


1650F

"CLASSIC" PUSH-PULL TUBE TYPE ULTRA-LINEAR OUTPUT TRANSFORMERS

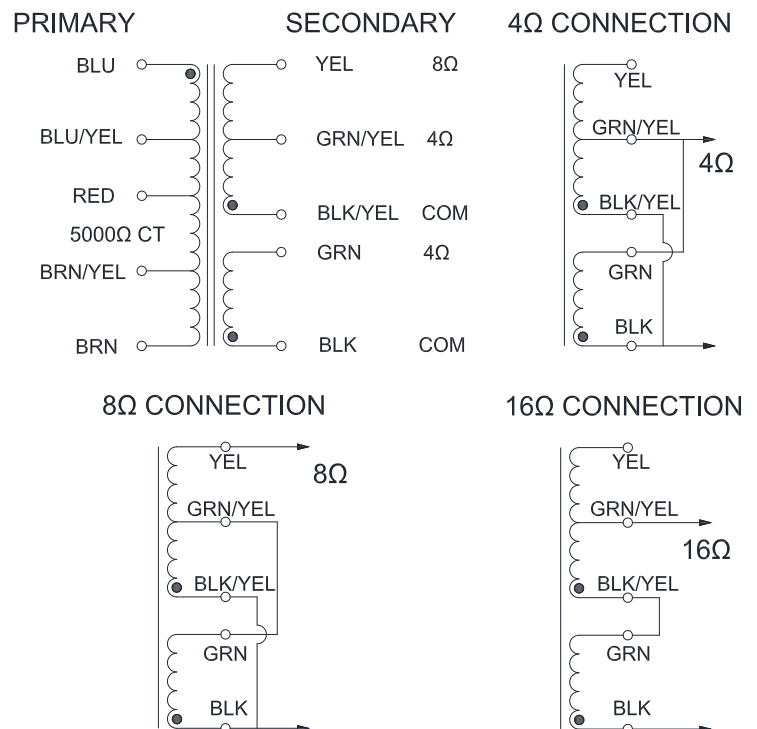
- Designed for push-pull tube output circuits.
- Enclosed (shielded), 4 slot, above chassis Type "X" mounting.
- Frequency response 30 Hz. to 30 KHz. at full rated power (+/- 1 db max. - ref. 1 KHz) minimum.
- Insulated flexible leads 8" min.
- Manufactured with plastic coil forms for coil support and insulation.
- Typical applications - Push-Pull: triode, Ultra-Linear pentode, pentode and tetrode connected audio output.
- Due to the unique interleaving of the windings BOTH secondary windings must be engaged to meet specifications (see hook-up diagrams below).
- Suggested tube types: 6L6GC, 6V6, 807, 5881, EL34

ELECTRICAL SPECIFICATIONS		
Characteristic	Typical	
Input Impedance	7600 Ohms	
Output Impedance	4, 8 & 16 Ohms	
Output Power	25 Watts	
DCR		
Primary Brown-Blue	210.0 Ohms	
Secondary Black-Green	0.220 Ohm	
Secondary Black/Yel-Yel	0.270 Ohm	
Inductance Impedance	@ 60Hz, 10.0V OC	
Primary Brown-Red	285H	124KOhm
Leakage Inductance	@ 60Hz, 10.0V SC	
Primary Brown-Red	10.40mH	
Dielectric Strength	2000Vrms	
Temperature Range	-40 To 105°C	

