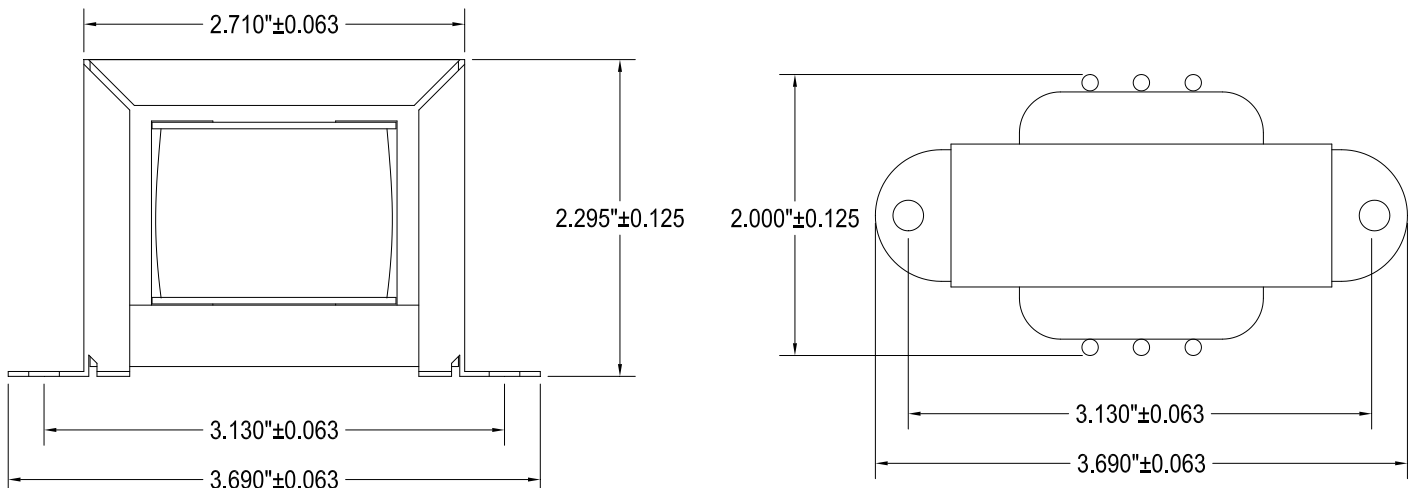
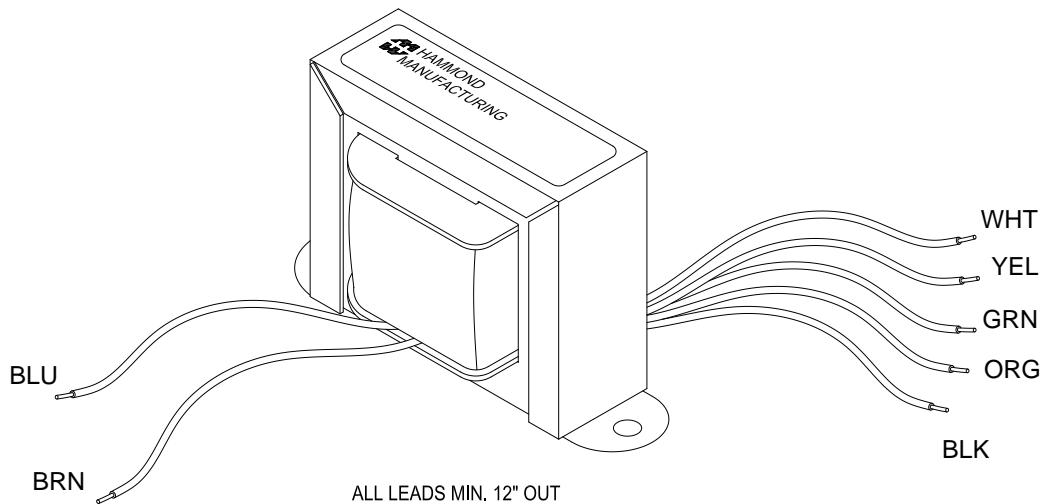




