

Travel: Greater Hyderabad is well connected by Air, Rail and Road with all parts of the country. Participants travelling by train should alight at Secunderabad or Hyderabad railway station. City transport service is available to reach the EEI.

Buses from various places to Extension Education Institute

Secunderabad Railway Station : 7/94H, 7/94R,
7/95R, 5/92,
Hyderabad Railway Station, Nampally : 92R,
Kachiguda Railway Station : 2/94R,
Mahatma Gandhi Bus Station (Imlibun) : 94R, 94H, 95A,
(Reach Koti, Opp. Osmania MedAical : 95P, 94/95R
College gate by auto and catch bus)
Rajiv Gandhi International Airport, : Taxi / RTC Bus /
Shamshabad AeroExpress

Land marks:

Extension bus stop located on the Rajendranagar road which is at a distance of 15 km. from Koti, 25 km from Secunderabad, 15 km from Nampally, 18 km from Kachiguda and 10 km from Rajiv Gandhi International Airport. The participants may also hire private taxi or cab or auto directly from the Railway Station. Drop Location for Private cabs or Taxis: Extension Education Institute, Rajendranagar road.

Participants are advised to make their return journey reservations at their end before leaving to Hyderabad.

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TRAINING PROGRAMME ON

**Application of Remote Sensing
and
Geographical Information Systems
for Agricultural Development**

October 30th to 3rd November, 2018 (5 days)



Course Coordinator

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EXTENSION EDUCATION INSTITUTE
(Southern Region)

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Back Ground

Agriculture is one of the major sectors in Indian economy. India being a world's largest producer of rice, wheat and pulses, must keep up its pace with growing digital technologies. Over the past few decades, Remote Sensing and GIS have grown exponentially in many sectors for visualisation, monitoring, management and potential development. Agricultural production systems are highly vulnerable to variations in climate, soil and topography of different regions. For sustainable agricultural management, all these factors need to be analysed on spatio-temporal basis. The advanced techniques like remote sensing, global positioning system and geographical information system can be of great use for their assessment and management.

Timely and reliable information on crop acreage, growth condition and yield estimation can be highly beneficial to the producers, managers and policy planners for taking tactical decisions regarding food security, import/export and economic impact. Such information on regional basis can be made available with the use of remote sensing and GIS techniques. Remote sensing and GIS can also be used very effectively in land use / land cover analysis as well as damage assessment because of drought, floods and other extreme weather events.

Geographic information system (GIS), Global Positioning System (GPS) and remote sensing (RS) are important tools in the emerging agricultural revolution called precision agricultural or site-specific management. GIS and GPS are inherently linked technologies. Together, they form a powerful tool to measure, map, monitor, and model resources and environmental data for both scientific and commercial applications.

An attempt has been made by Extension Education Institute (EEI) to organize a 5 day training programme to improve the knowledge and skill in the area of 'Application of Remote Sensing and Geographical Information Systems for Agricultural Development' in the present scenario to review, analyse and evaluate the latest information regarding the application of remote sensing techniques for crop monitoring, crop condition assessment and yield estimation for sustainability of agriculture and natural resources under changing climatic scenarios

Objectives of training:

- To understand the basic concepts of GIS and Remote Sensing and integrations of GIS and RS in Agriculture.
- To understand Precision farming using GIS and RS for Crop management.
- To enhance knowledge on GIS and RS applications in Water management in agriculture.
- To develop skills on GIS and RS applications in animal husbandry sector, sericulture, forestry, fisheries and poultry sector.

Course contents:

Application of Remote Sensing and Geographical Information Systems in Agricultural-Opportunities and limitations; Remote sensing in precision crop management; Remote sensing in irrigated agriculture; Remote sensing in plant nutrition; Application of GIS and Remote sensing in food management; Application of GIS and remote sensing in animal husbandry sector; Application of GIS and remote sensing in sericulture; Application of GIS and remote sensing in forestry; Application of GIS and remote sensing in fisheries sector, Application of GIS and remote sensing in poultry sector; monitoring of remote fields through GIS; Soft skills; Gender mainstreaming and budgeting and field/institutional visits.

Benefits :

1. Training on Application of Remote Sensing and Geographical Information Systems for Agricultural development will help in planning and implementation.
2. The training will provide comprehensive knowledge on GIS and RS applications in animal husbandry, sericulture, forestry, fisheries and poultry sectors will help in identifying the available opportunities and challenges.
3. Training helps in gaining the knowledge in Remote sensing in plant nutrition and food management.
4. Training helps in gaining knowledge and skill in monitoring of remote fields through GIS.

Who can attend? : Officials from departments of Agriculture, Horticulture, Animal husbandry, Fisheries, Soil conservation and soil survey, Forestry and industries department of Andaman and Nicobar islands, Sericulture and allied sectors, all development professionals from client states of EEI, Assistant Professors / Scientists / KVK professionals / DAATT centre Professionals, personnel from Non Government Organisations and any others who want to build or improve their skills related to Disaster Management and Mitigation.

Duration: October 30th to 3rd November, 2018 (both days inclusive). Participants are expected to arrive at least by 8 am on the morning of October 30th and can leave after 1600 hrs. on November 3rd 2018.

Boarding and Lodging: The programme is fully residential. Participants will be accommodated in the Hostels at EEI campus and will be provided free board and lodging . With regards to travel expenses, for all the client department officials as per their eligibility shall be met by EEI, Hyderabad except for officials from NGOs.

Pedagogy: Various techniques and pedagogy are adopted in this course to help participants to feel the best touch of reality. The techniques like hands on experience, visit to institutions related to Remote sensing and Geographical Information Systems, finally with soft skills for efficient job performance.