

Specification MAP/CV237/Issue 2 Dated 3.9.47. To be read in conjunction with K1001 ignoring clauses:- 5.3, 5.2, 1.2, 7.2.	<u>SECURITY</u>	
	<u>Specification</u> RESTRICTED	<u>Valve</u> RESTRICTED

→ Indicates a change

<u>TYPE OF VALVE</u> - Velocity Modulated Oscillator			<u>MARKING</u> See K1001/4		
<u>CATHODE</u>	- Indirectly heated				
<u>ENVELOPE</u>	- Copper-glass with resonator				
<u>PROTOTYPE</u>	- KR6/2				
<u>RATING</u>			<u>BASE</u> I.O.		
			Note		
Heater Voltage	(V)	4.0		Pin	
Heater Current	(A)	1.5		1	
Tuning Range	(Mc/s)	3390-- 3170		2	
Max. Resonator Dissipation	(W)	8.0		3	
Mean Resonator Voltage	(V)	250		4	
Reflector Voltage Range	(V)	80-- 150	C	5	
Grid Voltage	(V)	0		6	
Min. A.F.C. Range	(Mc/s)	20	A	7	
Reflector Voltage change for 20 Mc/s frequency change	(V)	25	B	8	
Max. permissible series resistance in target circuit	(Ω)	20000		Electrode	
Max. Resonator temperature during operation	(°C)	140		Grid	
				Heater	
				No connection	
				Resonator	
				No connection	
				No connection	
				Heater	
				Cathode	
				Reflector	
				T.C.	
				<u>TOP CAP</u>	
				See K1001/A1/5.2	
				<u>DIMENSIONS</u>	
				See drawing on page 3.	

NOTES

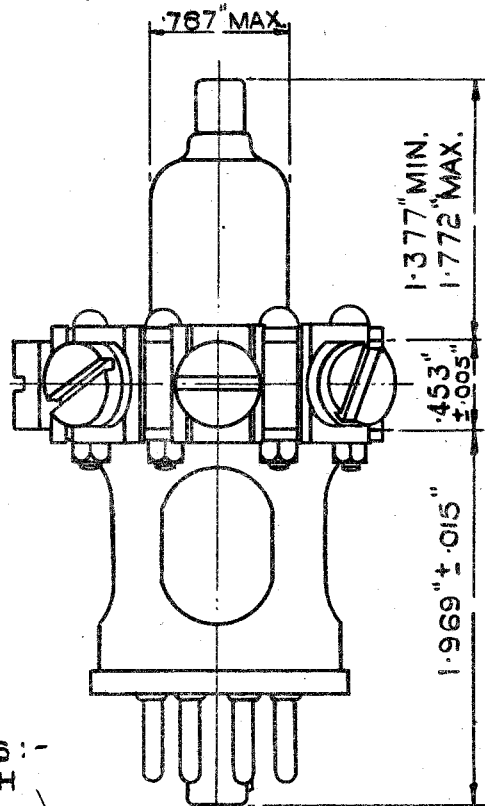
- A. The resonator shall be plated first with copper, then with silver, then with gold.
- All other external metal parts, excluding pins and top cap, to be either plated or treated with any other approved corrosion resisting finish.
- B. By variation of reflector voltage from half power to half power at any mean frequency in the range.
- C. Superimposed on optimum setting, but not necessarily disposed symmetrically about this setting.
- D. This range applies to the 50% loaded condition. With the valve unloaded the reflector voltage is about 10V. higher, and with the valve fully loaded about 5V. lower.
- E. The valve has been designed for and should be used with zero grid voltage.
- F. the tuner should not be screwed out more than 5 turns from the fully screwed in position, otherwise the retaining clips may become detached and these are difficult to replace.
- G. Mounting position-any.

To be performed in addition to those applicable in K.1001.

	Test Conditions				Test	Limits		No. Tested
	Vh	Vg	Va	Vr		Min.	Max.	
a	4.0	0	0	0	Ih (A)	1.0	1.6	100%
b	4.0	0	Adjusted	Adjusted	1. Range over which oscillation can be obtained (Mc/s) 2. Vr over range (V) 3. Va over range (V) 4. Power Output at 3220 Mc/s(mW) 5. Power Output at 3390 Mc/s(mW)	3220 to 3390 75.0 235 100 100	145 265 - -	100% 100% 100% 100% 100%
c	4.0	0	Adjusted	Initially as in test 'b'	1. Total frequency change (Mc/s) 2. Total reflector voltage change (V)	20 25	40 50	100% 100%
d	4.0	0	Adjusted	Initially as in test 'b'	1. Total frequency change (Mc/s) 2. Total reflector voltage change (V)	20 25	40 50	5% (10) 5% (10)

NOTE

- Va = Resonator Voltage
Vr = Reflector Voltage



ALTERNATIVE TO
SPRING WASHERS :-
SPRING WIRE (WITH
ENDS ANCHORED
UNDER RESONATOR
CLAMPING BOLTS)
MAY BE USED. WIRE
TO BE RUN
ALTERNATELY FROM
TOP TO BOTTOM
UNDER PLUG
WASHERS.

