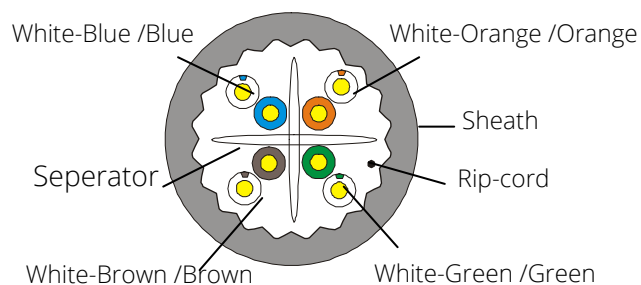


The Giganet Category 6A 500Mhz U/UTP PVC cable has been designed and manufactured to exceed TIA-568.2-D , ISO/IEC 11801-1, IEC61156-5, EN 50173-1, EN 50288-10, IEC 60332-1-1, IEC 60754-2, IEC 61034-1 and CENELEC performance requirements. The cable is ideal for 10 Gigabit networks. Giganet Category 6A U/UTP cable can be used in either horizontal or backbone cabling subsystems. The Cat 6A system supports emerging and convergence applications, performance and ease of termination.

CABLE CHARACTERISTICS

Conductor	Material	Solid-Bare Copper		
	Nom.O.D.(mm)	0.570 23 AWG	up	+0.005
			down	-0.005
Insulation	Material	HDPE		
	Diameter	1.03±0.03mm		
Sheath	Thickness	0.65±0.05 mm (Avg.)		
	External O.D.	6.9±0.4 mm		
	Surface	Clean,Frap,Satiation		
	Material	PVC ,(complies RoHS)		
	Color	According to the requires		
Surface Printing	Letter height	3.0±0.3mm		
	Color	Black		
	Print error & Space	≤±0.5%, 1m		
Core Color	1 White- Blue /Blue	2 White-Orange /Orange		
	3 White-Green /Green	4 White- Brown /Brown		
Packing	Wooden Tray & Carton			
Carton dimension	40.5*40.5*21cm			
Packing length	305±1.5m			
Rip-cord	Yes	Drain wire		Yes
Sheath Physical Properties	Before Aging Tensile Strength (Mpa)		≥13.5	
	Elongation(%)		≥150	
	Aging Period (℃×hrs)		100℃×24h×7d	
	After Aging Tensile Strength(Mpa)		≥12.5	
Electrical Characteristics (20℃)	1.0-500.0MHz Delay Shew (ns/100m)		≤45	
	NVP		69	
	DC Resistance (Ω/100m) max		9.5	
	DC Conductor Resistance Unbalance (%) max		5.0	



PRODUCT INFORMATION

Part Number	Product Description
GN-C6A-U/UTP-PVC	Giganet Category 6A Solid U/UTP PVC Cable, 23 AWG - 305m drum





COPPER CATEGORY 6A U/UTP CABLING SYSTEM

Giganet Category 6A Unshielded Twisted-Pair

APPLICATION

1000 Base-T Gigabit Ethernet
10G Base-T 10 Gigabit Ethernet
ATM
IEEE 802.3af/at POE+
Applications up to 500Mhz

ELECTRICAL SPECIFICATIONS

DC Resistance	<9.38 Ω /100m
DC Resistance Unbalanced	5%
Mutual Capacitance	5.6 nF/100m
Capacitance Unbalanced	<330 pF/100m

PERFORMANCE / SPECIFICATION TABLE

TRANSMISSION PERFORMANCE



GUARANTEED WORST CASE



TYPICAL

Frequency (MHz)	Insertion Loss (dB)		NEXT (dB)		PS NEXT (dB)		ACR (dB)		PSACR (dB)		ACR-F (dB)		PS ACR-F (dB)		Return Loss (dB)		Propagation Delay (ns)	
1.0	2.1	1.8	75.3	86.0	73.3	82.3	73.2	84.2	71.2	80.5	73.3	91.0	71.3	85.0	20.0	33.0	570	570
4.0	3.8	3.4	66.3	77.0	64.3	73.3	62.5	73.6	60.5	69.9	61.3	79.0	59.3	73.0	23.0	35.5	552	552
10.0	5.9	5.4	60.3	71.0	58.3	67.3	54.4	65.6	52.4	61.9	53.3	71.0	51.3	65.0	25.0	38.0	545	545
16.0	7.5	6.9	57.2	68.0	55.2	64.2	49.8	61.1	47.8	57.3	49.2	67.0	47.2	61.0	25.0	35.2	543	543
20.0	8.4	7.7	55.8	67.0	53.8	62.8	47.4	59.3	45.4	55.1	47.3	65.0	45.3	59.0	25.0	35.0	542	542
31.25	10.5	9.9	52.9	64.0	50.9	59.9	42.4	54.1	40.4	50.0	43.4	61.0	41.4	55.0	23.6	33.1	540	540.4
62.5	15.0	14.3	48.4	59.0	46.4	55.4	33.4	44.7	31.4	41.1	37.4	55.0	35.4	49.0	21.5	32.2	539	538.6
100.0	19.1	18.1	45.3	56.0	43.3	52.0	26.2	37.9	24.2	33.9	33.3	51.0	31.3	45.0	20.1	31.6	538	537.6
200.0	27.6	27.3	40.8	52.0	38.8	47.8	13.2	24.7	11.2	20.5	27.3	45.0	25.3	39.0	18.0	29.8	537	536.5
250.0	31.1	31.1	39.3	50.0	37.3	46.0	8.3	18.9	6.3	14.9	25.3	43.0	23.3	37.0	17.3	28.7	536	536.3
300.0	34.3	35.0	38.1	49.0	36.1	45.0	3.9	14.0	-1.9	10.0	23.8	38.0	21.8	35.0	17.3	28.0	536	536.1
400.0	40.1	40.0	36.3	47.0	34.3	43.0	-3.8	7.0	-5.8	3.0	21.3	36.0	19.3	33.0	17.3	27.1	536	535.8
500.0	45.3	42.0	34.8	47.0	32.8	42.0	-10.4	5.0	-12.4	0.0	19.3	34.0	17.3	32.0	17.3	26.0	536	535.6
550.0*	-	43.0	-	46.0	-	42.0	-	3.0	-	-1.0	-	33.0	-	31.0	-	26.0	536	-
625.0*	-	44.9	-	46.0	-	41.0	-	1.1	-	-3.9	-	33.0	-	29.0	-	25.0	535	-
750.0*	-	49.0	-	45.0	-	41.0	-	-4.0	-	-8.0	-	32.0	-	27.0	-	25.0	535	-

* Values above 500 MHz are informational only

Nominal velocity of propagation (NVP 69%)

STANDARDS

ANSI/TIA/EIA 568-B-2-10

ISO/IEC 11801: 2002

EC VERIFIED

System Warranty:

The Giganet System Warranty provides the end user an exclusive 25 year warranty when installed by a Giganet Certified Installer providing 100% coverage on non consumable products, application assurance and labour covering both link and channel using Giganet cable and connectivity. The warranty requested will depend on the class of cabling based on compliance to Industry standards using an approved performance tester.