

# GenSPEED® 10,000 Category 6a Cable

## Features And Benefits

- Extensive design development conducted to find the perfect blend of product performance and consistent manufacturability
- Innovative T-Top cross-web provides superior internal electrical characteristics by locking the pairs into a systematic orientation within the cable
- Superior flame and smoke characteristics achieved through innovative design and careful selection of materials with certified suppliers
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- AirEs jacket provides superior flexibility and maximum separation of pairs from cable to cable for consistent PSANEXT and PSAACRF performance
- Made in U.S.A.

## Applications

- IEEE 802.3: 10G BASE-T, 100 BASE-T
- 100 BASE-TX, 10 BASE-T, 1000 BASE-TX
- ANSI/TIA/EIA-854: 1000 BASE-TX
- 155 Mb/s ATM
- ANSI X3.263: 100 Mb/s
- IEEE 802.3af for PoE
- IEEE 802.3at for PoE Plus

## Standard Compliances

- ANSI/TIA 568-C.2
- NEC/CEC Type CMR (UL 1666) for Non-Plenum
- NEC/CEC Type CMP (NFPA 262) for Plenum
- RoHS Compliant Directive 2002/95/EC
- UL 444



## CONSTRUCTION

### Conductors

- 23 AWG solid bare annealed copper

### Insulation

- Non-Plenum: Polyolefin
- Plenum: Fluoropolymer

### Color Code

- Pair 1: Blue-White
- Pair 2: Orange-White
- Pair 3: Green-White
- Pair 4: Brown-White

### Separator

- T-Top cross-web

### Jacket











- Non-Plenum: Flame-Retardant PVC
- Plenum: Low-Smoke, Flame-Retardant PVC

## PHYSICAL DATA

	CMR (Non-Plenum)	CMP (Plenum)
Nominal Cable Diameter (in)	0.330	0.320
Nominal Cable Weight (lbs/1000 ft)	42	45
Minimum Bend Radius (in)	1.5	1.5
Maximum Pulling Force (lbs)	40	40
Temperature Rating (°C)		
Installation:	0 to +60	0 to +60
Operation:	-20 to +75	-20 to +75

## PART NUMBERS

Standard packaging: 1000' Spool

Jacket Color	Spool	
	CMR (Non-Plenum)	CMP (Plenum)
 Blue	<b>7133819</b>	<b>7131819</b>
 White	<b>7133820</b>	<b>7131820</b>
 Yellow	<b>7133822</b>	<b>7131822</b>
 Gray	<b>7133821</b>	<b>7131821</b>
 Red	<b>7133824</b>	<b>7131824</b>
 Orange	<b>7133826</b>	<b>7131826</b>
 Green	<b>7133823</b>	<b>7131823</b>
 Black	<b>7133828</b>	<b>7131828</b>
 Pink	<b>7133827</b>	<b>7131827</b>
 Purple	<b>7133825</b>	<b>7131825</b>

Note: Non-stock items may be subject to minimum order quantities.

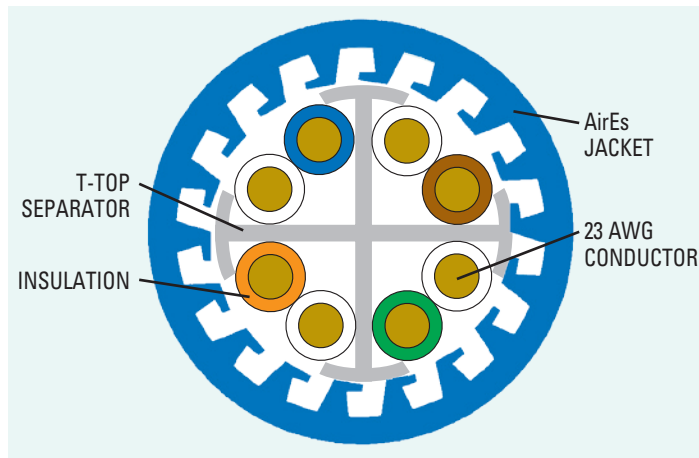
Data subject to change without notice.

## ELECTRICAL PERFORMANCE

Frequency MHz	PSACR* (min)	ACR* (min)	Insertion Loss (max)	PSNEXT (min)	NEXT (min)	PSACRF (min)	ACRF (min)	Return Loss (min)	TCL (min)	PSANEXT (min)	PSAACRF (min)
1	70.2	72.2	2.1	72.3	74.3	64.8	67.8	20.0	40.0	67.0	67.0
4	59.5	61.5	3.8	63.3	65.3	52.8	55.8	23.0	40.0	67.0	66.2
8	53.5	55.5	5.3	58.8	60.8	46.7	49.7	24.5	40.0	67.0	60.1
10	51.4	53.4	5.9	57.3	59.3	44.8	47.8	25.0	40.0	67.0	58.2
16	46.7	48.7	7.5	54.2	56.2	40.7	43.7	25.0	38.0	67.0	54.1
20	44.4	46.4	8.4	52.8	54.8	38.8	41.8	25.0	37.0	67.0	52.2
25	41.9	43.9	9.4	51.3	53.3	36.8	39.8	24.3	36.0	67.0	50.2
31.25	39.4	41.4	10.5	49.9	51.9	34.9	37.9	23.6	35.1	67.0	48.3
62.5	30.4	32.4	15.0	45.4	47.4	28.9	31.9	21.5	32.0	65.6	42.3
100	23.2	25.2	19.1	42.3	44.3	24.8	27.8	20.1	30.0	62.5	38.2
200	10.2	12.2	27.6	37.8	39.8	18.8	21.8	18.0	27.0	58.0	32.2
250	5.2	7.2	31.1	36.3	38.3	16.8	19.8	17.3	26.0	56.5	30.2
300	0.8	2.8	34.3	35.1	37.1	15.3	18.3	16.8	25.2	55.3	28.7
400	—	—	40.1	33.3	35.3	12.8	15.8	15.9	24.0	53.5	26.2
500	—	—	45.3	31.8	33.8	10.8	13.8	15.2	23.0	52.0	24.2

Note: Values are expressed in dB per 100 m (328 ft.) length @ 20°C.  
\*PSACR & ACR not specified in ANSI/TIA 568-C.2

## GenSPEED® 10,000 CATEGORY 6a CROSS-SECTION



## ELECTRICAL CHARACTERISTICS

<b>DC Resistance (max)</b> Ohms/100 m (328 ft) @ 20°C	8.9
<b>DC Resistance Unbalance (max)</b> Individual Pair %	4.0
<b>Delay Skew (max)</b> ns/100 m	35
<b>Nom. Velocity of Propagation</b> % Speed of Light	70
<b>Characteristic Impedance</b> Frequency (f): 1-500 MHz	Ohms 100 ± 15