and treat them differently. The reality is every country, every landowner has policy choices, individual choices to make about the optimal use of the land that they have and if you exclude agricultural land from this equation you will fail with REDD. If you exclude afforestation and reforestation you will fail with REDD. If the world's primary concern is to save these places, both for climate and other reasons, you have to take into account the full landscape, the full rural landscape of the country and how it can be used in the most sustainable fashion, and that means providing credit, not just for trees, but for soils and grass and crops. That is how most people live in these places. If they are incentivised to use a high carbon technique on their land, by having a carbon price that is sustainable in the long term, you will have a natural bias to keep the most carbon dense areas, which are the native forests, and you will have incentives to increase carbon in soils and carbon in crops and in horticulture and agro-forestry. Indeed, apropos that, one of the most encouraging initiatives at Poznan was that of the African countries, led by the Common Market of Southern and Eastern Africa but supported by SADC and EAC—that is basically all of Africa aside from West Africa—and the indication was that they supported this as well—which was to say that, as the part of the post Kyoto deal, part of the Copenhagen deal, they must not only deal with forests, they must also deal with agricultural and pastoral soils and activity. The atmosphere does not care whether there is a tonne of CO_2 in a blade of grass or in a tree, and so it should all be credited and, if it is all credited, you will find that you will move the entire rural balance in favour of sustainable use as opposed to its current use, but if you ignore and you separate out any of these things one from the other, you are creating artificial winners and losers. For example, governments own most of the forests in these areas, even if it is encroached on legally or quasi legally by local people, and the poor live on the most marginal land, on the land that does not have the richness of the forest. There are some exceptions to that, indigenous groups do inhabit forested areas, but by and large the poor live on the marginal agricultural land and the governments own the forests. If you are going to design a REDD mechanism, which is, for example, being urged by the European Union and some NGOs, that is a government to government transfer of wealth, it will fail; and the reason it will fail is because it will put money in the pockets of the forest owner, the government, but it will not help change the behaviour of the four billion people who are

[1] *Note by Witness:* The figure would be reduced from 13million hectares a year loss, not 30 million hectares.

dependent on those forests and on agricultural land in these areas. So you need to do both if you are to succeed. It is very encouraging that Africa has adopted a full bio-carbon, sometimes called a terrestrial carbon approach, to land use for the Copenhagen Agreement. Because if you credit all biological carbon, and remember, for example, peat soils hold more carbon than any forest and yet they are being converted rapidly now in Indonesia and elsewhere into oil palm plantation, one of the most disastrous policies ever encouraged by the European Union, but whatever the stimulus, if we want to seriously deal with the problems of poverty, sustainable development, land use management and sustainable use of forests, you have to include the entire landscape in the carbon market system, because the reality is (and I think Abyd will probably agree with me, most observers do) that while governments may stimulate the first efforts in this way, governments and international organisations will never provide the scale of capital. Whether you take the Eliasch number or my number or something in between, you will never get that kind of money on an annual basis from the international institutions, and it needs to come from a carbon market that has enough regulatory certainty to stimulate the massive investment required and the rent that has to be paid to all of these people if we are to succeed.

Q82 Dr Turner: What role do you see for the development of carbon markets for forests in dealing with this very complex set of issues and what preconditions do you think are needed to be able to make them work? What is the biggest challenge?

Mr Bettelheim: Abyd is from the markets. I will respond to anything he misses.

Mr Karmali: The association which I represent here today, the Carbon Markets and Investors Association, lives and breathes these issues, if I may say, on a day-to-day basis. Our view is the carbon market can play a critical role in scaling up the level of finance we have talked about in this hearing, and what is really important is that the design of the mechanisms themselves reflects the difference that Mr Bettelheim has referred to, namely the different roles that the public sector has in the short-term building capacity and perhaps facilitating some pilot projects before allowing for the significant scale of capital that will come from the private sector to emerge. One of my concerns, which I did not highlight appropriately earlier, is that the way the REDD mechanism is currently moving through the SBSTA process perhaps does not reflect the need to engage the private sector fully enough. More generally, however, to have a market to work in this area, you clearly need demand. In the short-term the demand is not going to come from the compliance markets, because we all know it is going to take a few years for the REDD mechanism to be fully fleshed out, which means that we are relying upon the voluntary market. The voluntary market is only worth of the order of about $350 million a year, but it could provide an important bridge in demonstrating some of the lessons learned from having forestry carbon included in the carbon market, which is why our association is disappointed by the Defra code of conduct, which focuses only on compliance instruments. This is a classic case where the voluntary market can provide some innovative lessons learned for the future compliance market. But, coming back to the compliance market, if it evolves, the targets for REDD (the emission reduction targets) will need to be of a sufficiently long scale so that investors can allocate capital accordingly to some of these projects and, of course, there will need to be some thought given to how the REDD financial mechanism integrates to the existing Kyoto market which forces the allowances being traded as well as the carbon credits coming in from CDM and JI. In the jargon we talk about that as being fungibility. Why is fungibility so important? It is important because it, in fact, allows for maximum efficiency in the carbon markets. If investors can help compliance buyers meet their needs through one instrument or another, that will increase efficiency, reduce the overall costs that the compliance buyers have and will attract more speculative capital to the market. One other point I want to mention, which is a lesson learned from the existing use of afforestation and reforestation carbon credits under CDM: I think I can say that the market view on that has been that it has been an abysmal failure, primarily because of the lack of fungibility. Nobody in the market place, certainly that we interface with, wishes to purchase so-called temporary CERs or long-term CERs, which are these instruments created under the afforestation, reforestation guidelines, because they are not fungible with other carbon instruments. The buyer has the liability for those instruments and it is simply not a market friendly approach. We think, again, the voluntary market provides some interesting lessons learned. Under the voluntary carbon standard for various approaches to forestry carbon, the approach to having a risk-management buffer, essentially a set aside, that will allow you to appropriately risk-reduce the carbon credits coming from a particular area of land, seems a far more sensible approach, albeit perhaps overly conservative, but one which we think at least enables the market to function in an efficient manner.

Mr Bettelheim: Let me underscore what Abyd has said. To answer your question in its simplest, what the markets need and what investors need in order to shift resources to this part of the climate equation is regulatory certainty. What I mean by that, as Abyd has said, is, first of all, that these credits will be valuable in the long-term. It takes a long time to earn and develop these credits. Secondly, that they are equal, as good as any other credits in the market system, so that they are, as it were, fungible; that is that a buyer, an industry for example, does not need to worry whether it is an afforestation credit or a credit from methane recapture or a credit from carbon capture and storage; they are all the same and they are all good currency in the international and national market places. This is what is absolutely critical, and this is the key reason why there has been very little, if any, investment in this sector: it has been regulated to death under the

CDM. As Abyd put it quite eloquently, it is an abysmal failure. The regulations were created at a time perhaps of relative ignorance among the people involved, I am not going to blame anyone, but it is quite clear from the experience of the voluntary market and projects around the world, including those sponsored by the World Bank, that that regulatory approach is no longer necessary to give the reassurance to the market place that these credits can be good in the long term, that they are permanent, that they are additional, that you can avoid leakage and all of the other concerns, and you can respect the rights of people, and so on, that have been raised as various objections over the years. So we are at the point where if policy-makers (and I think this is fundamentally a question of political leadership) at a senior level will insist that the processes involved, whether it is the European Union or the Copenhagen process, that biologically stored carbon must be made as good as, as equal to, other kinds of carbon credits, then you will stimulate the scale of investment that is required in order to address this part of the carbon equation.

Q83 Dr Turner: Of course, that assumes that you can demonstrate the legal validity of different forms of credit and that has been a problem, has it not, particularly with the CDM? There has been a certain loss of faith in international credits because of the difficulty of verifying them. Do you feel that forest credits could be made easier to verify?

Mr Bettelheim: I think Abyd has already addressed this in part. Sir, there is overwhelming scientific consensus that forest credits can be measured, monitored and verified even to a higher degree than other forms of carbon credit generation. For example, the Environmental Protection Agency of the United States will tell you, as will NASA, as will Google Earth, that you can measure the flux of carbon in tropical and sub-tropical forests today using satellites with additional ground-proofing to within plus or minus five percent. That allows you to set aside 5% or even 10% to ensure that you are not over counting, that it is always going to be there. The Japanese satellites which are being launched now will improve that to plus or minus three per cent. I do not know of any industry in the world that can tell you, within a margin of error of plus or minus three per cent, what it's performance will be from year to year. Certainly it is as good as wind farms, it is as good as solar energy in terms of its predictability. All of those objections have been fully aired and reviewed and analysed and policies developed over the last decade, so I think that to any objective observer, that is an observer who does not have an alternative agenda, we have the capacity today, and it could be implemented worldwide over the next three to five years so that all countries, except perhaps those in conflict areas, could participate in this market place and receive the benefits of these credits.

Q84 Dr Turner: What happens if a developing country receives revenues through avoided deforestation? What is to prevent them from investing with energy intensive infrastructure instead of carbon reduction? Would it be possible to account for the impact of such activities in future systems?

Mr Bettelheim: Briefly, as I think I mentioned earlier in my remarks, government-to-government transfers run exactly that risk, and that is why I do not believe they will make a significant difference. You do not have to be a developing country to know that a finance minister is very jealous of his receipts, and he will allocate them according to the priorities of the government, not necessarily the source of the receipts, which is why I think that the private sector is a much more reliable source of the finance and of these credits, for exactly these reasons, because someone who sells the credit is accountable for that credit. It has got to be good delivery in the market place, and that means he has a vested interest in making sure that that credit is there and is kept there and that he is not going to end up having to pay the costs of replacing it, just like any other commodity. Also, in the private sector, the markets encourage stability of land tenure or resolution of land tenure disputes, because they have got to know on an audited basis that it comes from a legitimate source, that it comes from the owner, the real owner, and, similarly, markets nowadays, whatever some people may think, do not accept product from illegitimate sources very readily. There was, of course, the example of conflict diamonds, and so on. There is, particularly in this area, a very strong sense that any credit that came from the results of an abuse of human rights, or the dislocation of people or the confiscation of their land would simply have no viability in the market place because all of these credits are going to be traceable, they are traceable to an industrial source or to a wind farm, they are traceable to a forest from which they are generated, and I think one of the benefits of a private sector approach is that it stimulates that kind of transparent and accountable behaviour.

Q85 Dr Turner: Somebody has to police it; so there is still a problem there. Do you think it is justifiable for the Government to treat international credits as reducing our net emissions when they are bought from countries that do not themselves have binding carbon targets because overall emissions are actually increasing?

Mr Karmali: I am accumulating a list of issues to address questions you have raised. If I can start with some of your earlier points and I will return to this one, you asked about the verification processes. I wanted to highlight that one of the failings, or perhaps sub-optimal approaches that the CDM had taken is essentially to start with a project-by-project approach without having a set of approved methodologies in place, which I think has really dragged out the process for getting carbon credits through the system, which is frustrating both for credit developers as well as, of course, for the developing countries themselves. One of the opportunities we have with REDD is to agree upon a set of methodologies that would become acceptable and then project developers can take those

methodologies and undertake eligible project activities, and we are seeing some efforts. I wanted to highlight the work of the Avoided Deforestation Partners group, which is trying to come up with a set of agreed methodologies. The second point is: what makes forestry projects different from your typical industrial emission reduction projects and CDM? Clearly, as Mr Bettelheim pointed out, it is not verification that can be done mostly by sitting at one's desk and then going out to just kick the tyres of the project; rather you have to have a marriage of ground-truthing as well as remote-sensing, and, of course, in terms of costs, that is much more costly than your typical verification. A project in which the company I represent, Merrill Lynch, is involved, we would estimate that the annual verification costs could be in the order of about $1.5 million per project in avoided deforestation, which compares to $15,000 for verification at an industrial project. So I think a significant order of magnitude of difference. Your next question related to some of the challenges or prerequisites in a market approach and the monitoring and verification approaches for national level inventories that is one of the critical prerequisites, to get the market up and running. I would add to that, land tenure settlement, which Mr Bettleheim highlighted as well, and then, coming back to the earlier point we discussed about perverse incentives, making sure that those incentives are part of the overall package of capacity building, I think, is important too. Your question about government-to-government approaches highlights the importance of the private sector's involvement, and this comes back to another point we discussed earlier, namely the danger of the REDD mechanism resulting in only a government-to-government type approach. We will not scale up the finance. We need to involve the private sector, and that typically means finding a way to engage the private sector at the sub-national level. The private sector is not going to fund national level programmes, sectoral level initiatives, it is going to fund things that look, feel and smell like project activities, because we can then define the boundaries, which means we do need to address linkage issues, but we can define the boundaries and we can then put in place a set of risk mitigants to address some of the concerns we may have about the investment costs that are required as well as the on-going operating costs. What does that mean in terms of monitoring of government-to-government transactions? It means that you have to have the national level inventory that is in place that provides an environmental cap. So to your question, "Should the Government engage in carbon credits from countries with no cap on emissions?", I would say, we all recognise that at the time of the Kyoto Protocol there were countries that were deemed to be the ones where we need to focus our effort first because of historical responsibility and those for whom no target was seen as appropriate, but the existence of the pre-development mechanism joined-up limitation will result in roughly 2.00 to 2.5 billion tonnes of emission reductions that would not have happened had those mechanisms not been in place. So I think it is a credit to the developers of the architecture of the Kyoto Protocol that emission reductions are occurring in countries without caps. There is a little bit of an adjustment towards a lower carbon trajectory, but, clearly, for the larger emerging markets, that is not going to be sufficient. A cap needs to be put in place and part of that cap should focus on the forestry sector, which will provide the reference against which we hope some of the sub-level project activities can then be credited against.

Mr Bettelheim: Can I address the last point? I think it is extremely important. That is, why should developed countries pay countries for credits when they do not have a cap? I think one of the interesting things that happened in Poznan is a country like Mexico said it will take a cap, and, as you know, the rain forest nations have said, "We will join the system", albeit on terms to be negotiated£—when they would have a cap, what kind of cap it will be and so on—"if you pay for our forests." Strangely enough, this excluded sector, this much criticised sector of forestry, is in fact the key to the developing world taking on caps. China understands this, India understands it, Brazil understands it and the 100 countries that are not industrialising rapidly who were dependent on forest and agriculture now understand it. They understand that the way for them to develop sustainably, that is to lift people out of poverty, is for them to become part of the system, but only if they are paid something to do it, and we can argue back and forth that this is fundamentally a trade negotiation in which all we are really talking about is a shifting of money, but if the money is just shifted to governments and that is the end of it, it will fail. If it is shifted to the people who actually live on and manage the land, it has a chance of succeeding, and this is what has to happen if there is going to be a global deal because the four to five billion people who are still in poverty are going to need that kind of help, and whether they can get it from their government or not, they need to know that improving their standard of living is consistent with mitigating climate change and, importantly, adapting to it. In all the discussions about adaptation, again, people fail to realise that forest and land management is the key to adaptation to climate change for almost all of the world poor of the developing world, and that is going to take significant long-term investment in those people and in their practices of land use. So the answer to your question is those countries are now ready, even if they were not at the time of the Kyoto Protocol, to take caps, albeit phased in on some negotiated basis, if, and only if, biological carbon is credited to them for mitigating climate change and giving them the opportunity to move on to a sustainable low-carbon path of development.

Q86 Martin Horwood: I am absolutely with you on the importance of forest and land management and I can see these markets working very well with people like your investors at international level, I even buy that they can be verifiable by satellite to some extent, but do you really think, when it comes down to individual land use decisions by marginal

farmers and local lobbying outfits let alone indigenous people who are not even part of the money economy, that these market mechanisms are going to efficiently trickle down to that level and really affect decisions from day to day?

Mr Karmali: My sense is that if the mechanism can be made to work at the sub-national level, you have a far greater chance of achieving that, and this again highlights why we cannot let the REDD mechanism simply be a government-to-government transfer. Yes, you absolutely need to have a national level inventory in place that sets the overall budget for that country, but we as private investors will engage in projects where we feel that there is a good chance the measures which are being funded to reduce deforestation, for example, will be executed. There is a higher chance of success in a case where you can have transparency about the local benefit-sharing approach, which will ensure that the benefits are flowing to the individuals who have the ability to change those decisions, than money flowing into some pot at the national level that may end up funding, as you said—

Q87 Martin Horwood: What about indigenous people who do not use money?

Mr Bettelheim: Can I just respond with our experience as a company. We work with American Indians in the Amazonian rainforest, we work with Aborigines in the North West of Australia, we work with the Maori people in the North Island of New Zealand, we work with dispossessed land owners who are seeking to recover their land in South Africa under the Post-Apartheid Constitution, we work with extremely small land owners in Rwanda, so we cover most categories of what people generically refer to as indigenous people. The reality is that indigenous people are smart, they understand what is in their self-interest, and they find partnerships with people like us enormously refreshing because they have been promised so many things for so long and none of it has been delivered by governments, or aid, or international organisations. I will give you just a small vignette. When I was at the Bali Conference we met up with the indigenous people's representatives from Africa and the indigenous people from South and Central America and the indigenous people from the Pacific, and they all had one message. They said: "Do not talk to us about Kyoto, do not talk to us about governments, do not talk to us about charity or aid. They all have failed us. We want to do business; so come and see us and let us do a business deal", and they understand about carbon; they are fully aware of it. They also understand, probably in most cases, how to best use their land if they have what we would regard as pretty modest capital investments, like better tractors, like better water management and irrigation equipment, and this includes people who are quite isolated. In one area in Peru we are the buffer zone between civilisation and uncontacted tribes and we work with organisations like Survival International and others to ensure that we do not transgress on their rights and on their way of life. We capitalists running dogs are not nearly as insensitive and foolish as you might imagine, and we generally find that our partnerships with those people are far more straightforward and mutually beneficial than any partnership we strike with government.

Q88 Martin Horwood: Do you think, even if you believe this is necessary, that it is sufficient and it works without, for instance, land rights for tribal peoples or control of uncertified logging, and things like that?

Mr Bettelheim: I did not say that.

Q89 Martin Horwood: No, I am asking.

Mr Bettelheim: First of all, for example, in South Africa we are funding groups to recover their land because they could not afford the lawyers to go through the legal process. From our point of view, the first and most fundamental requirement of any business transaction with any community is that they own the land, that they have legal title to it, and the second is that under the legal regime in place, or the regulatory regime, they are entitled to transfer the carbon separately from other commodities, from other uses of their land. This is critical, and that is what has to be implemented for the first time in many countries in which we are working. For example, in Zambia and Gabon we are helping the Government to develop precisely those tools which you take for granted in a modern society. There is a Land Registry. You can go there and check what rights have been allocated to whom, you can separate the fruits of the land from a farm, from the land itself, you can separate out the mineral rights, with the stroke of a pen. In many countries these things are either confused or their laws have been inherited from a colonial or much earlier past which is no longer appropriate. So we do work in order to help change the legal regimes, or implement them for the first time in some cases, and to ensure that the land title is secure, because we cannot sell what we do not own, and we buy from people that are in the same position. They cannot sell us anything they do not own. So it is a fundamental premise of any of these transactions from the private sector that we first ensure that the legal regime and structure is in place before we can invest, and that will be a requirement for anyone investing in the land use sector, for climate or other purposes.

Q90 Mr Caton: You have both spelt out your commitment to a market mechanism to stimulate the level of investment needed, but are there any other mechanisms on the table that could encourage similar levels of spending?

Mr Bettelheim: The short answer to your question is, no, and that is because you said "similar levels of spending". There are a number of proposals on the table, both from NGOs and, indeed, as I explained in the formal negotiations of the post Kyoto Treaty, that are focusing on government-to-government transfers, and I know of no other sources of money except the public sector and the private sector. Even in my business it does not grow on trees. So either the public sector is going to do the lifting, in which case, if the world's public sector has the resources and is

willing to spend the money over decades measured in hundreds of billions of dollars, so be it, it has the potential to work. Most observers, that includes Lord Stern, McKinsey and others, would indicate, and I think most experienced politicians would verify, that that kind of money is simply not going to be available given the other priorities of government and the public sector, aside from climate change and, in particular, aside from land use in the developing world, but the public sector has (and I think I referred to this earlier) a very important role to play. First and foremost, as I hope I have made clear, you must set up a straightforward regulatory system that gives credit to the carbon stored biologically in these places. Secondly, you must help these countries build capacity. You must help them build the administrative systems, the legal systems, training, provide the scientific infrastructure and so on, so that they can in fact fully participate in the market that you create the regulations for otherwise they will remain excluded. And finally, there is a use for public money in the short term to help build out through experience how this can be done in a reliable way. A lot of pilot projects are already underway. I do not think we need a lot of other pilot projects. What we need is national scale projects. For example, McKinsey is working with the President of Guyana, President Jagdeo, to do precisely that, and the President has been very forthcoming to the international community and said, "If you pay me for my forests so I can develop my country, they are yours to maintain on a sustainable basis," and so far as I am aware he has had no takers. That is just one small tropical forest country.

Q91 Mr Caton: What is your view of the recent proposal to spend a percentage of the EU ETS auction revenues which they claim will deliver £8 billion per year?

Mr Bettelheim: This is yet again one of these false hopes. You will have to enquire of the Shadow Chancellor and the Chancellor whether or not they are willing to give up general revenues for this purpose on that scale. There are a couple of European countries who said they might volunteer to do it. There is no timescale involved and there is no legally binding commitment. The Commission has been disingenuous on this for some time. Of course, if the EU as a political organisation does adopt rules hypothecating revenue for this purpose, those revenues could well be used for this. However, even that scale, as I hope we have made clear, is far too small to make any significant difference in the equation.

Mr Karmali: I would simply add that of all the alternative approaches that have been discussed, which include EU allowance auctions, AAU auctions, ie the national budgets allocated to countries, the maritime tax on bunker fuels, aviation, although I think aviation is now shifting more towards trading, and even the Brazil Amazon Fund, which is perhaps a real example of an alternative approach, none of them would get us to the sorts of numbers we talked about earlier which would be required to even partially address the problem. So they may contribute little bits and pieces in the short term but they are nowhere near the scale that is required.

Q92 Mr Caton: Can you give us your views on the problems around the issue of governance in developing countries? Also, you have told us about the various developing countries that you work in. It would be very useful if you could elaborate on what you say with examples from your own experience.

Mr Bettelheim: Governance is an issue in many places but it is not as prevalent as people often believe. The perception of the governance risk is often exaggerated from the reality. All of the countries in which we work have governments that want to help us get this done because they see it in their interest. The corruption issue, which is really what people talk about when they talk about governance, is chronic in a couple of major areas of tropical rainforest. There is a history of corruption in these countries. Our policy is very simple. If we are asked by any civil servant, any politician or anyone in any authority for a bribe or an incentive of any kind, we simply do not operate in that country, we leave it, and we have done that. We have in one African country had the endorsement of the President and all four ministers of his Cabinet who had responsibility for the forestry sector and when we were asked by a civil servant for an incentive in order to provide the information, which his minister had promised us, we simply left the country. There are other countries—and I think they should remain nameless for these purposes—that do have chronic corruption and these are the countries to which the public sector needs to pay the most attention. This is not something which the private sector can deal with on the size and scale necessary to incentivize them to move to a sustainable use of their land. The vast majority of the over 100 developing countries can benefit from an integrated carbon system that credits all biological carbon and the question is not governance in the sense of corruption, the question of governance is of capacity. They simply do not have the human resources and often the intellectual resources and the financial resources to build the administrative systems, to pass the laws, to use scientific data, to train their people, whether it is in guarding a forest or it is in improved land use techniques and so on. That part of it is the fundamental role of governance that needs to be addressed by the public sector if the developing world as a whole is to participate in the marketplace. As the Eliash Review rightly points out, the resources are there. The £3–5 billion that has already been committed by various countries like Norway, the United Kingdom and others is enough to build in those countries that are not conflict zones, where corruption is not endemic, the governance capacity both at the centre and at the grassroots that is necessary for these people to benefit from a carbon system and it can be done in the next three to five years.

Mr Karmali: I think from a financial institution perspective governance risks are one of the critical impediments in the forestry carbon market. Obviously the focus on risk has become all the more acute in recent months. To address some of the issues we would need a stronger focus perhaps assisted by capacity building on land use reform. We would need to have in some cases rules governing local benefit sharing, ie how should the proceeds of the carbon financial flows be best directed. If there is no prescriptive approach, which is also acceptable, then for an institution like the one I represent to be involved in a project we would want to see an environmental NGO that is responsible for working with local communities to ensure that there is proper transparency and accountability for local financial flows, and we think that is a way of addressing the issue. The final point is at the national level. Just as under the CDM there is a focal point, a designated national authority to assign the carbon rights, the same needs to be done for REDD and often that may be a different ministry in a country, perhaps the Ministry of Forestry, and there has to be a lot of effort to focus on the governance of carbon rights and the assigning of carbon rights under any financial mechanism that evolves.

Chairman: I think we are out of time. Thank you very much, both of you, for coming in. It has been a very interesting and helpful session from our point of view.

Memorandum submitted by Thomas Legge, Alison Hoare and Jade Saunders, Energy, Environment and Development Programme, Chatham House

REDD AND FOREST GOVERNANCE

Summary

- Avoided deforestation and forest degradation offers a cost-effective means for reducing greenhouse gas emissions.
- A new mechanism, Reduced Emissions from Deforestation and Forest Degradation (REDD), is likely to form part of the negotiations on a new climate deal in Copenhagen in 2009.
- Countries will receive financial rewards, most likely ex-post, for the carbon emissions avoided through reducing deforestation.
- Major capacity-building will be required to allow countries to participate in the scheme and to address the drivers of deforestation.
- Building this capacity in 40 countries over five years is estimated to cost $3.7 billion.
- The mechanism should be carefully designed to ensure that emissions savings do not occur at the expense of local communities or other benefits of forests such as biological diversity.

1. Introduction

1. Deforestation is estimated to account for about 20% of global greenhouse gas emissions, rivalling the level of emissions from transport or industry. The tragedy is that these forests could be worth much more standing than felled; just the value of the avoided emissions, if they could be traded on an international market like the European Union's Emissions Trading Scheme, could far exceed the value that farmers and loggers gain by clearing the forests for farmland or timber—and this is to say nothing of the inestimable value of the world's great forests as repositories of rare plants and animals and their cultural patrimony. The UK Government's 2006 *Stern Review of the Economics of Climate Change* estimated that compensating eight major rainforest countries—accounting for 70% of the world's deforestation—for the economic losses associated with not cutting down their forests would cost about US$6.5 billion a year.[55] This is a relatively small figure when measured against the $24 billion worth of carbon credits that were traded in the European Union's still new trading scheme.[56]

2. The Kyoto Protocol allows funding—through the Clean Development Mechanism and Joint Implementation—for afforestation and reforestation but it does not reward countries for avoided deforestation or avoided forest degradation, which is often a precursor to deforestation and is a source of carbon emissions in its own right. Two reasons for this exclusion are the potential problem of leakage (the risk that a project to stop deforestation in one region would simply displace deforestation elsewhere), as well as concerns about the permanence of such efforts. The post-Kyoto deal is likely to allow credit for avoided deforestation and forest degradation, however, following a proposal by Costa Rica and Papua New Guinea

[55] Maryanne Grieg-Gran, *The Cost of Avoiding Deforestation. Update of the Report prepared for the Stern Review of the Economics of Climate Change* (London: International Institute for Environment and Development, May 2008), p. 7.

[56] Karan Capoor &= and Philippe Ambrosi, *State and trends of the carbon market 2007* (Washington, DC: World Bank, May 2007).

in 2005. The proposed new mechanism, Reduced Emissions from Deforestation and Forest Degradation (REDD), would entail the transfer of funds to reward countries for avoided deforestation and potentially also for avoided forest degradation.

3. This paper considers ways to ensure that countries have sufficient capacity to participate in REDD. In part this is a technical question of monitoring and verification and it will require the development of baselines, reference scenarios and accurate ways to measure the stock of carbon in forests and changes in this stock. But in many countries with large forest resources, governments have limited control over their forests, due to poor governance; leading to the uncontrolled clearing of land, unclear land tenure and illegal logging, among other problems. The success of REDD will demand the creation of sufficient capacity in rainforest nations to participate. We estimate that the cost of building sufficient capacity in forty forest nations will be up to US$3.7 billion over five years.[57] Importantly, this money will not actually pay for any reduction in carbon emissions from reduced deforestation or forest degradation; rather, it would only be sufficient to build an enabling environment to allow REDD projects to be implemented. For this reason this money will probably have to be raised by governments rather than the private sector.

2. Design Options for the REDD Mechanism

4. Tackling deforestation and forest degradation could provide a cost-effective means of reducing carbon emissions, with costs likely to be between $2 and $10 per tonne of carbon dioxide equivalent (tCO2e) avoided, including administrative or transaction costs.[58] The shape of the REDD mechanism remains to be decided in the UN negotiations but three possible design options are as follows:

- Under a *national-baseline approach*, payments would be made to national governments for reductions in national rates of deforestation calculated according to an internationally agreed baseline set at the national level.
- Under a *project-based approach*, payments would be made to individual projects based on the amount of deforestation that was avoided in a specific project area. A project-based approach is vulnerable to leakage, but it could allow the injection of capital to the forest sector in lieu of capacity at the national level to manage REDD projects.
- Under a *hybrid approach* there are various possibilities, including a so-called nested approach which would allow individual projects to generate credits but require government simultaneously to reduce national deforestation against a national baseline.

5. Another question relates to the source of the money that will finance REDD. Payments will likely be made ex-post, ie retrospectively, for avoided deforestation or forest degradation. For this reason, the financial rewards for the carbon savings cannot be directly used to fund the activities that reduce deforestation. Instead, funds for such activities must be raised beforehand. This money could come from the private sector or from governments, for instance through an international fund, or a combination.

6. No matter what form REDD takes, there will still be a need for investment to build the necessary capacity in countries to allow them to participate in REDD in the first place. This paper focuses on the costs of building that capacity.

3. National Capacity to Avoid Deforestation

7. Deforestation and forest degradation are caused by a complex combination of factors including various market drivers, policy and governance failures that combine to make it more attractive to fell trees than to keep them.[59] Weak governance and poor policy have together prevented many rainforest nations from controlling deforestation, and these factors will also be a key determinant of countries' ability to participate in new financial mechanisms for forest protection, particularly REDD. While such a mechanism has the potential to generate significant payments to countries that reduce rates of deforestation, achieving this is likely to depend on a number of governance-related factors: a basic practical level of control over the forest resource, the means to address the causes of deforestation, and the institutional capacity both to manage the resulting funds and to provide the necessary certainty that any reduced emissions are real and quantifiable.

[57] Alison Hoare et al., *Estimating the cost of building capacity in rainforest nations to allow them to participate in a global REDD mechanism. Report produced for the Eliasch Review by Chatham House and ProForest with input from the Overseas Development Institute and EcoSecurities* (London: Chatham House, 15 August 2008, published by the Office of Climate Change, 14 October 2008); available at http://www.occ.gov.uk/activities/eliasch.htm.

[58] See, eg, K. M. Chomitz, *At Loggerheads? Agricultural Expansion, Poverty Reduction, and Environment in the Tropical Forests* (World Bank Policy Research Report, 2060).

[59] For example see E. Trines, *Investment Flows and Finance Schemes in the Forestry Sector, with Particular Reference to Developing Countries' Needs* (Report for the Secretariat of the UNFCCC, 2007), citing Trines et al., 2006 identifies five broad categories of barrier: economic, risk related, political / bureaucratic, logistical and educational / societal barriers.

8. The drivers of deforestation can be divided into four broad types of activities (both legal and illegal): infrastructure development, agricultural conversion, forest-production extraction and accidents (see Table 1).[60]

Table 1

DRIVERS OF DEFORESTATION

Infrastructure development	Road construction & improvement Urban / semi-urban settlement (legal & illegal) Extractive industries (mining, gas pipelines etc) (legal & illegal)
Agricultural conversion	Plantation agribusiness (legal & illegal) Subsistence agriculture (legal & illegal) Market-oriented agriculture including cattle ranching (legal & illegal)
Forest product extraction	Commercial logging (legal & illegal) Domestic fuel wood (legal & illegal)
Accident	Fire

9. In addition to addressing these drivers, countries must be able to control and manage their forest resources, demonstrate any reductions in deforestation rates and guarantee their permanence, and manage the resulting funds. A range of governance factors will need to be in place, including:

— effective institutions, with clearly defined roles and responsibilities;

— clear and appropriate legislation;

— clear land tenure;

— ability to enforce legislation; and

— monitoring capabilities.

10. Because it is difficult to make any direct link between investment in this type of governance and capacity-building and reductions in emissions, these activities are not likely to be funded by the money that is likely to flow for REDD-related greenhouse gas emissions. Moreover, the private sector in particular is unlikely to invest in countries with poor governance or inadequate policies. Therefore, it may be necessary to consider addressing these underlying factors as part of the preparation for REDD.

11. Table 2 presents a summary of governance interventions that will be necessary for both national-baseline and project-based approaches to REDD. The governance requirements for a project-based approach should be seen as a subset of the requirements under the national-baseline approach. It should be noted that there is a continuum between those interventions that can be regarded purely as part of readiness requirements and those that are part of implementing a REDD strategy. Similarly, there is a range covering those interventions that can be considered essential and those that may simply be desirable. This distinction depends in part on the level of risk that investors are willing to take, but also on political decisions about the level of risk that will be acceptable related to the wider impacts of REDD—in particular, its potential impact on poor and marginalised people. The better the level of governance within a country—for example, if there is an effective judiciary, the rights of indigenous peoples are recognised and there is a high level of transparency within government—the greater the chance that a REDD mechanism will not be to the detriment of the poor and will not be subverted by vested-interest groups.

Table 2

SUMMARY OF GOVERNANCE INTERVENTIONS

Intervention	*National baseline approach (including hybrid approach)*	*Project-based approach only*
National REDD strategy	Develop a strategy Establish REDD infrastructure (for accounting & credit handling; implementation of strategy, etc.) Stakeholder consultation Pilot testing	Establish REDD infrastructure (project registry; assessment capacity)
Monitoring & establishing baseline	Establishing baseline level for emissions Monitoring deforestation and degradation	

[60] Helmut J. Geist & Eric F. Lambin, *What drives tropical deforestation? A meta-analysis of proximate and underlying causes of deforestation based on subnational case study evidence* (Louvain-La-Neuve: University of Louvain, 2001).

Intervention	*National baseline approach (including hybrid approach)*	*Project-based approach only*
Land use	Land reform Land-use planning & zoning Establish capacity to provide support services for SFM, RIL, forest certification, community forestry, PES, agricultural intensification, etc.	Clarification of tenure over land & resources
Legislation	Legal reform (eg to encourage sustainable forest management, allow for community forestry, PES, etc.) Removal of financial incentives for colonisation/ settlement schemes Tax reform (eg removal of subsidies/ tax incentives)	Clarification of relevant laws & policies
Institutional reform (within forestry, agricultural and other sectors)	Clarification of roles & responsibilities (including perhaps decentralisation) Capacity building Improved transparency	
Enforcement	Enforcement of planning & environmental requirements, & forest laws NGO capacity building Establishment of effective & independent judicial system	
Finance sector	Banking/ finance sector reform	

12. Depending on the design and scope of the REDD mechanism, achieving the minimum capacity to allow a country to participate in REDD is likely to include relatively minor criteria like the ability to maintain a national registry to, more fundamentally, the ability of a country to control deforestation within its territory. If a purely project-based approach is favoured, only some of these measures will be essential. If, however, a national-baseline or hybrid approach is chosen then a broader suite of governance improvements will be required.

4. Estimated Costs of Building REDD Governance Capacity

13. We estimated the cost of implementing the governance measures outlined in a report to the Eliasch Review.[61] We considered the types of intervention required to address the drivers of deforestation and then estimated the costs of each of these interventions by comparing them to the cost of similar activities that have already been implemented. Based on this data, we estimated a range of costs for each intervention. We then calculated a range of total costs for a generic country by estimating the cost of introducing all of the governance interventions. If a project-based approach is adopted, minimal interventions may be required, and in some countries, none at all, whereas a hybrid or national-baseline approach would require a greater level of intervention. This rough calculation allowed us to arrive at an indicative figure for the range of possible costs over five years.

14. For a national-baseline approach to REDD the potential costs (in US$) for a country over five years range from $14 million to $92 million.[62] Multiplied by forty to reflect the forty rainforest countries that might participate in REDD, this indicated a range from $550 million to $3.7 billion. For the project-based model, the minimum costs to allow projects to begin could be as low as $1–2 million per country in order to establish an approval process. These figures should be considered with caution, since they are based on the cost of past projects that were not necessarily successful. But even the high end of the cost spectrum calculated for readiness is a relatively low total global figure for five years' investment, given what may be achieved and the magnitude of donor commitments already made. This is encouraging for the prospects for a REDD mechanism.

15. Nevertheless, the relatively low cost of REDD capacity-building is based on a number of assumptions that may be difficult to establish in reality. First, the figure assumes that REDD readiness projects will be successful in achieving their aims despite being based on historical cost data for projects that have often not been able to do so. The greatest challenge for most projects is the absence of political will among those that need to make critical leadership decisions or change their behaviour in order for a project to succeed. Therefore spending this amount of money will not provide any guarantee of achieving readiness in the absence of effective project design and political will—and nor will it necessarily allow the establishment of a functioning REDD mechanism unless some of the overwhelming current economic incentives for deforestation are reduced.

16. Second, the figure assumes that all implementation costs for REDD, which are likely to be orders of magnitude higher than the figures quoted here, will be paid for by carbon revenues. Given that any payments are likely to be ex-post, implementation funds will need to come from either governments or the private sector. In either case, this model will favour countries that are already relatively developed and well-governed, as those that are not will have less government revenue for up-front investment and a national risk profile that is likely to deter private-sector investors in the absence of sizeable potential profits.

[61] Hoare et al., *Estimating the cost of building capacity in rainforest nations to allow them to participate in a global REDD mechanism*.

[62] Amounts are rounded up to two significant figures in order to emphasise that they are rough estimates designed to present an order of magnitude rather than an accurate calculation.

17. Third, the figure assumes that there will be sufficient demand for REDD carbon, depending in part on there being a stable and ambitious carbon price, and a sufficiently practical and efficient mechanism for implementation, which together are necessary to ensure substantial money flows to those responsible for reducing deforestation.

18. It remains unclear from the current debate whether all of these conditions will be met. Therefore the relatively limited spectrum of readiness costs may underplay considerably the real cost of establishing a REDD market that would be accessible to more than a handful of tropical forest countries. Given the political pressure for REDD not only to reduce greenhouse gas emissions but also to achieve a range of other ambitions, such as poverty reduction and biodiversity conservation, the establishment of a mechanism in which relatively few countries could participate can only hinder efforts to reach consensus on this issue within the highly volatile political context of the UNFCCC.

19. While it is probably reasonable to assume that protecting forests contributes positively to maintaining biodiversity, areas which offer the best potential for conserving carbon may not be priorities for biodiversity. Therefore, a focus on forest protection to conserve the most carbon at the lowest cost will not always protect important biodiversity.

20. There is also a risk that diverting large amounts of money into countries and sectors that suffer from corruption could compound existing problems. A comprehensive strategy to tackle corruption in the forest sector is therefore likely to be needed alongside a credible REDD programme.

21. Avoiding deforestation is not necessarily in the interests of the poor and forest-dependent, and increasing the value of forests could lead to greater government involvement in forest resources at the expense of local communities. In those parts of the world where traditional use is technically illegal, or illegal use has been driven by poverty and lack of alternatives, such efforts are likely to result in the prevention of traditional and essential subsistence activities, resulting in further marginalisation and increased poverty for many people.

5. Recommendations

22. These issues could be addressed in a number of ways:

- The development of a national strategy on REDD that includes a wide range of stakeholders, particularly affected parties, could help identify approaches that are appropriate for poor forest-dependent peoples, indigenous peoples and biodiversity. Evidence from other processes such as FLEGT suggests that where there is wide participation results can be more sensitive to poverty imperatives. Therefore, investing as part of "readiness" in either a national strategy process or a project planning process which is as inclusive as possible is likely to have long-term benefits in reducing any negative impacts on the poor and biodiversity and, where possible, increasing co-benefits.
- There may be scope for linking REDD to other projects funded by official development assistance that help finance co-benefits such as biodiversity conservation.
- Public money could be made available to establish institutions and implement a range of activities in the least developed countries to help support and develop REDD projects where private financing would not otherwise flow.
- It may be necessary to facilitate REDD projects that go above and beyond the minimum standards that are likely to be established under UNFCCC rules. This could allow companies and/or governments to demand higher standards relating to the impact of REDD on the environment and social benefits (akin to "Gold Standard" CDM projects).

October 2008

Memorandum submitted by Duncan Brack, Associate Fellow Energy, Environment and Development Programme, Chatham House

Summary

- Procurement policies aimed at excluding illegal and unsustainable timber products are already proving a valuable weapon in the armoury of consumer states. The UK's central government timber procurement policy in particular is proving successful, and is a good model for other countries to emulate.
- A wide range of figures tend to be quoted for the size of public procurement (and, therefore, the impact of public procurement policy on the market). In fact, in developed countries public-sector purchasing of products and services from third parties amounts to about 10% of GDP. Although it

is not known whether this is an accurate figure for timber and timber product procurement, studies suggest that suppliers' preferences for relatively simple supply chains can magnify the direct impact of public purchasing.

— The domination of the government procurement market by the two major timber certification schemes (FSC and PEFC) is tending to render differences between countries' procurement policies (including over the inclusion of social criteria) to be less important. However, it is also leading to growing incentives to defraud the system, and it is not clear whether the schemes can police effectively their own certificates. The focus on sustainable products also risks impeding the take-up of FLEGT VPAs, which guarantee only legal products.

— Building standards can be useful in encouraging take-up of legal and sustainable timber, but as points-based systems they are less effective than they could be. Government can go beyond the minimum requirements in using them as the basis for funding policies, such as the Building Schools for the Future programme, which could, for example, have a requirement for legal and sustainable timber incorporated in it.

— Implementation of timber procurement policies by local authorities is limited and patchwork, but there are some good stories, and many opportunities for central government to exercise influence. As well as direct communications and encouragement through DEFRA and CPET, these include the inclusion of sustainable procurement within the Audit Commission's CPA rating system, encouragement for regional development agencies to require legal and sustainable timber in construction projects, and engagement with elected councillors.

1. Introduction

1. One major policy instrument that consumer countries can use to address illegal logging and unsustainable forestry—as commented on at some length by the Environmental Audit Committee in its January 2006 report[63]—is public procurement policy. Effectively this is the creation of a protected market in which only legal and/or sustainable timber products can be bought for government contracts.

2. Several EU member states, and a number of other countries, now possess government procurement policies aimed at ensuring that public purchasers source only legal and/or sustainable timber and wood products. As of October 2008, these include Belgium, Denmark, France, Germany, Japan, the Netherlands, New Zealand, Norway and the UK; a number of other countries, mostly EU member states, are considering adopting similar policies.

3. Chatham House has worked on the issue of timber procurement, as part of our broader programme of work on illegal logging, for several years. Recent outputs include a concise summary of timber procurement policies (June 2008)[64] and a series of case studies of the implementation of timber procurement policies in English local authorities (September 2007).[65] A study of social issues in timber procurement policies is currently under way and should be finished by November 2008.[66] Drawing on these studies, this submission highlights key issues in a number of areas relevant to the EU and its member states, and in particular the UK.

4. What should be stated at the outset is, procurement policies aimed at excluding illegal and unsustainable timber are already proving a valuable weapon in the armoury of consumer states. Although to date only two countries—the Netherlands and the UK—have undertaken market research studies on the impacts of public procurement policies on overall supply, both showed that the volume of certified timber products imported had grown steadily since their introduction. In the UK, certified products now account for over 50% of the market (both domestic production and imports),[67] though only 8% of global forest area is certified. Although the effect of other government policies, NGO and public pressure and a growing industry commitment to environmental and social responsibility should not be discounted, it seems likely that procurement policy has had the greatest single impact.

5. Procurement policies are effective because they can be developed and implemented more rapidly than most other policy options, and the evidence suggests that they can have a much broader impact on consumer markets than simply through the direct effect of government purchases (see further below). The UK's central government timber procurement policy in particular is proving successful, and is a good model for other countries to emulate. And as well as the direct impact on markets, another effect of the introduction of procurement policies has been on forest certification schemes themselves; modifications in some of the major schemes have resulted from the need to meet countries' criteria for sustainable timber.

[63] House of Commons Environmental Audit Committee, *Sustainable Timber* (HC607, January 2006)

[64] Duncan Brack, *Controlling Illegal Logging: Using Public Procurement Policy* (Chatham House, June 2008); available at http://www.illegal-logging.info/item_single.php?item=document&item_id=633&approach_id=1

[65] Duncan Brack, *Local Government Timber Procurement Policies: Case Studies from the North East and Yorkshire & the Humber* (Chatham House, September 2007); available at http://www.illegal-logging.info/item_single.php?item=document&item_id=517&approach_id=1

[66] The third draft of the study (June 2008) is currently available at http://www.illegal-logging.info/item_single.php?item=document&item_id=634&approach_id=1

[67] See the series of studies of price premiums for verified legal and sustainable timber produced by Forest Industries Intelligence Ltd for the UK Timber Trade Federation and DFID; available at http://www.illegal-logging.info/item_single.php?item=document&item_id=177&approach_id=1.

6. Governments everywhere are displaying increasing interest in the development of sustainable procurement policies across a wide range of product sectors. In many ways timber procurement policy has been developed in more detail than in many other sectors, and valuable lessons can be learned from this experience for procurement policies aimed at other product areas.

2. Scale

7. Figures quoted for the size of public procurement (and, therefore, the impact of public procurement policy on the market) in the debate around the control of illegal logging have varied widely, from over 40% to less than 3%.

8. In fact, in developed countries, purchasing of goods and services by public authorities is generally estimated to account for an average of about 10% of GDP. (Figures of 15–20% which are frequently quoted relate to total public-sector consumption (ie government expenditure excluding transfer payments, such as welfare benefits), which includes substantial expenditure on "employee compensation": salaries, pensions, etc. Government purchasing of products and services from third parties is significantly smaller: about 9% of GDP for OECD countries during 1990–97.[68] UK public expenditure statistics for 2005–06 showed 10.48% of GDP devoted to public procurement.

9. Government purchasing varies significantly across product sectors, of course—from very high proportions (eg defence, transport infrastructure) to very low (eg consumer goods). Since it is generally very difficult to get hold of detailed figures for different sectors, the assumption is often made that public procurement in any one sector is the same proportionally, as public procurement in the economy as a whole. For example, since UK public procurement accounts for about 10% of GDP, most reports on timber procurement assume that the UK public sector accounts for about 10% of the market for timber and timber products.

10. This is a dubious assumption; but nevertheless, given the scale of public purchasing of products such as timber for construction (including contractors' disposable material), office and park furniture, and paper, the overall impact of government activity is still likely to be significant. And as is being demonstrated in some EU countries, this can be magnified by suppliers' preferences for relatively simple supply chains; if they need to supply sustainable timber for public purchasers, for example, the evidence suggests that they are tending to prefer to supply the same products to their other customers too. (Anecdotal evidence from the UK suggests that as a result they are currently supplying more than the market is actually demanding.) Food and Agriculture Organisation research estimates that government procurement can achieve market leverage of 10–25% when knock-on impacts such as these are included.[69]

11. It should be remembered that the 10% figure relates to the entire public sector, which includes regional and local government, and often many quasi-independent agencies, alongside central government. Across the OECD as a whole, central governments account for about 30–35% of total public sector expenditure. However, this varies substantially between countries, from highly centralised states such as the UK, where central government account for about 70% of the public sector, to more decentralised ones such as Germany, where the corresponding figure is about 20%[70]—another reason for the relative success of UK policy.

3. Criteria and Proof

12. All countries with timber procurement policies have adopted the aim of purchasing timber which is sustainably produced—either as the only requirement or as a desirable one. Precise definitions of "sustainability" vary but in general revolve around forest management designed to avoid harm to ecosystems, maintain forest productivity, ensure forest ecosystem health and vitality and maintain biodiversity. The definitions often require that the standards specific to any given timber-producing country have been developed through a consultative process, open to participation by all affected parties, including commercial, environmental and social stakeholders. Recycled wood and paper are also generally acceptable. Definitions of sustainability also tend to include the requirement that all national and international laws must be respected; these products should therefore be legal.

13. The environmental components of the sustainability criteria have proved relatively straightforward. The question of including social criteria, however, over and above those legislated for in the producer country itself—for example, the customary land tenure rights of indigenous forest communities, or the rights of the logging workforce—has sometimes proved controversial. In particular, UK policy does not currently allow timber purchasers to specify criteria that are not directly related to the subject matter of the contract; this excludes social or ethical issues which, it is argued, generally have no discernible effect on product quality or performance. Unless such issues are covered by law, therefore, they cannot be included in UK contract specifications, selections of suppliers or awards of contracts.

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[68] See Donald Marron, "Greener Public Purchasing as an Environmental Policy Instrument", in *The Environmental Performance of Public Purchasing: Issues of Policy Coherence* (OECD, 2003).

[69] Marku Simula, "Public procurement policies for forest products and their impacts", presentation at Joint UNECE/FAO Policy Forum on Public Procurement Policies on Wood and Timber Products, Geneva, 5 October 2006; available at: http://www.unece.org/trade/timber/docs/tc-sessions/tc-64/01_Simula.pdf.

[70] Marron, "Greener Public Purchasing as an Environmental Policy Instrument", p. 43.

14. This is based on an interpretation of EU procurement rules which other EU member states do not share; their policies all include some social criteria in their specifications. The ongoing Chatham House study referred to above is designed to illuminate this argument and to suggest which social criteria are of importance in timber procurement policy, and which could be considered to be permitted under EU and WTO procurement rules.

15. Up to a point, however, this argument is academic. The main route through which timber products can be assessed in terms of sustainability are the various private certification schemes that have developed since the mid-1990s, in response to the growing demand for environmentally friendly timber. The area of the world's forests that is certified is growing rapidly, albeit from a low base; as at May 2007, 8% of forest area was certified, a figure that has doubled since 2002. (However, only 7% of certified forests were in developing countries, a proportion that has not changed since 2002.[71])

16. In practice, certification is now dominated by two schemes at the global level: the Forest Stewardship Council (FSC), which accounts for 28% of certified forests; and the Programme for the Endorsement of Forest Certification Schemes (PEFC), which acts as a recognition mechanism for national schemes world-wide, and accounts for 65% of certified forests. One of the main developing-country schemes outside the PEFC, the Malaysian Timber Certification Council (MTCC) scheme, is currently applying for PEFC endorsement.

17. Procurement policies have used certification schemes in one of two ways. Some countries, including Denmark, the Netherlands and the UK, have developed their own criteria for legality and sustainability, and then assessed the extent to which the certification schemes meet them. In the UK, for example, the Central Point of Expertise on Timber (CPET) has found FSC and PEFC to be adequate to guarantee sustainable timber. MTCC has been assessed as good enough to guarantee legal, but not sustainable products, though CPET is currently conducting a reassessment. Other countries, including France and Germany, have adopted a less elaborate system, deciding that particular certification schemes—always FSC, and generally PEFC—are adequate to meet their criteria.

18. EU procurement rules require that procurement policies must rest on criteria, not on membership of any particular scheme. All these countries must also possess some system for assessing claims by suppliers that their products meet the sustainability criteria even if they are not certified by any recognised scheme. In the UK, for example, CPET carries out these assessments (of the so-called "Category B" evidence). In practice, this assessment of "equivalent evidence" has been relatively little used by suppliers to date, and it is so much easier to prove sustainability through certification schemes that it seems likely that this will continue to be the case.

19. This domination of the government procurement market by two effective schemes has three implications. First, although in theory it would certainly be desirable for consumer countries to harmonise their procurement policies, so that suppliers are not faced with information barriers when exporting to these markets, in practice this matters only rarely, as whatever the details of the policies, the same certification schemes will be used to meet their criteria. (Similarly, the UK's reluctance to include social criteria in its policy is muted in its impact, as both the main certification schemes incorporate a wide range of social criteria.)

20. Second, it can be expected that there will be growing incentives to defraud the certification schemes. The schemes were developed originally as voluntary instruments for relatively niche markets, not as the mandatory requirements for market access that they are steadily becoming. This growing use of the schemes is of course a desirable development, but raises the question of whether the schemes themselves possess the ability to monitor closely the issue and use of their labels and to detect fraudulent versions of them. There are already anecdotal stories of suspiciously high volumes of FSC-certified timber being exported from China, and the problem is likely to get worse.

21. Third, it is important not to place at a disadvantage those countries agreeing Voluntary Partnership Agreements (VPAs) with the EU under the Forest Law Enforcement, Governance and Trade (FLEGT) initiative. FLEGT-licensed timber will be legal but not necessarily sustainable and will not, therefore, be acceptable for most EU countries' procurement policies. Within the EU, only Denmark and the UK accept legal or sustainable timber, and from April 2009 the UK will purchase only sustainable products, although, with the aim of ensuring that the FLEGT process is supported, until April 2015 products covered by a FLEGT licence will also be acceptable. However, the volume of FLEGT-licensed timber seems likely to be limited for some time to come; as of October 2008, only one country (Ghana) has agreed a VPA, and more time will be needed for implementation. The 2015 cut-off date therefore seems likely to come too soon, and in any case most EU countries do not possess even this exemption. The EU should not be encouraging countries to sign VPAs on the one hand and refusing to purchase FLEGT-licensed timber for public contracts on the other.

4. Building Standards

22. Governments have the power to establish standards for both public and private construction, and increasingly these relate to environmental performance. The systems used generally award points for satisfying various environmental criteria, and then assess particular designs according to the total number of points accumulated. For example, BREEAM, the UK Building Research Establishment's Environmental

[71] Alan Purbawiyatna and Markku Simula, *Developing Forest Certification: Towards Increasing the Comparability and Acceptance of Forest Certification Systems World-Wide* (ITTO, 2008).

Assessment Method, awards points for the use of sustainable and recycled timber in new and existing buildings. Such systems do not absolutely guarantee that the timber used is legally or sustainably produced, since high total scores can always be reached even if zero points are scored for timber.

23. In the UK, since March 2005 it has been a condition of central government funding that all major school projects, both new build and refurbished schools, must achieve a minimum BREEAM rating of "very good" (the second highest). For domestic housing, the Code for Sustainable Homes was launched in December 2006; compliance with the Code is currently voluntary but may become mandatory. As with the other schemes mentioned here, the Code uses a points-based system encouraging, rather than requiring, the use of timber which is reclaimed, re-used or "responsibly sourced"—though there is a mandatory requirement that all timber must be legally sourced. The points are based mainly on the CPET assessment of certification schemes.

24. Building standards such as BREEAM can be very useful in encouraging the take-up of legal and sustainable timber. But they would be more effective if the use of legal—and in due course sustainable—timber was a mandatory requirement, rather than simply one which accumulated more points. Even if the assessment systems themselves do not change, government can go beyond the minimum requirements in using them as the basis for funding policies, such as the Building Schools for the Future programme—which could, for example, have a requirement for legal and sustainable timber incorporated in it. In this connection, the failure of the government's green paper, *Homes for the Future: More affordable, more sustainable* (July 2007), and the accompanying policy statement Building a Greener Future, even to mention the topic of timber use was a missed opportunity.

5. Local Government

25. Local and regional government is not, of course, covered by central government procurement policy, and the extent to which sub-national authorities possess any form of timber procurement policy has not been widely studied. In the UK, a WWF study of London boroughs in 2005 found that half had no policies in place at all, and less than a fifth claimed to be fully implementing one.[72] It was against this background that, in 2007, DEFRA provided funding to Chatham House to conduct a series of case studies of local authorities in two English regions, the North East and Yorkshire & the Humber.

26. The 12 councils studied were chosen on grounds which should have selected those most interested in the issue within these two regions, yet only two of them had a full timber and timber products procurement policy, and only one was systematically monitoring its implementation. Four others had a partial timber procurement policy, for specific products or departments. Although several authorities expressed an interest in developing their policy further, knowledge of central government policy, and of CPET and its services (which include the provision of advice and training to local authorities) was very low; only one council appeared even to have heard of it, though it was planning to develop a policy explicitly modelled on central government's procurement approach.

27. The study examined the reasons for this lack of progress—including a very wide diversity of council structures and responsibilities, a lack of data on purchases and specifications, and the general low priority given to this area, but it also highlighted the many opportunities for central government to influence local authorities positively. DEFRA and CPET have responded by improving their communications strategies and convening a group of interested local authorities. There remain, however, a number of areas for which DEFRA itself is not directly responsible but where action could still be usefully taken. These include:

- Inclusion of sustainable procurement within the Audit Commission's Comprehensive Performance Assessment (CPA) rating system. This is probably the single most helpful step that could be taken, setting a clear incentive to develop policies in this area.
- Inclusion of requirements or incentives to use sustainable building materials in construction projects funded by central government (see above).
- Encouragement for regional development agencies to require legal and sustainable timber in any construction projects which they support.
- Engagement with elected councillors, for example through the Local Government Association political groups and/or the political parties' own councillor organisations. Civil servants may not be best placed to pursue this route, which is probably better suited to MPs, including ministers and shadow ministers—and members of the EAC itself.

October 2008

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[72] Rich Howorth, Beatrix Richards and Christian Thompson, *Capital Offence: Is London Failing the Forests?* (WWF, 2006).

