



## MILLENNIUM CHALLENGE ACCOUNT – INDICATOR DESCRIPTIONS

This document provides detailed descriptions of the indicators the Millennium Challenge Corporation (MCC) uses to evaluate performance against the Millennium Challenge Account (MCA) policy criteria. This document outlines the policies the indicators measure, the indicator methodology, and the underlying source of data, if applicable. MCC favors indicators that: (1) are developed by an independent third party, (2) utilize objective and high-quality data, (3) are analytically rigorous and publicly available, (4) have broad country-coverage and are comparable across countries, (5) have a clear theoretical or empirical link to economic growth and poverty reduction, (6) are policy-linked, i.e. measure factors that governments can influence within a two to three year horizon, and (7) have broad consistency in results from year to year.

For general questions about the application of these indicators, please contact the MCC's Development Policy Team at [DevelopmentPolicy@mcc.gov](mailto:DevelopmentPolicy@mcc.gov).

**RULING JUSTLY CATEGORY:** The six indicators in this category measure just and democratic governance by assessing, *inter alia*, a country's demonstrated commitment to promote political pluralism, equality, and the rule of law; respect human and civil rights, including the rights of people with disabilities; protect private property rights; encourage transparency and accountability of government; and combat corruption.

**Civil Liberties:** This indicator measures country performance on freedom of expression and belief, association and organizational rights, rule of law and human rights, personal autonomy, individual and economic rights, and the independence of the judiciary.

Countries are rated on the following factors:

- independence of the media and the judiciary;
- freedom of cultural expression, religious institutions and expression, and academia;
- freedom of assembly and demonstration, of political organization and professional organization and collective bargaining;
- freedom from economic exploitation;
- protection from police terror, unjustified imprisonment, exile, and torture;
- the existence of rule of law, personal property rights, and equal treatment under the law;
- freedom from indoctrination and excessive dependency on the state; and
- gender equality, equality of opportunity and freedom to travel, reside, work, marry, and determine whether or how many children to have.

**Source:** Freedom House, <http://freedomhouse.org>. Questions regarding this indicator may be directed to Christopher Walker, Director of Studies, (212) 514-8040.

**Methodology:** Freedom House convenes a panel of independent experts to evaluate countries on a 60-point scale – with 60 representing “most free” and 0 representing “least free.” The Civil Liberties indicator is based on a 15 question checklist grouped into four subcategories: Freedom of Expression and Belief (4 questions), Associational and Organizational Rights (3 questions), Rule of Law (4 questions), and Personal Autonomy and Individual Rights (4 questions). Points are awarded to each question on a scale of 0 to 4, where 0 points represents the fewest liberties and 4 represents the most liberties. The highest number of points that can be awarded to the Civil Liberties checklist is 60 (or a total of up to 4 points for each of the 15 questions).

**Political Rights:** This indicator measures country performance on the quality of the electoral process, political pluralism and participation, government corruption and transparency, and fair political treatment of ethnic groups.

Countries are rated on the prevalence of free and fair elections; the ability of citizens to form political parties that may compete fairly in elections; freedom from domination by the military, foreign powers, totalitarian parties, religious hierarchies and economic oligarchies; and the political rights of minority groups. Countries are rated on the following factors:

- free and fair executive and legislative elections; fair polling; honest tabulation of ballots
- fair electoral laws; equal campaigning opportunities;
- the right to organize in different political parties and political groupings; the openness of the political system to the rise and fall of competing political parties and groupings;
- the existence of a significant opposition vote; the existence of a de facto opposition power, and a realistic possibility for the opposition to increase its support or gain power through elections;
- self-determination, self-government, autonomy, and the participation of minority groups through informal consensus in the decision-making process;
- freedom from domination by the military, foreign powers, totalitarian parties, religious hierarchies, economic oligarchies, or any other powerful group in making personal political choices;
- the openness, transparency, and accountability of the government to its constituents between elections; freedom from pervasive government corruption; government policies that reflect the will of the people; and
- the extent to which a government deliberately changes the country’s ethnic composition to affect the political balance of power.

**Source:** Freedom House, <http://freedomhouse.org>. Questions regarding this indicator may be directed to Christopher Walker, Director of Studies, (212) 514-8040.

