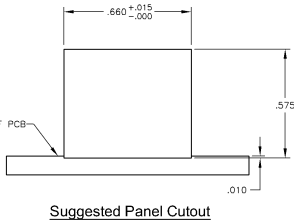
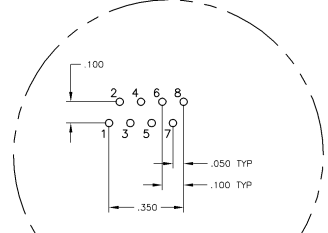
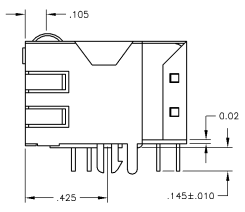
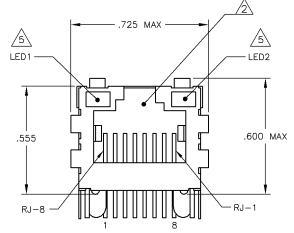
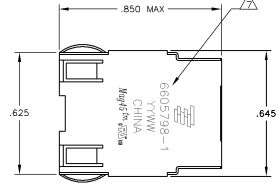
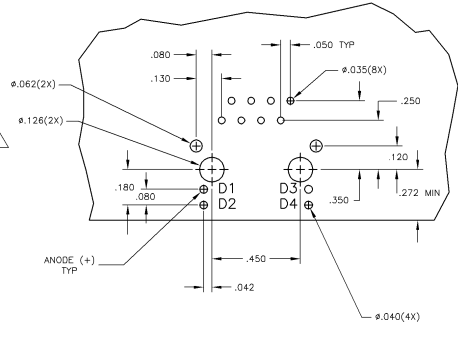
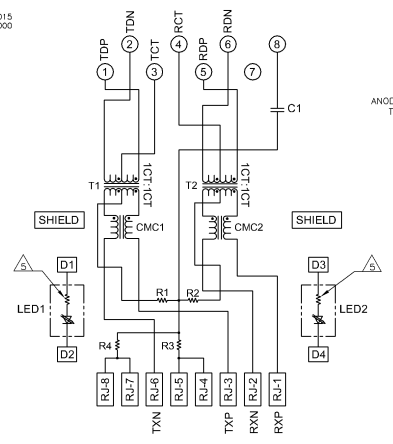


**MECHANICAL:**



**ELECTRICAL:**  
766 SERIES MAGNETIC CIRCUIT



- NOTES:
- MATERIALS:
    - HOUSING - THERMOPLASTIC PET POLYESTER FLAMMABILITY RATING UL 94V-0.
    - SHIELD - .010" THICK, C26800 BRASS PREPLATED WITH 30μINCH MIN SEMI-BRIGHT NICKEL. SOLDER TABS POST DIPPED WITH 100μINCH MIN SAC SOLDER.
    - MOD JACK CONTACTS - 0.0157" x 0.018" PHOSPHOR BRONZE, 50μINCH MIN OVERALL NICKEL UNDERPLATE, WITH SELECT 50μINCH MIN HARD GOLD FINISH PLATE.
    - SOLDER TAILS WITH 100μINCH MIN MATTE TIN AND/OR SAC SOLDER DIP.
    - LIGHT EMITTING DIODE(LED) - DIFFUSED EPOXY LENS, .020" x .020" CARBON STEEL WIREFRAME LEADS PRE-PLATED WITH 80μINCH SILVER OVER 40μINCH NICKEL UNDERPLATE OVER 40μINCH COPPER UNDERPLATE, POST-PLATED WITH 100μINCH MIN MATTE TIN AND/OR SAC SOLDER DIP OR PURE TIN SOLDER DIP.
  - RJ45 JACK CAVITY CONFORMS TO FCC RULES AND REGULATIONS PART 68, SUB PART F.
  - MAGNETICS:
    - IMPEDANCE: 100 OHMS
    - RETURNS RATIO (CHP-CABLE): TX = 11, RX = 11
    - OPEN CIRCUIT INDUCTANCE (OCL): 350mH MIN @100kHz, 0.1VRMS, 80mVDC BIAS FROM 0° TO 70°, TX AND RX
    - PERFORMANCE @ 25°C:
      - INSERTION LOSS (IL): 1.1dB MAX FROM 0.5MHz TO 100MHz
      - RETURN LOSS (RL): 18dB MIN FROM 0.5MHz TO 30MHz
      - 18-20LOG(f/30dB) MIN FROM 30MHz TO 60MHz
      - 12dB MIN FROM 60.1MHz TO 80MHz
      - CROSSTALK ATTENUATION: 35dB MIN FROM 0.5MHz TO 40MHz
      - 33-20+LOG(f/50dB) MIN FROM 40.1MHz TO 100MHz
      - COMMON MODE REJECTION RATIO (CMRR): 30dB MIN FROM 0.5MHz TO 100MHz
      - ISOLATION VOLTAGE: COMPLIES WITH IEEE802.3 2002, PARA 23.5.11, ITEM b.
  - OPERATING TEMPERATURE FROM 0° - +70°C.

