Government of India
Earth System Science Organization
Ministry of Earth Sciences
India Meteorological Department

Press Release

Dated: 15th January, 2021

Subject: Celebration of 146th Foundation Day of India Meteorological Department, 15th January, 2021

India Meteorological Department celebrated its 146th Foundation day on 15th January 2021.The function was organized virtually at Mahika Hall, Ministry of Earth Sciences (MoES), Prithvi Bhawan, Lodi Road, New Delhi-110003 during 1500 to 1630 hours IST. Dr. Harsh Vardhan, Hon'ble Union Minister of Science & Technology and Earth Sciences graced the occasion as Chief Guest and Shri Trivendra Singh Rawat, Hon'ble Chief Minister, Uttarakhand and Shri Jai Ram Thakur, Hon'ble Chief Minister, Himachal Pradesh were the Guests of Honour. Dr. Madhvan Nair Rajeevan, Secretary, Ministry of Earth Sciences chaired the function.

During this function, **Dr. Harsh Vardhan, dedicated two Doppler Weather Radars installed at Mukteshwar, Uttarakhand and Kufri, Shimla, Himachal Pradesh to the nation.** The e-launching of "Online Web Portal of IMD Journal MAUSAM" also been carried out during the function. Dr Harsh Vardhan also released a report on Cyclone Disturbance during 2020 and Hindi Patrika 'Mausam Manjusha'.

In addition to that, the Multi Mission Meteorological Data Receiving & Processing System(MMDRPS) Satellite Divison, IMD New Delhi-110003; a very advance Meteorological data processing system established in collaboration with ISRO has also been inaugurated by the Hon'ble Union Minister virtuallly.

The Multi-Mission Meteorological Data Receiving and Processing System (MMDRPS) is a state of the Art &very high-end processing system. The system has three dedicated earth station and data receiving system to receive the data from currently operational Geostationary INSAT-3D, INSAT-3DR satellites and INSAT-3DS to be launched in year the 2021/2022. **MMDRPS system has around 32 high end servers & two-tier objective type storage of the capacity 2.0/2.0PB (Main/ Mirror) with 324TB solid state Drive (SSD) system, resulting to bring down the processing time from 20**

minutes to 7 minutes. A provision has been made to carry out real time calibration of Infrared spectral band satellite data with international reference satellite data to improve the satellite data quality. This system is capable to process RAPID scan data of INSAT-3DR Imager payload conducted during Extreme weather events or cyclones resulting better monitoring of such extreme weather events in real time. The MMRDPS system output will be utilized for monitoring of severe weather and many sectorial applications like Defence services , Disaster Management, Power Sector, Aviation, Railway, Tourism and Agriculture. MMDRPS products are available globally on the dedicated webpages (http://satellite.imd.gov.in/insat.htm&http://satmet.imd.gov.in/insat3d.htm) and Geo-reference satellite data can be visualised and analysed through on-line visualization tool called RAPID.

India Meteorological Department is modernising its observational network in the Central and Northern Himalayas by installation of state of art X-band Doppler Weather Radar (DWR) in a phased manner at different locations. In this connection, two X band, dual polarized Doppler Weather Radars indigenously manufactured by M/s Astra Microwave Products Ltd, Hyderabad has been installed at Mukteshwar (Uttarakhand) and Kufri (Shimla) This indigenously built radars are shining examples of Atmanirbhar Bharat and will play a vital role for providing information on the rapid development of severe weather events in the Central and Eastern region of Uttarakhand and Himachal Pradesh along with adjoining areas around with a nominal range of 100 Kms.

It will help in

- Detection of severe weather associated with thunderstorms thus providing improved warnings.
- Better estimation of rainfall with detection of heavy rains and generation of warnings.
- Additional inputs to numerical weather prediction models

IMD is publishing quarterly research journal ‘MAUSAM’ since 1950 and has completed more than seven decades of fruitful existence and has proved to be an effective medium for publication of research results in different areas of atmospheric sciences. All issues of the Journal since 1950 are available on IMD website.

