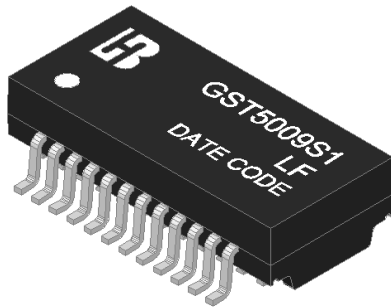


**Feature**



- Designed for Ethernet 100/1000 BASE-T, full duplex applications.
- IEEE 802.3ab complying performance.
- Cable interface for isolation and low common mode emissions.
- K21 Surge compliant : @CWG (1.2/50us, 8/20us, 2.5KV Max).
- Complying with ROHS & Halogen Free requirements.
- Operating temperature range: 0°C to +70°C.
- Storage temperature range: -25°C to +85°C.

**Electrical Specifications @ 25°C**

| Part Number  | Turns Ratio (±5%) |         | OCL (uH Min)<br>@100KHz/0.1V<br>with 8mA DC Bias | L.L (uH Max) | C <sub>ww</sub> (pF Max) | DCR (Ω Max) | HI-POT      |
|--------------|-------------------|---------|--|--------------|--------------------------|-------------|-------------|
|              | TX                | RX      |  |              |                          |             |             |
| GST5009S1 LF | 1CT:1CT           | 1CT:1CT | 350  | 0.5          | 28                       | 1.2         | AC1500V/1mA |

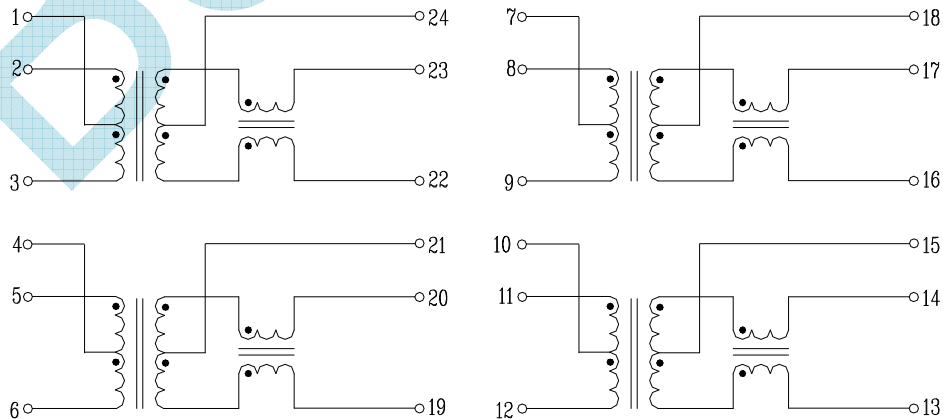
**Continue**

| Part Number  | Insertion Loss (dB Max) | Return Loss (dB Min)@ Load 100Ω |         |        |       |          |
|--------------|-------------------------|---------------------------------|---------|--------|-------|----------|
|              |                         | 1-100MHz                        | 1-30MHz | 40MHz  | 50MHz | 60-80MHz |
| GST5009S1 LF | -1.0                    | -18                             | -16     | -14.08 | -12.5 | -10      |

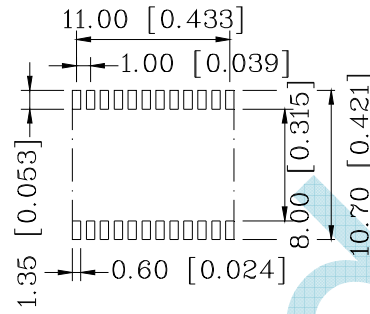
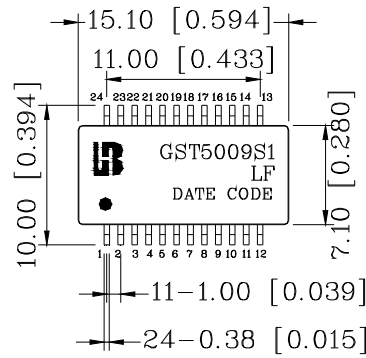
**Continue**

| Part Number  | Cross talk (dB Min) |       |        | DCMR (dB Min) |       |        |
|--------------|---------------------|-------|--------|---------------|-------|--------|
|              | 30MHz               | 60MHz | 100MHz | 30MHz         | 60MHz | 100MHz |
| GST5009S1 LF | -45                 | -40   | -35    | -40           | -35   | -30    |