## 125CSE

### UNIVERSAL SINGLE ENDED TUBE OUTPUT TRANSFORMER

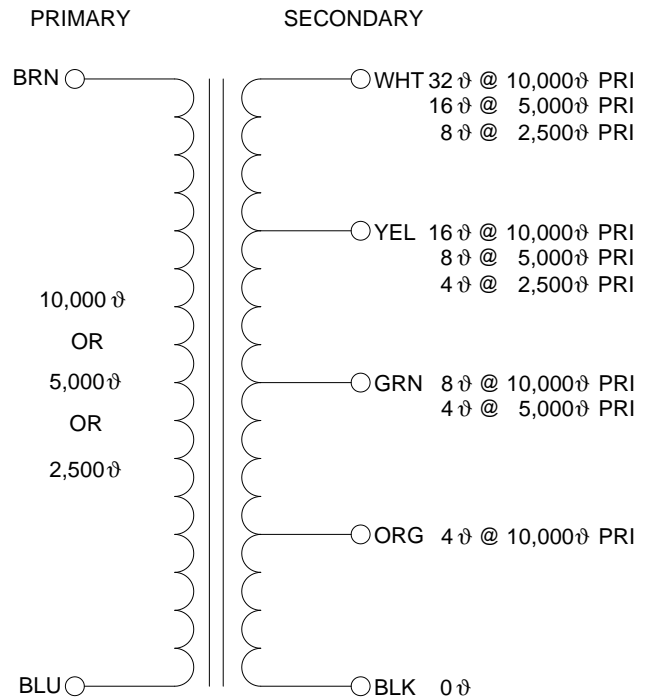
- ) Designed for general purpose or replacement use (not Hi-Fi), in single ended, tube output circuits.
- ) Frequency response: 100 Hz. - 15 KHz at full rated power (see graphs for detailed response).
- ) For full frequency response (20 Hz. to 20 KHz.) - see our 1627-1642 Series.
- ) For push-pull output use, see our 125 Series.
- ) Open style with minimum 12" long primary & secondary leads.
- ) All sizes use butt stacked cores (using 29M6 steel) with an air gap, to reduce D.C. core saturation.
- ) Primary impedance range from 2,500 to 10,000 Ohms.
- ) Secondary impedance range from 4 to 32 Ohms.



**ELECTRICAL SPECIFICATIONS\*\***

<u>Characteristic</u>	<u>Typical</u>
Input Impedance	2500 - 10000 $\varnothing$
Output Impedance	4/8/16/32 $\varnothing$
Output Power	8 Watts
Max. DC Bias	60 mA
<b>Primary - DCR</b>	
Blue - Brown	200 $\varnothing$
<b>Secondary DCR</b>	
Black - Orange	232 m $\varnothing$
Black - Green	312 m $\varnothing$
Black - Yellow	428 m $\varnothing$
Black - White	595 m $\varnothing$
<b>Inductance</b> @ 1.0 kHz, 1.0 V OC	
Primary - Blue - Brown	9.28 Hy
Sec - Black - Orange	5.00 mH
Sec - Black - Green	10.88 mH
Sec - Black - Yellow	20.40 mH
Sec - Black - White	43.25 mH
<b>Impedance</b> @ 1.0 kHz, 1.0 V OC	
Primary - Blue - Brown	57.50 K $\varnothing$
Sec - Black - Orange	32.44 $\varnothing$
Sec - Black - Green	66.33 $\varnothing$
Sec - Black - Yellow	132.0 $\varnothing$
Sec - Black - White	263.5 $\varnothing$
Frequency Response	See graphs for specific response, Typ. $\left\{ \begin{array}{l} 1.0\text{db from} \\ 100\text{Hz to } 15\text{KHz} \end{array} \right.$
Dielectric Strength	1500Vrms
Temperature Range	-40 To 105°C

