

ELECTRICAL SPECIFICATIONS:

1.0	TURNS RATIO: (P3-P2) : (J4-J5)	: 1 : 1 $\pm 2\%$
	(P5-P4) : (J6-J3)	: 1 : 1 $\pm 2\%$
	(P9-P8) : (J8-J7)	: 1 : 1 $\pm 2\%$
	(P10-P11) : (J2-J1)	: 1 : 1 $\pm 2\%$
2.0	INDUCTANCE: (P3-P2) ; (P5-P4)	: 350 μ H MIN. @ 0.1V, 100KHz, 8 mA DC BIAS
	(P10-P11) ; (P9-P8)	: 350 μ H MIN. @ 0.1V, 100KHz, 8 mA DC BIAS
3.0	LEAKAGE INDUCTANCE: P3-P2 (WITH J4 AND J5 SHORT)	: 0.3uH MAX. @ 1MHz
	P5-P4 (WITH J6 AND J3 SHORT)	: 0.3uH MAX. @ 1MHz
	P9-P8 (WITH J8 AND J7 SHORT)	: 0.3uH MAX. @ 1MHz
	P10-P11 (WITH J1 AND J2 SHORT)	: 0.3uH MAX. @ 1MHz
4.0	INTERWINDING CAPACITANCE: (P3-P2) : (J4-J5)	: 35pf MAX @ 1MHz
	(P5-P4) : (J6-J3)	: 35pf MAX @ 1MHz
	(P9-P8) : (J5-J4)	: 35pf MAX @ 1MHz
	(P10-P11) : (J2-J1)	: 35pf MAX @ 1MHz
5.0	DC RESISTANCE: (J6-J3) ; (J2-J1) ; (J7-J8) : (J4-J5)	: 1.2 ohms Max.

Bel Stewart Connector
11118 Susquehanna Trail, South
Glen Rock, Pa 17327-9199
717.234.7512

MagJack®

<http://www.stewartconnector.com>

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6.0 RETURN LOSS: 1MHz TO 30MHz	: -19dB MIN.
30MHz TO 60MHz	: -13dB MIN.
60MHz TO 80MHz	: -12dB MIN.
80MHz TO 100MHz	: -10dB MIN.
7.0 DIELECTRIC WITHSTAND: (J1,J2) TO (P10,P11) ; (J5,J4) TO (P3-P2)	: 1500 VAC
(J3,J6) TO (P5,P4) ; (J8,J7) TO (P9, P8)	: 1500 VAC
8.0 INSERTION LOSS: RS=RL=100 ohms 100KHz TO 125MHz	: -1.1 dB TYP
9.0 RISE TIME: RS=100 OHMS AND RL = 100 OHMS OUTPUT VOLTAGE = 1 V peak PULSE WIDTH= 112nS	: 3.0 nS MAX : 3.0 nS MAX
10.0 CROSS TALK: 1-100 MHz	: $-[33-20 \log (\frac{F}{50 \text{ MHz}})] \text{ MIN.}$
11.0 COMMON TO COMMON MODE ATTENUATION: 1MHz TO 100MHz	: -35dB TYP

