

High Voltage Distribution Systems Design and Grading

Duration	10 days
Target group	Electrical engineers specialising in HV system design, switchgear selection, protection coordination, and substation layout planning.
Prerequisites	There are no prerequisites for this course.
Objective	<ul style="list-style-type: none">• Compliance with legislation.• Better design of HV systems and communication within the design process.
Contents	<ul style="list-style-type: none">• Types of distribution system and their application.• Types and selection of HV switchgear.• Types and selection of distribution transformers.• Types and selection of underground cables.• Earthing requirements.• Design layouts for sub-stations.• Short circuit calculations.• Records and documentation.• Project exercises on selection of equipment.• Discrimination.• Selection of TLF's and ac trip coils.• Types and selection of auxiliary transformers.• Selection and setting of protective relays.• Co-ordination of HV/LV protection.
Exam	Learners are continually assessed, both in written and practical exercises and through presentations, and there are opportunities to work with a wide range of equipment that will support their knowledge in the field. This course can be intense, it includes evening work, both the reading of course materials and completion of projects.