

MIL-STAR™

GS22759 AEROSPACE-GRADE WIRE



MIL-STAR High-Performance Hookup Wire and Cable Glenair has branded its GS22759 high-temperature aerospace-grade wire and GS27500 multi-conductor cables for aerospace applications, under the MIL-STAR brand. These discrete wires and cables are built in accordance with SAE specifications with a "GS" leadoff in place of both the base specification and the part number for individual slash sheets.

MIL-STAR is a high-performance, better-than-QPL discrete wire and cable specification unique to Glenair. The brand covers both protected (inside-the-box) hookup wire, high-durability open-loom wiring, and multi-conductor shielded and jacketed M27500-type cable.

M22759 single-ended hook-up wires are the industry standard for inside-the-box mil-aero environments and are optimized for size, weight, high-temperature resistance, and low flame propagation. The hundred-plus variants of AS22759 are organized by conductor material and plating, insulation type, wire gage, and single- or dual-wall.

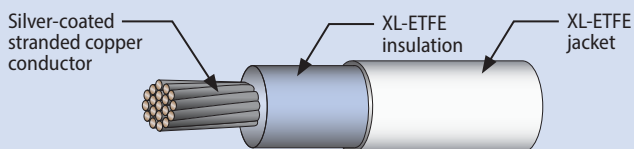
MIL-STAR™ 22759 OPEN WIRE LOOM AND (PROTECTED) HOOKUP WIRES

AS22759 high-temp single-conductor 600V military and aerospace-grade wire, standard and crosslinked, lightweight single-wall and rugged dual-wall configurations.

CROSSLINKED (XL) ETFE

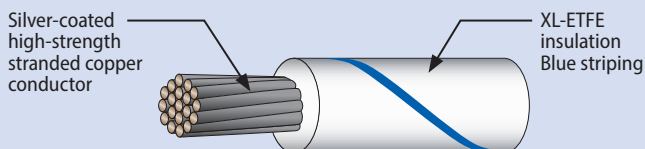
GS22759-43

- Silver-coated copper core, std. weight dual wall XL-ETFE insulation/jacket. High-temp, radiation- and fire-resistant.



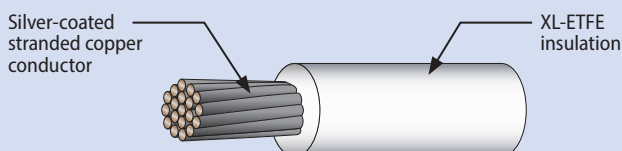
GS22759-33

- Silver-coated copper core with XL-ETFE insulation (blue striping). High-temp, low flammability.



GS22759-47

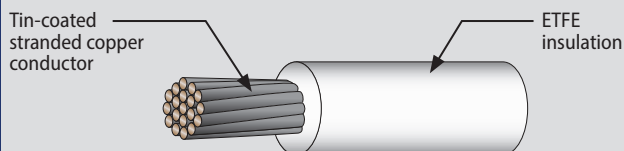
- Silver-coated high-strength copper core, XL-ETFE insulation. Low-fluoride, ideal for space applications.



CONVENTIONAL FLUOROPOLYMER (ETFE, PTFE)

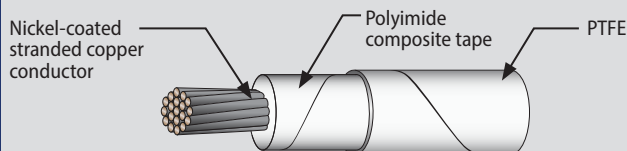
GS22759-16

- Tin-coated copper core with extruded ETFE insulation. Radiation-resistant and temperature tolerant to 150°C.



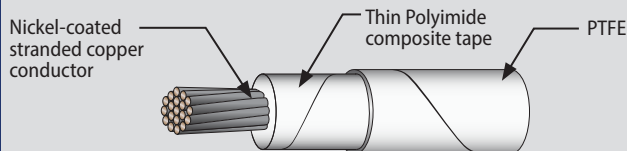
GS22759-87 (Standard weight)

- Nickel-coated copper, PTFE/Polyimide tape-wrapped. High-temp (260°C), fire and chemical-resistant, low smoke.



