

# Plug-In RF Transformer

50Ω 0.015 to 300 MHz

## T1-6T-X65+ T1-6T-X65



CASE STYLE: X65  
PRICE: \$6.95 ea. QTY (1-9)

**+RoHS Compliant**  
The +Suffix identifies RoHS Compliance. See our web site for RoHS Compliance methodologies and qualifications

### Maximum Ratings

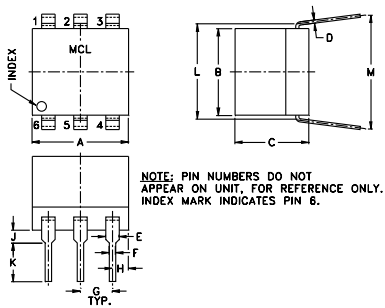
|                       |               |
|-----------------------|---------------|
| Operating Temperature | -20°C to 85°C |
| Storage Temperature   | 55°C to 100°C |
| RF Power              | 0.25W         |
| DC Current            | 30mA          |

Permanent damage may occur if any of these limits are exceeded.

### Pin Connections

|               |   |
|---------------|---|
| PRIMARY DOT   | 4 |
| PRIMARY       | 6 |
| SECONDARY DOT | 3 |
| SECONDARY     | 1 |
| SECONDARY CT  | 2 |
| NOT USED      | 5 |

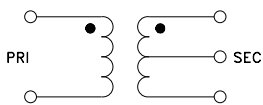
### Outline Drawing



### Outline Dimensions (inch)

| A    | B    | C    | D    | E    | F     | G    |
|------|------|------|------|------|-------|------|
| .30  | .27  | .23  | .010 | .042 | .020  | .100 |
| 7.62 | 6.86 | 5.84 | 0.25 | 1.07 | 0.51  | 2.54 |
| H    | J    | K    | L    | M    | wt    |      |
| .05  | .04  | .11  | .300 | .35  | grams |      |
| 1.27 | 1.02 | 2.79 | 7.62 | 8.89 | 0.50  |      |

### Config. A



### Features

- wideband, 0.015 to 300 MHz
- excellent return loss
- also available with flat-pack (W38) & surface mount gull-wing (KK81) leads

### Applications

- VHF/UHF receivers/transmitters
- impedance matching

### Transformer Electrical Specifications

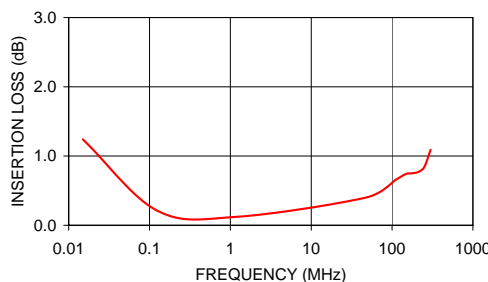
| Ω RATIO | FREQUENCY (MHz) | INSERTION LOSS* |           |          |
|---------|-----------------|-----------------|-----------|----------|
|         |                 | 3 dB MHz        | 2 dB MHz  | 1 dB MHz |
| 1       | 0.015-300       | 0.015-300       | 0.021-150 | 0.03-50  |

\*Insertion Loss is referenced to mid-band loss, 0.1 dB typ.

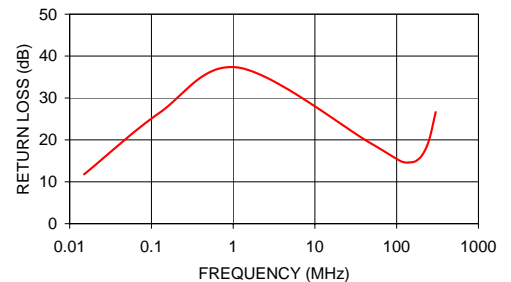
### Typical Performance Data

| FREQUENCY (MHz) | INSERTION LOSS (dB) | INPUT R. LOSS (dB) |
|-----------------|---------------------|--------------------|
| 0.02            | 1.24                | 11.77              |
| 0.13            | 0.21                | 26.45              |
| 1.15            | 0.12                | 37.26              |
| 47.47           | 0.40                | 19.27              |
| 111.99          | 0.66                | 14.92              |
| 147.83          | 0.74                | 14.64              |
| 175.75          | 0.75                | 15.08              |
| 209.75          | 0.77                | 16.64              |
| 250.25          | 0.84                | 20.06              |
| 300.00          | 1.09                | 26.64              |

T1-6T-X65  
INSERTION LOSS



T1-6T-X65  
INPUT RETURN LOSS



### Notes

- Performance and quality attributes and conditions not expressly stated in this specification document are intended to be excluded and do not form a part of this specification document.
- Electrical specifications and performance data contained in this specification document are based on Mini-Circuit's applicable established test performance criteria and measurement instructions.
- The parts covered by this specification document are subject to Mini-Circuits standard limited warranty and terms and conditions (collectively, "Standard Terms"); Purchasers of this part are entitled to the rights and benefits contained therein. For a full statement of the Standard Terms and the exclusive rights and remedies thereunder, please visit Mini-Circuits' website at [www.minicircuits.com/MCLStore/terms.jsp](http://www.minicircuits.com/MCLStore/terms.jsp)

