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PATENTED: THIS PRODUCT IS COVERED BY U.S. PATENT 5,736,910

DOCUMENT / PART NO.: SI-46004-F

TITLE: 10/100BT, TAB UP, SHIELDED

ISSUE	DESCRIPTION OF CHANGE				ı	REVIEWED BY			Al	APPROVED BY			ECN	l#			
A0	Use new format and production release					David Chan			D	Danny Kwan			062	52			
A1	Update circuit drawing and use new format						Bain Liu			S	Steve Weller			063	89		
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PAGE	1	2	3													11	
REV.	A1	 A1	A1			 											
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	•					•							•			E 4 OF	

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## ELECTRICAL CHARACTERISTICS @ 25°C

CURRENT CAPABILITY FOR POWER LINES: 400 mA MAX PINS SCHEMATIC **RJ45** 1.0 INDUCTANCE: (P4-P6) 350uH MIN. @ 0.1V, 100KHz, 8mA DC BIAS (P1-P3) 350uH MIN. @ 0.1V, 100KHz, 8mA DC BIAS TD+ P1 J1 TX+ 2.0 TURNS RATIO:  $\cdots$ TCT P2 (P4-P5-P6): (J3-J6) 1CT: 1CT ± 3% (P1-P2-P3): (J1-J2) 1CT: 1CT ± 3% TD- P3 J2 TX-3.0 LEAKAGE INDUCTANCE: P4-P6 (WITH J3 AND J6 SHORT) J3 RX+ RD+ P4 0.3 uH MAX. @ 1MHz 0.3 uH MAX. @ 1MHz P1-P3 (WITH J1 AND J2 SHORT)  $\cdots$ TCT P5 4.0 INTERWINDING CAPACITANCE: (P4,P5,P6) TO (J3,J6) 30pF MAX. @ 1 MHz RD-P6 J6 RX-(P1,P2,P3) TO (J1,J2) 30pF MAX. @ 1 MHz **POWER** 5.0 DC RESISTANCE: P9 J5 (J3-J6)=(J1-J2)1.2 OHMS MAX. J7 6.0 RETURN LOSS: (P4-P6)=100 OHMS AND (P1-P3)=100 OHM REF. **POWER** P10 1MHz TÓ 30MHz -18dB MIN. J8 60MHz TO 80MHz -12dB MIN. NOTE: 100 OHMS CONNECTED TO (J1-J2) OR (J3-J6). 7.0 DIELECTRIC WITHSTAND: (J1, J2) TO (P1, P3) 1500 VAC (J3, J6) TO (P4,P6) 1500 VAC 2X 75 OHMS 8.0 INSERTION LOSS: RS=RL=100 ohms 100KHz TO 100MHz -1.1 dB 1000pF 2kV 9.0 RISE TIME: RS=100 OHMS AND RL = 100 OHMS OUTPUT VOLTAGE = 1 V peak 3.0 nS MAX Р7

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

TITLE

11.0 COMMON TO COMMON MODE ATTENUATION:

PULSE WIDTH= 112nS

30MHz TO 100MHz -35dB TYP

3.0 nS MAX

NOTES					
1.0 PINS	WITHOUT	ELECTRICAL	CONNECTION	ARE	OMITTED

ORIGINATED BY	DATE
Bain Liu	2013-01-09
DRAWN BY	DATE
Duan Jun	2013-01-09

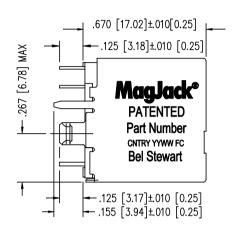
10/100BT **VERTICAL, SHIELDED** 

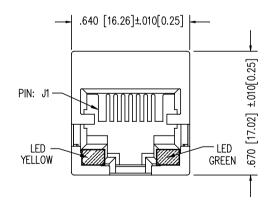
PATENTED

PART NO. / DRAWING NO.	STANDA	RD DIM.	[] METRIC DIM. AS REFERENCE			
SI-46004-F	TOL. IN INCH		UNIT : INCH [mm]	REV.: A1		
FILE NAME	.X		SCALE: N/A	SIZE: A4		
SI-46004-F.DWG	.xx		GCALL . N/A	SILL . AT		
31-40004-F.DVVG	.XXX.	±0.005	$\begin{array}{c c} & & \\ \hline \end{array}$	PAGE: 2		

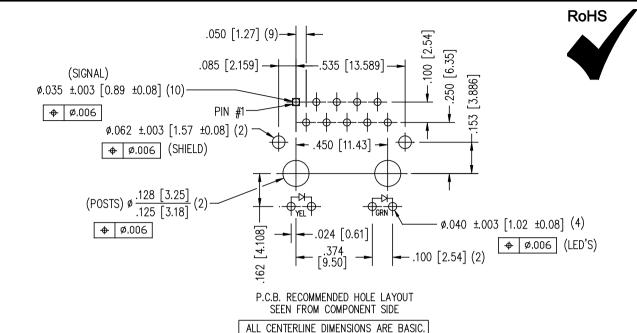


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TITLE



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)

## NOTES:

1. CONNECTOR MATERIALS:

HOUSING: THERMOPLASTIC UL94 V-0 CONTACT/SHIELD: COPPER ALLOY SHIELD PLATING: NICKEL OR TIN

CONTACT PLATING: 50 MICRO-INCH SELECTIVE HARD GOLD PLATING

OR EQUIVALENT IN CONTACT AREA

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

ORIGINATED BY	DATE
Bain Liu	2013-01-09
DRAWN BY	DATE
Duan Jun	2013-01-09

MagJack®
10/100BT
VERTICAL, SHIELDED
PATENTED

PART NO. / DRAWING NO. STANDARD DIM. [] METRIC DIM. AS REFERENCE SI-46004-F **TOL. IN INCH** UNIT: INCH [mm] REV.: **A1** X. **FILE NAME** SCALE: N/A SIZE: A4 XX. SI-46004-F.DWG PAGE: 3 XXX. ±0.005