**Methodology:** Freedom House convenes a panel of independent experts to evaluate countries on a 40-point scale – with 40 representing “most free” and 0 representing “least free.” The Political Rights indicator is based on a 10 question checklist grouped into the three subcategories: Electoral Process (3 questions), Political Pluralism and Participation (4 questions), and Functioning of Government (3 questions). Points are awarded to each question on a scale of 0 to

4, where 0 points represents the fewest rights and 4 represents the most rights. The only exception to the addition of 0 to 4 points per checklist item is Additional Discretionary Question B in the Political Rights Checklist, for which 1 to 4 points are *subtracted* depending on the severity of the situation. The highest number of points that can be awarded to the Political Rights checklist is 40 (or a total of up to 4 points for each of the 10 questions).

**Voice and Accountability:** This indicator measures country performance on the ability of institutions to protect civil liberties, the extent to which citizens of a country are able to participate in the selection of governments, and the independence of the media.

Countries are evaluated on the following factors:

- orderly transfer of power in government; free and fair elections, political competition and party configuration; political participation;
- fairness and transparency of legal system, freedom of speech, religion, assembly and demonstration; independence and credibility of the electoral process; political party freedom/security; power distribution;
- equal opportunity; respect for minorities; human rights; political and social integration;
- “representativeness” and effectiveness of legislature; extent of trust in legislature/government; military involvement in politics; independence and quality of media;
- responsiveness of the government to its constituents; satisfaction with democracy;
- transparency of the business environment and government actions; extent to which businesses are informed of developments in rules and policies and can express concerns;
- strength of volunteerism, trade unionism, and professional associations;
- institutional stability; institutional effectiveness/accountability; and
- budget transparency

Source: World Bank Institute (WBI), <http://www.govindicators.org>. Questions regarding this indicator may be directed to [governancewbi@worldbank.org](mailto:governancewbi@worldbank.org), 202-473-4557.

Methodology: An index of up to 17 different polls and surveys, depending on availability, each of which receives a different weight, depending on its estimated precision and country coverage. WBI draws on data, as applicable, from the Economist Intelligence Unit’s *Country Risk Service*, the *Afrobarometer Survey*, the *Latinobarometro survey*, Columbia University’s *State Capacity Project*, Freedom House’s *Freedom in the World*, *Nations in Transition* report, and *Countries at the Crossroads*, World Economic Forum’s *Global Competitiveness Report*, Gallup International’s *Voice of the People Survey* and *Gallup Millennium Survey*, Institute for Management and Development’s *World Competitiveness Yearbook*, the State Department and Amnesty International’s *Human Rights Report*, World Markets Online Poll, Political Risk Service’s *International Country Risk Guide*, Reporters Without Borders poll data, Bertelsmann Foundation’s *Bertelsmann Transformation Index*, and International Research and Exchange Board’s *Media Index*.

**Government Effectiveness:** This indicator measures country performance on the quality of public service provision, civil service competency and independence from political pressures, and the government's ability to plan and implement sound policies.

Countries are evaluated on the following factors:

- efficacy of the government; the depth of bureaucratic procedures; the quality of government personnel; government instability; bureaucratic insulation from political influences; the existence and implementation of rules that punish errant behavior; decentralization; bureaucratic delay; transparency; competence of government; effectiveness in state structure; global e-governance index;
- general condition of roads; efficiency of mail delivery; quality of public health care provision; effective use of resources;
- proportion of the country's problems it is perceived government can solve; credibility of government's commitment to policies; policies to improve efficiency of the public sector;
- predictability of rule and law changes; officials vis-à-vis private sector individuals; effective implementation of government decisions; policy consistency;
- budget management; efficiency of public expenditure; management of public debt; competence of civil service; wasteful government expenditure; and
- consensus building; reliable pursuit of goals; whether government commitments are honored by new governments.

**Source:** World Bank Institute (WBI), <http://www.govindicators.org>. Questions regarding this indicator may be directed to [governancewbi@worldbank.org](mailto:governancewbi@worldbank.org), 202-473-4557.

**Methodology:** An index of up to 19 different polls and surveys, depending on availability, that rates countries, which receive a different weight, depending on their estimated precision and country coverage. WBI draws on data, as applicable, from the Economist Intelligence Unit's *Country Risk Service*, the *Afrobarometer Survey*, the *Latinobarometro survey*, Columbia University's *State Capacity Project*, Global Insight's *Country Risk Review*, *World Markets Online Poll*, Political Risk Service's *International Country Risk Guide*, the World Bank's *Business Environment and Enterprise Performance Survey*, BERI's *Business Risk Service*, Freedom House's *Nations in Transition* report, World Economic Forum's *Global Competitiveness Report*, the World Bank's *Country Policy and Institutional Assessment*, and Institute for Management and Development's *World Competitiveness Yearbook*, the Asian Development Bank's *Country Policy and Institutional Assessment*, the African Development Bank's *Country Policy and Institutional Assessment*, Bertelsmann Foundation's *Bertelsmann Transformation Index*, Brown University's Center for Public Policy's *Global E-Governance Index*, and Merchant International Group's *Grey Area Dynamics*.