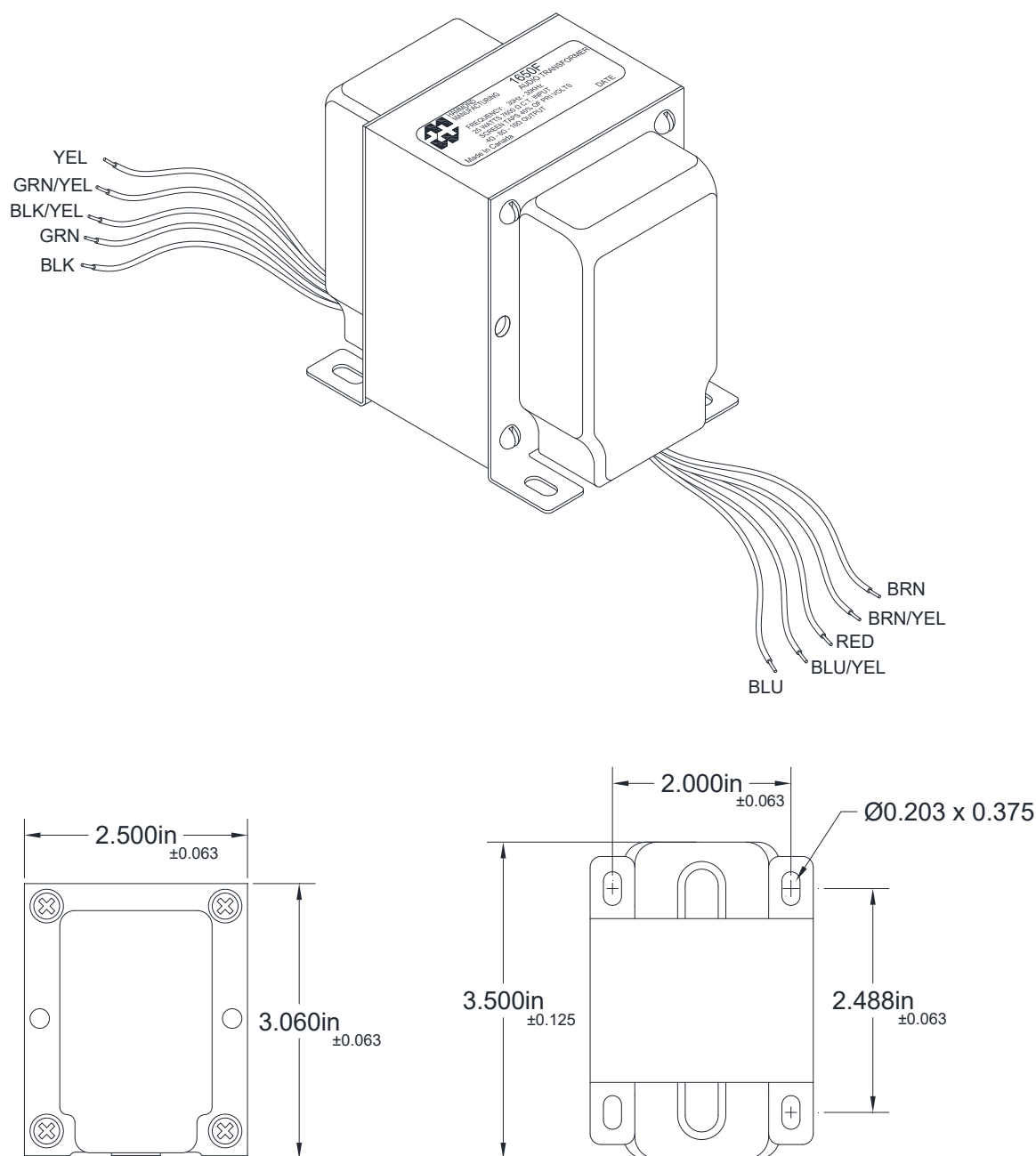
LABEL:

	1650F AUDIO TRANSFORMER
	FREQUENCY 30 Hz - 30 KHz 25 WATTS 7600Ω C.T. INPUT SCREEN TAPS 40% OF PRI VOLTS 4Ω - 8Ω - 16Ω OUTPUT
Made In Canada	DATE

SCHEMATIC



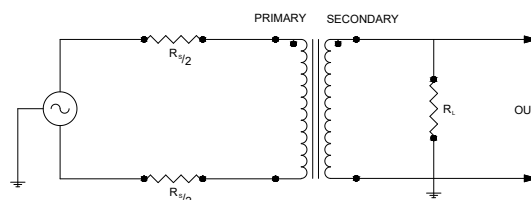
Note: The above examples of possible combinations are to help you narrow down the choices of transformers for your favorite tube types. How you operate the tubes (push-pull, push-pull parallel, ultra-linear, class, B+, bias, operating points, etc.) will change optimum plate to plate load impedance. Only a few of the most popular tubes are shown. As more tubes become available we will add them to the list. A tube manual or tube manufacturer's technical data sheets should be consulted first, before making a decision on a proper output transformer.

