

Concept Description: Establishment of a Foundation for Chemicals Management Across North America

Objective:

The objective of this initiative is to improve efforts on reduction of risks of exposure to human health and the environment arising from toxic chemicals in the North American environment by sharing information on policies, institutions, and processes that can be adopted; to increase comparability of chemical management tools across the three countries and to assist Mexico to build their capacity in the sound management of chemical at the national level.

Rationale:

Given the extensive North American trade in chemicals, the Parties recognize the need to provide a foundation for a regional approach to ensure their safe manufacture, transport, use, and disposal. Once the three countries have consistent and appropriate information describing the chemicals they import, export or produce in their own countries, the infrastructure to manage chemical exposures and protect the North Americans and their environment can be fortified.

The policy instruments and management tools which a country selects for national chemicals management can influence its ability to respond to concrete problems affecting its population and the quality of its environment. These instruments and tools must be considered based not only practical implications of the tools but rather taking into consideration the resource implications. The SMOC Working Group will work to identify chemical management approaches of interest to the three Parties, with consideration for those management tools that would be of benefit to Mexico.

Much experience can be shared among the three countries about the merits of various chemical management instruments, the resources needed and the issues and problems faced. Exploring and documenting experiences with these different approaches as implemented in the three countries could provide a useful basis for decision making in selecting further chemicals management policy instruments to be applied.

The SMOC Working Group will seek new opportunities to facilitate pollution prevention in the three countries by building stronger partnerships for sharing information, knowledge and experience among the three countries on chemical management tools.

Key components of the work:

The SMOC WG will use international recognized policy instruments used in the context of chemicals management and decision making, including regulatory and non-regulatory approaches. Such policy instruments may include:

- inventories of existing chemicals;
- Pollution Release and Transfer Registers;
- notification schemes for new chemicals;
- registration schemes;

- classification of chemicals;
- packaging and labeling schemes;
- product registers;
- integrated pest management;
- community/workers' right-to-know programs;
- pollution prevention/cleaner production; and
- life cycle assessment.

The main focus of the SMOC Working Group will be to share information and best practices with the aim to develop compatible approaches across North America that could enhance regulatory activities, and complement them with compatible non-regulatory approaches. Current domestic and international efforts to manage and assess chemicals, such as the Canadian prioritization, the U.S. HPV Challenge program and the OECD HPV Screening Information Data Sets (SIDS) program, could also serve as basis for information exchange. During 2007-2008 Mexico will develop a plan to achieve an integrated approach to chemicals management under SAICM. Such a process is based on a coordinated effort among different stakeholders from government, industry, academia and other sectors of society.

This foundational work will support the ongoing work of the CEC. When possible, work should be linked to the objectives of the CEC's North American Regional Action Plans (NARAPs) and have the potential to contribute to the State of the Environment reports.

Stakeholder Involvement

Historically, stakeholders have been key players in SMOC activities, including participation in Task Forces and at public sessions hosted by the SMOC Working Group. The SMOC Working Group will now work with stakeholders on a more active level, engaging them as partners in realizing the sound management of chemicals, including taking responsibility for action.

Leveraging Funding

A key component of SCCs is the implementation of leveraging strategies to secure outside partners and resources. The SMOC WG will encourage Mexico (with CEC Secretariat assistance where appropriate) to maintain its efforts on behalf of the SMOC initiatives through meetings with appropriate agencies (GEF, WB, PAHO, UNEP¹ and others) who might be in a position to support aspects of the program's work.

Examples of future projects

SMOC Working Group

Inventory of Chemicals in Mexico: Developing a chemical inventory is one step towards managing the chemicals being manufactured, used and disposed of in each country, and traded across the countries. This tool is used to distinguish between new and existing chemicals and can act as the basis for a new chemical notification system (NCNS). Chemical inventories exist as a

¹ GEF: The Global Environment Facility, [WB](#): World Bank, PAHO: Pan-American Health Organization, UNEP: United Nations Environment Programme.

database created from information submitted to government authorities by manufacturers, processors, users, and/or importers. The content of an inventory can range from just the CAS registry numbers (as developed by the Chemical Abstracts Service), the chemical numbers and/or names of chemicals in commerce, to the amount produced and imported by specific location, to the amounts being used for different purposes. The initial inventory could provide a list of the chemicals that exist in commerce, in one or more jurisdictions, and can help to identify new chemicals which can be added to the inventory as these chemicals are assessed.

Towards developing a chemical inventory, the Parties can work together to establish commitment of resources for the development, maintenance and use of the inventory; share information on uniform reporting requirements; and share guidelines on how to define chemicals for the purpose of the inventory, to minimize duplication and avoid misunderstandings concerning which substances are already included on the inventory.

Depending upon the chemical and its uses, manufacturers may consider some of the data that they submit to government authorities as part of an inventory submission to be confidential business information (CBI). The Parties may be able to work together to share information and release information to the public that masks the CBI through the use of generic chemical names, production ranges, and aggregated data.

