

GenSPEED® 10 MTP™ Gen5 Category 6A Cable

Superior Alien Crosstalk Protection and EMI Immunity in the Industry's
Smallest Full Channel, Component Compliant 6A Cable



PART NUMBERS

Standard packaging: 1000' Lengths

Jacket Color	Spool	Spool-Pac®
	CMP (Plenum)	CMP (Plenum)
Blue	7151849	7151879
White	7151850	7151880
Yellow	7151852	7151882
Gray	7151851	7151881
Red	7151854	7151887
Orange	7151856	7151883
Green	7151853	7151884
Black	7151858	7151888
Pink	7151857	7151885
Purple	7151855	7151886

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

PHYSICAL DATA

	CMP (Plenum)
Nominal Cable Diameter (in)	0.230
Nominal Cable Weight (lbs/1000 ft)	30
Minimum Bend Radius (in)	1.0
Maximum Pulling Force (lbs)	40
Temperature Rating (°C)	
Installation:	0 to +60
Operation:	-20 to +105

CONSTRUCTION:

Conductors

- 23 AWG solid bare annealed copper

Insulation

- Plenum: Fluoropolymer

Color Code

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

ANEXT Protection

- Mosaic™ variable laser cut tape

Jacket

- Plenum: Low-Smoke, Flame-Retardant PVC

Features and Benefits

- Utilizes innovative Mosaic™ Variable Laser Cut Tape to provide superior protection against alien crosstalk. Guaranteed +8 dB over TIA 568.2-E Standard for both PSANEXT & PSAACRF.
- Variable laser cut pattern delivers maximum protection against EMI noise.
- Smaller cable diameter allows for greater cable density, reducing cable management costs.
- Simplified design and improved bend radius make it easier to strip, terminate and route, reducing installation time and expense.
- UL Listed CMP-LP 0.7A with certified performance for high-power PoE applications.
- CMP 105°C jacket rating provides greater protection against increased operating temperatures and for high-wattage applications.
- TRU-Mark® print legend contains footage markings from 1000' to 0'
- All GenSPEED products are made in the U.S.A.

Applications

- IEEE 802.3: 10G BASE-T, 1000 BASE-T, 100 BASE-TX, 10 BASE-T, PoE, PoE+ and PoE++
- ANSI/TIA 854: 1000 BASE-TX
- Digital Video
- Broadband and Baseband Analog Video
- CDDI, Token Ring, ATM

Standard Compliances

- ANSI/TIA 568.2-E
- NEC/CEC Type CMP (NFPA 262) for Plenum
- UL Listed CMP-LP 0.7A*
- UL 444
- UL 4299
- RoHS Compliant Directive 2011/65/EU
- ANSI/TIA 862 (Building Automation)
- ICEA S-116-732
- ISO/IEC 11801 Ed. 2.0 (Class Ex)

* 0.7A is the ampacity rating of the cable, which equals to 140 watts using 50 volts over four pairs.

FEATURING
MOSAIC
VARIABLE LASER CUT TAPE

GenSPEED® 10 MTP™ Gen5 Category 6A Cable

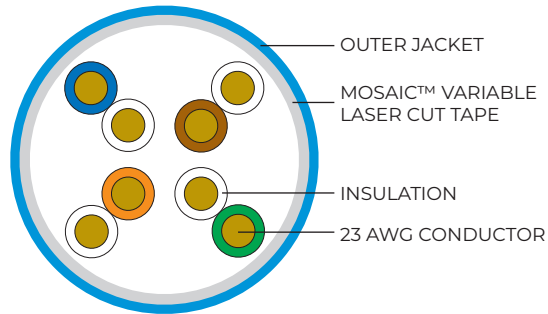
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ELECTRICAL PERFORMANCE