Memorandum submitted by Sam Lawson, Independent consultant
On behalf of: Energy, Environment and Development Programme, Chatham House

Summary

- Given the global focus in recent years on the problem of illegal logging, and the discussions and activities that have resulted, an assessment of their effectiveness would be useful. In an ideal world, one would measure the extent of illegal logging and the volumes of illegal timber in trade. Virtually by definition, however, this is impossible, and so proxy indicators are needed to judge the impact of activities over time.
- Chatham House is currently engaged in pilot-testing a set of indicators of activities, in four categories (awareness; government policy development and implementation; private sector policy development and implementation; levels of illegal logging and trade) together with expert surveys of perceptions of activity and effectiveness. The indicators are being measured in producer, processing and consumer countries.
- Although monitoring of the indicators is only just beginning, tentative conclusions can be drawn. Awareness of the problem has clearly grown across the board over the last few years, and as a result, governments, international bodies and timber companies are spending increasing amounts of money on tackling the problem.
- It is much harder to assess the implementation of these new policies and commitments, or what impact they have had. The evidence suggests that implementation is lagging behind commitment.
- There is a clear need for some form of regular independent monitoring of progress in the global efforts to tackle illegal logging, particularly given the emergence of new structures such as the FLEGT Voluntary Partnership Agreements. We aim for Chatham House's work to be at the centre of this monitoring process.

1. Introduction

1. Illegal logging and associated trade has become one of the most high-profile international issues of the new century. At the UN and other political forums, governments have repeatedly recognised the scale and importance of the problem and committed themselves to tackle it. With attention and commitment has come financial support, and the last six years have seen a burgeoning stream of studies produced, workshops held, policy reviews carried out, and projects launched.

2. As awareness has grown, the agenda has gradually moved from studying the nature of the problem to analysing potential solutions and to implementing them. With the strong mandate provided by the EU's Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, it can be expected that the issue will continue to be the focus of significant resources and attention for some years to come. Yet unless a real difference can soon be shown to have been made and that the resources committed have not been wasted there is a chance that attention will turn elsewhere.

3. It is therefore increasingly important to measure the response to the problem of illegal logging and associated trade and to gauge its effectiveness. In an ideal world, one would measure the extent of illegal logging and the volumes of illegal timber in trade. Virtually by definition, this is impossible, and so proxy indicators are needed to judge the impact of activities over time.

4. As part of Chatham House's illegal logging work programme, this process began with an initial study published in early 2006.[73] The paper provided an overview of the response in producer, processing and consumer countries, within both the public and private sectors, and proposed a list of 20 potential indicators of change against which it might be monitored, grouped under four main headings: awareness, government policy development and implementation, private sector policy development and implementation, and actual levels of illegal logging and trade.

5. A follow-up paper in 2007[74] examined these indicators in more depth, using a sample of focus countries to assess whether and how the indicators might be measured objectively, in a manner which would be consistent enough to gauge progress over time. The study also drew on experiences from other fields. The study found that the paucity of useful data presented a significant hurdle to the effective monitoring of the indicators, particularly in relation to actual levels of illegal logging. One suggested solution was for those conducting the monitoring to commission perception surveys of relevant experts from a range of stakeholder groups.

6. Chatham House has now brought together an advisory group of experts in the field of forest governance to help develop the methodology more precisely, including drafting detailed perceptions surveys for use in producer countries and agreeing "ideal" lists against which to measure the policies of governments. Chatham House, assisted by partner organisations in producer and processing countries, is now rolling out a first pilot

[73] Emily Fripp, *Illegal Logging and Related Trade: Measuring the Global Response* (Chatham House, March 2006); available at http://www.illegal-logging.info/item_single.php?item=document&item_id=373&approach_id=1

[74] Sam Lawson, *Illegal Logging and Related Trade: Measuring the Global Response* (Chatham House, December 2007); available at http://www.illegal-logging.info/item_single.php?item=document&item_id=561&approach_id=1

assessment of the indicators, in Cameroon, Indonesia, UK, US and Viet Nam. The assessment is expected to be published early in 2009; the experience will be used to produce a final methodology which will be rolled out to a broader set of countries thereafter: initially a further seven (Brazil, China, France, Ghana, Japan, Malaysia and Netherlands) and ultimately (depending on funding) a much wider range.

2. The Indicators

7. The indicators span all the stages of the response to the problem of illegal logging and associated trade, including intermediate steps such as raising awareness, and introducing and implementing new policies. The indicators cover both the private and public sectors, and are designed to take account of developments in producer, processing and consuming countries. One reason for including steps towards the end goal is that progress in these areas is often much easier to ascertain and quantify. Caution will need to be taken with such assessments, however, since progress with intermediate goals does not necessarily lead to an impact in the forest.

8. There are various ways in which to measure the direction and extent of change in a particular issue over time, but most depend on a plentiful and regular supply of quantitative primary data, which is often unavailable for indicators of illegal logging. There are ways around this problem, however, and lessons are being drawn from attempts to measure similarly difficult issues, including the Corruption Perceptions Index produced by Transparency International (TI), the Fraser Institute's Index of Economic Freedom (IEF) and the illegal fishing assessment conducted for the Marine Resources Assessment Group (MRAG). Chatham House has also looked at the WWF "illegal logging barometer" and previous considerations by forestry researchers of how progress might be gauged.

9. The TI index usefully points to how quantitative information for which there is no objective data can be gleaned from subjective interviews via questionnaires. The MRAG assessment shows how limited anecdotal data can be manipulated and extrapolated using educated guesswork and proxies in order to provide estimates of the extent of a similar problem, but such assessments are too inaccurate to be used safely to measure change over time. The WWF methodology shows how limited qualitative surveys can garner useful additional information not readily available in the public domain, and how simple scores can be attributed to this information, though such a scoring system is subject to bias.

Awareness

10. Useful data on the level of awareness in various countries can be gleaned from media databases. Searches can be conducted for relevant articles in both domestic and international media, and in local languages. These tend to show that coverage of the subject is growing across the board, though the amount of attention remains much lower in less sensitive countries such as France, China and Viet Nam. Simple numbers can be misleading, qualitative analysis of news media is necessary to put the numbers into context. An examination of coverage in the five focal consumer countries[75] in 2005 reveals that in the US, for instance, where overall coverage appears high, very few stories were published in the largest outlets, and almost none mentioned the role of the country as a consumer. The pilot assessment currently being carried out is collecting both quantitative and qualitative information on media coverage of the subject of illegal logging and associated trade, and is also measuring awareness as part of the survey of experts.

Government policy development and implementation

11. Quantifying the development of policies and regulations is difficult; the means currently being piloted is a simple assessment against a set of ideal criteria. For producer countries, such criteria include such factors as whether forest laws recognise traditional rights, or whether concession licences are allocated publicly by competitive tender. For consumer and processing countries, the assessment looks at such measures as whether procedures exist for inter-agency coordination on tackling the problem, or whether existing legislative options for halting imports of illegal wood have been analysed. The Chatham House team has worked with the advisory group of experts to draw up draft lists of ideal policies for different country types, guidance on how they should be assessed, and methodologies for summarising and comparing the results.

12. Assessing the extent to which regulations are implemented and enforced is problematic. For consumer and processing countries there is little limited basis for enforcement against illegal timber imports and therefore very little data; figures on the implementation of public procurement policies, where these exist, is also limited. In producer countries, ideally it would be possible to monitor figures for the number of illegal logging cases, and the percentage of successful prosecutions. It is clear, however, that the data with which to measure such factors—and make comparisons over time—often do not exist. There is also the problem that most figures for enforcement; such as volumes of seized wood, could as much be the result of an increase in illegal logging as a sign of its reduction. Nevertheless, the current pilot assessment is seeking to gather implementation and enforcement data wherever possible. The perceptions survey of experts in producer countries will also provide data with which to assess implementation and enforcement of government policies.

[75] Out of the twelve listed above: ie France, Japan, Netherlands, UK, US.

Private sector policy development and implementation

13. Quantifiable information on forest certification (eg by the Forest Stewardship Council, FSC) and membership of schemes such as the WWF Global Forest and Trade Network (GFTN), the Tropical Forest Trust (TFT) and the Timber Trade Action Plan (TTAP), all show that increasing numbers of companies are realising that they need to take action on illegal timber. The growing awareness of and interest in the issue of illegal logging and associated trade has been the major driver in recent years for the dramatic expansion of all these initiatives, both in terms of numbers of companies and of their geographical range. The data reveals how, as time has passed, concerned companies in consuming countries have forced suppliers elsewhere to follow suit. The area of greatest growth of supply-chain schemes is now among factories in China, while much of the growth in forest management certification is focused on Indonesia.

14. Evidence of impact from these schemes is much harder to come by. Although they are issuing many more chain-of-custody certificates to companies in China and elsewhere, the FSC does not collect information on the volumes of certified wood these companies are actually handling. Most of the companies joining GFTN have done so very recently, and the only GFTN member country to have produced any data on implementation at the time of the 2007 study was the UK. The area of tropical forest whose forest management is certified under all the main certification schemes continues to expand, however, while volumes of timber traded under the Malaysian Timber Certification Council (MTCC) scheme have shown strong growth.

15. Although procurement policies in Europe are expected to continue to drive a sharp increase in demand for legally verified timber, so far there is little evidence to show an increase in the price premiums available in the market for such products. Better information is likely to be available in the future, but the pilot assessment will seek to acquire additional information drawn from private sector respondents through surveys in producer and processing countries.

16. The financial sector has a key role to play in tackling illegal logging and associated trade, and the indicators will also seek to assess performance in this area, though limited data is available. Finally, the indicators will use trade data to monitor the extent to which the effectiveness of bilateral trade controls in countries such as the EU and US is undermined by timber being redirected to less sensitive markets.

Estimated levels of illegal logging and trade

17. Most estimates of illegal logging in producer countries are drawn from wood-balance modelling studies, which compare legal timber supplies (legal harvesting, legal imports) with demand (domestic consumption and exports). Although analyses of this kind have been carried out for many producer countries in the past, methodologies vary dramatically and the studies are rarely updated in a consistent manner. Chatham House is working with partner organisations to collect the necessary data with which to conduct its own wood-balance modelling analyses for producer countries.

18. Wood-balance modelling also importantly fails to capture illegalities in cutting, processing and trade within the overall prescribed annual legal production, which in some producer countries may represent the bulk of the problem. Its use as an indicator should therefore be limited to assessing the direction of change, rather than actual volumes or percentages.

19. Major reductions in illegal logging in affected source countries should reduce timber supplies, and it might be expected that this would generate a price response. An analysis of price data for primary wood products in the focus countries, however, shows that prices are generally a poor indicator of changes in the level of illegal logging. Although there is evidence that dramatic tropical timber price increases in South-East and East Asia during 2005–06 were directly related to a reduction in illegal logging in Indonesia, the response was dependent on unique circumstances.

20. Trade data discrepancies can provide a useful indicator of the volume of illegal trade, but only in limited circumstances, where relatively large volumes of primary wood products are traded (such as between Malaysia/Indonesia and China). Discrepancies can also only give an indicator of the amount of wood that is illegally exported, and not the overall amount of illegally sourced timber being traded. An analysis of trade data in recent years for the focus producer and processing countries of the 2007 study[76] showed that discrepancy analysis is unlikely to be a useful indicator of trade from Brazil, Cameroon or Ghana, but is more likely to be useful for trade between Indonesia/Malaysia and processing countries such as China and Viet Nam. The pilot assessment will examine trade data discrepancies for the initial focus countries.

21. One of the most difficult aspects of the "end goal" to measure is the trade in illegal timber into Western consumer countries such as the EU or US. Direct primary product trade into these countries from affected producer states is increasingly small, making discrepancy analysis unreliable. The only other direct measure available is import source analysis—where percentage estimates of levels of illegality in source countries are multiplied by trade volumes. This method is a very blunt instrument, however, since it is dependent on estimates of illegality at source which are often very imprecise, and which are rarely updated in a consistent manner over time. Given the lack of any other technique by which to estimate volumes of illegal imports into consumer countries, however, it may yet have a role.

[76] Producer countries: Brazil, Cameroon, Ghana, Indonesia, Malaysia. Processing countries: China, Viet Nam.

Conclusions So Far

22. Although monitoring of the indicators is only just beginning, baseline data collected in the process of developing the methodology do allow some tentative conclusions to be drawn about the progress of the global response to illegal logging. Our studies have shown that it becomes increasingly difficult to measure change as one progresses along the stages of response from initial awareness to actual changes in the forest, largely because of the availability of evidence.

23. Nevertheless, it is clear that awareness of the problem has grown across the board over the last few years. The media has paid much more attention, governments have shown more willingness to discuss the issue in international forums, and companies in producer, processing and consuming countries are increasingly alert. A growing number of national and international NGOs have begun campaigning on the topic, and their activities have played a key role in increasing awareness. Although this growth in awareness was initially geographically limited, it is beginning to spread more widely.

24. This growth in understanding has clearly had an effect. Governments, international bodies and timber companies are spending increasing amounts of money on tackling the problem. A growing number of consuming countries have implemented procurement policies requiring proof of legality, and a growing number of timber companies have signed up to schemes meant to clean up their supply chains. The evidence shows how this response has also spread geographically in recent years. Companies in sensitive consuming countries, driven by consumer awareness and new public procurement requirements, have in turn demanded action from their suppliers in places like China and Indonesia. Consumer and producer countries, stymied in their joint efforts to halt illegal trade which is indirect, have helped push the issue further up the agenda in re-exporting countries. Even parts of the financial sector have come on board.

25. It is much harder, however, to assess the implementation by governments and companies of these new policies and commitments, or what impact they have had, although more data should be available in the near future. The limited evidence available so far indicates that implementation is lagging behind commitment. The vast bulk of timber illegally harvested in the main producer countries is also traded and consumed outside the remit of the new public procurement policies, supply chain controls of governments, and companies in sensitive western markets reducing their potential impact. Although trade statistics do not appear to show illegal timber being diverted to less sensitive markets, this is probably because the market impact of new initiatives has been too small for any response to be visible. Consequently price premiums for certified wood remain low.

26. Potentially of greater long-term importance are initiatives by governments in producer countries, but suitable data with which to gauge the implementation of new policies—such as prosecution rates and seizure volumes—are rare or non-existent. The only producer country where strong evidence exists of an actual impact on the ground is Indonesia. Seizure data, prosecutions, price changes, and wood-balance models all point to a significant drop in illegal logging in the last two years.

Future Monitoring

27. There is a clear need for some form of regular independent monitoring of progress in the global efforts to tackle illegal logging. This has become increasingly important in recent years as larger and larger sums of money are committed by donors countries, and as wide-ranging international trade measures such as the Lacey Act amendment and the EU's FLEGT Voluntary Partnership Agreements are implemented. Additional attention and resources are likely to be brought to bear through increased interest in tackling climate change, as governments come to appreciate the critical role of poor forest governance in driving deforestation, and the importance of deforestation in turn as a contributor to climate change.

28. If the pilot assessment being conducted by Chatham House is to be broadened and repeated, whether annually or biennially, additional funding will be required from the donor community, but it will also be important that efforts are made to improve the availability of useful data. The FLEGT Voluntary Partnership Agreements currently being negotiated by the EU with producer countries provide an excellent opportunity to leverage additional information from governments, and the need to monitor the overall effectiveness of these agreements should provide additional support to the goal of effective monitoring of the indicators.

October 2008

Witnesses: **Mr Duncan Brack**, Associate Fellow, and **Ms Alison Hoare**, Associate Fellow, Energy, Environment and Development Programme, The Royal Institute of International Affairs, Chatham House, gave evidence.

Q93 Chairman: Good morning and welcome to the Committee. We have just been talking a bit about governance. I wonder if you could say how important you think an improvement in governance is in tackling deforestation.
Ms Hoare: It is absolutely fundamental. A lot of deforestation is the result of poor governance and so without effective governance it is not possible for a government to control its forest resources. It needs to devise a strategy or plan of how to manage the forests and also you need good governance to implement that planning. Without good governance nothing is going to work basically.

Q94 Chairman: What do you think about the progress of Poznan on these issues, if any?
Ms Hoare: I did not participate in Poznan, but from the feedback that I have had from colleagues I guess I would say that the progress was probably what was to be expected. It is very much just a step on the road to Copenhagen. As we heard from the previous witnesses, there was little progress in terms of some of the substantive issues, but it was useful in identifying some of the key methodological and more technical questions that still need to be addressed. So really the next year is going to be very critical in the run up to Copenhagen.

Q95 Chairman: Do you think it is possible to be successful in dealing with deforestation without both poor governance being tackled and also the whole question of the economic value of the qualities that can be produced? Are those two ingredients absolutely essential to the process of tackling deforestation?
Ms Hoare: In relation to forest governance, yes, it is certainly essential. As I was highlighting, a government needs to be able to be able to control its resources, it needs to be able to develop an effective strategy and implement this. This means that you need effective institutions and there needs to be systems in place so that governments can consult with all the stakeholders concerned. All those elements need to be in place if deforestation is going to be tackled. The second part of your question was?

Q96 Chairman: It is really how the economic factors work in this as well.
Mr Brack: Clearly there needs to be a higher value to protecting the forest and not cutting down than there is to logging it or replacing it with agriculture—palm oil or soy or whatever. At the moment the economic returns to alternative investments like palm oil and soy are much, much higher than sustainable forestry. So until you sort that out as well as the governance problems you will not have a solution. If you are going to say that countries will be protecting much bigger areas of their forest than they currently to, you also have to find a means of making a living for all the people who currently rely on extractive methods of forestry and that is millions of people, which is not an easy thing to do.

Q97 Dr Turner: What do you think about the treatment of governance issues in the Eliash Review?
Ms Hoare: I welcomed the strong focus on governance issues, I think that was right and highlighting the fact that there needs to be effective institutions in place and also the focus on land rights and ensuring that those fundamental issues are addressed. Where I do have concerns is I think it was overly optimistic in relation to the ease with which those issues can be addressed. I think it will be a lot more difficult than is implied by the Eliash Review. If you look at the history of development interventions, they all show and highlight the difficulty of bringing about effective reform.

Q98 Dr Turner: You clearly do not share his confidence that the governance issues can be wrapped up in five years and the history of attempting to tackle governance in the past backs up your lack of confidence, does it not?
Ms Hoare: Yes. I do not share the optimism that we can address these issues within five years. Clearly the situation varies hugely in different countries. In some countries if you have effective interventions with a clear idea of how to intervene and good support from the government in place then five years would be sufficient, but in many other countries it will not be. A key problem is that in many countries there still remains a lack of political will to instigate change.

Q99 Dr Turner: What would you say were the principal reasons for the failures of past attempts at governance reform?
Ms Hoare: It is difficult to say. There is a whole host of reasons. From the perspective of the donor side of view, it is often a case of perhaps not a sufficiently co-ordinated approach and not consistent, not having a sufficiently long-term view as well. It is not possible to have effective forest governance reform without looking more widely, so it has got to be part of a bigger picture. In many countries failures in forest governance is due to wider governance failure, so you need a very broad picture. In countries where the whole sociopolitical system is not functioning effectively it is very difficult to instigate change.
Mr Brack: We have tried to encourage people to look at the lessons from the FLEGT process which is designed to improve governance in forest countries, so it is tackling exactly the same problems that any REDD mechanism will have to do. The sheer scale of the problems they are tackling is very daunting in some countries. We are talking about the clarification of forest law which is often contradictory between different levels, between national and regional levels and generally not well enforced anyway. The previous witnesses made the comment about the lack of capacity which is certainly true. You are talking about clarification of land ownership legislation which has been a problem in many countries for decades, if not longer. You are talking about needing to put in place a system for independent verification of what is going on, which

can be quite costly. The five-year target might be possible in some countries, but you are assuming general political will across all elements of government and not just the forestry ministries, which I think are generally signed up to the REDD agenda, but all the other law enforcement agencies, finance ministries, industry, agriculture ministries have to be working in the same direction. In many countries I do not think you have that general commitment and general political will. Even if you can deal with the underlying problem of corruption— I do not agree with the previous witness— that is a problem in many, if not most, forest rich developing countries. The FLEGT system has had problems. To assume that you can sweep all those aside and solve all your governance problems in 40 rainforest nations in five years is just ludicrously optimistic. I do not think you will find many people who work on forestry governance who would not agree with what I have said.

Q100 Martin Horwood: You made the point very strongly that there are millions of people at the moment who are living from forests for whom some kind of alternative employment or economic benefit would have to be found. The previous witness suggested that the pure market mechanism that in a sense bypasses all these governance issues and feeds money directly to those with an interest in the forest is the best way of doing that. Can you imagine that that efficient operation of markets at international level will feed down to individual land use decisions by people who are marginal farmers or involved in land use in different ways?
Mr Brack: In theory you could as long as you have sorted out all the problems I outlined in my previous answer, as long as forest law is clear and consistent and fairly applied, as long as land ownership tenure rights are clear, which in many countries they are not, and as long as there is redress to a fair system of dispute resolution and legal mechanisms for enforcing rights and so on. In theory I think it could happen, but again the practical problems in most countries are very, very substantial.

Q101 Mark Lazarowicz: Given what you have just said, how far should the financial laws which would come about from various avoided deforestation mechanisms be directed, not just at land use and their management, but at encouraging political will to come about in the countries concerned, and how much is that essential to any programme?
Ms Hoare: At the moment that is the area that has to be focussed on. Until those fundamental questions are addressed I do not think any type of market mechanism could work.

Q102 Mark Lazarowicz: Do you agree that the international negotiations have seriously begun to address how that process could be encouraged?
Ms Hoare: I think that in the international negotiations they have rushed ahead and there has been too much emphasis on looking at the market mechanisms and how they could be set up without looking at those other issues that need to be set in place beforehand.
Mr Brack: I think there is a recognition that governance is a problem but not that it is a really major problem, I think you got that from the previous witnesses and the Eliash Review; it is something to be addressed but it is just another thing to be tackled. I think in most countries you cannot really put any kind of functioning REDD mechanism in place, apart from a few pilot projects in protected areas, without a pretty thorough overhaul of forestry governance. Again that is a lesson that could be learned from the FLEGT system and the way it has started to be implemented. I think it is essential that in the next year up to Copenhagen the people negotiating REDD pay attention to the lessons from the FLEGT system.

Q103 Mark Lazarowicz: Is there any danger that the push towards a carbon market-based system could undermine some of the work that has already been done in addressing governance issues and forest management issues? If so, could you give us some examples?
Ms Hoare: There is possibly a risk of that. Certainly with discussion of the markets and particularly with an emphasis on the potential high financial gains that in theory tropical forest countries could achieve from such markets there has been a shift in focus to that and away from looking at governance questions. It has been suggested—just returning to the question of FLEGT—that it has been a factor in the reduction in political momentum in negotiating FLEGT agreements because governments have shifted their focus to discussions about REDD and climate change.

Q104 Mr Caton: Eliash went for a national baseline approach to minimise the risk of leakage but, as you have pointed out, this would require significant governance changes to work. Is there a danger that this would lead to a number of developing countries being unable to participate in an avoided deforestation mechanism and therefore massive increases in deforestation carrying on in those countries?
Ms Hoare: I think there is a danger of that, yes. If you look at the case of the Clean Development Mechanism, I think it is something like 70% of CDM projects have been established in China and I think there may be one project in Africa. So this is a clear indication that the market goes where it is easiest to implement projects and to operate and the same will be true in any REDD mechanism. In relation to setting up a national system, clearly the African countries in particular are furthest behind and would need to make the most progress if any national system could be put in place. So there is a severe risk that they would be excluded from any such system.

Q105 Mr Caton: You have told us that a project-based system would require less governance changes. Was Eliash wrong to reject that?

Ms Hoare: The fundamental problem with a project-based approach is the question of leakage, which is a severe concern. In the long term you cannot have just a pure project-based approach, it will not be effective in reducing global emissions. As we heard previously, with a growing world population, an increasing demand for resources and commodities and so forth pressure on forests is only going to increase, so that decreases the chances of a project-based approach working. I think a project-based approach could be effective for a short period of time and can be a means of building capacity, and then scaling up from that to a national approach is the only way it would work.

Q106 Mr Caton: Would a sort of hybrid system where you had both national and project level crediting running at the same time work or would that just have exactly the same problems with leakage?
Ms Hoare: This is not an area I have looked at in detail. I know there are various different proposals for a hybrid approach and indeed for national and project-based approaches. The risk with a hybrid approach is that you get the worst of both worlds. If it is more towards a project-based approach you still have the question of leakage. Some proposals are that you have national level accounting plus projects which I think would still be so complicated that certain countries would be excluded.

Q107 Mr Caton: It is a balance of risk, is it not? If the hybrid approach could bring in countries that would otherwise be excluded early on then you have averted the risk that you acknowledged in my first question, but you have taken on the risk of leakage, I take your point.
Ms Hoare: Yes indeed.

Q108 Dr Turner: How do you think carbon markets are going to affect indigenous people? Do you think standards could be developed to ensure that indigenous people are protected?
Ms Hoare: It will depend on what kind of system is in place and it will depend on the particular country as well, but I think as things stand at the moment there is a high risk that they will be negatively affected. It is difficult at international level to set in place adequate safeguards to address indigenous peoples' concerns. Within most countries, as has already been highlighted, indigenous peoples do not have secure land rights or rights to forest resources and they also tend to be marginalised within society. So there are real concerns as to whether they would be able to participate effectively in consultations in defining a strategy of how to reduce deforestation.
Mr Brack: I think there is another lesson from the FLEGT system there. In the countries which are negotiating partnership agreements you have had mostly a fairly broad stakeholder engagement within the country to varying levels of success. That kind of mechanism can be a route to involving indigenous peoples in decisions over national forestry governance, but I think you would need to see that kind of system developing if their rights can be protected under any REDD system.

Q109 Dr Turner: There is clearly a special difficulty with some indigenous peoples who are practically back at the Stone Age in terms of cultural development and do not participate in any monetary system or any political system. How do you account for their needs?
Ms Hoare: It is very difficult. That is a real problem that remains to be addressed. It basically highlights the fact that if you are tackling deforestation then it is not just about money and the economic value of forests, you also need to look at other aspects.
Mr Brack: It does raise a slightly broader question about what kind of REDD projects will be put in place because you can guarantee absorbing carbon or not releasing carbon without necessarily worrying about protecting indigenous peoples' rights or biodiversity or habitats and so on, so there is the possibility of maybe trying to introduce different levels of REDD standards. I think we suggested a "gold standard" REDD credit which has co-benefits like protecting biodiversity and indigenous peoples' rights, since they will not automatically be protected just by reducing deforestation. There are so many ways of managing forests.

Q110 Dr Turner: It is probably fair to say that there can be a conflict between forest preservation for carbon and land use by indigenous people.
Mr Brack: Yes, that is quite right.

Q111 Dr Turner: Do you think that the UNFCCC negotiations adequately take the forest people's needs into account?
Ms Hoare: I think there has been growing awareness of the need to address these issues. It is starting to be, certainly, yes. There does remain the problem of what mechanism can be used to ensure that those concerns are taken into account. There are concerns from national governments about infringement on their sovereignty as to the decisions they make within country regarding their own forests and their own people and so forth. That is a very difficult balance to make.

Q112 Dr Turner: It sounds like an unresolved situation at the moment.
Ms Hoare: It is, yes.

Q113 Martin Horwood: Are there any particularly good examples either from the FLEGT process and potentially also from those countries which have ratified things like ILO169 of good practice in terms of involvement and recognising the rights of tribal peoples that you can think of and any particular problem countries?
Mr Brack: I do not know offhand. It is not an area I have particularly focussed on, but we could perhaps get back to you. Most of the examples that are cited are bad examples, but I am sure there must be a good one somewhere!

Q114 Mark Lazarowicz: You have mentioned the FLEGT plan a few times and I get the impression you are fairly positive towards it. Given it was formally agreed more than five years ago now, how far do you really think it can be said to have made steps in terms of improving governance and also stopping the import of illegal timber into Europe?

Mr Brack: Fairly limited steps so far, which underlines how difficult the governance issue is to address and I think that reinforces the comments we made earlier about the slow progress with tackling governance and the possibility of that slowing down the REDD negotiations. There is an issue about incentives which I will come back to. You need to bear in mind that there has only been one voluntary partnership agreement agreed so far with Ghana and that was this year; hopefully there will be another two or three quite soon. The optimistic sign is that in the countries that have been negotiating partnership agreements they have all set up this kind of stakeholder engagement system that I talked about earlier. In countries like Ghana that has given NGOs a voice in discussions about forestry governance that they have not had before and in Malaysia the same kind of thing, and the European Commission has been reasonably firm about insisting that there is the opportunity for participation from civil society. So that is opening up routes to discussions that were not there before. Capacity building is beginning to make a difference. There has been a process of reaching a consistent definition of what you mean by legality in Indonesia and in Cameroon. All of the countries that are intending to agree such agreements are deciding to license their timber exports regardless of destination. One of the problems with FLEGT is that it was restricted to timber trade between the EU and the partner company, but all of them for practical reasons are going to license all their exports, which makes it much easier to see the FLEGT licensing system developing worldwide, which is a desirable end point. In general I think it has added to the awareness of the problem of illegal and unsustainable logging and contributed to things like the fairly rapid growth of certification. Having said that, these are all early signs, there is no functioning licensing system in place yet, there will not be for another year or two until Ghana and the other countries put the practical issues in place. I think there is a problem with incentives. It is not terribly clear why countries should want to join partnership agreements. There is capacity building assistance available which is valuable, but in countries like Malaysia, where they do not have major problems in forestry governance, the incentives for them to join the system are quite limited. You are getting quite mixed messages coming from EU countries where the EU is encouraging the developing country to sign partnership agreements, but many procurement policies of EU member state governments do not accept FLEGT licensed timber or will not accept FLEGT licensed timber as allowable. That is a mixed message. I think we could be better at providing incentives for countries to join partnership agreements.

Q115 Mark Lazarowicz: Is there any possibility of a FLEGT-type arrangement leading towards a global-type of licensing scheme for product sustainability as well as lawfulness in timber?

Mr Brack: People are beginning to talk about the possibility of the system going global. It is very, very early days yet, but the change of administration in the US hopefully will relax some of their nervousness about joining international systems. Japan has indicated some interest in placing requirements for FLEGT licensed timber for their imports. They import a lot from Indonesia and Malaysia which are potential partnership countries. So there are optimistic signs, but any international system like that will take a while to develop. I think people should not be too concerned about the fact that FLEGT will promote legality rather than sustainability. In many forest countries if the laws are enforced properly you will get pretty close to sustainable forestry anyway. Most of their laws are written with the aim of sustainable forestry. I think to put a requirement within the FLEGT system for sustainability rather than legality now would be premature; I think it would just slow down the adoption of partnership agreements and the implementation of the system and will seem to developing countries like the EU just changing the rules yet again and putting another barrier in the way. That is a fairly widely held perception. I think it would be better seen as a very big step on the road towards sustainability. I do not think we should be too concerned about building sustainability in.

Q116 Mark Lazarowicz: The Commission is currently looking at developing proposals to require "due diligence" to be applied regarding timber exports. I understand you have been directly involved in assessing those proposals. How far do you think those will make a difference? You will be aware that some people have suggested introducing legislation along the lines of the US Lacey Act as opposed to the current Commission proposals. How do you assess the proposals?

Mr Brack: The principle of the due diligence regulation is already very important. It puts in place some of the incentives I was talking about before for developing countries to sign partnership agreements because if it works there will be a universal requirement effectively for proof of legality at least for all imports entering the EU. Having said that, with the state the draft regulation on due diligence is in at the moment I think it is fairly clear that the system will not work, although it is a very early draft and it is quite possible that a lot of the loopholes and the defects and the lack of clarity about many issues will be sorted out in the negotiation process about it. It is quite unclear at the moment by several things what it means, definitions, products and operators, how you can reasonably ensure legality. They talk about timber operators being able to use monitoring organisations like certification schemes or timber federations, but in reality none of the schemes or the federations at the moment could operate as a monitoring organisation under the terms of the regulation. There are quite a lot of potential

loopholes including timber coming in for energy products. All of those things could be sorted out given the political will within the EU, but I think there is a major design flaw—and it is quite difficult to see how it can it be sorted out—in that implementation and enforcement is largely left to the member states rather than the Commission. In the accompanying documentation to the regulation the Commission admits that there is a problem in some of the EU member states with illegal logging already and they cite Bulgaria and Estonia as examples. They are admitting that Bulgaria and Estonia and maybe other countries are already unable to guarantee that legal timber from their own production enters the market, so it is really not clear how they can simultaneously guarantee that imports from high risk countries will also not be illegal. The regulation leaves the enforcement and the inspection of the timber operators and the monitoring organisations to member states. So you could have a number of EU member states developing as very vulnerable entry points and people wanting to ship illegal timber into the Community could just use those entry points. Unlike something like the Lacey Act, there is no subsequent check on the legality of timber anywhere in the EU. Under the due diligence regulation, once timber has entered the EU at the first point of entry into the market there is no subsequent check. It is difficult to see how the regulations as currently drafted could really deal with that; it has too many loopholes.

Q117 Martin Horwood: Do you imagine a certification scheme working all the way down the supply chain for all paper products? Would that be your ideal?
Mr Brack: That is what certification schemes do at the moment anyway.

Q118 Martin Horwood: Do you see them implementing a Lacey-style Act to get over your problems you have just been talking about?
Mr Brack: The thing about the Lacey Act is it allows the authorities to take action against people who are handling illegal timber wherever they find them. So even if, as in our example, Bulgaria has lax implementation and illegal timber enters there, if it is then shipped into the UK and the authorities have reasonable suspicions to think that the products are illegal, they can take action against it. In the UK under the due diligence regulation it cannot do that. It is only the first point of entry into the EU that is subject to any requirements.

Q119 Mr Caton: This Committee last looked at the procurement of sustainable timber back in 2005. What is your perception of progress since that time?
Mr Brack: There has certainly been some progress but perhaps a bit limited. On the good side, you are seeing a pretty steady increase in the volume of certified timber on the UK market and the anecdotal evidence from timber importers and retailers would suggest that it is the requirements for certified timber from government procurement policy that has had the main impact on that. The figures are not terribly good, but the evidence suggests that about 50% of imports, perhaps higher, into the UK are now certified under one of the main certification schemes and that compares to 8% of total global forests certified so that is much higher. There is no question that awareness of the requirements for legal and sustainable timber is higher amongst government agencies, but on the more negative side, CPET has carried out a study on the construction sector, which is the area of timber use that is most relevant to government procurement, and they found that implementation of the requirements was quite variable. A number of agencies were implementing their own policies which were not like the government policy at all, they were more strict and just requiring certified timber, not sustainable or legal. Very few of them were monitoring the implementation of the policy systematically. It was difficult to collect data. We think we are seeing some impact from the procurement policy, but it is clearly not being implemented as well as perhaps it could be.

Q120 Mr Caton: What about the Government's own procurement policy, has that had a beneficial impact?
Mr Brack: Yes. I think the UK procurement policy and other governments' procurement policy have been the main outcome probably that has had an impact on the timber market. Of all the discussions and conferences and initiatives that have taken place over the last years or so, procurement policies are the thing that so far has made most of the difference.

Q121 Mr Caton: So we can be confident that there is less illegal timber coming into this country now than before those measures?
Mr Brack: Being precise, what we know is that more certified timber is coming into the UK and also the Netherlands, which is the other country that has systematically looked at this, so you would assume that the proportion of illegal timber that is coming in is less, certainly.

Q122 Mr Caton: Do you believe that the amount of illegal timber being produced across the world now is reduced as a result of the roll out of the certification scheme?
Mr Brack: That is a difficult question to answer. It is difficult to disentangle the effects of everything that has happened. There is undoubtedly much bigger awareness of the issue now than over the last 10 years. Procurement policies have made a difference. The expectation of the FLEGT licensing scheme has made a difference. Even countries like the US have done things like begun to write provisions on illegal logging into their free trade agreements. So you have seen at least some countries, Indonesia is a good example, put much more attention on to enforcement. There have been some notably successful major enforcement operations in countries like Indonesia. On the other hand, the timber trade has grown quite substantially. A lot of it now passes through China. China is increasingly an importer of raw timber and then processes it into plywood or finished products, furniture or whatever

and exports it to the West. There is not much evidence so far that China is paying much attention to controlling its imports and trying to exclude illegal sources, though there have been discussions and again rising interest. The one concrete thing we do know is that the proportion of the world's forests that are certified doubled between 2002 and 2007. That is very rapid growth and much higher than there has been in previous years. Almost certainly that is as a result of all this concentration on illegal logging and the development of government procurement policies. The worrying thing about that is that only 7% of certified forest is in developing countries and that proportion has not changed over that period. It is developing countries that have the main problems with forestry governance.

Q123 Mr Caton: That is welcome news about the growth in certified forests, but is that process continuing and is it getting into those developing countries?
Mr Brack: Yes, it is continuing. You are seeing more national certification schemes develop. It is slower and more difficult in developing countries precisely because they have the problems with governance and enforcement that we have talked about a lot. There is a lot that could be done with procurement. In our written evidence we suggested a variety of things that could be undertaken. There are some government mechanisms, like the "Building Schools for the Future" programme, for example, which does not include a requirement for legal timber and that could be relatively easily built into it. Implementation of any kind of timber procurement in local government is quite patchy. In a sense that matters less in the UK because the UK is quite a highly centralised country and more total government spend is accounted for by central government in the UK than in more decentralised countries like Germany or the Netherlands, but local government is still about 30% of the public sector spend in the UK and certainly more could be done in promoting this policy or similar policies in local authorities.

Q124 Chairman: Are the certification schemes themselves robust and reliable?
Mr Brack: That is a very good question.

Q125 Chairman: Do you mean the answer is no?
Mr Brack: Coming from a research institute, I would like to say that more research would be needed. They were never designed in the first place to be the kind of keys to market access that they are becoming. They were designed as voluntary mechanisms for relatively niche markets for those consumers who wanted to buy sustainable timber. Now, increasingly, they are being used as a requirement for market access for procurement policies or, if something like the due diligence regulation comes into force, for all imports to the EU potentially. So clearly the incentives to defraud them are climbing quite steeply. There are already anecdotal stories of more certified timber coming out of China or East Asia than you would expect. It is quite questionable whether certification schemes have the ability to police that. They are voluntary associations. They do not really have an enforcement capacity. I think that is quite an urgent issue for governments to look at and see how they can use their enforcement capability to reinforce the systems that the certification schemes have come up with and if that is not addressed that will undermine the whole effort towards tackling illegal logging.
Ms Hoare: There has been a lot of concern about the robustness of certain schemes, but overall they have had a positive impact and have helped to improve the performance of the industry. In Central Africa there has been some very significant progress particularly in how timber companies deal with local communities. I think in the next year there should be significant areas of the forest that become certified. Although there are serious concerns, I think overall it is still a positive contribution.
Chairman: Good. Thank you both very much for coming in.

Tuesday 10 February 2009

Members present

Mr Tim Yeo, in the Chair

Mr Martin Caton	Mark Lazarowicz
Colin Challen	Jo Swinson
Mr David Chaytor	Dr Desmond Turner
Martin Horwood	Joan Walley

Witness: **Barry Gardiner**, MP, Senior Commission Member, International Commission on Land Use Change and Ecosystems, GLOBE International, gave evidence.

Q126 Chairman: Thank you very much for coming in. As you know, most of us have just done a trip to Cameroon, which is obviously familiar territory to you, and your praises were being sung by various of our interlocutors and advisers so we felt that we were following in very distinguished footsteps! I gather that Mr Johnson has lost his passport and so is unable to come this morning. I did not realise that we required passports to give evidence to this Committee! Could I start by asking you about the GLOBE initiative, the International Commission on Land Use Change and Ecosystems. Could you tell us a little bit about the background and what contribution you think it is going to make to the negotiations coming up?

Barry Gardiner: Can I do that in the form of an opening statement? Are you happy for me to do that?

Q127 Chairman: Of course.

Barry Gardiner: That would be great. Failure of ecosystems and biodiversity loss represent really a very small diminution of global GDP, probably about 0.5%, but for 1.4 billion of the world's poorest people, it actually represents a much bigger loss, rising up to about 50% of their GDP. I talk deliberately in terms of biodiversity loss/ecosystems failure rather than in terms of climate change, because for far too long the world has focused its attention on climate change. I want to emphasis that, in and of itself, a change in climate would not matter. The problem is that biodiversity cannot keep pace with the rate of change and, as a result, biodiversity is depleted, ecosystems break down, and it is that loss of biodiversity and the ecosystem services that they provide that is the real threat to human well-being. The economics of biodiversity and ecosystems is new. It is a difficult area for politicians, and I think we are struggling to identify the true nature of value as we broaden the concept of capital to include not just social and human capital, but to include natural capital as well. Today most of the benefits provided to our civilisation by ecosystem services simply bypass the market-place. They escape the pricing mechanism and they are lost to the political and economic process simply as an externality. It is this inability to capture the value of ecosystem services that I think is the acutest market failure in our world today. You would probably laugh if I told you that I have put off upgrading my mobile phone for the past 15 months because a little girl was stung by a jellyfish in Devon in 2007, but it is the growing demand for the latest mobile phone that has made coltan so valuable; that has fuelled the conflict in the DRC and in Central Africa; that has led to deforestation; that has seen habitat loss and reduction in forest mammals; that has meant an increased demand for fish as an alternative animal protein; that has seen the depletion of high trophic fish stocks; that has resulted in fishing down the food chain as fishermen target lower trophic species; that leads to blooms of jellyfish, which have replaced fish as the dominant planktipus, and that has resulted in the beaches in Devon being over-populated and invaded by jellyfish. If globalisation has enabled us to see ever greater connections between disparate events in different parts of the globe, then I think what I would want to say is that our institutional structures have not yet begun to recognise this. Governments around the globe still have mechanisms of intervention and engagement that have segregated and compartmentalised. We have a Department for Environment and a Department for International Development, when its clear that preserving our environment cannot be achieved without securing the development that will take two-thirds of the world's population out of poverty. We have a Treasury that understands over-leveraging of companies and credit bubbles but cannot see a connection with the world population consuming each year the resources that the planet takes one year and four months to renew or replace; a Treasury that refuses to put a value on ecosystem services and only sees value in the context of financial markets. So our institutional framework is not fit for the globalised connected world in which we live. It is fragmented into a pre-20th century set of compartments that reflect division and taxonomies that were scarcely adequate even then. What we need is a defrag programme for government. We must stop limiting our responses to the problems, we must stop thinking that each problem fits neatly into appropriate government departments, and we need to stop thinking in fragments and break down the barriers that stop us as legislators from arriving at comprehensive solutions. I believe that our work on land use and ecosystems within GLOBE forces us to do this because our research makes it clear that it is all of these issues that are inter-connected, and it exposes our world not as a series of complex

fragments but as an integrated whole. To move directly to your question, the support of GEF and UNEP has been extraordinary in setting up the Commission. What we are seeking to do is to try and identify sets of policies that legislators around the world can agree upon that will actually give effect to the work that TEEB has already been carrying out and to where it is going. The TEEB work has been very important in looking at ecosystems as a whole and in then trying to place clear financial values on those ecosystems. Phase two of the TEEB report will be moving further into that domain. What we are trying to do is to get traction for legislative proposals amongst the G8 + 5 legislators, because that is the base through which GLOBE operates, around these issues, working with UNEP, with GEF and other agencies, and then trying to ensure that we can put forward a set of proposals which, ultimately, would be for presentation at the Japanese biodiversity conference in 2010 and which will be able to take those ideas and give them legislative form and bite.

Q128 Chairman: Arising directly out of that—and we will come on to some of the economic and practical challenges in a moment—what do you think are the main political obstacles to getting a successful mechanism to reduce emissions from deforestation?
Barry Gardiner: Engagement by treasuries. We are talking into a vacuum. I know many of you must be frustrated by the amount of work that is done by committees such as yourself and by government departments that is solely focused on environmental issues, and the difficulty is getting traction with treasuries. The difficulty is actually getting governments at that level and in those departments to recognise the financial implications of this.

Q129 Chairman: So the characteristics to which you referred are not just related to the British Treasury but to comparable departments in other countries?
Barry Gardiner: Absolutely. All across the globe people are failing to recognise the real cost of the environmental resources that they are consuming, or over-consuming. As I said, we recognise a credit bubble when we see one in financial markets, but to ignore it in the environmental scene is really an extraordinary form of blindness. We need engagement from chancellors and treasury ministers.

Q130 Dr Turner: Barry, talking of joined-upness, would you agree that we could do with a vastly improved scientific knowledge base in the management and understanding of rainforests? Do you think it rather sad in this context that DfID has actually progressively reduced its spend on R&D in the area of rainforests? Do you think this is counter-productive and would you wish to see that reversed, because it certainly seems to me that a better knowledge base would be a great advantage?
Barry Gardiner: I see where you are headed and I sympathise. I would want to say that the greatest thing that we lack is not knowledge here. You are right, there is a lot more that we can find out about the nexus of problems that are driving deforestation, and certainly about the way in which different small-scale ecosystems interact to create the whole major ecosystem of tropical rainforests. There is no doubt a limitless amount of new information that we could discover about that. However, it seems to me that for what we need to do we have probably enough knowledge. We know what the drivers of deforestation are. We know the ways in which we need to put alternatives in place. We know that we need to be increasing the productivity of other land. We know the sort of financial mechanisms that we could use in order to do it. I do share a concern that the number of posts within DfID that have been specialist forestry posts has been cut back. It seems to me, though, that what we really need is to focus on tackling the issues of deforestation and not simply more knowledge about how forests work. All of that is no doubt good, useful and helpful, but what we really need is an initiative that is driving the main event, and that is how do we tackle deforestation and the loss associated with it. For that I do think that we have got most of the knowledge that we need.

Q131 Dr Turner: You do not think there are issues surrounding, certainly from a climate change point of view and carbon sequestration point of view, the optimal management of the forestry that is left?
Barry Gardiner: Forest management is not a difficult thing. It has been done by tribal peoples around the globe in different continents for literally hundreds of thousands of years, successfully. If you want production forest, then of course there are sustainable regimes that you have to put in place, and you have to know first canopy growth, second canopy growth, et cetera, and exactly how you are going to structure your forest take for a production forest, but, again, these are things that I think are broadly known and well understood. As I say, it seems to me that the real issue is are we prepared to stop the loss that comes from deforestation? To do that, we do not need years more research; we need money, focus and policies.
Chairman: That leads us on I think, Colin, to you.

Q132 Colin Challen: Are you satisfied that a market mechanism is the correct way to approach this as opposed to a funded approach?
Barry Gardiner: No, Colin, I am not, I think we need both. I think one or the other will not be sufficient. If you look at the Eliasch Review, he was talking in terms of figures between I think it was $19 and $26 billion to halve deforestation by 2020, I think were his figures. I would say that if you look on the McKinsey cost curve modelling, where 30% of the abatement potential is forestry, I reckon the best calculations are probably in the region of €60 to €75 billion a year. Therefore, to simply say that we can get it all from the markets under cap-and-trade I do not think is realistic. I think we are going to need clear bilateral funds and multilateral funds from governments and government-to-government. We are going to need international financial institutions

such as the World Bank and others that are doing it that way. And we are absolutely going to need the markets as well.

Q133 Colin Challen: Do you think there is too much emphasis in the UNFCC on market mechanisms and not enough on funded schemes and is that perhaps, following on from your previous answers, about treasuries because treasuries want to abdicate responsibility and leave it to the markets? A leading question!
Barry Gardiner: Yes, I think it is leading in the right direction though. I do think there is too much focus in the UNFCC simply on the markets. They have tried to do this—and I think it is a mistake—in a way that replicates the old system of CDM. That is why they have gone down the business as usual in accordance with the historical deforestation trends baselines and used that whole structure. I think that has limited them. I also think that we are now at a point where we are so close to Copenhagen that it is impossible to simply say rip it up and start again. As I know, you know, and some others know, I have real doubts about the whole framework within which the UNFCC has been looking at incorporating deforestation into the post-Kyoto settlement. I think we have to go there, do something and amend.

Q134 Colin Challen: Does that leave us with the REDD as the least worst option then?
Barry Gardiner: REDD is going to be an essential component. We have to get a deal on forestry out of Copenhagen. I think again, it must be a combined model. If you were constructing this on a clean slate, and if you were constructing it in accordance with principles of pure justice, rather than looking at financial economic efficiency, then I think what you would go for is a simple standing stock model. Actually, we are now so far down the road towards an avoiding deforestation model and historic-based emissions that I think inevitably what you are going to need to do is have a combined framework, a combined structure in order to cope with it. I think that is do-able. In fact, if you look at what came out of Accra and since, there has been growing understanding that a mixed model is going to have to emerge because you cannot cope with the problems that a simple historical avoiding deforestation model produces.

Q135 Colin Challen: What specific improvements could you suggest for the REDD in itself?
Barry Gardiner: The problem with simply looking at the structure as it has been proposed is that it is based on the CDM style and it is technically flawed. It is not going to be able to deliver. It has perverse incentives built into it and it does not reward countries who actually have protected and preserved their rainforests, whether by accident or by design in fact. It does not pay them enough to be a real incentive and therefore it is unlikely to succeed. I think it is also politically very difficult to sell to people. You and I go on the doorstep and if, on the rare occasion somebody comes to the door, and says, "Mr Gardiner, I hear you are doing a lot about forests. Tell me about avoiding deforestation." for me to say simply, "Hey, we are cooking up this great deal at Copenhagen where what we are going to do is to take a very poor satellite picture from 10 years ago through to the present, which suggests a historical rate of deforestation, which is actually a bit hypothetical anyway. We take that and then what we do is we extrapolate that into the future and then we establish from that extrapolation a reference rate, and then we mark off a deviation between that reference rate and what actually happens in accordance with some satellites that we send up from 2013 onwards, and then we are going to pay them for what they do not do," quite frankly, we are lost; that is not a saleable commodity on the doorstep and it puts everything into completely the wrong light, whereas if you say to people, "Look, what we are going to do is we are going to say we all know that trees are a good thing," "Yes," people nod, "And what we are going to do is pay people to keep their trees and to plant more of them." That makes sense and the standing stock model is based on that simple logic and the avoiding deforestation historical trends model is based on the hypothetical, which is very difficult to communicate to the electorate.

Q136 Colin Challen: Am I right in thinking that Brazil is opposed to the REDD and if that remains correct up to Copenhagen that will hole it beneath the water line?
Barry Gardiner: It depends who you speak to in Brazil. The international negotiations for Brazil are done by the Brazilian foreign affairs ministry. Many people and many distinguished former Brazilian environment ministers would have a very different view on it. Many Brazilian politicians would have a different view on it. However, Brazil has moved a tremendous distance in the past few years over forestry issues. Yes, Brazil's favoured model would be governments realising that they have to pay Brazil for Brazilian forests and for the global goods that that forest provides. They would not put it in those terms, by the way! It would be a funded model from either bilateral or multilateral sources, but preferably done in that way. I think, increasingly, Brazil is recognising that there may be a role for markets. I do not think we will finally know Brazil's position until we get to Copenhagen, but it has moved a long way in the past few years.

Q137 Joan Walley: If I can just come in there before we move from this area. Barry, you said in so many words that if we were starting from a clean sheet we would not actually start from here and we are quite a long way down the road in terms of post-Kyoto and the REDD proposals and whether or not, in your eyes, there might be a combination of both a REDD solution and a funded solution towards deforestation. How do you square all of that with the recession and the review of global finance institutions that has, if you like, come up on the radar more acutely since this process started? Do you see any scope for the discussions that are going on globally about the financial mechanisms that perhaps need to be adjusted to deal with the

situation that we have got? Do you see any possibility that that debate, and the solutions that will arise out of that, could somehow or another be fine-tuned so that a value could be put on the biodiversity and ecological vision to which you are referring so that we get them aligned or is it just too late for that altogether?

Barry Gardiner: We cannot afford for it to be too late, but you have put in a number of themes and questions there and let me try and tease them out. We are at a very difficult juncture, you are right, we have a major international meeting at the end of the year in Copenhagen where we have to come away with not a clause-by-clause itemised deal but we have to come away with a deal to have a clause-by-clause itemised deal that over the following months can then be worked out. If we do not achieve that, if we do not get that outline of a deal at Copenhagen signed up to, then, in my view, we really are not going to be able, certainly as a world community, to meet the sort of challenges that we in this country believe will face us by 2050. The likelihood of getting anything underway by 2020 if we do not achieve a deal at Copenhagen has got to recede far into the distance, and that is a serious problem because, as we all know, the earlier we act the cheaper it is to achieve the sorts of emissions reductions that are required. You put into that the global economic crisis at the moment and that, as a context, is a deeply unhelpful one; you are right. It has meant that at a time when it might have been easier to focus finance ministries' attention around the world on the need to put a value on ecosystem services, their attention is diverted to the global credit crunch elsewhere and the packages that are needed to restimulate their economies, et cetera, et cetera. I would say that we should now be focusing on the G20 coming up in April. I think it is absolutely fundamental that we use the opportunity that that presents because the G20 are not just the "usual suspects" of rich countries around the globe who see this as, "Yes, I suppose we have got to pay out something for all the pollution that we put out into the atmosphere over the past 200 years, even though it may not affect us as badly and even though it may affect us later down the cycle." When you have got the G20 countries in there as well there are many more countries who are going to be much more immediately affected, and indeed are already being very badly affected by climate change. That means that the G20 may come together as an economic meeting in April to look at the global financial crisis, but if we have significant voices around the G20 table saying, "Actually, the big economic crisis facing my country is coming from desertification," or, "The big economic crisis facing my country is from floods or from drought," then we begin to get more traction on this issue in that way. I think, to pick up your theme of, is there an opportunity, as well as a problem here with the global economic crisis, yes, I think there is. It is not going to be easy to focus economic ministers around the globe on valuations for ecosystem services in the next nine months, it is just not, but actually there are a few opportunities there that we have to use, and we have to use the knowledge that those countries that are the developing nations, that are more immediately affected, where their talk is much more about adaptation than mitigation, in helping us to do that.

Q138 Joan Walley: Do you not find it slightly perverse that in the same committee corridor there is a similar select committee inquiry looking into the financial crisis which is absolutely packed out in the middle of all the press speculation whereas our one does not have the same amount of interest whatsoever?

Barry Gardiner: That goes back to my remarks at the beginning. This is not just the case in the UK. I wholly applaud the decision to set up DECC because for the first time we are actually seeing climate change and energy put together in a way that makes sense, but we need this much, much more. I remember—and I think it was probably one of the reasons that it was one of the last things I did before I left being a Minister in Defra—at a speech at the Royal Society, simply saying that you cannot tackle environmental problems without looking at world development and you cannot tackle development problems without looking at environmental issues, because the environment is so much of the GDP of the world's poor, and that therefore the logic of that was that we should think about uniting those two departments into an Environment and Development Department, and putting those two together. Half an hour later when I got back into the Department at Defra, a phone call had come through from the Permanent Secretary's office in DfID saying, "What the hell is your Minister doing saying that there should be one department? Are you trying to take over our department?" I then got a call from our Permanent Secretary saying, "What the hell did you say?" It is this lunatic paranoia and patch preservation when the issues are so clearly joined up. It is the "Oh, my God, we have got to treat them in separate budget heads and we cannot possibly look at a structured approach" that I find so debilitating here. But you are absolutely right; here we are talking about the credit crunch and over-leveraging and bubbles. We have all those symptoms going on in our environment and they are affecting us far, far more than the cost of the credit crunch and all that is going on there; and ultimately much worse.

Q139 Martin Horwood: I should say that we do appreciate the interest of all those people who have turned up! You spoke very eloquently in your opening remarks about the inter-connectiveness of things outside of the immediate area of the forests. In a previous inquiry we struggled with the issue of land use outside of forests. Particularly when we were looking at biofuels we struggled to find any kind of sustainable land use. If you take the Brazil example, what looked like sustainable land use in one part of Brazil actually increased pressure on land prices and might actually incentivise people to start using up rainforests in another part of Brazil. Do any parts of either the REDD models that are proposed or what you have thought about really tackle that issue or is it just going to add to an

inflationary land price spiral that will end up with a race between rainforest value and the Brazilian ethanol industry or other equivalents?

Barry Gardiner: There are two things to say here. One is that if you are looking from an abatement side at biomass, then for things like wood fuel as a means of reducing emissions through renewable sources, the cost per tonne is about €25 to €30 per tonne of CO_2 emitted. For sorting out forestry and avoiding deforestation, the abatement potential is on average about €9 per tonne. Sorting out forestry is a much better means of abatement than biofuels, plain and simple. Your point was a slightly different point, and that was about the tension on land use from increased biofuels and demand for biofuels and the erosion of forest and other terrestrial carbon. I think certainly the World Bank's paper on it that came out last year suggested that if you incorporate land use and the alternative land uses into all your calculations, then no biofuel could be said to be ultimately beneficial. I think there is a general understanding that the Brazilian ethanol programme is probably the most sustainable biofuel that there is, certainly if you compare that with other sources from other crops. I think that their bioethanol programme is probably the most sustainable. We are at first stage with biofuels, we are at that first level and there will be second generation, which one hopes will become more friendly yet. I think the point that we have to focus on is what is driving all this, and, again, something that is very, very uncomfortable to begin talking about, but cannot be left out of the debate, is population. We have a world population that is growing from just over six billion to 9.7 million by 2050. That increased demand is going to be not simply for water and food, but of course it is going to be for energy as well, and we are going to have to produce more and more from less and less. We are going to have to become much more energy efficient. You may remember the previous McKinsey Report, which came out about a year ago, looking at levels of energy efficiency that one would have to extract. I think the figures were something like 15-fold from a tonne of carbon was what you needed, so 15 times the amount of productivity from carbon in order to be able to meet the global need of a population of 9.7 billion sustainably so that you meet the overall target for carbon emissions to stay within the 2% rate and yet the demand of a growing population. That means two tonnes of carbon per person on the planet. At the moment we are at, what is it, 11; the United States are around about 24 or 25; even China is at about five; India is at two. If you are going to see equity and justice for a population of 9.7 billion, you have to be much more energy efficient. So, yes, it is right that we should look for ways of getting second generation and, ultimately, third generation biofuels, but at the moment, most biofuels, not all but most biofuels, are a net detriment to the environment, and they cause very severe encroachment and drainage of resources of the forest.

