

RF POWER TRIODE

Air-cooled triode for use in industrial RF generators and in telegraphy and telephony transmitters.

QUICK REFERENCE DATA

λ m	freq. MHz	class-C				class-B	
		telegraphy		oscillator		modulator*	
		V_a kV	W_o kW	V_a kV	W_o kW	V_a kV	W_o kW
10	30	6,5	9,5			7,0	20
		6,0	8,5			5,0	9,0
		5,0	7,1			4,0	7,1
6	50			6,0	6,0		

COOLING: forced air

HEATING: direct; thoriated tungsten filament

Filament voltage $V_f = 12,6$ V

Filament current $I_f = 33$ A

The filament is designed to accept temporary fluctuations of +5% and -10%

CAPACITANCES

Anode to all other elements except grid $C_a = 0,3$ pF

Grid to all other elements except anode $C_g = 16$ pF

Anode to grid $C_{ag} = 11$ pF

TYPICAL CHARACTERISTICS

Anode voltage $V_a = 6$ kV

Anode current $I_a = 1$ A

Mutual conductance $S = 15$ mA/V

Amplification factor $\mu = 32$

* Two tubes.

Table 1 Air cooling characteristics

W_a kW	h m	T_i		q m ³ /min	ΔP Pa*
		max. °C	min. °C		
2	0	35	4,8	200	
	0	45	5,7	250	
	1500	35	5,7	230	
	3000	25	6,1	230	
3,5	0	35	6,2	320	
	0	45	7,3	420	
	1500	35	7,3	360	
	3000	25	7,8	360	
6	0	35	9,2	680	
	0	45	10,7	910	
	1500	35	11,2	810	
	3000	25	11,7	800	

Temperature of filament seals

max. 210 °C

Temperature of grid and anode seals

max. 180 °C

ACCESSORIES

Filament connectors

40634

Connector for centre pin of filament

40649*

Grid connector

40650** or 40622

Insulating pedestal

40630

* 1 pA \approx 0,1 mm H₂O.

* The centre-tap f_c (diameter 10,5 mm, marked O) must not be used for filament current supply.
Connector type 40649, however, must be used for the cooling of this pin.

** Connector 40650 should only be used below 30 MHz.

MECHANICAL DATA

Dimensions in mm

Mounting position: vertical with anode up or down

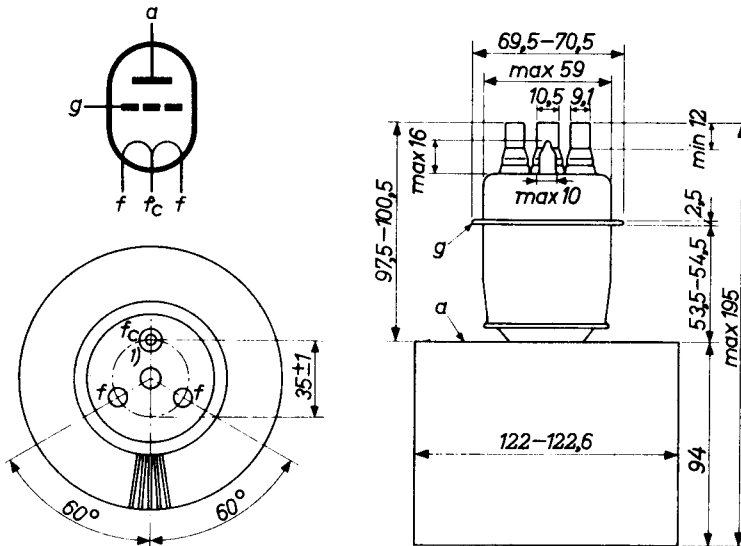


Fig. 1 Mechanical outline.

For further data and curves (except cooling curves)
please refer to type TBW7/8000

PHILIPS

Data handbook



Electronic
components
and materials

TBL7/8000

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