

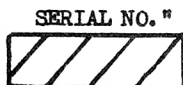
Specification MAP/CV1048/Issue 6 Dated 24.1.49 To be read in conjunction with K1001.	<table border="1"> <tr> <th colspan="2">SECURITY</th></tr> <tr> <td>Specification RESTRICTED</td><td>Valve UNCLASSIFIED</td></tr> </table>	SECURITY		Specification RESTRICTED	Valve UNCLASSIFIED
SECURITY					
Specification RESTRICTED	Valve UNCLASSIFIED				

→ Indicates a change

<u>TYPE OF VALVE</u> - Screen Grid Tetrode			<u>MARKING</u> See K1001/4. Plus additional marking (see Page 2)		
<u>CATHODE</u> - Directly heated			<u>PACKING</u> See K.1005 and Page 2 (Note 3)		
<u>ENVELOPE</u> - Glass-Metallised					
<u>PROTOTYPE</u> - 215 SG.					
<u>RATING</u>			<u>BASE</u> B4		
Filament Voltage (V)	2.0	Note	Pin	Electrode	
Filament Current (A)	0.15				
Max. Anode Voltage (V)	180		1	Screen grid	
Max. Screen Voltage (V)	80		2	Control grid	
Mutual Conductance (mA/V)	1.1		3	Filament negative and metallising	
Anode Impedance (M Ω)	0.3		4.	Filament positive	
Amplification Factor	330		T.C.	Anode	
<u>CAPACITANCES (pF)</u>			<u>TOP CAP</u> See K.1001/AI/D5.4		
Cag (max.)	0.005		<u>DIMENSIONS</u> See K1001/AI/D1		
			Dimension	Min.	Max.
			A (mm)	-	131
			B (mm)	-	45
			Diameter of valve not to exceed 37 mm. up to height of 58 mm. from bottom of pins.		

## ADDITIONAL MARKING

1. The following shall appear on the bulb:-



- The letter "W" shall be a  $\frac{1}{4}$ " character and the other letters in  $\frac{1}{8}$ " characters.
2. The valves shall be numbered, on the base or bulb, in sets of three, matched as in test 'b', each valve of a set bearing the same number which shall appear immediately in front of the factory identification code letter. Numbers shall be used progressively and shall be repeated after the 999th set.
  3. Packing

For packing of matched sets - see K.1001/7.5  
The package shall be labelled thus:-

One set of  
Three Selected Matched  
Valves Type CV1048  
Ref. No. 10CV/1048  
for use in Wavemeters.

TESTS

CV1048

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

Test Conditions					Test	Limits		No. Tested
						Min.	Max.	
a	Measured using Adaptor type 35 Ref. 10A/13331				<u>CAPACITANCES</u> (pF)	-	0.005	6 per week
	See K1001/AIII							
	Links to H.P.	Links to L.P.	Links to E					
	TC1	2	1,3,4 5,6,7 8,9,10 TC2					
	TC1	1,2,3,4	5,6,7 8,9, 10 TC2					
b	Vf	Va	Vg1	Vg2	If (A)	0.135	0.165	100% or S
	2.0	0	0	0				
c	2.0	180	0 to -1	60	gm (mA/V)	0.9	1.35	100%
d	2.0	180 to 120	0	60	Ia change (mA)	0.06	0.24	100% or S
e	2.0	180	0	60	Ia (mA)	1.75	3.25	100%
f	1.8	180	-1	60	Igl (μA)	-	1.0	100%
g	See K1001/5.8.2.				<u>MICROPHONIC NOISE TEST</u>			100%
h	<u>MATCHING</u>  The valve shall be matched in sets of three having the same capacitance to within 0.1pF. of each other.							