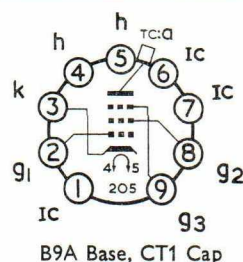


LINE OUTPUT PENTODE



GENERAL

This valve is a line output pentode designed for use as the line time base output valve in AC/DC television receivers having series connected heaters.

Heater Current	I_h	0.3	A
Heater Voltage	V_h	21.5	V

DESIGN CENTRE RATINGS

Maximum Anode Dissipation	$P_a(\max)$	7.5	W
For $P_{g2} \leq 2.0W$		5.0	W
For $P_{g2} = 4.5W$		See Rating Chart	
Maximum Anode and Screen Grid Dissipation	$P_{a+g2}(\max)$		
Maximum Screen Grid Dissipation	$P_{g2}(\max)$	4.5	W
For $P_a \leq 5.0W$		2.0	W
For $P_a = 7.5W$			
Maximum Anode Supply Voltage ($I_a=0$)	$V_a(b)\max$	550	V
Maximum Anode Voltage	$V_a(\max)$	250	V
Maximum Peak Anode Voltage, Pulse Positive	$V_a(pk)\max$	7.0*	kV
Maximum Screen Grid Supply Voltage	$V_{g2}(b)\max$	550	V
Maximum Screen Grid Voltage	$V_{g2}(\max)$	250	V
Maximum Heater to Cathode Voltage	$V_{h-k}(\max)$	200	V
Maximum Cathode Current	$I_k(\max)$	180	mA
Maximum Control Grid to Cathode Resistance	$R_{g1-k}(\max)$	0.5†	MΩ

* Maximum pulse duration 22 per cent of one cycle, with a maximum of 18 μs .

† For television line scan applications $R_{g1-k}(\max)$ may be 3.3 MΩ.

INTER-ELECTRODE CAPACITANCES§

Input	C_{in}	14.7	pF
Output	C_{out}	6.0	pF
Anode to Grid 1	C_{a-g1}	<0.8	pF
Grid 1 to Heater	C_{g1-h}	<0.2	pF
Anode to Cathode	C_{a-k}	<0.1	pF

§ Measured without an external shield.

CHARACTERISTICS

Anode Voltage	V_a	170	V
Screen Grid Voltage	V_{g2}	170	V
Control Grid Voltage	V_{g1}	-22	V
Anode Current	I_a	45	mA
Screen Grid Current	I_{g2}	2.9	mA
Mutual Conductance	g_m	6.2	mA/V
Inner Amplification Factor	μ_{g1-g2}	5.3	
Valve Anode Resistance ($\partial V_a / \partial I_a$)	r_a	10	kΩ

