SDG indicators: The forest is missing

by Roberto Bissio

Almost three years after the adoption of the 2030 Agenda at the highest level of the United Nations, the indicators to assess its progress are still being debated. The set of indicators around which there is agreed methodology and available data (known as Tier I in the insiders' jargon) shows a great degree of overlap with the existing indicators for the Millennium Development Goals (MDGs) and misses most aspects of the Sustainable Development Goals (SDGs) that make them transformative or represent a paradigm change.

There are 93 indicators in Tier I of the SDGs (see Table 1), of which 42 are either identical to or an elaboration of (e.g., disaggregated by sex, etc.) the already existing MDG indicators. And some important MDG indicators, particularly those related to implementation, have been lost.

Ten of the Tier I indicators relate to SDG 3 on health and well-being and seven illustrate the Agenda 2030-specific SDG 9 on infrastructure and industrialization. SDG 16, on governance issues has 12 targets but only five of them have indicators on the Tier I list. SDG 10 on reducing inequalities only has three Tier I indicators, two of which were already part of the MDGs. None of them relate, not even vaguely, to inequalities within countries, even when the application of the Gini index to income or wealth meets all the methodological and data availability requirements that define Tier I. Under both SDG 10 and SDG 16 there is a Tier I indicator about voting rights of developing countries in international institutions. At the UN, developing countries have a large majority of the General Assembly votes, but in the World Bank and the IMF weighted voting reflects the big asymmetries in wealth and power among countries that are not otherwise measured by the SDG indicators. For an analysis of the indicator

classification by tiers and their significance see GPW Briefing 22, "The Ups and Downs of Tiers: Measuring SDG Progress".

SDG 17, on implementation, has now nine additional indicators when compared with the MDGs, three of them measuring support to national statistics offices. But the MDGs assessed implementation with indicators for key policies that are not on the current list of the SDGs (see "Lost in Translation" below). For example, the measure of "untied" Official Development Assistance (ODA) has disappeared, and three indicators addressing basic trade concerns of developing countries (on tariffs for developing countries exports and agricultural subsidies of OECD countries) are also lost in the new set.

Similarly, the MDG 8 indicators for debt relief under HIPC have disappeared, even when those have all the characteristics required for Tier I and SDG Target 17.4 explicitly demands debt relief and debt restructuring, for which those indicators would be appropriate. Instead the only indicator for this target is a figure for debt service in relation to exports. This is, of course, very important in order to diagnose the magnitude of the problem, but it gives no hint as to the efforts made to solve it, as the previous MDG indicators did.

A similar "downgrade" of the MDG indicators happens with regard to climate change. While MDG indicator 7.2 measured the total CO_2 emissions, as well as their ratio, per capita and per dollar of GDP, the equivalent SDG indicator 9.4.1 only measures "CO_2 emission per unit of value added", thus losing the total and per capita figures. This clearly conceals the responsibility of developed countries, some of which have high efficiency in terms of CO_2 emissions per income produced, but also much higher totals and per capita values.

While considerable efforts are going into producing many SDG indicators disaggregated by sex, which helps diagnose the situation of women, the SDGs have lost the previously existing MDG indicator for the share of women in wage employment in the non-agricultural sector. Instead, the new indicator 8.3.1 measures the proportion of informal employment in non-agricultural sectors, disaggregated by sex, which should complement but not substitute for the previous one. In fact, according to the comprehensive UN Women report on gender equality in the 2030 Agenda, "only 10 of the 54 gender-specific indicators are produced with enough regularity to be classified as Tier I. Only two indicators under SDG 5 are currently classified as Tier I. These are indicators 5.5.2 on women in managerial positions and 5.b.1 on individuals who own a mobile phone, by sex."[1]

The previously existing MDG indicator on the ratios of girls to boys in primary, secondary and tertiary education also disappeared from the agreed list. It is not to be found under the gender goal, nor under education, where the previously existing MDG indicator on enrollment in primary education has also disappeared. Under 4.5.1 the official list demands "parity indices (female/male, rural/urban, bottom/top wealth quintile and others such as disability status, indigenous peoples and conflict-affected, as data become available) for all education indicators on this list that can be disaggregated".

It is unconceivable that well established and widely used indicators, such as school enrollment or illiteracy rate stop being relevant and fall off the list. These indicators are certainly not enough and that is the reason behind the formulation of the very first educational target of the SDGs: "4.1 By 2030, ensure that all girls and boys complete free, equitable and quality primary and secondary education leading to relevant and effective learning outcomes."

