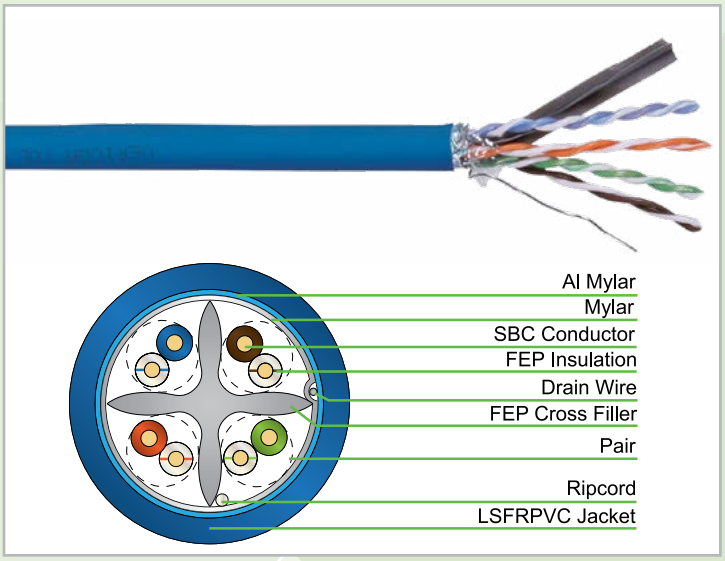
VERICOM
The Future Of Technology - Today.

VGS6A™ Category 6 F/UTP Plenum LP-Certified Cable



Applications

The Vericom VGS6A™ Category 6A Cable supports a broad range of applications, including 10GBASE-T Ethernet, 1000BASE-T Gigabit Ethernet, 100BASE-T Fast Ethernet, 155 Mb/s ATM, 622 Mb/s ATM, 1.2 Gb/s ATM, digital video, broadband/baseband analog video, and Voice over Internet Protocol (VoIP).

Fully backwards compatible with both Category 6 and Category 5e systems, the cable also meets IEEE 802.3af/802.3at requirements for Power over Ethernet (PoE) in bundles of up to 48 cables, as well as IEEE 802.3bt Type 3 and Type 4 PoE applications in bundles of up to 24 cables.

Description / Specifications

The Vericom VGS6A™ Category 6A F/UTP Cable is engineered to exceed ANSI/TIA-568.2-D Category 6A and ISO 11801 Class EA performance standards, supporting frequencies up to 500 MHz. Packaged in a 1000 ft Reelex™ pull box, the cable features 23 AWG solid copper conductors in a four-pair configuration, separated by an integral cross filler and shielded with a continuous foil and drain wire inside the jacket. This design enhances alien crosstalk performance and provides superior resistance against external noise interference.

Constructed with FEP insulation and filler, and protected by a low-smoke, flame-retardant PVC (LSFRPVC) jacket, the VGS6A™ Category 6A CMP Cable is rated for plenum environments. With a nominal diameter of 0.27” (6.9 mm), it delivers reliable performance in demanding installation conditions.

Features & Benefits

- Smaller diameter cable design reduces bundle sizes to improve airflow in high density applications to reduce required pathway spaces and accommodate a smaller bend radius
- The cross filler within the Vericom VGS6A™ Category 6A F/UTP Cable keeps pairs separated and each individual pair twist consistent through the length of the cable reducing crosstalk up to and beyond 500 MHz
- The continuous foil is wrapped around the four conductor pairs to resist alien crosstalk between adjacent cables to ensure maximum performance.
- ANSI/TIA-568.2-D and ISO 11801 Class EA Category 6A ensures interoperability with all standards compliant connectivity.
- 26AWG solid tinned copper drain wire and mylar foil shield with 100% coverage to resist alien crosstalk and external noise emitters
- Reelex™ Pull Box to reduce tangling and improve installation time

Standards Compliance

- ANSI/TIA-568.2-D
- ISO/IEC 11801 Class EA
- IEC 61156-5
- NFPA 262 (CMP)
- RoHS Compliant
- UL 444
- UL 444 LP-Rating 0.5A & 0.6A
- CSA 22.2 No. 214
- IEEE 802.3bt PoE Type 1 (15.4 Watts)
  formerly 802.3af, Type 2 (30 Watts)
  formerly 802.3at, Type 3 (60 Watts),
  Type 4 (100 Watts)

info@vericomsolutions.com • vericomsolutions.com

VERICOM®
The Future Of Technology - Today.

