

A. MECHANICAL(UNIT:mm)

REV	ECN NO	DESCRIPTION	DATE
A	/	New Drawing	2025/2/28

RJ45 MECHANICAL NOTES:

- 1.THE PRODUCT IS ROHS COMPLIANT.
- 2.ALL DIMENSIONS FOLLOW :
- 3.GAUGE FOLLOW : FCC SUBPART F, 68,500, FIGURE (C)(2)(I) & (C)(2)(II) & (C)(3)(I) IEC 60603-7  
-ALL PLUGS MUST BE MEETING THE REQUIREMENTS OF PLUG GO & NO-GO GAUGE.

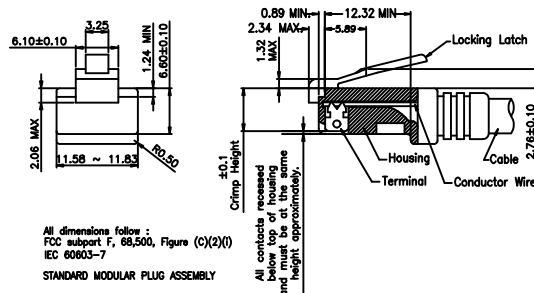
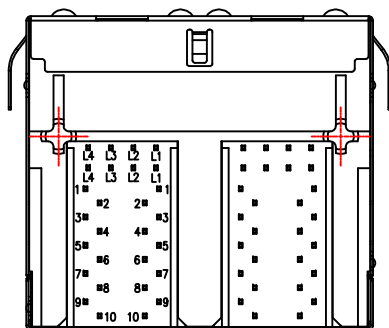
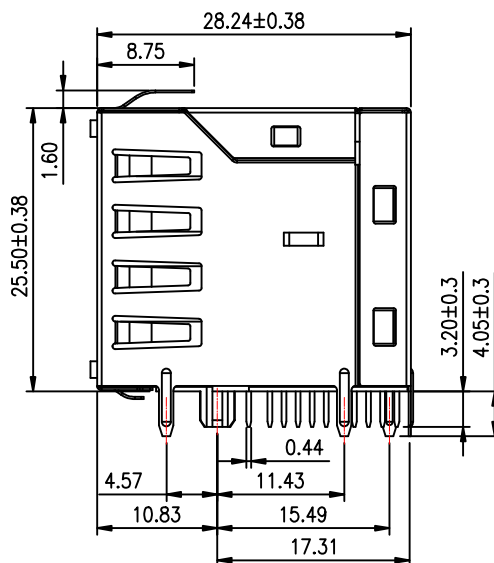
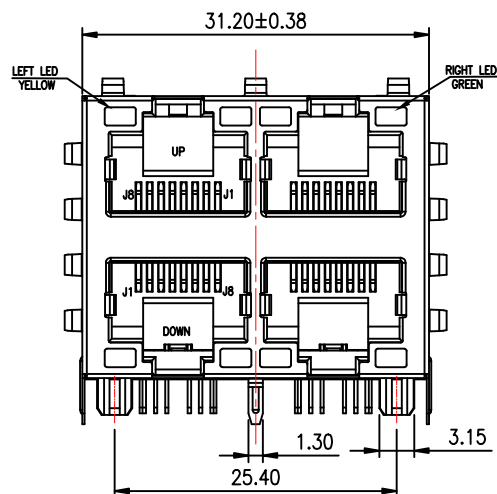
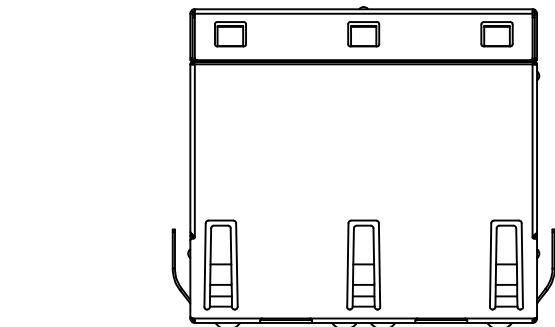
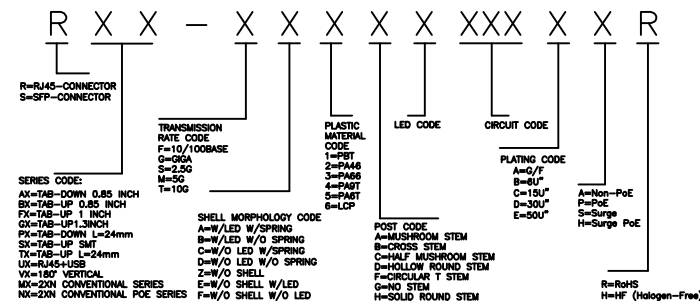
- 3.GAUGE FOLLOW : FCC SUBPART F, 68,500, FIGURE (C)(4)(I) & (C)(5)(I)  
-THERE MUST BE NO DAMAGE TO HOUSING AND LOCKING LATCH.  
-THERE MUST BE NO NICKS AND CUTS IN CABLE.  
-DURABILITY : 750 CYCLES GENERALLY

