



THYRATRON

DESCRIPTION

The FG-95 is a double-grid mercury-vapor thyatron for use in applications where the available grid power is very small and where it is desired to actuate

the grid from a high-impedance source. It may be used in applications where the tube temperature can be maintained relatively constant.

TECHNICAL INFORMATION

These data are for reference only. For design information refer to specifications.

GENERAL CHARACTERISTICS

Number of electrodes 4

Electrical

Cathode—Indirectly heated type

Voltage	5.5*	5.0 volts
Current, approx	5.0*	4.5 amperes
Heating time, typical		5 minutes
Peak voltage drop, typical		16 volts

Approximate control characteristics

Anode voltage	100	1000 volts
Shield-grid voltage	0	0 volts
Control-grid voltage	+1.0	-9.0 volts
Anode to control grid capacitance, approx		0.2 micromicrofarad
Ionization time, approx		10 microseconds
Deionization time, approx		1000 microseconds

*These ratings apply only when the tube is used for ignitor firing.



TECHNICAL INFORMATION (CONT'D)

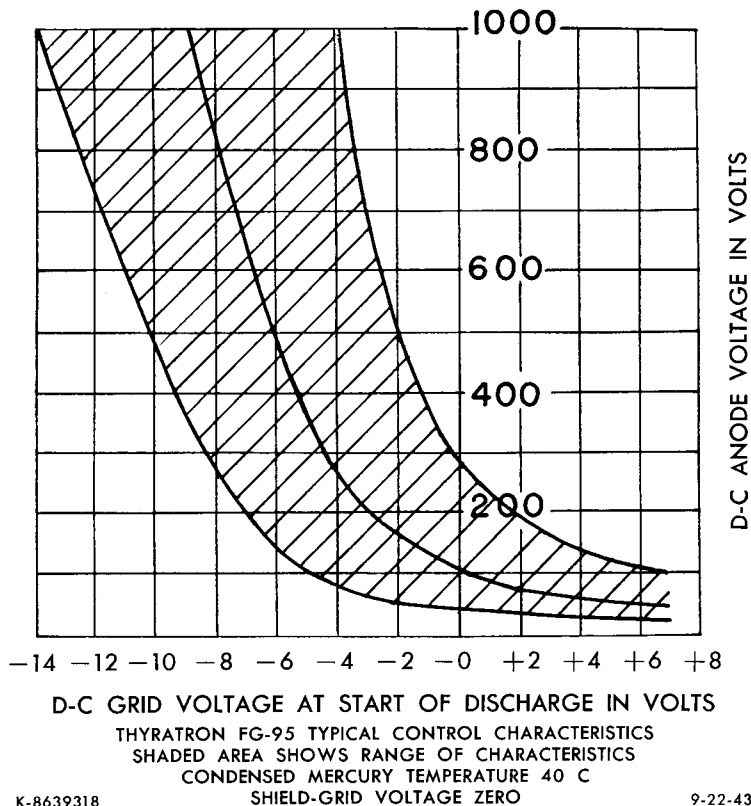
Mechanical

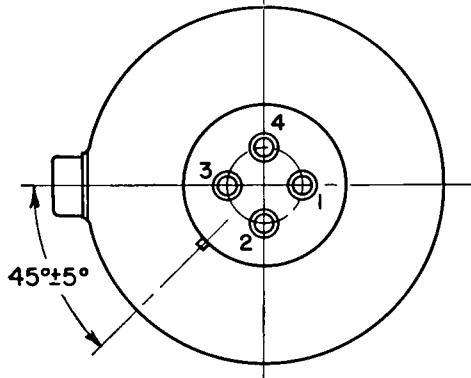
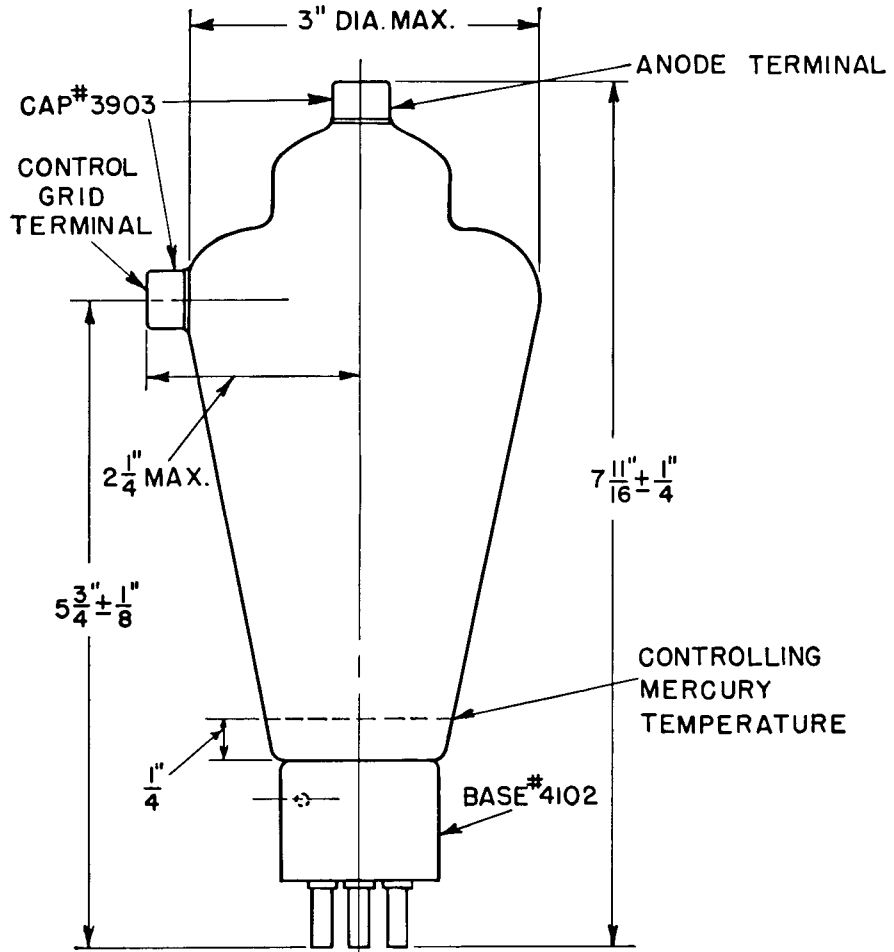
Net weight, approx.....	5 ounces
Shipping weight, approx.....	7 pounds
