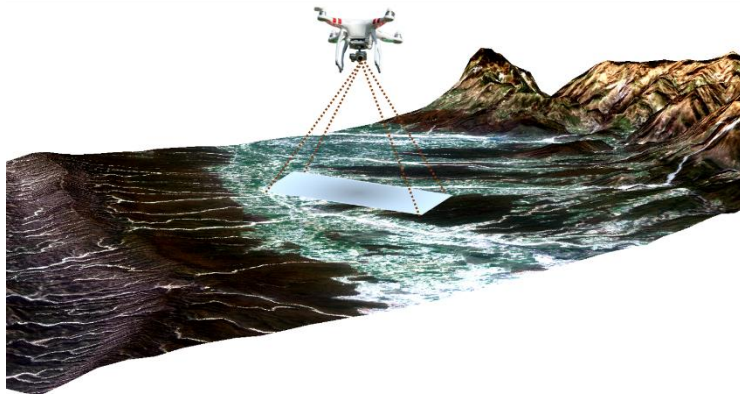


Special Course on UAV Remote Sensing and its Applications

September 23 - 27, 2024



Indian Institute of Remote Sensing
Indian Space Research Organisation
Department of Space, Government of India
Dehradun - 248 001, Uttarakhand
www.iirs.gov.in

INTRODUCTION

The recent development in Unmanned Aerial Vehicle (UAV) platforms and associated sensing technologies, has brought a new dimension to the field of remote sensing. The UAVs enable accurate, flexible, and low-cost measurements of 3D, radiometric, and temporal properties of land cover features with high-quality cameras, GPS, and precise processing. Availability in a wide range of sizes, easier deployment, and cost-effectiveness of UAVs compared to conventional airborne/space-borne systems make them attractive. With lightweight systems, typically flying at altitudes ranging from 100m to 300m and the aerial strip extent ranging typically a few km, they have a great potential for providing instant information about fire, natural resource and disaster management, 3D terrain mapping, precision agriculture, wildlife observation, vegetation measurements, etc. UAVs are more maneuverable compared to conventional platforms and hence can be programmed to acquire data in various modes (2D, 3D, and complex flight paths). The huge amount of data provided by UAVs poses, however, a new challenge towards developing appropriate processing, storage, and transmission techniques are yet to be explored further. In view of the present and future potential of this emerging technology, a special course on “UAV Remote Sensing and its Applications” is envisaged with the following objectives.

OBJECTIVE

- The overall objective of the course is to impart knowledge on UAV remote sensing among professionals, researchers, academicians, and students
- To disseminate knowledge on UAV data processing and terrain parameter extraction.
- To demonstrate the potential of UAV remote sensing for natural resource management.

COURSE DURATION AND STRUCTURE

The course will be a blend of lectures and hands-on exercises. The following course content will be covered:

- Fundamentals of UAV remote sensing;
- UAV data processing and information extraction;
- Potential advantages of UAV data in Natural Resource Management and Disaster management.

TARGET PARTICIPANTS

This course is primarily meant to train working professionals from Central and State Govt. Departments, Non-Governmental Organisations, Universities and Educational Institutions, private industry, entrepreneur, researchers and fresh graduates in the area of remote sensing and image analysis.

NUMBER OF SEATS & ELIGIBILITY

Total 20 seats are available (all seats are for Indian nationals only).

Candidates having Bachelor's degree in Science/Engineering (OR) Post-graduate in Science in any discipline are eligible to apply.

Note: All Candidates should have basic knowledge of Remote Sensing and GIS/ Geoinformatics/ Geomatics

Please refer Course Calendar available in the IIRS website (<https://admissions.iirs.gov.in/coursecalendar>) for other details.

COURSE FEE

Rs. 6,500/- (Rs. 2,000: Tuition Fee + Rs. 4,500: Registration & Other Charges)

ACCOMMODATION

The lodging and boarding facilities are provided to all course participants at IIRS in its hostels at nominal charges. All hostel rooms are well furnished and are allotted on single/double occupancy basis. Local candidates will be considered for hostel accommodation, only if available. **No accommodation will be provided to the accompanying person/ children.**

HOW TO APPLY

Please fill up the **online application** form available on the IIRS website at the following link

<https://admissions.iirs.gov.in/>

Offline applications will not be considered.

The start date to apply for the course is 01.04.2024 [10:00 hrs] and **the last date to apply for the course is 20.08.2024 [17:30 hrs].**

Candidates nominated by the government organizations will be given preference for admission followed by other working professionals. Govt.-sponsored candidates must submit the Nomination Form from the Competent Authority of their parent organisation/institute at the time of submitting the online application. The template of the Nomination Form can be downloaded from <https://admissions.iirs.gov.in/>.

Application Fee: Rs. 500 (Rupees Five Hundred only)

ABOUT IIRS

Indian Institute of Remote Sensing (IIRS) is a premier institute with a primary aim to build capacity in Remote Sensing and Geoinformatics technologies and their applications through training & education, research and outreach programmes. IIRS is a Unit of Indian Space Research Organisation (ISRO), Department of Space, Government of India. Formerly known as Indian Photo-Interpretation Institute (IPI), founded in 1966, the

Institute is the first of its kind in entire South-East Asia. While nurturing its primary endeavour to build capacity among the user community by training mid-career professionals since its inception in 1966, the Institute has enhanced its programmes to meet the requirements of various stake-holders, ranging from fresh graduates to policy makers including academia, industry, different government departments and NGOs.



IIRS is one of the most sought after institutes for conducting specially designed courses for the officers from the Ministries of the Government of India and State Governments for effective use of Earth Observation (EO) data from satellites for the benefit of society. Ministry of External Affairs, Government of India has recognised IIRS to conduct international training courses for the participants from ITEC (Indian Technical & Economic Cooperation) Member countries in Asia, Africa, Latin America, Central and Eastern Europe, and several Pacific and Caribbean nations.

IIRS also hosts the headquarters of the Centre for Space Science & Technology Education in the Asia and Pacific

(CSSTEAP), affiliated to the United Nations, and conducts its training and education courses in RS & GIS.

LOCATION & ACCESSIBILITY

Indian Institute of Remote Sensing (IIRS) is located in Dehradun, the capital city of the State of Uttarakhand, at a distance of about 260 km from Delhi and is well-connected by air, rail and road. The city is famous for its picturesque landscape, pleasant climate, high quality school education and is the gateway to several places of religious and tourist importance, such as Haridwar, Rishikesh, Mussoorie, etc.

Important Dates:

Start Date	01.04.2024
Last date to apply	20.08.2024
Announcement of Results	26.08.2024
Course Start date	23.09.2024
Course End date	27.09.2024

For more information and further clarification, please write to:

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