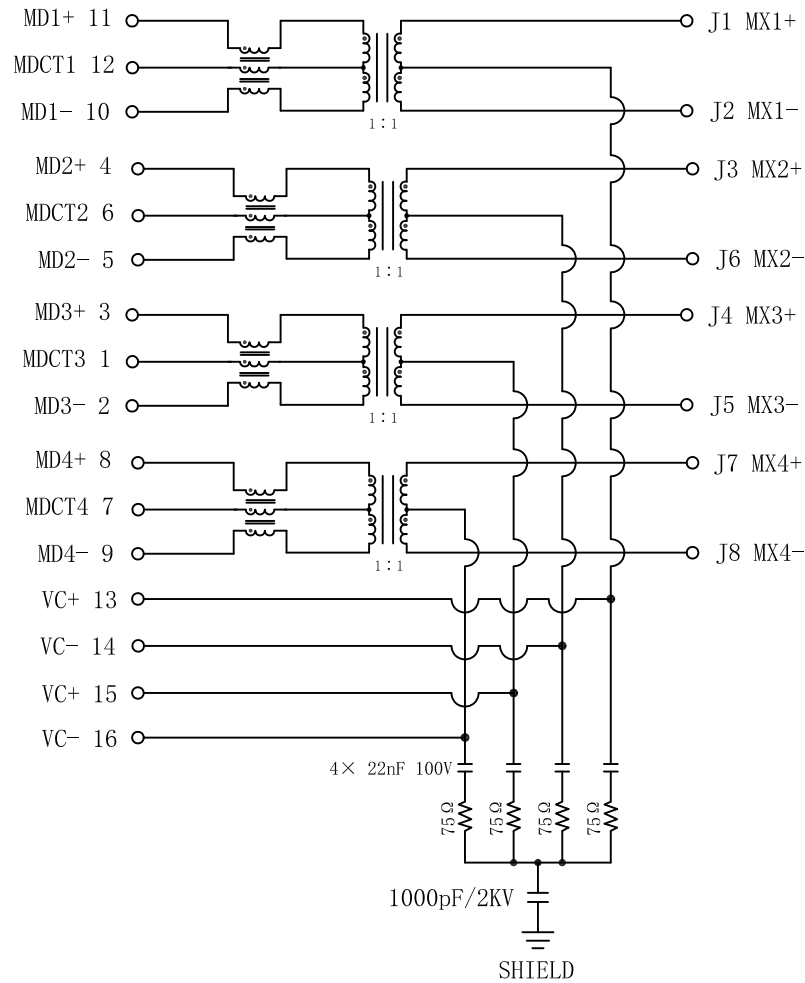


Schematic :

| REV. | ECN NO. | DESCRIPTION | DATE | APPD |
|------|---------|-------------|------------|------|
| A | REL | | 2018-05-25 | |

PC BOARD CONNECTIONS

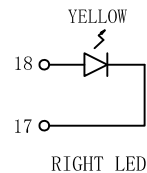
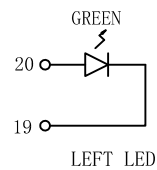


RJ45 CONNECTOR

Electrical Specifications @25°C

- Turns Ratio ($\pm 2\%$):
Pri:Sec = 1CT:1CT
- Inductance:
350uH Min @100KHz, 0.1V, 14mA DC Bias, $-40^{\circ}\text{C} \sim +85^{\circ}\text{C}$.
120uH Min @100KHz, 0.1V, 23mA DC Bias, $-40^{\circ}\text{C} \sim +85^{\circ}\text{C}$.
- Insertion Loss (dB Max):
0.1-1MHz: -1.1 1-65MHz: -0.8
65-100MHz: -1.0 100-125MHz: -1.2
- Return Loss:
0.5-40MHz: -18dB Min
40-100MHz: $-12 + 20 \log(f/80\text{MHz})$ dB Min
- Crosstalk:
1-100MHz: -30dB Min
- Common Mode Rejection:
1-100MHz: -30dB Min
- Balanced DC Line Current:
1.0A Max @57VDC CONTINUOUS
1.2A Max @57VDC For 200 Miliseconds
- Hipot: 1500Vrms Min @60Hz
- Operating Temperature: $-40^{\circ}\text{C} \sim +85^{\circ}\text{C}$.

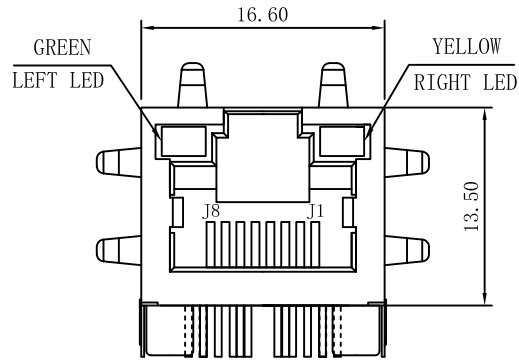
| Emitting Color | λ_p (nm) | VF@IF=20mA | IR @VR=5V |
|----------------|------------------|------------|----------------|
| GREEN | 565 | 1.8~2.6V | 10 μ A max |
| YELLOW | 585 | 1.8~2.6V | 10 μ A max |



