

Specification MOS(A)/CV1862 Issue 3 Dated 18.6.54 To be read in conjunction with K1001	<u>SECURITY</u>	
	<u>Specification</u>	<u>Valve</u>
	UNCLASSIFIED	UNCLASSIFIED

—————> Indicates a change

TYPE OF VALVE - Beam Tetrode CATHODE - Indirectly-heated ENVELOPE - Glass - Unmetallised PROTOTYPE - 6AQ5 RETMA DESIGNATION - 6AQ5			<u>MARKING</u>		
			See K1001/4 Additional Marking - 6AQ5 (See Note D)		
<u>RATING</u>			<u>BASE</u>		
			B7G		
			<u>CONNECTIONS</u>		
			<u>Pin</u>	<u>Electrode</u>	
Heater Voltage (V) 6.3			1	Control Grid	
Heater Current (A) 0.45			2	Cathode and Beam Plates	
Max. Anode Voltage (V) 275 A			3	Heater	
Max. Screen Voltage (V) 275 A			4	Heater	
Max. Anode Dissipation (W) 13.2 A			5	Anode	
Max. Screen Dissipation (W) 2.2 A			6	Screen Grid	
Mutual Conductance (mA/V) 4.1 B			7	Control Grid	
Anode Impedance (ohms) 52000 B					
<u>CAPACITANCES (pF)</u>			<u>DIMENSIONS</u>		
C <sub>ge</sub> 7.6 C			See K1001/41/D4		
C <sub>ae</sub> 6.0 C			<u>Dimension (mm)</u> <u>Min.</u> <u>Max.</u>		
C <sub>ag</sub> 0.35 C			A	-	66.8
			B	-	19
			<u>MOUNTING POSITION</u>		
			Any		
<u>NOTES</u>					
A. Absolute maximum value.					
B. Measured at: V <sub>a</sub> = V <sub>g2</sub> = 250V; V <sub>g3</sub> = 0; V <sub>g1</sub> = -12.5V					
C. Measured without a metal screen					
D. In addition to the requirements of K1001/4, the RETMA designation shall also be clearly and indelibly marked on the valve.					

To be performed in addition to those applicable in K1001

	Test Conditions					Test	Limits		No. Tested	Note
	Vh (V)	Va (V)	Vg3 (V)	Vg2 (V)	Vg1 (V)		Min	Max		
a	6.3	-	-	-	-	Ih (A)	0.41	0.49	100% or S	
b	6.3	-	-	-	-	Ihc (μA)	-	50	100%	1
c	6.3	250	0	250	-12.5	Reverse Igl (μA)	-	2	100%	
d	6.3	250	0	250	-12.5	Ia (mA)	33	57	100%	2
e	6.3	250	0	250	-12.5	Ig2 (mA)	-	7.5	100% or S	
f	6.3	250	0	250	-12.5	gm (mA/V)	3	5.2	100%	
g	6.3	250	0	250	-12.5	Power Output (W)	3.6	-	Note 3	4
h	6.3	30	0	30	30	Emission (mA)	100	-	100%	5

NOTES

1. Vhc = + 100V DC through 100k resistor.
2. Tested first with Pin 1 at voltage Vg1 and Pin 7 disconnected, and then with Pin 7 at voltage Vg1 and Pin 1 disconnected.
- 3. Test shall be performed in accordance with K1001/AXI AQL = 2.5%  
Inspection Level = II
4. Signal Vg1 = 8.8V AC; load resistor = 5k
5. Test to be applied only for sufficient time to obtain a steady reading.