**Rule of Law:** This indicator measures country performance on the extent to which the public has confidence in and abides by rules of society, incidence of violent and nonviolent crime, effectiveness and predictability of the judiciary, and the enforceability of contracts.

Countries are evaluated on the following factors:

- crime losses and costs; how often an individual or family member has feared crime; organized crime; foreign kidnappings; the effectiveness of the police in safeguarding personal safety; a tradition of law and order; trust in police;
- private contract enforceability; government contract enforceability;
- banking corruption; the extent of the black market; the extent of tax evasion;
- security of property rights; protection of intellectual property; and
- predictability of the judiciary; compliance with court rulings; trust in the courts—tribunals and supreme; judiciary’s effectiveness; legal recourse for challenging government actions; ability to sue government through independent and impartial courts; willingness of citizens to accept legal adjudication over physical and illegal measures; and
- trafficking in persons

Source: World Bank Institute (WBI), <http://www.govindicators.org>. Questions regarding this indicator may be directed to [governancewbi@worldbank.org](mailto:governancewbi@worldbank.org), 202-473-4557.

Methodology: An index of surveys up to 21 different polls and surveys, depending on availability, each of which receives a different weight, depending on their estimated precision and country coverage. WBI draws on data, as applicable, from the Economist Intelligence Unit’s *Country Risk Service*, Heritage Foundation’s *Index of Economic Freedom*, State Department/Amnesty International’s *Human Rights Report*, Columbia University’s *State Capacity Project*, Global Insight’s *Country Risk Review*, *World Markets Online Poll*, Political Risk Service’s *International Country Risk Guide*, the World Bank’s *Business Environment and Enterprise Performance Survey*, Freedom House’s *Nations in Transition* report and *Countries at the Crossroads*, BERI’s *Business Risk Service* and *Qualitative Risk Measure*, Gallup’s *Voice of the People Survey*, World Economic Forum’s *Global Competitiveness Report*, the World Bank’s *Country Policy and Institutional Assessment*, and Institute for Management and Development’s *World Competitiveness Yearbook* and the Asian Development Bank’s *Country Policy and Institutional Assessment*, the African Development Bank’s *Country Policy and Institutional Assessment*, Bertelsmann Foundation’s *Bertelsmann Transformation Index*, Merchant International Group’s *Grey Area Dynamics*, and the United States State Department’s *Trafficking in People Report*.

**Control of Corruption:** This indicator measures country performance on the frequency of “additional payments to get things done,” the effects of corruption on the business environment, “grand corruption” in the political arena, and the tendency of elites to engage in “state capture.”

Countries are evaluated on the following factors:

- corruption among public officials;
- frequency of corruption; the effect of corruption on the “attractiveness” of a country as a place to do business: irregular, additional payments connected with import and export permits, business licenses, exchange controls, tax assessments, police protection, and loan applications;
- frequency of “irregular payments” to public officials; corruption as an obstacle to business development; improper practices in public sphere; percentage bribes paid as

- share of revenues from procurement contracts; how many elected and government and border officials, judges or magistrates are thought to be involved in corruption; and
- how well the current government is handling corruption; anti-corruption policies; existence of anti corruption and accounting institutions; civil service transparency and accountability.

Source: World Bank Institute (WBI), <http://www.govindicators.org>. Questions regarding this indicator may be directed to [governancewbi@worldbank.org](mailto:governancewbi@worldbank.org), 202-473-4557.

Methodology: An index of up to 19 different polls and surveys, depending on availability, each of which receive a different weight, depending on their estimated precision and country coverage. WBI draws on data, as applicable, from the Economist Intelligence Unit's *Country Risk Service*, the *Afrobarometer Survey*, the *Latinobarometro survey*, Columbia University's *State Capacity Project*, Global Insight's *Country Risk Review*, *World Markets Online Poll*, Business Environment Risk Intelligence's *Business Risk Service* and *Qualitative Risk Measure*, Political Risk Service's *International Country Risk Guide*, the World Bank's *Business Environment and Enterprise Performance Survey*, Freedom House's *Nations in Transition* report and *Countries at the Crossroads*, World Economic Forum's *Global Competitiveness Report*, the World Bank's *Country Policy and Institutional Assessment*, and Institute for Management and Development's *World Competitiveness Yearbook*, the Asian Development Bank's *Country Policy and Institutional Assessment*, the African Development Bank's *Country Policy and Institutional Assessment*, Merchant International Group's *Grey Area Dynamics*, and Political Economic Risk Consultancy's *Corruption in Asia*.