- THE 250 OHM LED RESISTORS ARE OPTIONAL, PLEASE SEE CHART FOR PRESENCE OR ABSENCE OF LED RESISTORS. IF THE LED WITHOUT 250 OHM RESISTORS, LED IS DRIVEN WITH CONSTANT CURRENT AT APPROX 20mA.
- LED COLOR: DOMINANT WAVELENGTH (λD): GREEN 568 nm TYP. at IF=20mA
- FORWARD VOLTAGE (VF): GREEN 2.2V TYP. at IF=20mA
- DOMINANT WAVELENGTH (λD): YELLOW 588 nm TYP. at IF=20mA
- FORWARD VOLTAGE (VF): YELLOW 2.1V TYP. at IF=20mA
- IF THE LED WITH 250 OHM RESISTORS, LED IS DRIVEN WITH 5V VOLTAGE AND THE MAX OPERATING CURRENT IS 20mA.
- LED COLOR: DOMINANT WAVELENGTH (λD): GREEN 568 nm TYP. at VF=5V
- FORWARD CURRENT (IF): GREEN 12 mA TYP. at VF=5V
- DOMINANT WAVELENGTH (λD): YELLOW 588 nm TYP. at VF=5V
- FORWARD CURRENT (IF): YELLOW 13 mA TYP. at VF=5V
- INDICATED CONNECTIONS ARE FOR HUB CONFIGURATION. THE MAGNETICS ARE SYMMETRICAL, AND ARE AUTO-MDIX/MDIX CAPABLE.
- TYCO ELECTRONICS LOGO, PART NUMBER, DATE CODE, COUNTRY OF ORIGIN AND AGENCY APPROVAL MARKING IN APPROXIMATE LOCATION SHOWN.
- THESE PARTS ARE RECOMMENDED FOR WAVE SOLDERING PROCESS. PREHEAT TEMPERATURE IS 120°C TO 160°C, 120 SECONDS TO 180 SECONDS, PEAK WAVE SOLDERING TEMPERATURE IS 260°C MAX, 10 SECONDS MAX.

YES	GREEN	YES	GREEN	YES	6-6605798-1
YES	GREEN	NO	YELLOW	NO	5-6605798-8
YES	GREEN	NO	GREEN	NO	5-6605798-7
YES	GREEN	YES	YELLOW	YES	5-6605798-1
NO	GREEN	YES	YELLOW	YES	6605798-1

SKV DECOUPLING CAPACITOR	LED1	250 OHMS RESISTOR	LED2	250 OHMS RESISTOR	PART NUMBER
THIS DRAWING IS A CONTROLLED DOCUMENT.					
REVISED BY		DATE	DESCRIPTION	BY	
1		108-2100	1X1 MAG45(TM) MODULAR JACK, 7H2	TYCO Electronics Corporation	
2			SCHMATIC, 766 SERIES MAGNETIC CIRCUIT, SHIELDED,	Grouping Code	
3			OPTIONAL DECOUPLING CAPACITOR, WITH LEDS		
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C1=1000pF, 2KV DECOUPLING CAPACITOR  
R1-R4 = 75 OHMS, 1/16 W RESISTORS