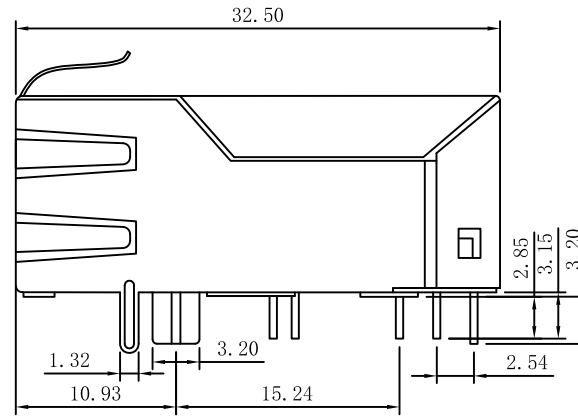
| | | | | |
|--------|-----------------|------------|--|--|
| X:X | ± 0.30 | APPD: | LINK-PP INT'L TECHNOLOGY CO., LIMITED | |
| X:XX | ± 0.25 | CHKD: | TITLE: RJ45 Connector with 1000 Base-T Integrated Magnetics For PoE++ Application & 100W | |
| X:XXX | ± 0.05 | DR: TOM | PART NO. : LPJK6078AHNL | |
| ANGLES | $\pm 1^{\circ}$ | UNIT: mm | DWG NO. : LP18052302 | |
| | SCALE: 2/1 | SHEET: 1/2 | REV: A | |

Mechanical :

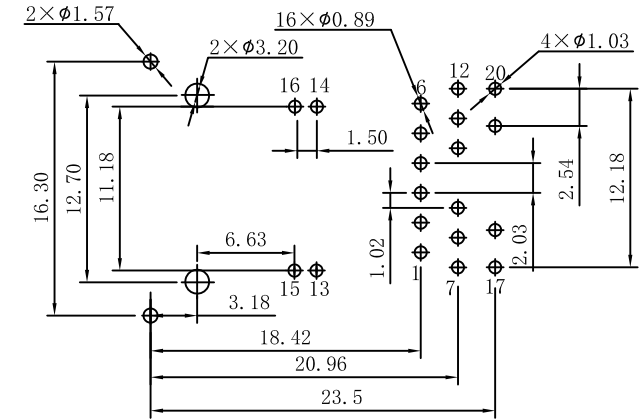
| REV. | ECN NO. | DESCRIPTION | DATE | APPD |
|------|---------|-------------|------------|------|
| A | REL | | 2018-05-25 | |



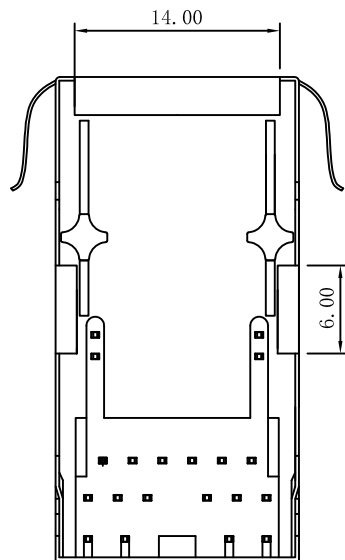
Front Side View



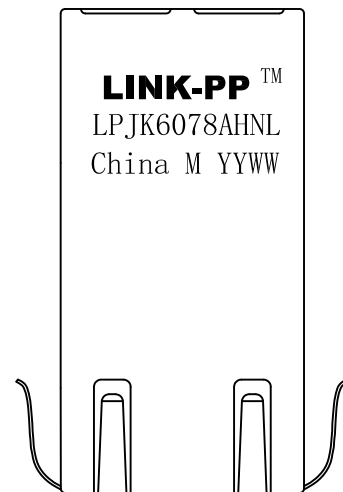
Left Side View



Suggested PCB Layout (Top View)



Bottom Side View



Top Side View

NOTES:

1. Designed to support application, such as SOHO (ADSL modems), LAN-ON-Motherboard (LOM), hub and Switches.
2. Meets IEEE 802.3bt specification
3. Connector Materials:
Housing Material: Thermoplastic PBT+30%G.F UL94V-0
Contact Material: Phosphor Bronze C5210R-EH Thickness=0.35mm
Pins: Brass C2680R-H Thickness=0.35mm
Shield: Copper alloy Brass H65Y Thickness=0.2mm
Contact plating: Gold 6 micro-inches min. In contact area.
4. Wave solder tip temperature: 265°C Max, 5 Sec.
5. UL Certification: File Number E484635.

| | | |
|-------------|------------|--|
| X:X ±0.30 | APPD: | LINK-PP INT'L TECHNOLOGY CO., LIMITED |
| X:XX ±0.25 | CHKD: | |
| X:XXX ±0.05 | DR: TOM | TITLE: RJ45 Connector with 1000 Base-T Integrated Magnetics For PoE++ Application & 100W |
| ANGLES ±1° | UNIT: mm | PART NO. . LPJK6078AHNL |
| | SCALE: 2/1 | SHEET: 2/2 |
| | REV: A | DWG NO. : LP18052302 |