Operating position.....	vertical, base down

MAXIMUM RATINGS

Maximum peak anode voltage		
Inverse.....	1000	volts
Forward.....	1000	volts
Maximum negative control-grid voltage		
Before conduction.....	1000	volts
During conduction.....	10	volts
Maximum negative shield-grid voltage		
Before conduction.....	300	volts
During conduction.....	5	volts
Maximum anode current		
Instantaneous, 25 cycles and above.....	30*	15 amperes
Instantaneous, below 25 cycles.....		5.0 amperes
Average.....	0.5*	2.5 amperes
Surge, for design only.....		200 amperes
Duration of surge current.....		0.1 second
Maximum control-grid current		
Instantaneous.....		1.0 ampere
Average.....		0.25 ampere
Maximum shield-grid current		
Instantaneous.....		1.0 ampere
Average.....		0.25 ampere
Maximum time of averaging current.....		15 seconds
Temperature limits, condensed mercury.....	+40 to +80	centigrade
Recommended temperature, condensed mercury.....	40	centigrade

*These ratings apply only when the FG-95 is used for ignitor firing.





PIN	FG-95
1	HEATER
2	CATHODE, GRID & ANODE RETURN
3	SHIELD GRID
4	CATHODE & HEATER

K-4955907

8-18-44

OUTLINE
 FG-95 THYRATRON

Electronics Department
GENERAL  ELECTRIC
Schenectady, N. Y.