



How to use the Integrated Monitoring Guide for SDG 6



(Photo credit: UNICEF Ethiopia, Creative Commons Attribution)

What is the Integrated Monitoring Guide about?

The Integrated Monitoring Guide provides a basis for national governments to monitor progress towards the new Sustainable Development Goal on water and sanitation (SDG 6). Based on the global indicator framework developed by the country-led Inter-agency and Expert Group on Sustainable Development Goal Indicators (IAEGSDGs), the Guide proposes methodologies for monitoring each of the 11 global indicators under SDG 6.

The methodologies seek to embrace and build on existing monitoring efforts at the country level, allowing countries to begin monitoring efforts at a level in line with their national capacity and available resources, and from there advance progressively. The methodologies also seek to promote harmonization and the use of similar standards and definitions, to facilitate the sharing and comparison of data both within and across countries and over time.

The Guide should not be seen as a prescriptive set of rules to be adhered to, but rather as promoting an integrated approach to monitor SDG 6. The Guide is very much work in progress, a living document that will be revised after the pilot testing in 2016 to incorporate lessons learned at the country level. The Guide is also expected to be continuously revised during the SDG period, to capture methodological and technological developments that can improve monitoring effectiveness and efficiency.



© Justin Jovellanos

SDG 6 monitoring builds on existing efforts in countries, and allow countries to begin monitoring at a level in line with their capacity and resource availability, and from there advance progressively (Photo credit: Justin Jovellanos)

Who is the Integrated Monitoring Guide for?

The Guide is designed to be used by those responsible for measuring, collecting and collating water and sanitation related data. This may be technical staff within relevant line ministries and national statistics offices. This may also be technical staff in sub-national governments, in addition to academia and civil society groups involved in monitoring. Below follow a list of the different components of the Guide and their intended use.

Additional resources targeted to a more general public as well as politicians include the brochures "[Monitoring Water and Sanitation in the 2030 Agenda for Sustainable Development – An introduction](#)" and "[Monitoring Water and Sanitation in the 2030 Agenda for Sustainable Development – An executive briefing](#)". These resources provide more background information on the intergovernmental processes of the 2030 Agenda for Sustainable Development and the global indicator framework, the rationale of water sector monitoring, and the development of the Guide.

| Guide component | Description | Target audience |
|---|--|---|
| How to use the Integrated Monitoring Guide for SDG 6 (this document) | Overall guidance on how to use the Guide and how to implement SDG 6 monitoring at the country level, in line with the ambitions of the 2030 Agenda | Technical staff (for an introduction); Politicians and general public (for a more in-depth understanding) |
| Targets and global indicators | Presentation of SDG 6 highlighting interlinkages within SDG 6 as well as with other SDGs, brief summary of SDG 6 global indicators and proposed monitoring methodologies | Technical staff (for a broad overview of all SDG 6 components); Politicians and general public (for a more indepth understanding) |
| Proposed step-by-step methodologies for SDG 6 global indicators 6.1.1, 6.2.1, 6.3.1, 6.3.2, 6.4.1, 6.4.2, 6.5.1, 6.5.2, 6.6.1, 6.a.1 and 6.b.1 | Step-by-step guidance on how to monitor the different SDG 6 global indicators, including advice on data collection and management | Technical staff responsible for monitoring the different components of SDG 6 |
| Joint glossary for SDG 6 monitoring | Definition of all terms/concepts relevant to SDG 6 monitoring and how they relate to each other | Technical staff responsible for monitoring the different components of SDG 6 |

What is the process at the national level?

Member States will need to decide on a suitable structure for implementation on the national level. One option could include a designated national focal point and a national inter-sectoral monitoring team, comprised of all stakeholders relevant for SDG 6 monitoring, including statistical offices, national agencies/ministries, and other sector representatives. The responsibility for national data collection, analysis and dissemination, as well as reporting, could then fall on the inter-sectoral team.

Establishing mechanisms for easy and transparent sharing and validation of data is critical for ensuring a strong link between national and global level monitoring.

In the pilot testing in 2016, implementation will start with a national workshop and the adoption of a national implementation plan. Based on needs and available resources, pilot countries will receive a varying degree of technical support in regard to data collection, validation, analysis and reporting.



Bringing water and sanitation-related sectors together is an important component of SDG 6 monitoring (Photo credit: Julio Pantoja, Creative Commons Attribution)

What is the process at the global level?

The first phase of the Integrated Monitoring initiative (2015–2018) focuses on the development of monitoring methodologies and the Monitoring Guide for use in countries by countries, and the establishment of a global baseline.

Before the methodologies are rolled-out globally, they will be pilot tested during 2016 in a small number of countries and revised as necessary based on lessons learned.