Q140 Mr Caton: Barry, you have argued that the mechanism should give greater rewards for protection of forests, which is important for biodiversity and other ecosystem services, and that seems very sensible, but how exactly would that work in practice?

Barry Gardiner: Look, I think that we tend to think, understandably, because the way in which we have done this thing, we have always said that a tonne of carbon is a tonne of carbon and it does not matter if it is a tonne of carbon saved in the UK or whether it is by offsetting and saved in India and so on. I simply want to say, look, if you are saving part of a rainforest that happens to have high ecosystem service value because it is the habitat for certain species that are endangered REDD-listed species on IUCN, or because it has particularly rare species in terms of the trees in that forest, whether it is the habitat or the species themselves that you are preserving in preserving that forest, we can simply say "Look, on the market that should be worth more." We can ascribe different values. We can say if it is that sort of forest as opposed to a woody scrub forest in Gujarat, a spiny forest in Gujarat, then if the market is looking to pay there, it does not just pay for the carbon, it pays for the ecosystem resource that is being provided by that carbon in that form of trees. So it could be that it is providing watershed protection to get them; it could be on the basis of the seeding, of the weather and the generation of the rain forest. There are all sorts of ways that forests provide different ecosystem services and resources, and here I think I probably have to go back and partly defer to Des's original question when he said: do we need to know more? This is an area where, yes, we do know a lot about habitat, and so on, but there are other parts of forest biodiversity and the ecosystems where we could actually use research to be able to provide a valuation for carbon from those particular areas, and it seem to me that we simply do it that way. If you want to offset by saving a tonne of carbon there, you pay more, and if we are doing this through national governments that gives those national governments, not only greater resource to protect those special areas, but it actually gives them far greater incentives to protect those special areas as well.

Q141 Mr Caton: Do you perceive that negotiators and possibly decision-makers are moving in that direction, away from what you call the tonne of carbon approach towards this valuation?

Barry Gardiner: They have not even sorted out what they are going to pay for a tonne of carbon, have they? Unfortunately, the answer to that question is they have not yet focused on this, but we have to be looking at front of wave here, and this, I think, is front of wave technology, in terms of the way in which we can financially incentivise and reward what we want. What do governments do? Governments simply set in place frameworks. They set in place legislative regulatory frameworks and they should do that to make markets function in the social ways that they want, whether that is as a national community or as a global community, and what we have to do is, we have to set up the market for forest carbon and for terrestrial carbon in such a way that it is actually socialised in accordance with what the

world needs. If that means saying, "Yes, what do we need? We do not need too many CO_2 emissions", fine, pay for that, but if it also means that we want to increase water shed protection, if it also means that we want pharmaceutical resource, if it also means that we want to stimulate the number of pollinators that we have because of all these extra crops we are going to be pollinating for all these extra people, we can incentivise those things as well. All we need to do is regulate the market and structure it in that way financially and we will then get, through those incentives, the according social product, but we have to start thinking of it as much bigger than it is, not just as a tonne of carbon.

Q142 Mark Lazarowicz: Can I ask you to expand a bit more on some of the criticisms of the approach in the Eliasch Report. Greenpeace have suggested that his recommendations could actually lead to the continued loss of natural forests and their replacement with industrial tree plantations because REDD payments would be on a net rather than gross deforestation basis. Do you share the concerns that Greenpeace have suggested?
Barry Gardiner: I think that the Eliasch Report was a tremendously valuable body of work. It established goals for 2020 and 2030, in terms of halving deforestation by 2020, looking to make the global forest neutral, as it were, by 2030, and the importance of getting the financial mechanisms in place to do it. It looked at it from a market approach. It was not pretending to do anything else; it looked at it from that market approach. Inevitably, therefore, it is one part—not one side but one part—of the story. I do not think that Johan Eliasch himself would want to claim that it is the comprehensive solution for deforestation, and so it would be easy, I think, for Greenpeace, or anybody else, to pick away at aspects of it which are less than perfect. I do not want to do that. I think it was a really valuable step forward. It has made a very, very important point about the need for the UK to put financial resource into forestry on a bilateral basis, and if we take away the real positives from Eliasch, the big picture from Eliasch, then I think that is what we should do.

Q143 Mark Lazarowicz: I understand that. I was not wanting to take away from the big positive picture. I was just asking what these recommendations mean. This may well have been something Mr Johnson might have been more able to respond to in detail, I understand that, but it is a specific question of whether REDD payments should be on a net rather than a gross basis. I can see how, if the payment system was on a gross basis rather than a net basis, that might have an impact in reducing deforestation, but that is a subject maybe you do not know about.
Barry Gardiner: No, I do not know.

Q144 Mark Lazarowicz: A related question, which you may have a view on based upon your work and your visits, but certainly you will be aware, as we will be, of the vital significance of forest degradation and the need to try to minimise that process. Obviously, from our point of view, because of the significant impact that that degradation has on the carbon in the forest, not on the actual trees themselves but the whole process of degradation, have you any views about what specific measures should be put in place to encourage the enhancement of carbon stocks in degraded forests?
Barry Gardiner: Do you mean technically what could be done to upgrade degraded forest land?

Q145 Mark Lazarowicz: Whether it is through upgrading land or through measures perhaps to prevent further degradation. There is a range of options with which to try and tackle this issue of how you can upgrade a degraded forest. Upgrading might not necessarily be just planting trees, there might be other things.
Barry Gardiner: Let us look at a classic position where you have slash and burn: a forest is cleared for slash and burn and agriculture comes in for two or three years and, after about five or six years, it is clapped out because the soil is then depleted. You then have degraded land which is not much good for the agriculture that you initially got your revenue source from as a farmer. Traditionally what would happen is that people would move on. Slash and burn is not an unsustainable form of land management if you do not have a burgeoning population that is actually not allowing that land to then recuperate; so what would have happened would be the people would have moved on, they would slash and burn somewhere else, and the rotation of that would have been fine because there would have then been recolonisation by the plant stock within the forest. So the first thing you have got to do is to protect that degraded land from other uses, either for building and human settlement (because it is no longer good for agriculture it can be built on for homes, and so on), but the key thing is to protect it, and then, if you want to regenerate it quicker than would happen naturally, of course you can go about a plantation process to reclaim that forest, and that is comparatively easy to do. Any forester in that area is going to know what the key first canopy growth plants are that would re-establish the colonisers that will come in, and they will do that and they will successfully plant those, and five, 10 years later, after they have set up the first canopy, they will put in the next growth to come through underneath. There are some very good examples. I visited an area in Malaysia where actually the virgin forest and the regrown forest were virtually indistinguishable. The only thing is that if you were (and I am certainly not) a really good forester, you would have noticed that what was missing in the regrown forest were the really old trees but from an ecosystem point of view, after about 40 years, to all intents and purposes, to an amateur going in it was much the same.
Mark Lazarowicz: That is helpful. Thank you.

Q146 Mr Chaytor: All the discussions about tropical forests and, as far as I can see, the negotiations in Copenhagen have assumed that the main challenge is to agree on a mechanism and then just press a button and sign an agreement and, hey presto, it is

all in place. From my point of view, that ignores the capacity of the countries with tropical forests to handle and manage effectively these kinds of capital flows, and it ignores issues of their practice in respect of transparency of public finance, the levels of integrity of governance processes and also the question of corruption. My question really concerns the issue of governance. How do you feel Copenhagen should deal with problems of governance in the 40 countries that have the largest tropical forests that could benefit from a REDD system or a fund system?

Barry Gardiner: You are absolutely right, it is a serious problem, and any system that is going to work is going to have to have its NRV in place ultimately, but how do you rely on that NRV if you do not actually have initial governance in the first place? I think Eliasch's figure was something like four billion over a five-year period—that is $4 billion, I think, over a five-year period—would be needed for capacity building in the 40 countries that you mentioned. I would suggest that that is highly over optimistic. I think the idea that one could get away with . . . The difficulty is this. On the one hand, you would not know how to use much more than four billion, because capacity building is inevitably a slow process. It may well be that for the first five years that is right but actually it needs to go far further and far deeper than that; but because you have touched on governance, can I simply state that here we are dealing with the problem of, in the first place, establishing proper title and ownership and what is legal, so what forest products were we talking about and what is legal. This is a tiny first step towards sustainability, but it is an absolutely critical point. If we cannot establish legality, the rest of it just falls apart, and here I would hope that this committee could send a very strong message on the need to ensure that we have a proper process that ensures that all forest products—all timber and wood products—in this country are from a legal source. If you look at the EU Initial Options Paper, which I am sure you as a committee have considered before, it was supposed to be that in May of last year there was going to be a decision in the EU on the Initial Options Paper. That was postponed to July. It was then postponed to September, the drawer-up of the consultation document said that they were not going to pursue that, they were going to come up with a completely new approach and, eventually, in November of last year, the Commission unveiled this supposed due diligence model. It is nonsense; it is absolute nonsense. It is pure procedural tick-boxing. All that was envisaged under the EU Initial Options Paper, the initial proposals that went forward, either for a ban or for a Lacey style Act, which would have been effective measures in one way or another, were cast out in favour of a procedure which said that each country and each industry had to have some process to show that they had put in place due diligence. So all the benefits of waiting for the EU in order to get 27 countries all to do the same thing is no longer there because each country is now being asked to come up with its own independent thing. It is absolutely incapable. It is a voluntary scheme, there is no provision for penalties within the structure and the whole point of trying to establish a barrier to illegal products coming into the EU has been lost. As I say, on this issue of governance the first thing that we need to do as a necessary pre-condition of getting all the way down the line on sustainability is to establish—and I believe we now have to do this at a national level—a proper scheme for stopping illegal timber coming into the UK. I think we have to do that at a national level; I think we cannot wait for the EU. This Parliament cannot achieve it within its life time, indeed this Commission cannot achieve it within its life time, and that was the Commission's own admission in March of last year prior to when they said that they had to produce it in May because if they did not they would not get it through the lifetime requirement.

Q147 Mr Chaytor: If the EU's model on legality is hopeless and if the Eliasch timescale of five years to get sound governance in place is far too short, leaving aside the question of legality of timber and just focusing on the mechanisms of governance in the 40 countries, what do you think the priority for Copenhagen should be and what more do you think, at the level of British governance, DfID and the Foreign and Commonwealth Office could do to promote this?

Barry Gardiner: We should be focusing on getting a deal at Copenhagen. That deal should not be held up by saying, "Well, of course, there are countries that are not going to be able to deliver this and there are these issues of governance." Of course, there has to be monitoring, recording and verification processes as part of that deal, and they must be absolutely robust. Certainly in terms of any participation in the benefits, either from funds for carbon and for REDD or moneys coming from the market in terms of offsets, any of those funds should only go to countries who have passed minimum governance thresholds, but that does not mean that you simply wait and say "Well, until you are strong enough in your governance procedures we are not going to give you any money for this." There should be a designated fund for governance, a readiness fund, and much of the work that the World Bank has been doing has been to get readiness funds there helping governments to come up to standard and improve their own procedures. This may have been something that you picked up when you were in Cameroon, but for many of the governments, their greatest frustration is that they bring sometimes quite talented people into those forestry and environmental departments in developing countries and they are paying them a government salary—a government salary in the Congo, a government salary in the Cameroon—and what happens is nice Western NGOs, very well-meaning, come along and say, "Oh, that is a good person in the Forestry Department there. Why do we not poach them", and they will then offer them three or four times their salary to come and work for the NGO. It is absolutely infuriating for these governments: every time they get somebody trained up, competent and just about ready to fulfil some of the governance

procedures that we in the West are demanding of them, the NGOs come and poach the very people who are working to give them that capacity out of the system. Yet how do you say, "What we are going to do, government to government or through an international financial institution, through our readiness programmes, is help you with your governance procedures on forestry"? Are we going to say that we are going to pay officials in the forestry department more than you would the Director of the Economics Ministry? So there are real problems in not just getting the people in there trained up but retaining them once you have done that, and that is where talking about governance and readiness is really complicated because they come in, they get up to a certain level and then they are out of the door. At Copenhagen we have to focus on the deal but then set thresholds, and I would agree with you, they should be demanding thresholds, about the governance levels that countries have to be able to show in order to be able to benefit from the substantive funds that are going to flow from carbon here.

Q148 Mr Chaytor: In terms of the use of these contributions, do you think they are best distributed by the World Bank or the African Development Bank or are best done by a national body?
Barry Gardiner: As I said before, I think there is a role for both. I think we need to get as much money in, in as many ways as possible, with as many monitoring angles on it as we can. It is going to be by that sort of interlocking way that we really are going to raise things. If we just have one process that is coming in there, I do not think we are actually going to achieve it, and we are not going to achieve it quickly enough.

Q149 Colin Challen: Do you think that the REDD mechanism will work without addressing the economic drivers that lead to deforestation?
Barry Gardiner: No.

Q150 Colin Challen: Thank you for that very succinct response. It seems to me that some people suggest that the carbon price will do the trick because when they get bigger rewards for not deforesting we will perhaps drive that out, but perhaps some people will be unscrupulous and just do both somehow.
Barry Gardiner: The more cost-effective the markets are in establishing a low price for carbon so that we can achieve greater levels of offset and abatement, the less likely the structure is to work for developing countries, and I do not simply mean in terms of raising their own levels of economic development and meeting their anti-poverty goals and our millennium development goals. I mean actually to work in transforming the forest and protecting the forest from deforestation. I think there has been, incorrectly, a focus that says the big problem is additionality here. What everybody is saying that the mechanisms have to show, the financial drivers have to show, is that if you are putting money in you have got to show that you are achieving something additional over business as usual and, again, this comes from the whole way in which this framework has been set up. This historical model is based on historical emissions; it is based on historic levels of deforestation. So what they have said, and again I would blame (and I put that in inverted commas because they do so much good work in this area) the NGOs for this. Their focus has been very much on additionality. If you are going to put money in, you cannot put money in and not see a big reduction, a big drop, in the levels of deforestation in the major emitting countries. That is their view. Therefore, the focus is you have got to get levels of deforestation down in Brazil and you have got to get levels of deforestation down in Indonesia. I used to have that view. I no longer have. I used to think that actually you needed to focus on where the problem clearly was before you turned your attention to where the problem clearly was not. I actually think that is wrong now, because the real problem, I think, is not one of additionality, the real problem for the markets is one of leakage; and what is going to happen is, as you drive down deforestation in the Amazon, as you drive down deforestation in Indonesia and Malaysia, what you are going to find is that actually it just goes up in the Congo, it just goes up in Guyana, it just goes up in all the other counties where it has not traditionally been a problem. Therefore, what I would seek to do is to put a prophylactic cover around those forests which have not suffered historically high rates of deforestation. I would seek to take them into the market mechanisms first and ensure that there was a good cost-effective price for their carbon first; lock them in; make sure that you are not going to get the deforestation escalating there, and then move to the places where already there are high rates of deforestation, in the Amazon, and Brazil, they're doing a lot on its own for its own very good reasons and for its own very good policies, in order to stop deforestation anyway, and then go and give additional help there and also do the same thing in Indonesia.

Q151 Colin Challen: The UK has been the world's fourth largest importer of wood products. Are we doing enough to stop the unsustainable logging and deforestation? What more could we do?
Barry Gardiner: We have been spiked. Really since about 15 months ago I have been saying that the EU process is not going to get anywhere, it will be fudged and frittered away. I said to ministers, "Please, do something at a national level—that is the only way that you are going to get something in place—and then drive the process by leading it." The EU Initial Options Paper that I mentioned to David dragged on through May, busted its own deadlines apart. At that point I went to Hilary and I said, "Look, they have failed to meet their own deadlines. They are the ones who said that if they did not meet the May deadline they could not do it in the life-time of this Parliament or the life-time of this Commission. You are now in a situation where, even were they to drive ahead with these lunatic proposals that they have now come up with, nothing could be in place before

2013. It is time that we cannot afford to waste." All these officials in the UK said, "Well, the goal of having an EU wide agreement is so great that we want to hold on and see whether the EU process can get us to it." That fell apart when they came out with these latest proposals, which are not for a unified scheme across 27 nations but for 27 separate schemes for each nation to be able to say, "We have some process of due diligence." You know that if you are a crook and you want to get round a system, the best way to do it is to have a series of boxes that you have got to tick: "I have done that, I have done that, I have done that; now I am safe", and it does not matter, this process does not look at whether the logs or the timber is actually illegally sourced or not, it does not care whether it is or not. All it cares about is have you shown that you have exercised due diligence on this matter, on this matter, on this matter, and if you do that, you are safe, nobody is going to prosecute you. In fact there are no provisions under these proposals for prosecutions at all—none. So the whole benefit of a supposedly EU wide scheme has gone out of the window, the timescale has receded five years into the future, now four, and we still do not have a way of ensuring that in Europe and in the UK we can be confident that timber and timber products coming in are not illegal. We are ignoring the fact that, for once, the United States on an environment issue took the lead, and now, over a year ago, at the end of 2007, put through its amendment to the Lacey Act which means that timber is now part of the Lacey Act. It is operating very well. We have had reports from Chatham House, from their customs officials and others showing how they have implemented it, how they have been working with developing countries and it is an effective way of stopping illegal timber coming into the United States. We should be doing in Europe exactly the same and saying, "Let us piggy-back their scheme." What we want is a global agreement on how to resolve these issues. So if the United States is doing it and doing it successfully and getting prosecutions against the crooks in co-operation with the developing countries, the forest countries, why are we not saying, "Hey, great, you have invented the wheel. We do not need to reinvent it. We do not need to have 27 separate other processes, tick-box processes. We will go along with yours and we will put that in place over here." I believe absolutely we have to in this country now take the lead. There are others in Europe that would be willing to do this with us. In Denmark I am confident they would wish to do something similar, possibly in France and Italy as well, and in the Netherlands, but actually to take the lead on this and say we will put in a national scheme, similar to the Lacey Act, with the same sort of provisions as the Lacey Act in the States; we will get that in place and use that as a way of driving best practice into Europe rather than what they are now looking at, which is absolutely best practice.

Q152 Chairman: Thank you very much indeed. That is a useful tour round the issues and amplifies on all the things that we looked at and thought about in Cameroon. We have got one more session before we write out report. We are very grateful to you for coming in.

Barry Gardiner: I am most grateful. Thank you.

Tuesday 24 February 2009

Members present

Colin Challen

Martin Horwood	Jo Swinson
Mr Nick Hurd	Dr Desmond Turner
Mark Lazarowicz	Joan Walley

In the absence of the Chairman, Joan Walley was called to the Chair

Memorandum submitted by FERN

SUMMARY

— The UK Government has shown with its support for the EU FLEGT (Forest Law Enforcement, Governance and Trade) Programme that it understands that good governance is a pre-condition for forest conservation and sustainable use. Lessons learned from the FLEGT Programme could and should inform the debate about REDD (Reduced Emissions from Deforestation and Forest Degradation).

— We are, however, concerned that the UK Government sees the debate on forests and climate and specifically the REDD debate, as a debate about money, rather than a debate about increasing political will to address the drivers of deforestation and to develop innovative incentives to support the forces that protect forests.

— It is also of serious concern to us that the UK is a staunch advocate of carbon trading. Carbon accounting in forests is complicated and impossible to measure with sufficient accuracy to be included in a trading scheme. Error levels of 50% and more are not uncommon. Widely fluctuating estimates can never form an accurate and stable basis for trading.

— Furthermore, the failures of the CDM (Clean Development Mechanism) to deliver any climate benefits have become increasingly clear. Including forests into the CDM would be both bad for forests and for the climate. Emission trading (even if offsets were to be excluded) also has not delivered the expected results and it is unclear to us that it ever will. Last, there is increasing evidence that including forests in carbon markets could flood these markets and hence lead to their collapse. Therefore including forests in the EU's Emissions Trading Scheme (ETS) would be bad for forests, for the climate and for the ETS itself.

— For forest conservation to work a good understanding about the underlying causes of forest loss is essential. The drivers of deforestation lie, more often than not, outside the forest sector. Any scheme that does not address these external drivers will fail in forest protection. Experience further shows that where forests are under local (community) ownership their chances of survival are considerably higher than when under state ownership.

The Role of Financial Mechanisms in helping to Address Emissions from Land Use Change and the Environmental and Social Risks and Benefits of using such Financial Mechanisms

1. *There is presently a large push on behalf of some lobby groups to include forests into the EU Emissions Trading Scheme (ETS). FERN believes that although this option may well provide money, it will do nothing to protect forests*

2. Whilst there needs to be a sense of urgency about forest protection, focussing on a funding mechanism before the necessary measures to improve forest governance are in place will, at best do nothing for forest and at worse will help to accelerate forest loss. The carbon market has proven unfit to tackle governance failures, and indeed may exacerbate them if large financial flows are encouraged before proper governance structures have been put in place.

3. *In order to be successful, we must create time and ensure there are at least two stages in developing financial mechanisms*

Stage one involves understanding the drivers of deforestation and dealing with bad governance. Like other enduring successes in forest protection; such as demarcating and giving legal protection to indigenous peoples' territories, this will not be at all "expensive". Available funds (from Norway, the UK and Germany), if allocated to these activities, would already be sufficient to carry out the activities required. Activities would include:

- Increase mapping and recognition of community resources and secure legal title to land and access and user rights for forest dependent people.
- Ensure that forest policy reform is centred on the improvement of local livelihoods and advances the rights of forest dependent communities.
- Ensure that forest dependent communities participate fully in forest sector reform, and in the forest management decisions that impact them directly.
- Reform legislation in timber producing countries so that what is legal equates with just, equitable, transparent and sustainable[1] management of the forest estate;[2]
- Replace both direct financing of logging companies, and sector reform initiatives that favour industrial-scale logging with pro-poor alternatives that fit the needs of local communities.
- Define and implement good governance and successful action to address corruption.

4. Stage two would be the dissemination of funds to lift the financial and domestic political pressure to convert forests to industrial/agricultural uses. Discussions about its design should begin now but it can only be put into practice once aspects of stage one are in place. The faster a country is able to complete the actions of stage one, the sooner it will be eligible for money. This is when the need will arise for large injections of money, but to inject that money now would in almost all cases lead to further problems.

5. Many expensive forest protection schemes, and global programmes such as the UN's Tropical Forestry Action Plan of the 1980s, have been ineffective partly because they have failed to properly identify and address the underlying drivers of deforestation. Where corruption is endemic, increasing the value of forests may well lead to human rights abuses and further forest loss.

6. The current international "REDD debate" seems to work towards creating perverse incentives: a scheme that would benefit only those that have historically deforested. To find an equitable way to fund stage two that doesn't act as a perverse incentive (benefiting only those who have historically deforested) will be complicated and needs to involve all stakeholders and rights-holders to be successful.

7. *The main reasons why we believe that forests should not be included in carbon markets include*

- Carbon accounting in forests is complicated and inaccurate. The carbon storage in forest ecosystems varies widely and the use of default values in offset project calculations is widespread. Full carbon fluxes, including soil carbon and non-timber carbon storage, eg in vegetation other than trees or in roots; annual, let alone inter-annual, fluctuations in carbon storage are rarely considered because measurements are not continuous. In almost all cases, one-off research or sample-plot-based findings with occasional re-sampling is used. Error levels of 50% and more are not uncommon, as reported among others in research carried out on estimating the volume of carbon stored in Russia's forests.[3] These widely fluctuating estimates can never form a stable and accurate basis for a carbon trading scheme.
- Deforestation produces a significant amount of greenhouse gas emissions through burning, clearing, and decay. But exactly how much? Chen et al. show that "uncertainty in estimates of the carbon balance in Canada's forests could be greater than 1,000% if even seemingly small factors such as increased CO_2 levels in the atmosphere are not taken into account" and highlight that estimates in carbon storage and sequestration can be affected by a factor of 10 just by new discoveries.[4] These are uncertainties of such a scale that they can't be dealt with through conservative accounting, and hence cannot form the basis for a carbon trading scheme.
- Furthermore, including fully-fungible forest credits in the ETS at this moment (as is demanded by the signatories to the "Forests Now" declaration) would cause massive over-supply of credits in relation to demand, thereby reducing the price of carbon to below levels at which pollution abatement would be economic.

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[1] According to the World Commission on Environment and Development, sustainable development is: "Development that meets the needs of the present without compromising the ability of future generations to meet their own needs."

[2] According to World Bank Forests Advisor, Gerhard Dieterle, "Illegal logging can be 'need-based' for subsistence, or 'greed-based' for profit."… "Forest laws must be reformed to recognise the needs of the forest-dependent poor. Otherwise, their enforcement is the worst form of violation of equity and justice." (World Bank: Weak Forest Governance Costs US$15 Billion A Year. News Release No:2007/86/SDN)

[3] IIASA, 2001: Nilsson et al.

[4] Wejun Chen, Jing Chen, Jane Liu, Josef Cihar: Approaches for Reducing Uncertainties in Regional Forest Carbon In: Global Biogeochemical Cycles 14. September 200. Page 833

— Carbon markets cannot create the conditions that would lead to an end to deforestation and degradation, such as security of tenure, clarity of rights, functioning administrative and judicial processes, clear and complete policies, arbitration and compensation mechanisms. Only government-government direct assistance is ever likely to bring these conditions about.

8. However we also believe that the arguments in favour of a European or global fund to support the conservation of natural forests are growing ever stronger. The benefits of such a fund would include:

— As government-to-government assistance, a fund would be able to mitigate against forest climate finance falling into the hands of the corrupt elites that control many forest-rich-but-poor countries. A fund would be able to ensure funds were only dispersed once stage one reforms are in place.

— A fund could channel incrementing amounts of funding to countries that are successful in implementing stage one reforms, and engaging meaningfully in governance reform processes such as the FLEGT programme.

— A fund would be able to give clarity to the misconception that plantations are forests. The carbon stock of forests being logged for commercial purposes and of monoculture plantations will, in most cases, be significantly less on average (40–60% depending on the intensity of land use and forest type) than the carbon stock of natural, undisturbed forests.[5]

— A fund could act as a further "carrot and stick" for FLEGT if the EU establishes that eligibility for any future EU-backed REDD funding scheme is dependent on FLEGT compliance.

— A fund would be able to value forest benefits far beyond carbon, for example, forests which support local livelihoods and or high biodiversity would attract higher payments.

The World Bank's Forest Carbon Partnership Fund[6]

9. Despite the World Bank's continued funding of large-scale extraction of fossil fuels[7] and the dismal failure of its previous attempts to protect forests, September 2007 saw the Bank's board approve the establishment of the FCPF "to assist developing countries in their efforts to reduce emissions from deforestation and degradation (REDD)."[8] In June 2008 the Facility became operational and by July the Bank had chosen the countries it claimed were could be made ready for REDD.[9]

10. To date the Bank has established nine carbon funds and facilities, which are either public or public-private sector partnerships. Among them are the Prototype Carbon Fund (2000) and Bio Carbon Facility (2004). To our knowledge, there has not been an independent evaluation of the impacts of these funds and hence no lessons learned, and few of us in the NGO community had the opportunity to research them in more depth.

11. The FCPF is the newest of these funds. Public discussion of the FCPF and consultations on its design and objectives have been minimal. As the FCPF wants to build capacity for REDD activities and test a program of performance-based payments in pilot countries, the FCPF has established a "Readiness Fund" to determine a national reference scenario (historical emissions, assessment how they would be likely to develop in the future); prepare a national strategy and establish a monitoring system.

12. It is as yet, if and how the FCPF will address the complexity of drivers of deforestation—including those promoted by its own investments—eg IFC investments in biofuels. It is also as unclear how the Bank sees the role of governance, law enforcement? This of particular concern as the FCPF Criteria for its Readiness Fund do not include criteria for governance, or criteria for a commitment to benefit-sharing, poverty reduction, etc. Furthermore there is no clear role for Indigenous Peoples Organisations or representatives of local communities in the decision making process, despite stated intentions.

13. The World Bank claims that the FCPF will be an exercise of "Learning by Doing"—to produce real life experience with REDD to assist UNFCCC discussions of post 2012 climate change regime. Yet "Learning by Doing" has been notoriously weak at the World Bank Group. The FCPF claims that Readiness activities will involve a high degree of consultation with civil society and indigenous peoples organisations and that national REDD strategies must be rooted in a broad-based consultative process. What we have, however, learned from our partners in Ghana and Liberia is that this has to date not been the case. FERN aims to monitor at least some of the 14 initial Readiness projects.

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[5] Brendan G. Mackey, Heather Keith, Sandra L. Berry and David B. Lindenmayer, Green Carbon—The role of natural forests in carbon storage, 2008

[6] Based in part on information provided by Korinna Horta, World Bank specialist at the US based NGO Environmental Defense.

[7] In 2006 alone, 77% of the Bank's energy sector spending went on oil, gas and high carbon energy infrastructure (US$612 million) and only 5% to renewables. In 2008 the Bank is still investing heavily in extractives and a major lender for deforestation operations linked to palm oil plantations. Add source

[8] FCPF Information Memorandum, World Bank, January 2008

[9] These countries include six in Africa (the Democratic Republic of Congo, Gabon, Ghana, Kenya, Liberia, Madagascar); five in Latin America (Bolivia, Costa Rica, Guyana, Mexico, Panama); and three in Asia (Nepal, Lao PDR, and Vietnam).

The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

14. Karsteny & Pirard explain very convincingly in their forthcoming paper "Climate ChangeMitigation: should 'Avoided Deforestation' (REDD) Be Rewarded?[10]" that it is not very likely that accuracy and cost considerations can be reconciled if the measurements have to be of sufficient accuracy to make a robust carbon trading scheme work. This conclusion tallies with FERN's experience of analysing and scrutinising carbon offset tree planting and forest conservation project documentation.

15. The minimum level of accuracy that is required depends significantly on the framework which is chosen. As outlined above, it is difficult to see how cost and accuracy could be reconciled if the instrument of choice were carbon trading. Instruments other than carbon trading will also require reliable monitoring—but it is FERN's assessment that for such approaches, adequate monitoring and measuring is obtainable. A combination of remote sensing and ground verification, especially in order to detect long-term cyclical changes related to land-use patterns would be required and is both feasible and available if regular funding were made available.

16. Past experience further shows that the use of remote sensing data alone is likely to lead to misleading assessments and may, for example, identify as "deforested", areas of forest that are actually part of a matrix of farm-fallow land-use patterns and which, in subsequent years, would actually show as regeneration or restored forest. These local patterns are often complex, and need careful assessment on the ground, sometimes over a period of several years to distinguish temporary from permanent forest carbon loss.

17. Without such verification, there is a high risk that the wrong areas of "deforestation" will be targeted, along with the wrong causes and actors. Equally, remote sensing alone is likely to significantly underestimate emissions from so-called "reduced impact concession logging" in intact forests where the canopy is not fully removed but where carbon losses can be significant despite the remaining canopy cover.

Government Sustainable Procurement of Forest Products

18. There is no doubt the UK is at the forefront of developing and implementing sustainable timber procurement policies. Their efforts should be applauded. There are, however, two main concerns from our perspective.

19. First, as pointed out by a previous EAC report, the UK timber procurement policy does not include social standards. Sustainable procurement clearly must be based both on environmental and social indicators. The UK lags in this regard behind other EU Member States such as Denmark and the Netherlands. This situation needs to be rectified. Hence the UK must as a matter of urgency include social criteria in its timber procurement policy.

20. Second, the UK Procurement policy accepts various certification schemes as proof of sustainability, which in our experience do not deliver real sustainability on the ground. In fact some of them are clearly certifying what we would qualify as "unsustainable" practices, notably the US' Sustainable Forest Initiative, the US arm of the Programme for the Endorsement of Forest Certification Schemes (PEFC). As on the ground experience cannot be included as "proof" of non compliance with the UK standard, this creates a serious hole in the CPET system which undermines the credibility of the UK Procurement Policy. Hence the inclusion of "on the ground" evidence of non compliance with the CPET criteria must be admissible and must have ramifications for the acceptance of the scheme that has allowed for these practices.

The Success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, and Government Support for it

21. We consider the EU FLEGT process as a positive process. The first Voluntary Partnership Agreement, signed with Ghana in August 2008, clearly shows that the FLEGT process is able to instigate much needed forest law reforms, strengthen local peoples' tenure rights and control the those timber companies that are profiting from and favoring weak governance systems.

22. We have learned from the EU FLEGT process that, before any partnership agreement can be put in place, it is essential to first establish who owns the rights to the forest and then set up laws which respect those rights. The same would apply to any agreement to avoid deforestation. To be able to clarify these rights, a participatory domestic process including all stakeholders and rights holders is a necessary pre-condition. Any scheme or project should be based on Free Prior Informed Consent of all communities involved.

23. As described above forest-based carbon trading cannot and will not address inequitable land tenure and may reinforce such problems by making the annexing of forests more profitable. Current experiences with the CDM, certainly prove this.

[10] Available on request from saskia@fern.org

24. Sir Nicholas Stern and many others have stated that no scheme to avoid deforestation will work before property rights are clarified and forest peoples' rights and customary laws are secured. Hence before any decisions are made to add forests to the ETS, the first step is to clarify ownership rights and ensure these rights are enforced. Giving (or in many cases returning) ownership rights to local communities is the best way to reduce poverty, increase forest protection, and promote sustainable forest use. Furthermore, any decisions that affect forests should be taken in a proper consultative way including all stakeholders and rights holders. These are all lessons we have learned from the EU FLEGT process.

12 October 2008

Witnesses: **Mr Tom Griffiths,** Co-ordinator, Finance, Programme, Forest Peoples Programme; **Ms Saskia Ozinga,** Campaign Co-ordinator, FERN and **Ms Fiona Watson,** Campaign Co-ordinator, Survival International, gave evidence.

Q153 Joan Walley: Welcome to our Select Committee this morning, and thank you for coming along. I think you are probably aware our Committee went to Cameroon last month and while we were there had opportunities to visit some forest peoples, particularly a pygmy village. Just before we go into our questions, I wondered if there were any opening comments you would like to give us. I am not looking for a long statement but if you want to introduce yourselves and just, perhaps, set out the main concerns that you have about our current inquiry.

Ms Watson: I am Fiona Watson, Campaign Co-ordinator at Survival International, which is a human rights organisation working with indigenous and tribal peoples on their rights.

Ms Ozinga: I am Saskia Ozinga. I am with FERN. I am the Campaign Co-ordinator from FERN, and I would like to make one opening comment, which is that I understand that this Committee looks specifically at indigenous peoples rights in relation to REDD and the forest climate agreement, but the point I want to make is that when we look at forests we look at 20% of the emissions, and the forests will be gone if we do not address the 80% of the emissions, which are probably more crucial to keep the forests alive. So I would like to make a few points on that, and specifically on carbon trading, during this evidence.

Q154 Joan Walley: Perhaps some of our questions will cover that as we go through.

Mr Griffiths: Hello. My name is Tom Griffiths; I am Co-ordinator of the Responsible Finance Programme of an NGO called the Forest Peoples Programme. Our main concerns regarding the topic of your investigation and this Committee's work are that climate change mitigation instruments and plans, including REDD, actually, if not addressed could pose a threat for forest peoples communities, and we are very concerned that these risks are addressed by donors and governments in interoperable countries. If they are not there is a risk that these instruments and finance for them could exacerbate the marginalisation of forest peoples.

Q155 Joan Walley: Perhaps we can start off by looking at the risks that forest peoples face and the extent to which there is respect for forest peoples in the lives that they live, the indigenous people's rights that they have and the challenges that they face. Perhaps you could help us to understand some of those challenges.

Ms Watson: I think it is very important to bear in mind that with indigenous and forest peoples you are talking about possibly the most marginalised of any groups; people who have very little and in some cases no access to any information about potential developments on their land and what their rights are under national let alone international law. I think it is important to bear that in mind. So the problems they are facing are massive. For example, I think the key question has to be collective land ownership rights, which are recognised in a number of international conventions which we can go into later, but specifically ILO 169 and the UN Convention on the Elimination of Racial Discrimination. A number of governments, particularly in South America, have also recognised land ownership rights but this does not necessarily solve the problem, although it is obviously the basis and a very crucial thing. Many governments also failed to recognise customary rights—that is how the people have traditionally used the forests—so that if they do not have rights in international law they are still discriminated against because many people, who think that indigenous people live by hunting and gathering and rotating the land sustainably and need large tracts of land to be able to live sustainably, believe that this is not the right way to use the land. In relation to REDD, you are already talking about these big issues, national government developmental plans. For example, in Brazil, which I know the UK Government has pledged a significant amount of money for for the protection of tropical forests, has a massive development programme, a programme of accelerated growth, so the question is how do you square a country like Brazil which has a huge infrastructural plan to build dams, to build roads, and massive, massive development in the Amazon, on the one hand, with the fact that it is saying that it wants to preserve Amazon forest and cut down emissions, etc? Only last week the Amazonian state governors in Brazil produced a letter which said that, on the one hand, they want to enter into agreements to offset carbon, etc, and, on the other hand, they want more roads to be built (and roads are one of the worst causes of Amazon deforestation) and they want to be consulted on any measure to limit planting of biofuels, such as sugar cane and Soya. So you can see the inherent contradictions. Another point to make about

indigenous and forest peoples is that not only are their rights very often not recognised—their land rights—there is very poor governance, often very hostile local state governments, and this makes it very easy for corruption. Because they have no access to information, often these peoples are not operating on a basis of equality with structures or companies, or whatever, surrounding them, and there has been a failure of foreign aid programmes to recognise this and, also, give their fundamental rights. Another problem also facing many indigenous peoples is instability. In many areas, such as Papua or Colombia or DRC, there is ongoing civil war or actions by guerrillas and paramilitaries. This adds another layer of complication. So when you come to REDD, governments and companies see this as a way of making money; it is a business enterprise, and we feel that unless these rights are addressed as the fundamental issue REDD is going to exacerbate the problem because there is an incentive for outsiders to go in and simply take land—grab land or negotiate land—that belongs to the communities that has not been recognised under national law.

Q156 Dr Turner: Clearly, having heard your last comments, you are unlikely to say "yes" to a question which says: are forest dependent peoples' rights and interests adequately being represented in the UN climate change negotiating process? Does the negotiation process take into account the fact that these people are highly, both politically and socially, living on the margins and, as you say, very disadvantaged in every respect? You are unlikely to say "yes", I take it. I do not want to lead you!
Mr Griffiths: I am afraid, sir, the only conclusion has been no, it does not take proper account of the risks, their marginalisation and their vulnerability. Within the climate convention process indigenous peoples and certain social justice groups have complained repeatedly that the participation process in the climate convention does not enable adequate access to the negotiations. They are allowed to make statements but only at the beginning and close of government text negotiations, whereas best practice in other UN conventions allows indigenous peoples, in particular, which is one major group identified under agenda 21 at the Real Convention, to speak to text in a negotiation where the issue directly affects them. Of course, in this issue of forests it affects indigenous people, in particular, directly. Most of the world's remaining standing forests are located on the traditional lands and territories of indigenous peoples, so this is a prime case where indigenous people should be given the opportunity by the chair of these negotiations to intervene on text. They are not currently allowed to do so. There is also a question, of course—they are marginalised and they lack resources—of a long-standing demand for a voluntary fund to enable these representatives to get to these meetings that are often in capital cities and in Europe and northern countries. So, at the moment, there are real barriers to effective participation, and their concerns particularly on the question of human rights are not being addressed in negotiations. In Poznan, just recently, there were major protests at the close of that meeting because governments had not paid heed. Although there had been some mention by the EU, and, indeed, the UK, actual firm commitments were not forthcoming at Poznan. That is a real concern of indigenous peoples and groups that support them.

Q157 Dr Turner: Do you think the UK Government is doing enough on behalf of indigenous peoples? Are we advocating for them adequately?
Ms Watson: I do not believe so. On one level the UK Government supported the UN declaration on the rights of indigenous peoples and voted to approve it, but when it comes to international law—for example, the ILO convention 169, which a number of European countries have ratified, talks we have had with the Foreign Office have not progressed and there seems to be a major obstacle for this government to sign. It is a very key convention because it is one of the few conventions (there are a number of other ones) dedicated specifically to indigenous peoples rights. So therefore it is a benchmark and we believe that the provisions in it are important not only for governments but for companies that operate, say, in the UK or who are listed on the London Stock Exchange that they abide by this international law, which specifically recognises indigenous peoples rights to collective land ownership.
Mr Griffiths: If I could add a comment on that: is the UK Government supporting? It is difficult to give a definitive answer. In some cases yes, in other cases no. One area where it has been obstructive, in fact, on this issue is on the issue of collective rights. The FCO and UK Government officials have stated in international fora, including the planet convention, that they do not support collective human rights. The Forest Peoples Programme has questioned this on a number of occasions as being contrary to international law. These rights are established in human rights instruments. I can provide details to the Committee if need be. The reason why collective rights are so important in this debate on forests is that the land rights and tenure of indigenous peoples are fundamentally based on collective rights, and later in this discussion I will show why that is key to sustainable management of forests and tropical forests. So that is obstructive. On the other hand, there is some useful work being done by DfID and others in the FLEGT process, which Saskia can talk about—very progressive work—on rights and public participation, and indeed there is something called the rights and resources initiative, of which DFID is a member, along with Forest Peoples Programme and other organisations. So it is a mixed picture, but this particular objection to collective rights is unhelpful and we would urge the British Government to change its position on that.

Q158 Joan Walley: Can I follow that up a little bit? You talked about the ILO and you talked about the FCO not following up work that you tried to get on the agenda, through the ILO, on collective rights. I am not quite clear how those negotiations, or lack of

negotiations, dovetail with the different climate change negotiations which are going on within the UN. I think it would be very helpful to our Committee to have a little bit more detail about the linkages between the two separate strands of negotiations and how they actually integrate.

Ms Ozinga: What we very much would like the UK Government to be doing is to support those countries, of which there are a few in the EU, but, also, countries like Japan and Norway, who have made very clear statements that a recognition of rights should be a precondition for any programme or REDD scheme coming into operation. If the UK took that position very outspokenly that would be a great support, because we strongly believe that one of the preconditions for an effective REDD agreement is that there is a recognition of rights of local communities and indigenous peoples. There is a movement towards that. If you see the countries' submissions in the lead-up towards Poznan and you look back to 2005 up until now, the interest in the recognition of rights has grown a lot. It was just very unfortunate that in Poznan the US, New Zealand and Australia boycotted the recognition of rights in the final text, but with the change of government in America there are clear signs that that might be changing, and that would be another way to push that back in to the lead-up to Copenhagen.

Q159 Colin Challen: Given the timescale, Copenhagen is only nine months away, are you optimistic that if we do have a market mechanism dealing with carbon and forestry those rights will be properly enshrined? What will be the impacts of this market on indigenous peoples?

Ms Ozinga: There are two questions in one. I read on the train coming here the discussion you had with Barry Gardiner on 10 February, and reading that transcript it seemed to me there was a confusion that some—including Barry Gardiner—seemed to think that it was a done deal; that REDD would be based on carbon trading. In our view, it clearly is not. If you look at the countries' submissions, some countries are clearly in favour of carbon trading and other countries are clearly against, and the majority of countries are going for a mixed approach. So REDD cannot be equated with carbon trading. That is the first point I want to make. My organisation, specifically, but increasingly supported by a large number of environmental and social NGOs, has a serious problem with carbon trading, full-stop, as a solution to the climate crisis. The reasons for that are basically three-fold. The first one is that the consensus that we need to go towards a low-carbon economy, everybody will agree with that, and that means 80 to 90% reductions of CO_2 emissions by 2050 or after. It is very clear that a trading instrument cannot do that and never has done anything like that in the history of humankind. When you look at space innovation, and so on, and so forth, there has always been massive research and development led by government and the private sector. Carbon trading is tinkering around the edges; it is not going to create that shift which is really needed to come to a low-carbon economy. Secondly, what carbon trading can do and is supposed to do is reduce emissions, but if you look at since the ETS has come into force in 2005 emissions have only gone up, even by 5% if you look at 2007 from 2005. So it is clearly not working in that regard. I have to say I am very disappointed with Ed Miliband who I heard on the *Today* programme recently saying that offsetting was not a real problem because only 3% of emissions were being offset. That is misguided. I looked very hard to see where he got the figure of 3% from, and the only thing I can find is that if you look only at the Effort Sharing Decision then 3% of the emissions can be offset but what we, of course, should be looking at is the percentage which you offset of the emission reductions, and we should look not just at the Effort Sharing Decision but, also, at ETS, and it is a combination of both. If you look at those figures, it is actually a rise of 61/62% which is going to be offset. So the actual emission reduction is very, very little. That is the second problem we have with carbon trading. It is not really doing the emissions reduction either, let alone the shift to low-carbon economies. The third problem is, of course, the offset itself, because I presume you will know there have been big problems with the CDM. I also noticed that, Barry Gardiner made this comment; that the flaw with the whole offsetting within the CDM is putting the whole REDD debate on the wrong track, and I definitely agree with that. Offsetting is not really leading to emissions reduction as well because of the problems with leakage, which Barry Gardiner mentioned very clearly, and additionality, and the temporary need for it. So there are three overall problems why we think carbon trading is the wrong way to go when we look at something big which addresses the climate crisis. Then, if we want to continue, there is another problem when you come to carbon trading specifically to REDD and specifically when you look at local communities. Tom was telling me on the train coming here that he has recently been in Guyana, local communities in Guyana have currently been negotiating a REDD climate agreement, and the agreement is being sold to them as a way of getting money in the same way as they got money from something like rubber tapping. So you tap rubber, you sell it to the market, you get money—so that is a good thing. The problem is that carbon trading is something very fundamentally different than, say, rubber tapping. When you have a community which taps rubber, it is up to the community how much rubber they tap, when they tap the rubber, when they sell it, how they sell it; of course, there are international forces which influence that but, in principle, that is what they do—they own the rubber and they can sell it. With carbon trading, what is being sold is a contract between the buyer, who basically buys the right to continue to emit greenhouse gases, and the seller, who allegedly is the community but which, in reality, is usually an intermediary in between who basically gets the control over the use of the forest. I do not know if you have seen an article fairly recently by Point Carbon which noted that these intermediaries which are big, large conservation organisations—such as

TNC, which are carbon consultancies, such as EcoSecurities—take 40 to 50% of the profits. Hence, it is not quite a surprise that they are so much in favour of carbon trading, because that is where a lot of the money goes; there is very little that goes to the community. Secondly, the community does not see the contract because the contract is between the intermediary and the buyer. The contract is usually in English and the contract is in almost all cases confidential. The ones we have seen we have only seen because they were either leaked or we got them via a Freedom of Information request. So it is not a particularly transparent process. Thirdly, the contracts are about for 100 years, so the community is signing off in this carbon trading deal for 100 years to keep the carbon in the forests. Nobody knows what is going to happen even in 50 years, let alone in 100 years, or 99 years, but they are forced to keep the carbon in that forest for those 99 years. If the forest burns in that time, which is quite likely, particularly with increased climate change, they are liable to find those carbon credits somewhere else. So it is a very, very dodgy deal, to say the least. Apart from the big problems with carbon trading, which we think do not address the climate crisis (and if we do not address the climate crisis this whole debate is a nonsense because the forest will be gone anyway), there is a separate problem that the carbon trading in terms of doing any benefit for the forest and the community, in our view, simply does not work.

Mr Griffiths: Just to add something to what Saskia was saying about the potential impacts of the carbon market, there is already evidence emerging that this carbon market is marginalising and violating the rights of indigenous peoples and forest communities. For example, in Indonesia there are memoranda of understanding being signed between provincial governments and carbon broker companies without the involvement of affected communities. So these transactions are taking place over the heads of the communities, and their interests and rights are not being properly taken into account. There are also some arguments from the carbon companies that there is an incentive for business, because of potential reputational risks, that they should address social issues and rights issues, and that surely there is an incentive there for them to address land rights, and so on. I am afraid, again, the evidence that is emerging from voluntary carbon projects in forests is to the contrary. In parts of Brazil, for example, it is clear that land rights are not being recognised and that the deal, as Saskia has said, is being done between intermediary organisations, conservation NGOs, and carbon companies. The communities are very much indirect beneficiaries and receive only token benefits, and their rights are not being secured, so there is a risk that this carbon charging will further marginalise indigenous peoples.

Q160 Colin Challen: I am getting the impression that market trading is an insuperable difficulty for you; that, actually, there is an alternative that might be better. What would that alternative be? Would it be, for example, a funded scheme? A number of governments have proposed direct funded schemes and, to quote one example, the Ecuadorian Government proposed the Azumi Forest scheme which also met with a lot of criticism on the grounds that the governments in Ecuador had not paid sufficient attention to the rights of forest peoples and so on. Are you saying, collectively or individually, that there are insuperable problems with the markets? If so, what is the alternative? Are there, indeed, great problems there as well?

Ms Ozinga: I think what we are saying is that when the issue is how to keep the forest standing, which is what the issue we think should be, then only looking at money and only looking at markets is the wrong way to look at it. You need to look, first of all, at the drivers of deforestation because if you do not address the drivers in any forest and climate agreement or anything else you will not solve the problem. Then, if there is going to be a forest and climate agreement, which we think there will be (maybe not in Copenhagen but shortly after) the agreement should not be based on carbon trading but should be based on a fund, and it should be in a phased approach. You have just been to Cameroon; as you know, Cameroon has £120 million in one of the banks, which they cannot spend. A lot of the governments have not got the ability to actually spend the money, so to just throw more money at that sort of government does not really work. So, it would have to be a phased approach in which you would have to have very clear preconditions in place which need to be met first before you can go on to the next step. I have been working on the EU FLEGT process, of which the UK is a very great supporter, and I have to say I have been in this work for over 20 years now and it is one of the most effective ways, I have seen, in trying to improve governance on the ground and being potentially a very effective process to address deforestation. There are ways it can be done, but what we are also seeing is that where the FLEGT process is most effective, such as in a country like Ghana and, hopefully, now in Liberia where it will start in March, the whole REDD process is undermining it. The FLEGT process in Ghana has been very, very, effective. It definitely has the potential to turn this country around and to keep the little forest that is left there. What we are seeing is that the REDD process, led by the World Bank, is totally undermining the whole process which has very painfully been put in place, over the last four years: to get the FLEGT process to improve governance on the roads. Hence, the phased approach is very, very key, but the whole REDD debate seems to me now skewed to: "How can we get as much money as possible, as quickly as possible, and get it out there to stop the deforestation?" That is the wrong way to look at the debate. In that case, we will never solve the forest crisis.

Q161 Mr Hurd: Can you be a bit more specific about how the REDD process is undermining the FLEGT process?

Ms Ozinga: I can speak about Ghana. In Ghana the Forestry Commission has been negotiating with the timber industry, NGOs and community based organisations as a collective for four years with the

EU, to sign an agreement. The agreement was signed in September 2008. The agreement very clearly specifies that there has to be stronger regulation of the forestry industry. Forestry is very chaotic in Ghana; there are many small companies, and few big companies, but these have to be regulated and streamlined and every company has to meet the law, which it did not do before. Landowners, including local communities, have to give written consent before logging will take place on their land, and there needs to be a process put into place which will have to be finalised three to five years after the VPA is signed—hence, five years next September—to have a forest law reform which brings all the existing laws into line. In many countries the forestry legislation undermines other legislation, and so on and so forth. That has been a great success and, I think, I speak jointly, with the timber industry and the government and the NGOs in Ghana, that they feel that this process can really turn the country around. Now, at the same time, but unbeknown to the people from the Forestry Commission (who have been involved in this process) other people have been talking to the World Bank to put a REDD plan in place. The initial plan was produced last year. It mentions that one should look at the FLEGT process, but there has been no consultation at all. There has been no consultation since. Although the plans say that they should look at what happened with the VPA, nothing has really happened. At the same time the Bank has all this money ready to go but does not quite know where to go, so where it is going is not clear. Another reason why the VPA was successful, the donors, including the UK and including the EU and others, had made very clear commitments that they would only spend the money in line with the commitments which the Government has made as part of the VPA process and make the funding conditional, in close co-operation with the Government. The REDD plan does not do anything of the sort, and it is, again, the same donors as well—the UK. So it is a very contradictory thing. Then what happened lately, in Poznan, where the Minister of Ghana presented the positive developments in FLEGT and said that now REDD was also going and that by 2012 Ghana hoped to have a REDD plan which was building on the FLEGT process and implementing it—exactly what should happen—but Benoit Bosquet, the head of the World Bank, sitting in the Panel with him said: "Surely, you can do that by next year?" That is an indication of the force of the speed with which the money needs to be spent, which is not going to do any good in the end.

Mr Griffiths: Just to reiterate something Saskia is saying, what sort of agreement would organisations like ourselves, who work on environmental and human rights issues want to see? First and foremost is that any agreement fully upholds human rights, including the rights of indigenous peoples, as established in international norms and international law. That is one of the things that is a fundamental precondition of an acceptable agreement on forests and climate. Without that, as we mentioned in the opening of this discussion this morning, there is a risk these instruments and agreements could exacerbate the problems for forest peoples. So, one of the first things you want to see is the upholding of human rights, including the rights of indigenous peoples. That includes, in particular, the right to free, prior and informed consent but also that is a procedural right. It also includes substantive rights, as Fiona mentioned, to land, resources and territory. So any agreement has to have provisions for that, and binding commitments. Optional guidelines, general principles are not acceptable; there has to be a decision in the climate convention and other related agreements that governments are really bound to this. Also, any agreement must address the perverse incentive and moral hazards that are inherent in current proposals on the table which seem to be proposing that only deforesters would be compensated or rewarded. Any scheme would have to meet criteria for fairness and equity, and that means that traditional peoples, indigenous peoples and other custodians of forests in developing countries should be recognised and rewarded. So you need a combined approach in looking at standing forests, and the protection of those, and of course areas to look at deforestation—high risk deforestation—where you need a combined integrated ecosystem, landscape liberal approach to this. Another thing that any scheme would have to do, as Saskia said, is have this phased approach. If you do not address the governance, land rights and, particularly, the land tenure rights up front in these schemes you will have a real risk, as we have said this morning, that you will exacerbate existing inequalities and vulnerabilities of forest communities because many state frameworks in the developing world currently do not adequately recognise these rights. So without a proponent for reform, promotion and incentives for good governance in the forest sector there are real problems with this international agreement, and any related finance mechanisms could cause serious problems. So it is essential, this phased approach that Saskia is talking about. There are tensions there because, of course, there is an urgency with the climate issue and so on. What many scientific studies show is that, particularly in the forest sector, issues are complex and they need time—tenure issues need time—to be resolved. So there is a need for balance there and this step-wise approach is the preferred approach to any type of REDD agreement; that these rights and tenure issues are addressed upfront and then the financial issues and possible incentives may come in in a second phase.

Q162 Colin Challen: Perhaps a better approach would be to keep deforestation out of the Copenhagen process altogether. It should be treated as a separate subject. Would you see any validity in that position?

Mr Griffiths: Saskia may wish to comment, but I think keeping it out of the Kyoto trading mechanisms would be certainly welcome and a recommendation we would make. That is a flawed system. It is also well-documented that CDM

projects in the forestry sector, those are mainly plantations at present, have been problematic and have caused adverse impacts. The social standards attached to those mechanisms are inadequate. So we would want to start from scratch, get forests in a mechanism that is outside of Kyoto and that really can address these social issues in a robust and coherent manner.

Ms Ozinga: I would agree with that. For me, it does not matter whether it is under the UNFCCC or not, it depends on what the content of the agreement would be. The debate is clearly under the UNFCCC and I noted that Barry Gardiner seemed to make the point in his submission that he feels we have already gone so far on the road that we have to make certain compromises. I would agree with that although, in my view, he goes too far by compromising on the trading, which is really going to undermine the whole thing. So that is the compromise I would not make. However, if an agreement could be made under the UNFCCC but outside the Kyoto protocol's trading mechanism that would be a possibility, but it would have to be a similar type of agreement as is now being done by the EU with timber producing countries as part of the FLEGT process. The eminence of the FLEGT process would have to be reflected in a future climate agreement.

Q163 Martin Horwood: My apologies, Chairman, for being late, and I have to, also, declare an interest because as Chair of the All Party Group for Tribal Peoples we are supported by Survival International. I wanted to make that clear for the record. As you said, the tenure issues for most of these mechanisms have to be sorted out upfront, and a number of witnesses have emphasised that getting tenure sorted out is almost a prerequisite for this kind of thing to work anyway. Have you got experience that you can tell us about of an actual process that has already happened anywhere where tenure has been sorted out in the forests and where, in a sense, tenure and ownership did not exist before? Either successful or unsuccessful.

Mr Griffiths: There are a number of examples in particular in Latin America—Central and South America. In the case of Nicaragua, for example, there is a progressive law on territorial rights which is in the process of being implemented. These issues, as I mentioned earlier, are complex and they take time, but there is evidence from Nicaragua for example that these rights are being established and protected in the national legal framework. There is, also, crucially, a practical process for realising those land tenure rights, because very often what we do see is that the law may have been constitutional or on the statute books but there are no implementing mechanisms to get those laws actually put into practice. Nicaragua is a case where there are new regulations putting those collective territorial rights to forest and land into practice, so Nicaragua is an interesting case to look at. Also, it should be said that there are very innovative and proven participatory tools to assist in clarifying tenure rights. One that has emerged in the last almost 20 years is the use of geographical positioning systems.