By providing basic data on the nature of the chemicals being produced, imported, and used in a country, an inventory can provide the foundation for a sound chemical management program. Knowledge gained from such inventories can help guide priorities for use of other instruments. For example, chemicals used in very large quantities with little toxicological data may be a priority for testing. Chemicals used in large quantities with well characterized toxic effects may be a priority for inclusion in a pollutant release and transfer register or be the focus of voluntary product stewardship programs. This project will support the Parties efforts to increase cooperation and efficiency in collective efforts to identify and manage chemical risk.

The SMOC WG will a) hold a trilateral workshop, b) support Mexico's effort to update their national profile c) Canada and the U.S. will provide technical assistance on how they manage their chemical inventories, d) assess the feasibility of sharing non-confidential business information.

Stakeholders

The SMOC WG will work in an open, inclusive, and transparent manner, which will include actively involving industry, business, trade unions, environmental nongovernmental organizations, Aboriginal organizations, academic institutions and other members of civil society in chemicals management initiatives, including a transparent process for selection and prioritization of the initiatives of the Sound Management of Chemicals program.

The CEC will be looking for support from stakeholders to identify possible actions such as:

1. providing assistance to Mexican industry in generating chemical identity, volume, and use information;
2. assisting in product life cycle assessments;
3. assisting in the classification of chemicals;

4. assisting in programs for community/workers right to know programs;
5. occupational exposure assessment; and
6. profiling of persistent, bioaccumulative and toxic substances and human and ecological risk assessment training.

Linkages to work in other international fora/under other international agreements:

Actions supporting sound chemicals management may include work to be carried out in the CEC context, and/or through bilateral, trilateral, or multilateral initiatives of the three countries outside of the CEC (including through UNEP and OECD), and through domestic actions. The CEC recognizes that it is an effective forum through which the three Parties can collaborate on chemical issues of mutual concern, it is not designed, nor does it have the resources to encompass work on all chemical management issues in North America.

The main policy instruments for the management of chemicals have been discussed by UNEP and OECD. Their publications and recommendations could be used to guide some of this work.

Annex: Past CEC Activities and Planned CEC Activities to support the Establishment of a Foundation for Chemicals Management Across North America.

Past/current contributions of SMOC, CEC and the Parties

The CEC's North American Pollutant Release and Transfer Register (PRTR) project tracks and publishes information on the amounts, sources and handling of toxic chemicals from industrial activities in North America, including analyses of trends in pollutant releases and transfers since the early days of NAFTA. Each year the CEC publishes the Taking Stock report and web site, which provide a unique regional picture of pollutant data in North America, based on available data from the national PRTR systems. This year marks the public release of preliminary data on releases of toxic chemicals from over 1,000 industrial facilities in Mexico collected for the 2004 reporting year, under the new *Registro de Emisiones y Transferencia de Contaminantes* (RETC).

In 2000, The Parties supported Mexico in its preparation of an inventory of atmospheric dioxin and furan emissions based on emission factors from the US EPA. Later, after UNEP Chemicals published its *Standardized Toolkit for Identification and Quantification of Dioxin and Furan (D/F) Releases*, Mexico estimated again its D/F emissions. These inventories tracked emissions of dioxins and furans from open burning sources, medical and hazardous waste incineration, and industrial sources.

In 2001, the Parties collaborated to produce the first ever inventory of atmospheric mercury emissions from stationary sources in Mexico using data from 1999. This study focused on estimating emissions from sources such as coal fired power plants, boilers, residential wood burning, smelters and incinerators, to name a few. Mexico now has the ability to assess the contribution of such mercury emissions in a manner consistent with similar work in Canada and the United States.

The Parties worked together to produce Mexico's first national inventory for air emissions, released in September 2006. This is an accomplishment for all of North America because it will help normalize such data across the continent and lead to greater cooperation to combat air pollution. The inventory presents, for the first time, detailed air emissions data from all 32 states and 2,443 municipalities in Mexico for six contaminants that contribute to smog and other air pollution: nitrogen oxides, sulfur oxides, volatile organic compounds, carbon monoxide and ammonia, as well as particulate matter.

Projects identified for immediate action

The priority projects that contribute to the establishment of a foundation for chemicals management across North America are summarized below. These projects are identified in the CEC's Operational Plan for 2007-2009.

The SMOC Working Group has proposed an immediate priority project under this area to be the transfer of information on chemical inventory development. A trilateral workshop is proposed to assess available protocols and information on methodologies for developing chemical inventories, updating the national chemical profiles for Mexico and facilitating comparability of information regarding chemicals among the three countries. While confidential business

information could limit the extent of information sharing, the SMOC Working Group could provide technical assistance to Mexico to develop policies and procedures that could result in addressing data gaps at the domestic level.

In 2007, the SMOC Working Group, through its Mercury Task Force, will work to update Mexico's mercury atmospheric emissions inventory, now using emissions factors developed in Mexico. The information generated through this project will identify sources of mercury in Mexico; allow for the development, implementation, and reinforcement of control measures, safety standards and procedures to manage mercury; create an environmental awareness about the responsible use and disposal of mercury among Mexican people by divulging the results of the project, and establish cooperative links with other national and international organizations and research groups involved in the area.