6th International Conference on Big Data for Official Statistics

31 August – 2 September 2020

Organized jointly by
Statistics Korea and the UN Global Working Group on Big Data for Official Statistics

Concept Note

The 6th International Conference on Big Data for official statistics will take place from 31 August – 2 September 2020 as a virtual event due to the COVID-19 pandemic.

The main theme of the Conference is "How can Big Data help in the COVID-19 response?" Related themes are: "How can Big Data support the monitoring of the progress towards the Sustainable Development Goals?" and "The need for global data collaboration on global emerging issues".

The Conference is organized by Statistics Korea and the United Nations Global Working Group (GWG) on Big Data for Official Statistics, which was created under the UN Statistical Commission in 2014.

The GWG provides strategic vision, direction and the coordination of a global programme on the use of new data sources and new technologies, which are essential for national statistical systems to remain relevant in a fast-moving data landscape. Over the years the GWG produced guidance through Handbooks and training materials on topics such as use of satellite data for estimating agricultural crop statistics, use of mobile phone data for measuring tourism statistics or use of scanner data for calculating price statistics. The GWG also built a digital collaborative environment (called the UN Global Platform) to work together on new data solutions with the whole statistical community and to learn together.

Use of new data sources and new technologies, such as AI and machine learning, can make statistical operations more cost effective and provide timelier, more frequent and more granular statistical outputs, which is especially important to support rapid assessment of the COVID-19 situation and the 2030 Agenda for Sustainable Development and its 231 SDG indicators. This conference will demonstrate how that is possible.

COVID-19 responses

Government interventions have proven to be critical for mitigating the spread of COVID-19. These include testing and tracing, bans on large gatherings, closures of businesses and educational facilities, restrictions on international travel and mandatory quarantine. Review and evaluation of the effects of such interventions require specific, reliable, and timely data, especially on mobility and physical copresence. Mobile phone data, when used properly and carefully, can deliver insights on those issues.

At the same time that the statistical community develops methods for measuring human mobility, it also wants to maintain public trust in the use of statistics and indicators. Statisticians need to explicitly discuss how it guarantees privacy, data security and only use of the data for statistical purposes.

The statistical community can also help to assess the socio-economic impact of the pandemic, for example in the domains of trade, travel and transportation. The GWG has been successful in compiling weekly indicators for maritime transport (number of port calls) and for air travel and transport. High-frequency and timely indicators are needed to effectively steer and adapt policy measures to rebuild the global economy.

Sustainable Development Goals – "Building Back Better"

The 2030 Agenda for Sustainable Development was launched in September 2015 to improve lives of all people, especially the most vulnerable, while saving the environment and fostering peace. The statistical community has been asked to take a leading role in making data available for monitoring of progress on the path towards achieving the Sustainable Development Goals (SDGs). New data and new technologies have the potential to deliver timely, high-frequent and detailed data to underpin the SDG indicators and government policies for the 2030 Agenda. The Conference will give examples of where new data sources have been used successfully for the SDG indicators.

Because of the COVID-19 pandemic, the path towards achieving the 2030 Agenda has become more difficult. Many governments have started a campaign to "building back better", meaning to pick up and reinvigorate efforts in building society, economy and environment after the pandemic is over. Good data for the SDG indicators will be essential in those efforts. The latest SDG report was recently released and describes the mentioned issues in detail, see https://unstats.un.org/sdgs/report/2020/

Global collaboration on data solutions and training

The GWG created the UN Global Platform as a collaborative environment to develop and test new data sources, methods and algorithms for the global statistical system.

Specifically, the platform hosts solutions for compiling agricultural crop statistics using satellite data and compiling maritime transport statistics using AIS vessel tracking data. Many more pilot projects can be initiated on the platform involving not only the statistical community and related public sector but also stakeholders from private sector, academia and civil society.

Training in use of new data sources and new technologies is a must if statistical offices want to collaborate in projects on the UN Global Platform. The GWG has started an ambitious training program for the global statistical community underpinned by a competency framework ("Which skills are needed") and a maturity matrix ("which skills are currently available in the statistical office?"). This global training program on use of Big Data for official statistics will be rolled out gradually over the next two years.

PROGRAMME

Monday – 31 August 2020

- Opening Ceremony
- COVID-19 response by the statistical community

Tuesday – 1 September 2020

- Big Data and the Sustainable Development Goals

Wednesday – 2 September 2020

- Global data collaboration and global training program