Title of the Report: *One-Day Workshop on "Geospatial Technology for Infectious Disease Monitoring and Management"*

Date: 15th October 2024

Organized by: Indian Institute of Health Management Research (IIHMR), Delhi

Sponsored by: ISRO's Disaster Management Support (DMS) Programme

Led by: Indian Institute of Remote Sensing (IIRS), Dehradun

On the occasion of International Disaster Risk Reduction Day, 2024, the students at International Institute of Health Management and Research Delhi (IIHMR Delhi) organised conferences, symposiums and various sensitization programs to raise awareness about disaster preparedness, mitigation strategies, and resilience-building among diverse communities. The institute in association with the Indian Institute of Remote Sensing (Department of Space) Dehradun organised a One-Day Workshop on "Geospatial Technology for Infectious Disease Monitoring and Management," commemorating this one-and-a-half-month-long campaign. This Capacity Building workshop, as part of ISRO's DMS programme, aimed at motivating participants to develop innovative methods, tools, data products, and services in the field of disaster management using space technology. By integrating geospatial tools with infectious disease monitoring, the workshop proved to be a key element in shaping strategies for intercepting complex health challenges. Participants from different universities across India such as Jamia Millia Islamia, Jawaharlal Nehru University, University College of Medical Sciences (UCMS), ICMR-National Institute of Malaria Research, University of Delhi, Government Medical College Kota, The Maharaja Sayajirao University of Baroda, VIT Bhopal University, etc attended the workshop.

During the inaugural session, Dr Preetha G.S. (Professor, IIHMR Delhi) highlighted the importance of understanding infectious diseases and their nature, addressing the burden of these diseases at both global and national levels. She also discussed the current practices in mapping and monitoring infectious diseases, emphasizing the need for innovative and effective approaches. Dr Nidhi Yadav (Associate Professor, IIHMR Delhi) then provided an insightful overview of remote sensing and GIS emphasizing their foundational principles and applications. She also delved into geospatial tools and techniques, illustrating their significance in mapping and monitoring infectious diseases effectively.

In his keynote session, Dr Sameer Saran (Faculty, ISRO) explored web-based applications and their role in disease monitoring and control, presenting real life case studies showcasing successful implementations of web-based applications in disease surveillance. He also discussed the baseline for disease surveillance programs and shared best practices utilizing GIS technology. Dr Varsha Tanu (IIHMR Jaipur) discussed the potential of remote sensing technology in the management of vector-borne diseases, highlighting its applications in disease monitoring and control.

In the final session, Dr Punit Yadav (IIHMR Delhi) discussed the role of geospatial technology in visualizing health hazards, drawing on lessons from the infamous London cholera outbreak and its patient tracking mechanisms related to WASH. He also explored data analytics for assessing associated supply chain risks.

The workshop concluded with a valedictory session and certificate distribution. A video was also displayed, showcasing the efforts of everyone involved in conducting various activities throughout the one-and-a-half-month-long event. In her closing remarks, Dr Nidhi Yadav thanked the institute, the sponsoring agency (IIRS and ISRO) and participants. She also lauded the efforts of the coordinators (Ms. Pranjali and Ms. Ritika) and their team of volunteers for organizing the event of such magnitude.

Glimpses from the Program


Workshop on
Geospatial Technology
Infectious Disease Monitoring and Management
IIHMR
DELHI