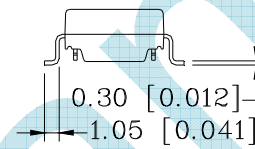
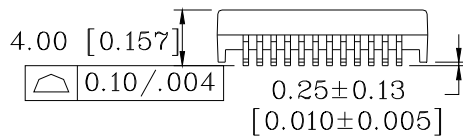
**Schematic**



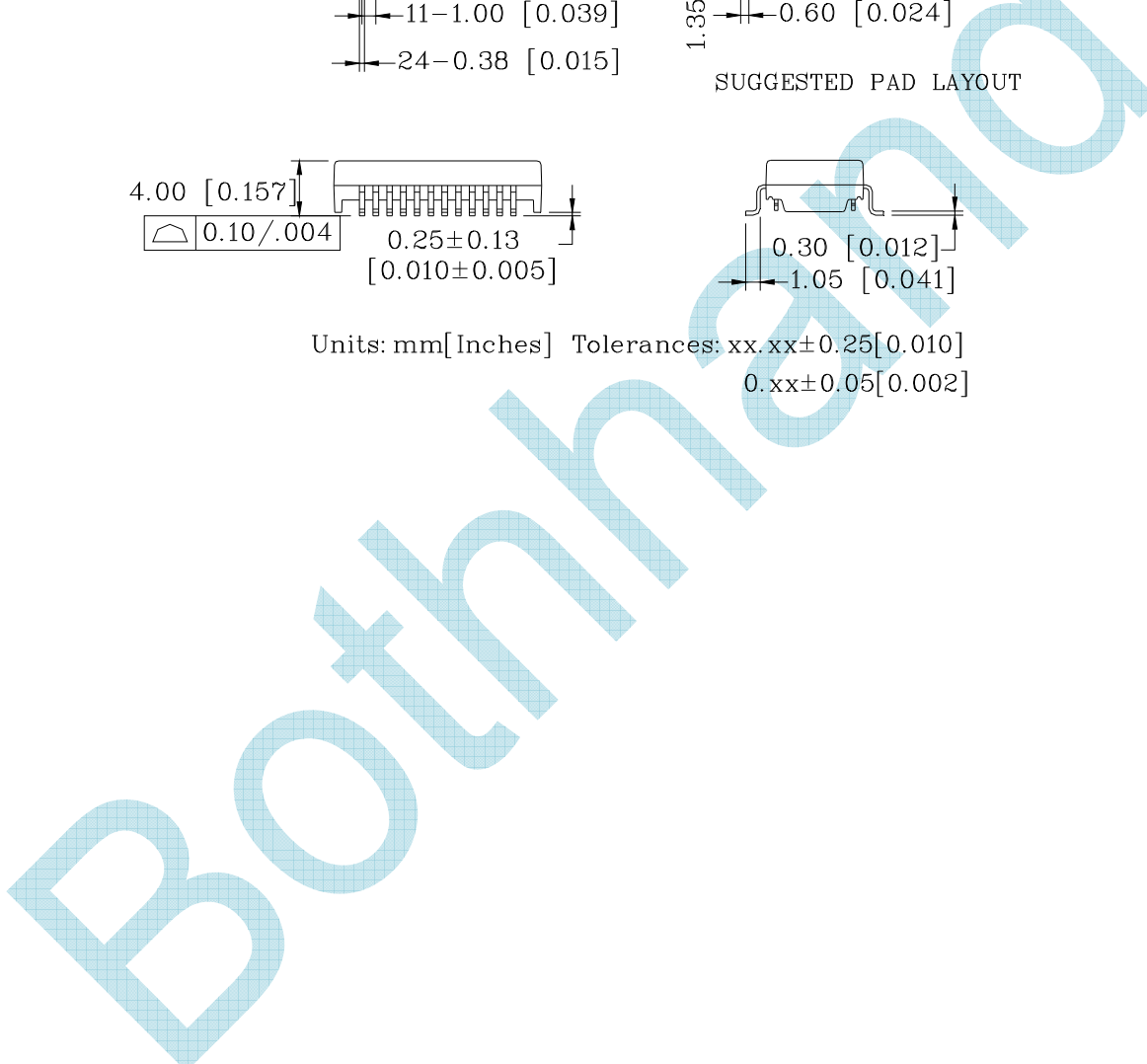
Mechanical



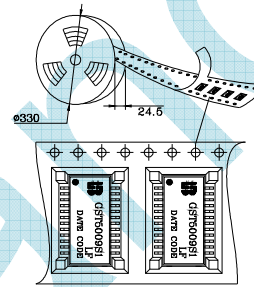
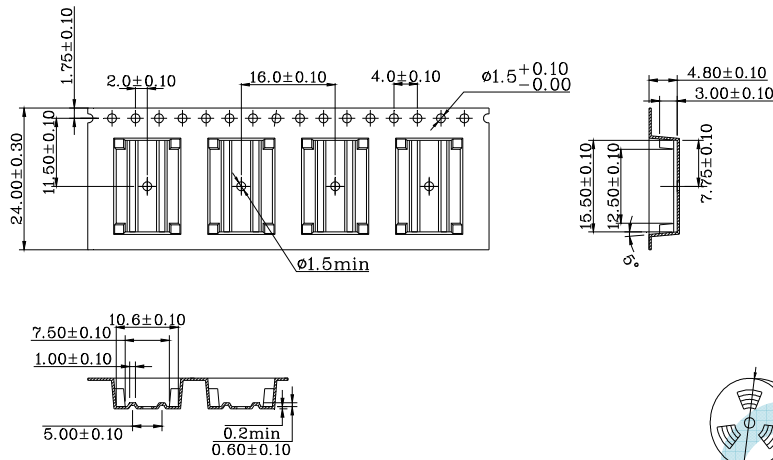
SUGGESTED PAD LAYOUT



Units: mm [Inches] Tolerances: xx.xx ± 0.25 [0.010]  
 0.xx ± 0.05 [0.002]

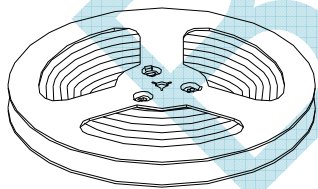


**REEL PACKAGE**

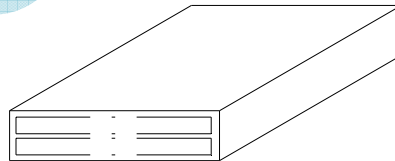


1. 10 sprocket hole pitch cumulative tolerance  $\pm 0.20$
2. Material : Black Anti-Static polystyrene.
3. All dimensions meet EIA-481-3 requirements
4. Thickness :  $0.40 \pm 0.05$
5. Component load per 13" reel : 780pcs
6. Carrier camber is within 1 mm in 250 mm
7. Packing length per 22" reel : 41.5Meters

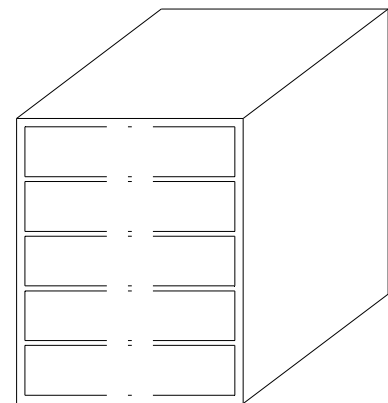
**CARTON PACKAGE**



REEL



INNER BOX: 347x347x82



OUTER CARTON: 375x375x470

1. 1 REEL=780PCS
2. 1 INNER BOX=2 REELS=1560PCS
3. 1 OUTER CARTON=5 INNER BOXES=7800PCS