Q164 Joan Walley: We saw this in Cameroon.

Mr Griffiths: You can involve communities in that process to help demarcate or document their occupational use of forest land, including proposed boundaries of their areas. So there are participatory tools that prove it, and crucially they are cost-effective. There is evidence to show that this technology is cost-effective and it is an effective way to help communities to secure their right if it is done, as I say, in partnership with legal and forestry reforms.

Q165 Martin Horwood: Are there any examples you can think of where that has actually translated into legal title and ownership in the sense that we might understand it for land ownership in this country? Or is it more about a special category of rights?

Mr Griffiths: It has definitely been used, this technology, in Panama, for example, in indigenous co-markers of the Embará people, for example. They have used this technology in the demarcation and delineation process and in the ordering of land tenure with local and national government, and it has underpinned the titling process of their land. So it is a proven approach and has been used in Panama.

Q166 Martin Horwood: Is it directly parallel? Is it, in effect, a form of ownership? What I was coming on to is, really, are there any examples of that ownership being established and then actually being lost—the ownership being appropriated by governments or by other sort of third parties who actually, in effect, buy out that ownership once it has been established?

Ms Watson: Most Latin American countries recognise collective land ownership in their national constitutions, but not all of them. So, on one level, communities or peoples have collective title to their land and they are deemed the owners of the land. The problem comes with other legislation, and that is particularly in the case of mining where most states retain subsoil rights. So, for example, in Brazil they are now debating in Congress a draft law on mining in indigenous territories where, up to now, no mining on a large scale has been allowed. So although, theoretically, people have collective title it does not give them necessarily total security over their natural resources.

Q167 Martin Horwood: Are there any examples of indigenous peoples being effectively bribed to be evicted?

Ms Watson: Yes.

Q168 Martin Horwood: Do you want to tell us about any particular examples that you can think of?

Ms Ozinga: In the case of REDD, Papua New Guinea is an interesting example where the people do have the ownership rights to the land and where you see, now the whole REDD debate is coming up, that the government is suddenly claiming it has a form of ownership which it did not have before, and

that battle still has to be fought. We see that battle playing out in Papua New Guinea and we also see it playing out in parts of Brazil and in parts of Indonesia. This is where Tom said the whole REDD debate could be another form of land grab coming up.

Mr Griffiths: Yes, there are examples, as you say, where communities have been put under pressure to lease their lands, and so on, but it must be made very clear to this Committee that there is ample evidence to show, also, that secure collective tenure is a very effective means of forest protection. There is more than one scientific study in Brazil, in the Brazilian Amazon, that shows that secure tenure is an effective mechanism to protect the forest. Where communities have strong institutions and they are able to organise to protect their lands from encroachment, they are proven to be very effective. This is shown from remote sensing technology with satellite imagery and aerial photography. It is clear to show that indigenous territories with a secure and recognised legal title are effective at protecting standing forest. That is very clear where, as I say, there are strong institutions and they have support and so on, and they are able to defend their forest.

Ms Watson: It is also worth pointing out that most of the definition of collective title in virtually every constitution that I have seen says that collective title is inalienable. So that means it is vested in the community and cannot be sold. So you would not get the case where individual members of a certain people could sell; that is simply not allowed, and so that is the most secure form of collective title, and a very important one because that means the people cannot be bribed into selling bits of land.

Q169 Martin Horwood: You are saying this is fine where that kind of process is well-established and where title is respected, but is not one of the reasons behind the idea of a market mechanism—one of the possible benefits of it, if you could establish those kind of social benefits were guaranteed—that it does actually provide some kind of financial driver to protect the forest? Can you imagine that working in combination with the kind of social safeguards that you were talking about?

Ms Ozinga: In theory, yes, but in practice no, because what we see in practice is that the opposite is happening in those cases where you have the voluntary carbon market financing community-based projects. In none of these cases it has actually strengthened the right of the communities, and in almost all of these cases the opposite has happened because the power shifts, first of all, to the intermediary who does the carbon trading deal, and it is often even unknown to the community what is in the deal, and so on and so forth. In theory, I would like to believe what you are saying might be the case, but I think there is nothing in practice that really substantiates the argument. You can also argue that even for a fund-based mechanism you would need to clarify the land rights first anyway as well, and hence the phased approach, because clarification of land rights and improving governance would have to be the first phase of any mechanism.

Q170 Martin Horwood: If we had to argue for an international gold standard on this, is there one you could suggest? Is ILO 169 applicable or suitable, or is that only a beginning?

Ms Watson: Yes, I think, definitely, ILO 169 because there is very clear provision for collective land ownership rights. However, there are also a number of others. The UN Convention on the Elimination of Racial Discrimination has been very active in promoting indigenous peoples rights and also has a number of clauses. We can provide the Committee with a number of international instruments that we believe would certainly strengthen indigenous peoples' rights if these were applied as a basis for the negotiations.[1]

Q171 Martin Horwood: One last question, really: the role of the UK Government. In evidence to us they have talked about the rights of indigenous peoples, but, at the same time, they do seem to be enthusiastic for some kind of market-based mechanism. How would you see their role? Do you think they could do more, or improve their performance, or do you think they are broadly on the side of the good guys?

Ms Ozinga: We had a meeting with Ed Miliband and his staff a few months ago and I understood from the meeting that the UK is increasingly open, at least, to understanding that carbon trading as a financing mechanism for REDD might be more problematic than they thought in the beginning. I do not have the illusion that we can convince the UK Government, or the EU for that matter, that carbon trading is not the way to solve the climate crisis because the whole carbon trading scheme has been set up and it will take a decade or more to unwind, but I do hold some hope that we can convince the UK Government and the EU that carbon trading is not the way to go for a forest climate agreement. If I did not have that hope I would not be sitting here either. I would hope that this Committee also understands that case and can make the case to the Government that actually carbon trading, for REDD specifically, brings in a whole bunch of other problems which are not necessarily the case with carbon trading per se.

Q172 Mr Hurd: Could I ask Tom Griffiths to expand a little on the point that you made, or point the Committee to a body of evidence that shows what happens to deforestation rates when this tenure issue is sorted or where local communities have, if you like, community ownership of assets? What is the evidence base? Presumably there are potential conflicts between the need to preserve forests and their use by local peoples for their own needs.

Mr Griffiths: In terms of evidence, there are specific scientific papers which substantiate this which we can provide the Committee with.[2] There is an

[1] http://www.survival-international.org/campaigns/law

[2] Inhibition of Amazon Deforestation and Fire by Parks and Indigenous Lands' published in Conservation Biology (2006, Vol 20, pages 65–73) where an international team of scientists, led by Daniel Nepstad of the Woods Hole Research Center and the Instituto de Pesquisa Ambiental da Amazônia (Institute for Environmental Research in the Amazon), used satellite data to demonstrate, for the first time, that rainforest parks and indigenous territories halt deforestation and forest fires.

eminent forestry expert, David Connor, who has published a paper which we can provide the Committee with in regard to Central America where it is very clear that the intact forest and healthy forest ecosystems are, to a large extent, on indigenous peoples' collective territories. Some of them are in protected state-run areas but most of them are indigenous peoples' territories, for the whole region, in fact; there are no exceptions in that region. In the Brazilian Amazon we can provide you with scientific literature upholding that information. As regards some sort of tension between communities' ownership and use and adequate protection of forests, I really do want to make a strong point here to the Committee. What is most disturbing, going on in the climate convention at the moment, are the discussions about definitions of deforestation and degradation, implying that communities, including indigenous peoples, are culpable of degradation. Again, there is a vast body of scientific literature, particularly in the case of indigenous peoples to show that their land use systems are sustainable, in fact, and can enrich the forest ecosystems and enrich biodiversity and other values in the forest. That is well documented. Again, we can provide the Committee with that evidence. There is a real concern among indigenous groups that the convention could adopt prejudicial definitions that identify some of these traditional practices as being harmful and with illegitimate emissions when, in fact, these emissions are sustainable and there is a need to look at the medium and long-term forest dynamics. These are extensive land use systems where forests are able to regenerate and re-grow, so that the carbon is put back in these agri-forestry systems so that they are carbon neutral and even carbon positive. Again, there are scientific papers to show this. So there is a lot of prejudice out there. When we opened this discussion you asked about the general challenges facing the forest peoples. One is deep-seated prejudice against their shifting cultivation practices, particularly in Asia and Africa but, also, in some parts of South America. In Guyana, for example, the President himself, who advocates deforestation, is proposing that Amerindians be made less dependent on their traditional crops and less dependent on the forest. This is based on a deep prejudice that these practices are harmful when all the science is showing that, in fact, these traditional processes are indeed sustainable and they are protected under certain other environmental treaties. Under the Convention on Biological Biodiversity, Article 10(C) affords protection to these traditional practices where they are sustainable. So there is a real risk in the climate negotiations that we could see definitions and other methods adopted that are at odds with protections already established in international law.

Ms Watson: One point to follow up on what Tom was saying, one of the best scientific studies was carried out by a Brazilian and a US scientist using satellite data from Brazil's INPE, the organisation for space research. One of the conclusions they came to is that the inhibitory effect of indigenous territories against deforestation was still strong after centuries of contact with national society and had no correlation to population density. One of the arguments that governments have used in discriminating against an indigenous organisation is to say that as indigenous populations have grown they are actually responsible for deforestation within their land, but the scientific data shows that is not the case at all, which I think is an important point.

Q173 Joan Walley: While we were out in Cameroon we got an inkling, if you like, of some of the tensions that there could be. Do you feel that there are ways in which forest peoples could have opt-outs from some other agreements in respect of hunting or aspects of this? How do you think there might be some conflict resolution procedures to make sure that rights are not being lost?

Ms Watson: That is a very difficult issue, and it depends which country you are talking about. I have worked a lot in Brazil and the problem of conflict resolution has always been referred to the courts. This is a huge problem because whenever there is any conflict it goes to the court and I have known of cases that are over 30 years in the courts. So indigenous peoples cannot afford to wait for 30 years to see some resolution, and this is creating massive problems because, at the end of the day, it means that whoever has invaded indigenous territories, who is depleting the resources, continues to do that knowing that the case is going to drag on in the courts. There is also the issue of corruption and good governance, which I think is an issue for many countries. So when we are talking about, even theoretically, having the laws recognised, the courts do not necessarily uphold those laws. In fact, in Brazil we are waiting for a judgment next month which will be key to determining how the future demarcation of indigenous lands happen in Brazil because there have been many attempts to use the courts to divide up these large, indigenous territories which, as we are saying, are so important against deforestation. They are barriers against forest fires and deforestation. If these get divided it will be absolutely disastrous, particularly because Brazil has so much of the Amazon Rainforest.

Mr Griffiths: You asked the question about how can these issues and possible tensions be dealt with. One of our main recommendations is that a forest and climate agreement and any national level schemes should adopt rights-based methodologies. You need a combination of rights-based and natural science methodologies. Crucially, these methodologies recognise that the social and rights issues need to be addressed and respected and that the forest has multiple values and uses that need to be recognised and respected. Any methodology or agreement that reduces forests solely to carbon and emissions functions, or metrics, is flawed. We have had 30 years, again, of evidence and long-term advocacy by social justice movements to explain to government forest policymakers and international agencies that forests are about much more than timber. Now we are at risk of reducing forests to carbon, when forests are much more than that; they hold livelihood and subsistence values, they hold spiritual values for

indigenous peoples. These values and these uses—and crucially these rights that are linked to them—must be recognised and respected.

Q174 Joan Walley: How would you go about putting a value on that?

Mr Griffiths: When I talk about value I am not talking about monetary value. It is crucial that these methodologies recognise these non-monetary values of forests as well as monetary values, where they are appropriate. What we do not want to do is reduce the forest to purely monetary values. That is unhelpful and will risk marginalising crucial substantive rights, like the rights to livelihood and rights to food and so on. If there is a rights-based approach that looks at these rights to livelihood, rights to food and security and rights to culture and integrity, which may include hunting rights and so on, then these issues can be addressed in a meaningful way. However, any scheme that simply wants to put a price on this and pay compensation for them to forego these practices really runs the risk (1) of being contrary to, as I mentioned earlier, international norms that uphold these rights and (2) they could risk impoverishing these communities, because it is well proven (you may have seen in Cameroon) that payments are often late, there are intermediaries and you could really risk causing serious adverse impacts by offering compensation for people to surrender these rights when, often, there is no science to prove in the first place that they are unsustainable and unhelpful. So the crucial point here is that these issues need to be addressed through careful rights-based methodologies that uphold these legitimate rights.

Ms Ozinga: Coming back to the case of Cameroon, there are conflicts, no doubt, and there have been conflicts for as long as we know in who owns what and who can do what with the forest. In the case of Cameroon, which is a FLEGT country negotiating the VPA with the EU, what we have learned is that when you get a national process in place which gets all stakeholders round a table—if it is a true, generally, multi-stakeholder process and if it is given sufficient time to put all the conflicts on the table and try to work towards a solution—that is a way forward. So if we get an international forest climate agreement under the UNFCCC or elsewhere which is not based on carbon trading and which recognises rights, and which will then have to be further negotiated at the national level, that would provide a platform to get at least all the stakeholders round the table and then define: "What does it mean, a rights-based approach? Who owns these rights?" We have seen the same with this definition of legality. What is legal is not very clear in any of these countries. It has taken three years in Ghana to define what is legal. Cameroon is still negotiating what is legal, specifically concerning indigenous peoples' rights. The REDD process would have to tag on to that and follow up from that.

Q175 Jo Swinson: Eliasch said that community forestry could play an important role, both in reducing deforestation but, also, in ensuring that communities were able to continue benefiting from the land. Do you agree with this and do you have any examples where there have been successful schemes in promoting this?

Ms Ozinga: There have been successful schemes in Mexico, but I would not agree with the statement as such because there are many failed examples of community forestry. When you talk about community forestry you put communities in a position where they have to compete with big businesses, and it is very often that in that case they lose out. Specifically, you must have seen in the case of Cameroon, that communities do not actually make much money out of their community forestry projects, for many different reasons. One of the reasons is that a lot of money goes to the middleman or the company who is dealing with it on behalf of the community, and that is the case in many countries. I think it is too simplistic a statement, but there are successful cases—but then they are successful for very particular reasons.

Q176 Jo Swinson: What are the hallmarks of successful ones, then?

Ms Ozinga: The hallmarks of successful ones, I think, are that you are in a country which is a big trading country. If you compare, for instance, Mexico with Cameroon, when Cameroon had this new forestry legislation it wanted to make itself into almost the largest timber exporting country in Africa, which is a very different situation in Mexico, which does not focus as much on the outside market as Cameroon does, but the whole competition element is very different. The rights situation is very clearly defined in Mexico, compared to Cameroon. In Mexico you have the ejido system of communities which are also legally very clearly defined compared to the situation of communities in Cameroon, which is much more opaque about how it works. So those are three elements, but the paper which Tom referred to has actually a lot more details on it as well, which we have with us, so I can give it to you if you are interested.

Mr Griffiths: Just to follow up on what Saskia is saying, some of the hallmarks of sustainable community forest management are that the community itself is in control and has some jurisdiction over the management of forest, and if there is any enterprise involved they control the enterprise. It is where, as Saskia says, there are middlemen or intermediaries involved that they often become compromised and in an exploited position. Where they are able to control the enterprise and have control over the management of the forest then there is evidence that it is sustainable and really can deliver benefits and empower communities. Crucially, as Saskia says, there are strong community institutions and very often this means that, in the case of income generation, community enterprise, capacity building, and so on, is a crucial component of success, and the communities need that support for capacity building. However, the traditional forest management systems, I reiterate again to the Committee, are proven to be sustainable. This is

because one of the underpinning factors is they have extensive land-use systems; what are called "horizontal economies", spread over a large area. This is low-intensity use. They also have their own traditional belief systems and customary norms for the protection and use of the forest, based on concepts of replacement, regeneration and sensible, careful use. So the traditional regimes are very often sustainable, and that is proven, as we have mentioned. Where you get a commercial element involved with income, as I say, you often need to be sure that there is capacity put in place to deal with the money, economy and financing, and that they have proper support to establish their own control over that business.

Q177 Jo Swinson: As you have highlighted there, some of the issues that we saw in Cameroon were just those, that the local people and communities were not benefiting from the forest, perhaps, due to difficulties such as access to markets. However, you have also outlined in your evidence some of the problems with communities not benefiting from the potential carbon trading and carbon mechanism schemes. What is the best way of making sure that local communities can benefit from the resource of the forest and, indeed, avoid deforestation?

Mr Griffiths: One of the main preconditions, as we have said throughout this evidence this morning, is securing of land and resource rights. The Convention on Biological Biodiversity's ad hoc working group on climate change and biodiversity met here in London in November 2008 and that group of experts agreed that there will not be benefits for indigenous peoples and other forest peoples unless they have ownership rights over their land and resources. It is quite clear that property rights are fundamental here in access to benefits. Secondly, another core precondition is that they have the right to negotiate their own agreements separately, based on the principle of free, prior and informed consent. If other intermediaries, as Saskia said, are involved there is a real risk that they will be marginalised or only receive token benefits. They themselves, through their own representative bodies, have to have the right to negotiate benefits and to have access to incentives under these schemes. If that is not forthcoming, the history of marginalisation—there is a real risk that that could continue.

Ms Watson: As Tom was saying, the question of working through communities' own organisations is essential because there have been cases in the Amazon where individuals have negotiated agreements which have been disastrous. In fact, too much money has gone into the hands of several individuals which has destabilised communities. You also have to think, if you are dealing with isolated communities, it is not just getting the money from trade in sustainable logging or whatever, it is what comes with that, which is the whole infrastructure, because it necessarily means interacting with people from outside, possibly building roads—and with that you get a whole set of social and health problems, and those all have to be taken into the equation when it comes to matters to do with remuneration and other safeguards.

Q178 Mark Lazarowicz: On that point, is it conceivable that if that type of substantial increases in funds occurred, and if fundamental and market mechanisms were actually to come about, that actually communities would be able to have the capacity to do anything with that kind of money, as they do in Eliasch and others—very large sums of money? If that really was to be applied through community forestry schemes to communities, it would require a great deal of capacity, first of all, to spend it and, then, as you point out, there will be issues about what would the money be spent on. Would it be spent on things like roads, which would then have other consequences for both local communities and, also, for carbon emissions as well? What is your view on the capacity to deal with that kind of step-change in funds, if that was to come about?

Mr Griffiths: This comes back to the initial point about the need for a phased approach in the implementation of these agreements. Issues of governance and issues of secure tenure must be addressed and if there are needs for capacity building and institutional strengthening then that has to be part of the package, otherwise, as we have mentioned, pouring money into this could actually exacerbate problems and could cause unforeseen consequences. This step-wise approach is essential. Also, the point to make is that it is not just about money, REDD. If the focus is only on income, as we said, this may well cause problems; you need to look at these non-monetary elements, like governance, like community institutions and indeed state institutions, and you need to look at these drivers of deforestation and the whole policy framework—the cross-sectoral framework within a country that is putting pressure on forests and on peoples' lands; just looking at money and the management of money is not going to solve this. It is true there is a question about absorption, and that will need, in some cases, capacity building, but in other cases indigenous peoples are quite well adapted at management; it depends on the particular cases. Also, of course, there are options for non-monetary benefits, like support for land titling schemes and others, in a phased approach rather than simply flooding these communities with money at the outset. There needs to be a phased and step-wise approach.

Q179 Mark Lazarowicz: We are talking about a phased approach again. What is the type of timescale we are talking about for a phrased approach? I know you cannot be, in any sense, specific but, on the one hand, there is pressure to meet 2020 and 2050 targets when it comes to carbon emissions, but a phased approach here is suggesting a pretty gradual build-up to the process. What kind of timescale are you talking about?

Ms Ozinga: I think, again, coming back, the first point is if we want to keep the forest standing we need to address the 80% first. If we do not address the 80% we will get a two-degree temperature increase and the forest will be gone. So the 80% is where we need the quick action, and where we do not see the quick action because carbon trading is not delivering any quick action. I think that is the first point to make. The timescale we think about, it takes about three to five years to come to an agreement at national level, which includes local communities, indigenous peoples, NGOs and any other stakeholders in the forest, to come to a national level plan about how that forest can be protected. Once that is agreed, once that is in place, you can start implementing that plan and, depending on the country and depending on whatever else, that might be another five years, or something like that. So it is not massive timescales, but the problem is that the timescales which we have seen work with the EU FLEGT programme are now undermined by the whole REDD programme, which requires much quicker timescales, which we think are actually really going to undermine the whole forest problem. In the climate debate the issue is permanence: how can you guarantee that the forests stay standing in a permanent way? We believe the only way that that can happen is if you have clarity of ownership over the land and over the forest. That is a precondition. In countries where that is not the case, either because the government is not willing to discuss that or for whatever reasons, you will not keep the forests standing, we do not believe you can actually keep the forest standing. So the permanence has to be linked to the rights issue, and the rights issue has to be solved, including with good governance. So the permanence is directly linked to that. If you are talking in the REDD debate about monitoring, when they talk about monitoring they talk about monitoring carbon flows, which are incredibly difficult to account for. They do not talk about monitoring implementation of rights agreements, international law and improvements in governance, which are part of the EU FLEGT agreement as well, so that is another element which has to be fed into that REDD discussion to move that in the right direction.

Q180 Mark Lazarowicz: Can I ask you a bit more about your evidence on the problems of carbon trading which you referred to earlier? Obviously, your scepticism reminds me of carbon trading in relation to forestry; that is pretty clear, but are there any steps which could be taken in terms of developing a carbon trading mechanism which might at least reduce the kind of negative consequences which you fear? If there was going to be one how could we make it better, or maybe you think it cannot be made better: the system is inherently flawed? I understand that is your position but what could be done?

Ms Ozinga: The first thing that could be done is to take the offset out of the equation. If carbon trading was just a cap and trade system without any possibility to offset it would be massively more effective in terms of emission reductions than it is now, but the offset is basically placing a massive hole in the whole carbon trading system. It undermines the whole emissions trading. If you were to auction all permits rather than only part of them that would be another improvement. An even bigger improvement, as has been said by economists, the *Financial Times* and people who think purely economically, would be a carbon tax.

Q181 Mark Lazarowicz: And in relation to emissions application to forestry, could there be anything done to reduce the negative consequences there?

Ms Ozinga: Because we believe carbon trading does not address the climate crisis; it will have a negative effect on the forest, full stop. That is the first problem. If we were theoretically to ignore that fact for the moment and just look at carbon trading financing forestry offset projects, and then you come to your gold standard question, you still have the problem that the contracts are confidential, they are not written in the language of the communities, they are not between the community and the seller; but they are with an intermediary who takes 40% of the profit, so you are creating again this whole middle-man situation, which you have seen in Cameroon is not really beneficial for the community. There is a whole raft of things which go wrong there which would need to be addressed first if you wanted to look at that as a mechanism to work and we have not seen that working anywhere yet. Theoretically it could but there is no real evidence to base that on.

Joan Walley: That brings us to the end of our session. Can I thank all three of you very much for coming to help us.

Tuesday 3 March 2009

Members present

Mr Martin Caton

Colin Challen
Mr David Chaytor
Martin Horwood
Dr Desmond Turner
Joan Walley

Memorandum submitted by the Department for Environment, Food and Rural Affairs (Defra), The Department for International Development (DfID) and The Department for Energy and Climate Change (DECC)

This memorandum sets out the steps the Government has taken to address forest governance and developing international incentives for reducing emissions from the forest sector.

Defra is the central Government department with lead policy responsibility for sustainable development. DFID is the UK government department responsible for promoting sustainable development and reducing poverty overseas. DECC leads on responses to Climate Change.This joint Memorandum addresses:

A. The role financial mechanisms might have in helping to address emissions from land use change.
B. The environmental and social risks and benefits of using such financial mechanisms.
C. The use of land use change credits in carbon markets and in meeting emission targets.
D. The World Bank's Forest Carbon Partnership Fund.
E. The role of technologies such as remote sensing in the verification of land use change credits.
F. The success or otherwise of Government efforts in reducing emissions from international land use change.
G. The Congo Basin Forest Fund.
H. The interaction of carbon finance mechanisms with the timber trade.
I. Government progress on tackling illegal timber since the EAC 2006 Report on sustainable timber.
J. Government sustainable procurement of forest products.
K. The success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan, and Government support for it.

The Committee should note that this Memorandum does not include the findings of the Eliasch Review, published in October. This is an independent review commissioned by the Prime Minister to examine the financial mechanisms that can reduce deforestation in developing countries.

A. The Role Financial Mechanisms might have in Helping to Address Emissions from Land Use Change

1. Incentivising sustainable land use is a priority for the Government. The IPCC estimates that deforestation and land degradation account for approximately 18% of annual global carbon dioxide emissions. The Government was therefore pleased with the agreement at the UNFCCC in Bali in December 2007 which agreed to incentivise Reduced Emissions from Deforestation and Degradation (REDD) in developing countries in a post-2012 climate agreement. The agreement contained the following key elements:

— recognition of the needs of local and indigenous communities, and the relevant provisions of other international negotiating fora on forests (eg Convention on Biological Diversity);
— inclusion of degradation (carbon stock reduction below the change in land use leading to deforestation) as well as deforestation itself;
— encouragement of demonstration activities and indicative guidance for these activities;
— specific linkage of deforestation, degradation, and the sustainable management of forests, to broader climate negotiations under the Bali Action Plan; and
— recognition that demonstration activities should be taken into account in future negotiations under the Bali Action Plan. This allows the possibility that emissions reductions achieved before 2012 could be taken into account subsequently.

2. The agreement set out a process under the Bali Action Plan establishing how to achieve a mechanism to reduce emissions before climate talks in Copenhagen in 2009. Action will also provide significant benefits for communities who depend on forests, and for biodiversity.

3. Deforestation is caused by many factors, but a key factor is that other land uses eg agriculture, grazing, infrastructure development, extraction of minerals are more profitable than keeping forests standing. Payments for the environmental services that forests provide would help to increase the value of standing forests. This is similar to the premise behind the new EU Common Agricultural Policy which incorporates elements where farmers are compensated for provision of environmental services as opposed to production.[1]

4. Reducing deforestation will be expensive; available estimates suggest it will cost in the range £10 billion to £20 billion a year to halve deforestation by 2030. However, the evidence also suggests that the benefits of reducing deforestation will be many times greater than the costs. The annual loss of ecosystem services from deforestation is estimated by the Economics of Ecosystems and Biodiversity Study[2] to be between £1.1–£2.5 trillion.

5. There are different proposals for funding being discussed to incentivise reduced emissions from deforestation and forest degradation, and additional action to preserve and enhance standing forests. These include fund and market–based solutions. The Government considers funding for positive incentives to reduce deforestation of the magnitude needed are in the long-term most likely to come from the carbon market. In the interim, market mechanisms should be considered (subject to certain conditions) together with other sources of finance. We are in discussion with other countries and international financial institutions to maximise funding available. This needs to be considered in conjunction with demands for financing for low carbon technology and adaptation.

B. The Environmental and Social Risks and Benefits of using such Financial Mechanisms

6. Financial incentives will not address greenhouse gas mitigation in the forest sector if forest governance is weak. In many countries illegal activity—both through logging and land conversion—has been one of the most significant drivers of deforestation and forest degradation. In order for such financial mechanisms to work effectively and deliver environmental and social benefits it will be vital to address issues of forest governance and build on existing national and internal initiatives in this area.

7. More than a billion people depend on forests to provide them with a livelihood. The Bali Action Plan recognised "that the needs of local and indigenous communities should be addressed when action is taken to reduce emissions from deforestation and forest degradation in developing countries". In order to access a financial mechanism for forestry it will be important that land ownership rights are well defined and that indigenous and local user rights respected in terms of ownership of the carbon asset and distribution of the carbon revenue. In addition it will be necessary to establish clarity of coverage and application of national forest laws (based on national consensus of forest policy aims) and build capacity for their enforcement. In support of such aims DFID helped establish and fund the Rights and Resources Initiative to accelerate policy, tenure and market reforms. For details see: http://www.rightsandresources.org/

8. To ensure that the maximum environmental benefits of paying for the carbon mitigation services of forests are achieved the Bali Action Plan also recognised the relevant provisions of other international agreements such as the Convention on Biological Diversity (CBD) and the United Nations Forum on Forests (UNFF). The CBD agreed this year to convene an Ad Hoc Technical Expert Group (AHTEG) on biodiversity and climate change to provide biodiversity-relevant information to the United Nations Framework Convention on Climate Change. The first session will be hosted by the UK from 17–21 November this year and will provide scientific and technical advice on ensuring that possible actions for reducing emissions from deforestation and forest degradation support the conservation and sustainable use of biodiversity.

C. The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

9. We must include forests in a future climate change agreement if we are to reach the European goal of limiting temperature increase to 2°C and will be seeking the deepest deal we can achieve in Copenhagen. It is difficult to see how sustainable funding at the scale required for effectively tackling deforestation and promoting Sustainable Forest Management can be provided through public funding alone. Ultimately, we need to build a mechanism which is self-sustaining, and the market seems to offer the best opportunity for this in the long-term.

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[1] See http://ec.europa.eu/agriculture/rur/index_en.htm. "Agri-environment measures are designed to encourage farmers to protect and enhance the environment on their farmland. It provides for *payments to farmers in return for a service*—that of carrying out agri-environmental commitments that involve more than the application of usual good farming practice. Farmers sign a contract with the administration and are paid for the additional cost of implementing such commitments and for any losses of income (eg due to reduced production) which the commitments entail. Agrienvironment payments are co-financed by the EU and the Member States with a contribution from the Community budget of 85% in Objective 1 areas and 60% in others…"

[2] See: http://ec.europa.eu/environment/nature/biodiversity/economics/index_en.htm Sukhdev et al; 2008

10. We welcome the provision contained in the draft EU Emissions Trading Scheme Directive for new crediting mechanisms under an international agreement. This would give the flexibility to include credits from avoided deforestation and other land use activities in future phases of the EU ETS and will encourage other emissions trading schemes to also include such credits. We look forward to the forthcoming Communication from the European Commission on Deforestation and its Impact on Climate Change and Biodiversity Loss.

D. The World Bank's Forest Carbon Partnership Fund

11. In order to prepare the ground for the establishment of a forestry credit mechanism it will be necessary to carry out further research to estimate emissions as well as undertake capacity building and pilot demonstration activities.

12. To maximise aid effectiveness it is imperative to ensure a coherent approach to the provision of funds and the Government is working to promote co-ordination between multi-lateral funding initiatives. The UN agencies are developing a joint paper with the World Bank which will set out how the UN-REDD programme will contribute to the World Bank Forest Carbon Partnership Facility (FCPF) (both designed to support capacity building and technical assistance) and the developing Forest Investment Programme (FIP) (being designed to address investment needs). In addition the FCPF Carbon Fund will test how to make payments for REDD credits.

13. The Government is providing £15 million to the World Bank FCPF which aims to provide US$300 million split between a Readiness Fund (support to prepare 20–30 countries for participation in REDD pilot schemes) and a Carbon Fund (piloting payments three to five countries for reducing deforestation below an agreed level).

14. At the first Steering Committee meeting in Paris on 9–10 July, the following 14 countries were selected for support in the preparation of REDD Action Plans: Bolivia, Costa Rica, Democratic Republic of Congo, Gabon, Ghana, Guyana, Kenya, Lao, Liberia, Madagascar, Mexico, Nepal, Panama, Vietnam.

15. The Government is also working with the World Bank on the development of a Forest Investment Programme (FIP) under the Strategic Climate Fund (SCF) by the end of 2008. The FIP has an indicative budget of US$1 billion. It will assist the change towards low carbon emissions by investing in institutional capacity, forest governance, sustainable forest management and, where appropriate, actions outside the forest sector such as alternative rural livelihoods.

16. The UN Environment Programme, UN Development Programme and the Food and Agriculture Organisation have developed a multi-donor trust fund to provide technical assistance to developing countries on REDD. The aim is to bring together the relative experience, skills and country presence of the UN agencies through a "one UN" approach.

E. The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

17. The IPCC provides methods for estimating emissions and removals and changes in carbon stocks relative to a baseline. This will benchmark performance in carbon savings. The methods cover deforestation, degradation and forest enhancement. Emissions from deforestation are likely to be easier to estimate, because changes in land use are easier to detect. Work is underway internationally on the application of the IPCC methods and the technology and availability of data will improve over time.

18. It is recognised that satellite imagery alone will not be sufficient to provide robust estimates of land use change, and a two tier approach where remote sensing techniques are used in conjunction with ground-based methods is preferable, in order to verify the interpretation of the satellite imagery. In order to reduce uncertainty and costs, it has been suggested that ground based monitoring be based on sampling using a risk based approach.

19. Examples of national operational forest cover monitoring systems using satellite imagery include the Brazilian PRODES annual surveys by INPE and the Indian biennial surveys by FSI. The Brazil surveys are supplemented by the DETER system which monitors forest cover and identifies anomalies in primary forest cover using coarse resolution satellite data, and the DETEX system which identifies anomalies in primary forest cover that can be associated with selective logging using medium resolution satellite data. The FAO 2010 remote sensing survey will provide a global assessment and the Global Observation of Forests and Land-cover Dynamics (GOFC-GOLD) initiative of the Global Terrestrial Observing System is developing a source-book relevant to the application of IPCC methods.

20. The UK Government is in the process of letting a contract to develop and apply methodologies for reduced emissions from deforestation and forest degradation (REDD). The research will take the form of a review, including recommendations, of available literature and information sources covering three key areas—forest data and methodologies for deriving emissions estimates; exploring the causal link between forest use and drivers; and the development of reference levels. Through our support to the Congo Basin,

the UK is supporting the expansion of community forest mapping (from Cameroon and the Democratic Republic of Congo (DRC) to Congo-Brazzaville, the Central African Republic (CAR) and Gabon), and facilitating the installation of a satellite data receiving ground station.

F. The Success or Otherwise of Government Efforts in Reducing Emissions from International Land Use Change

21. Although there have been changes in deforestation rates and increases in areas of certified sustainable production, deforestation and degradation rates are still too high. The first commitment period of the Kyoto Protocol (ending in 2012) does not contain measures to reward forest conservation or improved forest management in the tropics because of historical difficulties related to measuring emissions accurately. Whilst afforestation and reforestation were allowed for under the Clean Development Mechanism (CDM) deforestation was excluded as the project-based approach risked displacement of deforestation elsewhere, with little or no net gain.

22. There has been much work by the IPCC to develop improved estimation methodologies. The UK has made an important contribution to this. In the negotiations, the proposals to use national baselines have opened the way to including reduced emissions from deforestation and associated activities in a future climate agreement and this is provided for in the Bali Action Plan. The Government will continue to work to resolve outstanding methodological issues and work bilaterally and with international organisations to develop pilot projects, building on the rules agreed in Bali and the progress made on funding since then. This will contribute to the achievement of a decision text in time for Copenhagen that will integrate forestry into the final Climate Change deal and so treat emissions from forestry in line with emissions from other sectors. Improved methodologies can also allow for simplifying procedures and reducing transaction costs for afforestation and forestation projects under the CDM.

23. The Forestry Commission was a founder member of the Global Partnership on Forest Landscape Restoration and through this initiative has shared its skills and experience of restoration with other countries.

24. The Government is also looking at how to maximise the contribution from the land use, land use change and forestry (LULUCF) sector in developed countries by reviewing the current rules. Following introduction of the Good Practice Guidance by the IPCC we have seen very significant improvements in estimating and reporting emissions and removals from LULUCF by developed countries. The climate negotiations are currently considering the future treatment of LULUCF in meeting commitments of developed countries UK is seeking a more comprehensive treatment than was possible for the first commitment period under the Kyoto Protocol.

25. The Government is in the process of letting a contract to increase understanding of what, in practical terms, the options identified to date in the UNFCCC discussions mean with regard to the trends in emissions and removals from countries, the additional mitigation potential that they introduce and any additional risks to compliance introduced by statistical fluctuations, eg due to forest fires or insect attack.

26. In addition, the Government is working to ensure that efforts to reduce greenhouse gas emissions are not unduly affected by unintended emissions due to land use change. The UK's Gallagher Review concluded that UK biofuels policy should take better account of the effects of growing crops for biofuels on land use change and food prices. In view of these findings, the Government has urged caution in the move to biofuels development, and is pressing for sustainability criteria for biofuels and biomass to take indirect land use change into account. The Government is working to achieve this in negotiations within the EU.

G. The Congo Basin Forest Fund

27. In March 2007 the Government pledged £50 million for sustainable management of the Congo Basin ecosystem through a "Special Fund" called the Congo Basin Forest Fund (CBFF). This is financed from the £800 million International Window in the UK's Environmental Transformation Fund (ETF-IW), which seeks to achieve poverty reduction through tackling environmental problems and to effect real change and progress on climate change adaptation and mitigation in developing countries.

28. The aim of the CBFF is to deliver poverty reduction by developing the capacity of the people and institutions in Congo Basin forest countries to sustainably manage their forest; helping local communities to find livelihoods that are consistent with forest conservation; and providing innovative and transformative approaches to sustainable forest management. The Fund was officially launched by the UK Prime Minister, in London, in June 2008. Its current total value has increased to £100 million, through the Norwegian Government matching the UK's £50 million funding.

29. The Fund has invited proposals for transformative and innovative initiatives that will slow the rate of deforestation, through developing the capacity of the people and institutions in the countries of the Congo basin to manage their forest. This includes helping local communities find livelihoods that are consistent with forest conservation and developing innovative and transformative approaches to sustainable forest management. Proposals are being sought from regional governments, civil society and private sector.

30. The Fund will support activities which complement particular aspects of the COMIFAC (The Central Africa Forests Commission) Convergence Plan, with particular focus on three strategic areas. It will work closely with Central African governments and other stakeholders, whilst strengthening the work of the aid donors who are already active in the region, and will open a channel for new donors to add their support.

31. In establishing the Fund, it was considered important for it to be housed in an African regional institution with legitimacy amongst Congo Basin countries. The Africa Development Bank (AfDB) has agreed to host the initiative as a "Special Fund" as well as a CBFF Secretariat, to deal with the day-to-day management and disbursement of the fund. The Fund will be separate from AfDB business, but will complement their existing work in all sectors of the 10 countries of the Central Africa Forest Commission (COMIFAC). It will also complement the AfDB's future plans on natural resources management in Central Africa. Currently UK based DFID staff are acting as the interim Secretariat for the Fund, until all Fund administration mechanisms and staffing are fully established at the Bank (expected early 2009).

32. A Governing Council (GC) has been established to provide strategic guidance and oversight of the fund, and to ensure broader long-term donor and stakeholder participation. The GC is led by two Co-Chairs: Professor Wangari Maathai and the Rt. Hon. Paul Martin (Former Prime Minister of Canada). Other members of the Council include representation from civil society, COMIFAC, AfDB, CEEAC, and CBFF donors.

H. The Interaction of Carbon Finance Mechanisms with the Timber Trade

33. It will be important that any agreement on a forestry mechanism takes into account the potential for leakage as international markets for timber and agricultural commodities are likely to increase pressure where forest protection is less strict. However protecting forests is not about preventing use of forests but incentivising sustainable management. Examples of how financial incentives can be used include:

a) Capacity building to enhance management of forest resources, improve forest governance and address illegal logging in production forests.

b) To introduce transparent timber allocation, certification and chain of custody processes.

c) To provide financial and other incentives that will help to accelerate an ongoing trend towards community forest ownership and management, and reduced reliance on government-financed forest administrations.

d) Through company/community partnerships, accelerated private sector investment in afforestation and reforestation and in establishing industrial plantations and small holder-owned farm forests and agro-forestry farming systems, which can help take the pressure off natural forests.

I. Government Progress on Tackling Illegal Timber Since the EAC 2006 Report on Sustainable Timber

34. The Government has continued its efforts to tackle illegal logging and associated trade in illegal timber, under its Forest Governance & Trade programme. Actions taken by the Government can be divided into: (i) supply side actions—those taken to assist timber-producing countries where illegal logging is a problem, to improve forest governance and law enforcement; and (ii) demand side actions—those taken in countries that import timber to eliminate illegally-produced products from their markets.

35. Supply side measures have focussed on support for negotiation of FLEGT Voluntary Partnership Agreements (VPAs) under the EU Action Plan. See section K of this submission. At present one country, Ghana, has signed a VPA and four other countries in Africa and Asia are negotiating VPAs. Several other countries are expected to commence negotiations in the next few months. The EU is confident that these negotiations will deliver a comprehensive agreement. Demand side measures have focussed on: implementation of the Government's public procurement policy (see section J) and support for actions by the private sector. See DFID's website, booklets and films DFID has commissioned to explain this work:

http://www.dfid.gov.uk/mdg/forest-govern-trade2.asp

http://www.dfid.gov.uk/pubs/files/illegal-logging-report.pdf

http://www.handcraftedfilms.net/films.html

36. The UK has been persistent in encouraging the Commission to consider additional legislation to support EU FLEGT, recognising that bilateral trade measures can be circumvented, and that further EU-wide legislation is required to help to combat trade in illegal timber. UK-led analysis and discussions with stakeholders has helped to inform the debate, and we continue to share our thinking with the EC and other Member States. The UK submitted the following response to the EC consultation on options:

http://www.illegal-logging.info/uploads/UK_govt_consult_add_options.pdf

and has been urging the Commission to come forward with proposals.

37. DFID has commissioned work from Chatham House to track progress in tackling illegal logging at a global level. An interim report was published in November 2007, see: http://www.illegal-logging.info/uploads/Measuring_the_response.pdf

38. The Committee is referred to the following documentation about China, Europe and North Asia Forest Law Enforcement and Governance (ENA FLEG) Conference, G8 and circumvention raised in its 2006 Report:

— China: At the EU-China Summit in Beijing in November 2007 leaders confirmed the establishment of an EU-China Bilateral Coordination Mechanism on illegal logging. Chinese officials are currently on a training attachment in UK and discussing how China and the EU might develop a joint legality verification scheme.

  See, Proceedings of the EU-China Conference on Forest Law Enforcement Governance and Trade, Beijing, September 2007

  http://www.illegal-logging.info/item_single.php?item=event&item_id=117&approach_id

— ENA FLEG see: http://www.iisd.ca/ymb/enafleg/ymbvol110num5e.html

  See also the following for a presentation on the measures Russia has taken to tackle illegal logging and associated trade:

  http://www.illegal-logging.info/
  item_single.php?item=presentation&item_id=287&approach_id

— G8: The UK worked with Russian and Japanese Presidencies to maintain political momentum in support of efforts to tackle illegal logging, and recognises the intrinsic relationship with wider discussions on deforestation and climate change.

  See a presentation on the measures Russia has taken to tackle illegal logging and associated trade:

  http://www.illegal-logging.info/
  item_single.php?item=presentation&item_id=287&approach_id

  See also the report from the 2008 G8: http://www.g8summit.go.jp/doc/pdf/0708_08_en.pdf

— Circumvention and illegal imports: to note that Ghana intends to apply timber legality licensing to all its exports. Other countries the EU is negotiating with are also considering this option. The UK has taken a number of steps to work with other global consumers to strengthen markets for legal and sustainable timber. Defra and DFID provided significant support to the Japanese Presidency of the G8 to ensure that the G8 continued its focus on illegal logging. The UK has worked closely with China and more recently with Vietnam, both of which are rapidly expanding centres for the import, processing and re-export of timber products. The UK has also promoted responsible business practices by the timber industry in many countries.

39. Timber procurement: the Government announced that its timber procurement policy would be strengthened in 2009 by purchasing only sustainable timber products or timber products produced in accordance with FLEGT licences. This policy change will help to encourage better forest management and engagement with the FLEGT process. More information on implementation of the current policy can be found under section J.

40. In anticipation of a successful outcome for the wider aims of FLEGT and a more widespread adoption of good forest management, the Government has set a target of 2015 for restricting its purchases of all forest products to those from sustainably managed forests. The policy is just coming into effect and will be reviewed in 2011 to monitor effectiveness and progress.

41. The Government and the Central Point of Expertise on Timber (CPET) are actively engaged in preparations for implementation of the new policy: new guidance was issued in August; a programme of training will be delivered to central departments before April 2009; and Ministers and senior officials continue to exploit opportunities to raise awareness of the forthcoming change in requirements (Defra Secretary of State wrote to Cabinet colleagues in September to highlight the new policy requirements).

J. Government Sustainable Procurement of Forest Products

42. The EAC 2006 enquiry highlighted the need for better information with which to measure performance. Therefore Defra has worked closely with the Sustainable Development Commission to include timber within the reporting framework for the Sustainable Development in Government Report. The 2009 report will include information on a number of specific questions related to timber procurement. However, as timber is purchased in so many forms and for so many purposes, it was considered that more detailed information was needed. This raised concerns about the costs of data collection and reporting so work has been undertaken to establish the most cost-effective way of gathering this information. The Government undertook a study into the supply of timber for Government construction projects (construction is one of the biggest users of timber) working closely with both procurement officials and construction sector companies. Based on the recommendations from the project, Defra has started to pilot new monitoring and reporting systems to track timber purchases within the department. The aim is to share successful approaches with Whitehall Partners in order to develop a new system for recording and reporting volumes of timber purchased throughout central government over the next year.

43. The Government has given further consideration to the inclusion of social criteria in the timber procurement policy, such as the requirement that forest management respects the rights of forest dependent people (something which is already routinely required by forest certification schemes) The Government has been in regular discussion with the Office of Government Commerce, the European Commission, and other Member States with a view to considering the benefits and constraints to including such criteria. We will continue these discussions with others in Europe, seeking to confirm that such criteria can be included in the procurement policy. It is our intention to resolve this question in 2009.

44. CPET has continued to inform and raise awareness of best practice for timber procurement, review and monitor forest certification schemes and investigate supply chain and customer activities. Notable actions connected with CPET's work since the EAC 2006 Report include changes made by two major certification schemes (including PEFC) to raise their standards and market credibility, the publication of robust assessment guidance for non certification (Category B) evidence, pilot schemes and training for local authority champions and greater engagement with other European Member States in the quest for harmonisation. In addition, CPET resources such as the website are being widely used by countries outside the EU such as the US, Japan, Australia and Malaysia.

45. The Government is determined to continue improving its performance on purchasing sustainably produced forest products, moving to fully sustainable sources and encouraging others to do the same. The information we have indicates that implementation remains patchy. Some departments and agencies are ahead of others but it is clear that there has been a significant move over the last 12-18 months and growing commitment to ensure full implementation. The achievements made will be used to inform and develop sustainable procurement practice more generally, including the recently established Centre of Excellence for Sustainable Procurement (CESP).

K. The Success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, and Government Support for it

46. In tackling illegal logging and its associated trade, it must be recognised that poor forest governance underlying cause is rooted in systems of political patronage, corruption, inconsistent legal frameworks, weak law enforcement and poverty. These problems must be resolved by the governments and citizens of the countries in which these forests are found, as part of wider governance reforms and by specific actions related to forests.

47. Development co-operation: This aims to promote equitable and just solutions to the illegal logging problem by helping timber-producing countries build systems to verify that timber has been legally harvested; promoting transparency of information; building capacity of governments and civil society; and promoting policy reform.

48. The European Commission and member states have initiated development co-operation programmes that support FLEGT's aims in a number of countries. These include Indonesia, Malaysia, Cambodia, Vietnam, Ghana, Liberia, Cameroon, Republic of Congo, Democratic Republic of Congo, Gabon and several countries in Central America. Under its £24-million Forest Governance and Trade Programme, DFID is supporting FLEGT Partnership Agreements in Ghana, Liberia and Indonesia, as well as grants to NGOs and research organisations for a wide range of support activities. DFID's web site (www.dfid.gov.uk/mdg/forest-govern-trade2.asp) shows activities currently supported.

49. Trade in timber: The Action Plan's medium term aim was negotiation and implementation of bilateral voluntary partnership agreements (VPAs) between timber-producing partner countries and the EU, whereby the partner countries would issue licences attesting to the legality of their timber exports to the EU, and EU border control agencies would allow import only of licensed timber from partner countries. In addition the European Commission planned to review options for further measures, including the feasibility of legislation to control the imports of illegally produced timber into the EU. A longer term goal was dialogue with both wood-producing and wood-consuming countries to strengthen international collaboration to tackle illegal logging and, ultimately, to develop a multilateral framework on which actions could be based.

50. Before starting VPAs negotiations, it was necessary to pass enabling EU legislation. Under the UK's EU Presidency in 2005, two essential instruments were adopted: (i) the FLEGT Regulation, which empowers EU border control agencies to require FLEGT licences for importation of timber shipments from partner countries; and (ii) the negotiating directives—an internal document that gives the Commission a mandate to negotiate VPAs on behalf of Member States, and sets out the expected elements to be included in each VPA. In 2006, formal agreement to start negotiations was reached with Ghana and Malaysia, followed in 2007 by Cameroon and Indonesia. This year, the Republic of Congo formally requested to start negotiations and Gabon and Liberia have said they will submit requests this autumn.

51. Getting to this starting point was not a foregone conclusion for any country. Each had to be convinced that an agreement that would potentially restrict its trade would deliver net benefits. In all cases, negotiations have been complex and have required investment in confidence building as well as patience to deal with a range of sensitive issues. Negotiations with Ghana were concluded on 3 September 2008. Malaysia is also on track for conclusion before the end of the year and Cameroon should conclude in spring 2009. Even when

agreements are in place it will take time to ensure that the licensing systems are operating properly and we estimate at least a year will be needed between signing and the placing for sale on the EU market of licensed timber. Many other countries have approached the EU to discuss negotiation of agreements (Ecuador, Central African Republic, Madagascar, Mozambique, Vietnam), and the UK is encouraging other Member States to take a lead role in supporting the Commission's work on these.

52. Stakeholder consultations in partner countries have played an unforeseen role in initiating dialogue on a range of forest governance issues, some of which fall outside the terms of VPAs. These include increased demands for transparency and consideration of tenure rights of forest-dependent communities.

53. DFID has funded the processes in Ghana and Indonesia, with commitments of more than £5 million for each country.

54. With regard to additional legislative options to deal with illegal timber traded outside VPAs, the UK Government has pressed the Commission to publish its proposal but action was not taken until late 2006 when a public electronic consultation about a range of alternatives was launched. See the UK's contribution to this at: http://www.dfid.gov.uk/pubs/files/illegal-logging-consultation.pdf Analysis of these options indicated that none were satisfactory and the Commission is now considering a further option of mandatory due diligence for traders. Publication of this has been delayed until October 2008. Potential actions that individual Member States could take unilaterally are unlikely to be effective because of the lack of trade controls between countries within the EU.

55. Efforts to encourage other timber importing countries to introduce measures to tackle illegal logging have focused on the United States, Japan and China. The United States has introduced new trade legislation. Japan has introduced a timber procurement policy. The EU and China have agreed to work together to develop a mechanism to tackle illegal timber trade. The UK has helped establish Chatham House-like illegal logging stakeholder forums in China and the USA.

56. Public procurement: Since procurement is an area of member state competence, the Action Plan aimed to produce practical information to guide contracting authorities on how to draw up procurement procedures that specify legality.

57. When the Action Plan was announced, only two EU member states (UK and Denmark) had public timber procurement policies. Now there are six and efforts are being made to encourage more, as well as to agree on coherence between different national policies' requirements. The UK has made explicit recognition of FLEGT in its 2009 policy change, with the aim to incentivise Partner countries to conclude agreements, and to promote markets for FLEGT-licensed products.

58. In July 2008, the Commission published a new proposal to set targets for Green Procurement. This recognises the special requirements for timber products within guidance on construction, furniture and paper products. These state that legality should be a minimum acceptable standard and suggests FLEGT licences as a way to assure legality.

59. Private sector initiatives: The Action Plan aimed to encourage private sector initiatives for good practice in the forest sector, including the use of voluntary codes of conduct to source only legal timber. The private sector in several EU member states has been closely involved with implementation of the FLEGT Action Plan. Trade associations are regularly consulted on different aspects of the Plan, for exampleto ensure that provisions in new legislation are workable in practice.

60. Commission and member state support has been provided for private sector initiatives that aim to eliminate unknown and potentially illegal timber from supply chains. These include the EC-supported Tropical Timber Action Plan and WWF's Global Forest and Trade Network, which is supported by two grants totalling £482,600. DFID has also provided a £368,260 grant to the UK Timber Trade Federation (TTF) to undertake a range of activities to help its members eliminate illegal timber and to encourage sister associations in Europe and elsewhere to follow suit. TTF's Responsible Purchasing Policy and its announcement in July 2008, that it now requires environmental due diligence of all its members, has stemmed from this co-operation.

61. Financing and investment safeguards: The Action Plan aimed to encourage financial institutions which invest in the forest sector to develop due diligence procedures which take account of the environmental and social impact of their lending; including conformity with relevant legislation. It also aimed to encourage Export Credit Agencies to develop guidance on improved project screening procedures and codes of practice for forest sector projects.

62. Research, supported by DFID, has been conducted to examine the feasibility of requiring finance institutions, including EU Export Credit Agencies, to undertake specific due diligence to ensure investments do not result in illegal timber production. This has proven difficult, largely because of the diverse nature of the finance sector.

63. In conclusion, a great deal of progress has been made in improving forest governance and trade. Most tropical developing countries as well as countries such as Russia are introducing reforms and are receiving help to do so. There has been a major shift in the international timber trade in a relatively short period of time that involves Japan, the USA and China as well as Europe. But much remains to be done to secure these reforms and progress on reducing emissions from deforestation and degradation will be constrained unless we do so.

Witnesses: **Mr Michael Foster MP**, Parliamentary Under-Secretary of State, Department for International Development, **Joan Ruddock MP**, Parliamentary Under-Secretary of State, Department for Energy and Climate Change, and **Huw Irranca-Davies MP**, Minister for the Natural and Marine Environment, Wildlife and Rural Affairs, Department for Environment, Food and Rural Affairs, gave evidence.

Q182 Joan Walley: It is very good that we have got a trio of ministers before the Committee on this really important inquiry that we are doing. Can I welcome you all to the Environmental Audit Select Committee. I think we would like to start by asking you whether or not you feel that the global financial situation we have at the moment and the global financial crisis could actually dwarf the ecological crisis and attempts that are being taken on a global basis to tackle deforestation at the climate change talks. We wonder how much you feel the national financial situation and all the attention and priority that is being given to that could undermine the equally important need to address the environmental impacts of deforestation.

Huw Irranca-Davies: If I can begin by looking at one aspect that is very much core to Defra's work, which is the process of good governance. I think where we are currently with the economic climate, you are right, the obvious interpretation of where we are now is that could impact quite negatively on how we see deforestation and impact on biodiversity and so on and that is why the FLEG or FLEGT approach to not only changing individual behaviour on the ground but good governance behaviour amongst countries where deforestation is happening is so critical because the FLEGT process, hopefully, will ground good governance to see us through periodic downturns in the economy.

Joan Ruddock: From a Government perspective, what the Prime Minister has said repeatedly and what our Secretary of State has said repeatedly is that we should see this economic downturn as an opportunity to change our approach, that we should be planning for a low carbon recovery, that we can come out of the recession, albeit it is going to be painful and take time, but as we prepare to come out we need to be prepared not to repeat the way in which we have run our economy with high fossil fuels in the past but to have a low carbon economy. Clearly that reflects on all the work that we in DECC are doing in preparation for Copenhagen. The message is constantly repeated and we look for ways in which we can convince other countries, and a major part of our work is working with other countries, to try to see how we can get a global agreement that is beneficial and does not reduce economic activity but simply allows us to grow economic activity in a different way.

Mr Foster: Thank you for the opportunity to just give a brief run-through on what our assessment is of the impact on the very poorest countries in the world of the global downturn. Our best guess at the moment, and it is no more than that because circumstances do vary country-by-country, is that an additional 90 million people will have been pushed into absolute poverty as a result of the downturn. This comes on the back of the fact that 130 million additional people were pushed into poverty as a result of the food and oil price hikes that preceded the global downturns. Our concern from a development perspective is that when the upturn comes people potentially are in a much weaker state to take advantage of any global upturn and that has got to be borne in mind in the work that we do and our Department is geared to have very much a pro-poor agenda. We are looking at the range of policies that we have to tackle, the aftermath of downturn, mitigate its impact as best we can now, but mindful of the fact, of course, that climate change is there, it is not going to go away and that has got to be bedded into all of DFID's work as well.

Q183 Joan Walley: Do you not think because the cost that has been calculated of deforestation is so great, and actually greater than the cost of the financial crisis at the moment, nonetheless there is a danger that could all be sidetracked because the focus is on the international fiscal situation rather than on the environmental degradation situation?

Mr Foster: One of the concerns that we have is the financial pressures that all countries are now under are actually making them focus on what they do in an international sphere, be that on protecting the environment and dealing with deforestation and degradation, but also some countries have made it clear that they are no longer able to commit to the challenging targets, to the percentage of gross national income that they give to overseas aid. The Prime Minister made a commitment back in September that we were going to continue with our 0.7% achievement by 2013, but some of our partners because of the financial problems and the fiscal pressures they are under are having to row back. We have to be mindful that internationally this has scope for damaging work on development but also on other issues as well.

