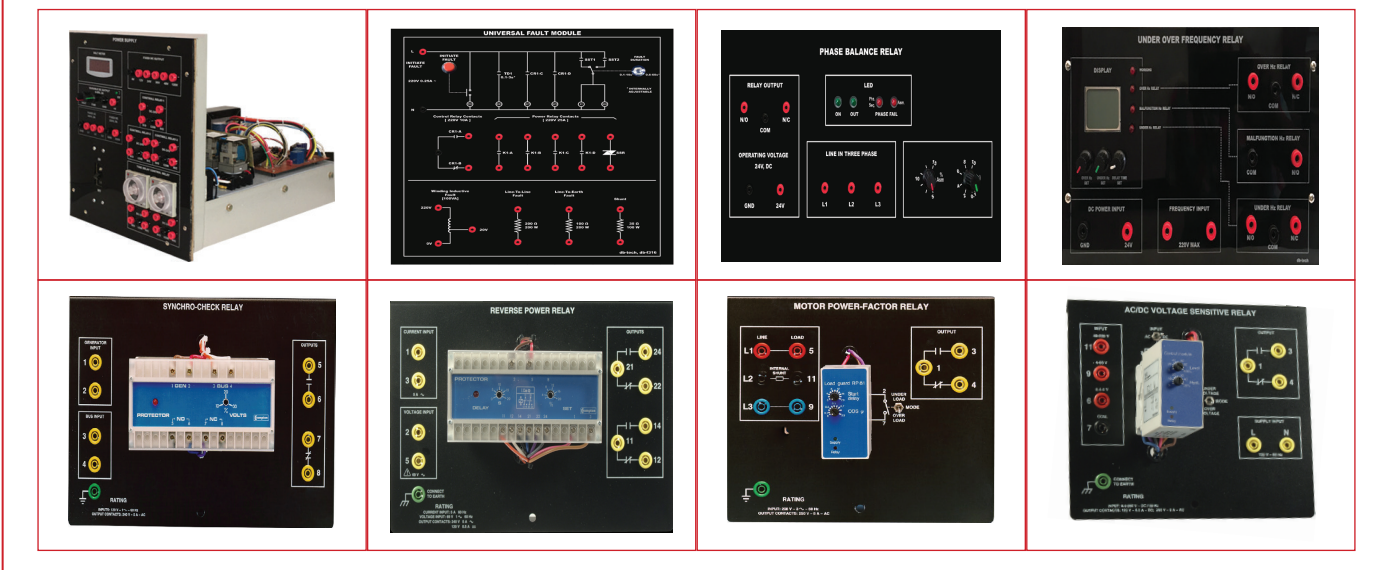


# SWITCH GEAR & PROTECTION SYSTEM



## Specification

### Protective relay control station

- DC power supply :Input voltage: 240/415v AC, 3 phase
- Output voltage: 120V
- Output current: 5A
- AC power supply: Input voltage: 240/415v AC, 3 phase
- Output voltage: 110V, 220V, 400V
- Output current: 5A at 110V, 10A at 220V, 10A at 400V

### Current sensitivity relay module

- Current metering range: 0.4 ~ 6A
- Input current: 8A
- Hysteresis range: 5% to 50% of selected current
- Output contact: 10A at 250VAC
- Operating voltage: 220V AC, 2.5A

### Three phase under over/voltage relay module

- Nominal input voltage: 69V, line to neutral
- Maximum input voltage: 120% of nominal input voltage
- Under voltage set point range: 75% to 100% of nominal input voltage
- Over voltage set point range: 100% to 125% of nominal input voltage
- Hysteresis range: 1% to 15% of nominal input voltage
- Output contact: 2 x SPDT, 5A at 240v AC

### AC/DC volt sensitivity relay module

- Voltage metering range: 40 to 600v
- Maximum input voltage: 650v
- Hysteresis range: 5% to 50% of selected metering range
- Output contact: 8A at 250v AC
- Operating voltage: 240v, AC

## Under/over frequency relay module

- Nominal frequency: 50Hz
- Nominal input voltage: 120v
- Maximum input voltage: 120% of nominal input voltage
- Frequency range: 40 to 60 Hz
- Synchronizing limit adjustment range: 0.1 to 3.0 Hz
- Output contact: 2 x SPDT, 5A at 240v AC

## Synchro-check relay module

- Nominal input voltage: 120v
- Minimum input voltage: 70% of nominal input voltage
- Maximum input voltage: 130% of nominal input voltage
- Frequency range: 45 to 65 Hz
- Synchronizing limit adjustment range: 10% to 30% of nominal input voltage

## Phase balance/sequence relay module

- Nominal input voltage: 120v, line to line
- Minimum input voltage: 120% of nominal input voltage
- Unbalance set point range: 5% to 15% of nominal input voltage
- Time delay range: 0.5 to 10 seconds
- Output contact: DPDT, 5A at 240v AC

## Reverse power relay module

- Nominal input voltage: 69v AC
- Minimum input voltage: 120% of nominal input voltage
- Nominal input current: 5A AC
- Maximum input current: 200% of nominal input current
- Reverse power set point range: 2% to 20%
- Time delay range: 0 to 20 seconds
- Output contact: DPDT, 5A at 240v AC

## Electromechanical relay module

- Nominal input voltage: 220v AC
- Minimum input voltage: 10% of nominal input voltage
- Maximum input voltage: 10% of nominal input voltage
- Maximum current: 300mA
- Auxiliary switching option: NO & NC
- Output contact: TPST, 16A at 450V

## Motor power factor relay module

- Nominal input voltage: 415v, 3 phase
- Minimum input voltage: 90% of nominal input voltage
- Maximum input voltage: 110% of nominal input voltage
- Minimum input current: 0.5A AC
- Maximum input current: 6A AC
- Power factor set point range: 0 to 0.9
- Start delay range: 0 to 20 seconds
- Output contact: SPDT, 10A at 250v AC
- Work station: All module in a portable single station
- Probes: 25pcs, Max load 15A