**Schematic and Hook Up Data**



**HAMMOND MANUFACTURING** **125CSE**

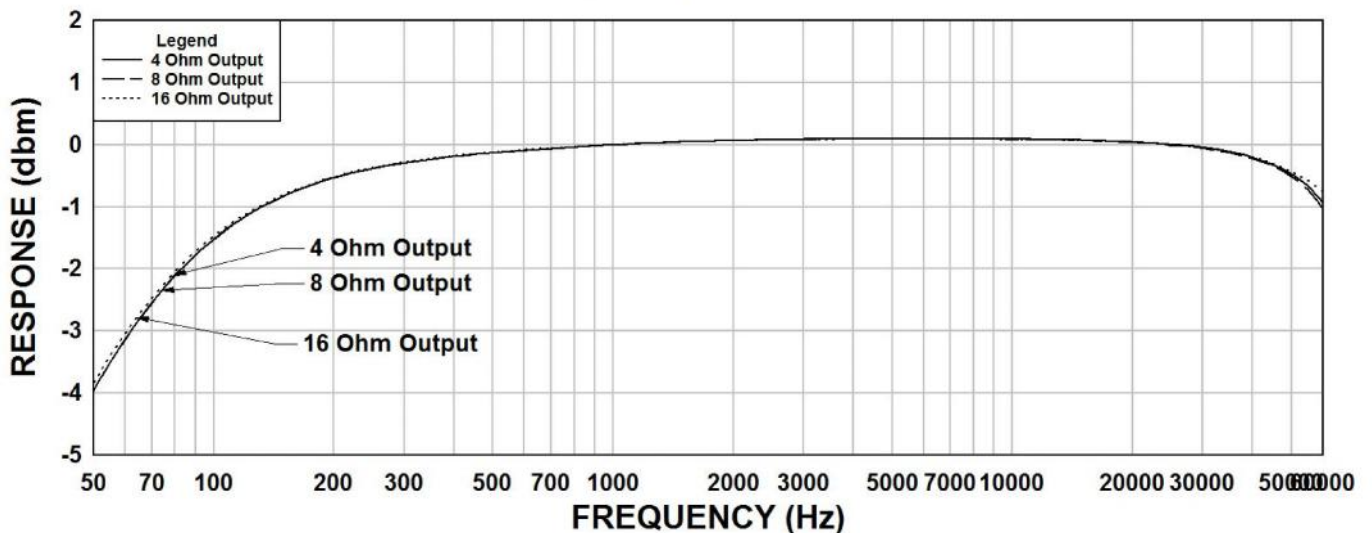
**SINGLE ENDED AUDIO 8W 60mA DC**

PRI: 10,000; 5,000; 2,500 OHM

