

## GL101 Specification

### Anode Parameter

Peak forward anode voltage:	20 kV
Peak anode current:	500 A
Average anode current:	0.5 A
Rate of rise of anode current:	2000 A/ $\mu$ s
Anode heating factor:	$10 \times 10^9$ VApps
Maximum pulse power:	5MW

### Grid drive

Unloaded grid 2 drive pulse voltage:	200V~500V
Grid 2 pulse duration:	2 $\mu$ s
Rate of rise of grid 2 pulse:	2kV/ $\mu$ s
Peak inverse grid 2 voltage:	200V max
Forward impedance of grid 2 circuit:	50 $\Omega$ ~200 $\Omega$

### Heater

Cathode heater voltage:	6.3V $\pm$ 5%V ac
Cathode heater current:	5.0A~8.5A
Reservoir heater voltage:	6.3V $\pm$ 5%V ac
Reservoir heater current:	2.0A~4.0A
Minimum heater time:	5min

### Mechanical

Mounting position:	Any
Net weight:	360g approx
Dimension and tube connections:	See outline
Cooling way:	Forced-air and natural (see notes )

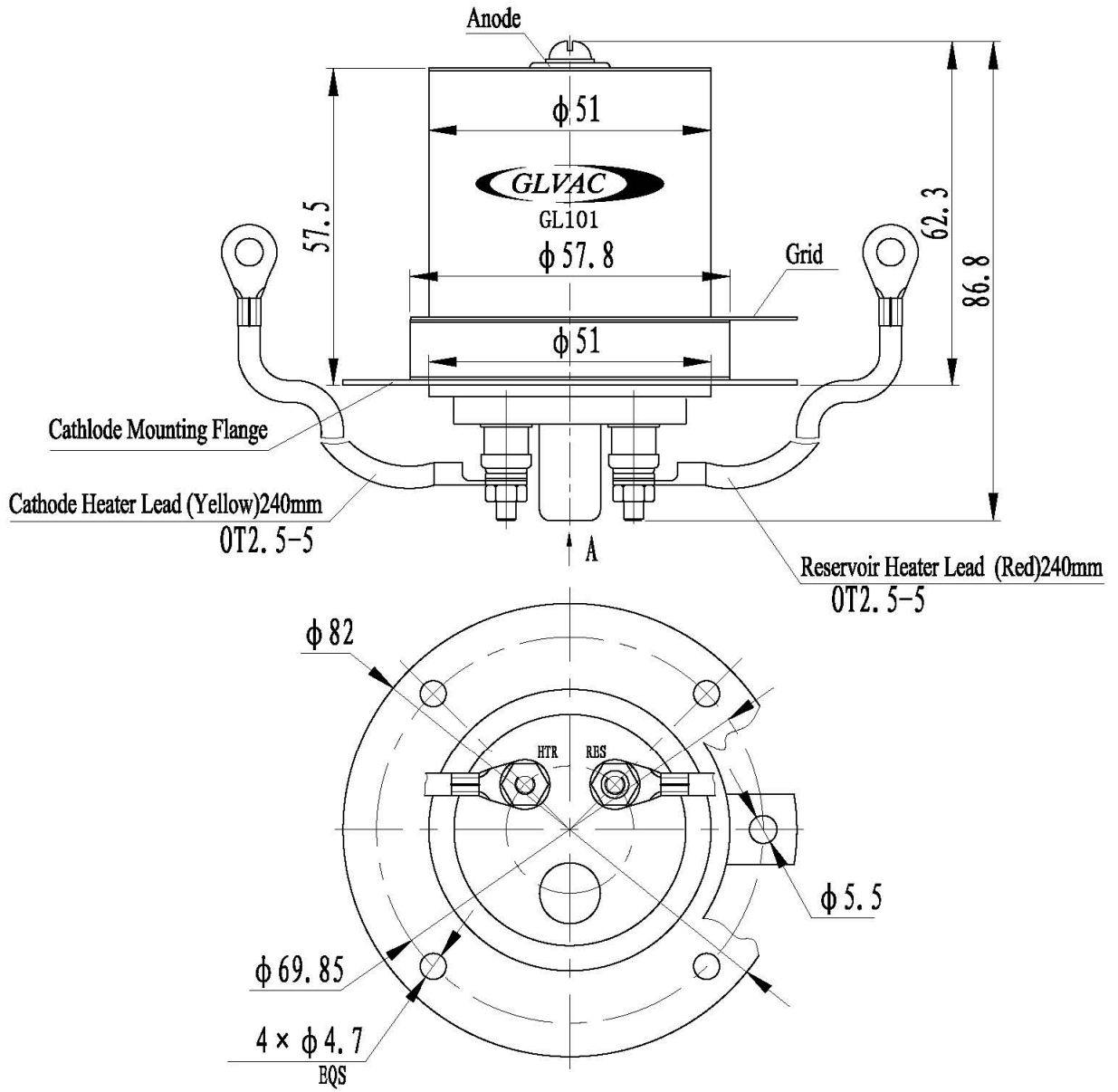
### Notes

The temperature of the envelope must not exceed the value specified below.

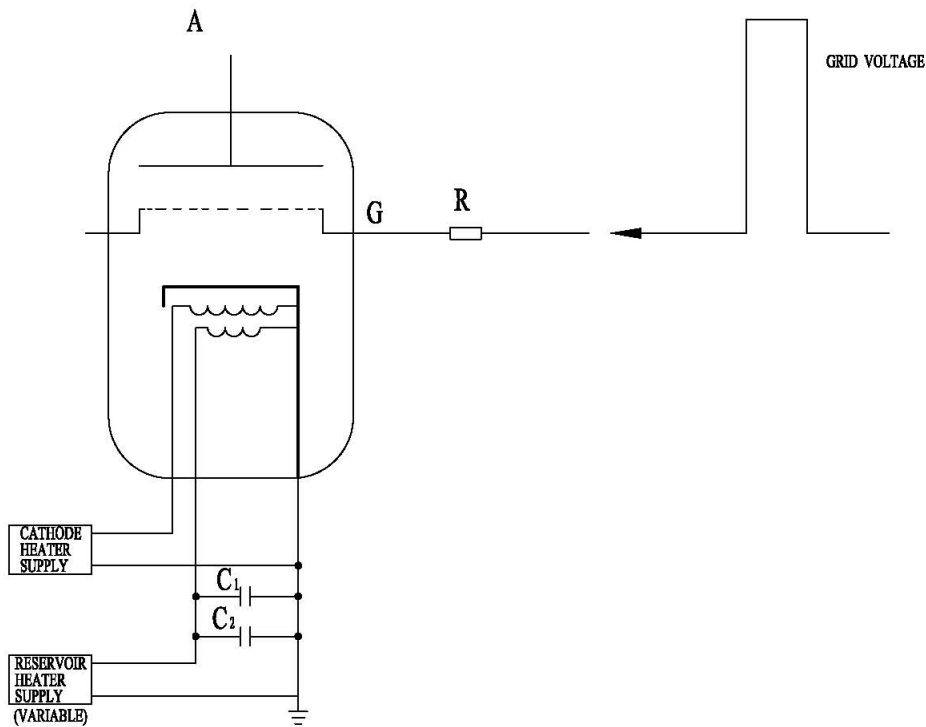
Ceramic, anode and grids.....	150 $^{\circ}$ C
Cathode mounting flange and base.....	120 $^{\circ}$ C



OUTLINE



## SCHEMATIC DIAGRAM



- R<sub>1</sub>, Grid 1 series resistor. 12 W vitreous enameled wire wound is recommended, of a total impedance to match the grid 1 drive pulse circuit.
- R<sub>2</sub>, Grid 2 series resistor. 12 W vitreous enameled wire wound is recommended, of a total impedance to match the grid 2 drive pulse circuit.
- C<sub>1</sub>, Reservoir protection capacitors, 1000pF low inductance with a voltage rating  $\geq 500V$ . ( e . g . ceramic)
- C<sub>2</sub>, Reservoir protection capacitors, 1  $\mu$  F with a voltage rating  $\geq 500V$ . ( e . g . polycarbonate or polypropylene)