In 2017, the methodologies will then be implemented on a global scale, to enable the establishment of a global baseline in 2018.

To realise both the pilot testing and global implementation, the first step is to sensitize countries to build a national interest for water sector monitoring. To prepare for global implementation, a number of regional workshops will be organised in late 2016 to bring together Member States and international monitoring partners, with the aim of facilitating cooperation and sharing knowledge and experience. Such peer-to-peer interaction will be an important component of capacity development in a resource-constrained environment.

| Timeline for GEMI phase 1 | 2015 | | 2016 | | | | 2017 | | | | 2018 | |
|--|------|----|------|----|----|----|------|----|----|----|------|----|
| | Q3 | Q4 | Q1 | Q2 | Q3 | Q4 | Q1 | Q2 | Q3 | Q4 | Q1 | Q2 |
| Development/revision of monitoring methodologies | • | • | • | | | • | | | • | • | | |
| Country and regional sensitization | | • | • | | • | • | • | • | | | | |
| Pilot testing of methodologies (6 countries) | | | • | • | • | | | | | | | |
| Establishment of global data repository | | | | • | • | • | • | | | | | |
| Global roll-out of monitoring (50 countries) | | | | | | | • | • | • | • | • | |
| Establishment of a global baseline | | | | | • | • | | | | • | • | • |

Translating global ambitions to national action

In September 2015, heads of state from all around the world gathered in New York to adopt the [2030 Agenda for Sustainable Development](#), an ambitious “plan of action for people, planet

and prosperity,” comprised of 17 Sustainable Development Goals (SDGs) and 169 targets, aiming to do nothing less than “transform our world”.

The Agenda is applicable to all countries (§ 55):

“Targets are defined as aspirational and global, with each Government setting its own national targets guided by the global level of ambition but taking into account national circumstances.”

Countries commit to engage in systematic follow-up and review of the implementation of the Agenda – at subnational, national, regional and global levels – guided by the following principles (§ 72, 74, 77):

“they will be voluntary and country-led, will take into account different national realities, capacities and levels of development and will respect policy space and priorities. As national ownership is key to achieving sustainable development, the outcome from national level processes will be the foundation for reviews at the regional and global levels, given that the global review will be primarily based on national official data sources.”

It is further clarified that (§ 75):

“The Goals and targets will be followed up and reviewed using a set of global indicators. These will be complemented by indicators at the regional and national levels which will be developed by Member States, in addition to the outcomes of work undertaken for the development of the baselines for those targets where national and global baseline data does not yet exist.”

In summary, the 2030 Agenda – its implementation, the monitoring of progress, the process for follow-up and review – is indeed country-owned, and inspired by the global ambition of the SDG targets, countries need to set their own targets that take national circumstances into account. A set of global indicators will be used to report on progress towards the targets, drawn primarily from national official data sources. These are to be complemented by additional indicators required for the purpose of national, regional and thematic use and reporting.

For SDG 6, this means that countries need to set their own targets on, for example, extending access to safe drinking water, increasing wastewater treatment and improving water-use

efficiency. For some countries it may be useful to add a national indicator on time spent collecting water, and for others to add a national indicator on the rate of desertification, or the proportion of water reuse.

To ensure high-quality, timely, reliable and disaggregated data, it is clear that the capacity of national statistical offices and data systems needs to be strengthened, and that especially developing countries need support in this regard – this ambition is also highlighted in the Agenda.

National monitoring as the foundation for global monitoring

Member States will own the monitoring and reporting of the SDGs and also be the main beneficiaries of improved access to better-quality data. Any monitoring initiative must therefore be sensitive to national needs. To ensure the sustainability of monitoring systems and processes at this level, a greater focus on capacity development is necessary.

Regional and global monitoring should build on, and reinforce, national monitoring. To allow for comparison of data between countries and over time and to track progress at the regional and global levels, it is necessary to promote harmonised monitoring approaches and the use of similar standards and definitions across countries.

To enable Member States to begin monitoring efforts at a level in line with their national capacity and available resources, there is also a need for flexible methodologies, for which the concept of progressive monitoring steps is useful. With this approach, countries can start monitoring SDG 6 indicators with more simple resource-efficient methodologies, based on alternative data sources such as earth observations, by using proxy data combined with qualitative estimations, or by monitoring a limited number of parameters, with limited frequency, at a limited number of sites. As country capacity and resources increase, they can progressively adopt more advanced and accurate monitoring methodologies, such as direct measurements in the field, allowing for better disaggregated data.