Q184 Joan Walley: If I could just move on to the preparations for Copenhagen. Can I just ask you, from the perspectives of your individual Departments and the way in which the Government is working in an integrated way as well, how prepared do you think you are to make sure there is an effective response to deforestation come the

Copenhagen Conference? Are you confident that you can be in the situation where you need to be by December later this year?

Joan Ruddock: If I could start on that. We think that things are going reasonably well. We have just had this discussion about how difficult the economic times are and clearly it would be a lot easier if we did not have that background because we are always needing to persuade people and re-persuade people of how incredibly important this agenda is. Having said that, the Department is working unbelievably hard on it, engaging with our posts around the world, in some cases people are seconded and certainly there are constant briefs made available, there are local round tables and discussions. In every way we are trying to embrace this need for us to play a pivotal role, as we believe we are playing, in achieving a Copenhagen deal. We made a significant move at Poznan to that end because we issued a forestry statement. That was a statement that was signed[1] at the initial stage by 20 countries, forest countries and developed countries, and more signatories have been added to that. What we made clear there was that first of all there was a need for a reliable framework in order to be able to progress and that, of course, is the monitoring and reporting and verification, which I am sure this Committee has spent a lot of time upon. We were setting out the principles and flagging up that agreement between countries. We spoke about the need to recognise national ownership and commitment to REDD for developing countries being a precursor to the success of any forestry agreement and we gave a broad outline of principles related to the international architecture which could support REDD with clearly funding being one of the major issues. With that start at Poznan, and obviously much work had gone on before it, that was an important statement, many countries have shown further interest in that, so we think we are progressing, albeit against a difficult background.

Q185 Joan Walley: Does anyone else wish to add?

Mr Foster: I have just a couple of points to add. Obviously we recognise that in terms of the importance that Copenhagen has for climate change, it was clearly the poorest people in the world who were the ones who were always going to suffer the most as a result of the adverse impact of climate change. There is a great deal of importance that we as the UK Department put store in in getting a good agreement at Copenhagen. What we are also doing that will help get that international agreement is we are supporting some of the poorest countries in the world to actually get their voices heard at Copenhagen as well. We are investing DFID resources, for example, in Nepal, getting them to equip themselves ready to make a case for the impact of climate change in Nepal. We are also doing the same in Africa as well, so we get the poorest nations better represented at these international conferences.

Huw Irranca-Davies: One other consideration to add is it is important whilst the focus, understandably and rightly, is on climate change as well, issues around biodiversity, in which Defra has a pivotal role in advancing the case, discussions led by Bob Watson, our chief scientist within Defra, have been very much advancing the case that within Copenhagen and the wider remit the biodiversity implications of deforestation, recognising, if you like, quality forests, long-term forests, the benefits that we gain from them are also a significant factor to be taken into account. We think that does sit comfortably within the wider remit as well.

Q186 Joan Walley: If I can just go back to Mr Foster's point about trying to make sure that developing countries can have a say in how the negotiations are going forward. We have had evidence previously from Barry Gardiner MP who has put on the record to us that the potential negative environmental or social impacts of a REDD mechanism he feels has had little attention in the negotiations. He has expressed to us very genuine concerns that the whole REDD mechanism could just overlook all of these issues in the haste to get some kind of negotiated agreement and currently marginalised people would be even further marginalised. I just wonder how much that is featuring in the detailed work that each of your Departments are doing between now and December in the run-up to Copenhagen.

Mr Foster: Certainly part of our consideration in this is to make sure that local people are represented in any form of REDD strategy, so we have got people on the ground having their best interests examined and considered when agreements are made. For us, that is the way forward. We have seen that through FLEGT but we have also seen it in terms of our individual pilot projects that we have run in community forestry, and I dare say we can give you more detail later on how those work. Those are examples where we know that we can make a difference on the ground to people in the developing world but we have to make sure that when an agreement is reached those interests are protected. That is why we are investing money in getting developing nations' voices heard because ultimately they are the ones who have got the responsibility for protecting people working and living in particular countries.

Joan Ruddock: Can I just add a final word and that is in terms of the statement that was agreed at Poznan there are two aims. One is that there should be early action on REDD and that agreement on forestry should be part of the Copenhagen agreement. Having made those two statements, it is important to look at who signed up to it from forest countries. If I could just give you examples: Brazil, Costa Rica, Guatemala, Guyana, Peru, and Cameroon. These are countries which clearly have a huge interest in making this work and they are saying with us, the number of developed countries that circulated this statement, we do agree on these

[1] *Note by Witness:* Formally in Poznan countries expressed support for the statement rather than signing it.

two pivotal points and that is what all three Departments are working to see achieved in our different ways.

Q187 Joan Walley: You do not share Barry Gardiner's concerns?
Joan Ruddock: I think we can all share Barry Gardiner's concerns but we do not have to share what would appear to be a pessimism. Just because something is really, really difficult to do does not mean that you should not agree to try to do it. We do not have many choices in this world when it comes to climate change but addressing forestry and deforestation in the context of climate change is utterly critical.

Q188 Joan Walley: Mr Irranca-Davies, do you want to comment?
Huw Irranca-Davies: Only to re-emphasise a point that we made earlier. It is not only a question of money being the solution, it is actually sharing the ownership of this with the countries involved and one of the parts of that ownership is ownership of the issue of good governance to drive this forward. This is difficult because we recognise that the discussions we have here in this Committee, in the European Union, impact on the ground in different ways in different countries, however the imperative is shared and, as Joan has rightly said, the willingness of countries to engage with this both on the ground and at High Level has been quite reassuring. Whilst I understand Barry Gardiner's concerns, I think the impetus is clearly there. As three Ministers, we and our officials are very committed to working with people on the ground to embed the ownership of it and make it work. It is not only the money side of it.
Joan Ruddock: I said a final word, but I have thought of something else and that is the issue of indigenous peoples. This is a difficult issue because we are dealing with sovereign states so we cannot set up something that deals with people who are not the sovereign states and make deals in that way, but we have got to have the respect, the recognition and involvement. It is our wish that whatever deal we get in Copenhagen it will have an element in it which recognises the rights of indigenous peoples.
Joan Walley: I think we may come on to that in a bit more detail shortly. Mr Challen.

Q189 Colin Challen: I think we all want to see an agreement in Copenhagen, but at a previous evidence session DFID officials told us they did not think that a workable and effective deforestation scheme could be in place before 2020. Is there not a bit of a mismatch between wanting to get an agreement and the actual value of what it contains if, for example, the REDD is seen by many as being ineffective?
Mr Foster: There is no doubt that the negotiations running up to Copenhagen and at Copenhagen itself are going to be difficult because there are a lot of competing interests that have got to be matched together. In terms of what happens afterwards, trying to get an assessment of looking into the future at what an agreement might mean and how long that will take to get a grip on the ground, there are obviously different estimates of how long that will be. We are mindful that the pressure is on now to deal with deforestation because of how it impacts on climate change and we know the role it can play in biodiversity, but also from DFID's perspective there is an impact on development as well and incomes and livelihoods of the very poorest people in the world. All three force you in a direction of wanting to get something done as soon as possible, but it is very difficult here in March to work out what might be an agreement in Copenhagen in December and what that might mean to action on the ground and how long that will take. We are mindful, Mr Challen, of how speedy we have to be.

Q190 Colin Challen: Is there not an argument for a separate track of deforestation and rather than saying we have to get it into the agreement in Copenhagen in a few months' time to say it would be better to have a separate track to deal with these issues and have an effective agreement even if it took another two years to hammer it out?
Mr Foster: There is a difference between having a market up and running, which might take us through to 2020 before that is up and running and working properly across the board, and action being taken on the ground. There are examples that I suspect we will come to later on where we have got evidence of community projects working now and there are also projects that can be working between now and 2012. There is work that can be done, but having a market scheme up and running might take us through to the timescale that DFID officials referred to.

Q191 Colin Challen: Is not perhaps the creation of this market scheme and its dominance in the REDD one of the stumbling blocks that might be best avoided? To what extent do you think markets should be dominating or present within any deforestation scheme?
Mr Foster: Certainly in terms of how we get to fund the type of challenges that are faced with deforestation and degradation, there has got to be an avenue other than just public money. I think there is a general view that it has got to be a combination of private and public money and the market is one way in which we can lever in the private funding that is necessary. The work that we can do on the ground, we have demonstrated in Africa but also in other parts of the world where projects are ongoing that do deliver the types of benefits that I think you want to see and we want to see. I do not think there is a block by waiting for a market scheme and I do not think the market scheme puts at risk good work that can begin now or can continue now.
Joan Ruddock: Can I just add to that. We cannot envisage any funding mechanism that depended on simply public funds being collected up from donor countries that could possibly provide the level of sustainable funding that would be required. The estimates are between £10 billion and £20 billion a year to halve deforestation by 2030. We think those sums are just beyond the collecting pot and we are

going to have to find a market mechanism to do that. It will take time to develop effectively such a market mechanism and we do not underestimate the difficulties for developing countries in terms of their management of their aspect of how this could be delivered to them. Clearly we have not got in place a market mechanism from the developed countries either. Work has got to be done, but because we think we need to understand the carbon implications and, therefore, the carbon pricing of deforestation and degradation, it has to be part of the Copenhagen discussions. If you get a deal in Copenhagen that does encompass forestry then clearly it is not going to mean the very next day we can put everything in place. We have got to have short-term measures, medium-term measures and the full financing from the carbon markets is something that certainly we do not expect to be in place before 2020. There is so much that is being done, as Michael has said already, and there is more. The European Council in December suggested that a new market mechanism for forest credits could be developed and that will provide a shorter term solution and the deforestation credits would be valid for government compliance post-2012. We have got to accept this is all difficult.

Q192 Colin Challen: The sums that you have mentioned there are far exceeded by the sums that we are putting in to support the financial markets, are they not, so it does go back to the Chair's original question that we are not treating this with the same urgency as the recession.

Joan Ruddock: We cannot make that comparison because when you are dealing with the banking crisis, every developed country has got its absolute immediate self-interest to get its own economy re-floated and without economies being re-floated and without people coming out of the recession there will be no financing for developing countries. It is a comparison that cannot be made and stand up.

Q193 Colin Challen: Exactly. This is not financing for developing countries, this is financing to reverse climate change.

Joan Ruddock: I accept that, but what I am saying is if we have developed countries in permanent recession then it affects everything else that might be done and the important work that DFID does in terms of governance, growing capacity for countries, making it possible for them to participate in global agreements. That funding depends on developed countries having functional economies and functional banking systems.

Q194 Colin Challen: One way of perhaps channelling a lot more money into this would be the use of auction receipts from the ETS which one estimate said might be $8 billion a year by 2020. If other countries that developed their own trading schemes did the same, would that be one way forward?

Joan Ruddock: We are very interested and in principle supportive of the Norwegian proposal. The Norwegian proposal suggests that a proportion, I think they have suggested about 2% or something of that nature, should be held back of the allowances and then they could be auctioned in order to provide the finance for developing countries. There are a number of proposals on the table. We are also very interested in what Mexico has proposed, which is a different model, and maybe they could be combined, but the attraction of Mexico, and Mexico is playing a very positive role in all of this, is that Mexico is proposing a fund in which all countries participate and then draw down differential amounts. There is an attraction in that in trying to move us away from just looking at developed countries on one side of the equation and developing countries on the other, all of us would be in it together. We are looking at all of these models, doing lots of work and meeting the relevant governments and officials.

Q195 Colin Challen: Should forest credits be included in the ETS? Are there any risks attached to that? Might it not flood the market and depress the price of carbon?

Joan Ruddock: Unhappily the price of carbon is being depressed at the moment anyway. Calculations have been made and they were based on the Eliasch Review which did the modelling and said that if there was a limit on supplementarity of between 35% and 50% then the view of the Eliasch Review was that would not distort the carbon market and that was manageable. I have no way of second-guessing that, I just have to accept that is modelling that has been done. Personally, I think there are no absolute certainties in this because we have limited experience of carbon markets, as you know only too well. Again, I would say that because things are difficult that does not mean to say we have not got to keep trying to do them.

Q196 Colin Challen: We have got all the experience now in the recession of how the masters of the universe have brought us to our knees despite them being given knighthoods, peerages and all the rest of it in the past, so what faith can we have in the carbon market, crucially including forestry, that it will not suffer volatility in the future, that when we say to developing countries they will get the support, and this Committee has been to Cameroon and seen exactly the level of support that is needed, that in five or 10 years' time the price of carbon is not just going to go right down to rock bottom, everything will be pulled out and we are back to square one? This calls for state intervention, does it not?

Joan Ruddock: Neither you nor I can look into the future and make predictions. What we have to do, I suggest, in terms of the work that my Department and the international community does is to try to set up a framework, a financing mechanism, and model it and plan for it and put the governance structures in place and make it happen. We cannot work just on the basis that because something might happen we should not do it. I repeat: it is our view that we cannot do this simply by handing round the begging bowl, we do not think that will work, we have to have a pricing mechanism. This is the model that seems to be possible and we do have some experience

in carbon trading schemes, albeit I accept it is limited, and we believe this is the way forward. Of course there are no absolute guarantees.

Q197 Colin Challen: Brazil has withdrawn or watered down its objections to the REDD.
Joan Ruddock: Yes.

Q198 Colin Challen: Do you think they will now be part of the REDD as a fully compliant member?
Joan Ruddock: All I can tell you directly is that Brazil was one of the signatories of our statement and to that extent they made it very clear that they wanted to be an early mover on REDD because that was implied in the statement and they want an agreement at Copenhagen. Of course, we are working with them particularly on verification and they are doing very, very good work in this field which will be applicable to many other countries. Maybe a year ago, although the Department did not exist and I was not involved, from my reading of the press at the time obviously people were very pessimistic about Brazil's role and, unless my officials behind me quickly correct me, I believe that opinions have changed very much for the better.
Joan Walley: Before I call Dr Turner, perhaps I could check that neither of the other two ministers wishes to comment on anything so far.

Q199 Dr Turner: There are some risks associated with the use of forest credits which perhaps suggest that it would be unwise to be unduly reliant on the use of forest credits in ETS, et cetera, to offset industrial emissions. The example of the recent Australian bushfires releasing over 100 million tonnes of CO_2 is an indication that forests are becoming increasingly vulnerable as a result of climate change itself. Do you think we should place limits on our reliance on that as an offset?—not that we should minimise attempts to reduce deforestation but that we should not put too much reliance on it as an offsetting mechanism.
Joan Ruddock: We are not here always talking about offsetting. Offsetting is one aspect of the carbon market. In terms of an agreement, we are looking for a reliable financing mechanism that is going to recognise the value of forestry. It is likely that there will be conservative estimates of the carbon reduction that can be achieved. In the Amazon Fund there is reference to 100 tonnes of carbon per hectare rather than to the estimates that are perhaps twice or even three times that, so that when we are looking at trading mechanisms putting prices on, that will be done conservatively, and, in a sense, that lowers the risk that you quite properly identify. We are of the view that we also need to have an insurance mechanism that can back up the trading mechanisms, so we believe that it would be appropriate to have a sort of carbon reserve fund in order to spread the risk; that is a risk, as you have rightly identified, that could arise particularly from fires, or indeed from devastating disease. There is risk, we cannot remove risk, and therefore we should address it appropriately.

Q200 Dr Turner: The other obvious risk is that forest credits will not represent true reductions because there is so much potential for the manipulation of baselines and, indeed, an insufficient genuine knowledge base to be certain that the baselines are accurate. In that context I would like Michael to comment on the way that DFID has progressively reduced the amount of money it invests into forestry research—which is perhaps unfortunate, when we have a greater need for a good knowledge base in forestry than ever before.
Mr Foster: One of the challenges we have in terms of our research spend—clearly it is one which faces every other government—is where to put the money. We have put our emphasis in the last couple of years into agricultural research, given the impact of global food shortages and the price hikes which were so damaging to the 130 million people who were pushed into poverty. We have taken the decision that we need to look at agriculture in terms of the impact it has on the food markets for various people, so that is one of the areas of difficulty that we took as a priority..

Q201 Dr Turner: Would you like to comment on the validity baselines, because they are so important in this context.
Joan Ruddock: There is an important recognition that baselines do not remain static and will need to be adjusted as deforestation rates are reduced, but I think the key to it is to recognise standing forests and to develop a baseline that recognises deforestation rates and standing forest. There has been work done on this. I am just going to take some advice from my officials and then I will give you an answer.

Q202 Joan Walley: If you wish to provide us with further information in writing on that, we would be very happy to receive it from you.
Joan Ruddock: Perhaps that is the easier way of dealing with it. Thank you.

Q203 Dr Turner: Do you think there is a case for some independent international body to monitor and verify existing forestry baselines and deforestation rates, especially given that it is not just the area of forest that is important but the quality of that forest.
Joan Ruddock: I agree with the questions that you ask in terms of the quality and the area of establishing all of that. Whether there is a need for yet another international, independent body, I am less certain, but, again, this is all part of the discussion that has to lead to finalising an agreement, because there is no doubt the verification and monitoring is essential to this and how it is done. At the end of the day, we will or will not see that emissions have reduced, so we are going to be at a point where we will understand what we have done and how effective it has been.

Q204 Dr Turner: What is the Government doing to ensure there is valid, accurate monitoring and evaluation?

Joan Ruddock: This is not something for this Government to ensure. This has to come through an international agreement. In some cases we are providing technical assistance. We have a joint project with Brazil which is for satellite monitoring, and we are assisting—again DFID may want to say something about this—in helping countries to be prepared and able to do the task that will be required of them as well as of the international community.

Q205 Dr Turner: Someone is going to have to be ultimately responsible. There does need to be an authoritative body, obviously with international support, that can fulfil this function. It does not necessarily have to be like the creation of a new quango, but bringing together elements that exist already. If they are not effectively co-ordinated they could go badly astray.
Joan Ruddock: Sure. All we can say is that this is part of a UNFCCC review process. We have not come to a conclusion about exactly how this should be done. This is ongoing work involving everybody but we are playing a big part in trying to develop international methodology and, indeed, we have given some finance to that end.

Q206 Joan Walley: If it is something that should be achieved through the UNFCCC process, are there actions that the UK Government from whatever department are taking, to try to get that incorporated into the shape of the proposals going forward?
Joan Ruddock: Yes. As I indicated at the beginning, our officials are working very hard on trying to bring about an agreement at Copenhagen that includes forestry. To that end obviously this detailed work is essential, because, as has been rightly suggested, it has to be possible to monitor, to record, to verify what is happening and forestry countries of course will have to develop their own inventory of their forestry and they will need a great deal of help with that. Again, there is international finance being gathered in order to assist that process because the cost is very significant.
Huw Irranca-Davies: I do not think we are in the position at the moment to put specific proposals in front of the Committee to say this is the way we can see that done, but we do recognise that there are a number of facets here. One is developing proper means for the countries themselves to engage with and own this issue and monitor it for themselves rather than have some large bureaucratic entity come on top. But there is an issue around the monitoring of it. The UK-Brazil initiative in terms of satellite monitoring is an interesting way forward. There is best practice out there but we are actively engaged in this to see that. The interests that Defra has in this of course is in terms of biodiversity and the impact that deforestation has on biodiversity. We share with colleagues here the need to find the best way of monitoring this as this process moves forward, but I do not think we are in a position yet to share specific or firm proposals as to how that would work. It is still a process of engagement with partners in this.

Mr Foster: The collaboration with Brazil and satellite monitoring has been mentioned and we are more than happy to have African countries share that technology and have access to that as well.

Q207 Mr Caton: You said earlier that whilst climate change is the major challenge, we have to take care of biodiversity and other ecosystems issues. It has been put to us that a mechanism that simply pays for forest carbon or forest area could lead to the replacement of natural forests with plantations and the biodiversity loss that would result. How does the Government propose that those sorts of potential negative environmental impacts of a REDD mechanism can be avoided?
Huw Irranca-Davies: Mr Caton, we all recognise that what are termed "primary forests" are of a much higher quality, both in terms of carbon density but also in cases of their resilience and the range of biodiversity within the primary forests. The idea of deforesting one area and replacing it with new growth is not ideal from a biodiversity perspective. This is why we are quite reassured by the December EU Council outcomes which looked at the use of gross deforestation rates, the idea being that that puts the emphasis on primary forests rather than clearance of forests and then replanting. The Bali Action Plan also recognised the provisions of the Convention on Biological Diversity and other international agreements that have gone on for some years in this, to ensure that the maximum environmental benefits of paying for carbon mitigation is achieved, so I do not think you can take out the biodiversity from this entirely. We are keen to ensure that that does play a part in these discussions and in the REDD process. Just to reiterate, Dr Bob Watson, our Chief Scientist, has been engaged with this process all the way through and continues to be as well. He is chairing a sub-committee of experts on biodiversity and climate change and the first part of this work was presented to the UNFCCC in Poznan, and the next meeting is in March, so it is very much embedded within the process.

Q208 Mr Caton: Are we looking for specific environmental protection aims in the REDD mechanism?
Huw Irranca-Davies: I think we are looking for it to be recognised within the REDD mechanism. That is what we are hopeful of, that whilst the primary focus is on issues around carbon, the importance of forestry, the important impact of deforestation upon biodiversity is so significant that we would wish to see it recognised within there as well and not forgotten about.

Q209 Mr Caton: Do you agree with what some of our witnesses have said, that the mechanism should be structured in a way that preferentially rewards the protection of ecologically important forests? From what you have said it sounds like you would, but are we talking about getting this into the REDD mechanism?

Huw Irranca-Davies: That is what we are trying to tease out here in this process, yes. You are right in interpreting my comments in that way. We would like to see a way within the REDD process of identifying the important issues that I have mentioned around whether you put as the baseline net deforestation, which is the approach of some countries currently, or gross deforestation, which puts the focus very firmly on primary, high quality forests and all the biodiversity benefits. That is what we are trying to tease out in this process, of how much we can embed that within the REDD process.

Q210 Mr Caton: How near are we to having a practical answer to that?
Huw Irranca-Davies: We are not fully there yet, but we are fully engaged. It is an ongoing issue but, as I say, thanks to the work done by our officials and Dr Bob Watson we are hopeful that we will be able to get an outcome that gives not only the carbon benefits of this process but also the biodiversity aspects as well which are critical. Mention has been made about the current economic climate and its effect on this process. We are as aware as Defra of the potential impact of the economic climate on biodiversity, so we want to make sure it is within that, but we do not have a firm outcome yet, as I know you know.

Q211 Mr Caton: Returning to our pessimistic colleague Barry Gardiner, a positive that he put to us was that the countries with low historic rates of deforestation should be protected first to ensure that deforestation does not increase there. What do you think about that approach?
Joan Ruddock: I am now answering off the top of my head here, rather than from any briefing that I have had on this, but it seems to me that it would be very difficult to pick and choose within any international agreement. There is a need to work on all aspects because it would not be acceptable, would it, if we were to say, "Let's protect those who have done the best, they deserve it" and those who have done the worst with the greatest deforestation should continue to do so while we were looking elsewhere. It has to be a comprehensive agreement and then trying to get everybody to work to their capabilities. There will be plenty of scope for people who do want to be rewarded for what they have done, and we are very clear that there should not be an international agreement that leaves out those who have looked after their forests. There are some countries which have relatively little deforestation and degradation, and, because we concentrate so much on deforestation and degradation, it would be very easy not to recognise them and their needs. Clearly, if we as an international community are able to halt or to halve, as we hope, by 2030 then of course industrial interests might well switch and put huge pressure on the countries that have not previously deforested. We need to protect and to work simultaneously, as far as is possible, right across the board, from those who have done best to those who have done worst.
Huw Irranca-Davies: Recognising that there are different approaches to this in different countries in the world, recognising that some are at different stages in this, I think we do need a system or a mechanism that is flexible enough to encourage everybody along that line, those who have done well historically and those who need to do well too. We need some flexibility. We have tried to design a system that reflects this, that will be a further incentive to those who are more advanced along this line but which will also bring others along. We know that this has to be a comprehensive approach.
Joan Ruddock: It also does rest on establishing the global deforestation baselines, because that is the only way in which it will then be possible to recognise where each nation sits in relation to the global deforestation baseline.

Q212 Joan Walley: Could I just be clear, if it is the case that Eliasch has said that it is unlikely that environment protection safeguards can be incorporated into the REDD agreement, are you saying, Mr Irranca-Davies, that you feel the work your department is doing with Mr Bob Watson could end up with some kind of corresponding UNFCCC that could take account of these concerns about environmental protection, consistent with the REDD agreement going forward?
Huw Irranca-Davies: Yes, through the UNFCCC. That is where this work is focused, with the team of experts.

Q213 Martin Horwood: I want to start with a follow-up question on the last set, because there seemed to be a slight contradiction in your answers there. Mr Irranca-Davies was suggesting, I think rightly, that the whole REDD implementation process was bound to be in stages and could discriminate between different situations, not least on issues like whether governance structures were properly in place to implement it, whereas in your reply on Barry Gardiner's question about whether we should start by focusing on those areas with low historic rates of deforestation, you almost seemed to be implying that we should not implement REDD anywhere until we can implement it everywhere. That is surely not right.
Joan Ruddock: No, I did not attempt to suggest that in any way. I think I did say that countries would be coming forward and being assisted according to their capabilities and so on. I see that there would be a need not to exclude any particular category of country. The agreement has to be comprehensive but the order in which countries come forward for action will of course vary right across the spectrum.

Q214 Martin Horwood: In which case surely you should be open, at least, to thinking about Barry Gardiner's suggestion about focusing, perhaps earlier, on those with low historic rates of deforestation because that might be a particularly effective way to stop further degradation there—or at least to think about it.

Joan Ruddock: I have thought about it and, again, unless I am being contradicted by my officials I cannot see the logic in doing that. As I repeat, I think it has to be comprehensive agreement. Countries will come forward in different orders according to their needs and their capabilities. Some press already. Guyana is one where there has not been huge deforestation and degradation and they want to be recognised for what they have done with the good stewardship. So there is a range of activity. I repeat also that we spoke about the different stages of funding mechanisms, and some of those are bilateral funds, some of them are specific to a particular country that perhaps is looking after its forestry well, and some others are trying to tackle where there has been considerable deforestation.

Q215 Martin Horwood: I am sure Barry was not arguing that we should not have a comprehensive agreement. But, anyway, let us leave that. I need to come back to the issue of indigenous peoples and I need to declare an interest here. I am also Chairman of the All-Party Group for Tribal Peoples and that is supported by Survival International which is a non governmental organisation. We have heard from a number of witnesses that the involvement of indigenous peoples in practice, both in things like the World Bank Carbon Forest Partnership Programme and in some of the negotiations to date, has been pretty poor in practice. What has the British Government done to ensure that that situation has improved?
Mr Foster: We recognise that if there is going to be a financial mechanism that works we have to deal with land ownership—which of course is fundamental to the issue you have outlined; that we have governance structures in the country concerned that can enforce the legal titles that have been established and, yes, that the rights of local users and indigenous groups are recognised and respected. That has been the UK view. In terms of what that means for an agreement, clearly we have to strengthen rights and governance. We have to create incentives for communities, so that there is in a sense an accounting mechanism by which the funding system ensures that the right people benefit from any funding scheme that kicks off. The monitoring systems that are in place to do this have to be transparent to gain the credibility of the people's concerned and the public, and we do think there is scope for independent advice and independent auditing of the structures that are in place. In Bali 2007, part of the agreement was clearly to recognise the needs of local communities and indigenous people when any action is taken to do with reducing emissions from deforestation. In Poznan last year, again there was a very clear commitment to make sure that any schemes that come up are transparent but also consultative of user groups themselves.

Q216 Martin Horwood: I am very, very encouraged by the language you have used there, which was very much about the language of rights, but you quite rightly did not use the language of rights in connection with either Bali or Poznan. Certainly in Bali I do not think the word "rights" was used. There is a lot about consultation, about trying to recognise the needs, but the language you have used is much stronger than that. There are other governments, Australia and Japan and Norway, which have tried to get the explicit language of rights included in the international agreement. From what you say, that will also be the UK Government's position. Is that right?
Mr Foster: Bali mentioned the word "needs" as opposed to "rights", but we believe that to establish the proper funding mechanism to work you have to have the legal title, the legal rights of the land that is involved to begin with, otherwise you cannot get the funding going to the very people who need it.

Q217 Martin Horwood: Can we be absolutely clear on the question I have just asked, which is that you will be arguing for that explicit language of rights to be reflected in the international agreement.
Mr Foster: As far as I am concerned, the view we are looking at is to get the title of the land of the forests, to make sure that the funding schemes that we are trying to negotiate deliver the funding to the very people concerned, and it is backed up by—

Q218 Martin Horwood: So that is a yes?
Mr Foster: It is an establishment of title of right, yes. It is an establishment of governance as well, because you have to get the governance in place to enforce any title or right that you recognise in the process.

Q219 Martin Horwood: It is encouraging that we are talking about good governance in that context. Do you think that REDD funds ought to be conditional on the recognition of the rights of tribal people and indigenous peoples?
Mr Foster: In terms of the process that we are going to go through, we have recognised all along, as I have said, the key aspects to it. We want to see that in national strategies, but we obviously want a comprehensive agreement as well and that is obviously going to be part of the discussions that go on. In terms of what I have seen on the ground, in terms of where forest user groups are being supported by DFID, I was in Nepal at the back end of last year, a place called Terathun, where we looked in detail at the forest user group programme that we have. We are using, in effect, a pilot to see how REDD strategies can be adopted across a wide scale. The community forest programme we have in Nepal covers 527,000 households and 4,600 forest user groups. It is roughly 11% of the Nepali population, so we are talking large scale involvement. In terms of the impact it has on deforestation and degradation, of the user groups that were asked about the environmental impact that they have seen, 82% said that their forests were now in better condition than before the community project was established, 86% reported there have been improvements in water and wildlife, and these forests capture around 700,000 tonnes of carbon per year, so there is real benefits of these particular projects on the ground.

Q220 Martin Horwood: I do not think there is any doubt that some DFID projects are doing great things on the ground and that you are saying many of the right things to us. I suppose the concern is that you are going to press for these things as part of the international agreement. You said earlier on that we cannot bind sovereign governments, but we can more explicitly support the framework of international law, standards such as the UN Declaration on Rights of Indigenous Peoples or International Labour Organisation Convention 169. Could we explicitly link one of those or both of those to the REDD mechanism in order to make sure that the rights of indigenous peoples were properly defended and reflected in the international agreement?

Joan Ruddock: There would probably be real difficulties in getting the agreements, for the obvious reason I suggested that the sovereign governments concerned have to sign up to this international agreement, and we are battling on many, many fronts to get the international agreement. Whereas it is entirely desirable, in reality I suspect this may not come in an international agreement. We have made our position very, very clear about the respect for indigenous peoples' rights and so on and so forth. We do a lot of work with DFID in that area certainly, and, as Michael has indicated, in the Nepali project, but I suspect that much of the valuable work and most of the development that can lead to the good governance and the respect for indigenous people, and the work on enabling people to acquire their land rights, is going to be done in bilateral agreements, some multilateral agreements, projects on the ground, rather than in this overarching framework. I am just surmising, because none of us know.

Q221 Martin Horwood: As you mentioned earlier in the session, just because something is difficult does not mean you should not argue for it.

Joan Ruddock: No, I am only giving you an assessment, Mr Horwood, of what I think may come in the international agreement, but because of the attitudes that we have as a government, we will see practice on the ground that reflects very much what I think you and I would say—

Q222 Martin Horwood: If, as you seem to be saying, you are broadly on the side of the angels in the debate, surely we should just hear from you at least that you are explicitly pressing for that in the international arena. We do not expect you to save the world, unlike your boss, but at least to hear that you are explicitly pressing for those linkages. Otherwise surely it opens up a colossal loophole in the whole process and undermines the whole position that you are trying to take, which is to protect the rights of tribal peoples as part of these mechanisms.

Joan Ruddock: I do not think I would agree with you that it opens up a colossal loophole because clearly much work is being done, more work will be done. These sentiments are constantly being expressed in various documents and it is always a judgment what a particular country such as our own does press in the international arena. I have to say this is not one of the things that we are pressing in terms of a linkage that you have just proposed. We can go back and look at that but we have not been pressing for it. That does not diminish our commitment to do what we can and we do it clearly in the way in which we work on the ground and will continue to do that.

Huw Irranca-Davies: I mentioned earlier that one of the benefits of the way in which we have been trying to take this forward as a government is to share the ownership of these issues. Joan touches rightly on this point of whether we can find a clear and absolutist way forward that puts clear duties on, or whether we engage with work, albeit that it is more messy, more tricky. I want to suggest to you that we are starting to develop that model, albeit there are critics of it occasionally, with the FLEGT model, which engages with the government on the ground, with the communities on the ground and so on, to try to make that process work and to recognise some of the issues around the impacts on the communities as well. It has a long way to go, but we note from that process the increasing number of countries who want to sign up to that, bringing them along and feeling that they are a part of it. It goes not give the absolute guarantees that you were seeking but it can deliver on the ground.

Q223 Martin Horwood: I did not ask for any absolute guarantees; I simply asked to understand what the British Government's position in these negotiations is. It seems to have been clear that you are not at the moment pressing for this but you will look at it, which we will take some comfort from. But surely what you just said does rather confirm the fears of many NGOs, many of the other commentators and some of the minority peoples around the world by concentrating on the ground level advance of the FLEGT programme and so on but then allowing the REDD mechanism to take a completely different path and for there to be no inherent linkage between the two. Is that not a very dangerous situation to be in, because one might completely undermine the other in time?

Huw Irranca-Davies: From a Defra perspective, I hope I have given the reassurance that we do not see that happening. Our officials are engaged in this as well, for reasons of all our departments, so we do not see that happening. But we do recognise that we are developing very good models here to work with other countries, not only with the governments of countries but with the stakeholders on the ground as well, including working with NGOs, to try to find realistic, practical ways to deliver results on the ground in terms of deforestation. So I think we do have models there.

Q224 Martin Horwood: You do not think there is a risk of them being undermined by a mechanism that does not explicitly acknowledge those rights?

Huw Irranca-Davies: In a model that not only delivers financial imperatives but also is based upon engaging with stakeholders on the ground, there is undoubtedly a risk that in one country it will be delivered more effectively than another. How we

manage that risk then becomes the important thing. How do we make sure, as we roll this process out, that we are delivering the benefits on the ground, not only in terms of deforestation but in terms of the impact on communities and indigenous communities?

Martin Horwood: Maybe by making REDD, conditional on rights.

Q225 Mr Chaytor: I want to pursue the question of the context of the REDD negotiations. We have heard that the context of biodiversity is being dealt with separately through the FLEGT process. We have heard that the Government is not pressing on criteria for the protection of rights of indigenous peoples.

Joan Ruddock: Not pressing on the linkage to other conventions.

Q226 Mr Chaytor: Yes. In terms of other contextual matters, what is the Government pressing on? Or do you see the REDD process as isolated from wider issues of land use, planning, sustainable forestry, or even from questions of governance?

Joan Ruddock: No, we do not see them as being separated. As you will be aware, there have been real historical difficulties in measuring emissions accurately from what is called LULUCF in the jargon, Land Use, Land-Use Change and Forestry. Because of the difficulties, this was not part, as you will be aware, of the first Kyoto commitment, but there was a provision for voluntary inclusions and this was first developed through the Good Practice Guide by the IPCC. There have been very significant improvements in reporting emissions and that work now makes it possible to think that we could encompass this in future agreements. It is the difficulty of developing the methodology that has held back, but we are seeking, as the UK—and this I can confirm—a more comprehensive treatment than was possible in the first commitment period under the Kyoto Protocol. The current negotiations are indeed considering the future treatment of the LULUCF in meeting commitments in developed countries. It is not that we have not thought about this, it is not that we have rejected it, it is because we have accepted the difficulties in methodologies, but we have been working on these matters and we are ourselves in favour of making the connections where we can.

Q227 Mr Chaytor: In terms of eligibility for REDD funding, what other criteria are you pressing for? If the international consensus was that an individual country simply did not have the institutions to guarantee transparent and honest use of any income through the REDD mechanism, should that country be eligible to receive REDD funding or should there not be some governance criteria in the agreement that we hope will be achievable?

Joan Ruddock: I think there have to be governance criteria.

Q228 Mr Chaytor: What are the governance criteria?

Joan Ruddock: Obviously we have to have transparency, we have to have monitoring, it has to be verified. It would make no sense for the international community to raise significant funds through whatever mechanism, and deliver to a country where, frankly, the money is paid over but the forest is still deforested. We know that will happen where there is poor governace or corrupt regimes or where they simply cannot handle the pressure from international consortia or where there is illegal activity and all of that. It can only work if, indeed, we have the overarching framework, but then underneath that we have done all the work to make it possible, that the recipients of the funds can receive and use appropriately in the interests of the whole international community. Getting these mechanisms in place is a long drawn-out task where we are working in many other fora, but we understand that it has to be done and that it will do no one any good if it is not done, so we are working very hard to do it.

Q229 Mr Chaytor: Specifically what are we pressing for in terms of the Government's criteria as part of the REDD mechanism?

Joan Ruddock: I am not sure that I am in a position to answer that in any detail. All I have been able to do is to set out to you what we believe are the main criteria. It is about transparency, it is being able to monitor, it is being able to verify, it is about co-operation with the international community. At the end of the day, it is being able to prove that if monies are made available then there is a reduction in deforestation, in degradation and, consequently, a reduction or a continued absorption of carbon. That is what is fundamental to the scheme.

Mr Foster: Perhaps I can add to that, and it relates as well to the previous answer Huw gave to Mr Horwood about the experiences that we have learned from FLEGT and how they inform us in terms of what we want to see out of an agreement on REDD, and the transparency of governance aspect that Joan has mentioned. There is a list of things that we are looking for as a department that we think will deliver for the people on the ground as a result of a REDD agreement. Clearly we have to build capacity in-country for law enforcement. It is not the sexy end of development work but it is an important end that we get involved with. We have gone through the point about dealing with land tenure and getting some degree of equity and clarity over land tenure. We need—and this is where our experience on the ground has enabled us to inform us of what we need—a real buy-in from the stakeholders, again in country, for them to put pressure on internally but also to buy into the process that is going to apply to a country project as a whole. Stakeholder participation has to be comprehensive on this. We need both a national verification system and an in-country system that works. With our experience we can advise and help in terms of devising those schemes, but we do think this needs a degree of independent monitoring of those schemes as well to address the very real concerns that Joan expressed. I

think the Committee went to Cameroon as part of this study and you may well have seen then how violations of the forestry agreements are published in newspapers as a way of flagging up exactly what has gone on. We have even encouraged radio announcements to be made that deal with the revenue that has been earned by particular user groups, so we are really making it transparent, encouraging the ownership at a local level of the scheme, and that gives you significant value at the grassroots.

Q230 Mr Chaytor: The issue we have not touched on is the question of sustainability of agriculture, sustainability of forest management. Huw, you mentioned that biodiversity issues are being dealt with outside of the REDD mechanism, but where does sustainable agriculture and sustainable forest management fit in? Is that outside or inside?
Huw Irranca-Davies: It is not directly within the REDD mechanism. Defra have commissioned a study on sustainable agriculture. Curiously the Secretary of State's role, which covers food security, helps with the advocacy behind this as well. This study on sustainable agriculture is looking at solutions useful for growing populations which respect the environment and do so in a carbon friendly way as well. It is not directly embedded within the REDD UNFCCC process, but it will inform the discussion on REDD, so we are quite hopeful on the outcomes of that. Just to make it clear, the group that Bob Watson is working with will be reporting to the UNFCCC, but it is under the Convention on Biological Diversity, so again it is feeding into as opposed to being directly within.
Mr Foster: Of course agriculture is important for us—the point I made earlier when I mentioned the impact on the poorest people with the food price hikes. It is important that you make the judgment that REDD is not seen in isolation and away from agriculture at all. It is all part of one deal that has to be agreed. In terms of what we have done to assist in food security, in January, Ivan Lewis, a fellow parliamentary under-secretary in DFID, helped launch the Global Partnership for Agriculture and Food Security which was calling on a range of stakeholders, both rich and poor nations, to get together with the NGOs, private sector, other financial institutions, to get a global partnership on dealing with the issues of food security, knowing of the clear linkage between agriculture and the risk of deforestation. DFID is spending some £400 million to support international agricultural research, and I am reminded that the term "agricultural research" also includes fisheries and it also includes forests as well. It is a whole entity that is being looked at.

Q231 Dr Turner: One problem we have not touched on this morning is illegal logging, which is highly significant in its impact. As a country we make our own contribution by being the world's third largest importer of illegal timber. Tony Blair said eight years ago that government procurement would prohibit the use of illegal timber, yet it still seems to happen. What can we do to tighten up and monitor government and local government procurement schemes to ensure that illegal timber does not leak in that way?
Huw Irranca-Davies: Dr Turner, you are right in what you say. We have mentioned already the issue around voluntary partnership agreements which are part of the way forward, but those countries involved in this have recognised the need for an EU approach to this as well. We recognise as a government that there is much more back through doing this through an EU approach. There is the issue of a product landing in one country in the EU and how, without a massive bureaucratic burden, you put incentives in place to achieve the right behaviour, but also the tracking of that and where it goes. We think that the due diligence approach is not only a workable model but an achievable one that will give the desired results of best practice that is currently out there in terms of sourcing and producing and putting products onto the market, but also not going down the line of a massive octopus of a mechanism that will be have huge burdens, that will be difficult to enforce, that may be impossible to enforce. This is what we are focusing on, and the due diligence approach is based on all operators who place timber on the market for the first time, regardless of the size of that timber import, regardless of the source of it. We think this is the right approach because it is compatible with WTO objectives as well and the parameters that they have set. We do think it is workable. It will need to be monitored, it will need to be effectively sanctioned as well, but we think it is the right and proportionate way to do it that rewards good behaviour and deals with that instance where timber is first placed onto the market. I think we are on the right way forward.

Q232 Dr Turner: The EU has set its face against criminal sanctions for importation of illegal timber. Do you think there is the possibility of us doing that on a unilateral basis?
Huw Irranca-Davies: To do it on a UK-only basis would cause immense difficulties because of the convoluted route of much of this timber and the way in which it not only lands but is then turned into other products and so on. I think it is much more appropriate to continue to work with other EU nations to get the regulation right at the European level as opposed to a UK unilateral level, because it brings immense difficulties of tracking and enforcement. I will put on my other hat here with the department. I also have responsibility within Defra for better regulation, and I want to make sure that what we put in place is workable not only for our European partners but for our suppliers as well.

Q233 Dr Turner: You clearly think that some sanction regime to back it up, preferably at an EU level obviously, is essential.
Huw Irranca-Davies: Yes. It does require some sanctions. As well as incentives, it does require some sanctions. The issue then becomes where you apply those sanctions. We take the approach as the UK Government that those sanctions should be decided at a Member State level, so we need sanctions that

are strong enough and proportionate as an incentive for change but which do not place undue burdens on the industry as well.

Q234 Dr Turner: There is clearly a corresponding incentive. Our market is preferentially open, I take it, to clean and sustainable timber.
Huw Irranca-Davies: Yes.

Q235 Dr Turner: So it is worthwhile taking the trouble to get it right.
Huw Irranca-Davies: Absolutely. We have to make this work, not only in our own interests but also in the interests of those countries who want to work with a better regulated, better driven system. We do need to get the system right. I know there are different opinions on this, but this approach says that when the timber lands in the UK market is the point at which we say the responsibility is clear. It is there. We are not trying to find three or four opportunities for doing it, but saying that it is there. That is it.

Q236 Joan Walley: Chatham House have repeatedly told us that here is a need to have mandatory building standards to require the use of legal and eventually sustainable timber. Is there anything to stop you from doing that right now?
Huw Irranca-Davies: That possibly takes it slightly beyond my own remit and my own department.

Q237 Joan Walley: We have joined-up government.
Huw Irranca-Davies: We do, indeed. Certainly our officials engage with CLG on this very point. I do not want to make a seat-of-the-pants policy decision here today—much as it is tempting.

Q238 Martin Horwood: I have to say I find this response a bit pathetic. If B&Q can do it, if lots of local authorities can do it, why on earth can the British Government not manage a sustainable procurement policy for timber?
Huw Irranca-Davies: I think we can. We undoubtedly can. We are already seeing it: the take-up of these voluntary partnership agreements; our approach on due diligence through the EU. We have been pretty much at the forefront of pushing this. We have set out our policy in the strategy for sustainable construction.

Q239 Joan Walley: Is that policy on sustainable construction mandatory?
Huw Irranca-Davies: Yes. Defra regards it as a mandatory standard, so yes is the answer to that.

Q240 Joan Walley: I hope you are not making it up as you go along.
Huw Irranca-Davies: No. The published strategy for sustainable construction is as it says on the tin. The question becomes: How much do you want to? I know members of this Committee will be as concerned as I am to make sure that the response to drive forward proper, legal timber imports is proportionate, does reward good practice that is currently out there.

Q241 Martin Horwood: Chatham House also told us that a certification scheme that effectively focused on illegal timber as a good proxy for sustainability was a perfectly viable policy objective. Have you met with them to discuss that?
Huw Irranca-Davies: I have been at various Chatham House events. From April our policy is moving up a gear and we will only be sourcing timber from sustainable and legal or FLEGT licensed timber sources, so we are moving progressively.

Q242 Martin Horwood: In terms of trying to implement an EU-wide certification scheme, are you pressing for that? It would simply say that timber-derived products in the European Union should be not from illegal sources. It does not seem that revolutionary to me.
Huw Irranca-Davies: We have been pushing very hard on the model I have described and will continue to do so, the idea that the first point at which timber is placed in the market should be the point at which we identify the responsibility. We think that is workable and it is achievable and it will deliver results. Now we continue to monitor that approach, but as to whether there is a different approach, whether it is the US approach or whatever, which itself is in its infancy and which itself has its detractors that say it may well not be workable, we think this one is workable. We also note that those suppliers, including those within the UK, see this as an incentive for good behaviour.

Q243 Joan Walley: Before we move on, I would like to understand this in my own mind. We have the regulations whereby we operate a points system, whereby there is weight given to different standards which the Government hopes will be achieved over the whole range of building and construction processes. As I understand it, that is what the Government is moving towards, which is slightly different from the recommendations we have had to this inquiry and previous inquiries from Chatham House, in respect of the significance of having a mandatory system of ensuring that timber used in construction is sustainable and legally sourced. It is not quite the thing to say, is it, that the Government requires this on a mandatory basis?
Huw Irranca-Davies: No. You are absolutely right.
Joan Walley: Thank you. I just wanted to clarify that for the record.

Q244 Martin Horwood: In terms of another aspect of sustainability, the demand for agricultural products such as palm oil and soya, these obviously themselves have quite a potentially powerful effect on land use and therefore on deforestation rates. What are you doing to assess and address the impact of the UK's own agricultural imports?
Huw Irranca-Davies: Defra currently has ongoing research on these indirect impacts of biofuels on land use change which will help consolidate some of the evidence that is already out there about deforestation, particularly with soya and palm oil production. We know that at the moment there are

around one billion people going hungry and there are issues around increasing food security to the poor as well as meeting the needs of this growing group of population. We estimate at the moment an increased demand for food of around 50% by 2030 and 100% by 2050, so the need to take an integrated approach towards this is essential, meeting food needs whilst also sustaining, I have to say, agreement with the natural resource base. We have commitments at the Millennium Development, goals that we need to meet on this, so currently in the UK, particularly in relation to the issue around palm oil, we are stepping up engagement with South East Asian governments and other stakeholders who have an interest in this, including the round table on sustainable palm oil. We want to try to bring production onto a more sustainable basis, both to deliver the greenhouse gas emissions but also other benefits as well. This is an immensely tricky problem, squaring the circle on those, but we are actively engaged in trying to do that.

Q245 Martin Horwood: I have to say nothing will undermine food security more comprehensively than climate change, I would have thought. Eliasch supports the development of sustainability standards for different agricultural commodities. Is that the British Government's approach now?
Huw Irranca-Davies: We do support standards for biofuels for transport, which I know is part of what he refers to.

Q246 Martin Horwood: That is right. Of course there is this EU-wide initiative to develop sustainability standards for the transport biofuels. Is it not pretty inconsistent though to have that standard for biofuel but not for the use of palm oil and soya food products?
Huw Irranca-Davies: The question of how we look at something like the Eliasch study and implement it is something we are looking at at the moment. We have not come to firm conclusions on it. I understand what you are saying about the potential difference in approach.

Q247 Martin Horwood: Just in principle, surely, it must be sensible. If you see the importance in terms of biofuels and the potential for land use to impact on forests of countries like Brazil and elsewhere, surely it must be completely logical to have the development of sustainability standards for food products that use palm oil and soya as well.
Joan Ruddock: Perhaps I could make a contribution here. I think there is a differing level of responsibility. One is a great historic situation with regard to food and food growth in developing countries that import into developed countries. However, when it comes to biofuels this is essentially a rather new technology for the EU. Having made a decision that we would get up to 10% of our road fuels from biofuel sources, we then had a particular responsibility to ask ourselves what we had done by making that decision. What impact are we going to have potentially on the displacement possibly of food crops in order to grow biofuel crops in order to supply a market that we ourselves have created? I think that was the imperative. Instead of coming from necessarily a much broader perspective and a wider global discussion, what happened here was that the EU took its own decision, clearly saw, particularly in the UK, that there were considerable consequences to be taken account of, and so the issues of sustainability in relation to developing a new market in biofuels became quite critical. I think rightly, we immediately spotted that and set in train with our fellow Member States a process whereby we could try to ameliorate or whatever was necessary. I am not contesting what you are saying about logic; I am simply saying that I think an imperative arose which we tackled, and that is why it looks as though this is confined to one area of work but the reasons why it happened I think are very obvious.

Q248 Martin Horwood: We have done a whole separate inquiry on transport biofuels. Given that that for whatever reasons did proceed faster and is proceeding faster, do you not now think there is that same imperative to look at the sustainability of all agricultural commodities, including those used for food products?
Huw Irranca-Davies: Understanding what you are saying about the principle, I have made reference to the work that we are doing now with South East Asian countries in the round table process, and we recognise the problem here of the biofuels and palm oil. We do see that the way forward is working through that, because, hopefully, through that we can provide those incentives for the whole industry to move.

Q249 Martin Horwood: I am struggling, though, to understand why you are so reluctant to say that in principle you should be in favour of sustainability standards for food products. Why do you not think that is just an easy thing to say: "Yes, we should be working towards that"?
Huw Irranca-Davies: Yes, I think it is an easy thing to say, but then how do you deliver—

Q250 Martin Horwood: Well, go on then, say it.
Huw Irranca-Davies: We are, but delivering it on the ground becomes perhaps at least as important.

Q251 Martin Horwood: One of the quick wins you could do is in public procurement, is it not? We have a bit of a theme today of just having a statement of public procurement. We have been told that some £2 billion is spent on food in the public sector each year. Would it be a good idea to develop sustainability standards for the procurement of food in the public sector, which looked at issues like palm oil and soya?
Huw Irranca-Davies: Certainly we are in agreement with the thrust again towards sustainability of food in the public sector. The Cabinet Office produced the report recently *Food Matters: Towards a Strategy for the 21st* Century. That recommended this development of a food-based standard towards public sector organisations offering healthier, more sustainable food, and catering services as well. The healthier food markers within another department

are being developed by the Department of Health, but that issue does have input from other government departments as well, including ourselves.

Q252 Martin Horwood: If it covers health and sustainability, are you doing the sustainability?
Huw Irranca-Davies: It will include both the health and nutritional side but also sustainability criteria as well. It has tended to reflect the practice in both voluntary and government sectors and it will consider whether it should be made compulsory by 2012. You are right, we are helping to develop the sustainability criteria.

Q253 Martin Horwood: When is that likely to be in force?
Huw Irranca-Davies: The HFM is going to be piloted during this year in some government departments to see how it works and how it can be made effective. We are also going on to bring together a meeting of stakeholders sometime in the spring, to put forward a vision of what we are trying to do with this scheme and get their engagement as well. So we will see some outcomes of that.

Q254 Joan Walley: I cannot resist saying that I wish that you would take a closer look at the way in which the Treasury and the PFI contracts with the NHS, despite the existence of the Sustainable Development Unit within the NHS, are not, as I see it, going along that line in terms of commitments in terms of policy. We have food probably from your constituency brought up to mine, when we should really be concentrating much more in the public sector on local procurement. I could not resist coming in on that. Moving to international development, one of the things that we saw when we were out in Cameroon was that, increasingly, money that has been earmarked in the past traditionally for environmental work—and that work would have been channelled through to various governance funds and so on—rather than being spent directly through the mission of the Foreign and Commonwealth Office or though international development is being subsumed within other budgets, be it the World Bank or the Congo Basin Fund. We are really quite curious as to how the commitment to all the values that we have been talking about in this session and the drivers to prevent deforestation can best be safeguarded when we are effectively handing over responsibility for the spending of funds to other organisations which might not have the same robust assessment of the standards for sustainability.
Mr Foster: The title of a whole select committee review on the effectiveness of aid. DFID funded projects, solely bilateral projects, would go through a full environmental impact assessment, and, yes, there would be very tight UK Government control and oversight over the particular project, whereas with parties such as the African Development Bank or the World Bank that you mentioned, the oversight function is delivered through a framework that we as the UK do not have direct control over. Best practice in the development world is that if you went through lots of small, bilateral programmes we have found them not only to be resource intensive for the donor country but also resource-intensive for the recipient country, but the benefit, of course, is that you do get direct control, whereas through the more multilateral groups you get more effective and efficient use of money that is granted in the forms of the donation, you get much wider coverage of your particular project because more money is banded together under one roof, but of course the downside to that is that there is a risk that you lose the direct control over the very aims that you have described. The key to this is encouraging a tight framework at the beginning, making sure that there is regular oversight to see how the programme is functioning against that. In both the programmes that you mentioned, the Congo Basin Forest Fund and the Forest Carbon Partnership Facility, the UK Government is represented on the governing body, so that HMG is actively involved in the oversight of those particular projects.

Q255 Joan Walley: When we were in Cameroon we saw that the CDC Group was involved in the construction of a dam that was going to be covering a large area of pristine rainforest and the indigenous people raised all kinds of issues about that. We wonder how you ensure that bodies like CDC, and ECGD for that matter as well, do not support projects that might run counter to our international environmental aims? It is of genuine concern to us.
Mr Foster: It is a good question to ask. With the CDC, separate from ECGD, DFID helps set the frameworks both on the investment policy and the investment code that the CDC have to operate under. We have set the framework but the CDC themselves, the board, will oversee the implementation, the governance by which it operates.
Joan Walley: It did not seem to be manifest when we were there.

Q256 Martin Horwood: They were flooding rainforest.
Mr Foster: I do not know the specific project in detail, but I will certainly make sure that I look into what you have had to say on that. On the Export Credit Guarantee Department, for transactions that relate to countries that are International Development Association recognised, that the World Bank would give preferential rates to, DFID would provide the ECGD with advice on sustainable lending practices. We will also give our comments to Her Majesty's Treasury on any recommendations they may have on lending through ECGD. We have our fingers in the pie on that front.
Joan Walley: I do realise you have a train to catch and I thank you very much indeed. At this stage I will draw the session to a close. Thank you.

Written evidence

Memorandum submitted by PEFC UK Limited

MEMORANDUM BY THE PROGRAMME FOR ENDORSEMENT OF FOREST CERTIFICATION SCHEMES

I. Background to PEFC and Recent Developments

1. *Introduction*

PEFC (Programme for the Endorsement of Forest Certification schemes) is an independent, non-profit, non-governmental organisation, which promotes the sustainable management of the world's forests through independent, third party certification. Sustainably managed forests are those whose management implements performance standards based on internationally agreed environmental, social and economic requirements that form the cornerstones of sustainability. Since its foundation in 1999 to better promote sustainable forest management amongst small scale forest owners, PEFC has become the world's largest forest management programme umbrella organisation for national forest certification schemes. It provides an open and transparent assessment and endorsement scheme for national forest certification schemes with the same high level of standards and credibility. Currently millions of tonnes of wood are being delivered to the processing industry and then on to the market place from over 210 million hectares of certified forests.

We note that the Committee is also planning to follow up on its 2006 report into sustainable timber. As PEFC gave both written and oral evidence to this enquiry and also submitted a detailed response to the final report in February 2006 which is attached as Appendix One, it might be interested to learn of recent developments to the PEFC programme since the 2006 timber inquiry was undertaken.

2. *Developments to the PEFC Programme since 2006*

Since 2006, in a drive for continual improvement, PEFC has made a number of changes to its programme:

- Relocation of PEFC's international headquarters from Luxembourg to Geneva.
- The development of a new strategic plan.
- The commissioning of a comprehensive Governance Review.
- The development of a new stakeholder forum offering membership to all stakeholder groups.
- The commissioning of a study of Social Criteria in public procurement policies.

2.1 Relocation of PEFC's International HQ

In January 2008, PEFC's international office relocated from Luxembourg to Geneva to enable the Secretariat to collaborate more closely with its stakeholders in international organisations, ENGOs and other partners.

2.2 The Development of a Ten-Year Strategic Plan

The PEFC strategic plan, summarising the organisation's core objectives was adopted by the PEFC Council General Assembly on 5 October 2007. The strategy will be reappraised annually and detailed plans for its implementation will be submitted to the PEFC Council's General Assembly as part of a regular strategic review. The strategy defines PEFC's mission statement, core values, beliefs, principles and sets out its strategic objectives for the next 10 years. In the interests of transparency, the document has been made publicly available on the PEFC web site and can be found at: http://www.pefc.org/internet/resources/5_1177_1719_file.2023.pdf.