The suggested indicator for that target reads: "4.1.1 Proportion of children and young people (a) in grades 2/3; (b) at the end of primary; and (c) at the end of lower secondary achieving at least a minimum proficiency level in (i) reading and (ii) mathematics, by sex." The methodology for the lower age group (a) needs more work, relegating it to Tier III while for the other categories the availability of data is poor, leaving it as Tier II. As a result, the old and insufficient

but existing enrollment indicators were dropped before having sufficient measures to replace them.

This odd situation derives from the "counting each tree and missing the forest methodology" used so far by the Inter-agency and Expert Group on SDG Indicators (IAEG-SDGs) that attempts to find one indicator for each of the 169 targets but doesn't consider the goal itself, under the apparent assumption that the goal is the sum of the targets. With that methodology not only is school enrollment lost from the education indicators, but the Gini or the Palma ratio (between the top 10 percent and the bottom 40 percent), the indicators used in all academic literature about inequalities are not there to measure the SDG 10 that promises to "reduce inequality within and among countries".

Similarly, Goal 1 of the SDGs is titled "end poverty **in all its forms** everywhere" (emphasis added) but the Multidimensional Poverty Index used by UN agencies since 2010 to measure poverty beyond income is not included. The new indicators 1.2.2 on "proportion of men, women and children of all ages living in poverty in all its dimensions according to national definitions" and 1.3.1 on "population covered by social protection floors/systems" are not yet in Tier I, owing to insufficient coverage.

The indicator selection process has been far from consistent: the old school enrollment and literacy indicators were dropped in favour of new ones, more loyal to the target but not mature enough to be used. But new indicators with a powerful agency defending (and with resources to measure) them got included, and are classed as Tier I even when similarly "immature". This is the case with the proposed indicator for total official international support to infrastructure, proposed by the OECD for Target 9.a: "Facilitate (...) infrastructure development in developing countries through enhanced financial, technological and technical support to African countries, least developed countries, landlocked developing countries and Small Island Developing States".

The proposed indicator is a subset of the new OECD indicator on total official support for sustainable development (TOSSD), which adds ODA plus non-concessional loans plus official support for the private sector. The definition of "economic infrastructure" used by the OECD includes "transport and storage, communications and energy, as well as banking, business and other services".

[1] UN Women, "Turning promises into action: Gender equality in the 2030 agenda for sustainable development", New York, 2018, available at www.unwomen.org/sdg-report

The TOSSD itself was severely criticized by NGOs and many developing countries because, as stated by Eurodad in a letter to the OECD, "rather than focusing on improving the existing statistics and information that are used by developing countries – which are largely the product of national collection efforts – the (indicator) focuses on collecting information from providers". Further, the indicator does not net flows out by subtracting loan repayments or profits repatriated by the subsidized private investors. Nevertheless the indicator has made it into Tier I.

The SDGs were rightly celebrated as a paradigm shift in how the international community understands sustainable development, by expanding the definition of poverty, including a concern about inequalities, being universally applicable and transformative. This is not the picture that will emerge from the current set of Tier I indicators. And the work underway to "upgrade" indicators from Tiers II and III is going to take much time and might help better count some varieties of trees, but will not provide a better picture of the forest. Perhaps it's time to start the other way around, consider the intent of the 17 SDGs and find the best available proxy indicators for those promises in a parallel process to the exhaustive and painfully slow interpretation and data gathering for each of the 169 targets.

This will take some creativity, yes, but Target 17.19, the very last one, asks the statistics experts to be daring and "develop measurements of progress on sustainable development that complement gross domestic product". The universalization of Gross Domestic Product as a measure of economic performance was an historic achievement of the UN Statistics Division in the 1950s. But already in 1992, the Earth Summit concluded that the concept of sustainable development requires GDP to be complemented with new measures. Target 17.19 reiterates that demand, but the two Tier I indicators that should measure it are merely "dollar value of all resources made available to strengthen statistical capacity in developing countries" and "proportion of countries that (a) have conducted at least one population and housing census in the last 10 years; and (b) have achieved 100 percent birth registration and 80 percent death registration". More resources to count the trees are undoubtedly needed, but sustainable development still needs the tools to make the forest visible.

