

HGL Series Solid State Relay

Load current 0.1-1,2,3A, Output voltage range 28-280VAC
or 48-480VAC, 5-60VDC or 5-110VDC/5-220VDC
Control voltage range 3-32VDC

Electronic

DESCRIPTION

QT/YHL3860-2000
Technical information

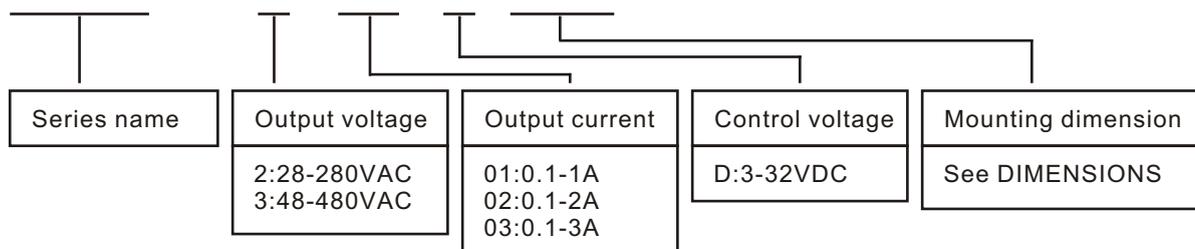
FEATURES

- ▶ TRIAC output(AC), zero voltage turn-on, zero current turn-off(minimizes EMI/RFI);
- ▶ Bipolar transistor output(DC), on-state voltage drop low, switching speedily
- ▶ Internal RC snubber
- ▶ High dv/dt and high blocking voltage
- ▶ Low Input power Consumption, TTL and CMOS Compatible
- ▶ Input and output 4000V optically isolated
- ▶ High Surge Rating Allows Lamp and Motor Load Switching
- ▶ 100% tested at rated current , CE compliant
- ▶ PCB Mount, standard modulus



SELECTING CODE

HGL - 2 01 D /11



APPLICATION

HGL Series Solid State Relays, adapt ignition-proof engineering cover, filled with EPOXY, PCB mounting, standard modulus. This series have the features of noiseless switching, no contact dithering, no electric arc, long life, high reliability comparing with electromagnet relays. Input current small convenient to interface with terminals of computer and various digital tele-control circuit. This products are widely used in the fields of petrochemical equipment, foodstuff-producing mechanism, packaging machines, textile and plastic mechanisms, tool numerical control, gymnasium equp. Specialities be the same with canker, aquosity request prevent explode scurvines circum-stance, and often switch of occasion.

Electronic

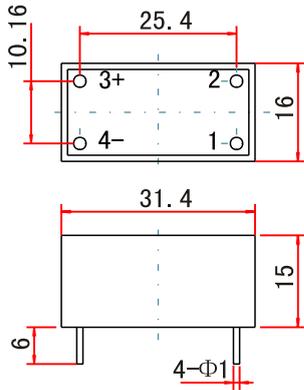
HGL Series Solid State Relay

Load current 0.1-1,2,3A, Output voltage range 28-280VAC
 or 48-480VAC,5-60VDC or 5-110VDC/5-220VDC
 Control voltage range 3-32VDC