**ENCOURAGING ECONOMIC FREEDOM:** The six indicators in this category measure the extent to which a government encourages economic freedom by assessing, *inter alia*, demonstrated commitment to economic policies that encourage individuals and firms to participate in global trade and international capital markets, promotion of private sector growth and the sustainable management of natural resources, strength of market forces in the economy, and respect for worker rights, including the right to form labor unions.

**Regulatory Quality:** This indicator measures country performance on the burden of regulations on business, price controls, the government's role in the economy, foreign investment regulation, and many other areas.

Countries are evaluated on the following factors:

- regulations that impose a burden on business; government intervention in the economy;
- ease to start a new business; regulations on new businesses;
- labor market policies; wage and price controls;
- trade policy; tariff and non-tariff barriers; export and import regulations; the effect of customs on international trade;
- investment policies attractiveness; financial regulations on foreign investment and capital; legal restrictions on ownership of business and equity by non-residents;

- foreign currency regulations; general uncertainty about regulation costs; legal regulation of financial institutions; controls on foreign investors' ownership of companies;
- extensiveness of legal rules and effectiveness of legal regulations in the banking and securities sectors; costs of uncertain rules, laws, or government policies;
  - protection of domestic banks from foreign competition; barriers to entry in the banking sector; heavily-regulated interest rates; transfer costs associated with exporting capital; price stability;
  - participation of the private sector in infrastructure projects; dominance of state-owned enterprises; openness of public sector contracts to foreign investors; extent of market competition; effectiveness of anti-trust policies; new legislation restricting competitiveness; and
  - tax systems that undermine business competitiveness; pro-investment tax policies; tax system efficiency/corruption/ complexity; real personal and corporate taxes.

Source: World Bank Institute (WBI), <http://www.govindicators.org>. Questions regarding this indicator may be directed to [governancewbi@worldbank.org](mailto:governancewbi@worldbank.org), 202-473-4557.

Methodology: An index of up to 15 different polls and surveys, depending on availability, each of which receives a different weight, depending on their estimated precision and country coverage. WBI draws on data, as applicable, from the Economist Intelligence Unit's *Country Risk Service*, the European Bank for Reconstruction and Development's *Transition Report*, Global Insight's *Country Risk Review*, *World Markets Online Poll*, Political Risk Service's *International Country Risk Guide*, the World Bank's *Business Environment and Enterprise Performance Survey*, Heritage Foundation's *Index of Economic Freedom*, World Economic Forum's *Global Competitiveness Report*, the World Bank's *Country Policy and Institutional Assessment*, Institute for Management and Development's *World Competitiveness Yearbook*, the Asian Development Bank's *Country Policy and Institutional Assessment*, the African Development Bank's *Country Policy and Institutional Assessment*, Bertelsmann Foundation's *Bertelsmann Transformation Index*, Merchant International Group's *Grey Area Dynamics*, and the United Nation's Economic Commission for Africa's *Africa Governance Indicators*.

**Inflation:** This indicator measures the government's commitment to sound monetary policy and private sector growth.

Source: MCC's source for inflation data is the IMF's World Economic Outlook (WEO) database, <http://www.imf.org>.

Methodology: The most recent 1-year change in consumer prices. The indicator reflects annual percentage change averages for the year, not end-of-period data.

**Fiscal Policy:** This indicator measures the government's commitment to prudent fiscal management and private sector growth.

Source: U.S. Embassies typically collect fiscal policy data through a Candidate Country's Ministry of Finance. All of these data were then cross-checked with IMF sources – in particular, the World Economic Outlook (WEO) – to ensure their accuracy, <http://www.imf.org>.

Methodology: The overall budget deficit divided by GDP, averaged over a three-year period. The data for this indicator are provided directly by the recipient government and cross-checked with other sources and made publicly available to try to ensure consistency across countries. In calculating the fiscal balance, donor funds are included in total expenditures and both revenues and expenditures include the consolidated public sector (i.e. state-owned enterprises and semi-autonomous institutions). If general government balance data were not available, MCC relied on central government balance data.

**Days to Starting a Business:** This indicator measures government regulations that impact the business climate, specifically the number of days necessary to start a new business.