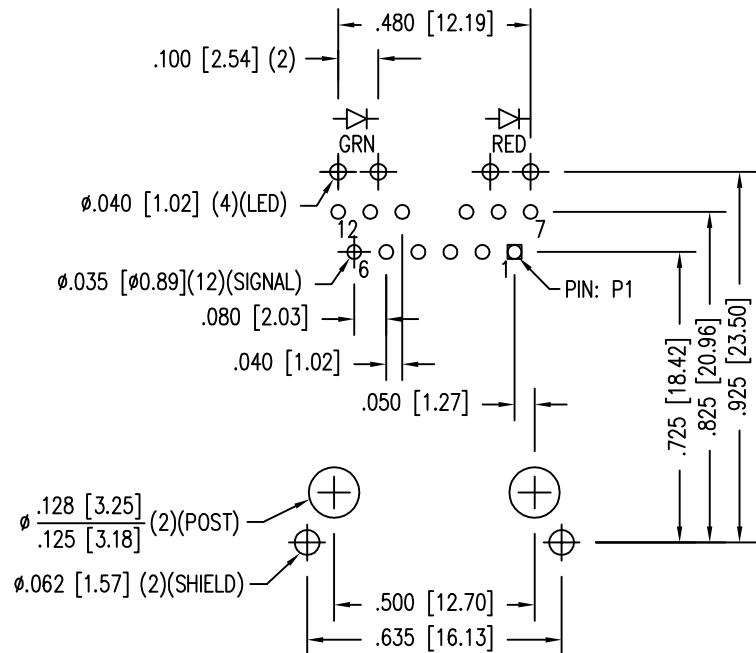
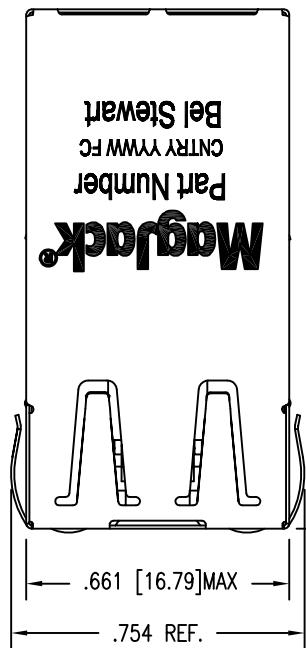
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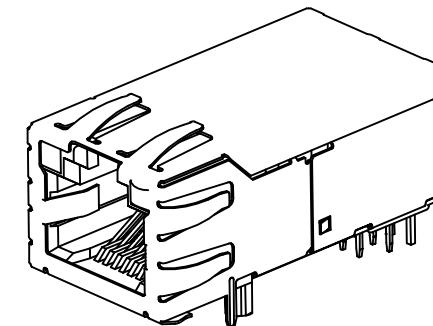
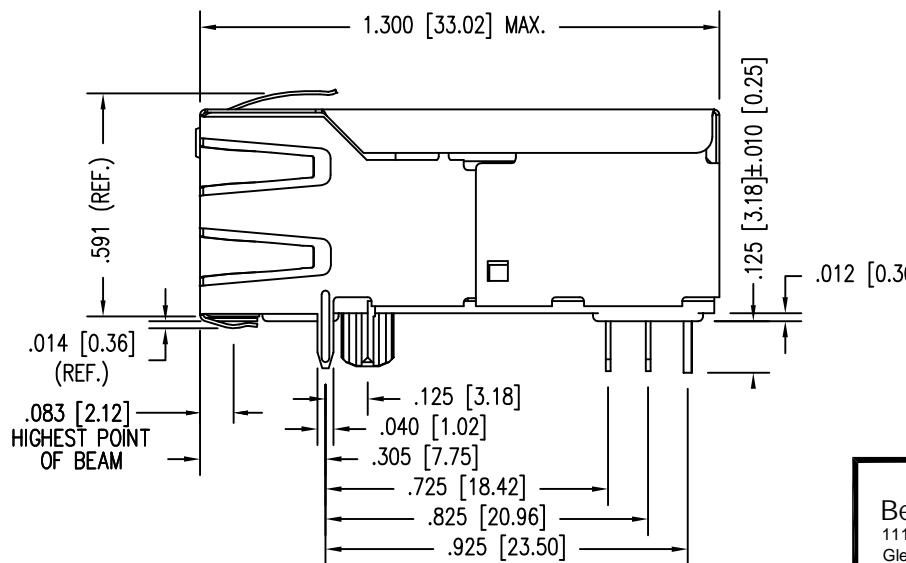
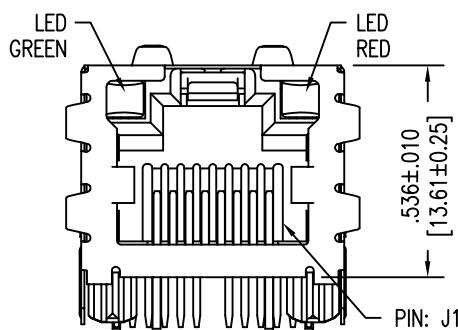
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SHEET 2 OF 4	DRAWING NO. SI-50089	REV. 10
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P.C.B. RECOMMENDED HOLE LAYOUT
SEEN FROM COMPONENT SIDE
TOLERANCE $\pm .003$ [0.08] UNLESS OTHERWISE SPECIFIED



NOTES:

1. CONNECTOR MATERIALS:
HOUSING: THERMOPLASTIC UL94 V-0
CONTACT/SHIELD: COPPER ALLOY
SHIELD PLATING: NICKEL OR TIN
CONTACT PLATING: SELECTIVE GOLD,
50 MICRO-INCHES MIN. IN CONTACT AREA.
2. PIN NOT ELECTRICALLY CONNECTED MAYBE OMITTED.
SEE ELECTRICAL DRAWING FOR OMITTED PINS.
3. TOLERANCES COMPLY WITH F.C.C. DIMENSION REQUIREMENTS.
4. THE SUGGESTED PANEL OPENING IS INTENDED TO GIVE
USER THE ABILITY TO HAVE REASONABLE JACK/PANEL
CLEARANCES, YET MAINTAIN GROUNDING CAPABILITY.
5. SOLDER REFLOW COMPATABLE - 230°C/90 SEC MAX.

STANDARD LED	WAVELENGTH	* Forward V (MAX)	(TYP)
RED	625 nm	2.5 V	2.1 V
GREEN	565 nm	2.5 V	2.2 V

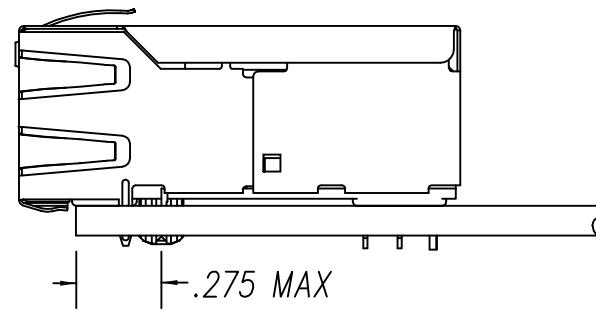
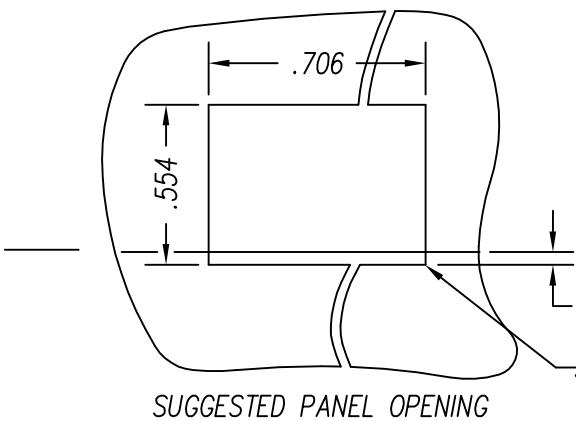
* WITH A FORWARD CURRENT OF 20 mA

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THE SUGGESTED PANEL OPENING IS INTENDED TO GIVE THE USER THE ABILITY TO HAVE REASONABLE JACK / PANEL CLEARANCES YET MAINTAIN RELIABLE GROUNDING CAPABILITY.

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SHEET
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DRAWING NO.

SI-50089 02