- 4.PART CAN BE RECOMMENED FOR REFLOW SOLDERING PROCESS.  
PEAK REFLOW SOLDERING TEMPERATURE IS 260°C MAX,10SECONDS MAX.

5.MATERIAL:

- 5.1 HOUSING: HIGH TEMPERATURE THERMOPLASTIC LCP.  
FLAMMABILITY RATING ,UL 94V-0; COLOR:BLACK.
- 5.2 SHELL: BRASS C2680H, THICKNESS=0.20mm.PLATING NICKEL 30u"Min;
- 5.3 RJ TERMINAL: HIGH TEMPERATURE THERMOPLASTIC LCP,COLOR:BLACK;  
PIN:THICKNESS=0.30mm.PHOS-BRONZE C5210EH.  
PLATING: 50u" MIN NICKEL UNDERPLATING ALL AREA.  
100u" MIN TIN ON SOLDER TAIL.  
30u" GOLD ON CONTACT AREA.
- 5.4 INPUT TERMINAL: HIGH TEMPERATURE THERMOPLASTIC LCP COLOR:BLACK;  
PHY PIN:THICKNESS=0.30mm. BRASS C2680EH.  
LED PIN:THICKNESS=0.45mm. BRASS C2680EH.  
PLATING: 50u" MIN NICKEL UNDERPLATING ALL AREA.  
100u" MIN TIN ON SOLDER TAIL.
- 5.5 LIGHT PIPE : PC, TRANSPARENT

6.CODING PRINCIPLES

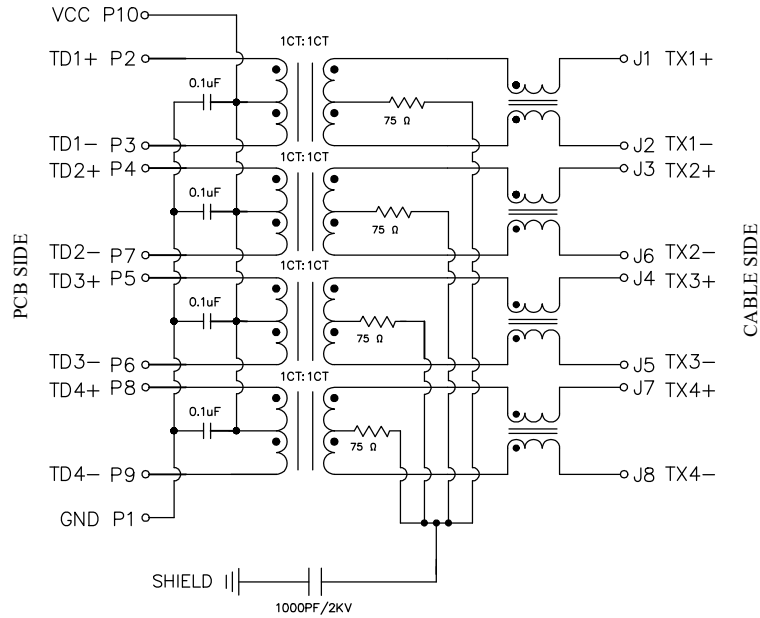


All dimensions follow :  
FCC subpart F, 68,500, Figure (C)(2)(I)  
IEC 60603-7  
STANDARD MODULAR PLUG ASSEMBLY