Lost in translation

The following indicators were part of the official list of MDG indicators of 2008, but are not part of the approved Tier I of SDG indicators:

Poverty
1.2 Poverty gap ratio
1.3 Share of poorest quintile in national consumption
1.6 Proportion of employed people living below $1.25 (PPP) per day

Education
2.1 Net enrollment ratio in primary education
2.2 Proportion of pupils starting grade 1 who reach last grade of primary
2.3 Literacy rate of 15-24 year-olds, women and men

Women
3.1 Ratios of girls to boys in primary, secondary and tertiary education
3.2 Share of women in wage employment in the non-agricultural sector

Environment and climate
7.2 CO_2 emissions, total, per capita and per $1 GDP (PPP) was substituted by 9.4.1 CO_2 emission per unit of value added, thus losing the total and per capita values

Implementation
8.2 Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation)
8.3 Proportion of bilateral official development assistance of OECD/DAC donors that is untied

Market access
8.6 Proportion of total developed country imports (by value and excluding arms) from developing countries and least developed countries, admitted free of duty
8.7 Average tariffs imposed by developed countries on agricultural products and textiles and clothing from developing countries
8.8 Agricultural support estimate for OECD countries as a percentage of their gross domestic product

Debt sustainability
8.10 Total number of countries that have reached their HIPC decision points and number that have reached their HIPC completion points (cumulative)
8.11 Debt relief committed under HIPC and MDRI Initiatives

Table 1: What's new in the SDG Tier I indicators?

The following is the list of SDG indicators listed as Tier I (as of the latest revision, 12/2017) and the comparable MDG indicators (per the 2008 revision).

When comparable MDG indicators existed, both are highlighted in blue.

SDG Target	SDG Indicator	MDG Indicator
SDG1 End poverty in all its forms everywhere		
1.1 By 2030, eradicate extreme poverty for all people everywhere, currently measured as people living on less than $1.25 a day	1.1.1 Proportion of population below the international poverty line, by sex, age, employment status and geographical location (urban/rural)	1.1 Proportion of population below $1.25 (PPP) per day
1.2 By 2030, reduce at least by half the proportion of men, women and children of all ages living in poverty in all its dimensions according to national definitions	1.2.1 Proportion of population living below the national poverty line, by sex and age	Footnote to MDG 1.1: "For monitoring country poverty trends, indicators based on national poverty lines should be used, where available."
	1.5.3 Number of countries that adopt and implement national disaster risk reduction strategies (Sendai Framework)	
SDG2 End hunger, achieve food security and promote sustainable agriculture		
2.1 By 2030, end hunger and ensure access by all people, in particular the poor and people in vulnerable situations, including infants, to safe, nutritious and sufficient food all year round	2.1.1 Prevalence of undernourishment	1.9 Proportion of population below minimum level of dietary energy consumption
2.2 By 2030, end all forms of malnutrition, including achieving, by 2025, the internationally agreed targets on stunting and wasting in children under 5 years of age, and address the nutritional needs of adolescent girls, pregnant and lactating women and older persons	2.2.1 Prevalence of stunting (height for age <-2 standard deviation from the median of the WHO Child Growth Standards) among children under 5 years of age	1.8 Prevalence of underweight children under-five years of age
	2.2.2 Prevalence of malnutrition (weight for height >+2 or <-2 standard deviation from the median of the WHO Child Growth Standards) among children under 5 years of age, by type (wasting and overweight)	
2.5 By 2020, maintain the genetic diversity of seeds, cultivated plants and farmed and domesticated animals and their related wild species, including through soundly managed and diversified seed and plant banks at the national, regional and international levels, and promote access to and fair and equitable sharing of benefits arising from the utilization of genetic resources and associated traditional knowledge, as internationally agreed	2.5.1 Number of plant and animal genetic resources for food and agriculture secured in either medium- or long-term conservation facilities	
	2.5.2 Proportion of local breeds classified as being at risk, not at risk or at unknown level of risk of extinction	
	2.a.2 Total official flows (official development assistance plus other official flows) to the agriculture sector *This is a further disaggregation of MDG indicator 8.2*	8.2 Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation)
2.b Correct and prevent trade restrictions and distortions in world agricultural markets, including through the parallel elimination of all forms of agricultural export subsidies and all export measures with equivalent effect, in accordance with the mandate of the Doha Development Round	2.b.1 Agricultural export subsidies *This indicator does not distinguish between developed and developing countries as the WTO rules do.*	MDG indicator 8.8: Agricultural support estimate for OECD countries as a percentage of their gross domestic product.

