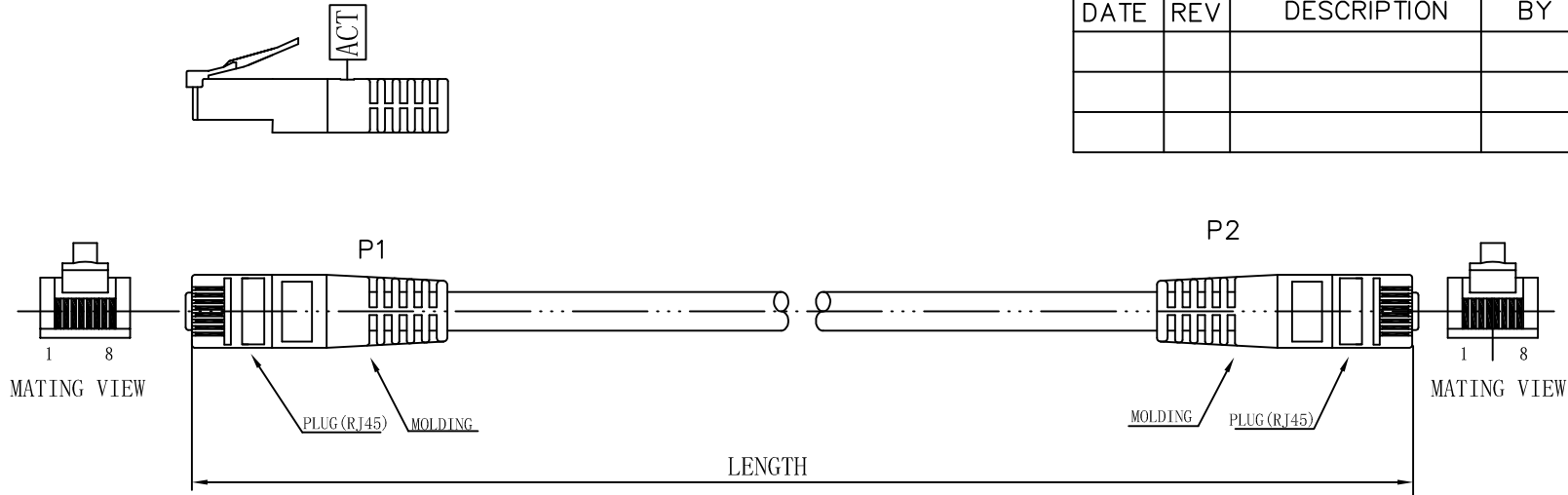
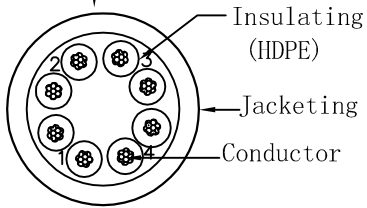


DATE	REV	DESCRIPTION	BY	CHKD

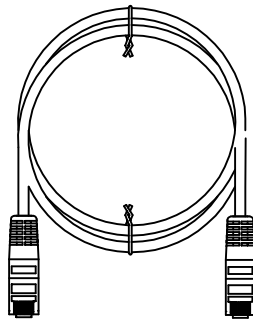


Marking: **ACT UTP CATEGORY 5 E PATCHCABLE 4X2XAWG#24**  
**ISO/IEC 11801 & EN 50288 & TIA/EIA-568-B.2 3P VERIFIED**  
**FOR GIGABIT ETHERNET TYPE CM (UL) C(UL) CMH**  
**E164469-F3 LEADFREE EN71 15000.001**



orange 1	green 2
white/orange	white/green
blue 3	brown 4
white/blue	white/brown

PA/R	PINOUT		
	P1(T568B)	WIRE	P2(T568B)
1	1	WHT/ORG	1
	2	ORG	2
2	3	WHT/GRN	3
	6	GRN	6
3	4	BLU	4
	5	WHT/BLU	5
4	7	WHT/BRN	7
	8	BRN	8



Unless specified on the drawing, tolerances are per the follows:

.X	± 1
.XX	± 0.2
.XXX	± 0.05

3RD



**ACT**

DRAW. NO	YUS-06	ITEM	Patch cable Category 5 E PVC	
DEPARTMENT		DRAW	DRAW	2011/06/17
SCALE		CHECKER	DRAW	
UNIT	mm	APPROVAL	DRAW	

DATE	REV	DESCRIPTION	BY	CHKD

WIRE	CAT.5E UTP STR 24AWG
PLUG	RJ45 8P8C
Plating on contacts	50U'
Max bending radius	21.6mm
Band with	Diameter of mandrel:17.5mm
nvp	69%
Standards	TIA/EIA-568-B.2 EN50288
Impedance	100Ω±15%
Skew	<=45ns 100m at:20° C
Capacity	MAX 5600pF/100m
Jacket	PVC Thickness:MIN at any point:0.42mm MAX AVG:0.48mm Diameter:5.4±0.2mm
Insulation	Thickness:MIN at any point:0.15mm MAX AVG:0.25mm Diameter:0.95±0.06mm
Conductor	Bare Copper 24AWG 7/0.196±0.015mm
Color	XX