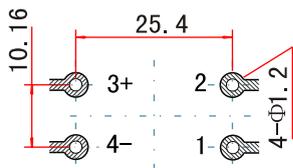
DIMENSIONS

Unit:mm
 Tolerance:±0.5

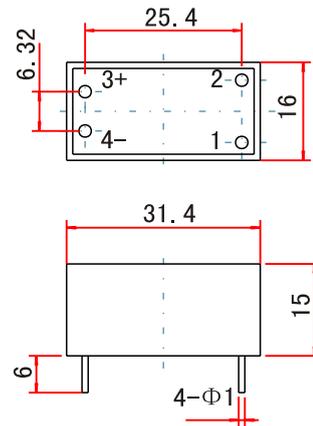
HGL-201D/11
 HGL-202D/11



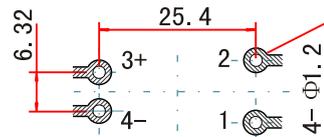
线路板开孔尺寸



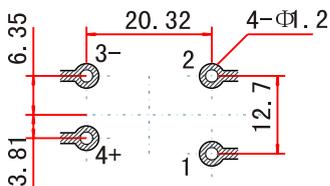
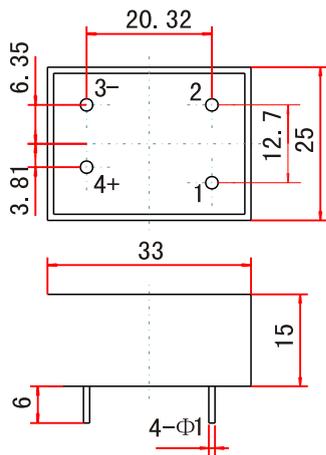
HGL-201D/22
 HGL-202D/22



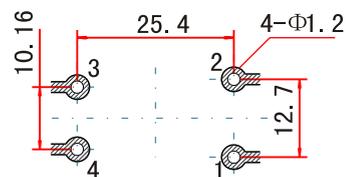
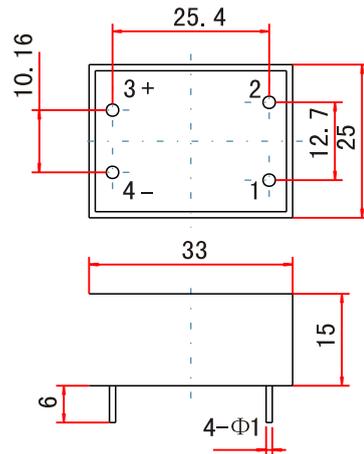
线路板开孔尺寸



HGL-203D/11



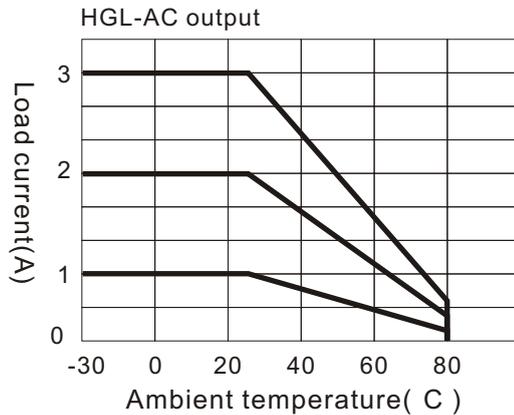
HGL-203D/22



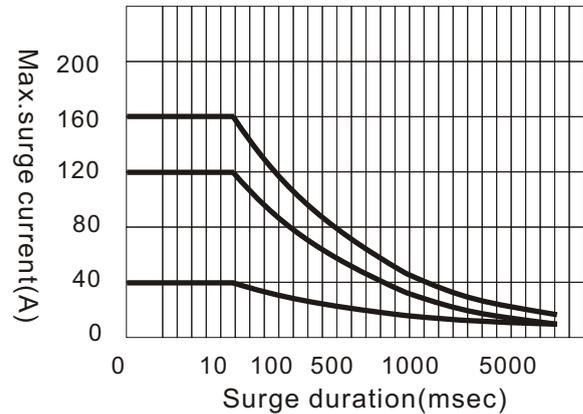
HGL Series Solid State Relay

Load current 0.1-1,2,3A, Output voltage range 28-280VAC
or 48-480VAC,5-60VDC or 5-110VDC/5-220VDC
Control voltage range 3-32VDC

CURRENT DERATING CURVES



MAX. SURGE vs DURATION



PRECAUTIONS

- ▶ When controlling AC inductive load, the SSR may be damaged by the high transient voltage and surge current added on the output, so some special clamping devices to control voltage, such as zener diode, varistor.
- ▶ When controlling DC inductive load, such as solenoid, motor starter, etc, a continuous current circuit should be used to control the reverse electric motor force. Generally speaking, a simple way is to parallel the load with a diode inversely, but this will affect the release time of inductive load. A better way is to series a diode with a zener diode inversely or to series a diode with a resistance.
- ▶ When controlling a small current (close to Min. load current), a dummy resistance should be paralleled to reduce the rest voltage produced by the surge current on the output.
- ▶ When a jointing type relay is mounted, the temperature should be controlled under 260 centigrade degrees and the time will be limited within 5 seconds.
- ▶ To avoid the temperature exceeding the allowance, heatsink efficiency and the mounting position should be regarded, suitable space will be left when two or more SSR are mounted.