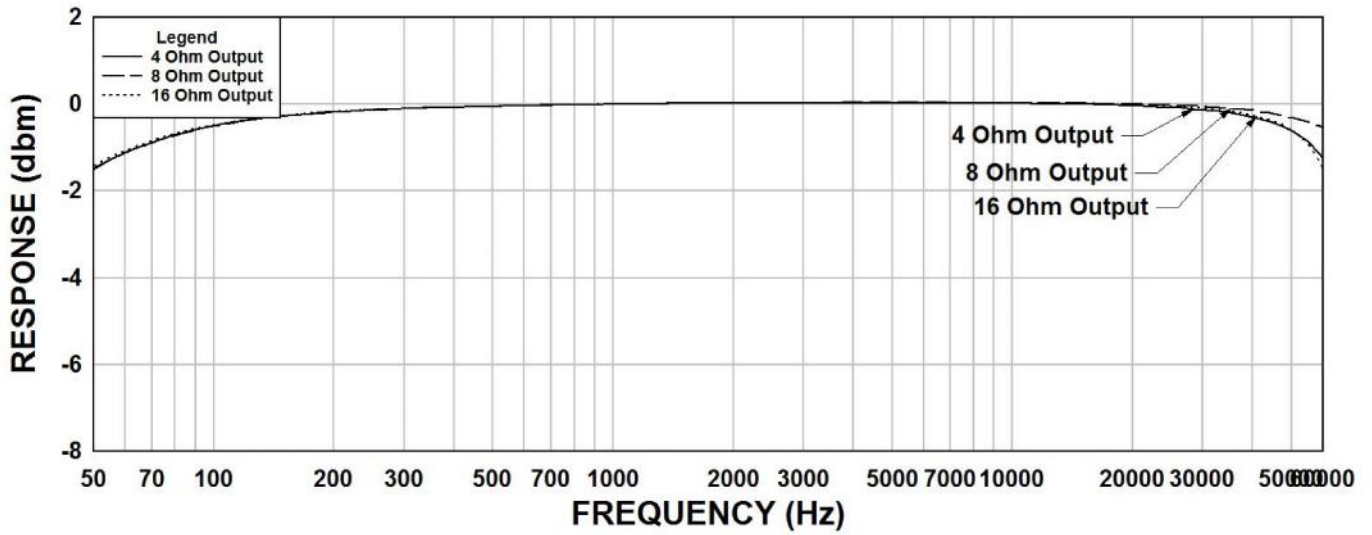
SEC: 4, 8, 16, 32 OHM

DATE CODE MADE IN CANADA

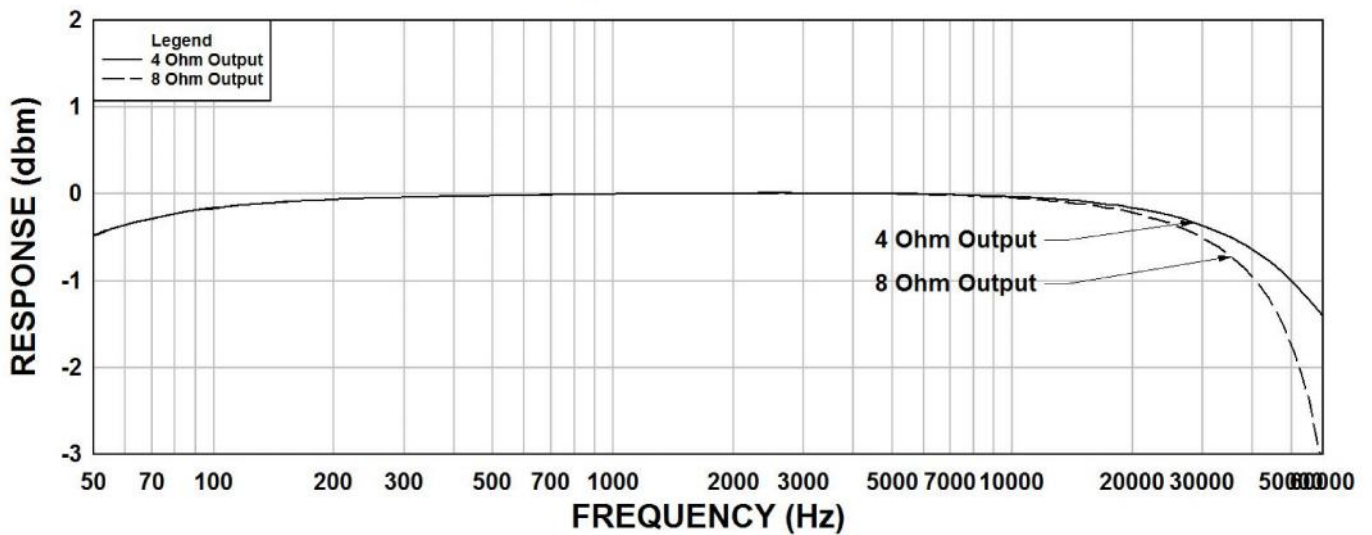
**125CSE Frequency Response Rs=10K $\Omega$**



