

## COURSE DETAILS

A. Name of the Institute	<b>Environment Protection Training and Research Institute (EPTRI), Hyderabad, Telangana</b>
B. Name/title of the Course	<b>Climate Change and Sustainable Development (CCSD)</b>
C. Proposed Dates and Duration of the Course in weeks / months	From 30 <sup>th</sup> January - 11 <sup>th</sup> February 2023  Two (2) Weeks
D. Eligibility Criteria for Participants  1. Educational Qualification   2. Work Experience   3. Age Limit 4. Target group	<b>Applicants for this course must</b> <ul style="list-style-type: none"> <li>• Graduates from across the spectrum of disciplines, Teachers / Trainers and / or Administrators in Technical and Vocational Education</li> <li>• Have a minimum of 2-year experience in teaching / training / administration; proficiency in spoken and written English</li> <li>• 25-45 years</li> <li>• Junior to Senior level Government officials, Academicians, NGO's, undergraduate, graduate &amp; research scholars working on Climate Change &amp; Sustainable Development issues.</li> </ul>
E. Aims & Objectives of the Course	<p><b>Aims:</b></p> <p>Fundamental to sustainable development is building resilience to climate change. In developing countries, the traditional roots to development are at odds with the need for a low carbon economy, climate change presents daunting challenges. This course uses a multidisciplinary approach to discuss the challenges of climate change while contributing to building analytical capacities of development professionals to address mitigation and adaptation issues.</p> <p><b>Objectives:</b></p> <ol style="list-style-type: none"> <li>1. Provides a broad and integrated knowledge on key issues in the climate change and sustainable development field</li> <li>2. In-depth coverage of adaption and mitigation from theoretical and applied points of view</li> <li>3. Explores how countries and societies can strive for long-term welfare, while enduring environmental</li> </ol>

	<p>degradation and resource limitations.</p> <p>4. Brings together insights and perspectives from science, energy, economics, innovation, policy, ethics and gender.</p>
F. Details / Content of the Course	<p><b>Contents of the Course</b></p> <ol style="list-style-type: none"> <li>1. Introduction to Science of Climate Change</li> <li>2. Impacts on Biodiversity, Water and Agriculture</li> <li>3. Climate Change Mitigation and Adaptation</li> <li>4. Energy and Climate Policy</li> <li>5. Sustainable Urban Systems</li> <li>6. Economic Growth and Sustainable Development</li> <li>7. Sustainable Development Goals</li> <li>8. Design Thinking for Strategy and Innovation</li> </ol>
G. Mode of Evaluation of Performance of the ITEC Participant	Evaluation through Seminars, Group work and Project work
H. Name of the Department	Centre for Climate Change, EPTRI

## Climate Change and Sustainable Development

### COURSE PROFILE

Fundamental to sustainable development is building resilience to climate change and its variability. In the developing countries where the traditional routes to development are at odds with the need for a low carbon economy, climate change presents daunting challenges. A multi-disciplinary approach that integrates the biophysical, technological, socio-economic sciences and the humanities is required to successfully engage with the challenges of climate change. India is well positioned to engage with these issues because of its status as a developing country with good technology and infrastructure, juxtaposed with less developed communities.

This course provides interdisciplinary training in climate change and sustainable development.

### **Structure of the Programme**

This course is structured into three modules. Course has a proper blend of lecture, demonstration and field studies in preexisting related courses (text or lecture-note based). Course explores the subject through resources, development, impact and management.

**Module 1:** Introduction to Climate Change and Sustainable Development – This provides a broad and integrated knowledge on key issues in the climate change and sustainable development field. This covers topics such as sustainable development; the climate system, anthropogenic forcing and climate system response; climate variability and change; international climate change legal frameworks; the economics of climate change and climate change financing; and climate-compatible development;

**Module 2:** Climate Change Adaptation and Mitigation – Provides an in-depth understanding of adaption and mitigation from the theoretical and applied points of view.

**Module 2:** Specific thematic topics:

- a. Vulnerability, Mitigation and Adaptation to Climate Change – A Developing Country's perspective
- b. Impacts of Climate Change on Biodiversity, Water and Agriculture
- c. Energy and Climate Policy, Policy Instruments and International Legal Framework
- d. Sustainable Urban Systems
- e. Sustainable Development Goals (SDG's)
- f. Design Thinking for Strategy and Innovation

**Project Work:** In any one of the above areas.