

ELECTRICAL SPECIFICATIONS:

- 1.0 TURNS RATIO: (P6-P5-P4) : (J6-J3) : 1CT : 1CT ± 3%  
 (P3-P2-P1) : (J2-J1) : 1CT : 1CT ± 3%
- 2.0 INDUCTANCE: (P6-P4) : 350uH MIN. @ 0.1V, 100KHz, 8mA DC Bias  
 (P3-P1) : 350uH MIN. @ 0.1V, 100KHz, 8mA DC Bias
- 3.0 LEAKAGE INDUCTANCE: P6-P4 (WITH J6 AND J3 SHORT) : 0.3 MAX. @ 1MHz  
 P3-P1 (WITH J2 AND J1 SHORT) : 0.3 MAX. @ 1MHz
- 4.0 INTERWINDING CAPACITANCE: (P6,P5,P4) TO (J6,J3) : 30pf MAX @ 1MHz  
 (P3,P2,P1) TO (J2,J1) : 30pf MAX. @ 1MHz
- 5.0 DC RESISTANCE: (J6-J3)=(J2-J1) : 1.2 ohms Max.

NOTES

1.0 PINS WITHOUT ELECTRICAL CONNECTION ARE OMITTED.

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

**MagJack®**

<http://www.stewartconnector.com>

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SHEET 1 OF 3

DRAWING NO. SI-46001 REV. 04

6.0 RETURN LOSS:  $\langle P6-P4 \rangle = 100 \text{ OHMS}$  AND  $\langle P1-P3 \rangle = 100 \text{ OHM REF.}$   
 1MHz TO 30MHz : 18dB MIN.  
 60MHz TO 80MHz : 12dB MIN.

NOTE: 100 OHMS CONNECTED TO  $\langle J2-J1 \rangle$  OR  $\langle J6-J3 \rangle$ .

7.0 VOLTAGE WITHSTAND:  
 $\langle J1, J2 \rangle$  TO  $\langle P1, P3 \rangle$  : 1500 VAC  
 $\langle J3, J6 \rangle$  TO  $\langle P4, P6 \rangle$  : 1500 VAC

8.0 INSERTION LOSS:  $RS=RL=100 \text{ ohms}$   
 100KHz TO 100MHz 1.1 dB TYP

9.0 RISE TIME:  $RS=100 \text{ OHMS}$  AND  $RL = 100 \text{ OHMS}$   
 OUTPUT VOLTAGE = 1 V peak 3.0 nS MAX  
 PULSE WIDTH= 112nS 3.0 nS MAX

10.0 CROSS TALK:  
 1MHz TO 100MHz 40 dB TYP

11.0 COMMON TO COMMON MODE ATTENUATION:  
 30MHz TO 100MHz 35dB TYP

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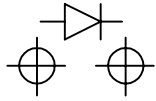
SHEET 2 OF 3

DRAWING NO.

SI-46001

REV. 04

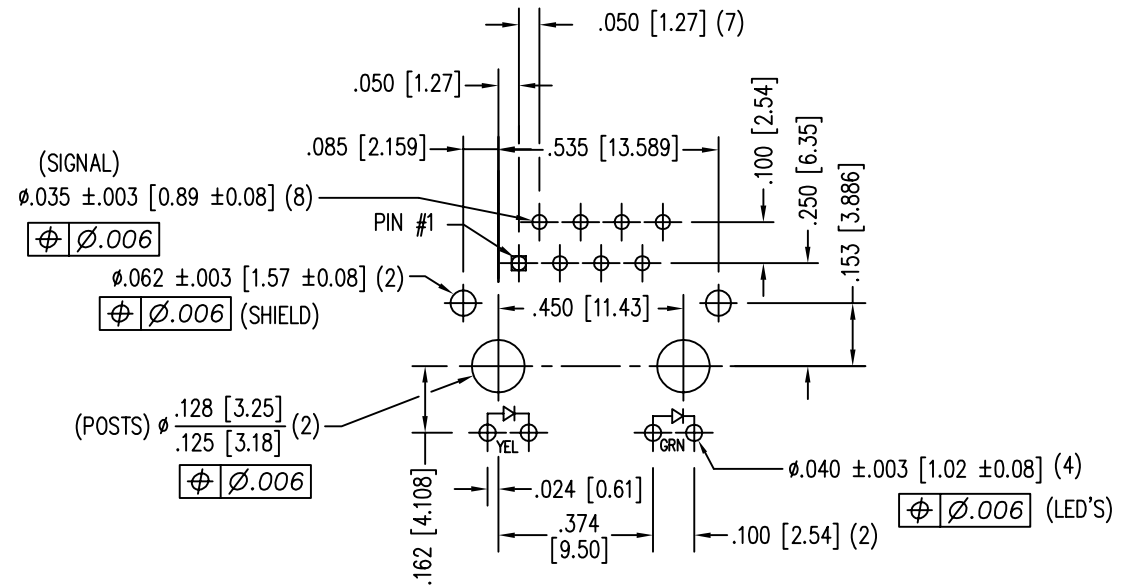
LED POLARITY  
(ENLARGED VIEW)



SINGLE COLOR LED

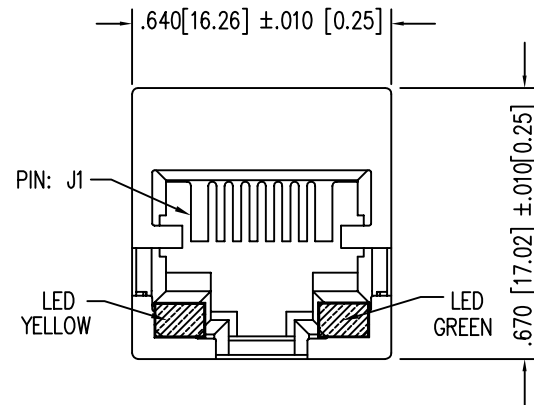
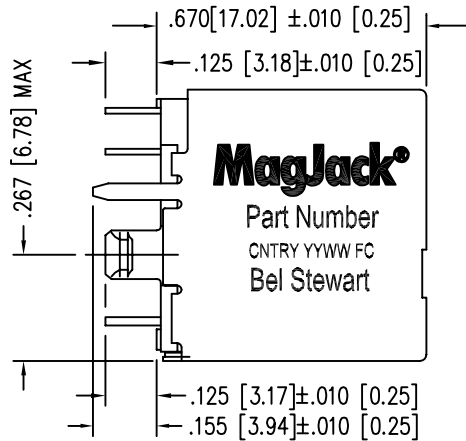
LED SPECIFICATION			
STANDARD LED	WAVELENGTH	FORWARD V (MAX)	*(TYP)
GREEN	565 nm	2.5 V	2.2 V
YELLOW	590 nm	2.5 V	2.1 V

\*WITH A FORWARD CURRENT OF 20 mA (TYP)



P.C.B. RECOMMENDED HOLE LAYOUT  
SEEN FROM COMPONENT SIDE

ALL CENTERLINE DIMENSIONS ARE BASIC.



NOTES:

- 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.
- PIN NOT ELECTRICALLY CONNECTED MAYBE OMITTED.  
SEE ELECTRICAL DRAWING FOR OMITTED PINS.
- TOLERANCES COMPLY WITH F.C.C. DIMENSION REQUIREMENTS.
- ALL TOLERANCES NOT OTHERWISE SPECIFIED TO BE ±.005 [0.13]
- WAVE SOLDER COMPATIBLE - PREHEAT 125°C/90SECS.

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SHEET  
3 OF 3

DRAWING NO. SI-46001 REV. 04