



*An enhanced, closed-loop simulator for testing, fault-finding, repairing and calibrating Ross Hill and Hill Graham Type AC and DC Control Modules*

### Compact Workstation

Zeefax has engineered a compact, integrated simulator for testing Ross Hill and Hill Graham Type AC and DC Control Modules.

The unit is divided into two sections: one to test AC Modules, the other to test DC Modules. Both can be in use simultaneously. The simulators are powered from a common 3-phase supply, so installation couldn't be simpler.

The components are mounted on withdrawable racks for ease of maintenance. Front panel switches, lamps and indicators provide instant diagnostics for rapid identification of the most common faults.

The AC Module Simulator has a built-in emulation of an engine and generator which provides a realistic simulation of closed-loop control operation. The circuitry provides a comprehensive test for engine speed and load (KW) regulation, as well as generator voltage and KVAR control.

The DC Module Simulator is able to test modules which have been configured for shunt or series motor operation and includes a complete 6-pulse thyristor bridge. Current limits can be checked and calibrated safely, as can all DC module functions.

*This portable, compact package is a complete test and calibration workstation for AC and DC Control Modules.*



### Key Features

#### AC Module Simulator

- KW and KVAR closed-loop test
- Simulated engine and generator load
- Engine start-up check
- Loss of pulse-pick-up
- Reverse power test
- Diagnostic meter and selector switch for quick fault-finding

#### DC Module Simulator

- Motor assignment check
- Current limit calibration
- Shunt and series motor simulation
- Power limit check
- 6-pulse SCR bridge
- Diagnostic meter and selector switch for quick fault-finding

## Specifications

### Power Supply

380-690V, three-phase, 50 or 60Hz, 16A

### Dimensions (H x W x D)

1150 mm x 560 mm x 720 mm  
Withdrawable rack units  
Cooling fans on top

### Weight

134Kg

## AC Simulator

### Controls

Power ON Switch • Battery Supply OFF-ON  
Master/Slave Selector • Slave Reference  
Circuit Breaker Push-to-Close/ Push-to-Open  
Engine Control: STOP-IDLE-RUN • Engine Start  
Closed/Open Loop • No Pulses • Manual PPU  
Normal/Reverse Power • Reverse Power Reset  
Speed Reference • Voltage Reference  
Engine Load • Generator Load • Meter Selector

### Indications

Power On • Reverse Power Trip  
Circuit Breaker Open • Circuit Breaker Closed

### Meter Positions

Exciter Current • Exciter Voltage  
Speed Reference • Voltage Reference  
Throttle • KW Load • KVAR Load  
I Total • Power Limit • Slave  
KW Meter • KVAR Meter



## DC Simulator

### Controls

Power ON Switch • Shunt/ Series Motor  
Assignment Switch • Motor Load  
Speed Reference 1 • Foot Throttle  
Speed Reference 2 • RT Current Limit  
Slave • Power Limit

### Indications

Power On • Dynamic Brake

### Meter Positions

Off • Bridge Voltage • Speed Feedback  
Motor Current • 3 x Motor Current  
Load • Reference 1 • Reference 2  
RT/TD Current Limit • Slave • Power Limit



**Zeefax Limited**

320 King Street, London, W6 ORR, ENGLAND

Tel: +44(0) 20 8748 7808

Email: [uksales@zeefax.com](mailto:uksales@zeefax.com)