SDG3 Health		
3.1 By 2030, reduce the global maternal mortality ratio to less than 70 per 100,000 live births	3.1.1 Maternal mortality ratio	5.1 Maternal mortality ratio
	3.1.2 Proportion of births attended by skilled health personnel	5.2 Proportion of births attended by skilled health personnel
3.2 By 2030, end preventable deaths of newborns and children under 5 years of age (...)	3.2.1 Under-5 mortality rate	4.1 Under-five mortality rate
	3.2.2 Neonatal mortality rate	4.2 Infant mortality rate
3.3 By 2030, end the epidemics of AIDS, tuberculosis, malaria and neglected tropical diseases and combat hepatitis, water-borne diseases and other communicable diseases	3.3.2 Tuberculosis incidence per 100,000 population	6.9 Incidence, prevalence and death rates associated with tuberculosis
	3.3.3 Malaria incidence per 1,000 population	6.6 Incidence and death rates associated with malaria
	3.3.5 Number of people requiring interventions against neglected tropical diseases	*This indicator is an expansion of MDG indicators 6.7 and 6.8 (on children requiring protection against malaria)*
3.4 By 2030, reduce by one third premature mortality from non-communicable diseases through prevention and treatment and promote mental health and well-being	3.4.1 Mortality rate attributed to cardiovascular disease, cancer, diabetes or chronic respiratory disease	
	3.4.2 Suicide mortality rate	
3.5 Strengthen the prevention and treatment of substance abuse, including narcotic drug abuse and harmful use of alcohol	3.5.2 Harmful use of alcohol, defined according to the national context as alcohol per capita consumption (aged 15 years and older) within a calendar year in litres of pure alcohol	
3.6 By 2020, halve the number of global deaths and injuries from road traffic accidents	3.6.1 Death rate due to road traffic injuries	
3.7 By 2030, ensure universal access to sexual and reproductive health-care services, including for family planning, information and education, and the integration of reproductive health into national strategies and programmes	3.7.1 Proportion of women of reproductive age (aged 15–49 years) who have their need for family planning satisfied with modern methods	5.3 Contraceptive prevalence rate 5.6 Unmet need for family planning
3.9 By 2030, substantially reduce the number of deaths and illnesses from hazardous chemicals and air, water and soil pollution and contamination	3.9.1 Mortality rate attributed to household and ambient air pollution	
	3.9.2 Mortality rate attributed to unsafe water, unsafe sanitation and lack of hygiene	
	3.9.3 Mortality rate attributed to unintentional poisoning	
3.a Strengthen the implementation of the World Health Organization Framework Convention on Tobacco Control in all countries, as appropriate	3.a.1 Age-standardized prevalence of current tobacco use among persons aged 15 years and older	
3.b Support the research and development of vaccines and medicines for the communicable and non-communicable diseases that primarily affect developing countries, provide access to affordable essential medicines and vaccines, in accordance with the Doha Declaration on the TRIPS Agreement and Public Health, which affirms the right of developing countries to use to the full the provisions in the Agreement on Trade-Related Aspects of Intellectual Property Rights regarding flexibilities to protect public health, and, in particular, provide access to medicines for all	3.b.2 Total net official development assistance to medical research and basic health sectors	8.2 Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation) 8.13 Proportion of population with access to affordable essential drugs on a sustainable basis