Source: The Private Sector Advisory Service of the World Bank Group, <http://www.doingbusiness.org/>. Questions regarding this indicator may be directed to Simeon Djankov, Manager of the Monitoring, Analysis and Policy Unit at the International Finance Corporation, [sdjankov@worldbank.org](mailto:sdjankov@worldbank.org), (202) 473-4748.

Methodology: Local lawyers and other professionals examine specific regulations that impact business investment measuring the days it takes to open a new business, recorded in calendar days. It is assumed that the minimum time required per procedure is 1 day. Time captures the median duration that incorporation lawyers indicate is necessary to complete a procedure. If a procedure can be accelerated for an additional cost, the fastest procedure is chosen. It is assumed that the entrepreneur does not waste time and commits to completing each remaining procedure without delay. The time that the entrepreneur spends on gathering information is ignored. It is assumed that the entrepreneur is aware of all entry regulations and their sequence from the beginning.

To make the data comparable across countries, several assumptions about the business and the procedures are used. The business:

- Is a limited liability company. If there is more than one type of limited liability company in the country, the most popular limited liability form among domestic firms is chosen. Information on the most popular form is obtained from incorporation lawyers or the statistical office;
- Operates in the country's most populous city;
- Is 100% domestically owned and has 5 owners, none of whom is a legal entity;
- Has start-up capital of 10 times income per capita at the end of 2004, paid in cash;
- Performs general industrial or commercial activities, such as the production or sale of products or services to the public. It does not perform foreign trade activities and does not handle products subject to a special tax regime, for example, liquor or tobacco. The business is not using heavily polluting production processes;
- Leases the commercial plant and offices and is not a proprietor of real estate;
- Does not qualify for investment incentives or any special benefits;



- Has up to 50 employees 1 month after the commencement of operations, all of them nationals;
- Has a turnover at least 100 times income per capita; and
- Has a company deed 10 pages long.

**Cost of Starting a Business:** This indicator measures government regulations that impact the business climate, specifically the cost of starting a new business.

**Source:** The Private Sector Advisory Service of the World Bank Group, <http://www.doingbusiness.org/>. Questions regarding this indicator may be directed to Simeon Djankov, Manager of the Monitoring, Analysis and Policy Unit at the International Finance Corporation, [sdjankov@worldbank.org](mailto:sdjankov@worldbank.org), (202) 473-4748.

**Methodology:** Local lawyers and other professionals examine specific regulations that impact the cost of opening a new business. The local lawyer and/or other professionals are instructed to record all generic procedures that are officially required for an entrepreneur to start up an industrial or commercial business. These include obtaining all necessary licenses and permits and completing any required notifications, verifications or inscriptions with relevant authorities. After a study of laws, regulations and publicly available information on business entry, a detailed list of procedures, time, cost and paid-in minimum capital requirements is developed. Subsequently, local incorporation lawyers and government officials complete and verify the data on applicable procedures, the time and cost of complying with each procedure under normal circumstances and the paid-in minimum capital. On average 4 law firms participate in each country. Information is also collected on the sequence in which procedures are to be completed and whether procedures may be carried out simultaneously. It is assumed that any required information is readily available and that all government and non-government agencies involved in the start-up process function efficiently and without corruption. If answers by local experts differ, inquiries continue until the data are reconciled.

To make the data comparable across countries, several assumptions about the business and the procedures are used. The business:

- Is a limited liability company. If there is more than one type of limited liability company in the country, the most popular limited liability form among domestic firms is chosen. Information on the most popular form is obtained from incorporation lawyers or the statistical office;
- Operates in the country's most populous city;
- Is 100% domestically owned and has 5 owners, none of whom is a legal entity;
- Has start-up capital of 10 times income per capita at the end of 2004, paid in cash;
- Performs general industrial or commercial activities, such as the production or sale of products or services to the public. It does not perform foreign trade activities and does not handle products subject to a special tax regime, for example, liquor or tobacco. The business is not using heavily polluting production processes;
- Leases the commercial plant and offices and is not a proprietor of real estate;
- Does not qualify for investment incentives or any special benefits;

- Has up to 50 employees 1 month after the commencement of operations, all of them nationals;
- Has a turnover at least 100 times income per capita; and
- Has a company deed 10 pages long.

The text of the company law, the commercial code and specific regulations and fee schedules are used as sources for calculating the cost of start-up. If there are conflicting sources and the laws are not clear, the most authoritative source is used. The constitution supersedes the company law, and the law prevails over regulations and decrees. If conflicting sources are of the same rank, the source indicating the most costly procedure is used, since an entrepreneur never second-guesses a government official. In the absence of fee schedules, a government officer's estimate is taken as an official source. In the absence of a government officer's estimate, estimates of incorporation lawyers are used. If several incorporation lawyers provide different estimates, the median reported value is applied. In all cases the cost excludes bribes.

