

R. F. G I L S O N L T D.

St. GEORGE'S WORKS, 11a, St. GEORGE'S ROAD,

WIMBLEDON, LONDON, S.W.19.

TEL: WIMbledon 5695

WO.1796. 7k ohms A-A

Primary Inductance 90H
Primary D.C. Resistance 240 + 240 ohms.
Leakage L P-S 12mH
Leakage L $\frac{1}{2}$ P- $\frac{1}{2}$ P 9mH
Secs: 3.7 ohms, 8 ohms and 15 ohms.

WO.1796A. 9k ohms A-A

Primary Inductance 100H
Primary D.C. Resistance 265 + 265 ohms
Leakage L P-S 21mH
Leakage L $\frac{1}{2}$ P- $\frac{1}{2}$ P 14mH
Secs: 3.7 ohms, 8 ohms and 15 ohms.

Resonance frequency above 80 kc/s.

Price: £2. 17. 6d. Style WES.
Price: £3. 4. 6d. Style SUM.

Fixing Centres: $1\frac{7}{8}$ " x $2\frac{1}{8}$ "
Fixing Centres: 2" x $2\frac{1}{2}$ "

The distortion due to non linearity of valve characteristics in class AB operation is largely balanced out in push pull operation at frequencies up to that at which the Leakage L $\frac{1}{2}$ P- $\frac{1}{2}$ P of the transformer becomes a significant impedance relative to the anode to anode load. This frequency is well outside the audio range in these transformers as will be seen from the above specification

9mH -	1400 ohms)
14mH -	2200 ohms)

i.e. less than $\frac{1}{4}$ of RL at 25 kc/s. The residual distortion, which is inherent in any valve amplifier is of a low order, generally not exceeding, in a well designed circuit, a few per cent. It is known that this is reduced by negative feedback taken from the secondary of the transformer in proportion to the feedback ratio. This feedback ratio can only be maintained over the frequency range where phase shift in the output transformer is of a low order. The high Lp of these transformers ensures low phase shift at low frequencies and the high resonance frequency ensures low phase shift at high audio frequencies.

In these, as in all Gilson U.L. transformers, due care has been taken to ensure that the screen and anode sections of the windings are correctly disposed for satisfactory distributed load operation of the output valves.

The foregoing explanation is in itself evidence of advanced high performance design. This is backed up by full quality control during all stages of manufacture, an example of which is the careful checking for accuracy of all coils, on a precision ratiometer, before they are allowed to leave the winding shop.
