



MODULAR JACKS AND PLUGS:

G8X Series

RJ45 Modular Jack with 10/100 magnetics and POE

Product Features

- Includes magnetics to support 10/100 Base-T applications
- POE compatible
- LEDs for status indicators
- Shielded for EMI suppression
- PCB guide pegs

Performance Specifications

Materials and Finish

Housing Material

PBT Thermoplastic, UL 94V-0 Rated, Black Color

Shield Material

Brass, Nickel Plated

Contact Material

Phosphor Bronze

Plating

Nickel Underplating, 6µ" Gold Plate on Contact Area,
Tin Plated on Solder Area

Electrical Characteristics

Insulation Resistance

500 Megohms Min.

Contact Resistance

20 milliohms Max.

Dielectric Withstanding Voltage

1200V AC for 1 Minute

Mechanical Characteristics

Durability Rating

750 Cycles Min.

Mating Force

30 N Max.

Operating Temperature

-40°C to +85°C

Storage Temperature

-40°C to +85°C



Part Number

Part Number Builder

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Series		No. of Port	No. of Positions Contacts	Shield Option	Option

Series

G8X - RJ45 Modular Jack with 10/100 magnetics and POE

Number of Ports

1 - 1 Port

Number of Positions / Contacts

88 - 8 Positions / 8 Contacts

Shield Options

S7 - Shielded

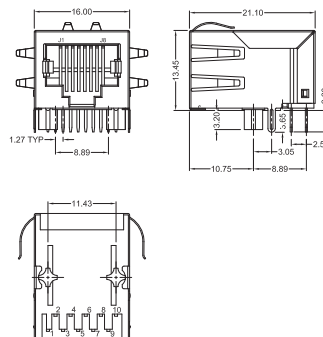
Magnetics Package

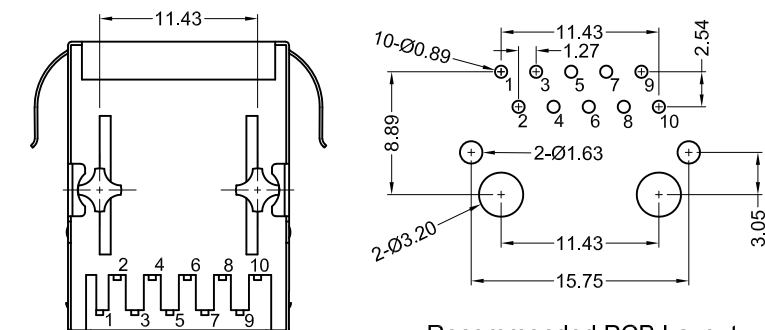
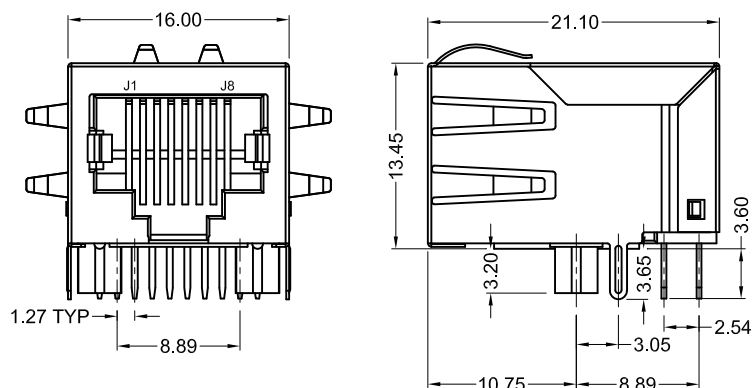
BP - 10/100 with POE

See Next Page for Schematics

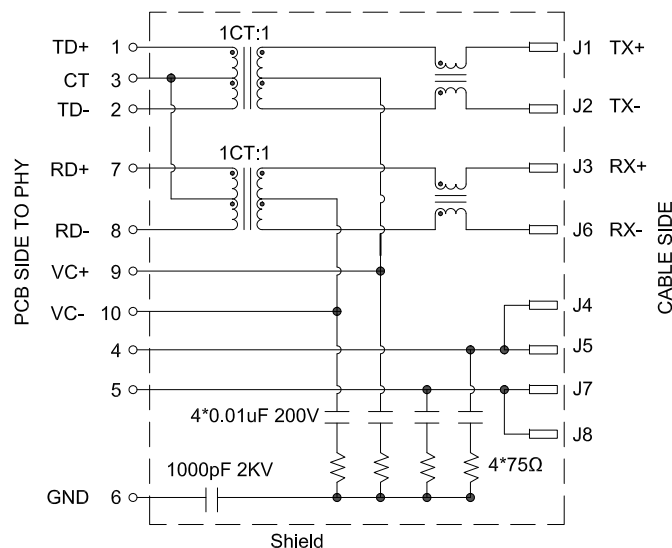
G8X Series

Dimensions in mm





Recommended PCB Layout
(Top View)



Magnetics Schematic:

Materials and Finish

Housing: PBT Thermoplastic
UL 94V-0 Rated
Color: Black

Shield: Brass, Nickel Plated

Contact Material: Phosphor Bronze

Plating:

Nickel Underplating, 6μ" Gold
Plating on Contact Area,
Tin Plated on Solder Area

Electrical Characteristics

Insulation Resistance:
500 Megohms Min.

Contact Resistance:
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Dielectric Withstanding Voltage:
1200V AC for 1 Minute

Mechanical Characteristics

Durability Rating: 750 Cycles Min.

Mating Force: 30 N Max.

Operating Temperature: -40°C to +85°C

Storage Temperature: -40°C to +85°C

Electrical Properties:

Insertion Loss (dB Max)	Return Loss (dB Min)				Cross Talk (dB Min)			CMR (dB Min)	OCL (uH Min)
1~100MHz	1~10MHz	10~30MHz	30~60MHz	60~80MHz	1~30MHz	30~60MHz	60~100MHz	1~100MHz	100KHz, 100mV
-1.0	-20	-16	-12	-10	-40	-35	-30	-35	350



RoHS COMPLIANT

Tolerances
X.X ± 0.30
X.XX ± 0.25
Unless Stated Otherwise

REV.	DATE	DESCRIPTION	REV. BY	CHK. BY	DRAWN BY	DATE
A0	04/25/18	New Drawing	J. Elbanna	C. Kelleher	J. Elbanna	04/25/18
A0.1	05/29/18	Updated Specs	D. Shehan	G. Serrato		
A0.2	05/31/18	Corrected SCH & EE Spec	D. Shehan			
A1	07/13/18	Release Drawing	C. Kelleher	N/A		

G8X-188S7-BP

8P8C 10/100 Magjack with POE

Tab Down, Shielded