**Trade Policy:** This indicator measures a country's openness to international trade based on average tariff rates and non-tariff barriers to trade. Countries are rated on the following factors:

- Weighted average tariff rates;
- Non-tariff barriers (such as import licenses, trade quotas, production subsidies, anti-dumping, countervailing, and safeguard measures, government procurement procedures, local content requirements, excessive marking and labeling requirements, export assistance, export taxes, and tax concessions); and
- Corruption in the customs service.

Source: The Heritage Foundation, Index of Economic Freedom, <http://www.heritage.org/research/features/index/index.cfm>.

Methodology: In response to a request from MCC, the Heritage Foundation has re-scaled the trade policy component of its *Index of Economic Freedom* to provide greater differentiation among countries. The new scale ranges from 0 to 100, where 0 represents the highest level of protectionism and 100 represents the lowest level of protectionism. The equation used to convert tariff rates and non-tariff barriers into this 0-100 percent scale is presented below:

$$\text{Trade Policy}_i = (\text{Tariff}_{\max} - \text{Tariff}_i) / (\text{Tariff}_{\max} - \text{Tariff}_{\min}) - \text{NTB}_i$$

Trade Policy<sub>*i*</sub> represents the trade freedom in country *i*, Tariff<sub>max</sub> and Tariff<sub>min</sub> represent the upper and lower bounds (50 and zero percent respectively), and Tariff<sub>*i*</sub> represents the weighted average tariff rate in country *i*. The result is multiplied by 100 to convert it to a percentage. If applicable to country *i*, an NTB penalty of 20 percentage points is then subtracted from the base score.

As its primary source, the Heritage Foundation relies on weighted average tariff rates (weighted by imports from the country's trading partners) from the World Bank's *World Development Indicators 2005* and *Data on Trade and Import Barriers: Trends in Average Tariff Rates for Developing and Industrial Countries 1981-2003*. Since these data are not reported annually, the authors also rely on a number of secondary sources, including the World Trade Organization's

*Trade Policy Reviews* (1995 to March 2005), the Office of the U.S. Trade Representative's 2005 *National Trade Estimate Report on Foreign Trade Barriers*, the U.S. Department of Commerce's 2004 and 2005 *Country Commercial Guide*, the Economist Intelligence Unit's 2004-2005 and 2005-2006 *Country Reports*, *Country Profiles*, and *Country Commerce* data, and "official government publications of each country." In the absence of weighted average applied tariff rate data, a country's average applied tariff rate is used. In the absence of average applied tariff rate data, the weighted average or the simple average of most favored nation tariff rates are used. In the absence of these data, the authors use tariff and duty revenues as a percentage of total imported goods. Finally, if these data are unavailable, the authors rely on measures of international trade taxes.

**INVESTING IN PEOPLE:** The four indicators in this category measure investments in people, particularly women and children, by assessing programs that promote broad-based primary education, strengthen and build capacity to provide quality public health, and reduce child mortality.

**Total Public Expenditure on Health:** This indicator measures the government's commitment to investing in the health and well-being of its people.

Source: The World Health Organization compiles data on public health expenditure for nearly all member countries. See <http://www.who.int/nha/en/>.

Methodology: This indicator measures general government health expenditure as a percentage of Gross Domestic Product (GDP). General government health expenditure (GGHE) includes outlays earmarked for health maintenance, restoration or enhancement of the health status of the population, paid for in cash or in kind by the following financing agents: central/federal, state/provincial/regional, and local/municipal authorities; extrabudgetary agencies, social security schemes; and parastatals. All can be financed through domestic funds or through external resources (mainly as grants passing through the government or loans channeled through the national budget). GGHE includes both recurrent and investment expenditures (including capital transfers) made during the year. The classification of the functions of government (COFOG) promoted by the United Nations, the International Monetary Fund (IMF), OECD and other institutions sets the boundaries for public outlays. Figures are originally estimated in million national currency units (million NCU) and in current prices. GDP data are primarily drawn from the United Nations National Accounts statistics.

**Total Public Expenditure on Primary Education:** This indicator measures the government's commitment to investing in primary education.

