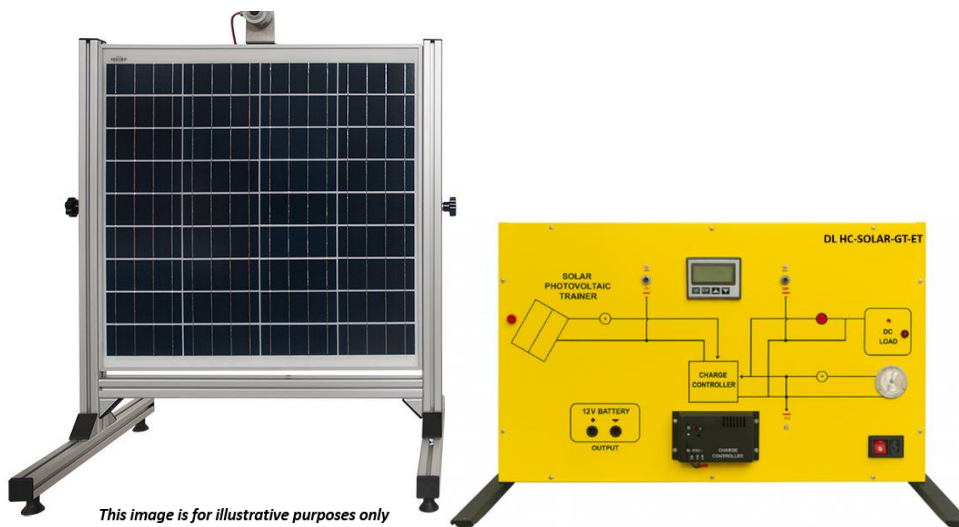




## PHOTOVOLTAIC SYSTEM ON-GRID



**DL HC-SOLAR-GT-ET**

The Photovoltaic System On-Grid is a streamlined training platform designed to show how solar energy can be directly fed into the public grid. With its compact panel and integrated control interface, it offers students a clear, hands-on view of real grid-connected solar operation. Ideal for modern learning environments, it provides an intuitive way to understand solar generation, grid interaction, and the behavior of DC/AC conversion in practical scenarios.

The **EasyTech – Renewable Energies product line** is designed as an entry-level solution that allows students, technicians, and new users to explore energy generation and management technologies in a practical, accessible, and safe way, all integrated into compact, didactic platforms built for progressive learning. Each **EasyTech product line** is engineered to provide an intuitive, modular, and flexible experience, helping users understand the essential principles and preparing them to advance toward more complex systems.

### Technical Specifications - System configuration: grid-connected

- Silicon cell photovoltaic panel
  - Adjustable tilt tabletop aluminum frame
  - 80 W photovoltaic panel
- Tabletop control panel
  - Grid tie power inverter
  - Rated AC Output Power: 150 W
  - AC Output Voltage: 230 V
  - AC Output Frequency: 50 Hz
  - DC Input Voltage Range:  $10.8 \div 30V$
  - Output Current Waveform: Pure Sinewave
  - Protection: Over Current, Over Temperature, Reverse Polarity, Anti-Island
  - Electric load: 230Vac lamp
  - Socket for output
  - Multifunction instrument, microprocessor-based
- Indoor Lighting Device

### Training Program

- Components of a grid connected solar system for electricity production
- Effect of solar radiation on the panel output voltage
- Effects of shading on a real solar installation
- Photovoltaic panel energy conversion efficiency
- Interconnection of solar energy to the public grid
- Operation and efficiency of a DC/AC inverter

