

# COAL BASED POWER PLANT ELECTRICAL PROTECTION SYSTEM & ELECTRICAL SWITCHYARD

## Objectives

This program is aimed at providing an overview of electrical protection system. Program focuses on types of protections, protections related to generator, transformer, and switchyard. It also explains philosophy of automatic bus changeover. This program is aimed to provide an overview of switchyard and its components. Program also focuses on various types of switchyard, air Insulated Switchyard (AIS), Gas Insulated Switchyard (GIS) and hybrid switchyard, their merits and demerits.

Participant Benefits	Duration
<p>At the end of this workshop, the participants</p> <ul style="list-style-type: none"> <li>• Understand requirement of protection system.</li> <li>• Describe various type of protections implemented for generator, transformer and switchyard.</li> <li>• Understand automatic bus changeover and its implementation.</li> <li>• Understand types of switchyard.</li> <li>• Describe major components of a switchyard and their purpose.</li> </ul>	<p>Duration: 03 days At bhilai</p>
Course Coverage	Target Audience
<p>Major topics that will be covered during the course :</p> <ul style="list-style-type: none"> <li>• Overview of overall electrical protection system in a power plant.</li> <li>• Introduction to generator protection philosophy.</li> <li>• Introduction to switchyard protection philosophy.</li> <li>• Automatic Bus Transfer System- Design and Customization Requirement.</li> <li>• Overview of a traditional Air Insulated Switchyard (AIS) and its major components. <ul style="list-style-type: none"> <li>• Introduction to Gas Insulated Switchyard (GIS) and its advantages and limitation.</li> </ul> </li> <li>• Introduction to Hybrid Switchyard and its advantages and limitation.</li> <li>• Switchyard operation and protection philosophy.</li> </ul>	<p>Executives from technical area</p>
	Course coordinator
	<p>Parimal Sinha HOHR, Bhilai</p>