Source: The United National Educational, Scientific, and Cultural Organization (UNESCO) Institute for Statistics is MCC's primary source of data; [www.uis.unesco.org](http://www.uis.unesco.org). UNESCO compiles primary education expenditure data from official responses to surveys and from reports provided by education authorities in each country. Questions regarding this indicator may be directed to Said Voffal, Programme Specialist, UNESCO Institute for Statistics, [s.voffal@uis.unesco.org](mailto:s.voffal@uis.unesco.org), (514)-343-7752.

As a secondary source, MCC relies on Primary Education Expenditure data reported by national governments. In its data request to Candidate Countries, MCC requests inclusion of all government expenditures, including sub-national expenditures (both current and capital) and the consolidated public sector (i.e. state-owned enterprises and semi-autonomous institutions), but exclusion of donor funds unless it is not possible to disaggregate them. All data are requested in current local currency (not a constant base year, not dollars). Questions regarding these data can be directed to Brad Parks, Development Policy Officer at the Millennium Challenge Corporation, [parksbc@mcc.gov](mailto:parksbc@mcc.gov), (202) 521-3613.

**Methodology:** UNESCO attempts to measure total current and capital expenditure on primary education at every level of administration—central, regional, and local. UNESCO data generally include subsidies for private education, but not foreign aid for primary education. UNESCO data may also exclude spending by religious schools, which plays a significant role in many developing countries.

In its data request to Candidate Countries, MCC asks that public expenditure on primary education be measured consistent with the IMF's definition of primary education expenditure in *Government Finance Statistics* (GFS Line 707), which in turn relies on the 1997 International Standard Classification of Education (ISCED-97). Government outlays on primary education include expenditures on services provided to individual pupils and students and expenditures on services provided on a collective basis. Primary education includes the administration, inspection, operation, or support of schools and other institutions providing primary education at ISCED-97 level 1. It also includes literacy programs for students too old for primary school.

**Immunization:** This indicator measures a government's commitment to providing essential public health services and reducing child mortality.

**Source:** The World Health Organization compiles data on immunization rates for nearly all member countries; [www.who.int/immunization\\_monitoring/data/](http://www.who.int/immunization_monitoring/data/).

**Methodology:** MCC uses the average of DTP3 and measles immunization rates. The DTP3 immunization rate is measured as the number of children that have received their third dose of the diphtheria, pertussis (whooping cough), and tetanus toxoid vaccine divided by the number of children that have survived their first birthday. The measles immunization rate is measured as the number of children that have received their first dose of measles vaccine divided by the number of children that have survived their first birthday.

To estimate national immunization coverage, the WHO and UNICEF draw on administrative data from service providers and household survey data on children's immunization histories. Estimates of the most likely true level of immunization coverage are made based on the data available, consideration of potential biases, and contributions of local experts. Lack of precise information on the size of the cohort of one-year-old children can make immunization coverage difficult to estimate from program statistics.

**Girls' Primary Education Completion Rate:** This indicator measures a government's commitment to investing in basic education for girls in terms of access, enrollment, and retention.

Source: UNESCO's Institute for Statistics (UIS); [www.uis.unesco.org](http://www.uis.unesco.org). Questions regarding this indicator may be directed to Said Voffal, Programme Specialist, UNESCO Institute for Statistics, [s.voffal@uis.unesco.org](mailto:s.voffal@uis.unesco.org), (514)-343-7752.

Methodology: Girls' Primary Education Completion Rate is measured as the number of female students that have successfully completed their last year of primary school, minus the number of repeaters in that grade, divided by the total number of female children of official graduation age. The primary completion rate reflects the primary cycle as defined by the International Standard Classification of Education (ISCED), ranging from three or four years of primary education (in a very small number of countries) to five or six years (in most countries), and seven (in a small number of countries). For the countries that changed the primary cycle, the most recent ISCED primary cycle is applied consistently to the whole series.

#### **SUPPLEMENTAL INFORMATION:**

**Natural Resource Management:** This composite indicator measures a government's commitment to sound management of water resources and water systems, proper sewage disposal and sanitary control, air quality standards, habitat preservation, and biodiversity protection.

