

# Category 5e Low-Smoke, Zero-Halogen Shielded Cable

## 4 Pair, 24 AWG, ANSI/TIA 568-C.2 Patch

**Product Construction:**

**Conductor:**

- 4 pair, 24 AWG 7/32 tinned copper

**Insulation:**

- Polyolefin

**Pairs:**

- Two conductors twisted together (each pair twisted with a different lay length)
- Color code:
  - P1: White/Blue, Blue
  - P2: White/Orange, Orange
  - P3: White/Green, Green
  - P4: White/Brown, Brown

**Binding:**

- Low-Smoke, Zero-Halogen (LSZH) flame-retardant tape

**Inner Shield:**

- Aluminum/polyester tape, 100% coverage

**Outer Shield:**

- Tinned copper braid, 60% coverage

**Jacket:**

- Low-Smoke, Zero-Halogen irradiated Cross-linked Polyolefin (LSZH XLPO), Gray

**Print** (Including but not limited to):

- GENERAL CABLE® – 443230--4PR/24 AWG SF/UTP CAT 5E PATCH 75°C LSZH (UL) CMG-LS E105765-W – ROHS AND NFPA 130 COMPLIANT YYMMDD XXXXT

**Applications:**

- Category 5e SF/UTP construction is suitable for use in on-vehicle transit applications with flexible stranding, overall shield and Low-Smoke, Zero-Halogen (LSZH) cross-linked jacket

**Features:**

- Meets Category 5e electricals (tested to 200 MHz)
- Overall metal braid and AL/Mylar tape provide protection from EMI noise
- Low-Smoke, Zero-Halogen (LSZH) jacket is environmentally friendly
- Low-Smoke, Zero-Halogen (LSZH) jacket reduces the amount of toxic and corrosive gases emitted during combustion, providing a safer environment for personnel and equipment during the hazards of fire

**Compliances:**

**Industry:**

- (UL) CMG-LS Listed E105765
- (UL) verified ANSI/TIA 568-C.2 Patch
- ISO/IEC 11801 Ed. 2.2
- Oil-Resistant per EN 50306-4

**Flame Test:**

- UL 1685 FT4 W/IEEE 1202 Limited Smoke
- IEC 60332-3-24
- ASTM E662 Smoke Emission
- BSS 7239 Combustion Toxicity
- IEC 61156-1

**Other:**

- NFPA-130 (2017) On-Vehicle
- RoHS and REACH Compliant



**TRANSIT, 4 PAIR/24 AWG, SHIELDED FOIL TWISTED PAIR (SF/UTP) CAT 5e, LOW-SMOKE, ZERO-HALOGEN**

CATALOG NUMBER	# OF PAIRS	CONDUCTOR SIZE		NOM. COND. DIAMETER		NOM. INS. O.D.		NOM. JACKET THICKNESS		NOM. CABLE DIAMETER		NET CABLE WEIGHT	
		AWG	STRAND.	INCHES	mm	INCHES	mm	INCHES	mm	INCHES	mm	LBS/1000'	kg/km
443230	4	24	7/32	0.024	0.61	0.043	1.1	0.025	0.64	0.275	7.0	43.1	64.1

**ELECTRICAL CHARACTERISTICS**

FREQUENCY (MHz)	INSERTION LOSS (dB/100 m)	NEXT (dB)	ACRF (dB)	RL (dB)
	max.	min.	min.	min.
1	2.4	65.3	63.8	20.0
4	4.9	56.3	51.8	23.0
10	7.8	50.3	43.8	25.0
16	9.9	47.2	39.7	25.0
20	11.1	45.8	37.8	25.0
25	12.5	44.3	35.8	24.2
31.25	14.1	42.9	33.9	23.3
62.5	20.4	38.4	27.9	20.7
100	26.4	35.3	23.8	19.0
150	33.1	32.7	20.3	17.5
200	38.9	30.8	17.8	16.4

- DC Resistance:** 9.5 Ω /100 m Max.
- DCR Unbalanced:** 4% Max.
- Mutual Capacitance:** 5.6 nF/100 m Max.
- Capacitance Unbalanced:** 160 pF/100 m Max.
- Characteristic Impedance:** 100 Ω +/- 15 Ω
- Prop Delay (Skew):** 45 ns/100 m Max.
- Velocity of Propagation:** 72% Nom.
- Temperature:** Operation: -40°C to +75°C  
Installation: 0°C to +60°C
- Bend Radius:** 4.2" Min.