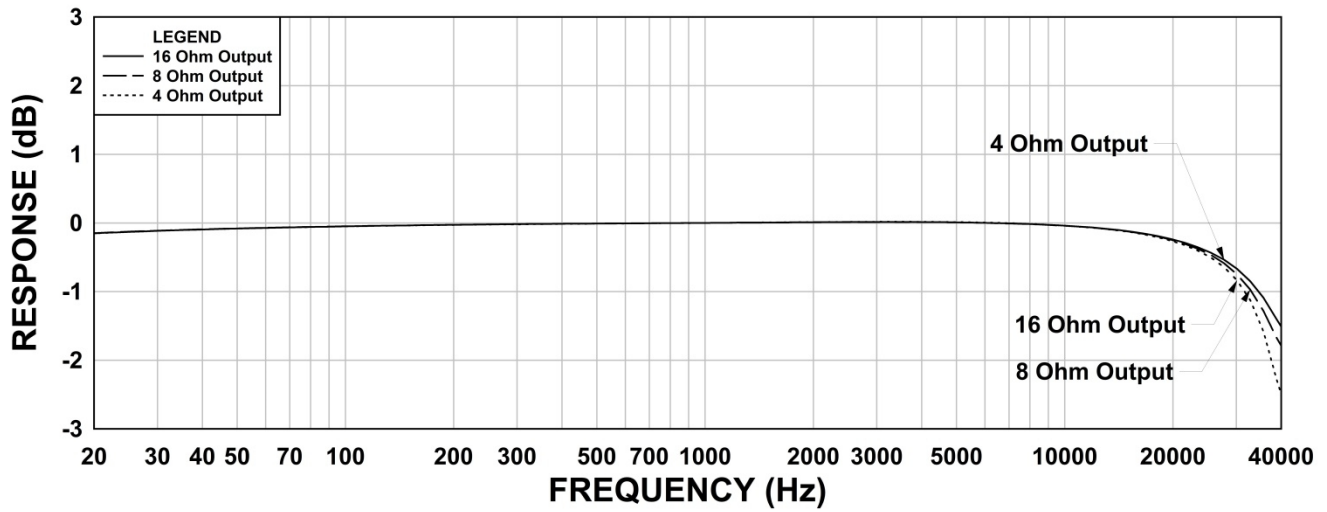
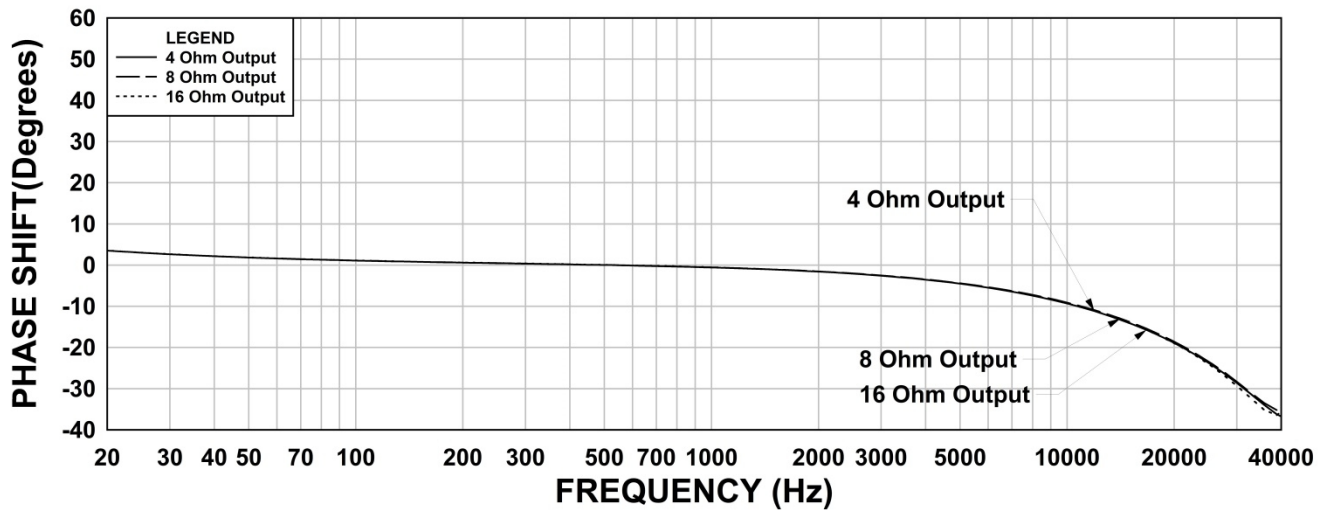
DIMENSIONAL DETAILS:**TEST CONDITIONS**

Measurement Instruments:
 dScope Series III Audio Analyzer
 Wayne Kerr 3255B with a 3265B Inductance Analyzer
 HP 4192a LF Impedance Analyzer
 Keithley 2010 DVM

* All graphs input level 27dBu @1.0KHz reference.

**The results are typical and are subject to normal manufacturing and electrical tolerances.

TYPICAL TEST CIRCUIT

1650F Frequency Response RS = 7600 Ohms**1650F Phase Shift RS = 7600 Ohms****1650F THD+N RS = 7600 Ohms**