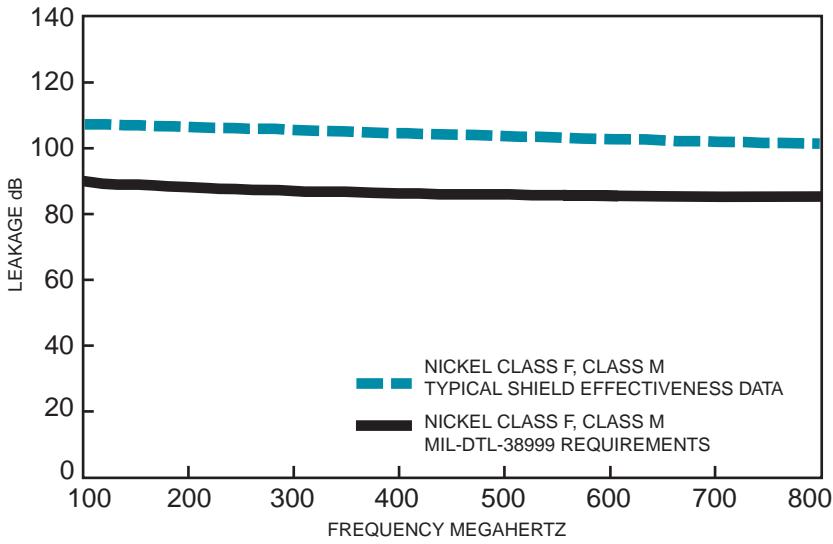
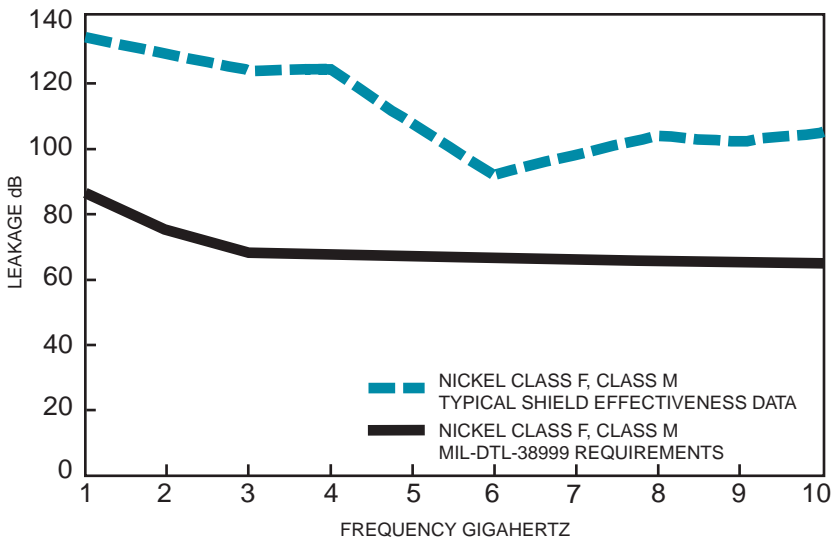


# Tri-Start test data

**TRI-START, SERIES III**  
**TYPICAL SHIELDING EFFECTIVENESS TEST DATA**  
EMI/EMP SHIELDING EFFECTIVENESS dB  
TESTING BY TRIAXIAL METHOD



**TRI-START, SERIES III**  
**TYPICAL SHIELDING EFFECTIVENESS TEST DATA**  
EMI/EMP SHIELDING EFFECTIVENESS dB  
TESTING BY MODE STIRRING METHOD