3.c Substantially increase health financing and the recruitment, development, training and retention of the health workforce in developing countries, especially in least developed countries and small island developing States	3.c.1 Health worker density and distribution	
3.d Strengthen the capacity of all countries, in particular developing countries, for early warning, risk reduction and management of national and global health risks	3.d.1 International Health Regulations (IHR) capacity and health emergency preparedness	
SDG 4 Education		
4.2 By 2030, ensure that all girls and boys have access to quality early childhood development, care and pre-primary education so that they are ready for primary education	**4.2.2 Participation rate in organized learning (one year before the official primary entry age), by sex**	**This is a new indicator, but there is no Tier I indicator for primary and secondary enrollment similar to MDG indicators 2.1 and 2.2**
4.5 By 2030, eliminate gender disparities in education and ensure equal access to all levels of education and vocational training for the vulnerable, including persons with disabilities, indigenous peoples and children in vulnerable situations	4.5.1 Parity indices (female/male, rural/urban, bottom/top wealth quintile and others such as disability status, indigenous peoples and conflict-affected, as data become available) for all education indicators on this list that can be disaggregated	3.1 Ratios of girls to boys in primary, secondary and tertiary education
4.b By 2020, substantially expand globally the number of scholarships available to developing countries, in particular least developed countries, small island developing States and African countries, for enrolment in higher education (...)	4.b.1 Volume of official development assistance flows for scholarships by sector and type of study	*This is a further disaggregation of MDG indicator 8.2:* Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation)
SDG5 Gender equality		
5.5 Ensure women's full and effective participation and equal opportunities for leadership at all levels of decision-making in political, economic and public life	5.5.1 Proportion of seats held by women in (a) national parliaments and (b) local governments	3.3 Proportion of seats held by women in national parliament
	5.5.2 Proportion of women in managerial positions	
5.b Enhance the use of enabling technology, in particular information and communications technology, to promote the empowerment of women	5.b.1 Proportion of individuals who own a mobile telephone, by sex	8.15 Mobile-cellular subscriptions per 100 inhabitants
SDG6 Water and sanitation		
6.4 By 2030, substantially increase water-use efficiency across all sectors and ensure sustainable withdrawals and supply of freshwater to address water scarcity and substantially reduce the number of people suffering from water scarcity	6.4.2 Level of water stress: freshwater withdrawal as a proportion of available freshwater resources	7.5 Proportion of total water resources used
6.5 By 2030, implement integrated water resources management at all levels, including through transboundary cooperation as appropriate	6.5.1 Degree of integrated water resources management implementation (0–100)	
6.a By 2030, expand international cooperation and capacity-building support to developing countries in water- and sanitation-related activities and programmes, including water harvesting, desalination, water efficiency, wastewater treatment, recycling and reuse technologies	6.a.1 Amount of water- and sanitation-related official development assistance that is part of a government-coordinated spending plan	*Further disaggregation of MDG 8.2:* Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services (basic education, primary health care, nutrition, safe water and sanitation)
6.b Support and strengthen the participation of local communities in improving water and sanitation management	6.b.1 Proportion of local administrative units with established and operational policies and procedures for participation of local communities in water and sanitation management	

SDG7 Energy		
7.1 By 2030, ensure universal access to affordable, reliable and modern energy services	7.1.1 Proportion of population with access to electricity	
	7.1.2 Proportion of population with primary reliance on clean fuels and technology	
7.2 By 2030, increase substantially the share of renewable energy in the global energy mix	7.2.1 Renewable energy share in the total final energy consumption	
7.3 By 2030, double the global rate of improvement in energy efficiency	7.3.1 Energy intensity measured in terms of primary energy and GDP	
SDG 8 Economic growth, employment and decent work		
8.1 Sustain per capita economic growth in accordance with national circumstances and, in particular, at least 7 percent gross domestic product growth per annum in the least developed countries	8.1.1 Annual growth rate of real GDP per capita	*This is a variation from MDG 1.4:* Growth rate of GDP per person employed
8.10 Strengthen the capacity of domestic financial institutions to encourage and expand access to banking, insurance and financial services for all	8.10.1 (a) Number of commercial bank branches per 100,000 adults and (b) number of automated teller machines (ATMs) per 100,000 adults	
	8.10.2 Proportion of adults (15 years and older) with an account at a bank or other financial institution or with a mobile-money-service provider	
8.2 Achieve higher levels of economic productivity through diversification, technological upgrading and innovation, including through a focus on high-value added and labour-intensive sectors	8.2.1 Annual growth rate of real GDP per employed person	1.4 Growth rate of GDP per person employed
8.4 Improve progressively, through 2030, global resource efficiency in consumption and production and endeavour to decouple economic growth from environmental degradation (...) with developed countries taking the lead	8.4.2 Domestic material consumption, domestic material consumption per capita, and domestic material consumption per GDP	
8.5 By 2030, achieve full and productive employment and decent work for all women and men, including for young people and persons with disabilities, and equal pay for work of equal value	8.5.2 Unemployment rate, by sex, age and persons with disabilities	*This requires a disaggregation of MDG 1.5:* Employment-to-population ratio
8.6 By 2020, substantially reduce the proportion of youth not in employment, education or training	8.6.1 Proportion of youth (aged 15–24 years) not in education, employment or training	
8.a Increase Aid for Trade support for developing countries (...)	8.a.1 Aid for Trade commitments and disbursements	8.9 Proportion of ODA provided to help build trade capacity
SDG 9 Infrastructure, industrialization and innovation		
9.1 Develop quality, reliable, sustainable and resilient infrastructure, including regional and trans-border infrastructure, to support economic development and human well-being, with a focus on affordable and equitable access for all	9.1.2 Passenger and freight volumes, by mode of transport	