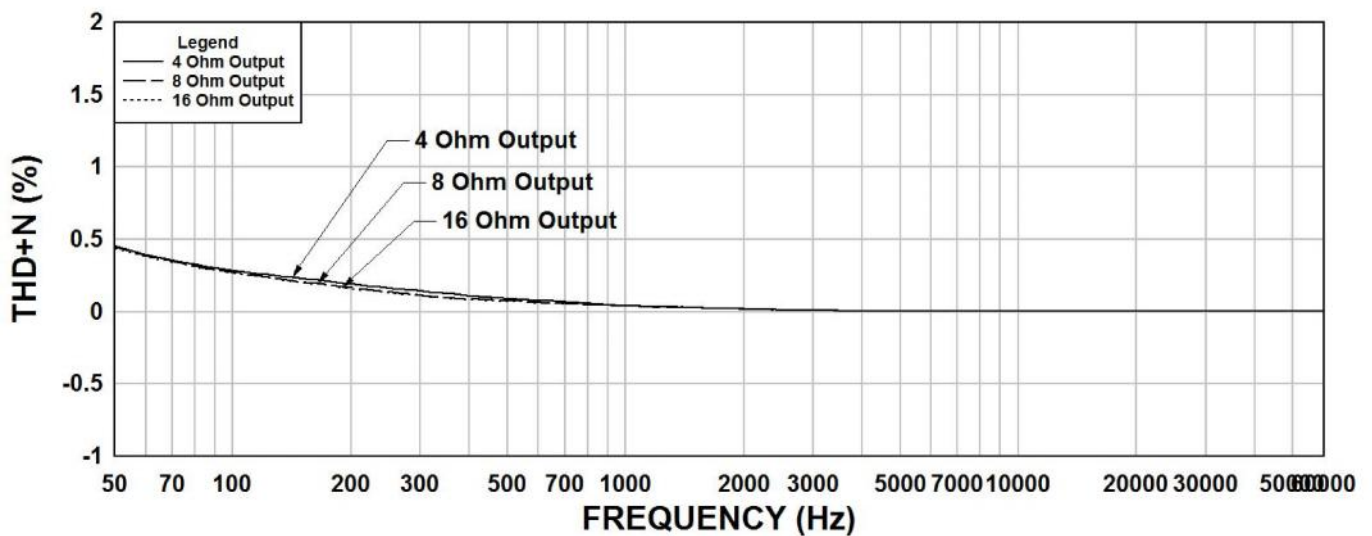
### 125 CSE Frequency Response $R_s=5K\Omega$



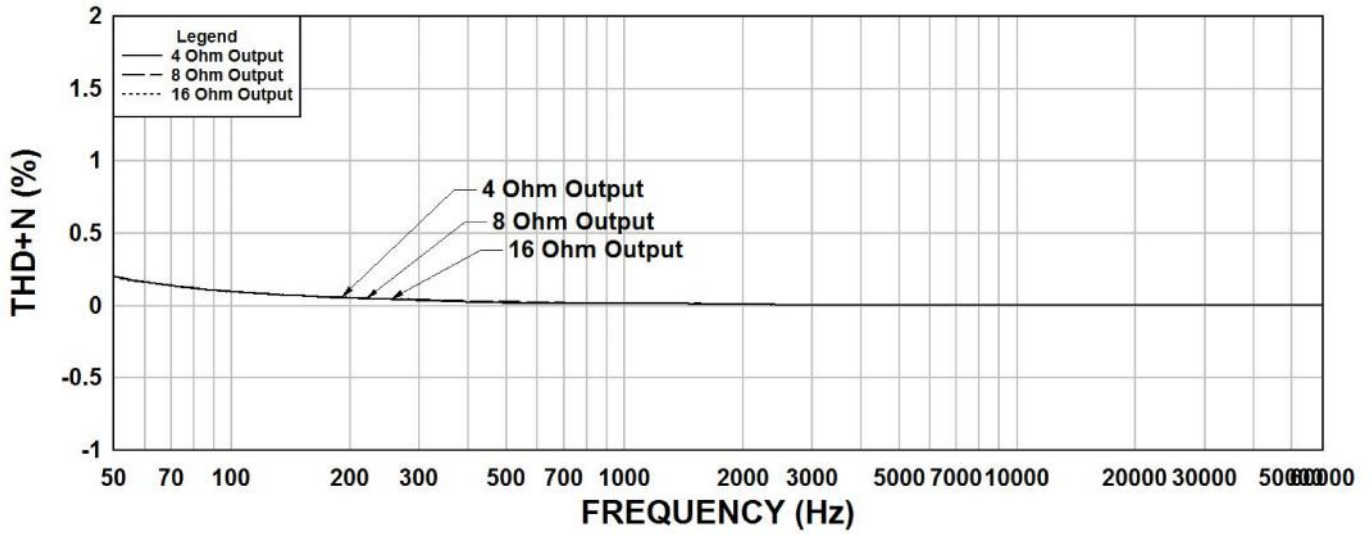
### 125CSE Frequency Response $R_s=2500\Omega$