GS22759-92 (Light weight)

- Nickel-coated copper, PTFE/thin-wall Polyimide tape-wrapped. High-temp (260°C), fire and chemical-resistant, low smoke.



MIL-STAR Hookup Wire for Aerospace-Grade Harness Assemblies



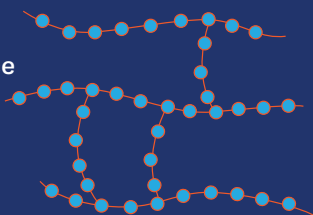
IAW MS22759 batch testing and documentation

MIL-STAR™ ORDER NUMBER	CONDUCTOR	PLATING	INSULATION	INSULATION WEIGHT	AVAILABLE WIRE SIZES	TEMPERATURE RATING
SAE AS22759/16-19, ETFE						
GS22759-16	Copper	Tin	ETFE	Medium	24, 22, 20, 18, 16, 14, 12, 10, 8	150°C
GS22759-17	High-Strength Copper Alloy	Silver	ETFE	Medium	26, 24, 22, 20	150°C
GS22759-18	Copper	Tin	ETFE	Light	24, 22, 20, 18, 16, 14, 12, 10	150°C
GS22759-19	High-Strength Copper Alloy	Silver	ETFE	Light	26, 24, 22, 20	150°C
SAE AS22759/32-35, XL-ETFE						
GS22759-32	Copper	Tin	XL-ETFE	Light	30, 28, 26, 24, 22, 20, 18, 16, 14, 12	150°C
GS22759-33	High-Strength Copper Alloy	Silver	XL-ETFE	Light	30, 28, 26, 24, 22, 20	200°C
GS22759-34	Copper	Tin	XL-ETFE	Normal (Dual Wall)	24, 22, 20, 18, 16, 14, 12, 10, 8	150°C
GS22759-35	High-Strength Copper Alloy	Silver	XL-ETFE	Normal (Dual Wall)	26, 24, 22, 20	200°C
SAE AS22759/41-47, XL-ETFE						
GS22759-41	Copper	Nickel	XL-ETFE	Normal (Dual Wall)	26, 24, 22, 20, 18, 16, 14, 12, 10, 8	200°C
GS22759-42	High-Strength Copper Alloy	Nickel	XL-ETFE	Normal (Dual Wall)	26, 24, 22, 20	200°C
GS22759-43	Copper	Silver	XL-ETFE	Normal (Dual Wall)	26, 24, 22, 20, 18, 16, 14, 12, 10, 8	200°C
GS22759-44	Copper	Silver	XL-ETFE	Light	28, 26, 24, 22, 20, 18, 16, 14, 12	200°C
GS22759-45	Copper	Nickel	XL-ETFE	Light	28, 26, 24, 22, 20, 18, 16, 14, 12	200°C
GS22759-46	High-Strength Copper Alloy	Nickel	XL-ETFE	Light	28, 26, 24, 22, 20	200°C
GS22759-47	High-Strength Copper Alloy	Silver	XL-ETFE Low-fluoride	Light	28, 26, 24, 22, 20	200°C

CROSS-LINKED ETFE INSULATION

Cross-linked insulation (XL) and standard insulation are two types of dielectric materials used in wire and cable manufacturing. Cross-linking provides the following advantages:

- Improved thermal stability
- Chemical / solvent resistance
- Increased mechanical strength
- Laser-markable
- Longer service life



RED PLAGUE MITIGATION

Glenair MIL-STAR™ high-temperature hookup wire and cable may be supplied in special 80 microinch silver-plated copper Mod Code configurations (1304A or 1304B) to combat Red Plague corrosion, a pernicious form of copper oxidation that results in the formation of red cuprous oxide (Cu_2O) and black cupric oxide (CuO). Red Plague corrosion can continue indefinitely, consuming conductor material and causing electrical system failures.

Mod Code 1304B
RED PLAGUE MITIGATION