Flexible methodologies allow countries to start monitoring at a level in line with their national capacity and available resources (Photo credit: Albert Gonzalez Farran, Creative Commons Attribution)

Integrated information for integrated management

To "ensure access and sustainable management of water and sanitation for all", it is necessary to move away from the sectoral approach that is characteristic for water resources, to adopt a more integrated overall approach to management. To design coherent policies and make informed development decisions, it is necessary to assess and analyse the potential consequences of different development paths on social, economic and environmental wellbeing. An integrated management approach, including such a comprehensive assessment and analysis of different development paths, can only be obtained by also integrating hydrological, environmental, social and economic information.

The SDG 6 indicators respond to different aspects of water and sanitation, and information about the different aspects are commonly collected by the different sectors. Data on water use in agriculture are often collected by the ministry of agriculture, whereas data on drinking water quality may be collected by

the ministry of health, and data on ambient water quality and wastewater discharge by the ministry of environment. Some data are collected by individual utilities, by municipalities or at other sub-national levels, whereas other data are collected and or compiled at the national level by line ministries or the national statistical office. The proposed methodologies for the monitoring of SDG 6 indicators also include very different mechanisms for harvesting data, ranging from household surveys to earth observation.

In summary, monitoring and data collection towards SDG 6 will necessarily include a wide range of stakeholders, across sectors and levels of government. To enable a comprehensive assessment and analysis of the state of water resources and the different development paths, a key objective of the monitoring effort is to bring all the information together, in support of an integrated management approach that contributes to reducing institutional fragmentation.



Use of new data sources

New technologies are rapidly improving our capacity to collect, store, analyse, report and share data, and at the same time are cutting the costs of doing so. Some examples include rapid advancements in the field of mobile phone-based and geospatial data collection tools, where data can be made available in real time for various uses through mobile-to-web solutions.

Simplified and affordable technology allows for the expansion of citizen science, which in turn can help expand monitoring

to reach resource-constrained or remote settings and improve data disaggregation. Similarly, earth observations can be used for cost-effective monitoring of the extent and quality of ecosystems, land use and hydrology. Given that the spatial and temporal resolution of earth observations often is continuous, this type of information is particularly useful to track environmental changes over time.

Integrating all of these data does indeed represent a quantum leap in how water resources are being managed.



The use of new monitoring technologies can rapidly improve our knowledge about our water resources, and guide investment to where it is most needed (Photo credit: Malik Naumann, Creative Commons Attribution)

Leaving no one behind – a call for data disaggregation

In the preamble of the 2030 Agenda, countries “pledge that no one will be left behind” – no SDG goal or target should thus be seen as met until it is met by all. To track progress in this regard, it is necessary that data can be disaggregated by a number of strata, such as income, gender, age, race, ethnicity, migratory status, disability, geographic location and other characteristics relevant in national contexts.

For SDG 6, the ambition to leave no one behind is particularly relevant for targets 6.1 and 6.2 on universal access to drinking water, sanitation and hygiene. Current data can be disaggregated for place of residence and subnational region as well as wealth. Over time, the ambition is to include informal urban settlements

in the data collected, as well as to develop survey instruments that can capture marginalized groups and intra-household inequalities, such as sex, age, and disability.

For targets 6.3 to 6.6 on water-, wastewater- and ecosystem resources, with indicators of more physical character, it is more challenging to disaggregate data for social strata. However, the impacts of poor management of these resources affect different groups of people differently, and this is important to assess and analyse. Geo-referencing physical data facilitates such an assessment and analysis, e.g. by recording in which basin within a country that water scarcity prevails, it is possible to assess the social impacts of water scarcity by looking at the number of people living within the basin.





Contact information

Integrated monitoring of water and sanitation related SDG targets - GEMI is an inter-agency initiative composed of UNEP, UN-Habitat, UNICEF, FAO, UNESCO, WHO and WMO, operating under the umbrella of UN-Water. For more information, please contact one of our focal points.

Project management

UN-Water: **William Reidhead**
william.reidhead@unwater.org

Agency focal points

UNEP: **Joakim Harlin**
joakim.harlin@unep.org

FAO: **Karen Frenken**
Karen.Frenken@fao.org

WMO: **Tommaso Abrate**
tabrate@wmo.int

UN-Habitat: **Graham Alabaster**
Alabaster.unhabitat@unog.ch

UNESCO: **Giuseppe Arduino**
g.arduino@unesco.org

UNICEF: **Tom Slaymaker**
tslaymaker@unicef.org

WHO: **Kate Medlicott**
medlicottk@who.int

Learn more

About water and sanitation in the 2030 Agenda for Sustainable Development: www.unwater.org/sdgs/en/
About the GEMI monitoring initiative: www.unwater.org/gemi/en/



Food and Agriculture
Organization of the
United Nations



World Health
Organization



With support from:



Schweizerische Eidgenossenschaft
Confédération suisse
Confederazione Svizzera
Confederaziun svizra

Swiss Agency for Development
and Cooperation SDC



Federal Ministry
for Economic Cooperation
and Development