RECOMMEND PLUG DIM

X. ± 0.40	APPD:	LOUIS	深圳市金航标电子有限公司	
.X ± 0.30	CHKD:	ZHOU	PART NO: KH-RM2-GA6BJ118DAR	
.XX ± 0.25	DR:	LIANG	TITLE: DOUBLE 2X2 Port 10/100/1000BASE-T RJ45 JACK Magnetics	
.XXX ± 0.20	UNITS:	mm	SHEET: 1 OF 2	
X' ± 3'	SCALE:	1:1	REV: A	DWG NO: RM2-0002
X' ± 2'			REMARK: XXX-XXXX	RoHS Compliant

REV	ECN NO	DESCRIPTION	DATE
A	/	New Drawing	2025/2/28



D. ELECTRICAL SPECIFICATIONS @25°C

TRANSMITTER FILTER & RECEIVER FILTER

TYPE : BALANCE LOW PASS 100Ω IMPEDANCE

INSERTION LOSS : 1~125MHz -1.2dB MAX.

RETURN LOSS : 1~30MHz -18dB MIN. LOAD 100Ω  
 30~60MHz -16dB MIN. LOAD 100Ω  
 60~80MHz -12dB MIN. LOAD 100Ω  
 80~100MHz -10dB MIN. LOAD 100Ω

COMMON MODE REJECTION  
 @1~100 MHz -30dB MIN.

CROSS TALK  
 @ 1~100MHz -30dB MIN.

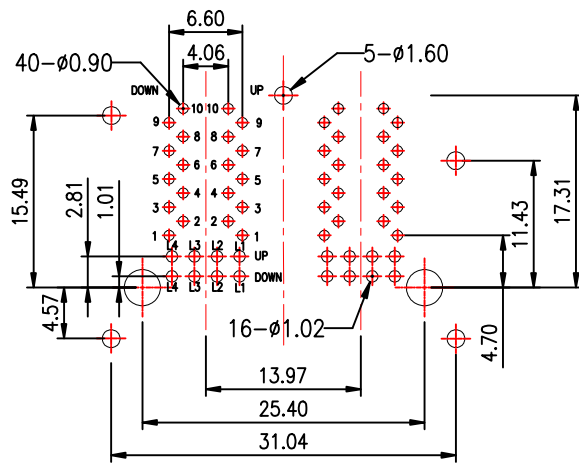
INDUCTANCE (OCL) @ 100KHz, 0.1V, 8mA DC BIAS 350 uH MIN.

HIPOT TEST  
 PHY SIDE(INPUT) TO CABLE SIDE(OUTPUT) : 1500Vrms 60S

OPERATING TEMPERATURE:-40 TO +85°C;

STORAGE TEMPERATURE: -40 TO +85°C

C:PIN ASSIGNMENT FOR PCB LAYOUT



SUGGESTED PCB PAD LAYOUT  
 COMPONENT SIDE VIEW

E:LED SPECIFICATION



Emitting Color	λp (nm)	Vf @If=20mA	Ir @Vr=5V
GREEN	570	1.7 ~2.6 V	10mA max
YELLOW	590	1.7 ~2.6 V	10mA max

X. ± 0.40	APPD:	深圳市金航标电子有限公司	
.X ± 0.30	LOUIS	PART NO: KH-RM2-GA6BJ118DAR	
.XX ± 0.25	CHKD:	TITLE: DOUBLE 2X2 Port 10/100/1000BASE-T RJ45 JACK Magnetics	
.XXX ± 0.20	ZHOU	SHEET: 2 OF 2	
X' ± 3'	DR:	REV: A	DWG NO: RM2-0002
UNITS: mm	LIANG	REMARK: XXX-XXXX	REMARK: XXX-XXXX
		SCALE: 1:1	REMARK: XXX-XXXX