9.2 Promote inclusive and sustainable industrialization and, by 2030, significantly raise industry's share of employment and gross domestic product (...)	9.2.1 Manufacturing value added as a proportion of GDP and per capita	
	9.2.2 Manufacturing employment as a proportion of total employment	
9.4 By 2030, upgrade infrastructure and retrofit industries to make them sustainable, with increased resource-use efficiency and greater adoption of clean and environmentally sound technologies and industrial processes (...)	9.4.1 CO2 emission per unit of value added	*This indicator actually measures **less than MDG indicator 7.2:** CO2 emissions, total, per capita and per $1 GDP (PPP)*
9.5 Enhance scientific research, upgrade the technological capabilities (...) increasing the number of research and development workers per 1 million people and public and private research and development spending	9.5.1 Research and development expenditure as a proportion of GDP	
	9.5.2 Researchers (in full-time equivalent) per million inhabitants	
9.a Facilitate sustainable and resilient infrastructure development in developing countries through enhanced financial, technological and technical support to African countries, least developed countries, landlocked developing countries and small island developing States	9.a.1 Total official international support (official development assistance plus other official flows) to infrastructure	
9.b Support domestic technology development, research and innovation in developing countries, including by ensuring a conducive policy environment for, inter alia, industrial diversification and value addition to commodities	9.b.1 Proportion of medium and high-tech industry value added in total value added	
9.c Significantly increase access to information and communications technology and strive to provide universal and affordable access to the Internet in least developed countries by 2020	9.c.1 Proportion of population covered by a mobile network, by technology	8.15 Mobile-cellular subscriptions per 100 inhabitants
SDG10 Reduce inequality within and among countries		
10.6 Ensure enhanced representation and voice for developing countries in decision-making in global international economic and financial institutions in order to deliver more effective, credible, accountable and legitimate institutions	10.6.1 Proportion of members and voting rights of developing countries in international organizations	
10.a Implement the principle of special and differential treatment for developing countries, in particular least developed countries, in accordance with World Trade Organization agreements	10.a.1 Proportion of tariff lines applied to imports from least developed countries and developing countries with zero-tariff	8.6 Proportion of total developed country imports (by value and excluding arms) from developing countries and least developed countries, admitted free of duty
10.b Encourage official development assistance and financial flows, including foreign direct investment, to States where the need is greatest, in particular least developed countries, African countries, small island developing States and landlocked developing countries, in accordance with their national plans and programmes	10.b.1 Total resource flows for development, by recipient and donor countries and type of flow (e.g. official development assistance, foreign direct investment and other flows)	8.1 Net ODA, total and to the least developed countries, as percentage of OECD/DAC donors' gross national income. The FDI component of 10.b.1 is still classified as Tier II

SDG 11 Cities and human settlements		
11.1 By 2030, ensure access for all to adequate, safe and affordable housing and basic services and upgrade slums	11.1.1 Proportion of urban population living in slums, informal settlements or inadequate housing	7.10 Proportion of urban population living in slums
11.5 By 2030, significantly reduce the number of deaths and the number of people affected and substantially decrease the direct economic losses relative to global gross domestic product caused by disasters, including water-related disasters (...)	11.5.2 Direct economic loss in relation to global GDP, damage to critical infrastructure and number of disruptions to basic services, attributed to disasters	
11.6 By 2030, reduce the adverse per capita environmental impact of cities, including by paying special attention to air quality and municipal and other waste management	11.6.2 Annual mean levels of fine particulate matter (e.g. PM2.5 and PM10) in cities (population weighted)	
11.b By 2020, substantially increase the number of cities and human settlements adopting and implementing integrated policies and plans towards inclusion, resource efficiency, mitigation and adaptation to climate change, resilience to disasters, and develop and implement, in line with the Sendai Framework for Disaster Risk Reduction 2015-2030, holistic disaster risk management at all levels	11.b.1 Number of countries that adopt and implement national disaster risk reduction strategies in line with the Sendai Framework for Disaster Risk Reduction 2015–2030	
SDG 12 Consumption and production patterns		
12.2 By 2030, achieve the sustainable management and efficient use of natural resources	12.2.2 Domestic material consumption, domestic material consumption per capita, and domestic material consumption per GDP	
12.4 By 2020, achieve the environmentally sound management of chemicals and all wastes throughout their life cycle, in accordance with agreed international frameworks, and significantly reduce their release to air, water and soil in order to minimize their adverse impacts on human health and the environment	12.4.1 Number of parties to international multilateral environmental agreements on hazardous waste, and other chemicals that meet their commitments and obligations in transmitting information as required by each relevant agreement	
SDG13 Combat climate change		
13.1 Strengthen resilience and adaptive capacity to climate-related hazards and natural disasters in all countries	13.1.2 Number of countries that adopt and implement national disaster risk reduction strategies in line with the Sendai Framework	
SDG 14 Oceans, seas and marine resources		
14.4 By 2020, effectively regulate harvesting and end overfishing, illegal, unreported and unregulated fishing and destructive fishing practices (...)	14.4.1 Proportion of fish stocks within biologically sustainable levels	7.4 Proportion of fish stocks within biologically sustainable levels
14.5 By 2020, conserve at least 10 percent of coastal and marine areas (...)	14.5.1 Coverage of protected areas in relation to marine areas	7.6 Proportion of terrestrial and marine areas protected
SDG15 Terrestrial ecosystems, forests, desertification, biodiversity		
15.1 By 2020, ensure the conservation, restoration and sustainable use of terrestrial and inland freshwater ecosystems and their services, in particular forests, wetlands, mountains and drylands (...)	15.1.1 Forest area as a proportion of total land area	7.1 Proportion of land area covered by forest
	15.1.2 Proportion of important sites for terrestrial and freshwater biodiversity that are covered by protected areas, by ecosystem type	7.6 Proportion of terrestrial and marine areas protected
15.2 By 2020, promote the implementation of sustainable management of all types of forests, halt deforestation, restore degraded forests and substantially increase afforestation and reforestation globally	15.2.1 Progress towards sustainable forest management	
15.4 By 2030, ensure the conservation of mountain ecosystems, including their biodiversity, in order to enhance their capacity to provide benefits that are essential for sustainable development	15.4.1 Coverage by protected areas of important sites for mountain biodiversity	Disaggregation of MDG indicator 7.6: Proportion of terrestrial and marine areas protected