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)		
	PG Guaranteed	PG Guaranteed		TIA Guaranteed	TIA Guaranteed	TIA Guaranteed	TIA Guaranteed			TIA Guaranteed	TIA Guaranteed	TIA Guaranteed	PG Guaranteed	PG Typical	TIA Guaranteed
1	70.2	72.2	2.1	72.3	74.3	64.8	67.8	20.0	40.0	67.0	75.0	79.0	67.0	75.0	79.0
4	59.5	61.5	3.8	63.3	65.3	52.8	55.8	23.0	40.0	67.0	75.0	79.0	66.2	74.4	78.2
10	51.4	53.4	5.9	57.3	59.3	44.8	47.8	25.0	40.0	67.0	75.0	79.0	58.2	66.2	70.2
16	46.8	48.8	7.5	54.2	56.2	40.7	43.7	25.0	38.0	67.0	75.0	79.0	54.1	62.1	66.1
20	44.4	46.4	8.4	52.8	54.8	38.8	41.8	25.0	37.0	67.0	75.0	79.0	52.2	60.2	64.2
31.25	39.4	41.4	10.5	49.9	51.9	34.9	37.9	23.6	35.1	67.0	75.0	79.0	48.3	56.3	60.3
62.5	30.4	32.4	15.0	45.4	47.4	28.9	31.9	21.5	32.0	65.6	73.6	77.6	42.3	50.3	54.3
100	23.2	25.2	19.1	42.3	44.3	24.8	27.8	20.1	30.0	62.5	70.5	74.5	38.2	46.2	50.2
150	16.0	18.0	23.7	39.7	41.7	21.3	24.3	18.9	28.2	59.9	67.9	71.9	34.7	42.7	46.7
200	10.2	12.2	27.6	37.8	39.8	18.8	21.8	18.0	27.0	58.0	66.0	70.0	32.2	40.2	44.2
250	5.2	7.2	31.1	36.3	38.3	16.8	19.8	17.3	26.0	56.5	64.5	68.5	30.2	38.2	42.2
300	0.9	2.9	34.3	35.1	37.1	15.3	18.3	16.8	25.2	55.3	63.3	67.3	28.7	36.7	40.7
400	—	—	40.1	33.3	35.3	12.8	15.8	15.9	24.0	53.5	61.5	65.5	26.2	34.2	38.2
500	—	—	45.3	31.8	33.8	10.8	13.8	15.2	23.0	52.0	60.0	64.0	24.2	32.2	36.2
600*	—	—	50.1*	30.6*	32.6*	9.2*	12.2*	14.7*	22.2*	—	50.8*	—	—	22.6*	—
700*	—	—	54.5*	29.6*	31.6*	7.9*	10.9*	14.2*	21.5*	—	49.8*	—	—	21.3*	—
750*	—	—	56.7*	29.2*	31.2*	7.3*	10.3*	14.0*	21.2*	—	49.4*	—	—	20.7*	—

Note: Values are expressed in dB per 100 m (328 ft.) length @ 20 °C.
 * Values are for reference only.
 ** PSACR & ACR not specified in ANSI/TIA 568.2-E

CROSS-SECTION

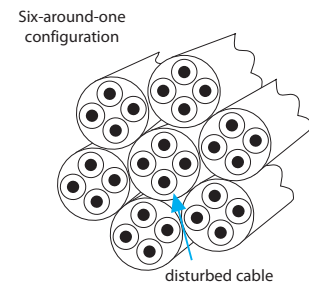


ELECTRICAL CHARACTERISTICS

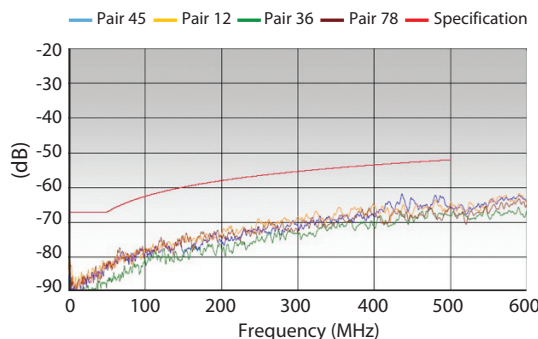
	Max.	Nom.
DC Resistance Ohms/100 m (328 ft) @ 20 °C	9.38	7.50
DC Resistance Unbalanced Individual Pair %	4.00	< 1
Delay Skew (Max) ns/100 m	45	
Nom. Velocity of Propagation % Speed of Light	70	
Characteristic Impedance Frequency (f): 1-500 MHz	Ohms 100 ± 15	

4 PAIR CABLES:

Bundles of 7 Test Results



PSANEXT



PSAACRF

