



NEX1 Technologies Co., Ltd

SPECIFICATION FOR APPROVAL

DOCUMENT: TUP2404E03

STYLE : 75 300V
COMMUNICATION CABLE

SIZE: UTP 24AWG X4P (SOLID)
NEX1 100 CAT 5e CMP

RECOGNIZED: UL. CSA.ETL.

Manufactured by:

NEX1 Technologies Co., Ltd.
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SPECIFICATIONS

STYLE	75 300V COMMUNICATION CABLE	DOCUMENT NO : TUP2404E03
SIZE	UTP 24AWG×4P	ESTABLISHED DATE : 2007/3/16
STANDARD : UL444,910 & ISO/IEC 11801 & TIA/EIA-568-B.2 CAT 5e APPLICATION : HIGH PERFORMANCE LAN CABLE ARE SUITABLE FOR PERFECT AUDIO DATA AND VIDEO OF TRANSFER FOR HORIZONTAL NETWORK		
CONSTRUCTION :		
CONDUCTOR	SIZE	24AWG × 4P
	CONSTRUCTION	SOLID BARE COPPER
	COND. DIAM.	1/0.517±0.008 mm
INSULATION	AVG. THICK.	0.180 mm
	MIN. THICK.	0.170 mm
	DIAMETER	0.880 ± 0.020 mm
	MATERIAL	FEP
	COLOR CODES	1.BLUE × WHITE/BLUE STRIPE 2.ORANGE × WHITE/ORANGE STRIPE 3.GREEN × WHITE/GREEN STRIPE 4.BROWN × WHITE/BROWN STRIPE
SHIELDED	PAIR STRANDED	2 CORES STRANDED
	FILLER(SLOT)	-----
	ASSEMBLY STRANDED	4 PAIR STRANDED
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JACKETED	AVG. THICK.	0.40 mm
	MIN. THICK.	0.35 mm
	DIAMETER	4.60 ± 0.20 mm
	MATERIAL	PVC
	COLOR	GRAY OR OTHER COLOR

AK001/210×297/1.0

EDITION : 1.0

REVISED DATE: March 16, 2007

MAKER : *C. Y. Chen*

CONFIRM : *S. N. Wong*

APPROVAL : *W. J. Wang*



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ELECTRICAL & PHYSICAL PROPERTIES :			
ITEM		24AWG × 4P	
RATING TEMP VOLTAGE		75 300V	
CONDUCTOR RESISTANCE		93.8 OHM/Km/20 MAX.	
MUTUAL CAPACITANCE		56 pF/M MAX.	
DIELECTRIC STRENGTH		AC 1.5 KV/2 SEC..	
SPARK TEST		2.5 KV	
INSULATION	UNAGED	TENSILE STRENGTH	2500 PSI MIN. (1.76 Kg/m m ²)
		ELONGATION	200% MIN.
	AGED	TENSILE STRENGTH	UNAGED MIN. 75%(232 ×168HRS)
		ELONGATION	UNAGED MIN. 75%(232 ×168HRS)
JACKETED	UNAGED	TENSILE STRENGTH	2000 PSI MIN.(1.41 Kg/m m ²)
		ELONGATION	100% MIN.
	AGED	TENSILE STRENGTH	UNAGED MIN. 85%(100 ×240HRS)
		ELONGATION	UNAGED MIN. 50%(100 ×240HRS)
INSULATION SHRINKBACK		150m/m, 121 ± 1HR 9.5m/m	
COLD BEND TEST		-20 ±4HRS NO.CRACK	
FLAME RETARDANT TEST		CMP	
AC LEAKAGE CURRENT THROUGH OVERALL JACKET		AC 1500V 10 mA	
DC RESISTANCE UNBALANCE		5% MAX.	
PAIR-TO-GROUND CAPACITANCE UNBALANCE		3300 pF/Km MAX.	
CHARACTERISTIC IMPEDANCE		1 ~ 100 MHz 100±15 OHMS	
STRUCTURAL RETURN LOSS		100 MHz 16.0dB MIN.	
PROPAGATION DELAY		100MHz 538nS/100m MAX.	
DELAY SKEW		1 ~ 100 MHz 45nS/100m MAX.	
MARKING :			
NEX1 100 PREMIER E142890 (UL) CMP 75 UTP 4PR 24AWG CSA CMP(FT6) LL43774 ETL VERIFIED TO TIA/EIA-568-B.2 CAT 5e 100 MHz XXXXXXFT			

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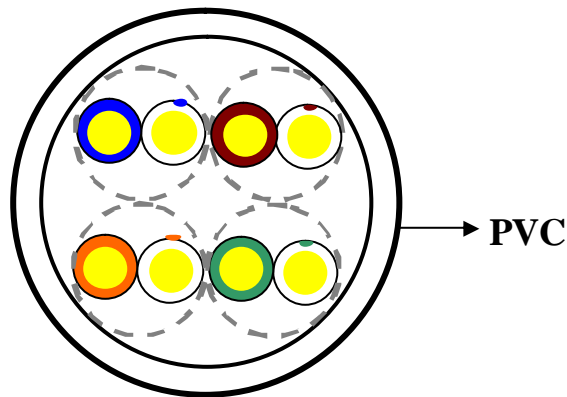


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Electrical Performance

ITEM(d B) Frequency (MHz)	ATT MAX. (dB/100 m)	NEXT MIN. (d B)	ACR MIN. (dB)	PS. NEXT MIN. (dB)	PS. ACR MIN. (dB)	ELFEXT MIN. (dB/100 m)	PS. ELFEXT MIN. (dB/100 m)	R.L. MIN. (d B)
1	2.0	65.3	63.3	62.3	60.3	63.8	60.8	20.0
4	4.1	56.3	52.2	53.3	49.2	51.7	48.7	23.0
8	5.8	51.8	46.0	48.8	43.0	45.7	42.7	24.5
10	6.5	50.3	43.8	47.3	40.8	43.8	40.8	25
16	8.2	47.3	39.1	44.3	36.1	39.7	36.7	25.0
20	9.3	45.8	36.5	42.8	33.5	37.8	34.8	25.0
25	10.4	44.3	33.9	41.3	30.9	35.8	32.8	24.3
31.25	11.7	42.9	31.2	39.9	28.2	33.9	30.9	23.6
62.5	17.0	38.4	21.4	35.4	18.4	27.8	24.8	21.5
100	22.0	35.3	13.3	32.3	10.3	23.8	20.8	20.1



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