2.3 Governance Review

The Governance Review, published in July 2008, outlines thirty nine recommendations aimed at further improving PEFC's effectiveness. The review will support the restructuring of the organisation's governance to ensure that PEFC meets the objectives set out in the 2007 Strategic Plan.

The review was conducted by London-based consultants ZYen, which convened an international Governance Review panel to undertake the review. The panel, chaired by Lord Lindsay, Chairman of UKAS (United Kingdom Accreditation Service), included Björn Andrén of Holmen Skog AB, John Dee of Planet

Ark, Hans Drielsma of Forestry Tasmania, Dr Maharaj Muthoo of the Hari Environment & Development Society, Frederick O'Regan of the International Fund for Animal Welfare, and Dirk Teegelbekkers of PEFC Germany.

A copy of the report is available on the PEFC web site at: http://www.pefc.org/internet/resources/5_1184_1877_file.2187.pdf

2.4 New Stakeholder Forum

One of the key recommendations which arose from the Governance Review was that PEFC establish a stakeholder forum to provide stakeholders, with whom PEFC has until now not been able to engage with directly, with rights and responsibilities within the organisation's governance process (including voting rights and the right to appoint board members). It is expected that this forum will become operational in November 2008 following approval by the PEFC's 2008 General Assembly, which will be held in October.

2.5 Social Criteria Study

In 2007, PEFC commissioned Chatham House to conduct a study into social criteria in public procurement policies. This report will examine the development of government procurement policies with regard to social issues in general; the social criteria which could be included in timber procurement policies; the extent to which these criteria are already included in practice; experience from including social criteria in other aspects of government procurement policy; and the interaction of timber procurement policies with WTO and EU procurement rules. Since several countries' procurement policies implicitly accept standards set by the voluntary certification schemes, these will also be examined. A draft version of the report is available at http://www.illegal-logging.info/item_single.php?item=document&item_id=634&approach_id=8.

II. PEFC Position on Carbon Trading

PEFC greatly welcomes the opportunity provided by the Select Committee of the Environmental Audit Committee to submit evidence to their inquiry into the timber trade and the future of carbon markets in protecting forests.

With the increasing emphasis on forestry as one of the tools towards mitigating the effects of global warming, most recently emphasised through the UNCCC Bali conference in December 2007, questions have increasingly been asked about the role of forest certification in clean development and carbon credit trading mechanisms.

PEFC believes that any credible mechanism of carbon credit trading must recognise and reward the carbon sink created by forests managed in a sustainable manner as demonstrated by independent credible certification. The PEFC sustainable forest management certification programme can provide the carbon trading market with the required confidence on sustainable forest management.

1. *Forestry represents important climate change mitigation potential*

In the context of global change and sustainable development, forest management activities play a key role through mitigation of climate change.[i] The forest mitigation options include reducing emissions from deforestation[ii] and forest degradation, enhancing the sequestration rate in existing and new forests, providing wood fuels as a substitute for fossil fuels, and wood products, as a substitute for more energy-intensive materials.

Therefore, forestry activities should also play a more important role in Kyoto mechanisms such as Clean Development Mechanisms (CDM)[iii] and Joint implementation (JI), and any new mechanisms post Kyoto. Forest owners and managers should be actively motivated through regulatory and voluntary carbon emission trading schemes[iv] to enhance or maintain the forestry mitigation of climate change. In addition to the current "project" approach applied to carbon credits, which is characterised by high transactional costs and prices,[v] the focus should be shifted towards developing simple and cost effective eligibility criteria for forest owners/managers to access and trade the carbon credits.

2. *Only sustainably managed forest should qualify for carbon credits*

The latest IPCC report states that "Forest mitigation strategies should be assessed within the framework of sustainable[vi] forest management, and with consideration of the climate impacts of changes to other processes such as the albedo and the hydrological cycle."[vii] The largest sustained mitigation benefit will be generated through; in the long term, sustainable forest management. Aimed at maintaining or increasing the forest carbon stock, while producing an annual yield of timber, fibre or energy from the forest, maintaining soil and water quality and biodiversity as well as maintaining and enhancing socio-economic functions of forests.

Therefore, sustainable forest management should be used as the eligibility criterion for carbon credits or any other payments relating to the reduction of deforestation; afforestation; forest management (maintaining or increasing stand-level or landscape level carbon density) or increasing off-site carbon stock in wood products.

3. *Sustainably managed forests must be demonstrated through certification*

Confidence on sustainable forest management is required and can be achieved through credible independent third party certification of forest management against consensus-based standards, developed through a multi-stakeholder process in an open and transparent manner.

Forest certification is currently the only mechanism that allows an individual forest owner/manager to demonstrate his/her adherence to sustainable forest management practices verified by an independent third party.

4. *PEFC guarantees credible forest certification*

At the moment approximately 10% of the global forest cover is already certified by a number of forest certification schemes.

Two thirds of the world's certified forest area is certified to schemes endorsed by PEFC making it the largest forest certification scheme. The PEFC scheme provides international consistency and guarantees that:

- all PEFC-endorsed schemes have been developed in open multi-stakeholder consensus based processes;
- forest management standards comply with international definitions of sustainable forest management as defined by intergovernmental processes;[viii]
- certification is carried out by third party certification bodies meeting ISO standards for conformity assessment and which are accredited by members of the IAF (International Accreditation Forum);[ix] and
- all scheme requirements as well as the procedures of accreditation and certification bodies and certification results are publicly available.

5. *Summary*

The PEFC Council is committed to working with others in the international community to design a carbon trading facility and other mechanisms, which motivate and reward those who manage their forests sustainably as a significant contribution to climate change mitigation.

30 September 2008

6. *References*

[i] IPCC (2007a) reports the latest estimates for the terrestrial sink for the decade 1993–2003 at 3,300 $MtCO_2$/yr with a biophysical mitigation potential of 5,380 $MtCO_2$/yr on average up until 2050 ("Climate Change 2007—Mitigation", the third volume of the Fourth Assessment report of IPCC).

[ii] Deforestation in the tropics accounts for accounts for 20% of global emissions of carbon dioxide, making it the second most important contributor to climate change after the combustion of fossil fuels and the largest source of greenhouse gas emissions in the developing world (Chatham House 2008, Briefing Paper: Forest Governance and Reduced Emissions from Deforestation and Degradation (REDD))

[iii] Although (September 2007) only one forestry project has been registered under the CDM, there are signs of increased activity in the sector and it is estimated that 13.6m carbon credits from 30 planned projects will reach the market before 2012 (IETA, Greenhouse Gas Market Report 2007)

[iv] The Ecosystems Marketplace estimates that, conservatively, 13.4m tCO_2 were traded in 2006 through voluntary carbon emission trading schemes, and it projects vigorous growth rates in coming years (Hamilton et. Al 2007 in IETA, Greenhouse Gas Market Report 2007)

[v] Some analyses have estimated very high prices for forestry projects, up to EUR 30 per tCO_2 in voluntary markets. Broader data collection suggests that these are atypical cases, and that average prices are much lower. The Ecosystem Marketplace estimates average prices of USD 8.04 per tCO_2 in retailing and USD 3.88–5.31 per tCO_2 in wholesale transactions (Hamilton *et al* 2007, IETA Greenhouse Gas Market Report, 2007)

[vi] Under the Marrakesh Accords (2001) of the Conference of Parties 7 (COP7) for the implementation of Kyoto, the sustainability creates a part of the "forest management" definition: "Forest management is a system of practices for stewardship and use of forest land aimed at fulfilling relevant ecological (including biological diversity), economic and social functions of the forest in a sustainable manner"

[vii] ("Climate Change 2007—Mitigation", the third volume of the Fourth Assessment report of IPCC)

[viii] UN Conference on Environment and Development (UNCED) in Rio 1993, ATO (African Timber Organisation), ITTO (International Tropical Timber Organisation, MCPFE (Ministerial Conference on Protection of Forests in Europe), Near East Process, Lepaterique Process, Criteria & Indicators for sustainable forest management in Dry-zone Africa, Tarapoto Proposal: Criteria & Indicators for Sustainable Management of Amazonian Forests.

[ix] IAF (International Accreditation Forum), www.iaf.nu

APPENDIX ONE

PROGRAMME FOR ENDORSEMENT FOR FOREST CERTIFICATION SCHEMES (PEFC) UK LTD—RESPONSE TO HOUSE OF COMMONS ENVIRONMENTAL AUDIT COMMITTEE REPORT ON SUSTAINABLE TIMBER

The following is a response from PEFC to the House of Commons Environmental Audit Committee report on Sustainable Timber which was published on Tuesday 24 January 2006.

Background

PEFC (Programme for the Endorsement of Forest Certification schemes) is an independent, non-profit, non-governmental organisation, which promotes the sustainable management of the world's forests through independent, third party certification. Sustainably managed forests are those whose management implements performance standards based on internationally agreed environmental, social and economic requirements that form the cornerstones of sustainability. Since its inception in 1999, PEFC has become the world's largest forest management programme, an umbrella organisation for national forest certification schemes; providing an open and transparent assessment and endorsement scheme for national forest certification schemes with the same high level of standards and credibility. Currently millions of tonnes of wood are being delivered to the processing industry and then on to the market place from over 186 million hectares of certified forests.

PEFC greatly welcomed the opportunity provided by the Select Committee of the Environmental Audit Committee to submit written evidence to their Inquiry on Sustainable Timber in September 2005 and were pleased to be invited to submit oral evidence to the Committee on 1 November 2005. Indeed, the opportunity to give evidence in person to the Committee was valued so highly that the organisation's General Secretary, Ben Gunneberg, travelled over from Luxembourg to give evidence and was accompanied by a member of the PEFC Main Board (its Council) Michael Clark and a Board member of PEFC UK, Martin Gale CBE.

Momentum to promote the use of sustainably produced products is growing around the world. Wood products are widely acknowledged to have a better environmental record than competitor materials such as concrete and steel in sustainable construction. As a uniquely renewable material, wood has the lowest energy consumption and the lowest level of carbon dioxide emissions than most widely used building materials. However, we firmly believe that forestry must be conducted in a sustainable manner, with due regard to ensure a balance is maintained between the three main pillars of sustainable forestry management; economic, social and environmental issues and that many challenges remain if we are to eradicate illegal timber.

We therefore welcome the Environmental Audit Committee's decision to devote attention to this issue and recognise the efforts of the Secretary of State for Climate Change and the Environment and the Department of Environment, Food and Rural Affairs efforts to procure legal and sustainable timber through the CPET process. PEFC welcomes any initiative that assures the legality and sustainability of forest management and its resultant products. We welcome the Committee's acknowledgement (9) that forest certification systems have a role to play in ensuring legality and sustainability and entirely agree that the area of certified forest needs to increase from its current level of 10%.[ix]

We also fully endorse the report's declaration (paragraph 2 Conclusions and Recommendations and paragraph 11 of the main report) that "For natural and ancient forests to survive and function properly in providing livelihoods and protecting the planet's climate and species, the final goal must not just be a legal timber trade but also a sustainable timber trade".

However, there are a number of points in the report on which we would like to comment; firstly on some points that were made in the Conclusions and Recommendations summary and then on some of those in the main body of the report.

Paragraph 8 Conclusions and Recommendations [Paragraph 28 of Main Report]

> "In our view, FSC is ideally positioned to expand its role and work to raise awareness of sustainable timber and related issues, if increased resources were made available"

The Committee appears to be advocating direct government funding of the FSC programme. PEFC considers that CPET, in conjunction with global and regional certification schemes, offers the most effective methods of establishing sustainable forest management. Therefore if the government decided to make funding available to raise awareness of sustainable timber and related issues, it would surely be more equitable to fund, on a transparent basis, all credible certification systems.

Paragraph 16 Conclusions and Recommendations [Paragraph 42 of Main Report]

> "Germany is the only Member State that is actively considering legislation to ban the import of illegal timber. Furthermore, some Member States, Finland and Portugal for example, are reported to have actively opposed measures that would improve VPAs' effectiveness during negotiations. Finland's pulp industry is heavily dependent on impost from the Baltic States and Russia of which estimates are that between 10% and 25% of imports to the EU are illegal".

We have sought the advice of our Finnish colleagues on the Finnish position of the FLEGT process and they advise that the Finnish government considers the FLEGT process to be a valuable means of helping to combat the trade in illegal wood. Finland works in active cooperation with the EU and NGOs to find solutions to this global problem. The first line of attack in preventing entry of illegal timber is a robust Chain of Custody process, where the origin and legality of wood can be verified. Finland's approach is described above. We would also respectfully advise that the Committee appears to be misinformed as to the position of the German government on considering legislation to ban the import of illegal timber. The current position as we understand it, is outlined in more detail in the response to paragraph 56 below;

Paragraph 16 Conclusions and Recommendations [Paragraph 56 of Main Report]

> "This is the type of legislation that was proposed by the German Government in March 2005. The Virgin Forests Act if it came into force in Germany, will prohibit the possession and marketing of timber and timber products that were illegally logged in virgin forests"

The Committee may well be aware that the mentioned paper was a Ministry draft, which had not been presented to either the cabinet or parliament and was not pursued as a result of the change of government in Germany in November 2005.

Paragraph 22 Conclusions and Recommendations [Paragraph 75 of Main Report]

> "Sustainable development has three equal strands; social, environmental and economic. It is therefore of great concern to us that the Government's current interpretation of the EU rules governing procurement do not allow social considerations to be taken into account when awarding a procurement contract. This means that the assessment of the various forestry schemes did not include an assessment of how social issues, such as the rights of indigenous people, are dealt with. The FSC is currently the only certification system that does this comprehensively".

We respectfully agree to differ with the Committee's conclusion that only the FSC scheme deals comprehensively with social criteria. We provided the Committee with supplementary evidence on indigenous people and social issues in the PEFC certification scheme on 28 November 2005.

We are disappointed that the Committee does not consider that the PEFC scheme deals with this area satisfactorily. Appendix One seeks to further clarify the way these issues are covered by the PEFC standard.

Paragraph 25 Conclusions and Recommendations [Paragraph 81 of Main Report]

> "Whilst we support the approval of the FSC by CPET and are supportive of its work in assessing a variety of schemes we do have some concerns regarding the endorsement of PEFC. As an umbrella scheme it encompasses a large number of different national schemes and it is unclear whether all of these achieve a common minimal standard. When asked what minimum standards PEFC requires of members during our evidence session no answer was forthcoming. Since then PEFC has written to us setting out how various standards are applied in different parts of the world by its members. This however still begs the question of why PEFC does not have in place a clear set of principles and standards that apply to all members. This would ensure that—from wherever PEFC certified timber was sourced—it would come with a guarantee of what exactly it represents".

We were puzzled to learn that we had been asked a question regarding "what minimum standards PEFC requires of its members" since we cannot find such a question in the transcript of evidence, neither can we find any evidence of failing to respond to the Committee's questions. When asked about the safeguard mechanisms for PEFC endorsement and quality assurance Mr Gunneberg made it clear in his evidence that the PEFC process was very rigorous and that the endorsement process takes a minimum of nine months,

while the longest assessment to date had taken one and a half years. Any national certification scheme which applies for endorsement by PEFC has to meet 244 "minimum" requirements. The report is then drafted by expert independent consultants as to how they fulfill these requirements, it has to be approved by all PEFC-endorsed member schemes. The full report is then published on the website www.pefc.org including the 244 minimum requirements and how the scheme has met them. In order to further clarify the position, at the Committee's request, Mr Gunneberg sent additional documentation to the Committee on 28 November 2005 to further clarify PEFC's minimum requirements. Therefore, to state that PEFC requires there are no minimum standards which have to be met is misleading.

Paragraph 18 of Main Report

> "Its response to WWF's report highlights Sweden and Finland as the major importers of illegal logs due to heavy reliance on Russian timber . . ."

As the Finnish national forestry certification scheme (FFCS) is endorsed by PEFC we have sought their comments on the WWF report. They advise that the Finnish timber industry is firmly committed to tackling the issue of illegal logging and that leading Finnish forest product companies have already implemented certified tracking systems to verify the origin of their wood. These systems are proving successful and are recognised by WWF as constructive voluntary measures in promoting responsible procurement in the Russian business community. Industry believes that it is important to promote measures taken to tackle the issue of illegal logging. Furthermore all of the Finnish companies active in Russian wood sourcing are developing forest certification schemes within the relevant forest areas in Russia, several with the full cooperation of WWF International.

Paragraph 67 of Main Report

> "Throughout our inquiry the FSC was held up as the "gold standard" of forest certification both for the extent of stakeholder involvement in its processes and the degree to which it takes into account environmental and social considerations. Indeed Greenpeace told us that "the FSC is the only internationally recognised forest certification scheme on the market that can give rigorous and credible assurance that timber products come from well managed forests". However, Simon Fineman from Timbmet told us that while FSC is the gold standard "it is very difficult for certain areas of the world to aspire to".

With only 6% of the world's forests being certified to date, and most of the vulnerable and endangered forest areas excluded from this modest achievement, the more relevant focus should be on extending the certified area rather than highlighting a single scheme that to date does not attract the majority preference. Advantage should be taken of the various certification schemes, which can be implemented according to national/regional circumstances, thereby more effectively achieving the common wish of greater coverage of the world's forests with the benefit of forest certification.

Paragraph 68 of Main Report

> "The PEFC (then the Pan European Forestry Certification) Scheme was set up in 1999 when it was seen by some as a response by the European timber industry angered by what it saw as interference from environmental groups and retailers. However it has also been pointed out to us that FSC's approach was not particularly appropriate for small forest owners, particularly in Nordic Countries and this is one of the issues that PEFC addressed".

There may well be negative perceptions about the reasons that PEFC was established in 1999 but we sought to make clear in our response to question 228 that the organisation was originally established as many small scale forest owners, often owning less than five hectares, (of which there are some 15 million in Europe) considered themselves not being well represented within a growing market for certified wood. In order to enable them to participate in such a market, it was imperative that certification costs should not put these benefits beyond their reach. The development of national and regional group certification models enabled such participation in a credible manner and by coming together under one umbrella—such national schemes were able to market their products under one brand without incurring the costs of promoting individual national brands. At the same time this helped avoid a proliferation of labels onto the market, which could only serve to create confusion amongst consumers.

We see PEFC and FSC as complementary certification schemes which deliver choice to the market both for producers and consumers. Mr Gale was later asked by Mr Challen (Q240) "who was asking for choice and where the demand came from for another certification scheme". He replied that the demand came from people who actually purchase forestry products—for example, the publishing and printing industries had expressed a wish for a choice of certification schemes.

Perhaps it is worth quoting from the Publishers Association's Environmental Awareness Policy—Guidelines and Information to demonstrate their views on certification:

> "The PA encourages all members to pursue responsible and environmentally friendly procurement policies in accordance with their best judgment and such practicalities as product specification and availability.
>
> The PA will not endorse one particular certification process to the exclusion of other legitimate international, regional or national regimes, nor offer any advice or opinion which could intentionally or otherwise lead to commercial disadvantage of companies using recognised and legitimate certification schemes. To do so would be in breach of competition law.
>
> When supporting Sustainable Forest Management as an important environmental, economic and social objective which should guide and influence industrial procurement policies, the PA maintain an "inclusive" approach to certification."

Mr Gale added that the commercial world "does not like a monopoly". These points might perhaps have become clearer had more industry organisations been given the opportunity to provide oral evidence.

The Committee may be interested to learn that since the endorsement of the SFI scheme, PEFC endorsed systems around the globe, now account for more than 186 million hectares, an area larger than the combined forest area of all 25 member countries of the European Union.

Paragraph 71 of Main Report

> "Failing any intervention we would hope to see the approach and standard used by FSC becoming the target for all other certification schemes, such as PEFC".

PEFC acknowledges that FSC have made a tremendous contribution to sustainable forestry certification. However, there is a fundamental difference in the approach between FSC and PEFC, in that PEFC uses internationally recognised norms for standard setting, accreditation and defining sustainable forest management,. Whereas FSC has chosen an alternative approach for these three elements. PEFC has chosen to adhere to governments' and society's definition of sustainable forest management as defined by the intergovernmental processes on sustainable forest management following the Rio World Summit, FSC has elected to construct its own definition.

PEFC has chosen to rely on internationally recognised norms for standards setting processes defined in the International Standards Organisation (ISO) documents (such as ISO Guide 59). Whereas FSC has chosen to develop its own approach, PEFC relies on the credibility of accredited certification being delivered through government appointed or commissioned national accreditation bodies (all members of the International Accreditation Forum), FSC has chosen to be its own accreditation body.

We are therefore surprised by the Committee's recommendation and would ask you to seriously reconsider it with its attendant implications to other sectors in the standards world.

Paragraph 72 of Main Report

> "Of the above CSA, SFI and MTCC are now all members of the PEFC assembly, the scheme's governing body despite its scheme not currently meeting the required standard for endorsement".

We were asked about the difference between a PEFC member and a PEFC endorsed scheme during our evidence session to the Committee (Q249) and provided an explanation of the differences. We further sought to clarify the difference between a PEFC member and a scheme that had been endorsed by the PEFC Council in our supplementary submission of 28 November 2005. We regret that the Committee is still unclear about the position of the MTCC, which is a member whose scheme has not been endorsed, we would refer the Committee back to the supplementary evidence submitted in November.

Paragraph 80 of Main Report

> "Lastly, there are concerns that although many—if not all—of the schemes may be proof of legality they are in fact endorsing many unsustainable practices. For example Greenpeace states that the PEFC endorses the Finnish Forest Certification Scheme (FFCS) (which itself submitted a memorandum to the Committee) despite its logging of some of the few remaining Finnish old growth forests on disputed land that is being claimed as belonging to the Sami people".

As PEFC explained during our oral evidence session on 1 November, we do not have a mandate to speak on behalf of a sovereign national government but as the Finnish Forest Certification Scheme is one of the national schemes endorsed by PEFC, we have sought their views on this section of the report.

They advise that all major forest related questions in Finland are dealt with at both local and national level through broad-based multi-stakeholder participatory planning processes. All loggings of Mets—hallitus, including the sites, amounts and practices used, are decided in the Natural Resource Planning process in which all local stakeholders, even individual members of the public, are entitled to participate. Environmental groups are of course also encouraged to participate.

Forest stakeholders in Finland are strongly committed to forest protection. As a country dependent on sustainable forest management, such protection needs to be state of the art. The responsible management of diverse forests complements strict protection measures. More forests are strictly protected in Finland than in any other European country.

In Upper Lapland, depending on the municipality, between 30% to 40% of productive forests are strictly protected from forestry. According to the Finnish Forest Research Institute, over 70% of low-productive forests in Upper Lapland are protected.

In Finnish Lapland there are some 500,000 hectares of over forests more than 150 years old which are strictly protected. Nature protection programmes were established in Finland in the 1930s. As a natural continuation of the numerous existing protection programmes, comprehensive old-growth forest protection programmes have been continued to be enforced in the 1990's. These programmes were developed though multi-stakeholder involvement in a process where scientists/ecologists, environmental groups, private and public forest owners, environmental authorities and industry worked together to achieve this.

In 1996, this multi-stakeholder collaboration resulted in the comprehensive Programme for the Protection of Old-Growth Forests in Finland which brought a total of 293,000 hectares under strict protection. Regrettably, Greenpeace declined to participate in this process.

In addition, Metsähallitus (the state logging company) recently undertook to protect over 100,000 hectares of forest in Northern Finland as a result of a dialogue process with Finnish conservation organisations, based on ENGO maps. Out of the protected 100,000 hectares 55,000 are productive forests. All 100,000 hectares will now be accorded permanent protection.

The Sámi in Finland have a legally guaranteed collective right to enjoy their culture, to confess and practice their religion and to use their language. They are also recognised as a national minority, and reindeer herding is recognised as part of the traditional Sámi culture. The Finnish Constitution safeguards the Sámi right to develop their culture as an indigenous people. According to the Reindeer Husbandry Act, the state lands in the Sámi homeland may not be used "in a manner that may significantly hinder reindeer herding".

A Sámi Parliament Act requires the authorities, including Metsähallitus, to consult the Sámi Parliament on all extensive and important measures which may affect the Sámi's position as indigenous people and have a bearing on the municipal land use planning or the management, use, leasing or transfer of state lands in the Sámi homeland. The Forest and Park Service Act requires that the management, use and protection of natural resources in the Sámi homeland is harmonised with the Sámi culture.

It is true to say that some Sámi politicians have challenged the state's ownership of the lands in the Sámi homeland. The state has undertaken various studies to determine the rights of the Sámi to the land, the waterways and the natural resources, and has made proposals to develop the administration. The latest proposal from the Ministry of Justice in Finland should be published within the next few weeks. However, it is worth noting that the Sámi Parliament is far from unanimous on the issue of land ownership. In August 2005 more than a third of the 20 Members of the Parliament withdrew their support of the land ownership campaign led by the Chairman of the Parliament.

Finally we would like to respond to the question posed in Paragraph 81: of the main report

"what would happen if it became clear that one or more of the national schemes were not conforming to DEFRA's sustainability or legality standards. Would the PEFC be removed from CPET's approval list as a whole, and if so what is the value of approving it rather than the schemes individually?"

We have been advised by DEFRA that if any one of the 21 national member schemes fails to demonstrate conformance to the current CPET requirements, then PEFC will lose their status as proof of sustainability and legality and will be demoted to Category B—proof of legality only. Our national member schemes have worked hard to change their systems in order to comply (even those who do not export to the UK and therefore have little to gain by satisfying UK Government procurement demands) and at present are co-operating fully with DEFRA's chosen consultants, ProForest to demonstrate such compliance.

As to the suggestion that it might be more appropriate for DEFRA to evaluate the 21 national schemes individually, it is clearly a matter for DEFRA to respond but we would respectfully suggest that this would add a considerable amount of cost to the CPET project and could result in a plethora of sustainable forest management labels, which would only serve to confuse end users.

APPENDIX 1

THE PEFC COUNCIL REQUIREMENTS FOR "SOCIAL" ISSUES (JANUARY 2006)

1. Coverage of Social Issues

Social issues together with economic and environmental issues are considered as three main components of sustainable development and particularly sustainable forest management. These three main elements have become guiding principles for UN Conference in Rio, as well as following inter-governmental processes promoting sustainable forest management.

The social issues cover the whole range of issues which are connected with:

(a) forest management impact on local people;

(b) health and safety, forest workers rights, etc;

(c) importance of forestry for local economy and rural development; and

(d) impact of forest management on cultural and spiritual heritage, etc.

2. Social Issues in PEFC Scheme

The PEFC Council deals with all these issues at several levels:

(a) requirements for forest management;

(b) local's people and other interested stakeholders participation in forest management standard setting;

(c) consultation with local people and other interested stakeholders by forest owner/manager; and

(d) local people and other interested stakeholders participation in the certification process.

The social issues have to be;

(a) addressed in national forest management standards;

(b) all local stakeholders (including indigenous peoples, local communities, other local peoples or workers) can participate in the development of those forest management standards; and

(c) all stakeholders can also participate in the certification audit and submit comments or complaints to the relevant certification body if they feel that the certification criteria have not been met.

3. PEFC Requirements for Forest Management Relating to Social Issues

Criteria and Indicators of intergovernmental processes promoting sustainable forest management

The Annex 3 of the PEFC Council Technical Document (PEFC TD), chapter 3.1.1, 3.1.3, 3.1.4 and 3.1.5 require that the certification criteria shall be based on the criteria and indicators defined by Intergovernmental processes for sustainable forest management, namely:

(a) The Ministerial Conference on the Protection of Forests in Europe (MCPFE),

(b) The Montreal Process,

(c) African Timber Organization (ATO),

(d) International Tropical Timber Organization (ITTO) Criteria & Indicator for sustainable management of natural tropical forests,

(e) Tarapoto Proposal: Criteria & Indicator for the sustainable management of Amazonian Forests,

(f) Lepaterique Process, Lepaterique Process

(g) Regional Initiative of Dry Forests in Asia,

(h) Criteria & Indicator for sustainable management in Dry-zone Africa,

All these processes are based on UN Conference in Rio (1992) and consider social issues as an integral part of sustainable forest management.

For example criterion 6 of Pan European Criteria developed under MCPFE (Lisbon 1998) covers "Maintenance of other socio-economic functions and conditions" (www.mcpfe.org).

Criterion 6 of the Montreal Process Criteria covers *"Maintenance and enhancement of long-term multiple socio-economic benefits to meet the needs of society".* (www.mpci.org)

Criterion 7 of the revised ITTO criteria and indicators for the sustainable management of tropical forests cover "Economic, social and cultural aspects", in particular *socioeconomic aspects, cultural aspects and community and indigenous peoples' rights and participation* (www.itto.or.jp).

OPERATIONAL LEVEL GUIDELINES DEFINED BY INTERGOVERNMENTAL PROCESSES FOR SUSTAINABLE FOREST MANAGEMENT

3.2.1 Pan European Operational Level Guidelines (PEOLG)

Annex 3 of PEFC TD, chapter 3.1.2 and 3.5 require that national certification criteria shall be compatible with the current PEOLG. The compliance with the PEOLG is then required by the PEFC Council Minimum Requirements Checklist (GL2/2005).

PEOLG includes the following requirements under criterion 6 "Maintenance of other socio-economic functions and conditions":

6.1 (a) Forest management planning should aim to respect the multiple functions of forests to society, have due regard to the role of forestry in rural development, and especially consider new opportunities for employment in connection with the socio-economic functions of forests.

6.1 (b) Property rights and land tenure arrangements should be clearly defined, documented and established for the relevant forest area. Likewise, legal, customary and traditional rights related to the forest land should be clarified, recognised and respected.

6.1 (c) Adequate public access to forests for the purpose of recreation should be provided taking into account the respect for ownership rights and the rights of others, the effects on forest resources and ecosystems, as well as the compatibility with other functions of the forest.

6.1 (d) Sites with recognised specific historical, cultural or spiritual significance should be protected or managed in a way that takes due regard of the significance of the site.

6.2 (a) Forest management practices should make the best use of local forest related experience and knowledge, such as of local communities, forest owners, NGOs and local people.

6.2 (b) Working conditions should be safe, and guidance and training in safe working practice should be provided.

6.2 (c) Forest management operations should take into account all socio-economic functions, especially the recreational function and aesthetic values of forests by maintaining for example varied forest structures, and by encouraging attractive trees, groves and other features such as colours, flowers and fruits. This should be done, however, in a way and to an extent that does not lead to serious negative effects on forest resources, and forest land.

3.2.2 *ATO/ITTO principles, criteria and indicators for the sustainable forest management of African tropical forests (ATO/ITTO PCI)*

Annex 3 of PEFC TD, chapter 3.1.3 and 3.5 require that national certification criteria elaborated, amended or revised incountries covered by the ATO/ITTO process shall be compatible with ATO/ITTO PCI. The compliance with the ATO/ITTO PCI is then required by the PEFC Council Minimum Requirements Checklist (GL2/2005).

Principle 4 According to the importance and intensity of forest operations, the FMU manager contributes to the improvement of the economic and social well-being of workers in the FMU and of local populations.

Criterion 4.1 The rights and responsibilities of workers in the FMU and local populations are clearly defined, acknowledged and respected.

Indicator 4.1.1 The legal and customary rights of local populations in respect to the ownership, use and tenure of the forest land and resources are clearly defined, acknowledged and respected.

Sub-indicator 4.1.1.1 The provisions of the forestry law on rights of use and ownership are known and respected.

Sub-indicator 4.1.1.2 The rights of use within village boundaries are respected.

Sub-indicator 4.1.1.3 As much as possible, local populations have control over the forestry operations on their forest land and resources, unless they freely delegate this control to a third party.

Sub-indicator 4.1.1.4 Sites of religious, cultural or particular economic value are clearly identified in collaboration with local populations and protected by those in charge of forest management.

Sub-indicator 4.1.1.5 Local populations receive compensation for the use and application of their traditional knowledge and techniques in the forest area. This compensation is freely and formally accepted prior to the commencement of operations.

Indicator 4.1.2 The modalities of access to natural resources are clearly defined and respected by all.

Sub-indicator 4.1.2.1 The provisions of the forestry law on the modalities of access to resources are known and respected.

Indicator 4.1.3 All relevant labour code regulations are applied.

Sub-indicator 4.1.3.1 The labour code and other related regulations (collective agreements, rules of procedure, memoranda, etc) are respected.

Sub-indicator 4.1.3.2 Wages and social benefits are comparable to national norms.

Indicator 4.1.4 Information is provided on and all stakeholders are fully informed of their rights and duties.

Sub-indicator 4.1.4.1 Targeted sensitization campaigns are conducted.

Indicator 4.1.5 Damages caused are compensated according to the norms in force or after negotiation.

Sub-indicator 4.1.5.1 Specialized services are consulted and thei decisions respected.

Sub-indicator 4.1.5.2 The procedure to compensate for the damage caused to cultivated crops is respected.

Criterion 4.2 The concessionaire encourages the participation of local populations present in the FMU in the management of forest resources.

Indicator 4.2.1 The concessionaire sets up ad hoc bodies for consultation and negotiation with local populations.

Indicator 4.2.2 The procedure for dialogue and the resolution of conflicts is functional both between stakeholders and within each stakeholder body.

Sub-indicator 4.2.2.1 There is efficient and effective communication between stakeholders.

Indicator 4.2.3 All stakeholders participate in the control of natural resources management on the basis of a protocol accepted by all.

Indicator 4.2.4 Procedures for consultation with populations during the establishment and demarcation of forest concession boundaries are respected.

Indicator 4.2.5 Mechanisms for applying sanctions in the case of rule violations are in place and agreed by stakeholders.

Criterion 4.3 All stakeholders consider the share of benefits derived from forests to be satisfactory.

Indicator 4.3.1 The forest concessionaire ensures that the populations living within or near the FMU receive a portion of the revenue generated by the exploitation of the FMU.

Indicator 4.3.2 Local communities living in or near the harvested forest area benefit preferentially from opportunities in employment, training and other services.

Sub-indicator 4.3.2.1 The percentage of local people recruited is higher than that of non-locals, given equal competence.

Sub-indicator 4.3.2.2 The concessionaire maintains a recruitment and training policy for young people originating from local communities.

Sub-indicator 4.3.2.3 The concessionaire makes provision for and accepts trainees in its production units.

Indicator 4.3.3 In accordance with the importance and impact of the forest operations at the local level, the concessionaire contributes to the development of the local economy.

Sub-indicator 4.3.3.1 The concessionaire encourages the creation of small and medium-sized enterprises related to its forestry activities.

Sub-indicator 4.3.3.2 The concessionaire encourages local sub-contracting activities.

Sub-indicator 4.3.3.3 With the support of the concessionaire, local populations develop food-crop farming activities (gardening, stock-breeding, fish-breeding, etc).

Criterion 4.4 According to the importance and impact of the forestry operations, the concessionaire contributes to improving the health and education of local populations.

Indicator 4.4.1 The concessionaire takes preventive measures to minimize any professional hazards in relation to forestry activities.

Sub-indicator 4.4.1.1 Working conditions are in accordance with the labour code and/or ILO recommendations.

Sub-indicator 4.4.1.2 There are rules of procedures and memoranda that are widely circulated to remind employees about the observance of safety norms.

Sub-indicator 4.4.1.3 Appropriate safety gear and equipment are distributed and worn by employees in their various working environments.

Sub-indicator 4.4.1.4 Employees are regularly submitted to medical examinations in accordance with national norms.

Indicator 4.4.2 Health-related aspects of living conditions are improved for employees and their families.

Sub-indicator 4.4.2.1 The concessionaire takes measures to ensure adequate public hygiene and health (eg the provision of safe drinking water and hygienic latrines, the disposal of household refuse, etc).

Sub-indicator 4.4.2.2 Health centres exist, have qualified staff living on-site, and function at a satisfactory level.

Sub-indicator 4.4.2.3 The provision of medicines to dispensaries is ensured.

Sub-indicator 4.4.2.4 There is a store well-stocked with canned and fresh foodstuffs (particularly those high in proteins to substitute for bush meat).

Indicator 4.4.3 The health conditions of local populations are improved as a result of the forestry activities.

Sub-indicator 4.4.3.1 Local populations have access to dispensaries.

Sub-indicator 4.4.3.2 Educational programs on nutrition, including for pregnant or breast-feeding women, are organized.

Sub-indicator 4.4.3.3 The concessionaire sponsors programs on vaccination and sensitization campaigns on AIDS and sexually transmitted diseases.

Indicator 4.4.4 The concessionaire contributes to the basic education of local populations and workers present in the FMU, in accordance with the contractual provisions established consistent with national norms.

Sub-indicator 4.4.4.1 Children in local communities have access to the concessionaire's school infrastructure.

Compliance with national legislation

Annex 3 of PEFC TD, chapter 3.2 requires national laws, regulations, programs and policies to be respected in forest management and certification. Certification schemes may not contradict legislation and any apparent violations of the legislation shall be taken into consideration in internal and external audits.

This PEFC requirement also cover the legislation relating to social issues (recognition of local people's rights, workers rights, health and safety, etc.).

Compliance with International labour Organisation (ILO) Conventions

Annex 3 of PEFC TD, chapter 3.3 requires that the core Conventions of the ILO, (outlined below) as amended, whether ratified or not, will be respected in the implementation of SFM.

The core ILO Conventions are as follows:

No 29: Forced Labour, 1930

No 87: Freedom of Associations and Protection of the Right to Organise, 1948

No 98: Right to Organise and Collective Bargaining, 1949

No 100: Equal Remuneration. 1951

No 105: Abolition of Forced Labour, 1957

No 111: Discrimination (Employment and Occupation), 1958

No 138: Minimum Age for Admission to Employment, 1973

If the country has ratified the core ILO Conventions, their requirements can be considered to be covered by the legislation and need not be specifically addressed in the national certification criteria. In cases where the core ILO Conventions are not ratified, their requirements shall be considered and taken into account in the certification criteria.

Annex 3 of PEFC TD, chapter 3.3 also states that the ILO Code of Practice on Safety and Health in Forestry Work is recognised as a helpful document, which is recommended to be considered when developing national and regional certification criteria.

4. Local People and Other Interested Stakeholders Participation in the Standard Setting Process

Annex 2 of PEFC TD requires the certification criteria as a part of forest management standards (SFM standards) to be developed in open, transparent, participatory and consensus based standard setting process.

The PEFC Council is unique in that it is the only global certification system in the world, which insists on and only recognises forest certification carried out against national standards (Annex 3 of PEFC TD, chapter 3.1) and requires the standard setting process to be carried out at national or at any sub-national level (Annex 3 of PEFC TD, chapter 3.1).

Requirements for standard setting and especially the necessity for it to be carried out at national (or sub-national) level ensures that all local stakeholders, including indigenous peoples, local communities, other local peoples or workers can fully participate in and contribute to the development of certification criteria.

Local peoples, communities, indigenous peoples and workers views are considered along with all other stakeholder views and evidence consensus is required for formal approval of forest management standards (Annex 3 of PEFC TD, chapter 3.5.1).

Annex 3 of PEFC TD, chapter 3.5.1 also requires that standard setting process shall contain an appeal mechanism for the impartial handling of any substantive and procedural complaints.

5. Consultation with Local People and Other Interested Stakeholders by Forest Owner / Manager

5.1 *Pan European Operational Level Guidelines (PEOLG)*

Annex 3 of PEFC TD, chapter 3.1.2 and 3.5 require that national certification criteria shall be compatible with the current PEOLG. The compliance with the PEOLG is then required by the PEFC Council Minimum Requirements Checklist (GL2/2005).

PEOLG requirement 6.2 requires:

6.2 (a) Forest management practices should make the best use of local forest related experience and knowledge, such as of local communities, forest owners, NGOs and local people.

5.2 *ATO/ITTO principles, criteria and indicators for the sustainable forest management of African tropical forests (ATO/ITTO PCI)*

Annex 3 of PEFC TD, chapter 3.1.3 and 3.5 require that national certification criteria elaborated, amended or revised in countries covered by the ATO/ITTO process shall be compatible with ATO/ITTO PCI. The compliance with the ATO/ITTO PCI is then required by the PEFC Council Minimum Requirements Checklist (GL2/2005).

Principle 4 According to the importance and intensity of forest operations, the FMU manager contributes to the improvement of the economic and social well-being of workers in the FMU and of local populations.

Criterion 4.1 The rights and responsibilities of workers in the FMU and local populations are clearly defined, acknowledged and respected.

Indicator 4.1.1 The legal and customary rights of local populations in respect to the ownership, use and tenure of the forest land and resources are clearly defined, acknowledged and respected.

Sub-indicator 4.1.1.3 As much as possible, local populations have control over the forestry operations on their forest land and resources, unless they freely delegate this control to a third party.

Indicator 4.1.4 Information is provided on and all stakeholders are fully informed of their rights and duties.

Sub-indicator 4.1.4.1 Targeted sensitization campaigns are conducted.

Indicator 4.1.5 Damages caused are compensated according to the norms in force or after negotiation.

Sub-indicator 4.1.5.1 Specialized services are consulted and their decisions respected.

Criterion 4.2 The concessionaire encourages the participation of local populations present in the FMU in the management of forest resources.

Indicator 4.2.1 The concessionaire sets up ad hoc bodies for consultation and negotiation with local populations.

Indicator 4.2.2 The procedure for dialogue and the resolution of conflicts is functional both between stakeholders and within each stakeholder body.

Sub-indicator 4.2.2.1 There is efficient and effective communication between stakeholders.

Indicator 4.2.3 All stakeholders participate in the control of natural resources management on the basis of a protocol accepted by all.

Indicator 4.2.4 Procedures for consultation with populations during the establishment and demarcation of forest concession boundaries are respected.

Indicator 4.2.5 Mechanisms for applying sanctions in the case of rule violations are in place and agreed by stakeholders.

6. Local people and other interested stakeholders participation in the certification process.

Annex 6 of PEFC TD, chapter 4 requires that the audit evidence to determine the conformity with the forest management standard shall include relevant information from external parties (eg government agencies, community groups, conservation organisations, etc.). This provides an opportunity for all local stakeholders, including indigenous peoples, local communities, other local peoples or workers to participate in the certification process and their views being considered during the audit.

Annex 6 of PEFC TD, chapter 4 requires that summary of certification reports are being public and all stakeholders can, without any submit a comment or complaint to the relevant certification bodies if they are of the opinion that the certification criteria have not been met (Annex 3 of PEFC TD, chapter 6.2 and Annex 6 of PEFC TD, chapter 4).

7. References

Annex 3 of PEFC TD—Basis for Certification Schemes and their Implementation (www.pefc.org)

Annex 6 of PEFC TD—Certification and Accreditation Procedures (www.pefc.org)

GL 2/2005—PEFC Council Minimum Requirements Checklist (www.pefc.org)

Pan European Operational Level Guidelines (PEOLG) (www.mcpfe.org)

ATO / ITTO PCI (www.itto.or.jp)

Montreal Process Criteria for SFM (www.mpci.org)

ITTO Criteria and Indicators for SFM (www.itto.or.jp)

Memorandum submitted by the Royal Society for the Protection of Birds (RSPB)

Introduction

1. The RSPB considers that human-induced climate change poses the biggest long-term threat to global biodiversity. To avoid a catastrophe for wildlife, anthropogenic greenhouse gas emissions need to be cut hard and rapidly, with global emissions peaking within the next ten years and then declining steeply.

2. In any international regime to combat climate change, forests have a vital part to play. Emissions from deforestation, mainly in tropical countries, account for about one fifth of all emissions, roughly the same as the USA or China. Uptake of carbon dioxide by forests is, after the oceans, the most important natural mechanism for removing carbon dioxide from the atmosphere. By conserving and enhancing forests we can both decrease carbon dioxide emissions to, and increase removals from, the atmosphere on a huge scale.

(i) The RSPB therefore strongly supports the initiative by Papua New Guinea and the Coalition for Rainforest Nations to build into the international, post-2012 regime a mechanism for reducing emissions from deforestation and degradation in developing countries (REDD).

(ii) Recongising that tackling emissions from deforestation is likely to cost in excess of US$10billion per year, we consider that the mechanism should either be market-based or market-linked.

(iii) If a REDD regime is to begin in 2013, considerable effort (and money) must be expended on building capacity in developing countries with forests. At present, far too little money is forthcoming. Despite vocal support for REDD development, particularly from the UK government, rhetoric has not been followed up by new funding. We believe there is a need to review the UK's funding plans for REDD activities, to ensure that these are commensurate with the scale of the challenge, timely, and managed in a way appropriate to the needs of recipient countries.

(iv) REDD has now been under negotiation in the UN Climate Change Convention process for nearly three years; the negotiations are well advanced and no nation has opposed the REDD concept. There is thus a strong case for fast-tracking REDD in the international process.

3. Finally, the RSPB has concerns about the certification of voluntary carbon offsets from UK forestry. It would be difficult to determine carbon "additionality" in relation to such activities, ie to be confident that they would not have happened without funding from the sale of offsets.

The Role of Financial Mechanisms

4. We consider that financial mechanisms have a key role to play in protecting and enhancing natural forests, depending upon where such mechnisms are located and how they are constructed. We see mechanisms established jointly by governments in the form of international regimes as the way forward, because these provide the scale of both geographical coverage and finances needed to do the job, whilst potenially providing a regulatory framework to guard against perverse outcomes. We do not see private markets as playing a significant role, although they might help in some niche areas.

5. Currently, the pre-eminent prospective mechanism for protecting and enhancing forests is Papua New Guinea's initiative in the UNFCCC on reducing emissions from deforestation and degradation in developing countries (REDD). Negotiations on this subject are well advanced and, since the 13th conference of parties (COP13) to the UNFCCC in Bali last year, includes not only deforestation but also enhancement of carbon stocks (potentially afforestation, reforestation and sustainable management) and probably also a compensating of rewarding countries that are not currently deforesting significantly, such as Surinam, Guyana and the Democratic Republic of Congo. The REDD regime thus has the potential to cover all aspects of tropical forestry and we therefore focus on this subject in this submission.

6. Currently there are three main types of financial mechanism being discussed for REDD: a market-based approach, a market linked approach and a fund. The market-based mechanism, advocated by Papua New Guinea and the Coalition for Rainforest Nations would involve nations setting a baseline, based on historic emissions, and generating credits for any reduction below the baseline which could be traded in the Kyoto market, or its successor. At the opposite extreme is a fund, proposed mainly by Brazil, into which developed countries would pay and the money would be disbursed to countries that reduced their emissions, again below a baseline. There are several market-linked proposals that would use money generated by a carbon market but would not be directly linked to it. For example, a developed country emission allowances might be auctioned and the proceeds used to pay for reducing emissions from deforestation.

7. For us, a key factor is the choice of a financial instrument is whether it is likely to deliver money on the scale necessary to address the drivers of deforestation worldwide. Stern estimated that tropical deforestation could begin to be addressed at a cost of US$10 billion per year, although many consider this figure to be conservative. To deliver finance on this scale, we some no option but to employ either a market-based or a market linked mechanism. We do not envisage a voluntary fund delivering anywhere near this amount of money.

The Environmental and Social Risks and Benefits of Using Financial Mechanisms

8. There are potential environmental and social risks associated with all of the mechanisms mentioned above and any agreement should contain safeguards for biodiversity and both indigenous and local people.

9. In market-based approaches the most commonly perceived risk, expressed by many indigenous peoples groups, is that entrepreneurs will purchase their forest from under the local people and then try to throw them out, as has happened so often in the past. This is a reasonable fear, although not one that would necessarily occur due to implementation of an international REDD regime. The type of market-based system envisaged by most governments would involve trading between states, as in the Kyoto Protocol's emissions trading scheme, rather than trading between private commercial entities. Whether there was domestic market would be entirely up to individual governments. For example, Papua New Guinea is a main proponent of a market based approach but has said that it might take the revenues from an international market and put them in a trust fund; which would fund local communities to conserve their forests in perpetuity. A state-based trading scheme does not therefore necessarily presuppose any particular domestic mechanism, which could comprise a fund, a trading scheme, straightforward regulation or a combination of these. The EU, for example, is a participant in the Kyoto Protocol's cap and trade scheme but it has chosen to achieve some emission reductions via the EU emissions trading scheme, some by regulation and much by various different forms of mechanisms in member states.

10. International funds offer the prospect of fairly and equitably delivering money to where it is needed but, in practice, have a very poor record of doing so. Also, governments have a poor record of giving substantial sums of money to voluntary funds, certainly not US$10billion per year for many years into the future. A hybrid approach, such as a fund using money raised by auctioning emission allowances might get around this problem but the difficulty in establishing a fair and equitable distribution system would remain to be solved.

The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

11. A clear potential difficulty of any market-based approach to REDD is that it may lead to the market in emission reduction allowances from developed countries being flooded with cheap, offsetting forestry credits. This would not only have the effect of reducing the amount by which developed countries reduce their emissions at home (and hence put at risk their timely transition to a low carbon economy) but it would not serve REDD well either. To displace lucrative drivers of deforestation, such as conversion to oil palm plantations, a high carbon price of at least $20 or $30 per tonne carbon dioxide is required, more with a biofuels boom.

12. There are several ways of avoiding this difficulty. The simplest is for developed countries to take on substantial emission reduction targets of which a proportion could be met using REDD credits. For example, if developed countries were to take on 40% emission reduction targets by 2020 from 1990 levels, in line with climate science (as expressed in the IPCC's fourth assessment report) then 5 or 10% of this target

might be achieved using REDD credits. This type of arrangement might be formalised in several different ways, as outlined by Papua New Guinea and some NGOs, notably Greenpeace and the Centre for Clean Air Policy.

13. Fund-based options, including market-linked ones, generally avoid this difficult although they can present different problems, as outlined above.

The World Bank's Forest Carbon Partnership Fund

14. We see the FCPF as filling a potentially useful role in building developing country's capacity to implement a REDD regime, in advance of a REDD regime coming into force in 2013. In setting up the fund, the Bank consulted widely with both developing countries and NGOs, including the RSPB, although we suspect that they might not have done so as thoroughly had the German Presidency of the G8 insisted on it.

15. However, we have a number of reservations about the FCPF. The first is that the sums of money available are small in relationship to the scale of the task. When split amongst the many countries that could be eligiable for REDD, there will be only a few million US dollars available for each country spread over a period of four years, far too little to build capacity adequately in the largere countries such as Brazil, Indonesia or the Democratic Republic of Congo and arguably not even enough for small countries. We are encouraged that the amount of funding looks as though it may increase by a factor of four (to about $1 billion) but even that is barely sufficient.

16. We are also concerned that much of the money available from the Bank may be in to form of concessional loans. Whilst such loans may be suitable for the activities that the Bank usually funds, and we can understand concerns by developed countries about giving money to emerging economies, loans are poorly suited to capacity building.

17. We are also concerned about the overall modus operandi of the Bank and, indeed, the UK's faith in it to deliver environmental objectives. The Bank is set up as, and operates as a bank. It has considerable experience in making loans, with a good return to its investors countries, and has generally good, or at least well developed, relationships with finance ministries Worldwide. Like all banks, however, it is less good at giving money away and has poor or non-existent relationships with environment and forestry ministries. As a consequence, many such ministries in developing countries dislike and distrust the Bank. A number of major forested countries have expressed to us a clear preference for direct bilateral assistance from the UK where, in contrast, DfID has a good record of forest-related assistance.

The Role of Technologies in the Verification of Land Use Change Credits

18. It is generally agreed in the UNFCCC negotiating group on REDD that remote sensing has a key role to play in assessing deforestation, where forest has been clear cut, although it is universally recognised that remote sensing must be accompanied by "ground-truthing", ie ground-based measurement.

19. Since Bali, however, degradation has been included in the REDD discussions and, at present, remote sensing is probably not adeaquate for assessing degradation which would depend considerably on ground-based measurement. There is the prospect of assessing degradation remotely but, for the near future, accompanied by a significant amount of measurement on the ground. It should be stressed that the difficulties associated with ground measurements are often overexagerated and that once a system is established it is not onerous to maintain it.

The Congo Basin Forest Fund

20. Whilst we welcome the Government's introduction of a special fund for the Congo Basin, the amount of money in it is inadequate (£40 million over three years). The Congo Basin countries are a special case amongst the rainforest nations, in that most of them are not deforesting significantly at present, many of them are very poor with weak governance and, consequently, need significant amounts of capacity building if they are to successfully implement REDD. Indeed, it is questionable whether many of the nations would be in a position to implement REDD as early as 2013. A reliable means therefore needs to be found for building capacity over the medium term.

21. With some of the northern South American countries, such as Guyana and Surinam, many of the Congo Basin countries are not deforesting significantly at present, although there has been significant degradation in some. They thus pose a difficulty for a REDD regime in that a system that pays for reducing emissions from deforestation might encourage nations with low deforestation rates to increase them in order to be paid for stopping again. A means of avoiding this perverse incentive might be simply to artificially skew the baselines of such countries to indicate a fairly high deforestation rate, even when there is not. If done in an open and transparent way, this approach might well work but other solutions are still being sought.

The Interaction of Carbon Finance Mechanisms with the Timber Trade

22. Since the major climate change meeting in Bali last year, REDD now includes not just deforestation but also enhancement of carbon stocks and hence afforestation (plantations) and reforestation (restoration of natural forest). Therefore, assuming that REDD is market-based or market-linked, there will inevitably be and interaction with the timber trade—because REDD will cover all, or nearly all, tropical timber production.

23. If successful, a REDD regime should increasingly slow and, eventually halt, the extraction of timber from natural forests, and hence any trade in it. However, Timber could still be produced from plantations. In many parts of the World, especially South East Asia, natural forests are destroyed not so much for the value of their timber but as part of the business model for oil palm production. The trees are cut and sold to provide "upfront" cash for establishing oil palm plantations whilst millions of hectares that are already clearcut or degraded remain unused. The situation is often similar, if more complex, in Latin America where soya production often displaces cattle ranching which displaces forest. The relative costs of different activities are evident in such processes: soy is lucrative, cattle ranching less so and, at present, natural forests are almost worthless. An effective REDD process would value forests at a higher level that the activities that currently destroy them.

EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan

24. We support the EU initiatives on illegal logging and both we and our BirdLife Partners in developing countries have participated actively in them. However, they are limited in their scope because of inadequate funding and so, whilst they have both helped to prevent illegal logging and helped local communities, they have made limited inroads on the problem as a whole.

25. To be successful, REDD would have to halt illegal logging as a necessary step on the way to halting emissions from deforestation.

Carbon Offsets in UK Forests

26. The RSPB has concerns about the certification of voluntary carbon offsets from UK forestry. It would be difficult to determine carbon 'additionality' in relation to such activities, ie to be confident that they would not have happened without funding from the sale of offsets. The RSPB considers that a key climate change issue in the UK is reducing emissions from society at source, rather than afforestation in the UK, to mitigate a small proportion of the UK's greenhouse gas emissions.

27. The UK's importation of timber and wood products from environmentally unsustainable managed sources outside the UK, including high conservation value boreal and rainforests, is of great concern. This is for reasons of irreparable biodiversity loss and damage, as well as the climate change impacts of such forest loss and degradation.

28. The RSPB welcomed the UK Government and devolved administrations' initiative at the 2002 World Summit on Sustainable Development on timber procurement, forest conservation and certification. We have concerns about the quality and robustness of the subsequent definition of environmental "sustainability" of timber that has been developed. Using "CPET" guidance, for the UK, country and local government procurement. This concern also includes the impact on the environmental quality of UK woodland management, and its credibility of proposals for simplified statements of sustainability under CPET "Category B" for timber/wood product specifiers and procurers. Meeting the UK Forestry Standard must be a minimum requirement for CPET Category B compliance, backed up by robust auditing by Forestry Commission and Forest Service Northern Ireland.

29. The devolved forestry policies of the UK must continue to promote sustainable multi-benefit forest management, including through EU co-financed land management grants. All new woodland planting must be appropriately located, designed and managed to enhance, not damage, important biodiversity, such as wetland sites, semi-natural grassland, wader areas, peatland, heather moorland and coastal dune systems. Existing woodlands—native woods and forestry plantations—must also be managed to protect and enhance priority biodiversity.

30. The RSPB supports the removal of recent forestry plantations from restorable important semi-natural habitats, such as blanket and raised peat bogs and lowland heathland. This is to meet the UK's and devolved administrations' country, UK, EU and International biodiversity commitments for wildlife species, habitats and designated nature conservation sites.

31. It is imperative that rigorous standards and guidance for UK forestry are developed, to ensure that the carbon offsets industry and carbon customers have the proper level of quality assurance for both carbon and sustainability. RSPB would expect the development of any standards and their certification to be open, and inclusive—reflecting environmental as well as economic and social interests. This could build on the existing mandatory UK Forestry Standard and the voluntary UK Woodland Assurance Standard (which meets international sustainable forest management criteria).

32. Carbon standards for UK land management must be based on robust science, ensure genuinely additional carbon benefits, ensure that any future banked carbon is safeguarded, be transparent and independently verified by accredited auditors, be consistent with sustainable forest management policy and practice, meet biodiversity policy and practice needs.

33. The RSPB does not accept that so called "compensatory" planting in the UK is an appropriate mechanism to increase the UK's woodland area for climate change mitigation reasons. Targeted grants for high quality woodland expansion and management in the UK should be strategically employed, assisting with climate change adaptation for native woods, instead of a project-based "compensatory" planting approach.

34. We would welcome the introduction of forest management measures in the UK to reduce unnecessary green house gas emissions from UK forest operations, and help improve sequestration and storage, when consistent with the principles of sustainable multiple benefit forestry including biodiversity conservation.

