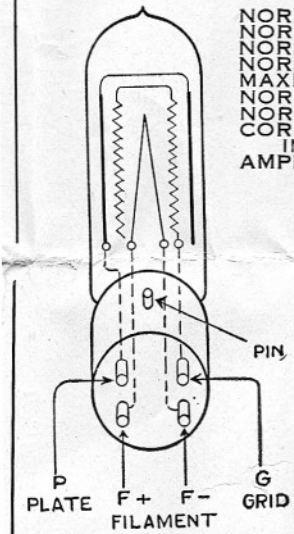
IMPORTANT READ CAREFULLY

WESTERN ELECTRIC 215-A VACUUM TUBE

USED WITH 121-A VACUUM TUBE SOCKET



NORMAL FILAMENT CURRENT	0.25 AMPERE (SEE NOTE)
NORMAL FILAMENT VOLTAGE	0.85 TO 1.10
NORMAL PLATE VOLTAGE AS DETECTOR	22.5
NORMAL PLATE VOLTAGE AS AMPLIFIER	22.5 TO 90 (SEE NOTE)
MAXIMUM SAFE PLATE VOLTAGE	100
NORMAL GRID VOLTAGE AS AMPLIFIER	0 TO −9 (SEE NOTE)
NORMAL PLATE CURRENT	0.5 TO 2.0 MILLIAMPS.
CORRESPONDING PLATE-FILAMENT IMPEDANCE	25,000 TO 18,000 OHMS
AMPLIFICATION CONSTANT	5 TO 6.5

NOTE:

WHEN USED AS AN AMPLIFIER, A NEGATIVE GRID BIAS SHOULD BE PROVIDED, DEPENDING ON THE STRENGTH OF THE RECEIVED SIGNALS AND THE VALUE OF THE PLATE VOLTAGE. IF SUFFICIENT NEGATIVE BIAS IS NOT USED WITH HIGH PLATE VOLTAGES AN EXCESSIVE ELECTRON CURRENT WILL BE DRAWN FROM THE FILAMENT WHICH WILL SHORTEN ITS LIFE. THE FOLLOWING TABLE GIVES SUITABLE GRID VOLTAGES FOR VARIOUS PLATE VOLTAGES:

PLATE VOLTAGE	GRID BIAS
22.5	0
45	−1.5 TO −3
67.5	−3 TO −6
90	−6 TO −9

FOR MAXIMUM USEFUL LIFE THE FILAMENT CURRENT SHOULD BE KEPT AS LOW AS POSSIBLE TO SECURE THE DESIRED OUTPUT. SINCE AN INCREASE OF 10% IN THE CURRENT MAY CAUSE AS MUCH AS 50% DECREASE IN THE USEFUL LIFE. WITH NORMAL CURRENT THE FILAMENT SHOULD GLOW DULL RED AND SHOULD BE BARELY LUMINOUS IN BRIGHT DAYLIGHT.

THE DISCOLORATION OF THE BULB IS DUE TO A MANUFACTURING PROCESS AND HAS NO EFFECT ON THE OPERATION OF THE TUBE