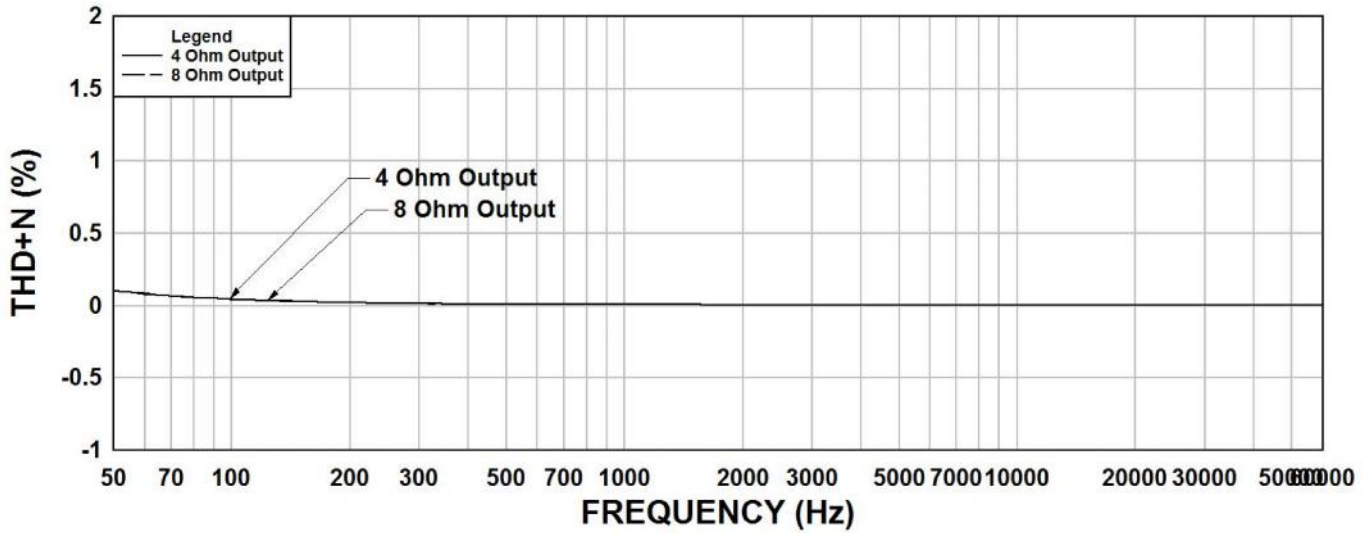
### 125CSE THD+N $R_s=10K\Omega$



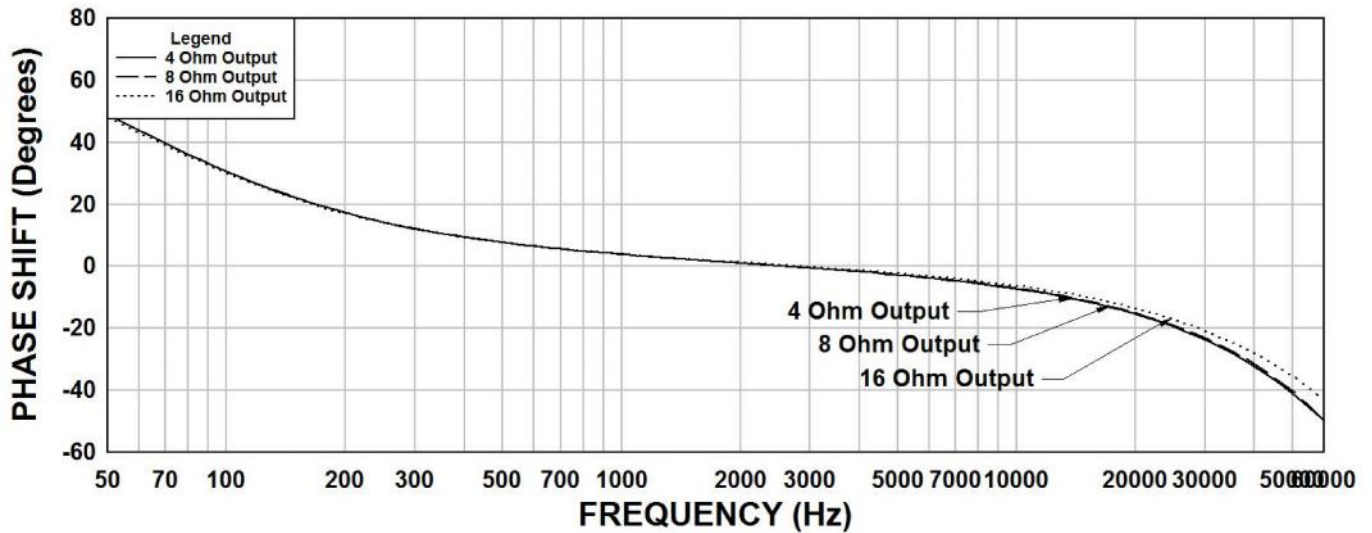
**125CSE THD+N Rs=5KΩ**



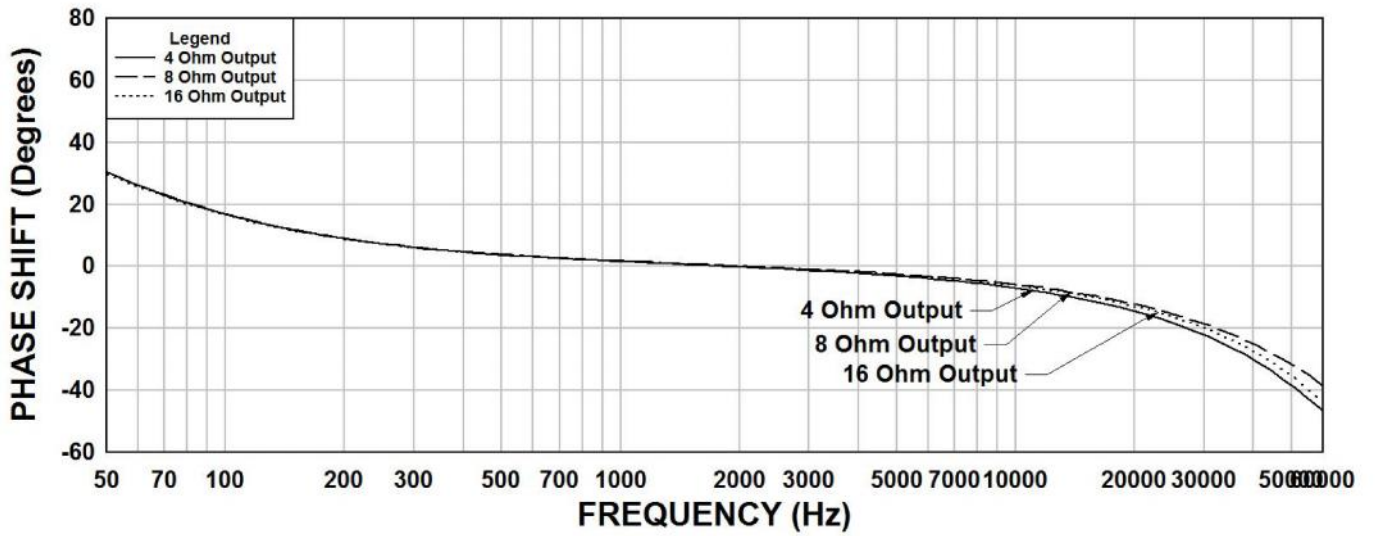
**125CSE THD+N Rs=2500Ω**



**125CSE Phase Shift Rs=10KΩ**

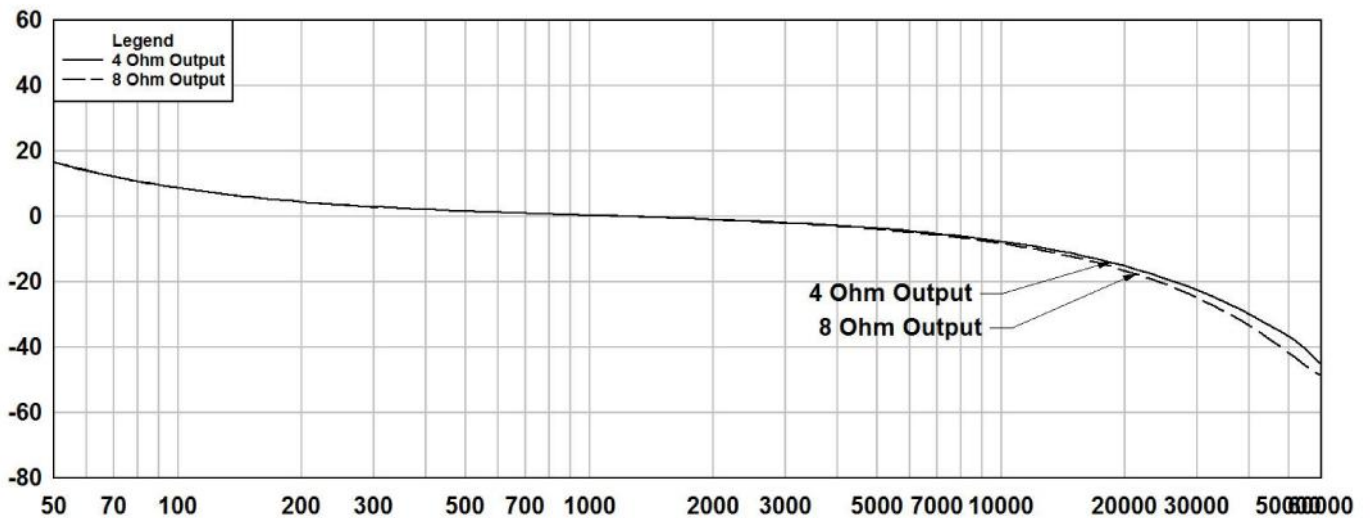


### 125CSE Phase Shift $R_s=5K\Omega$

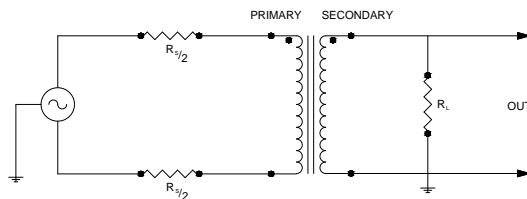


### Phase Shift 2500.xlsx

Phase Shift 2500 to 4 ohms



#### TYPICAL TEST CIRCUIT



Measurement instruments  
 Hp4192a impedance analyzer  
 Hp3456a DVM  
 Keithley 2002 DVM  
 D scope series iii audio analyzer  
 Wayne Kerr 3255B with a 3265B

\* All graphs input level 20dbu.

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

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