GOVERNMENT OF INDIA DEPARTMENT OF SPACE

Sub: Monthly Summary of Department of space for the month of June 2022

PART-I (Unclassified)

1. Important policy decisions taken and major achievements during the month

A. <u>Satellite Missions:</u>

I. CMS-02 (GSAT-24) Mission:

NSIL undertook its "1st Demand Driven communication satellite mission" - GSAT-24/CMS-02, which was successfully launched on-board Ariane-V [VA 257 flight] from Kourou, French Guiana on 23rd June 2022. The entire satellite capacity on-board CMS-02 will be leased to its committed customer M/s. Tata Sky for meeting their DTH application needs.

II. PSLV-C53/DS-EO:

On 30 June 2022, NSIL successfully undertook its 2nd Dedicated commercial mission PSLV-C53/ DS-EO, wherein 3 satellites from Singapore were launched, along with 2 payloads from Indian Start-ups – M/s. Digantara and M/s. Dhruva Space on PS4 Orbital Platform.

III. Small Satellite Launch Vehicle / EOS-02:

The first developmental flight of Small Satellite Launch Vehicle, SSLV-D1 is scheduled to launch EOS-02, an earth observation satellite in the 3rd quarter of 2022.

IV. LVM3-M2/OneWeb India-1 Commercial Mission:

The first dedicated commercial mission of GSLV MkIII (LVM3-M2) is scheduled in the third quarter of 2022. The mission will launch multiple communication satellites in a single launch for OneWeb.

V. PSLV-C54/EOS-06 Mission:

PSLV-C54 is scheduled to launch EOS-06, an earth observation satellite in the 3rd quarter of 2022. Various activities pertaining to spacecraft integration and tests are in advanced stages of progress for the scheduled launch.

VI. RLV-LEX Mission

First runway landing experiment [RLV-LEX] of Reusable Launch Vehicle – Technology Demonstrator is scheduled in the 3rd quarter of 2022 from Aeronautical Test Range, Chitradurga, Karnataka.

B. Earth Observations:

• Agriculture Technology Project (for Govt. of Maharashtra): Cotton crop yield simulation is carried out using crop growth simulation model for 2019-20, 2020-21 and 2021-22 kharif season and compared with crop cutting experiment based yield.

- Crop Insurance Support (for AICIL): Mapping of boro paddy completed for 21 districts of West Bengal. Insurance Unit-wise yield loss estimates for re-planted Potato crop (due to heavy rain) were generated and shared with AICIL.
- **National Hydrology Project** (NHP, for **M/o Jal Shakti**): Established field level Evapotranspiration observation network across country. Comparison of satellite data based AET products with those from flux tower data is under progress.
- **GeoMGNREGA (for MoRD):** Bhuvan-Yuktdhara planning portal is being integrated with MoRD's MIS. Procedure for integrating the planning tool in Yuktdhara has been approved by MoRD.
- **Bhuvan Geoportal:** Bhuvan IDY mobile app solution updated and made operational on Bhuvan. Listing of iconic locations of Yoga event was implemented.
- Disaster Management Support Programme (for MHA, NDMA, SDMAs):
 - National Database on Emergency Management (NDEM): Multi-lingual support for Points of Interest, Road, Infrastructure and other layers has been enabled.
 - Near Real Time Flood Mapping & Monitoring: Pre-flood database creation done for the current flood season for all flood prone states. Floods were monitored & mapped in the Assam, Meghalaya and Tripura States; about 25 flood inundation maps were generated and shared with the MHA and ASDMA.
 - Forest Fire: Multiple-daily detections of active forest fire have been done and disseminated to FSI and concerned States
 - Landslides: Preparation of Landslide Susceptibility Map for 4 states of NER is under progress
 - Working Group on DRM for IORA: DOS/ISRO's proposal for capacity building of IORA member countries on Space based inputs for Disaster Risk Reduction, Flood Early Warning and Landslide Hazard was presented during the meeting of IORA Working Group on Disaster Risk Management.
- Satellite Data Acquisition and Dissemination: 2,469 satellite passes were acquired and archived. About 37,900 satellite data products were downloaded through Bhuvan portal and 8,961 products were disseminated through data supply chain