October 2008

Memorandum submitted by Ben Caldecott, Head of the Environment & Energy Unit, Policy Exchange, Dominick Spracklen, Institute for Climate and Atmospheric Science, University of Leeds, Renton Righelato, World Land Trust

Summary

- Stopping climate change in a deforesting world is virtually impossible.
- Avoided deforestation and peatland destruction can be dramatically cheaper than the other carbon abatement options available, with costs ranging from US$0.1–US$30 per tonne of CO_2 equivalent.
- Despite their significance in terms of GHG emission reductions, avoided deforestation and peatland loss are not rewarded under the Clean Development Mechanism (CDM) created under the 1997 Kyoto Protocol. Afforestation and reforestation projects are covered, but have been discouraged by the complex rules and high costs involved under the CDM and to date account for only one of a thousand CDM projects.
- 36–45% of credits in the voluntary market are generated through forest management and this market is an important financing mechanism for avoided deforestation.
- The backbone of anti-deforestation financing should come from the carbon market but an international fund should also be set up specifically to correct market failures.
- There is a legitimate concern that REDD credits could flood the market and destabilise the carbon price in existing markets. To prevent this, stricter overall emission reduction targets are required to ensure REDD credits are additional to fossil fuel reductions.
- Adequately protecting biodiversity will require finance streams in addition to those that are available from the carbon market. To achieve this forestry carbon finance mechanisms can be coupled with Payments for Environmental Services (PES).
- Mechanisms must be in place to ensure that forest communities and indigenous groups are consulted and compensated.
- Accurately quantifying the GHG emission reductions from avoided deforestation is vital for a proposed market in REDD credits to function. Over the past ten years there have been substantial technological advances in remote sensing techniques which now allow for an accurate quantitative analysis of deforestation at the national level.

Main Text

1. Every year 12 million hectares of tropical forest are cleared by human activity. This accounts for approximately 20% of total anthropogenic greenhouse gas (GHG) emissions. If we cannot stop deforestation, it will "use up" one third of the GHG emissions that humanity can emit during the 21st century, while still avoiding dangerous anthropogenic climate change (ie CO_2 equivalent kept below 450 parts per million). Stopping climate change in a deforesting world is therefore virtually impossible.

2. By placing a value on the carbon stored in forests, deforestation can be stopped. In contrast to most other climate change mitigation options, deforestation can be slowed with little new technological innovation and comparatively small amounts of financial support. Avoided deforestation and peatland destruction can be dramatically cheaper than the other carbon abatement options available, with costs ranging from US$0.1–US$30 per tonne of CO_2 equivalent (see Figure 1 in Caldecott *et al*, 2008). In contrast, climate change mitigation through biofuel subsidies can be expensive, with the 5% biofuel target under the Renewable Transport Fuel Obligation (RTFO) costing from US$133–US$292 per tonne of CO_2 equivalent. Biofuel targets and subsidies can also create incentive mechanisms that encourage the destruction of carbon and species rich ecosystems (Righelato and Spracklen, 2007).

3. Efforts to conserve tropical forests have been aptly described as a "long defeat". Isolated fragments have been set aside as protected areas, but these are vulnerable to regional desiccation and climate change and elsewhere destruction proceeds unabated. Despite their significance in terms of GHG emission reductions, avoided deforestation and peatland loss are not rewarded under the Clean Development Mechanism (CDM) created under the 1997 Kyoto Protocol. Afforestation and reforestation projects are covered, but have been discouraged by the complex rules and high costs involved under the CDM and to date account for only one of a thousand CDM projects (UNFCCC, 2008).

4. In June 2001, the Parties to the Kyoto Protocol decided to exclude avoided deforestation—meaning a rate of deforestation below the "business as usual" baseline—from the first Commitment Period (2008–12). There were several reasons for this. First, there was concern that the so called "flexible mechanisms" of the Kyoto Protocol (ie CDM and Joint Implementation) would allow developed countries to reach their targets without stringent controls on domestic fossil fuel use. Avoided deforestation was expected to yield large reductions in emissions at relatively low cost, potentially providing all the reductions required under Kyoto with no need for countries to control domestic emissions. There was also concern that avoided deforestation would distract attention from what was seen as the real business of reducing emissions from fossil fuel use. Second, there was strong opposition from some developing nations worried about the potential loss of sovereignty and constraints on their future development. For example, Brazil was in favour of carbon credits being earned for reforestation but not avoided deforestation. The sub-text was that Amazonian deforestation was out of government control so targets to reduce deforestation would be difficult or impossible to meet. Third, methodological and technical issues made accurate accounting for emission reductions from forest lands very difficult. Many developing countries had little or no capacity to monitor deforestation or ensure that forests were protected permanently.

5. An underlying constraint was the notion—already embedded in the thinking of the Global Environment Facility (GEF), which finances only the "incremental costs" of actions to yield global rather than national benefits—that avoided deforestation was already in the interests of forested nations (because of national benefits received from ecosystem services). Simply transferring wealth to countries to pay for things that those countries should be doing anyway was unattractive to many potential donor governments.

6. The failure of Kyoto mechanisms to stimulate a market in carbon credits from protection of forests and peatlands has not prevented a voluntary carbon market from making significant progress, in financial terms and in driving innovation and the development of best practices. Thus 36-45% of credits in the voluntary market are generated through forest management and this market is an important financing mechanism for avoided deforestation (Harris, 2006). Verified Emission Reduction (VER) prices from forestry activities (US\$0.5–45/tCO_2e) compare favourably with the costs of projects from the energy sector (US\$0.5–20/tCO_2e).

7. Important early actors in the voluntary carbon market were non-profit NGOs, which introduced many forest protection and restoration projects. Most such projects are aimed at conserving biodiversity, but they also mitigate climate change by preventing deforestation and encouraging reforestation. These are supported by private and corporate donations, and from the sale of voluntary carbon offsets. Examples include: projects financed by the Royal Society for the Protection of Birds in Indonesia (100,000 hectares) and Sierra Leone (75,000 hectares); projects supported by the World Land Trust in South America and Asia (around 150,000 hectares), plus a joint initiative with the government of Paraguay to protect a million hectares of dry Chaco forest; a million-hectare forest restoration project supported by The Nature Conservancy in Brazil; and a project involving Fauna and Flora International, local government and private companies which aims to reduce deforestation by 85% in 750,000 hectares of Indonesia to avoid the emission of 3.3 million tonnes of CO_2 annually. Numerous private trusts have also bought land for conservation.

8. The voluntary market is also driving interest and investment in ecosystem services. In March 2008, Canopy Capital, a private equity firm, announced a deal with Guyana's Iwokrama International Centre for Rainforest Conservation and Development, to fund conservation and research in Iwokrama's 370,000 hectares of forest in exchange for the right to market the forest's ecosystem services. In the absence of detailed figures for all such activities worldwide, it is estimated that charities and their for-profit allies have protected at least 100 million hectares and are responsible for restoring up to a million hectares per year.

9. The IPCC estimates that deforestation could be cut by 50% with a carbon price of US\$20/tCO_2 equivalent. This would reduce emissions by about 2 billion tonnes of CO_2 equivalent per year (Gullison et al., 2007). Financing a significant reduction in deforestation is estimated to require at least US\$10–15 billion annually and there is some controversy over the best funding mechanism to raise this finance. The key difference between a carbon market with Reduced Emissions from Deforestation and Degradation (REDD) credits and an international non-market fund is that the former aims to harness the power of the carbon market to oppose deforestation, whereas the other relies on donations to a fund from which grants will go to countries that make a convincing show of reducing deforestation. Market failures cannot be ruled out and may undermine the impact of the REDD system, while the other scheme is vulnerable to parsimony (ie will donors be willing to give enough?), moral hazard (ie will developing countries misrepresent their levels of success?) and inefficiency (ie can international technobureaucratic mechanisms spend money wisely and well enough to achieve good results?). Given the nature of the risk that is being addressed, getting the answer right is not unimportant.

10. The poor record of intergovernmental non-market funding mechanisms such as the GEF is hardly reassuring, and donor governments may not see another such fund as the best use of tax-payers' money. On the other hand, the carbon market can mobilise abundant financing at low political cost, with more than US$30 billion traded in the carbon market in 2006 alone under the Kyoto Protocol and the EU ETS (Hasselknippe H & Rine K, 2007). One disadvantage of a market-based system is that it may allow some countries, with efficient institutions and lower marginal costs, to dominate the REDD market. Another is that market failures under REDD may well prove to be just as significant as they are in other market-based systems. An obvious conclusion is that the backbone of anti-deforestation financing should come from the carbon market but an international fund should also be set up specifically to correct market failures. Such a fund should be designed to synergise with other governmental and non-governmental technical assistance and financing flows in areas that also oppose deforestation.

11. Under a market based system, forestry carbon credits could either be fully fungible with existing carbon markets, that is freely tradable with fossil fuel emission reductions, or could operate through a separate system. Fungible avoided deforestation or REDD credits could limit the incentive to reduce emissions from fossil fuels. There is a legitimate concern that REDD credits could flood the market and destabilise the carbon price in existing markets. To prevent this, stricter overall emission reduction targets are required to ensure REDD credits are additional to fossil fuel reductions.

12. Correctly designed, forest and peatland carbon credits and markets could be powerful tools to protect important ecosystem services and biodiversity, in addition to reducing greenhouse gas emissions. In particular, avoided deforestation mechanisms offer an unparalleled opportunity to support large areas of tropical forest. However, adequately protecting biodiversity will still require finance streams in addition to those that are available from the carbon market. To achieve this forestry carbon finance mechanisms can be coupled with Payments for Environmental Services (PES). PES is a mechanism where the providers of ecosystem services are financially compensated by those that benefit from the service. Such schemes already exist, for example in Costa Rica.

13. Forest carbon markets will provide a significant financial resource to developing countries with forest resources. There are potential problems, particularly where there is danger of corruption and mismanagement of funds. In addition, where there is no clear land ownership and where forest communities have limited representation there is a risk of local people becoming sidelined. Mechanisms must be in place to ensure that forest communities and indigenous groups are consulted and compensated.

14. Accurately quantifying the GHG emission reductions from avoided deforestation is vital for a proposed market in REDD credits to function. Over the past ten years there have been substantial technological advances in remote sensing techniques which now allow for an accurate quantitative analysis of deforestation at the national level. For example, in Brazil (INPE, 2005) and India (FSI, 2004) remote sensing of forest cover is operational on a routine basis. There is a wide range of satellite sensors that are now available and operate at a variety of resolutions and coverage (Achrad et al., 2007). Coarse resolution (300m—1 km) imagery can be used to survey global forest cover trends ensuring consistent reporting across national borders and allow monitoring for potential leakage between forested regions. Higher resolution images (10-50 m) can be used for detailed monitoring in regions with active deforestation. A recent study using a probability-based sampling approach employing low and high resolution satellite data, quantified the error in global deforestation rate at less than 6% (Hansen et al., 2008). In addition to monitoring forest area, calculating GHG gas emissions also requires the change in carbon stocks to be known. Forest inventory measurements can be extrapolated using regression-based models to give forest biomass carbon maps (Gibbs *et al*, 2007). Above-ground carbon stocks can also be estimated from aerial imagery.

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October 2008

Memorandum submitted by the Timber Trade Federation

Timber Trade Federation Update

Since the EAC 2006 report the UK TTF have now made environmental due diligence mandatory for all members and are now in the process of fully implementing this. All members are either expected to implement the Responsible Purchasing Policy or an equivalent system to meet the requirements of the TTF's Environmental Code of Practice.

Since the EAC report the Code of Conduct has also been strengthened. The TTF itself, if given due cause, can instigate an investigation into any member, without relying on a complaint from another member. The UK TTF remains committed to the principle of introducing EU legislation to address illegal logging and set a fair, level playing field in the market place.

The TTF continues to work with the financial support of the Department for International Development to support activities in raising the awareness of illegal logging and initiating business to business improvements. These funds have been invaluable to our work. The funds have supported market reports demonstrating the increased purchases of certified timber products. Several roadshows in producing countries have brought about direct improvements with suppliers, greater networking with other industry federations, as well as buyers increasing their commitment to act responsibly.

Executive Summary

Forests play important roles for local communities, biodiversity as well as carbon storage. The careful management of forests can play a vital role in mitigating climate change in a number of ways; reducing emissions from deforestation and forest degradation, enhancing the sequestration rate in existing and new forests, providing wood fuels as a substitute for fossil fuels, and wood products as a substitute for more energy-intensive materials. The introduction of a carbon fund that is dedicated to forestry projects is a welcomed addition but incentives to implement such projects must be reviewed. Additionally ensuring the funds are targeted at the people who are in greatest need will be the challenge under the proposed initiatives such as Reduced Emissions from Deforestation and Forest Degradation (REDD). Carbon funds are one part of the jigsaw, consequently it must work in conjunction with other national forest programmes and initiatives such as FLEGT as well as existing certification schemes to ensure sustainable forest management that benefits local communities and biodiversity.

1. *The role financial mechanisms might have in helping to address emissions from land use change*

Forests can play a vital role in a number of ways; reducing emissions from deforestation and forest degradation, enhancing the sequestration rate in existing and new forests, providing wood fuels as a substitute for fossil fuels, and wood products as a substitute for more energy-intensive materials. The causes of deforestation and degradation are due to several reasons; illegal logging, exploitation, poor governance and conversion. Forests play important roles for local communities and biodiversity as well as carbon storage.

Kyoto introduced Clean Development Mechanisms (CDM) and Joint implementation (JI). However, forestry has yet to play a leading role within these mechanisms but could provide a cost effective mechanism for mitigating climate change. The Land Use, Land Use Change and Forestry (LULUCF) initiative has had little take up, partly due to the perceived restrictive CDM requirements. The carbon storage function of forests is not accounted for in the first commitment period of Kyoto. We hope that in the post 2012 arrangements carbon credits from the LULUCF and/or Reduced Emissions from Deforestation and Forest Degradation (REDD) will be included in the EU Emissions Trading System (ETS). However forestry has found favour in the rapidly growing voluntary carbon market.

Certification coupled with various market drivers and donor programmes have had limited success in tropical countries. Carbon markets can add a further economic incentive for producer countries to protect and responsibly manage forests and thus reverse deforestation and degradation. In some countries poor governance is a factor contributing to deforestation, particularly illegally driven land conversion activities. Therefore carbon programmes alone are not the complete answer. Any carbon market initiative must ultimately halt deforestation and degradation but also complement other national and international forestry programmes as well as policies such as FLEGT that help address the other causes of deforestation such as poor governance and law enforcement.

2. *The environmental and social risks and benefits of using such financial mechanisms*

Environmental and social benefits are a clear objective of carbon finance funds. Whether the funds have been successful in achieving this is perhaps too early to determine; a review needs to be conducted.

3. *The use of land use change credits in carbon markets and in meeting emission targets*

Measures that prevent changes of land use from forests to agricultural crops such as biofuels and palm oil plantations, as well as incentives for afforestation and reforestation are welcomed. It is important to value forests which have wider environmental and social benefits over other land uses. As yet carbon credits are not included in the EU ETS, this issue needs to be reviewed as its exclusion has lead to a lack of investment in forestry projects (see comments under 1.0).

4. *The World Bank's Forest Carbon Partnership Fund*

To have a carbon fund dedicated to forestry is a welcome initiative. However lessons learnt from the operation of the BioCarbon Fund and LULUCF must be taken on board to ensure its success. The fund promotes the concept of REDD which puts a value on the carbon in standing trees. The challenge will be to ensure funds are distributed to those that desperately need them and that works with programmes such as FLEGT and other national efforts to improve governance.

5. *The role of technologies such as remote sensing in the verification of land use change credits*
Technology that could monitor land use changes would be helpful to ensuring that the carbon markets are successful and claims are verified.

6. *The success or otherwise of Government efforts in reducing emissions from international land use change*

No Comment.

7. *The Congo Basin Forest Fund*

The fund has common objectives with carbon markets in terms of addressing deforestation. Therefore it should be a complementary programme.

8. *The interaction of carbon finance mechanisms with the timber trade*

Carbon finance mechanisms should support implementation of sustainable forest management. The projects funded under the carbon finance schemes should be complementary to existing policies, programmes and certification schemes. Certification schemes are the accepted market label to provide assurance that the timber is sourced from well-managed forests. Therefore a carbon market which supports the implementation of certification, particularly in countries where take up and progress is slow would be an additional stimulus to enable suppliers to meet changing market requirements.

With the increasing need to consider the carbon footprint of products, it is necessary to internalise the price of carbon into the cost base of manufactured goods. The timber trade would welcome this as the production of wood is largely a carbon-neutral process. Therefore there would be no cost implications. Intensive carbon using processes will be at a price disadvantage thereby incentivising environmentally friendly purchasing.

9. *Government progress on tackling illegal timber since the EAC 2006 Report on sustainable timber*

The UK is the 4th largest net importer in the world. Our influence on the world's forests is, and has the potential to be quite powerful. The UK Government's timber procurement policy was therefore a welcome introduction. The policy has proven to be a significant incentive for producers even though implementation of the policy has been slow.

The Government, post 2009 have changed their policy to restrict timber purchases to those from either sustainable or FLEGT licensed sources. The recently published timber guidance note does offer some opportunity to provide other evidence of legality and/or sustainability. However, the Construction report conducted by CPET suggests that the guidance note is not widely read or circulated. Therefore the perception is that exclusion of all other evidence of legality is now likely to act as a disincentive for producers who are trying to do the right thing. Not every country is eligible for FLEGT eg US, similarly not every country sees the VPA process as politically popular eg Brazil. Even the EU themselves have indicated that other forms of evidence should be allowed as well as FLEGT licensed timber.

The UK Government's commitment to FLEGT, and the resources dedicated to maintaining CPET are to be commended. Where necessary the TTF has supported both Defra and Dfid during VPA negotiations and given advice on the practical implementation of legislation.

10. *Government sustainable procurement of forest products*

A report conducted by CPET concluded that implementation of the policy was patchy within the government construction sector, the largest user of timber. Clearly communication is a major task and timber is not a major priority, particularly on construction sites. However anecdotal evidence from the trade has shown that demand for legal and sustainable timber is increasing.

The TTF have supported Defra in their efforts to increase awareness and also to encourage adoption of the policy by Local Authorities. Although not mandated by the central government policy, Local Authorities account for a significant percentage of total timber procurement in the UK. A recent Ends Report (respected environmental journal) investigation revealed that 6 out of 10 local authorities do not even have a policy, let alone operational procedures to check that the timber purchased is legal and/or sustainable.

11. *The success or otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan, and Government support for it*

FLEGT is an important mechanism to address several issues, illegal logging, deforestation and poor governance/development agendas. The UK Government has demonstrated strong support for the programme. As the action plan is aimed at both producers and consumers, progress is steadily increasing as each side implement changes. However FLEGT licensed timber, as predicted, is not available. Politically the process is perhaps making progress; we now need to see on the ground successes.

October 2008

Memorandum submitted by the Woodland Trust

1. The Woodland Trust welcomes the opportunity to respond to this consultation. The Trust is the UK's leading woodland conservation charity. We have four main aims: no further loss of ancient woodland, restoring and improving woodland biodiversity, increasing new native woodland and increasing people's understanding and enjoyment of woodland. We own over 1,000 sites across the UK, covering around 20,000 hectares (50,000 acres) and we have 300,000 members and supporters.

2. Rather than respond to all the questions posed here we would like to make the following observations:

THE INTERNATIONAL CONTEXT

3. Given that over 70% of total terrestrial carbon is stored in forest soils and biomass and it is estimated that land use change, chiefly deforestation, accounts for 18% of global CO_2 emissions,[1] there is an urgent need for action to be taken as a matter of priority if we are to prevent the global average temperature rising above two degrees celsius.

4. The agreement at Bali in 2007 that the post 2012 climate agreement should include reduced emissions from deforestation and forest degradation (REDD) needs to be made real and must ensure that forest conservation is made more economically viable than harvesting or clearance.

5. As the recent Policy Exchange report The Root of the Matter has argued, large scale pilot projects are urgently needed to inform policy development and there is a need for action before 2012 through Governments developing clear long-term policies to encourage private sector investment in avoided deforestation.[2]

6. But there are two DDs in REDD—forest landscape restoration programmes also require investment in forests which are suffering from slow incremental actions degrading the ability to function properly. This is not just in terms of carbon stores but also as providers of other key environmental and social benefits.

[1] HM Treasury (2006) Sir Nicholas Stern: Stern Review.
[2] Policy Exchange (2008) The Root of the Matter, p 6.

7. Equally, there are many countries which are not currently under pressure to reduce their forests but who would benefit from incentives to protect and expand terrestrial forest carbon stocks

8. Whilst there are clearly regulatory complexities surrounding the role that might be played by carbon markets we believe there is strong case for credit to be given under the Clean Development Mechanism (CDM) to certified activities that increase forest cover and preserve existing forests. Similarly there is a case for consideration in Phase III of the EU Emissions Trading Scheme.

The Illegal Timber Trade

9. The fact that a recent report by WWF has shown that the UK is the second largest importer of illegal timber in EU should be an urgent spur to action. We support calls for EU legislation to outlaw imports of illegal timber and wood products into the EU.

10. The present Voluntary Partnership Mechanisms (VPAs) which the EU is negotiating—to be signed by EU member states and timber producing countries- are positive steps but need to be backed up by rigorous monitoring, implementation and legislation.

The Role of the UK

11. The issue of the UK and illegal timber imports highlights the wider issue that if the UK is to provide the kind of leadership sought by the Stern report, then the Government must also recognise that responsibility begins at home and that our own house is far from exemplary.

12. The Woodland Trust has almost 500 cases of ancient woodland (our own equivalent of the rainforest) under threat on its books and these threats include roadbuilding, golf course construction and housebuilding. We have already lost half of our ancient woods since the 1930s. Espousing a REDD mechanism post-Kyoto means we must redouble efforts to bring our own losses down to zero to be taken seriously.

13. The UK is also one of the least wooded countries in Europe with only 12% woodland cover compared with the EU average of 35%, with native woodland accounting for only half that figure. Current rates of afforestation in the UK (approximately 9000ha per annum) contribute 2–3% of the UK's Kyoto Protocol commitment to reduce or sequester carbon emissions by 12.5% over 1990 levels. However the rate of planting in England has actually slowed recently and this needs to be addressed. Climate change and the need for breathing places in an increasingly overcrowded island mean we have never needed new native woodland more.

14. We therefore welcome the call in the Policy Exchange report The Root of the Matter for the Government to lead the way by dramatically increasing funding for forest projects domestically. The Woodland Trust is seeking a doubling of native woodland cover in the UK which would increase our Kyoto contribution but also deliver a wide range of other benefits to society—including increasing the ability of wildlife to adapt to climate change, flood alleviation, and the creation of more attractive and healthier places within which to live, work and spend leisure time.

15. In the context of these wider benefits, and the measureable contribution the UK's trees can make towards offsetting our carbon emissions, Defra's decision to confine voluntary accreditation of carbon offset projects to overseas activities excluding forestry is short-sighted. It denies the desire of those who wish to offset their residual carbon emissions within the UK through forestry, and who wish to capitalise on the additional benefits—including ecosystem services, biodiversity and human social contexts—that the act of planting native trees brings.

16. The Government must both lead the debate on tackling global deforestation and lead by example in its own backyard. The two go hand in hand.

October 2008

Memorandum by the Joint Nature Conservation Committee (JNCC)

Summary of Key Points

1. With regard to the potential for REDD-related carbon offsets, tropical forests, including soils as well as biomass, are of greatest interest. Tropical ecosystems, home to most of the world's terrestrial biodiversity, a source of basic needs and income for millions of the world's poorest people as well as timber for international trade, also suffer the highest rates of deforestation.

2. With pressure on tropical forests coming from a variety of sources, the potential for carbon markets to improve protection for tropical forests will depend on the ability of REDD funds to successfully support the development and application of institutional measures. Which should address the needs of all forest stakeholders, especially local people but also diverse commercial interests as well as various levels of government administration.

3. The significant potential environmental benefits and risks of carbon set-aside forests derive from the multiplicity of ecosystem goods and services that forests can provide. The potential complementarity of managing for carbon and other ecosystem services holds promise of a wide range of benefits. Risks include the displacement of demand ("leakage"), shifting management objectives and climate change, all of which could jeopardise the permanence of forest reserves.

4. Social benefits and risks, also potentially significant, would stem from the sheer volume of funds that might be mobilised and their application. The poverty of forest-dependent peoples could be significantly reduced, their skills enhanced and jobs created through well-targeted development projects. Risks include further impoverishment, if such schemes bar local people from access to traditional forest resources, result in land grabs by the state and/or local elites, or foster conflict over the newly more valuable forest resources.

5. To the extent that wood products are, in effect, static carbon sinks, the timber trade and the forest products industry have an opportunity to play an important role in this new commercial environment. Innovative management paradigms that include carbon storage objectives would need to be underpinned by renewed political commitment to work with local communities, to fight corruption at every level and to ensure sustainable forest management.

6. Assuming institutional mechanisms can be established that secure improved forest protection, the success of REDD-related carbon offsets in achieving climate change mitigation will turn on whether a) in the time available, the scale of the effort will be sufficient to make significant impact, and (b) such schemes will divert attention from desperately needed behavioural changes across all sectors and in all societies.

The Joint Nature Conservation Committee (JNCC) is the statutory adviser to Government on UK and international nature conservation. Its work contributes to maintaining and enriching biological diversity, conserving geological features and sustaining natural systems. JNCC delivers the UK and international responsibilities of the Council for Nature Conservation and the Countryside, the Countryside Council for Wales, Natural England and Scottish Natural Heritage.

Our submission focuses on the environmental risks and benefits of using financial mechanisms to protect forests globally, in particular through reducing emissions from deforestation and forest degradation (REDD).

1. Forests and Carbon

1.1 Photosynthesis, nature's means of capturing carbon, provides the basis for plant growth and reproduction. Forests, some of the most varied and complex assemblages of plant and animal species, presently cover just under a third of the Earth's total land area and contain about 60% of the carbon held in terrestrial ecosystems, half as much again as the atmosphere.[1] The distribution of carbon within the ecosystem differs by forest type however. In boreal forests, soils hold as much as five times the amount of carbon as above-ground biomass, whereas in tropical systems the ratio is closer to one.[2]

1.2 On the basis of data collected over the past decade, scientists estimate that human-caused emissions from deforestation amount to about a fifth of total global carbon emissions—the third largest source of emissions after energy and industrial processes and more than the entire world's road transport.[3] With over 90% of deforestation occurring in tropical forests, Brazil topped the list, contributing nearly half of all carbon emissions from deforestation, with Indonesia second at 12.8% in the period 2000 to 2005.[4]

1.3 Although total forest area continues to decrease globally, the actual rate of annual net loss, now just over 7%, is decreasing.[5] The protection of forests through reserve and certification schemes is becoming more commonplace and in some regions forest cover is actually increasing. Tropical forests have the greatest primary productivity (consequently storing more carbon than others) and the greatest biodiversity. However, these forests are the most affected by encroachment and conversion and are disappearing at a rate of about 5% per decade,[6] as they exist generally in countries whose populations are predominantly poor and desperately in need of development infrastructure, especially clean water supply, health clinics, education and electricity. From society's perspective forests are not only the source of economic and non-economic goods and services but also landscape elements of important historical, social and cultural significance.

1.4 Farming and ranching account for three quarters of forest conversion, or deforestation.[7] From an economic perspective, preserving forests is often not a very attractive business proposition given the length of time needed to recover a return on this investment. Consequently, forests are converted to other land uses even though the financial returns from these alternatives often appear not very high.[8] Thus, the Stern report concluded that "Curbing deforestation is a highly cost-effective way of reducing greenhouse gas emissions and has the potential to offer significant reductions fairly quickly. It also helps preserve biodiversity and protect soil and water quality . . ."[9]

2. Carbon Markets

2.1 Carbon trading mechanisms, including forestry measures, have been operating under various auspices since 1997. In December 2007 the international conference in Bali sponsored by the United Nations Framework Convention on Climate Change revisited the issue of carbon offsets and the possibility of developing incentives for reducing deforestation and forest degradation. To date, carbon offset investments in forestry are primarily voluntary programmes undertaken in large part in the name of corporate responsibility, often driven by public relations. Although the global carbon market more than doubled over the period 2006 to 2007 (as did the European Union Emission Trading Scheme (EU ETS) in terms of both value and number of allowances transacted), the success of the Clean Development Mechanism is handicapped by a lengthy approval process.[10]

2.2 Although the potential cost of reducing emissions by averting deforestation and forest degradation vary,[11] it is estimated the cost of conservation would be a small fraction of the price of other, non-forest related, carbon securities. The simplest approach may be to incorporate REDD-related carbon credits into the existing UN carbon trading mechanisms. Some would argue, however, that this would flood the system with cheap credits and thus reduce their price. If this happens, there is the danger that industrialised countries would be able to meet emission control targets with cheap REDD offset credits and would avoid making any real emission reductions at home.[12] While the concept of paying for forest carbon and thus forestalling deforestation is an attractive concept from several perspectives, there remains the difficulty of insuring that the money gets to the people who actually affect the fate of the forest, in which case transaction costs may become a serious consideration.

3. Potential Role of Carbon Markets in Protecting Forests

3.1 Deforestation stems from diverse demands on forest resources, in particular the demand for land expansion of agriculture, establishment of orchards and plantations, construction of hydroelectric dams and village growth. Conversion of forest to alternative land uses has been a part of nation-building for millennia. Countries rich in forest seek to transform what they perceive as their natural capital into assets more directly capable of meeting national needs. Without effective measures to restrain deforestation, it is estimated that the clearing of tropical forests will release an additional 84 to 130 gigatonnes of carbon, roughly equivalent to more than a decade of global fossil fuel emissions (at current rates).[13]

3.2 Carbon markets, which can provide significant investment funds, offer the possibility of moderating demands on forests while providing the means to reach development goals. Carbon markets, however, are unlikely to eliminate pressure on forest land completely.

3.3 Increased climate variability and change will pose a profound threat to forest ecosystems and render many forests susceptible to a variety of man-made and natural calamities, including wild fire, pests and invasive species. Contrary to previous assumptions, recent research indicates that the ability of both terrestrial and marine systems to sink carbon will likely be compromised by changing climatic conditions. Global warming and related impacts will very likely overwhelm any fertilising impacts of CO_2 and further reduce carbon sequestration.[14] Illegal and unconstrained logging will only exacerbate the impacts of climate change. Carbon markets will not be able to eliminate this threat.

3.4 Because of the range of threats facing forests, consideration should be given to setting aside a greater area than that enabled by carbon financing alone. In addition to the need for carbon sequestration, there is a need to protect the biodiversity that underpins the other ecosystem services provided by forests from the impacts of climate change. Consideration should be given to enabling REDD mechanisms to provide greater support for forest restoration, enhancement, and resilience strengthening, as well as research on innovative forest management systems.

3.5 Apart from the issues of sovereignty and monitoring associated with the establishment of REDD-related carbon finance mechanisms, there will be significant challenges in organising schemes that ensure that environmental and socio-economic benefits are persistent, even permanent. Without doubt, the key to a successful environmental outcome will be getting the socio-economic measures correct.

4. Environmental Benefits and Risks

4.1 While the potential environmental benefits of carbon markets for forest set-asides are clear, the risks may be less so. Forests set aside as carbon offsets could become de facto nature reserves offering protection of ecosystem services, for example, those related to soil and water. Without addressing the underlying drivers of deforestation, however, we risk shifting legitimate demand for agricultural land and forest products onto other forest areas, perhaps areas more environmentally vulnerable. Thus, environmental risks may arise from displaced demand ("leakage") as the pressure on forest resources is transferred to new locations, or from market instability. To the extent that carbon offsets would limit raw materials reaching the market, set-asides may drive up prices for timber and other forest products, especially locally. Should carbon markets prove very volatile or unreliable as a regular source of income, or fail altogether, these erstwhile nature reserves could be at particular risk. As population increases, the demand for cropland will grow. Unremunerative forests risk becoming once again subject to uncontrolled logging and land-use conversion.

4.2 There has also been some discussion about limiting REDD-related payments to those areas under greatest threat of deforestation and degradation. While this is a laudable objective, there is also a risk that such criteria may generate perverse incentives that actually foster deforestation. It might be possible to limit eligibility, but the result would probably increase transaction costs.

4.3 Finally, it should be noted that presently the interest in the protection of natural forests centres on their carbon stores. In future, carbon sequestration, as opposed to stores (the process as opposed to the product), may become of greater interest. To the extent that focus shifts to the cultivation of plants especially efficient, either naturally or artificially (genetically enhanced), in "sinking" carbon, the pressure for forest land conversion may re-emerge.

5. Social Benefits and Risks

5.1 From the social perspective the benefit of carbon markets for REDD offsets stems from the potentially very large amounts of money that could be raised for supporting development projects for the people traditionally dependent on forest resources. Theoretically the monies raised through this mechanism could fund action by the participating recipient countries to meet the Millennium Development Goals, while reducing pressure on forest resources. Whether the money available through carbon markets actually provides funding for critical infrastructure development, social services and job creation for the rural poor will depend on the institutions established and their management.

5.2 Certainly the success of the market for forest-related carbon storage and sequestration will have as much to do with who will reap the benefits as how much those benefits will be. Insuring that all stakeholders benefit is crucial. Non-governmental organisations and others with field experience stress the importance of REDD revenues reaching the rural poor who rely on the forest for their livelihood.[15] In many developing countries undefined, vague or ill-defended land ownership and use rights are the biggest impediment to sustainable forest management. It is axiomatic that markets, such as proposed for the REDD mechanism, only work if resource ownership is well-defined and if the payments get into the hands of actual land-use decision makers.

5.3 Decisions to manage tropical forest landscapes for carbon have significant implications for the communities that depend on the forests and associated production systems. Maintaining a development trajectory that improves human well-being in a socially equitable manner while maximising carbon storage, maintaining biodiversity and ecosystem services, and facilitating adaptation to climate change will be challenging. There is the risk that millions of poor people who depend on the forest for their basic needs (food, fuel, building materials and natural products that can be sold or bartered for other necessities) will be denied access to traditional resources, pushed further into penury, or forced to relocate. For many poor people, essentially the socially and economically marginalised, the forests provide the only "social security" (or "national insurance") they know. During the economic downturn in south-east Asia in the late 1990s, many people looked to non-timber forest products, freely collected in the national forests, parks and nature reserves, to provide a source of much needed income.[16] It is unlikely that this perception of forests, whether or not reserved for carbon, will change any time soon.

5.4 The problems that plague sustainable forest management in the tropics, including uncertain tenure rights, weak institutions, lax law enforcement, and inadequately resourced administrations, would also afflict carbon forest management schemes. Indeed, with a REDD-inspired carbon market increasing the value of the forest, there is a risk that abuses over land rights may increase. In anticipation of large payouts, both state as well as elite private interests could attempt to seize control of forest assets at the expense of local communities. In this way REDD could quite possibly lead to the loss of land, the further disenfranchisement of local people and increased conflict over resources.

6. Potential Impacts of REDD-related Carbon Markets on the Timber Trade

6.1 Over the past couple of decades commercial forestry has evolved from an activity of mainly the temperate and boreal forests to one of tropical and subtropical regions. With the rapid expansion of area under forest plantations, it is now estimated that by the middle of the 21st century as much as 75% of all industrial roundwood will be commercially grown.[17] Global wood requirements, it is said, could be met by only 2% of the world's total forest area.[18] If this is correct, then there should be considerable potential for carbon reserves without significant adverse affects on forest industry and trade.

6.2 Trees are both a mechanism for sinking as well as sequestering carbon, in short, the factory and the warehouse. The trade in timber, the raw material of the wood products industry, could be considered as trade in "sunk carbon". Although wood recovery from timber harvesting operations could be improved in many regions, increased efficiency in wood processing over the past few decades has led to better recovery of raw material, giving rise to new products and the increased use of factory waste as fuel stocks. Bioenergy production from forestry residues and the substitution of wood products for fossil-fuel intensive materials could further increase the sector's contribution to climate change mitigation.[19]

6.3 The UK imports about 80% of its timber requirement.[20] However, of the top ten EU importers of illegal wood, the UK ranks second, importing nearly 3.5 million cubic meters, or just over 10% of the total of all estimated imports of illegally or suspiciously sourced wood from four critical non-EU regions (eastern

Europe and Russia, south-east Asia and China, Latin America and Africa). With much illegal timber now in the activity of criminal gangs, it is difficult to monitor and thus to assess the true extent of this trade. Lost receipts to governments, industry and forest owners are estimated at about $15 billion (£7 billion) annually. With about a third of global wood production illegally sourced, it is estimated that illegal production compromises wood prices worldwide by 7 to 16%.[21] Exacerbating the financial effect of these activities is the damage to the image of the forestry sector, of the industry and of wood as a sustainably produced, environmentally friendly material. It will be important to take a strong stand against illegal logging if REDD schemes are to be taken seriously. At present only 6% of forests certified sustainably managed are located in the tropics.[22]

6.4 To capitalise on significant potential, forestry will need to refine existing management regimes for producing multiple goods and services to reflect new priorities, including carbon storage. It would be hoped that REDD-related funding will be available to support increased forestry research to enhance the knowledge base needed to meet the new objectives. Institutional innovation and better governance, as promoted by the EU's Forest Law Enforcement, Governance and Trade (FLEGT) programme, are essential if the forest sector is to meet expectations. Broad international resistance to illegally harvested timber is needed not only to support sustainable forest management but to counter political regimes that finance their existence with conflict timber. Reduced-impact harvesting systems would permit less environmentally disruptive timber production with increased employment opportunities, more varied outputs and reduced carbon emissions. Such options may be attractive to local communities seeking to maintain traditional culture and lifestyles.

7. Conclusions

7.1 There has been considerable interest from diverse quarters in formalising the institutional arrangements associated with investments in carbon offsets aimed at reducing deforestation and forest degradation. REDD-related carbon offset investments have the potential to accomplish diverse environmental goals and provide extensive social benefits. However, care should be taken not to exaggerate potential benefits, for as one study cautioned, areas of "highest biodiversity threats and human development needs may exist in countries that have limited income potential".[23] Moreover, although many successful projects have been undertaken since trading in emissions units began, other authors suggest that given the piecemeal approach characteristic of the carbon markets currently emerging, it is unlikely that REDD-related investments will succeed in reducing greenhouse gas emissions to the extent required in the time available.[24]

7.2 It should be noted that to the extent that REDD schemes foster a perception that the emissions problem can be solved elsewhere, that is, in developing countries, as opposed to becoming a joint, global effort, they risk becoming counter-productive. From the perspective of many in society as well as the political arena, such investments overseas, seemingly almost beyond our control and prone to uncertain outcomes, may actually contribute to a sense of increased vulnerability and insecurity. The business community seems to prefer a multi-pronged approach, ie, investment in innovation, new technology and revised operational procedures, as well as carbon offsets, both domestic and international. Successful REDD initiatives will undoubtedly require a combination of government interventions and concerted actions by both producers and consumers of forest products and global co-operation. It is widely agreed that any significant reduction of greenhouse gas emissions will definitely require the participation of all economic sectors, especially forestry, energy and agriculture—sectors often at the core of the economic and political structures of many countries.

7.3 Recognising the motivating ability of markets, we should be alert to the opportunity afforded by REDD-related carbon trading to develop a wider appreciation of the variety of environmental services provided by forest ecosystems. Reserving forests with the objective of reducing carbon emissions will give humanity time to develop the technology needed for "decarbonising" energy and industrial production. If, in the future, the market for carbon were to decline, it may be advantageous, both from an environmental as well social perspective, to be able to maintain the flow of this funding to many countries as payments for other environmental services, such as water regulation or biodiversity conservation.

7.4 Clearly there are many potential pitfalls in the path of developing REDD-related financing. It presents, however, an excellent opportunity for mobilising multi-national, cross-sectoral concerted action on two related, very important topics, namely climate change and forest conservation. Such efforts will be buoyed by considerable support generated for REDD at a time when deforestation rates are beginning to slow and the concept of climate change is increasingly receiving wider acceptance.

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13 October 2008

Memorandum submitted by Helveta

EXECUTIVE SUMMARY

1. This response is from Helveta. We are an Oxfordshire-based company that provides real time online verification of legality along the whole of the timber supply chain.

2. Financial mechanisms could have a significant role to play in helping reduce deforestation and emissions from land use change. However, there are substantial issues that will need to be addressed before such mechanisms can be introduced successfully. These include the need for equity between local communities, landowners and governments in benefiting from financial mechanisms; ensuring that financial mechanisms are not acting to protect forests that would already otherwise be protected (additionality); ensuring that mechanisms do not just displace deforestation elsewhere (displacement); and establishing appropriate baselines and criteria for use of the mechanisms.

3. Technology has a huge role to play in the verification of land use change credits and in ensuring the legality and sustainability of logging. However, satellite technology must be complemented on the ground by sub-canopy verification if the system is to function effectively. Satellites cannot detect low-level, sub-canopy

deforestation, which is usually how deforestation in the form of illegal logging or selective land use change begins, and are therefore unable to identify a potential problem until it is nearly too late and the canopy has already been subject to substantial degradation. Real time online verification technology is already being used at the sub-canopy level by local communities, NGOs and enforcement bodies around the world with great success.

4. UK Government efforts to procure forestry products from legal and sustainable sources have been extremely slow and rest on very weak foundations. There are still, to date, no EU FLEGT forestry products on the market. FSC accreditation is a good system but relies on paper-based systems and auditing, which raises the following issues vis-à-vis verification:

- Auditors can only be present for short periods of time, which means violations can take place in their absence.
- Paper-based systems can never be as up-to-date and immediate as real time online legality assurance systems, which are already being successfully deployed around the world.

5. This is one of the reasons why Friends of the Earth has withdrawn its support for the FSC accreditation system. In addition, the Government has no auditing or due diligence system in place to ensure that suppliers genuinely comply with the relevant legislation or with standards of certification.

6. The EU FLEGT Action Plan is highly welcome and a positive step forward. However, progress is painstakingly slow. There is still no wood, as stated above, on the market that is EU FLEGT approved. The EU must lean more heavily on the countries taking part in the process and not hold back from providing strong directional guidance about the quality and standards that countries should be observing in implementing the plan. The EU should also set tight deadlines to prevent certain countries from stalling on progress and undermining the whole initiative.

7. The European Commission has reviewed the EU FLEGT action plan and rightly concluded that the plan does not include sufficient sanctions for those countries that either are not taking part or are not making sufficient progress. This is one of the main reasons why the Commission will imminently be publishing a Draft Framework Regulation to prohibit the import of illegally logged timber into the EU. This measure is absolutely vital to stopping the import of illegally felled timber and should be strongly supported by the UK Government and implemented as soon as possible.

About Helveta

8. Helveta is an Oxfordshire-based company that provides real time online verification of legality along the whole of the timber supply chain. Our technology, through the use of the internet, GPS, RFID and barcode readers, allows forests to be gazetted, inventorised and monitored in real time by local people, NGOs and enforcement bodies.

9. All data collated is held in a central server and all logging activity, and movement of timber through the supply chain is recorded. All felling of trees, or processing or movement of timber, which does not possess the correct barcode reading can be considered de facto illegal and local monitoring on the ground can stop illegal activity in real time through immediate alerts to local people, NGOs and enforcement authorities. The system can also apply the appropriate levels of taxation to legally felled timber to help host governments recover appropriate revenue.

10. Our software is called CI World. It is used to manage and track timber assets as they move along the supply chain. Information is captured in the forest or on the factory floor using handheld devices through CI Mobile Technology. CI Mobile combines handheld data entry with data from GPS, RGID and bar code readers to gather accurate records of how assets are being managed and processed in the forest or factory.

11. CI Mobile transmits data from the forest or factory to CI World servers via any available means of internet connection—from satellite, through Wi-Fi, cellular, and Bluetooth, to dial-up modem. On receipt of inbound data, CI World provides immediate visibility on operations. Processed reports and analysis are available directly from CI World through browser-based access to authorised users, including enforcement authorities, NGOs and local stakeholders, anywhere in the world.

12. The CI World rules engine allows data received from the forest or factory to be analysed on receipt for compliance with pre-determined rules. For example, the rules engine monitors the following:

- Logging outside a defined cutting block or, within a defined legal cutting area, inappropriate logging contrary to local forest law.
- Logs failing to move along the supply chain within a prescribed time frame.
- Conversion rate drop-offs in the factory.
- Production volume deficiencies at a particular machine.

13. These problems are identified automatically by the system and notifications issued automatically to the relevant stakeholders. This approach provides:

- Full traceability for timber assets from finished product in the factory all the way back to the original standing tree in the forest.

— Improved chain of custody management enabling expedited certification and reducing risk in procurement for retail and wholesale buyers.

— Full access to all timber data for all stakeholders from business through government to communities to NGOs.

14. This approach is already being used successfully in Cameroon and Liberia, and is in the deployment phase in hardwood-exporting countries in the Congo and Amazon basins, and in south-east Asia. It has enormous potential to help provide the real time verification systems that will be required under the EU FLEGT Action Plan, for the UK Government's legal and sustainable procurement policy, and for importers to demonstrate compliance with the new Draft Framework Regulation prohibiting the import of illegally logged timber to the EU.

15. This approach also has huge potential to monitor land use change credits in the future in complementing other monitoring of land use by satellite on the ground and under the canopy.

16. Furthermore, it can be implemented very quickly—only three months were required, for example, from contract signature to operation of the system under a US-sponsored initiative in Liberia—and the costs are not high. The technology and systems already exist and work; it does not need to be created from scratch. Experience has demonstrated that using established technology is a far superior, more efficient, and more effective approach that creating new local systems in each host country.

The Role Financial Mechanisms might have in Helping to Address Emissions from Land Use Change

17. The use of real time online verification of legality technology has enormous potential to address the fundamental problem that standing forest has no immediate economic value whereas felled timber and alternative use of land such as agriculture do have significant short-term economic value.

The Environmental and Social Risks and Benefits of Using such Financial Mechanisms

18. However, there are considerable issues to address before such mechanisms can be introduced both successfully and without unintended consequences. These issues include:

— The need for equity between local communities, landowners and governments in benefiting from the financial mechanisms. Local communities, owing to economic necessity, are often those compelled to resort to logging or alternative land use. They must be able to benefit from these mechanisms.

— Whilst landowners and governments will also need additional resources to incentivise them to protect forest and to enforce that protection effectivity, precaution must be taken to avoid corruption and inappropriate or wasteful use of finances.

— What system would be used to ensure funds are distributed equitably and correctly, and how will this be verified?

— The need to ensure that the financial mechanisms are not wasted in protecting forests that would already otherwise have been protected (additionality); that the mechanisms do not just displace deforestation elsewhere (displacement); and that appropriate baselines and criteria are established for use of the mechanisms.

— That not all deforestation is illegal—forests can legitimately be cut down to create agricultural land. There is therefore a need to ensure that the maximum amount of forest is protected but also to ensure that the process of converting forest into agricultural use is undertaken as sustainably as possible. Agricultural sustainability must complement sustainable forestry management.

The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

19. No comments at this stage.

The World Bank's Forest Carbon Partnership Fund

20. No comments at this stage.

The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

21. Technology has a huge role to play in the verification of land use change credits and in ensuring the legality and sustainability of logging. However, satellite technology must be complemented on the ground by sub-canopy verification if the system is to work. Satellites cannot detect low-level, sub-canopy deforestation, which is usually how deforestation in the form of illegal logging or selective land use change begins. Satellites are unable to detect a potential problem until it is nearly too late and the canopy has already been subject to substantial degradation. Real time online verification technology is already being used at the sub-canopy level by local communities, NGOs and enforcement bodies around the world with great success.

The Success or Otherwise of Government Efforts in Reducing Emissions from International Land Use Change

22. No comments at this stage.

The Congo Basin Forest Fund

23. This has the potential to be a hugely valuable initiative but it will be important, in the first instance, to focus on the following nations—Democratic Republic of Congo, Congo Brazzaville, Cameroon, and the Central African Republic. These are the nations where the greatest gains can be made in promoting sustainable forestry.

24. We are currently involved in taking this initiative forward, which will provide an excellent example of how real time, technologically-enabled local monitoring in collaboration with local communities and NGOs can help to record and monitor forests.

The Interaction of Carbon Finance Mechanisms with the Timber Trade

25. No comments at this stage.

Government Progress on Tackling Illegal Timber since the EAC 2006 Report on Sustainable Timber

AND

Government Sustainable Procurement of Forest Products

26. WWF has estimated that the UK is the world's third largest importer of illegally harvested or traded timber and wood products (3.2 million cubic metres RWE). WWF adds that, in terms of overall share of imports, the UK has the second highest illegal share—estimated at 7.2%. The WWF report further states that the UK spends an estimated £712 million on illegal timber and wood products per year—equivalent to £11.76 per person in the UK. This is clearly unacceptable for a nation that is committed to tackling climate change and deforestation.

27. UK Government efforts to procure forestry products from legal and sustainable sources have been extremely slow and rest on very weak foundations. CPET relies on two sources of legal and / or sustainable timber—EU FLEGT-approved or FSC. However, there are currently no EU FLEGT forestry products available on the market.

28. Meanwhile, FSC accreditation is an effective system but one that relies on paper-based systems and auditing. There is therefore, with auditors only present for short periods of time, little means to ensure that violations of the system do not take place in their absence, which contrasts to the reliability of the real time online legality assurance systems, which are already being successfully implemented around the world. This is one of the reasons why Friends of the Earth has withdrawn its support for the FSC accreditation system.

29. In addition, the UK Government does not have any auditing or due diligence system in place to ensure that suppliers genuinely comply with FSC. This should be remedied by introducing the whistleblower scheme proposed by Barry Gardiner MP in his Private Member's Bill, whereby third parties could scrutinise timber suppliers and report them to the Government, and/or a thorough UK Government audit of suppliers to ensure that all timber is verified as legal and sustainable. These recommendations are corroborated by the finding from WWF that the CPET process has yet to demonstrate that it has had any impact on the timber trade whatsoever.

The Success or Otherwise of the EU FLEGT Action Plan, and Government Support for it

30. The EU FLEGT action plan is highly welcome and a positive step forward. However, progress is painstakingly slow. There is still no wood, as stated above, on the market that is EU FLEGT approved. The EU must lean more heavily on the countries taking part in the process and not hold back from providing strong directional guidance about the quality and standards that countries should be observing in implementing the plan. The EU should also set tight deadlines to prevent certain countries from stalling on progress and undermining the whole initiative.

31. There is currently wide variation in the success of those countries pursuing EU FLEGT VPAs. Ghana, for example, is moving in the right direction to introduce a national online tracking and verification system. Indonesia, however, is making little progress and there is substantial evidence of a lack of appetite beneath the upper echelons of that country's leadership to move rapidly enough and achieve real change.

32. The risk is that vested interests that have benefited from the established ways of operating and may have, directly or indirectly, benefited from illegal logging will either seek to undermine or stop the process altogether. For example, we have been contracted by EuropeAid to deliver an online timber legality assurance system in Indonesia similar to one we have deployed in Liberia. However, in start contrast to the

rapid deployment that has taken place in Liberia, there has been no movement—fourteen months after the original contract was signed—to deploy the same working solution for timber tracking and verification in Indonesia.

33. These vested interests need to be challenged, clear direction and deadlines need to be introduced about what constitute acceptable standards for the new systems, and clear incentives and disincentives on trade need to be applied.

34. The European Commission has reviewed the EU FLEGT action plan and rightly concluded that the plan does not include sufficient sanctions for those countries that either are not taking part or are not making sufficient progress. This is one of the main reasons why the Commission will imminently be publishing a Draft Framework Regulation to prohibit the import of illegally logged timber into the EU. This measure is absolutely vital to stopping the import of illegally felled timber and should be strongly supported by the UK Government and implemented as soon as possible.

October 2008

Memorandum submitted by WWF-UK

1. Summary

WWF has focussed primarily on the following:

1.1 *The environmental and social risks and benefits of using financial mechanisms to address emissions from land use change*

WWF believes that REDD mechanisms should:

- Recognise that forests provide a wide range of values and services;
- Contribute to development goals and poverty reduction strategies;
- Actively involve all stakeholders in policy formulation and planning; and
- Ensure that benefits, including funds, are equitably distributed.

1.2 *The use of land use change credits in carbon markets and in meeting emissions targets*

WWF believes it is important to consider the full range of options further and to understand the implications of different funding mechanisms in order to assess which are most appropriate, based on:

- Environmental integrity and the overall ambition of emissions reductions.
- Carbon market effect: eg compliance costs, effect on net global emissions.
- Scale and flexibility of funding.

2. The Role Financial Mechanisms might have in Helping to Address Emissions from Land Use Change

2.1 The economic incentives for unsustainable forest management or to convert forest into agriculture land are often greater (at least in the short-term) than the incentives to conserve or responsibly manage forests. In part this is due to a failure to value the long-term economic goods and services that forests provide. Therefore, WWF recognises that providing financial incentives for forest-carbon has the potential to make forest conservation more economically viable and, therefore, to address emissions from land use change.

2.2 An international regime to reduce emissions from deforestation will need developed countries to provide support to cover the costs of REDD over the long-term. One area for further discussion is whether funding should cover the full associated costs or whether some developing countries should be partially-compensated consistent with the principle of common but differentiated responsibilities. Support for capacity building and readiness is an immediate priority, to enable countries to prepare for a REDD mechanism in post-2012.

2.3 In addition to the funding for REDD, it is vital to consider how funds will be managed and distributed, including the governance and flow of funding.

3. The Environmental and Social Risks and Benefits of Using such Financial Mechanisms

3.1 Forests provide a range of values and services, such as protecting water catchments, improving air quality, protecting soil and biodiversity and providing resources which support the livelihoods of people. Measures to reduce emissions from deforestation and forest degradation can provide "co-benefits" as conserving natural forests helps maintain wider environmental and social values and services. However, preventing access to these resources would create potential conflict and increased pressure on forest resources in other areas. Therefore, policies for REDD must recognise the multiple values and uses of forests and accommodate the food and resources requirements of the human population.

3.2 Activities aimed at maintaining forest carbon could result in local communities and indigenous people losing access to land. For example, there are concerns that REDD funds might be used by countries to reinforce state and private sector control over forests. Also with potentially high rates of return from carbon offset projects, opportunities may be seized by the most powerful. Local communities often lack the secure tenure and resource rights to stake their claim. Similarly REDD funds might fuel land speculation and the appropriation of community land—either by external actors or by more powerful individuals or groups within a community.[3]

3.3 These issues raise institutional and policy challenges to ensure the benefits and costs are fairly distributed. The issues require policies to be developed which address administration of the forest, tenure rights etc, which should be liked to national and local strategies such as poverty reduction strategies. It is important to see poverty reduction strategies as a means of tackling deforestation and unsustainable land use. Rights and livelihoods of indigenous peoples and local communities must be integral to any REDD policies and programmes. This can only be achieved through involving all local stakeholders in the development of REDD. The Stern Review[4] recognises that this requires a participatory approach to policy formulation and planning, involving stakeholders at local, sub-national and national levels.

3.4 Policies for REDD must be consistent with other international conventions and agreements (including the Convention on Biological Diversity). To protect the rights of indigenous people and local communities, REDD mechanisms must respect, build upon and integrate the rights and needs of these people and communities.

3.5 REDD mechanisms need to contribute to development goals and ensure that benefits, including funds, are equitably distributed, for example, by:

- Clarifying or enforcing land tenure and developing clear "carbon tenure".
- Improving governance and enforcement, eg through similar processes to those employed for the Voluntary Partnership Agreements under the EU Forest Law Enforcement, Governance & Trade Action Plan.
- Developing legal and institutional frameworks to address distribution of funding, including in particular an appropriate and effective administration to implement these frameworks.
- Ensuring active stakeholder involvement in the development of policies and programmes for REDD, eg through multi-stakeholder roundtables.

3.6 Ensuring governance, administration and local community involvement is integral to developing effective and appropriate REDD mechanisms. This will ensure any activities to maintain forest carbon avoid negative impacts on other goals, such as poverty reduction and biodiversity conservation.

4. The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

4.1 The post-2012 UN climate agreement should provide a framework that ensures sufficient and sustainable incentives are provided for REDD as an integral component of the agreement. At this point, WWF believes it is important to consider the full range of options for finance further.

4.2 A range of financial mechanisms have been proposed, which fall into the following categories:

(a) Inclusion in carbon markets / fungibility (either with unlimited or limited access), as an offset mechanism for Annex I emissions reduction targets.

(b) Market-linked mechanisms, such as (i) auctioning of allowances, for all allowances or specific sectors; (ii) dedicated auction revenues from national, regional or international emissions trading systems; and (iii) a levy on all or some emissions.

(c) Voluntary funding, such as public funds additional to development aid, eg the Norwegian forest fund.

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[3] Griffiths (2007) Seeing "RED"?: *"Avoided deforestation" and the rights of Indigenous Peoples and local communities*
[4] Stern Review, 2006, The Economics of Climate Change

Environmental integrity

4.3 One concern voiced with fungibility of REDD credits (and other land use and land use change and forestry (LULUCF) credits) is the risk associated if either leakage occurs (ie deforestation is displaced to other locations) or emissions reductions are non-additional (ie emissions reductions would have been delivered without additional action) or non-permanent (ie the possibility that carbon stored/sequestered will be released into the atmosphere in the future due to forest clearance, fire or disease).

4.4 Concerns over environmental integrity of credits is not specific to REDD—eg a report by the Őko-Institut concluded that approximately 20% of Clean Development Mechanism credits are likely not to be additional.[5] Potential ways of addressing concerns with fungibility of REDD include:

— Excluding REDD credits from carbon markets and using only market-linked or voluntary mechanisms to fund REDD.