Part	Colour	RAL no (LEADFREE)
IB64xx	IVORY	RAL 1015
IB48xx	PINK	RAL 4003
IB47xx	PURPLE	RAL 4005
IB55xx	RED	RAL 3031
IB45xx	ORANGE	RAL 2000
IB58xx	YELLOW	RAL 1023
IB46xx	BROWN	RAL 8023
IB57xx	GREEN	RAL 6016
IB59xx	BLACK	RAL 9011
IB56xx	BLUE	RAL 5012
IB60xx	GREY	RAL 7045
IB54xx	WHITE	RAL 9016

**RoHS Compliant**

Unless specified on the drawing, tolerances are per the follows:

.x ± 1  
.XX ± 0.2  
.XX ± 0.05

3RD  

**AC**

DRAW. NO	YUS-06	ITEM	Patch cable Category 5 E PVC	
DEPARTMENT		DRAW	DRAW	2011/06/17
SCALE		CHECKER	DRAW	
UNIT	mm	APPROVAL	DRAW	

## Product Specification

### STANDARD COMPLIANCES:

All Category 5e Requirements as Per ANSI/TIA/EIA, ISO/IEC, and CENELEC EN Standards:

ANSI/TIA/EIA 568-B.2 Cat.5e

2<sup>nd</sup> Edition ISO/IEC 11801 Class D

CENELEC EN 50173-1

IEC 61156-6, 2<sup>nd</sup> Edition CENELEC EN 50288-3-2 for Patch Cable

Flame Retardancy is Verified According to IEC 60332-1-2.

We Implemented RoHS Compliance for the Requirement of European Union Issued Directive 2002/95/EC.

### CONSTRUCTION & CHARACTERISTICS:

Conductor	Material / Size	Bare Copper / 24 AWG
Insulation	Material	HDPE
	Thickness	Normal Avg.: 0.186 mm
	Diameter	Normal : 0.96 mm
	Colors	Blue/White-Blue Orange/White-Orange Green/White-Green Brown/White-Brown
	Elongation	Min. 300%
	Tensile Strength	Min. 1.683 Kg/mm <sup>2</sup>
Sheath	Material	PVC
	Thickness	Average: 0.50 mm
	Diameter	5.6±0.3 mm
	Elongation	Min. 100%
	Tensile Strength	Min. 1.407 Kg/mm <sup>2</sup>
	Aging at 100°C for 168Hrs	Min. elongation retention:50% Min. tensile strength retention:75%
Marking		ACT CAT.5E UTP PATCH CABLE ETL VERIFIED to TIA/EIA-568-B.2 - ISO/IEC 11801 ED.2 & EN 50288-3-2 & IEC 60332-1 3P VERIFIED - 24AWGx4P TYPE CM (UL) c(UL) E164469
		or as customer request.
Flame Test		Burning five times, every time is less than 60 second and paper flag can't be burned.

## APPROVAL:

- UL/cUL Listed & 3P Certified ANSI/TIA/EIA-568-B.2 Category 5e testing performance requirements.

## APPLICATIONS:

- 1000BASE-T Gigabit Ethernet
- 10BASE-T, 100BASE-T Fast Ethernet (IEEE 802.3)
- 100 VG - AnyLAN(IEEE802.12), 155/622 Mbps ATM
- 550MHz Broadband Video
- Voice, T1, ISDN

## ELECTRICAL PERFORMANCES:

Spark Test		2000 ± 250 V ac		
Dielectric Strength		2500 V dc / 3 seconds		
Insulation Resistance Test		Min. 150 MΩ/Km		
Conductor Resistance		Max.9.38Ω/100m at 20°C		
Resistance Unbalance		Max. 5%		
Capacitance Unbalance		Max. 330 pF/100m		
Mutual Capacitance		Max. 5600 pF/100m		
Impedance	722kHz	102Ω ± 15%		
	1~125MHz	100Ω ± 15%		
Attenuation & Near End Cross Talk	Frequency (MHz)	Attenuation (dB/100M at 20°C), Max	NEXT (dB), Min	Power Sum (dB),Min
	722kHz	--	67.0*	64.0*
	1MHz	--	65.0*	62.0*
	4 MHz	4.9*	56.0*	53.0*
	8 MHz	7.0*	51.0*	48.0*
	10 MHz	7.8*	50.0*	47.0*
	16 MHz	9.8*	47.0*	44.0*
	20 MHz	11.1*	45.0*	42.0*
	25 MHz	12.5*	44.0*	41.0*
	31.25 MHz	14.0*	42.0*	39.0*
	62.5 MHz	20.4*	38.0*	35.0*
	100 MHz	26.4*	35.0*	32.0*
	125 MHz	30.0*	34.0*	31.0*

The asterisked (\*) value are for information only. The minimum Next coupling loss for any pair combination at room temperature is to be greater than the value determined using the formula:

$$\text{NEXT}(f \text{ MHZ}) \geq \text{NEXT}(0.772) - 15 \text{LOG}_{10}(f \text{ MHZ}/0.772)$$

**CONFIGURATION:**

orange 2	green 3
white/orange	white/green
blue 1	brown 4
white/blue	white/brown