Source: Columbia University's Center for International Earth Science Information Network (CIESIN) and the Yale Center for Environmental Law and Policy (YCELP); <http://sedac.ciesin.columbia.edu/es/mcc.html>. Questions regarding this indicator may be directed to Marc Levy, Associate Director for Science Applications, CIESIN, [marc.levy@ciesin.columbia.edu](mailto:marc.levy@ciesin.columbia.edu)

Methodology: This index is calculated as the un-weighted average of four indicators:

- **Eco-region Protection:** Developed by CIESIN, this indicator assesses whether a country is protecting at least 10% of all of its biomes (e.g. deserts, forests, grasslands, aquatic, and tundra). It is designed to capture the comprehensiveness of a government's commitment to habitat preservation and biodiversity protection. World Wildlife Fund provides the underlying eco-region data, and the United Nations Environment Program World Conservation Monitoring Center – in partnership with the IUCN World Commission on Protected Areas and the World Database on Protected Areas Consortium – provide the underlying data on protected areas.
- **Access to Improved Sanitation:** Produced by WHO and UNICEF, this indicator measures the percentage of the population with access to facilities that hygienically separate human excreta from human, animal, and insect contact. Facilities such as sewers or septic tanks, poor-flush latrines and simple pit or ventilated improved pit latrines are assumed to be adequate, provided that they are not public.

- **Access to Improved Water:** Produced by WHO and UNICEF, this indicator measures the percentage of the population with access to at least 20 liters of water per person per day from an “improved” source (household connections, public standpipes, boreholes, protected dug wells, protected springs, and rainwater collection) within one kilometer of the user’s dwelling.
- **Child Mortality (Ages 1-4):** Produced by the Population Division of the United Nations Department of Economic and Social Affairs, this indicator measures the probability of a child dying between the ages of 1 and 4. Because the causes of child mortality among 1-4 year olds are predominantly environmental, this indicator is considered to be an excellent proxy for underlying environmental conditions.

**Land Rights and Access:** This index evaluates whether and to what extent governments are investing in secure land tenure, which facilitates long-term investments in land productivity and diminishes the likelihood of short-term actions with negative environmental impacts such as slash-and-burn agriculture and deforestation.

**Source:** International Fund for Agricultural Development (IFAD) and the International Finance Corporation (IFC). For more on IFAD’s indicator methodology, see [www.ifad.org/gbdocs/gc/27/e/GC-27-L-6.pdf](http://www.ifad.org/gbdocs/gc/27/e/GC-27-L-6.pdf) . The 2004 IFAD country scores are available at [www.ifad.org/gbdocs/gc/28/e/GC-28-L-9.pdf](http://www.ifad.org/gbdocs/gc/28/e/GC-28-L-9.pdf). Questions regarding the IFAD indicator may be directed to Brian Baldwin, Senior Operations Management Adviser, Programme Management Department, [b.baldwin@ifad.org](mailto:b.baldwin@ifad.org), 39-0654592377. For more on the IFC’s data and indicator methodology, see: [www.doingbusiness.org](http://www.doingbusiness.org). Questions regarding the IFC indicators may be directed to Simeon Djankov, Manager of the Monitoring, Analysis and Policy Unit at the International Finance Corporation, [sdjankov@worldbank.org](mailto:sdjankov@worldbank.org), (202) 473-4748.

**Methodology:** This index is calculated as the weighted average of three indicators:

- **Access to Land:** Produced by IFAD, this indicator assesses the extent to which the institutional, legal and market framework provides secure land tenure and equitable access to land in rural areas. It is made up of five subcomponents: (1) the extent to which the law guarantees secure tenure for land rights of the poor; (2) the extent to which the law guarantees secure land rights for women and other vulnerable groups; (3) the extent to which land is titled and registered; (4) the functioning of land markets; and (5) the extent to which government policies contribute to the sustainable management of common property resources.
- **Days to Register Property:** Produced by the IFC, this indicator measures how long it takes to register property in the capital city. The IFC records the full amount of time necessary when a business purchases land and a building, and to transfer the property title from the seller to the buyer so that the buyer can use the title for expanding business, as collateral in taking new loans, or, if necessary, to sell to another business.

- **Cost of Registering Property:** Produced by the IFC, this indicator measures the cost to register property as a percentage of the value of the property in the capital city. The IFC records all of the costs that are incurred when a business purchases land and a building to transfer the property title from the seller to the buyer, so that the buyer can use it for expanding his business, as collateral in taking new loans, or, if necessary, to sell it to another business.

Since each of the three sub-components of the Land Rights and Access index have different scales, MCC created a common scale for each of the indicators through a process of “normalization.” Each indicator was transformed using a simple formula:

$$\text{Country X's Normalized score} = \frac{\text{Maximum observed value} - \text{Country X's raw score}}{\text{Maximum observed value} - \text{Minimum observed value}}$$

After each of the three sub-components was transformed into a common scale, MCC calculated the Land Rights and Access Index using the following formula:

$$\text{Land Rights and Access} = .5(\text{IFAD}) + .25(\text{IFC Time to Register Property}) + .25(\text{IFC Cost of Registering Property})$$

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