— If REDD credits are included within the carbon markets; putting conditions or restrictions in place, by limiting the amount of REDD credits, discounting, or not including activities from countries which currently have low emissions from forests within carbon markets, unless there is demonstrable additionality.

Ambition

4.5 In addition to the environmental integrity of any emissions reductions, the ambition of the overall emissions reductions is vital. To prevent catastrophic climate change we must keep the global average temperature rise as far below 2 degrees centigrade as possible. The IPCC 4th Assessment report suggests that Annex I parties should take on greenhouse gas reduction targets of between 25% and 40% below 1990 levels by 2020.[6] In addition to this reduction in Annex I countries, some major non-Annex I parties need to "substantially deviate" from their projected future emissions.

4.6 Therefore, to achieve the ambition of the reductions in emissions which are needed to stay below 2 degrees rise, emissions reductions from REDD (and other mitigation activities in non-Annex I countries) must be additional to action in Annex I countries. To achieve this through inclusion in the carbon market, Annex I countries must commit additional targets, on top of the 25–40% range agreed for the second phase of the Kyoto Protocol in Bali. Market-linked mechanisms and voluntary funding are not an alternative to emissions reductions from Annex I countries, as such emissions reductions from REDD would be additional.

4.7 A number of additional elements should be applied if REDD credits are fungible:

— National approaches (eg national-level accounting, regulatory frameworks, reference levels, monitoring and enforcement systems) need to be in place in order to reduce transaction costs, address domestic leakage and ensure the integrity of baselines.

— Measures must be put in place to minimise and account for leakage, the risk of non-permanence, and to ensure the integrity of baselines.

— Activities in countries with low emissions from forests should not be included within carbon markets, unless there is demonstrable additionality, for example, in countries with increasing deforestation rates.

Carbon market effect

4.8 REDD is often cited as a relatively low cost mitigation option, and therefore, integrating REDD into emissions trading is predicted to decrease costs of achieving emissions reductions.[7] While this can be beneficial in bringing down the overall costs of emissions reductions (which is one objective of the carbon markets), it may also reduce the carbon price and consequently diminish incentives for investment in potentially more costly industrial emissions reductions, such as replacing coal with renewables. However, in the long-term REDD is not likely to be less expensive than industrial emission credits, as land is a fixed good, and any REDD mechanism must ensure that a long-term incentive is provided to prevent forest conversion and degradation.

4.9 One possible option for reducing this effect would be to apply a discount factor to credits that enter the market—eg a 3:1 ratio, where 3 REDD credits would equate to 1 tCO_2 emitted by the purchaser. This approach would also help in addressing concerns around leakage and non-permanence; and would increase the overall emissions reductions achieved through the market. If applied, it would be important to ensure the discount factor still makes REDD an attractive option in developing countries (based on the revenue generated as compared with the costs).

[5] Őko-Institut, 2007, *Is the CDM fulfilling its environmental and sustainable development objectives?*
[6] IPCC, 2007, Full working group III report, chapter 13, Page 776, http://www.ipcc.ch/pdf/assessment-report/ar4/wg3/ar4-wg3-chapter13.pdf
[7] Strassburg *et al*, 2008, *An Empirically-Derived Mechanism of Combined Incentives to Reduce Emissions from Deforestation*

4.10 A related concern is the scale of potential credits from REDD and the risk of large volumes of credits "flooding the market". This could reduce the incentive for addressing industrial emissions in general, because a substantial proportion of emissions reduction targets could be achieved by purchasing REDD credits. In addition to increased targets for Annex I countries, potential mechanisms for reducing the risk of flooding the market include applying a discount factor and limiting access to REDD credits—either as part of the overall limit on the effort that can be achieved through non-domestic efforts or as a specific limit on REDD credits.

A phased approach

4.11 If fungibility of forest-carbon credits is considered, a phased approach might be preferable, where initially REDD has limited fungibility (eg through a discount factor or firewall). As countries meet conditions demonstrating their ability to deliver monitored and verified REDD credits, the fungibility coefficients for their credits could increase, depending also on broader elements of the overall architecture, including the emissions reduction commitments by Annex I countries.

Permanence and liability

4.12 If inclusion of REDD in the carbon market is considered, the approach used to address permanence in REDD credits is crucial in influencing "market interest" for these credits and to achieve a sufficient price for these credits. In addition, it is vital that there is a mechanism to address the risk of non-permanence and, therefore, the issue of liability for any non-permanence needs to be considered. Permanence and liability are also important elements for consideration with market-linked mechanisms and voluntary funding if we are to achieve sustainable emissions reductions.

Scale of funding

4.13 One of the main advantages frequently cited for including REDD in the carbon market is the fact that large amounts of reliable funding can be provided. The carbon market is generating $30 billion/year and is projected to reach $100s of billion or more (these figures refer to the value of the whole carbon market, not specifically support to developing countries through CDM).[8] This indicates that there is the potential for sufficient and sustainable funding to be generated for REDD by including it within the carbon markets.

4.14 Market-linked approaches, such as auctioning allowances or setting aside a proportion of allowances, offer the potential for achieving the scale of funding required. As one example, Norway has proposed that a portion of allowances from national emissions trading systems should be withheld. The equivalent value would be provided for international activities. With 20% of emissions reductions below 1990 levels for all Annex I countries and just 10% of the allowances set aside (and a carbon price of $30/t), this has been estimated to raise $63 billion annually (though recognising that this would not all go towards reducing deforestation).

4.15 Indeed, within the EU ETS the current proposal is for all allowances to be auctioned by 2020 by which time the European Commission estimates that revenues could amount to around €50 billion per year across the EU.[9] The Carbon Trust estimates that the revenues from auctioning to the UK Government could be between €4 billion and €6 billion per year during the third phase (2013 to 2020).[10] These are new funds which could not have previously been anticipated before the inception of the EU ETS. The UK already plans to auction a minimum of 7% of the allowances under phase II (2008 to 2012) which could bring in around €2 billion between now and 2012.

Flexibility of funding

4.16 While inclusion in the carbon market might be considered appropriate in certain conditions, there are likely to be a number of scenarios/circumstances where carbon markets will not provide the required financial support or incentive. Inclusion in the carbon market would only be appropriate for activities and countries where there are verified emissions reductions, and therefore, for example, this source of funding would not be appropriate for capacity building and support for readiness which will require alternative funding sources.

4.17 Given that only two countries (Brazil and Malaysia) are predicted to be ready for early entry to a REDD mechanism based on emissions, capacity and interest,[11] this indicates a need for funding options outside the carbon market over the short-medium term. Support will be needed for countries who are building capacity for REDD or do not have sufficient capacity for monitoring, reporting and verifying emissions reductions under a national baseline.

[8] Schwartzman *et al*, 2007, *Getting REDD Right*

[9] "Boosting growth and jobs by meeting our climate change commitments" European Commission press release announcing the release of the climate and energy package, January 2008 http://europa.eu/rapid/pressReleasesAction.do?reference=IP/08/80&format=HTML&aged=1&language=EN&guiLanguage=en

[10] "Cutting carbon in Europe—the 2020 plans and the future of the EU ETS" Carbon Trust, 2008

[11] Boucher, in press

4.18 A further group of countries that may not be eligible for inclusion in the carbon market are those countries with high forest cover but currently low rates of deforestation or forest degradation (such as Guyana). This is due to questions about the additionality of any actions to maintain these low deforestation rates. While there may be a number of potential approaches for developing baselines for these countries, market-linked mechanisms provide a valuable alternative which might generate greater scales of funding and avoid risks of undermining the integrity of the carbon markets.

5. The Interaction of Carbon Finance Mechanisms with the Timber Trade

5.1 Given the risk of non-permanence and the economic factors that often drive deforestation and forest degradation, it is vital that carbon finance mechanisms support sustainable measures to reduce emissions from forests. Therefore, carbon finance mechanisms must be underpinned by commitments to sustainable forest management. Tackling illegal logging and encouraging sustainable forest management are essential in ensuring forest resources are used in a way that allows us to meet current needs while retaining the integrity of the forest's resources and production capacity for the future. Carbon finance is a potential tool to aid those nations which suffer from deforestation to generate income to tackle poor forest security, inappropriate forest management, and over-harvesting or clearance of forests. If implemented in this way, there is the possibility for carbon finance to encourage sustainable forest management within the timber trade.

5.2 In addition, REDD mechanisms in the post-2012 UN climate agreement should be considered as one approach to address deforestation and forest degradation, alongside further initiatives outside the UNFCCC, for example to deal with demand-side issues and to outlaw trade in illegal timber.

6. Government Progress on Tackling Illegal Timber Since the EAC 2006 Report on Sustainable Timber

6.1 The UK government is pro-active in supporting European legislation and providing support including funding, for other elements of the FLEGT Action Plan, such as the VPA in Indonesia. However, there has been no tangible progress on tackling illegal timber since the EAC report, as implementation of the FLEGT Action Plan has been insufficient.

7. Government Sustainable Procurement of Forest Products

7.1 There has been no tangible progress on sustainable procurement of forest products by UK government departments as a whole. Once again, this is down to lack of practical action to address the problem and inadequate resourcing to meet sustainable procurement policy commitments. There is a gap between administrative and political agendas, and apart from the CPET (Central Point of Expertise on Timber Procurement) mechanism, which has struggled to deliver change or appropriate engagement; no specific efforts have been made to bridge this gap. It is not a government priority at an operational level and does not specifically figure in local authority goals for action on sustainability.

8. The Success or Otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, and Government Support for it

8.1 The UK government has been active in support for the FLEGT programme, and the provision of specific resources to drive FLEGT has been important to its progress. However, this needs to be supported by Europe wide legislation on illegal trade in forest goods to have any real meaning. Standards agreed in the VPAs are critical to success, and to ensure that FLEGT does not lead to more confusion in the market over the comparability of legal standards and assurances.

13 October 2008

Memorandum by The Environmental Investigation Agency (EIA)

1. The Environmental Investigation Agency (EIA) is a UK-based non-governmental organisation. EIA is dedicated to exposing and combating environmental crime. Since its inception in 1984 it has pioneered investigative techniques to documents three major categories of environmental crime; illegal logging and trade in illicit timber, wildlife trafficking, and smuggling of environmentally-harmful chemicals.

2. EIA has spent 10 years documenting illegal logging and trade in stolen timber. This work has involved field investigations in Indonesia, Malaysia, Singapore, Vietnam, Thailand, Laos, China, Honduras, the US and European Union. In addition to investigations EIA has carried out comprehensive capacity building for local NGOs and communities across Indonesia. EIA has been involved in both the development of the EU's Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, and the recent amendment to the US Lacey Act which criminalises the importation and sale of illegally-logged timber and wood products.

3. EIA's unique experience of the illegal logging issue leaves it well placed to provide pertinent information to the inquiry. EIA will limit its submission to two elements of the inquiry:

— Government progress on tackling illegal timber since the EAC 2006 Report on sustainable timber.

— The success or otherwise of the EU FLEGT Action Plan, and Government support for it.

4. Illegal logging is recognised as a major global environmental problem. The World Bank estimates that illegal logging costs developing countries £7.5 billion a year through theft of public assets and non-payment of taxes. Illegal logging is a major driver of tropical deforestation; globally forest loss is the second biggest contributor to greenhouse gas emissions after the energy sector. Indonesia has the world's worst deforestation rate and at the beginning of the decade had an illegal logging rate of 80%. Such drastic forest loss led Indonesia to be ranked as the third biggest emitter of greenhouse gases in 2006. Illegal logging threatens biodiversity; recent data shows that almost 80% of primates in South-East Asia are threatened with extinction, and habitat loss is a major cause. In addition illegal logging robs rural communities of resources and livelihoods, and fosters corruption and weak governance.

5. Illegal logging in producer countries such as Indonesia is directly driven by demand for cheap wood products in major consumer markets like the EU and US. Yet efforts to curtail the worldwide trade in illegally-logged timber are continually undermined by the absence of a legal framework in importing countries to interdict shipments of illegally-logged timber. While progress has been made in combating illegal logging in some producer countries, notably Indonesia, the major consumers of wood products have failed to close their markets to illicit timber.

6. The exception is the US. In May 2008 the US government amended its Lacey Act, effectively outlawing the importation or sale of any timber or wood product which has been logged or transported in contravention of another country's laws. Penalties under the revised act range from confiscation of goods to a prison sentence, depending on the severity of the offence.

7. The EU has failed to implement market controls like those adopted in the US. Under its FLEGT Action Plan the EU envisaged two responses to the problem of illegal logging; Voluntary Partnership Agreements (VPA) with producer countries and consideration of additional legislative options to control imports of illegally-logged timber.

8. The UK has been a major supporter of the VPA process, under which partner countries undertake to only supply timber verified legal to the EU market. EIA believes that VPAs represent a progressive policy solution to tackle illegal logging in producer countries. The VPA process has the potential to reform forest governance in producer countries. For instance in Indonesia the VPA consultation process to date has been transparent and inclusive, with unprecedented participation from civil society. EIA commends the UK government for its support of VPAs.

9. In terms of additional legislative options, the European Commission has repeatedly failed to produce a draft policy, as requested by the Council of Ministers. While the FLEGT Action Plan has been progressively tackling illegal logging in several producer countries under the VPA negotiations, it has manifestly failed to take the necessary measures to exclude illegally-logged timber from the EU market. Such a failure could undermine the effectiveness of VPAs; for instance if Indonesia signed such a VPA, the agreement could be circumvented simply by smuggling timber from Indonesia to China and then into the EU. Indonesia has expressly requested that the EU introduce a new regulation to ban imports of illegally-logged timber during VPA negotiations.

10. Within the EU, the UK is a major importer of illegally-logged timber and wood products. In 2006 it is estimated that the EU imported around £2 billion worth of illegally-sourced wood, with the UK importing 3.2 million cubic metres of stolen wood, worth around £700 million. In 2007 EIA published a briefing document called "Receiving Stolen Goods" calling for the UK to take unilateral action to halt such imports (copy supplied).

11. In its 2006 report the Environmental Audit Committee (EAC) supported the notion of legislation at the UK level if the EU fails to act. The EAC report stated: If the government wants to be taken seriously on its commitment to help protect the world's forests it must introduce as a matter of urgency legislation to prevent illegal timber and timber products from entering the UK market." Two years later the EU has demonstrably failed to act, and the UK government has not brought forward legislation.

12. Meanwhile illegally-logged timber continues to flow into the UK. In September 2008 EIA carried out a random survey of retailers selling flooring made from merbau timber in the UK. Merbau is a luxurious tropical timber species only found in Indonesia, Malaysia and Papua New Guinea. Most remaining merbau on the island of New Guinea, which contains the last intact frontier forests in the Asia-Pacific region. EIA's investigations have revealed a high degree of illegality in the felling and trade of merbau. When EIA staff, posing as customers, called 16 retailers selling merbau flooring, not a single one could prove the legality of the merbau. In several cases the merbau was being sourced from known timber smugglers in Indonesia.

13. EIA believes that the time has come for the UK to demonstrate its commitment to protecting the world's dwindling rainforests by implementing legislation to outlaw the sale and distribution of illegally-sourced timber. A possible template for such legislation already exists in the form of a Private Member's

Bill called the "Illegally Logged Timber (Prohibition of Sale and Distribution) Bill put forward by Barry Gardiner MP. The UK government should support the measures in this bill as a matter of urgency, and take steps to ensure that UK consumers are not unwitting accomplices to the crime of illegal logging.

14. EIA would be available to provide oral testimony to the inquiry is required.

10 October 2008

Memorandum submitted by Global Witness

Global Witness is a UK-based NGO which seeks to end human rights and environmental abuses around the world, in particular natural resource-linked conflict and corruption. Global Witness' work has been both a catalyst and driving force behind the major international initiatives established to address these issues, including the Kimberley Process and the Extractive Industries Transparency Initiative (EITI).

Global Witness aims to achieve sustainability in the forest sector by targeting illegality. Global Witness has been working on illegal logging, forest governance and transparency issues since its formation in 1994. Our work in Cambodia on illegal logging, including an official role working with the government as Independent Forest Monitor from 1999–2003, played a critical part in the establishment of the regional Forest Law Enforcement and Governance (FLEG) and EU FLEGT processes.

Global Witness has campaigned against illegal and destructive logging practices in Burma, Cambodia, Cameroon, the Democratic Republic of Congo (DRC), Honduras, Liberia and Nicaragua. In addition, we are currently working on forest and climate change issues and the destructive practices of industrial scale logging companies.

Summary

— Global Witness supports the creation of an international fund, financed by industrialised countries, to make payments to tropical forest countries, to keep forest standing, as part of a strengthened international deal on climate change.

— Such a fund must take into account the need to reduce emissions from deforestation and degradation and the global environmental services provided by forests such as carbon storage and sequestration.

— Payments could be related, in part, simply to the area of forest that a country oversees rather than on complex carbon accounting.

— Forest carbon credits must not be included in the carbon market.

— Industrial scale logging companies and plantations must not benefit from forest carbon finance.

The Role Financial Mechanisms Might have in Helping to Address Emissions from Land Use Change

Forest-carbon storage, sequestration and emissions

1. To date, the forest climate debate has been, by and large, narrowly focussed on Reducing Emissions from Deforestation and Forest Degradation (REDD). Recent United Nations Framework Convention on Climate Change (UNFCCC) discussions in Bali and Accra have concentrated on forest carbon emissions, as have the World Bank Forest Carbon Partnership Facility[12] (FCPF) and United Nations Collaborative Programme on REDD in Developing Countries[13] (the UN-REDD Programme) initiatives.

2. Such a focus is understandable: The Stern "Review on the Economics of Climate Change", issued on 30 October 2006, found that: "Emissions from deforestation are very significant—they are estimated to represent more than 18% of global emissions, a share greater than is produced by the global transport sector."[14]

3. However, a limited discussion about REDD de facto excludes countries and peoples that currently manage their natural forests responsibly. It also fails to take into account the value of forests, in countries that do have a deforestation and degradation problem, that are not under immediate threat. This could create a perverse incentive for landowners and governments to increase the rate of deforestation and degradation, in order that they might benefit from REDD payments at some point in the future. To be successful therefore, any forest climate change strategy must consider the value of the essential global environmental services that natural forests provide, including carbon storage and sequestration.

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[12] For more information please see: http://carbonfinance.org/Router.cfm?Page=FCPF&ItemID=34267&FID=34267

[13] For more information please see: http://www.undp.org/mdtf/UN-REDD/overview.shtml

[14] For more information please see:
The Review on the Economics of Climate Change, Executive summary (full), 30 October 2006, from: http://www.hm-treasury.gov.uk/independent_reviews/stern_review_economics_climate_change/stern_review_report.cfm

Legal and illegal sources of forest-carbon emissions

4. The forest-climate debate has so far failed to pay adequate, if any, attention to the specific measures required to halt and reverse tropical deforestation. This is perhaps not surprising, given that the discussion is primarily taking place during post-Kyoto negotiations between climate change experts who know little, if anything, about forests, forest governance, or the people who live in and depend upon them.

5. Governments own almost all forest in Africa and Asia and the majority in Latin America. Most deforestation is planned by governments, which sanction the clearance of natural forest to make way for agricultural land, pasture and infrastructure expansion. For example, in early 1980 the government of Indonesia slated 30 million hectares of forest for conversion. By 2002 an equivalent area of forest had been lost.

6. In addition, most forest degradation takes place as a direct result of government policy; it is wholly predictable. 350 million hectares of the world's tropical forests are zoned for timber production, about half currently under government concession. Logging, even selective logging, degrades the forest, a situation made worse in most countries by a lack of government oversight in the field. Logging operations provide easy access for farmers, and others, whose activities may lead to further degradation and, ultimately, to deforestation.

7. Corruption at national, provincial and local levels is almost invariably bad for forests. Uncertainty as to tenure, confused, contradictory or overlapping laws, discretionary powers and lack of transparency all exacerbate the problem.

Financial support for ending deforestation and degradation

8. Global Witness supports the Stern review's recommendation that poor countries that are rich in forests "should receive strong help from the international community, which benefits from their actions to reduce deforestation." Any credible forest climate strategy must include the provision of finance to help bring and end to illegal and legal forest destruction.

9. Significant levels of finance, from industrialised countries, should be made available to forest-rich nations to lift some of the financial and domestic political pressure to convert their forests to industrial agricultural uses, or to log them on an industrial scale.

10. Money should also be targeted at those countries with significant illegal deforestation and degradation problems, to pay for institutional, policy and legal reform, increased transparency and enforcement activities.

11. Such funds could usefully be invested in the following:

- Good governance and successful action to address corruption.
- Increased mapping of community resources, securing legal title to land, and access and user rights for forest dependent people.
- Ensuring that forest policy reform is centred on the improvement of local livelihoods and advances the rights of forest dependent communities.
- Ensuring that forest dependent communities participate fully in forest sector reform, and in the forest management decisions that impact them directly.
- Ensuring that commitments made by countries participating in the regional Forest Law Enforcement and Governance (FLEG) initiatives are implemented in full.
- Legislative reform in timber producing countries so that what is legal equates with just, equitable, transparent and sustainable[15] management of the forest estate.[16]
- Ending the direct financing of logging companies, and sector reform initiatives that favour industrial-scale logging.
- Dismantling industrial-scale logging operations, reducing timber-processing capacity and managing the political transition as established interests are displaced.
- Pro-poor forest-based alternatives to industrial scale logging.
- Independent Forest Monitoring.[17]

[15] According to the World Commission on Environment and Development, sustainable development is: "Development that meets the needs of the present without compromising the ability of future generations to meet their own needs."

[16] According to World Bank Forests Advisor, Gerhard Dieterle, "Illegal logging can be 'need-based' for subsistence, or 'greed-based' for profit."… "Forest laws must be reformed to recognise the needs of the forest-dependent poor. Otherwise, their enforcement is the worst form of violation of equity and justice." (World Bank: Weak Forest Governance Costs US$15 Billion A Year. News Release No:2007/86/SDN)

[17] For more information please see: http://www.globalwitness.org/pages/en/ifm.html

The Environmental and Social Risks and Benefits of Using such Financial Mechanisms

Carbon markets will not stop global warming

12. In the light of recent global financial turmoil relying on market mechanisms, to reduce greenhouse gas emissions and hence the rate of global warming, would appear at best, reckless in the extreme. Global climate security must not be placed in the hands of the bankers and speculators responsible for near financial meltdown. At the time of writing, bailing out the so-called "casino capitalists" has cost governments in excess of $2 trillion. The cost of failing to stop global warming however will be measured not just in monetary terms but also in real physical hardship for billions of people, mass migration, regional instability and increased instances of violent armed conflict.

13. To date, carbon markets, including the European Emissions Trading Scheme (ETS) (the World's largest) and the "cap and trade" system under the Kyoto Protocol to the United Nations Framework Convention on Climate Change (UNFCCC), have delivered little in terms of greenhouse gas emission reductions. It is arguable that the market approach has in fact delayed the critical move to a zero-carbon economy. Global Witness does not therefore consider carbon trading to be the most effective, or indeed equitable, means of reducing greenhouse gas emissions.

14. This position is supported by the likes of George Soros, chairman of Soros Fund Management and the Open Society Institute, Jeffrey Sachs, the distinguished American economist and special advisor to United Nations Secretary-General Ban Ki-Moon, and many NGOs.[18]

15. It is Mr Soros' view that the "cap and trade" approach to reducing greenhouse gas emissions has been adopted for reasons of political expediency rather than because it is more effective than, for instance, a tax on carbon emissions. In his opinion it will be possible for the unscrupulous to make a great deal of money out of carbon trading, "without actually dealing with the problem that it's designed to cure."[19]

16. Professor Sachs does not believe that the current international architecture for reducing greenhouse gas emissions has achieved much. He has argued that the "Wall Street approach" to carbon, with the associated design of complex financial instruments, should be replaced by more simple mechanisms. Professor Sachs argues that carbon taxation is better placed to deliver the finance necessary to combat climate change. Although, according to Sachs, there is little economic difference between a tax and the auctioning of tradable permits, he thinks that the tax option as simpler to administer and easier to adjust as required.[20]

17. Clearly, the main risk associated with a market-based approach to climate change is that it will fail to deliver the desired results, before we reach the point where positive feedback sets in. That is, when the warming of the earth's atmosphere results in change, such as the loss of ice cover and thawing of permafrost, that causes further (potentially runaway) global warming.

Carbon markets will not stop deforestation or degradation

18. As with global warming, the danger of adopting a market-based approach to reducing deforestation and forest degradation is that it simply will not work. This will result in serious negative impacts on 90% of the 1.2 billion people living in extreme poverty who depend on forests for their livelihoods. Significantly, forests contribute directly to the natural environment that supports agriculture and food production for almost half the population of the developing world. Relevant ecosystem services that would be lost as forests are cleared and degraded include watershed protection, soil stabilisation, rainfall generation, climate buffering, and pollination services. In addition, the 90% of terrestrial biodiversity found in the world's forests, a disproportionate share being found in the forests of developing countries, would be at risk.[21]

Government funding is the most appropriate source of finance to pay for combating deforestation and forest degradation

19. For forest protection to work, the funding required must be dependable and long-term. As recent events demonstrate, markets are inherently volatile and unreliable: billions have been wiped off the value of shares and the price of oil, for example, plummeted from a high of almost $150 a barrel in July 2008 to $80 in October 2008.

20. For this, and other reasons (please see below) Global Witness supports the creation of an international fund to keep forest standing, as part of a strengthened international deal on climate change. Parties to the UNFCCC decided to launch formal negotiations on such a deal in Bali, in December 2007. Negotiations are scheduled to conclude by the end of 2009 at the Climate Change Conference in Copenhagen.

[18] For more information please see: http://www.fern.org/media/documents/document_4249_4250.pdf
[19] For more information please see: http://www.pbs.org/moyers/journal/10102008/transcript1.html
[20] For more information please see: http://www.iisd.ca/ymb/climate/eidcc/html/ymbvol154num1e.html
[21] For more information please see: http://siteresources.worldbank.org/INTFORESTS/Resources/SustainingForests.pdf

21. The Brazilian government also favours a fund-based approach to forest protection. More than three million hectares of forest are lost in Brazil each year, almost a quarter of the global total. Clearly, if the international community is to successfully address deforestation and forest degradation it is essential that the Brazilians support the chosen financing mechanism.

22. Significantly the European Commission considers public funding to be the most appropriate source of revenue with which to combat deforestation in the medium-term.[22, 23]

23. In Stern's opinion curbing deforestation "is a highly cost-effective way of reducing greenhouse gas emissions." Norway however, is the only country that has so far committed significant funds to help reduce deforestation and forest degradation in the tropics: up to US$560 million each year for the next five years. If European Community member states were to commit a similar proportion of their combined GDP this would amount to about US$23 billion per annum. Interestingly, this is of the same order of magnitude that Sir Nicholas Stern has suggested is necessary to halve greenhouse gas emissions from forests in the next 10 years:

> "Initial planning should be on the basis of funding of US$15 billion per annum, with revision in the light of pilots and experience, with a view to halving emissions from deforestation in the next decade."[24]

24. It is Global Witness' view that the essential global environmental services that forests provide, including carbon storage and sequestration, should also be accounted for, so that the next international deal on climate change also benefits the countries and peoples that currently manage their natural forests responsibly (please see above). By providing sufficient funds, Annex 1 countries would go some way to convincing developing nations that they are serious about combating global warming.

The Use of Land Use Change Credits in Carbon Markets and in Meeting Emission Targets

25. A far simpler approach than forest carbon accounting is required to ensure fair payments to forest-rich-but-poor countries for the essential global environmental services, including carbon storage and sequestration, that their forests provide. For example the international community could consider payments to these countries based simply on the area of natural forest that they oversee. In addition, it may be considered desirable to make increased payments for forests which support local peoples' livelihoods and, or, high biodiversity. Forests slated for conversion or under concession agreements with industrial logging companies, on the other hand, would receive no such payments.

26. Forests must be kept out of the carbon market. Bringing forests into an international carbon market—enabling countries and companies to buy and trade forest carbon credits in exchange for permission to continue polluting the atmosphere—will neither reduce carbon emissions nor halt deforestation. The purchase of forest-carbon offsets could provide a low-cost option, for industrialised countries and polluting industries, to reducing emissions directly and create a disincentive for investing in the development of clean energy technologies.

27. The Kyoto Protocol's Clean Development Mechanism (CDM) has failed to reduce greenhouse gas emissions and its contribution to sustainable development, a key objective, has been negligible. In an increasing number of cases, CDM projects have exacerbated the plight of poor people by providing additional finance to polluting industries, whose activities are a considerable risk to local livelihoods.[25]

28. The CDM is not designed to deal with key issues relevant to forests, such as permanence of carbon storage, complex land-use change patterns, land tenure, poverty alleviation, indigenous peoples' rights, and corruption.

29. Many countries with significant areas of tropical forest, such as those in the Congo Basin, have such poor governance records that potential investors would most likely be deterred from investing. Carbon markets cannot create the conditions necessary for the market itself to function effectively, for example: security of tenure and clear legal rights, and a functional administration and judiciary. Only government-government direct assistance is ever likely to bring these conditions about.

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[22] According to the European Commission: "Public funding is the most appropriate way to take forward a number of essential activities—in particular capacity building, technical support for forest governance and developing the necessary technical know-how to monitor and enforce commitments. Public funding is also the most realistic tool with which to provide incentives for combating deforestation over the period 2013 to 2020."

[23] For more information please see: COM(2008) 645/3 *"Communication on addressing the challenges of deforestation and forest degradation to tackle climate change and biodiversity loss"* http://eur-lex.europa.eu/LexUriServ/LexUriServ.do?uri=COM:2008:0645:FIN:EN:PDF

[24] For more information please see: "Stern, N. Key Elements of a Global Deal on Climate Change" (2008)

[25] Please see, for example, the documentation relating to projects in India, Brazil, Ecuador and Uganda at www.sinkswatch.org and www.carbontradewatch.org

30. The fact that the European Commission has decided not to include forests in the ETS for at least a decade, and then only after certain issues have been satisfactorily resolved, is a very welcome development.[26] It is Global Witness' view that issues such as monitoring, verification and liability, let alone "additionality"[27] and permanence, are unlikely ever to be resolved to the degree necessary for forest carbon trading operate effectively.

31. Arguments in the Eliasch Review that in the long term a cap and trade system, for achieving reductions in deforestation and forest degradation, performs best against the criteria of effectiveness and equity are far from convincing.[28] REDD on the cheap would appear to be the primary consideration.

The World Bank's Forest Carbon Partnership Facility

32. Please see attached documentation:

Appendix 1: 7 September 2007, NGO letter to Mr. Benoit Bosquet

Appendix 2: 14 November 2007, NGO statement on the FCPF

The Role of Technologies such as Remote Sensing in the Verification of Land Use Change Credits

33. It has been estimated that a global network for forest monitoring, using medium resolution satellites would cost only $12 million to create. Despite this, only Brazil and India regularly monitor and report changes in forest cover using remote sensing. The FAO Forest Resource Assessment remote sensing survey (FRA RSS), using high-resolution satellite data, is restricted to 10% of the world's tropical forests. Significant improvements are planned for the FRA RSS 2010, however the results will still not be representative at a country level. Mexico has compiled detailed forest inventories over time, but again this is an exception that proves the rule. Reaching a consensus on the rate, location, and extent of global forest loss and decline is therefore problematic, and any estimates should be treated with extreme caution. Estimates of deforestation in the dry forests and savannahs of Africa, for instance, vary by a factor of 10.

34. It is interesting to note that 146 of the 228 countries and territories, taking part in the FAO FRA 2005, provided exactly the same net annual forest cover change figures for 2000–05 as for 1990–2000. This is odd, given that net change is the sum of four variable processes: annual deforestation, forest loss due to natural disasters, afforestation and reforestation. It is also interesting to note that for the 79 participants that reported a decrease in net forest cover, between 1990 and 2000, only three (Cambodia, Malaysia and Brazil) reported a significant increase in annual net forest cover loss for 2000–05. Two other countries, Namibia and Argentina reported increased net annual losses, each up by 1,000 hectares. Again this is a rather strange result given the increased pressure on forests due, in particular, to an increase in demand for agricultural land to feed a growing and more affluent global population. For more information please see Appendix 3 Draft Document Avoiding Deforestation.

35. In Asia, Indonesia is currently losing almost 1.9 million hectares each year, followed at some distance by Burma (over 450,000 hectares), the Philippines (over 250,000 hectares), Cambodia and Malaysia. In Africa, Sudan experienced the greatest change losing almost 590,000 hectares, closely followed by Zambia (about 450,000 hectares), Tanzania (over 410,000 hectares), the DRC (almost 320,000 hectares) and Zimbabwe (over 310,000 hectares). In South America, Brazil, with well over half the forest, lost more than all other South American countries combined. Between 2000 and 2005 Brazil lost an average 3.1 million hectares of forest each year, followed by Venezuela (almost 290,000 hectares) and Bolivia (270,000 hectares).

36. Of these, only two, the DRC and Bolivia were included in the Bank's list of 14 "ready" for REDD: six in Africa (the DRC, Gabon, Ghana, Kenya, Liberia, and Madagascar); five in Latin America (Bolivia, Costa Rica, Guyana, Mexico, and Panama); and three in Asia (Nepal, Lao PDR, and Vietnam).

The Success or Otherwise of Government Efforts in Reducing Emissions from International Land Use Change

37. Global Witness is not aware of any UK government efforts, to reduce emissions from international land use change, other than the commitment of funds to as yet untested international initiatives such as the FCPF.

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[26] According to the European Commission: "Recognition of forestry credits in the EU emissions trading system (ETS) would not be realistic at the present time. Emissions from deforestation are roughly three times higher than the amount of emissions regulated under the EU ETS. As the EU ETS is currently the only major operational trading system in the world, allowing companies to buy avoided deforestation credits would result in serious imbalances between supply and demand in the scheme. There are also unresolved monitoring, reporting, verification and liability questions. Forestry credits are temporary and will then have to be replaced after a certain period. This means that, if a company goes out of business, somebody would have to take on this liability to guarantee environmental integrity."

[27] Projects under the Kyoto Protocol's Clean Development Mechanism must demonstrate carbon dioxide reductions that would not have happened under business-as-usual circumstances.

[28] For more information please see: http://www.occ.gov.uk/activities/eliasch/Full_report_eliasch_review(1).pdf

The Interaction of Carbon Finance Mechanisms with the Timber Trade

38. The UK government must ensure that industrial scale logging companies do not benefit from forest-climate funds. Degradation of tropical forests by industrial logging is a significant source of carbon loss. The carbon stock of forests subject to commercial logging, even of a selective nature, is on average significantly less than the carbon stock of natural, undisturbed forests.[29] Furthermore, roads and other infrastructure built to facilitate industrial-scale logging often open up the forest to further exploitation, leading to deforestation and permanent conversion.

39. Forest-living people "want an ample subsistence base, which can also provide means of fulfilling their social and cultural needs, rather than short-term economic benefits from industrial logging and related activities, which may risk their subsistence base in the longer term".[30] In Global Witness' experience, industrial scale logging, rather than reducing rural poverty, has had an entirely detrimental effect on local livelihoods. In countries as diverse as Cambodia and Cameroon, Indonesia and Papua New Guinea (PNG), the poor have become poorer, communities alienated, and the incidence of local conflict increased. In countries, such as Liberia and DRC, where management and control capacity in the field is all but absent, these problems are even more acute, and have in the past been associated with violent armed conflict and regional instability.

40. Making the industrial scale logging concession system work has been a major preoccupation for the World Bank and others, including European governments, in many countries.

41. In Cambodia the Bank funded the Cambodia Forest Concession Management and Control Pilot Project from 2000–05. This project was subsequently the subject of an Inspection Panel investigation, as were Bank activities in the forest sector in DRC. The Cambodia Inspection Panel Investigation Report (IPIR), issued in July 2006, found that: ". . . one could hardly overemphasise the negative effects of the logging on . . . very poor and vulnerable rural communities and indigenous peoples." The Inspection Panel also found that concession logging had "contributed to significant degradation of Cambodia's natural forests and has hastened the conversion of forests to other forms of land use."

42. David Kaimowitz, the former Director General of the Center for International Forestry Research (CIFOR), has described concession logging as "a system that has consistently proved itself to be problematic" and one for which there is "inadequate information about how to make it work properly".

43. That the industrial scale-logging paradigm has failed is not just the view of forest management experts and it is not limited to Cambodia. On 25 July 2006 for example, Baroness Amos, the UK Government's House of Lords spokesperson on international development said: "There is a growing consensus that the traditional concession-based industrial logging model does not generate the desired economic, social and environmental benefits."

44. Even the World Bank has stated recently that "Industrial timber production has a poor record in Africa. Over the past 60 years, there is little evidence that it has lifted rural populations out of poverty or contributed in other meaningful and sustainable ways to local and national development."[31]

45. The Independent Forest Sector Review team in Cambodia concluded that, "the main gainers from the concession system were those allocated concession rights in the first instance." More often than not this has been the case wherever industrial loggers have operated and must not be repeated with respect to forest carbon finance.

Government Sustainable Procurement of Forest Products

46. For information relating to the problems associated with forest certification please see for example: http://www.fsc-watch.org/. The Forest Stewardship Council is probably more credible than the other certification schemes accepted by the UK government as proof of sustainability.

The Success or Otherwise of the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action Plan, and Government Support for it

47. FLEGT and the associated Voluntary Partnership Agreements (VPAs) can help address illegal deforestation, degradation and forest sector governance. Lessons learned from the FLEGT programme could and should inform the debate about how forests, and the people, who live in and depend upon them, can help in the fight against global warming. Minimum requirements for meaningful consultation developed in the context of negotiating VPAs may provide valuable guidance.

48. It should be noted however that there is a danger that FLEGT will further entrench the failed industrial scale logging paradigm, making degradation and deforestation more likely.

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[29] For more information please see: Brendan G Mackey, Heather Keith, Sandra L Berry and David B Lindenmayer, Green Carbon—The role of natural forests in carbon storage, 2008

[30] For more information please see: World Bank Inspection Panel Investigation Report No. 40746-ZR, 31 August 2007

[31] For more information please see: CIRAD, the World Bank and CIFOR, "Forests in Post-Conflict Democratic Republic of Congo. Analysis of a Priority Agenda; 2007

49. It should also be noted that after prevaricating for over five years, the European Commission decided, on 17 October 2008, not to make it illegal to import illegally harvested timber into Europe. The long-awaited proposal for a regulation, "Laying down the obligations of operators who place timber and timber products on the market", instead adopts a systems-based approach.

50. Under the proposed regulation operators have to exercise due diligence to minimise the risk of placing illegally harvested timber and timber products on the market. In turn, it is envisaged that competent authorities in member states will carry out checks to verify if operators are complying with the provisions of the regulation. This is likely to detract from efforts to detect illegal timber imports. In the event of non-compliance operators maybe required to carry out corrective measures.

51. Assessing whether or not a timber trader has exercised due diligence is inherently subjective. Unless being caught in possession of illegal timber is treated as *de facto* proof of a failure to comply, this legislation is very unlikely to provide a deterrent to the determined illegal operator.

52. By way of contrast, legislation passed in the U.S. on 22 May 2008, makes it illegal for a person or company to "import, export, transport, sell, receive, acquire, or purchase" timber or timber products" illegally "taken, harvested, possessed, transported, sold or exported."[32] The beauty of the U.S. Lacey Act is that it is entirely objective, if you are caught with illegal timber you have committed an offence.

53. The Lacey Act creates a number of offences depending on the operator's degree of knowledge at the time of the offence. Knowingly engaging in prohibited conduct could result in a fine of up to $500,000 for a company, $250,000 for a person or twice the maximum value of the transaction. In addition they face a possible prison sentence of up to five years and forfeiture of the goods. Being required to undertake "corrective measures" is unlikely to be as effective a deterrent as the prospect of five years in prison.

54. Timber and timber products from VPA countries will be considered legal for the purposes of the proposed regulation. Effectively this means that timber illegally logged in a third country can be laundered into the system via a partner country and enter Europe accompanied by a valid legality licence, thereby compounding the problems associated with the Commissions earlier directive on illegal logging.[33]

55. As it stands, this legislation is unlikely to have much impact on the illegal timber trade in Europe. In coming months it is essential therefore that the European Parliament and Council of Ministers agree to the changes that are necessary to make this legislation effective.

Plantations are not the same as Natural Forests

56. The UNFCCC defines a forests as, "a minimum area of land of 0.05–1.0 hectares with tree crown cover (or equivalent stocking level) of more than 10–30% with trees with the potential to reach a minimum height of 2–5 metres at maturity *in situ*. A forest may consist either of closed forest formations where trees of various storeys and undergrowth cover a high proportion of the ground or open forest. Young natural stands and all plantations which have yet to reach a crown density of 10–30% or tree height of 2–5 metres are included under forest, as are areas normally forming part of the forest area which are temporarily unstocked as a result of human intervention such as harvesting or natural causes but which are expected to revert to forest."

57. It is Global Witness' view, and that of many other NGOs, that plantations should not be included in the UNFCCC's definition of forest. It is widely accepted that a plantation does not have the same characteristics as a natural forest. Plantations contain only a fraction of the carbon and biodiversity that natural forests have. Monoculture plantations in particular deplete soil quality and water resources, and have many adverse environmental and social impacts. Positive incentives aimed at sustaining standing forests must not end up profiting plantations.

20 October 2008

Supplementary memorandum submitted by the Environmental Investigation Agency (EIA)

1. Since EIA made a submission to the Environmental Audit Committee's Inquiry on "Forests: the future role of carbon markets in their protection and the timber trade", on 10 October 2008, significant developments have occurred regarding legislative measures to address Europe's role as a market driver of illegal logging. In order for the Committee to take these into account, EIA feels several issues and points of interest need to be clarified as a matter of urgency.

[32] For further information please see: www.eia-global.org/lacey/P6.EIA.LaceyReport.pdf

[33] VPAs include inter alia FLEGT licensing schemes whereby timber harvested in the partner country will be issued with a legality licence for export to Europe. For more information please see Council Regulation 2173/2005

2. On 17 October 2008, the European Commission (EC) issued a Proposal for a Regulation laying down the obligations of operators who place timber and timber products on the market.[i] While the action of finally issuing proposed legislation represented progress, EIA considers the substance of the EC's proposal to fall woefully short of what is required to effectively and permanently tackle the problem of Europe's illegal timber market.

3. In November 2008, EIA issued a briefing paper entitled "Due Negligence",[ii] outlining our core concerns with the EC's Due Diligence approach, and making clear and simple recommendations on how to make the framework proposal both workable and effective. EIA was also invited to present a summary of this briefing on 21 January 2009 at a Chatham House meeting to discuss the EC's proposals. Copies of both the briefing paper and the presentation are available on the Chatham House website.[iii]

4. Chiefly amongst EIA's concerns is the fact that the EC's proposal does not prohibit illegal timber, meaning illegal timber will remain legal in the EU market if the regulation is passed without amendment. In fact, not one of the obligations in the EC proposal actually relates to illegal wood itself. Instead, the EC propose to regulate "operator behaviour", and procurement systems and processes, rather than the actual problem—illegal timber.

5. EIA's briefing also highlighted how vagueness and lack of clarity in the Regulation on what a Due Diligence and Risk Assessment regime actually constitutes will result in massive variability of standards, implementation, enforcement and penalties for non-compliance across member states. Circumvention through emerging laundering hubs is the likely outcome. Chatham House has also highlighted how this variability is "almost certain to lead to some member states emerging as vulnerable entry points for illegal products—as they have in the past", and that "the whole system will be only as effective as the first entry point in the EU member state which is the weakest at enforcement".

6. Because only the first company to place timber on the market must comply, and illegal timber is not illegal within the market, the EC's Due Diligence approach will only be as strong as its weakest point, and illegal timber that slips through those weak points is unenforceable thereafter, and can be freely traded throughout the EU.

7. Variability will also prevent the regulation setting clear and common rules across the community, and sets the scene for an uneven playing field in the EU market, despite the fact that the proposal repeatedly claims that common and clear rules for all are core to its aims.

8. Fortuitously, the significant weaknesses of the EC proposal have been identified by the European Council's Committee on the Environment. This Committee has responded in a responsible manner, and has passed amendments that would both clarify and strengthen the due diligence regime, but would also, importantly, make it a criminal offense to make illegal timber available on the market.

9. While these amendments have yet to be passed by the Plenary of the European Parliament with a co-decision by the Agriculture Council of Ministers, the prohibition element, in particular, offers a credible and real opportunity for member states. This will allow Ministers to bring in effective, clear and well targeted measures that will bring accountability to, and underpin, the entire legislative approach. Without such a prohibition EIA feels alternative measures will unravel, resulting in a return to the bad old days of rogue European timber traders profiting from systematic complicity or involvement in crime.

10. Yet, despite the clear opportunity presented by the European Parliament Environment Committee's amendments, EIA is concerned that the UK government may intentionally ignore the opportunity, in support of the weak EC proposal.

11. At the time of writing, the government has not yet consulted on the EC proposal and claims not to have developed a formal position on any legislative option. It has suggested to MPs and EIA supporters that it supports a prohibition and conversely, has clearly expressed its intention to support the EC's original proposal, which does not include a prohibition. EIA considers this to be contradictory.

12. For example, in its 20 December 2006 submission to the EC's online consultation on additional legislative options, the government said a prohibition establishing an offence related to the import, export, transport, sale, receipt, acquisition or purchase of illegal timber and timber products would be effective and would prevent circumvention.

13. Furthermore, in a January 2008 letter to an EIA supporter's MP, the Minister for the Natural and Marine Environment, Wildlife and Rural Affairs, Mr Irranca-Davies wrote "Defra has pressed the case for legislation that would make it an offence to place illegally produced timber on EU markets", adding that "the Government has made public its response to the EC consultation indicating that this option [the Lacey Approach] should be of considerable interest".

14. However, more recently the government seems to be advocating for the EC's model, under which illegal timber will not be prohibited, and will remain legal within the EU market. At the EAC Inquiry on 3 March 2009, Mr Irranca-Davies said "We think the due diligence approach is very much a workable model, but an achievable one . . ." adding that "this is what we are focussing on", and, worryingly, "we have been pushing very hard on the model I have described, and will continue to do so".

15. In the same 3 March 2009 EAC Inquiry, Mr Irranca-Davies also suggested that the government was "not going down the line of a massive octopus of some mechanism, of huge burden", in an apparent reference to a simple prohibition establishing the offense of making illegal timber available in the market. This suggests the government has already decided it does not want illegal timber to be illegal after all. The presentation of a prohibition as some form of mythical beast also indicates the government intends to justify its position through scare tactics, and may have a limited grasp of the opportunity offered by a prohibition.

16. The model the Secretary of State described is indistinguishable from the EC's original proposal, focussing on Due Diligence obligations that: do not require companies to prove the legality of their timber, do not regulate illegal timber in any way once on the market, and cover only companies that first place timber on the EU market.

17. These new positions have been espoused despite the fact that the government has recently told EIA it has not yet formed a position, and that it correspondingly plans to consult on the EC proposal and the amendments made by the European Parliament's Environment Committee around mid-March 2009.

18. EIA is concerned therefore that the planned consultation will merely be a process of rubber-stamping the government's stated support for the EC's weak Due Diligence approach.

19. Added to these serious concerns, the Secretary of State has provided apparently uninformed information to an MP regarding the legal ramifications of the EC legislative proposal. In his 10 November 2008 Written Response to a parliamentary question tabled by Mr John Leech MP, Mr Irranca-Davis claimed the EC proposal would require timber traders "to ensure that the timber they buy and sell is legally harvested", and that once passed the "new requirements will ensure that legally harvested timber only is traded in the EU".

20. These claims would seem to misrepresent the legal ramifications of the EC proposal the Secretary of State is backing. In fact, Article 3, Paragraph 1 of the proposed Regulation states that operators (only those who place timber on the market for the first time and not all operators) should "minimize the risk of placing illegal harvested timber and timber products on the market".

21. The European Parliament's Environmental Committee has recognised this significant deficiency, and has duly amended the regulation to apply to "operators who place or make available timber and timber products on the market", and to clarify that "Operators shall ensure that only legally harvested timber and timber products are made available on the market".

22. EIA therefore advises the EAC to clarify this issue with the Government and to seek answers on whether or not the UK will prohibit illegal timber, by supporting amendments made by the European Parliament's Environment Committee. EIA also seeks answers regarding how the UK government can have an actual position without a formal consultation with stakeholders.

References:

[i] http://www.illegal-logging.info/uploads/flegttimberproposaloct08.pdf

[ii] EIA's "Due Negligence" briefing is available at: http://www.illegal-logging.info/item_single.php?item=document&item_id=702&approach_id=26

[iii] EIA's Presentation to a Chatham House informal Roundtable discussion is available at: http://www.illegal-logging.info/item_single.php?item=presentation&item_id=341&approach_id=26.

5 March 2009

Memorandum submitted by Tracerco

Introduction

1. This brief memorandum is particularly concerned with drawing the Committee's attention to a tracer technology which properly developed could have a significant impact on enhancing and enforcing certification schemes.

Tracerco Credentials

2. Tracerco, now a division of Johnson Matthey Plc., began operating in 1959 and has focused on delivering tracing solutions throughout the hydrocarbon chain—from crude oil through to consumer fuels. Tracerco has a large number of different molecular marker technology platforms that involve chemical, biochemical and isotopic technologies. Tracerco taggants can be used as part of wider fuel brand protection exercises, anti-adulteration programmes, quality assurance and anti-theft investigations. The tracers are unique, organic molecules added to the fuels during production. The typical concentration of molecular markers in products range from parts per trillion (10^{-12}) to parts per million (10^{-6}) and analysis can be hand held portable, mobile or laboratory based.

3. Tracerco is involved in projects that range from small scale supply of tracers to integrated turnkey projects and from company specific solutions to full scale national programmes. Some typical programmes and applications for Tracerco's Tracer Solutions are outlined below.

AdBlue Tracing

4. AdBlue is a high specification fluid used as part of the selective catalytic reduction (SCR) NOx emission control technology to allow heavy duty vehicles to meet EURO IV and EURO V air emission regulations. Following concerns about what fluid a trucker would use in his truck and how to check this, CEFIC the European Chemical Industry Council engaged in a joint development project with Tracerco. The outcome is a unique tracer that can be safely added to the AdBlue fluid to allow adulteration or product substitution to be monitored in the field. The technology has been proven in the field and laboratory and plans are in place for an extended programme in Northern Europe. Engagement is planned with DG ENTR and other appropriate DGs within the Commission as well as with Member States to introduce a regulatory regime to apply to the AdBlue tracer.

Brazilian Gasoline Anti-adulteration

5. The adulteration of gasoline with kerosene and other industrial solvents was a major issue in Brazil during the late 1990's. In 2001 Tracerco was approached by the Brazilian Government to provide an advanced tagging programme to help resolve the issue. Tracerco developed a range of tracers each with its own unique fingerprint, that were added into the kerosene and the other industrial solvents at different origins (eight in total) so that if they were blended with gasoline the source of adulteration can be determined. The programme has been successfully operating now for over seven years with no tracer security issues. There have been numerous prosecutions, which has led to a dramatic decrease in the level of fuel adulteration taking place in the market from over 20% to less than 4%.

PET Tagging

6. Recycled polyethylene terephthalate [PET] is becoming a major source of more environmentally friendly plastics. Specifically used in clothing to replace virgin PET and as a result a premium is charged for it. In conjunction with a major supplier of recycled PET, Tracerco have developed a unique marker system that allows the level of tagged recycled PET within a sample to be determined. RePET tagging will monitor and police the process of virgin PET (which is cheaper) being added to the recycled product.

Palm Oil

7. There is little argument about the need for universally acceptable certification standards for sustainably produced palm oil, but significant differences about exactly what they should be and how to achieve them. A key issue of course is that palm oil produced in a sustainable manner is chemically identical to palm oil produced in a non-sustainable manner. So end-user customers, on receipt of their palm oil, cannot be 100% sure their product conforms to any sustainability criterion that has been declared. But to date all the certification processes are paper exercises, involving documentary track & trace audit schemes.

8. Tracerco has developed a range of chemical tracers that can be added to palm oil under a strict sustainable certification regime. The tracer is fully FDA approved, is added at a concentration of a few parts per billion and has no impact on the palm oil or its use. By adding the tracer only to sustainably certified palm oil, customers are able to take samples of the Palm Oil they receive and test for the tracer. The technology has been developed such that it can detect if 5% of non-tagged palm oil exists within the tagged batch.

9. Tracerco are now engaging with producers, consumers, and civil societies to establish a sustainable and traceable chain of custody for palm oil which will help define and satisfy EU regulatory requirements. Tracerco have embarked on an exploratory alliance agreement with the Malaysian Palm Oil Board (MPOB) and are opening discussions with the Roundtable on Sustainable Palm Oil (RSPO) to develop a pilot project using the tracers.

Relevance to the Timber Trade

10. Tracerco is now addressing the application of its unique tracer technology to timber. We are confident that by using this technology or a derivative, we can develop robust and reliable methods to enable sustainable timber to be traced at all significant points of the supply chain. Such technologies would complement and go beyond the scope of RFID systems. They would also materially assist implementation of the Government's sustainable procurement policy as well as give teeth to the EU Forest Law Enforcement, Governance and Trade (FLEGT) Action plan.

11. Tracerco would like to invite the Committee to address the possibility of recommending the creation of a regulatory road map which will in due course require the application of such reliable physical verification systems.

9 March 2009

Memorandum submitted by the CDC

INTRODUCTION

This note from CDC responds to comments made in the Environmental Audit Committee's recent evidence session with DfID Minister, Mike Foster MP on 9 March 2009. Committee members Joan Walley MP and Martin Horwood MP spoke to Mr Foster about the committee's recent visit to Cameroon and put on the record comments that they had heard about CDC's involvement in the construction of Memve'ele dam. The Department for International Development is CDC's sole shareholder.

CDC is the UK's development finance institution and invests in promising businesses in developing countries. As part of its remit it invests in infrastructural projects that are commercially attractive but which also boost the living standards of people living in some of the world's poorest countries. CDC invests through an intermediated model. It provides capital to local fund managers who invest in the underlying investee businesses in poor countries to help them grow and become more profitable and sustainable. Improving environmental, social and governance guidelines at investee companies is central to this process. By supporting economic growth these investments contribute to poverty reduction. This is particularly true with investments such as Memve'ele because the lack of reliable energy sources in Africa has a profound effect on basic development and economic growth.

Memve'ele is a 200MW Greenfield run of river hydro project located in Southern Cameroon. The concession to develop, finance, build and operate the dam was awarded to Globeleq in August 2007 by the Government of Cameroon. Globeleq is a wholly-owned CDC subsidiary company, managed by Actis. Globeleq planned to meet 30% of the cost of the dam project, with additional financing and support coming from the Development Bank of Central African States, African Development Bank, other European Development Finance Institutions, and the Multilateral Investment Guarantee Agency.

A RESPONSE TO THE COMMENTS MADE BY JOAN WALLEY MP AND MARTIN HORWOOD MP

At the end of the hearing with Mike Foster MP on 9 March (Q225), Joan Walley MP said ". . . CDC Group was involved in the construction of a dam that was going to be covering a large area of pristine rainforest and the indigenous people raised all kinds of issues about that." Mike Horwood MP went on to say (Q226) that, "They (CDC) were flooding rainforest."

These comments do not accurately represent the reality of the situation. There are a number of key facts that the Committee need to be aware of:

1. The proposed dam is relatively small, run of river hydro project and most of the area where the dam would be located has already been designated for forestry concessions.

2. The clearing which has been done so far, or at least since Globeleq has been involved at the project site (September 2007), only relates to:

(a) the opening of a limited right of way to obtain a clear line of sight to carry out topographic surveys (for site study purposes);and

(b) the marking of the site boundaries (for site delineation purposes), and did not result in flooding of the area.

Globeleq was far away from carrying out any substantial clearing of the site as this was a very early development stage of the project. Indeed, total area cleared is estimated at little more than 0.4 square kilometres.

3. During the development phase, the Globeleq team has engaged in regular discussions with key international and local NGOs and frequently communicated with the relevant forestry concession owners about the environmental impact of the dam. It should also be noted that in no circumstance have any issues been raised by local authorities when carrying out this initial work on site and that those authorities were informed beforehand of Globeleq's work plan.

4. A panel of environmental and social specialists is already in place. The terms of reference for the selection of the international consultant who would be charged with undertaking the Environmental and Social Impact Assessment (ESIA), requires the candidate to meet both World Bank operational policies regarding the environment and IFC (International Finance Corporation) performance standards on social and environmental sustainability. More information is available on this here:

http://www.ifc.org/ifcext/sustainability.nsf/Content/EnvSocStandards

5. Globeleq investigated whether it will be possible for the Memve'ele hydro project to earn carbon credits through the Clean Development Mechanism (CDM) process.

6. Globeleq applies the IFC performance standards during the development and operational stage of investments into majority owned assets. It also ensures, for existing assets, that environmental, health and safety management systems (EHSMS) follow international best practice.

7. Unfortunately, due to lack of progress on a number of issues, Globeleq have just informed the Prime Minister of Cameroon that it is withdrawing from development of this project.

CDC takes seriously any suggestions about the environmental and social impact of its investee companies. CDC is confident that there have been high environmental, social and governance standards in place throughout our involvement with the Memve'ele dam. We would ask the committee to withdraw, or at least amend the comments made in the uncorrected evidence of 9 March as they are inaccurate.

6 April 2009

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