VGS6A™ Category 6 F/UTP Plenum LP-Certified Cable

Ordering Information

Item Number	Description
SP6623P-**XX**1000FB	23 AWG Copper Cable, U/UTP, CAT6A, 4 Pair, CMP
Specify jacket color by substituting **XX** in Item # for the following:	BL WH YE

Item # Example: SP6623P-**BL**1000FB - Copper Cable, F/UTP, CAT6A, 4 Pair, CMP Rated, Blue, 1000 ft Pull Box

Cable Marking

VERICOM (UL) c(UL) E346149-W TYPE CMP-LP(0.6A) 90º 23 AWG 4P CAT6A FTP TIA-568.2-D ROHS COMPLIANT YYMMDD HH:mm XXXXFT USED/XXXXFT REMAINING

Note: YYMMDD HH:mm is date code.

Construction

Conductor Material: 23 AWG Solid Bare Copper
Insulation Material: Fluorinated Ethylene Propylene (FEP)
Color Code : BL & WH/BL, OR & WH/OR, GN & WH/GN, BR & WH/BR
Filler Material: Fluorinated Ethylene Propylene (FEP)
Ripcord Material: Polyester Multi-Yarn
Shield Material: Mylar Tape
Drain Wire Material: 26 AWG Solid Tinned Copper
Shield Material: Aluminum Mylar Tape (100% Coverage & Mylar Side Facing Out)
Jacket Material: Low Smoke Flame Retardant PVC (LSFRPVC)
Jacket Color: Specified within part number

Electrical

Mutual Capacitance: 5.6 nF/100m max
DC Resistance: 9.38 Ω/100m max
DC Resistance Unbalance: 4% max
Capacitance Unbalance Pair-to-Ground: 330 pF/100m

Voltage

UL Voltage Rating: 300 V (CMP)

Delay

Maximum Delay: 537.6 ns/100m @ 100 MHz
Maximum Delay Skew: 45 ns/100m
Velocity of Propagation: 66% nom

Physical

Conductor Diameter: 0.022 in. (0.56 mm)
Insulated Conductor Diameter: 0.043 in. (1.09 mm) max.
Cable Diameter: 0.27 in. (6.9 mm)
Nom. Cable Weight: 39.33 lb. (17.84 kg)
Max. Installation Tension: 25 lb. (110 N)
Min. Bend Radius: ≥8 times of overall diameter

Temperature

UL Rating: 75 ºC
Operating: -4 °F to 140 °F (-20 °C to 60 °C)
Installation: 32 °F to 140 °F (0 °C to 60 °C)
Storage: -4 °F to 167 °F (-20 °C to 75 ºC)

Transmission Performance (at 20 ºC)

Freq. (MHz)	IL Max. (dB/100m)	NEXT Min. (dB)	PSNEXT Min. (dB)	ACR Min. (dB/100m)	PSACR Min. (dB/100m)	ACRF Min. (dB/100m)	PSACRF Min. (dB/100m)	RL Min. (dB/100m)	DOP Max. (NS/100m)	Delay Skew Max. (NS/100m)
1	2.08	74.30	72.30	72.22	70.22	67.80	64.80	20.00	570.00	
4	3.80	65.27	63.27	61.47	59.47	55.76	52.76	23.01	552.00	
8	5.31	60.75	58.75	55.44	53.44	49.74	46.74	24.52	546.73	
10	5.93	59.30	57.30	53.37	51.37	47.80	44.80	25.00	545.38	
16	7.49	56.24	54.24	48.75	46.75	43.72	40.72	25.00	543.00	
20	8.38	54.78	52.78	46.41	44.41	41.78	38.78	25.00	542.05	
25	9.38	53.33	51.33	43.95	41.95	39.84	36.84	24.32	541.20	
31.25	10.50	51.88	49.88	41.37	39.37	37.90	34.90	23.64	540.44	
62.5	14.99	47.36	45.36	32.37	30.37	31.88	28.88	21.54	538.55	45.00
100	19.14	44.30	42.30	25.17	23.17	27.80	24.80	20.11	537.60	
150	23.68	41.66	39.66	17.98	15.98	24.28	21.28	18.87	536.94	
200	27.58	39.78	37.78	12.21	10.21	21.78	18.78	18.00	536.55	
250	31.07	38.33	36.33	7.26	5.26	19.84	16.84	17.32	536.28	
300	34.27	37.14	35.14	2.88	0.88	18.26	15.26	16.77	536.08	
350	37.25	36.14	34.14	N.A.	N.A.	16.92	13.92	16.30	535.92	
400	40.05	35.27	33.27	N.A.	N.A.	15.76	12.76	15.89	535.80	
450	42.71	34.50	32.50	N.A.	N.A.	14.74	11.74	15.53	535.70	
500	45.26	33.82	31.82	N.A.	N.A.	13.82	10.82	15.21	535.61	

VALUES ABOVE 250 MHZ ARE FOR INFORMATION ONLY. TECHNICAL SHEETS ARE SUBJECT TO CHANGE WITHOUT NOTICE.

info@vericomsolutions.com • vericomsolutions.com