Mr. Chair, Distinguished delegates,

Climate change has been an issue of common concern for humankind for several decades. Earth observation by satellites enables us to globally monitor and record climate change precisely and consistently and contribute to the SDG13, "Climate Action." The Intergovernmental Panel on Climate Change (IPCC) guidelines mentions the application of satellite data including Japan's GOSAT, GOSAT-2, and ALOS-2 for estimating and reporting on greenhouse gases emissions and removals to the United Nations Framework Convention on Climate Change (UNFCCC).

I would like to elaborate on Japan's satellites that monitor atmospheric conditions for tackling climate change. In 2009, the Ministry of the Environment (MOE), the National Institute for Environmental Studies (NIES) and Japan Aerospace Exploration Agency (JAXA) have launched Greenhouse gases Observing

Satellite (GOSAT) series as the world’s first satellite dedicated to monitoring greenhouse gases such as carbon dioxide (CO_2) and methane (CH_4). In 2018, GOSAT-2 was launched with an enhanced capability of observing carbon monoxide (CO) in addition to CO_2 and CH_4 for the anthropogenic emission estimation. GOSAT and GOSAT-2 have been contributing to addressing climate change by accumulating data on the global concentration of greenhouse gases for more than a decade and have shown that the global atmospheric concentrations of CO_2 and CH_4 have been increasing every year accompanied by seasonal variation. Leveraging this cutting-edge GOSAT series, Japan will continue to support the countries’ efforts to reduce greenhouse gas emissions to combat climate change under the Paris Agreement using the global observation for monitoring the sources of anthropogenic greenhouse gases emissions and also for estimating the emissions and their removal on a global-scale.

Another satellite is the Global Change Observation Mission - Climate, GCOM-C. GCOM-C was launched in 2017 to conduct surface and atmospheric measurements related to the carbon cycle

and radiation budget, such as clouds, aerosols, ocean color, vegetation, snow and ice. These observations will contribute to enhancing the prediction accuracy of future environmental changes.

In addition to developing and operating satellites for observing atmospheric conditions, Japan has been conducting national research to tackle climate change. Last September, JAXA and a Japanese industry launched a joint research project on utilizing passenger aircraft for remote sensing observation of atmospheric components over the main islands of Japan. This research aims to understand the sources of emission distribution from different sectors in city areas by combining data obtained by aircraft and GOSAT. It also contributes to the Paris Agreement by providing useful data that may be considered to reduce anthropogenic emissions from cities and for evaluating the effect of emission reduction efforts.

For tackling climate change globally, Japan is also promoting international cooperation. JAXA and the Japanese National

Institute for Environmental Studies, NIES, are cooperating with ESA, CNES, DLR, NASA, and EUMETSAT for supporting the implementation of the Paris Agreement. This cooperation promotes the use of satellite Greenhouse Gas observation data to improve the accuracy of the National Greenhouse Gas Inventory Report.

I would like to reiterate that Japan will continue these activities to aid our efforts to tackle climate change issues.

Thank you for your attention.