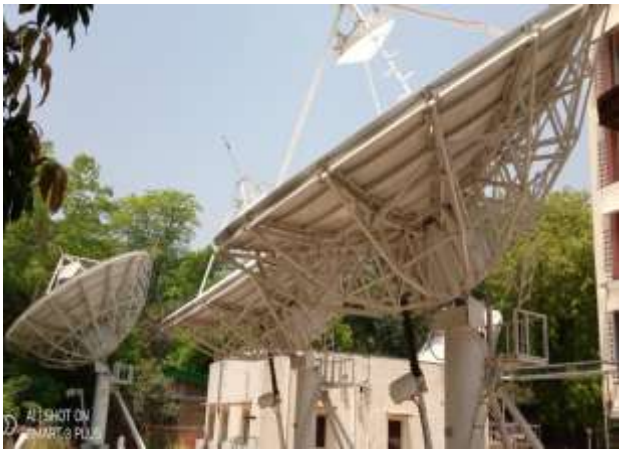
Now, IMD in collaboration with CSIR-NISCAIR has introduced Online Web Portal of Journal MAUSAM for online submission, review, publication and archival of research paper with open access like the leading international journals. This is available in the following link:

http://mausamjournal.imd.gov.in/index.php/MAUSAM/about/submissions

IMD brought out the 21st special issue of MAUSAM on the theme “TROPICAL CYCLONE”. This special issue includes review papers and research papers by distinguished scientists from India and abroad covering recent progress on science of tropical cyclones and future scope.

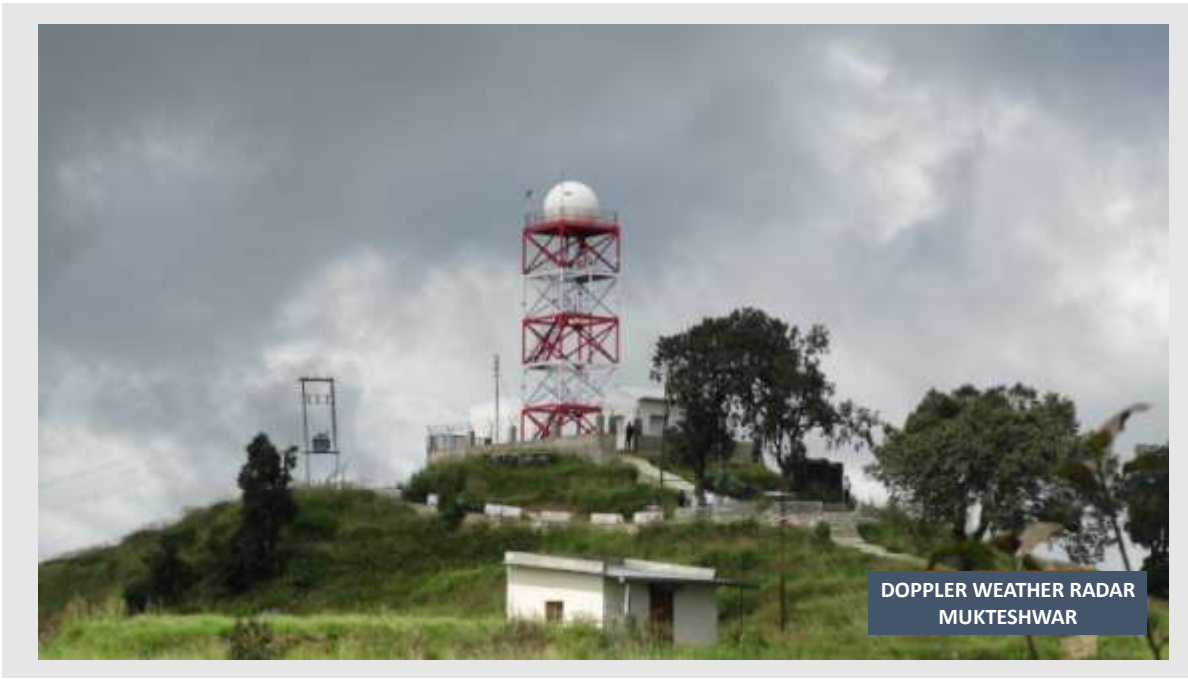
The departmental Hindi magazine ‘Mausam Manjusha’ was first published in 1980 by IMD. Even though it had been a humble beginning, It contained several scientific articles and poems etc. The 2021 January edition of this magazine was released today during the function.

The year 2020 witnessed five Cyclones, which included two Very Severe Cyclones and the Super Cyclone AMPHAN which affected West Bengal & Odisha. The efficient early warning services provided by the India Meteorological Department and enhanced co-ordination among various Government Agencies helped in minimizing the human casualties and property damage associated with these cyclones.IMD prepares the Annual report on intense low-pressure systems forming over the Indian Seas every year. The report for the year 2020 was also released today. This report contains the scientific documentation of all cyclones & depression formed during the year which would serve as a Compendium for the Researchers, Disaster Managers & Cyclone forecasters for their future work.



MMDRPS

Multi Mission Meteorological Data Receiving and Processing System (MMDRPS)



Dual Polarised X band Doppler Weather Radar, Mukteshwar, Uttarakhand

Dual Polarised X band Doppler Weather Radar, Kufri, Himachal Pradesh