V.503
DIRECTLY HEATED MAINS OUTPUT TRIODE

RATING.
- Filament Voltage: 4.0
- Filament Current (amps.): 2.0
- Maximum Anode Volts: 450
- Mutual Conductance (mA/V): 10
- Amplification Factor: 4.25
- Anode A.C. Resistance (ohms): 425
- Maximum Quiescent Anode Dissipation per Valve (watts): 25
  *At Ea=100 v.; Eg=0.

TYPICAL OPERATION (Push-Pull).
- Anode Voltage: 400, 450
- Total Anode Current (Quiescent) (mA): 100, 110
- Grid Bias for A.C. Filament Heating: 85, 96.5
- Mutual Conductance (mA/V): 4.5, 4.5
- Optimum Anode to Anode Load (ohms): 3,700, 4,000
- R.M.S. Input Grid Volts per Valve: 60, 68
- Total Anode Current at M.U.P.O. with fixed Bias: 210, 230
- Power Output (watts): 32, 40
  *For a total harmonic content not exceeding 5 per cent.

DIMENSIONS.
- Maximum Overall Length: 156 mm.
- Maximum Diameter: 64 mm.

GENERAL.
The V.503 is a directly heated power output triode for use in public address equipment, and is intended for use in Class AB operation. The valve is fitted with a standard 4-pin base, the connexions to which are given overleaf.

APPLICATION.
The valve should only be used with individual bias adjustment from a separate source to give the correct quiescent feed current. The grid-cathode resistance should be kept low, and in any case should not exceed 50,000 ohms. The valve is not intended for "positive drive" conditions of operation.
BASING.

Pin No. 1. Anode.
2. Grid.
3. Filament.
4. Filament.

Viewed from the free end of the base.

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Mazda Radio Valves are manufactured in Great Britain for the British Thomson-Houston Co., Ltd., London and Rugby.