	15.4.2 Mountain Green Cover Index	
15.5 Take urgent and significant action to reduce the degradation of natural habitats, halt the loss of biodiversity and, by 2020, protect and prevent the extinction of threatened species	15.5.1 Red List Index	
15.6 Promote fair and equitable sharing of the benefits arising from the utilization of genetic resources and promote appropriate access to such resources (...)	15.6.1 Number of countries that have adopted legislative, administrative and policy frameworks to ensure fair and equitable sharing of benefits	
15.a Mobilize and significantly increase financial resources from all sources to conserve and sustainably use biodiversity and ecosystems	*15.a.1 Official development assistance and public expenditure on conservation and sustainable use of biodiversity and ecosystems*	*Further disaggregation of MDG 8.2:* 8.2 Proportion of total bilateral, sector-allocable ODA of OECD/DAC donors to basic social services
SDG 16 Peaceful and inclusive societies, justice for all, accountable institutions		
16.1 Significantly reduce all forms of violence and related death rates everywhere	16.1.1 Number of victims of intentional homicide per 100,000 population, by sex and age	
16.3 Promote the rule of law at the national and international levels and ensure equal access to justice for all	16.3.2 Unsentenced detainees as a proportion of overall prison population	
16.6 Develop effective, accountable and transparent institutions at all levels	16.6.1 Primary government expenditures as a proportion of original approved budget, by sector	
16.9 By 2030, provide legal identity for all, including birth registration	16.9.1 Proportion of children under 5 years of age whose births have been registered with a civil authority, by age	
16.a Strengthen relevant national institutions, including through international cooperation, for building capacity at all levels, in particular in developing countries, to prevent violence and combat terrorism and crime	16.a.1 Existence of independent national human rights institutions in compliance with the Paris Principles	
SDG 17 Means of implementation		
17.1 Strengthen domestic resource mobilization, including through international support to developing countries, to improve domestic capacity for tax and other revenue collection	17.1.1 Total government revenue as a proportion of GDP, by source	
	17.1.2 Proportion of domestic budget funded by domestic taxes	
17.10 Promote a universal, rules-based, open, non-discriminatory and equitable multilateral trading system under the World Trade Organization, including through the conclusion of negotiations under its Doha Development Agenda	*17.10.1 Worldwide weighted tariff-average* *This indicator seems less to the point than the MDG indicator 8.7*	8.7 Average tariffs imposed by developed countries on agricultural products and textiles and clothing from developing countries
17.11 Significantly increase the exports of developing countries, in particular with a view to doubling the least developed countries' share of global exports by 2020	17.11.1 Developing countries' and least developed countries' share of global exports	
17.12 Realize timely implementation of duty-free and quota-free market access on a lasting basis for all least developed countries, consistent with World Trade Organization decisions, including by ensuring that preferential rules of origin applicable to imports from least developed countries are transparent and simple, and contribute to facilitating market access	17.12.1 Average tariffs faced by developing countries, least developed countries and small island developing States	8.7 Average tariffs imposed by developed countries on agricultural products and textiles and clothing from developing countries
17.18 By 2020, enhance capacity-building support to developing countries (...) to increase significantly the availability of high-quality, timely and reliable [disaggregated] data (...)	17.18.3 Number of countries with a national statistical plan that is fully funded and under implementation, by source of funding	

