

Fire Curtain Group Controller

NF-FGCP

The Fire Curtain Group Controller (NGC) is a central control unit designed to manage the deployment and retraction of up to six 20W or three 40W 24V permanent magnet motors. It operates fire curtains seamlessly under both standard and emergency conditions.

In normal operation, the NGC supplies 24V power to the motors, keeping the curtains securely retracted within their headboxes. During a fire alarm, the NGC cuts power, triggering a controlled “Gravity Fail Safe” descent to deploy the curtains. Once the fire alarm system is reset, the NGC restores power to retract the curtains.

For larger systems requiring synchronized operation of multiple curtains or more than six motors, Multi-Function GCPs can be linked together. Backup batteries ensure up to two hours of operation during power outages, guaranteeing reliable curtain deployment even during mains failure.



Technical Specifications

Descriptions	Ratings
Input Voltage	120V (5.0A) / 230V (3.75A)
Current	5.0 Amps / 3.75 Amps
Frequency	50Hz/60Hz
AC/DC Switchover	ON < 90%
Voltage	OFF < 85%
Ground impedance	0 Ohms
POWER OUT Circuit Voltage	24Vdc nominal output voltage (19.26-25.8Vdc), Non-Power Limited, Fail, Class D
POWER OUT Circuit Current	16Amps Max
Duty	50%
Maximum number of NMC'S	6 (20W) / 3 (40W)
Backup battery	24V / 7Ah
Stand by time	4hrs (Full load - 6/20W motor)
Battery Charging Voltage	27.0 – 27.5V
Battery Charging Current	Max 1.5A
Low Voltage Disconnect	80% of Nominal (19.2V) +/- 5%
Fire Loop	N/C 5V 10Ma (Open Circuit Fault > 1MOhms), (Closed Circuit Fault > 1MOhms), (Restricted to same room, 20ft. in conduit), non-power limited, Class D
Test Switch	5V 5-10mA , Class D.
Alarm out Circuit	24 Vdc Nominal (19.22Vdc – 28.58Vdc), 300mA max current, Power Limited, restricted to same room, Class E
Max. cable size: Fire circuit	2 x 12 AWG / .01A (restricted to within Room)
Max. cable size: Mains Input	1 x 14 AWG / 5.0A
Max. cable size: NMC out	2 x 12 AWG / 15.0A
Max. cable size: Test Switch	2 x 12 AWG / .01 (Restricted to within Room)