C. Capacity Building:

1.	"Applications of geospatial technology in survey and monitoring of agriculture in Meghalaya" (from 20-24 June, 2022)	30 officials from the Directorate of Economics and Statistics, Government of Meghalaya participated in the training
2.	"Basic course in remote sensing and GIS" (from 06-17 June, 2022)	24 participants attended

3.	Customized training programme titled "Ground-based subsurface imaging for enhanced EO applications in geosciences" (13-17 June, 2022)	16 participants attended
4.	Summer school course on "Usefulness of RS & GIS for Environmental Studies" (20-24 June, 2022)	82 Children from various schools
5.	"Application of Remote Sensing in Geological Studies" (30 May- 10 June, 2022)	38 students PG from IITB
6.	Course on "Geo-spatial applications for forest ecosystem analysis" (20-25 June, 2022)	423 participants from 1784 institutions
7.	"MOOC course on RS & GIS for Urban studies and environmental modeling" for school students (from 07 th June, 2022)	75 participants registered
8.	"MOOC on Space Science and Technology "for school students (06 th June, 2022)	70111 Participants registered

D. International Cooperation:

- Charter on the establishment of the Space for Climate Observatory (SCO) was signed by ISRO on June 27, 2022.
- NASA invited ISRO to join the NASA's International Space Apps challenge hackathon event planned in October 2022, following which, ISRO has agreed to be the partner agency of NASA's Space App Challenge for 2022.
- International announcement was made on the commencement of the online registration from June 01, 2022 for the third batch of UNNATI training programme scheduled during October 15- December 15, 2022.
- A three-member Indian Delegation participated in the 65th COPOUS session at Vienna from June 01-10, 2022.

2. No of Cases of 'Sanction of Prosecution' pending for more than three months: NIL

3. Particulars of cases in which there has been a departure from the Transaction of Business Rules or established policy of the Government: NIL

4. Status of ongoing Swachhta Abhiyan (progress under Special Campaign):

The Department has formulated the Swachhta Abhiyan Plan for the year 2022 and under this Swachhta Pakhwada was celebrated from 01.02.2022 to 15.02.2022 across DOS/ISRO Centres/Units Autonomous Bodies. The evaluation for the best maintained Centre/Unit/Autonomous Body is under process.

5. Status of Rationalisation of Autonomous Bodies:

EMC has recommended that SCL and NARL be governmentalized out of which SCL has been transferred to MeitY during the year 2021-22. The recommendations of the committee in respect of NARL is under review.

Action is being initiated to bring all the AB's under the Department namely, IIST, PRL, NARL & NESAC under Treasury Single Account before the end of financial year 2022-23.

6. Information on specific steps taken for utilisation of the Space Technology based tools and applications in Governance and Development:

- M/o Rural Development: Under the Integrated Watershed Management Programme (IWMP/ WDC-PMKSY) for monitoring Watersheds using Geospatial Technologies, 20,000 locations of watershed development interventions have been geotagged (cumulative 16.51 lakh geotags) and 597 summary reports were generated.
- MoEF&CC and CPCB: Monitoring Agriculture Residue Burning- Daily report of active agriculture fires for 4 Indian states viz., Punjab, Haryana, Rajasthan and Uttar Pradesh is being generated and disseminated to MoEF&CC and CPCB.

7. Vacancy position of senior level appointments in the Ministry/Department including Autonomous Bodies/PSUs:

The detailed status regarding all the posts pertaining to Department of Space has been updated on AVMS. The status of updation of vacancy as on 30.06.2022 is as follows:

- > Total number of posts required to be entered on AVMS: 24
- Number of posts filled as on date: 19
- Number of posts totally vacant as on date: 05
- Number of posts under premature repatriation 00
- Number of posts under additional charge arrangement: 04
- > Number of posts that would fall vacant during the next 06 months: -01

8. List of cases in which ACC directions have not been complied with :- NIL.

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