17.19 By 2030, build on existing initiatives to develop measurements of progress on sustainable development that complement gross domestic product, and support statistical capacity-building in developing countries	17.19.1 Dollar value of all resources made available to strengthen statistical capacity in developing countries	
	17.19.2 Proportion of countries that (a) have conducted at least one population and housing census in the last 10 years; and (b) have achieved 100 percent birth registration and 80 percent death registration	
17.2 Developed countries to implement fully their official development assistance commitments, including the commitment by many developed countries to achieve the target of 0.7 percent of gross national income for official development assistance (ODA/GNI) (...)	17.2.1 Net official development assistance, total and to least developed countries, as a proportion of the Organization for Economic Cooperation and Development (OECD) Development Assistance Committee donors' gross national income (GNI)	8.1 Net ODA, total and to the least developed countries, as percentage of OECD/DAC donors' gross national income
17.3 Mobilize additional financial resources for developing countries from multiple sources	17.3.1 Foreign direct investment (FDI), official development assistance and South-South cooperation as a proportion of total domestic budget	
	17.3.2 Volume of remittances (in United States dollars) as a proportion of total GDP	
17.4 Assist developing countries in attaining long-term debt sustainability through coordinated policies aimed at fostering debt financing, debt relief and debt restructuring, as appropriate, and address the external debt of highly indebted poor countries to reduce debt distress	17.4.1 Debt service as a proportion of exports of goods and services	8.10 Total number of countries that have reached their HIPC decision points and number that have reached their HIPC completion points (cumulative) 8.11 Debt relief committed under HIPC and MDRI Initiatives 8.12 Debt service as a percentage of exports of goods and services
17.6 Enhance North-South, South-South and triangular regional and international cooperation on and access to science, technology and innovation (...) through a global technology facilitation mechanism	17.6.2 Fixed Internet broadband subscriptions per 100 inhabitants, by speed	8.16 Internet users per 100 inhabitants
17.8 Fully operationalize the technology bank and science, technology and innovation capacity-building mechanism for least developed countries by 2017 and enhance the use of enabling technology, in particular information and communications technology	17.8.1 Proportion of individuals using the Internet	8.16 Internet users per 100 inhabitants
17.9 Enhance international support for implementing effective and targeted capacity-building in developing countries to support national plans to implement all the Sustainable Development Goals, including through North-South, South-South and triangular cooperation	17.9.1 Dollar value of financial and technical assistance (including through North-South, South-South and triangular cooperation) committed to developing countries	
17.10 Promote a universal, rules-based, open, non-discriminatory and equitable multilateral trading system under the World Trade Organization, including through the conclusion of negotiations under its Doha Development Agenda	17.10.1 Worldwide weighted tariff-average	
17.11 Significantly increase the exports of developing countries, in particular with a view to doubling the least developed countries' share of global exports by 2020	17.11.1 Developing countries' and least developed countries' share of global exports	

17.12 Realize timely implementation of duty-free and quota-free market access on a lasting basis for all least developed countries (...)	17.12.1 Average tariffs faced by developing countries, least developed countries and small island developing States	8.7 Average tariffs imposed by developed countries on agricultural products and textiles and clothing from developing countries
17.18 By 2020, enhance capacity-building support (...) to increase significantly the availability of high-quality, timely and reliable data disaggregated by income, gender, age, race, ethnicity, migratory status, disability, geographic location (...)	17.18.3 Number of countries with a national statistical plan that is fully funded and under implementation, by source of funding	
17.19 By 2030, build on existing initiatives to develop measurements of progress on sustainable development that complement gross domestic product, and support statistical capacity-building in developing countries	17.19.1 Dollar value of all resources made available to strengthen statistical capacity in developing countries	
	17.19.2 Proportion of countries that (a) have conducted at least one population and housing census in the last 10 years; and (b) have achieved 100 percent birth registration and 80 percent death registration	