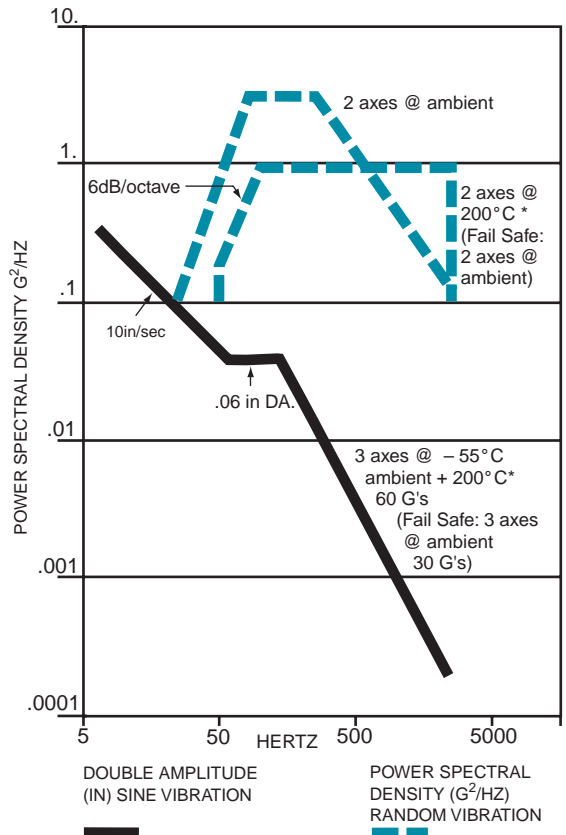
Amphenol® Tri-Start connectors provide EMI/EMP shielding capability which exceeds MIL-DTL-38999 Series III requirements.

The TV and CTV Series III connector with standard solid metal to metal coupling, EMI grounding fingers and conductive finishes has proven to be the ultimate in EMI/EMP shielding effectiveness. The charts illustrate shielding effectiveness data which is typical of Tri-Start connectors tested with the nickel finish (Class F-metal, Class M-composite) over a wide frequency range.

The vibration capability of the Tri-Start Series is shown in the chart below. This illustrates the most severe vibration envelope of any qualified connector available today.

These capabilities along with a 200°C temperature rating and superior moisture sealing protection provide the user with a connector that can withstand the most rigorous application.

**TRI-START**  
**VIBRATION CRITERIA**



Test data beyond 2GHz is subject to equipment variation.

\* Dependant on shell finish

NOTE: for test data information on the new Clutch-Lok Tri-Start, high vibration connectors, consult Amphenol Aerospace.

# Tri-Start specifications

## CONTACT RATING

Contact Size	Test Current (Amps)		Maximum Millivolt Drop Crimp*	Maximum Millivolt Drop Hermetic*
	Crimp	Hermetic		
22D	5	3	73	85
20	7.5	5	55	60
16	13	10	49	85
12	23	17	42	85
10 (Power)	33	NA	33	NA
8 (Power)	46	NA	26	NA
4	80	NA	23	NA
0	150	NA	21	NA

\* When using silver plated wire.

Contact Size	Crimp Well Data		Hermetic Data	
	Well Diameter	Nominal Well Depth	Well Diameter	Min. Well Depth
22D	.0345 ± .0010	.141	.036 +.004 -.000	.094
20	.047 ± .001	.209	.044 +.004 -.000	.125
16	.067 ± .001	.209	.078 +.004 -.002	.141
12	.100 ± .002	.209	.116 +.004 -.002	.141
10 (Power)	.137 ± .002	.355	NA	NA
8	.181 ± .002	.490	NA	NA
4	.281 ± .002	.490	NA	NA
0	.453 ± .002	.585	NA	NA

## SERVICE RATING

Service Rating	Suggested Oper. Voltage (Sea Level)		Test Voltage (Sea Level)	Test Voltage 50,000 Ft.	Test Voltage 70,000 Ft.	Test Voltage 110,000 Ft.
	AC (RMS)	DC				
M	400	550	1300 VRMS	550 VRMS	350 VRMS	200 VRMS
N	300	450	1000 VRMS	400 VRMS	260 VRMS	200 VRMS
I	600	850	1800 VRMS	600 VRMS	400 VRMS	200 VRMS
II	900	1250	2300 VRMS	800 VRMS	500 VRMS	200 VRMS

Please note that the establishment of electrical safety factors is left entirely in the designer's hands, since he is in the best position to know what peak voltage, switching surges, transients, etc. can be expected in a particular circuit.

## FINISH DATA

Non-Hermetic Shell Components		
Finish	Service Class	
	Military	Proprietary
Anodic Coating (Non-Conductive)	C	RX**
Electroless Nickel	F (Metal)	RF
	M (Composite)	
Olive Drab Cadmium Plate Nickel Base	W (Metal)	RW
	J (Composite)	
Stainless Steel with Nickel Plate	S	RS
Stainless Steel	K	RK

\*\* Add Suffix (005) to part number.

Hermetic Shell Components		
Material / Finish	Service Class	
	Military	Proprietary
Stainless Steel	Y	Y
Stainless Steel with Nickel Plate	N	YN