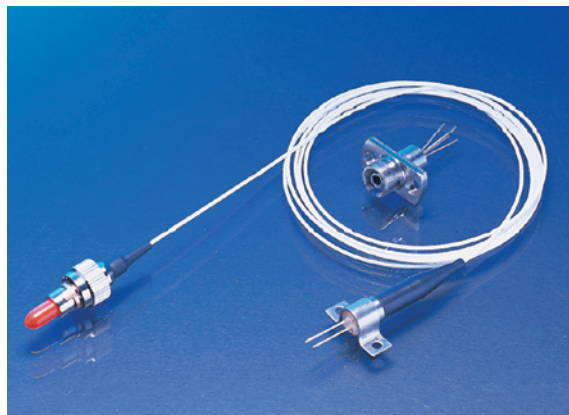


T-11-2500-R/P-XXX



Features

- InGaAs/InP PIN Photodiode with transimpedance amplifier
- High sensitivity with AGC*
- Differential ended output
- Single+5V operation
- -40 to 85°C operating temperature
- FC/ST/SC receptacle package
- SM/MM fiber pigtailed package with optional FC/ST/SC connector
- 2.5Gbps SDH/SONET/ATM receivers application

Absolute Maximum Rating (Tc=25°C)

| Parameter | Symbol | Value | Unit |
|-----------------------|-----------|------------|------|
| Supply Voltage | V_{CC} | 6 | V |
| Operating Temperature | T_{opr} | -40 to +85 | °C |
| Storage Temperature | T_{stg} | -40 to +85 | °C |

DC Electrical Characteristics(Tc=25°C)

| Parameter | Symbol | Min | Typical | Max | Unit |
|-----------------------------|----------|------|---------|------|------|
| Power Supply | V_{CC} | 4.5 | 5 | 5.5 | V |
| Differential Output Voltage | V_d | 0.22 | 0.38 | 0.57 | V |
| Supply Current (no load) | I_{CC} | - | 34 | 63 | mA |

(Operating at $V_{CC}=5V$, $T_c=25^\circ C$, $\lambda=1310nm$, 9/125 μm SM fiber)

AC/Optical and Electrical Characteristics(Tc=25°C)

| Parameter | Symbol | Min | Typical | Max | Unit | Test Condition |
|----------------------------|-----------|------|---------|------|------|--------------------------------------------------|
| Detection Range | | 1100 | 1310 | 1650 | nm | - |
| Gain @ 10Mbps Differential | G | 1.5 | 2.3 | 3.2 | V/mW | Measure differentially AC coupled $R_L=50\Omega$ |
| Bandwidth (to -3dB point) | BW | 1500 | 2000 | - | MHz | - |
| Saturation Power | P_{sat} | -3 | 0 | - | dBm | BER= 10^{-10} @2.5Gbps, PRBS23 |
| Sensitivity | Sens | - | -21 | -18 | dBm | BER= 10^{-10} @2.5Gbps, PRBS23 |
| Output Resistance | R_{out} | 48 | 50 | 52 | ohm | - |

Connector Options

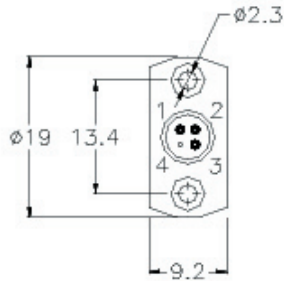
| Model | Package | Fiber | Connector |
|--------------------|------------|---------|-----------|
| T-11-2500-R-SFC | Receptacle | - | FC |
| T-11-2500-R-SST | | | ST |
| T-11-2500-R-SSC | | | SC |
| T-11-2500-P-S(M)FC | Pigtailed | SM (MM) | FC |
| T-11-2500-P-S(M)ST | | | ST |
| T-11-2500-P-S(M)SC | | | SC |
| T-11-2500-P-S(M) | | | - |

T-11-2500-R/P-XXX

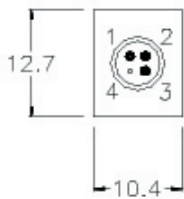
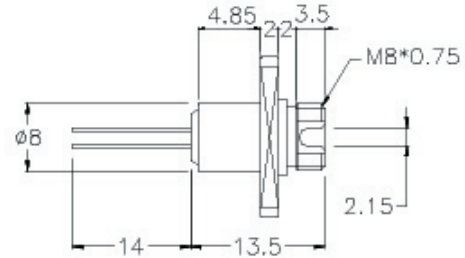
Outline drawing-Receptacle

PIN-TIA Receiver Modules-Receptacle

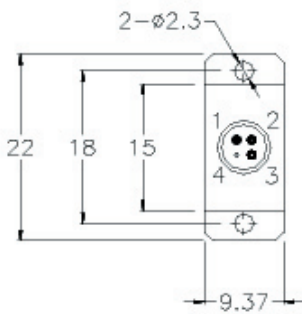
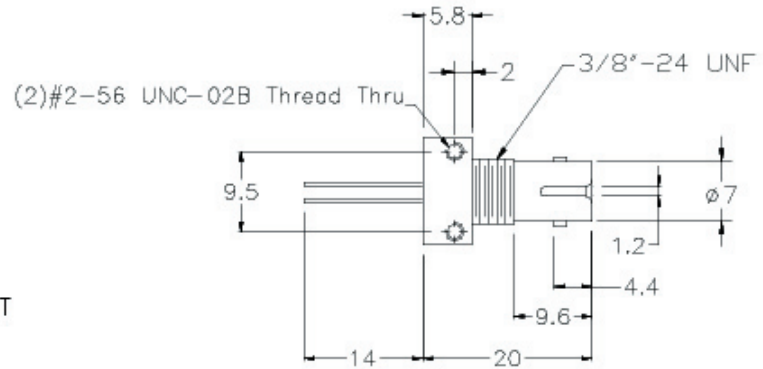
Units in mm



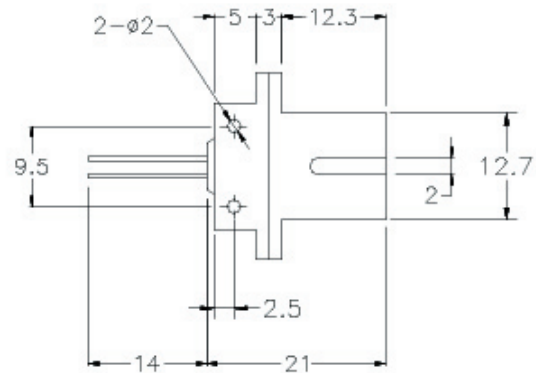
FC Receptacle
T-11-2500-R-SFC



ST Receptacle
T-11-2500-R-SST



SC Receptacle
T-11-2500-R-SSC

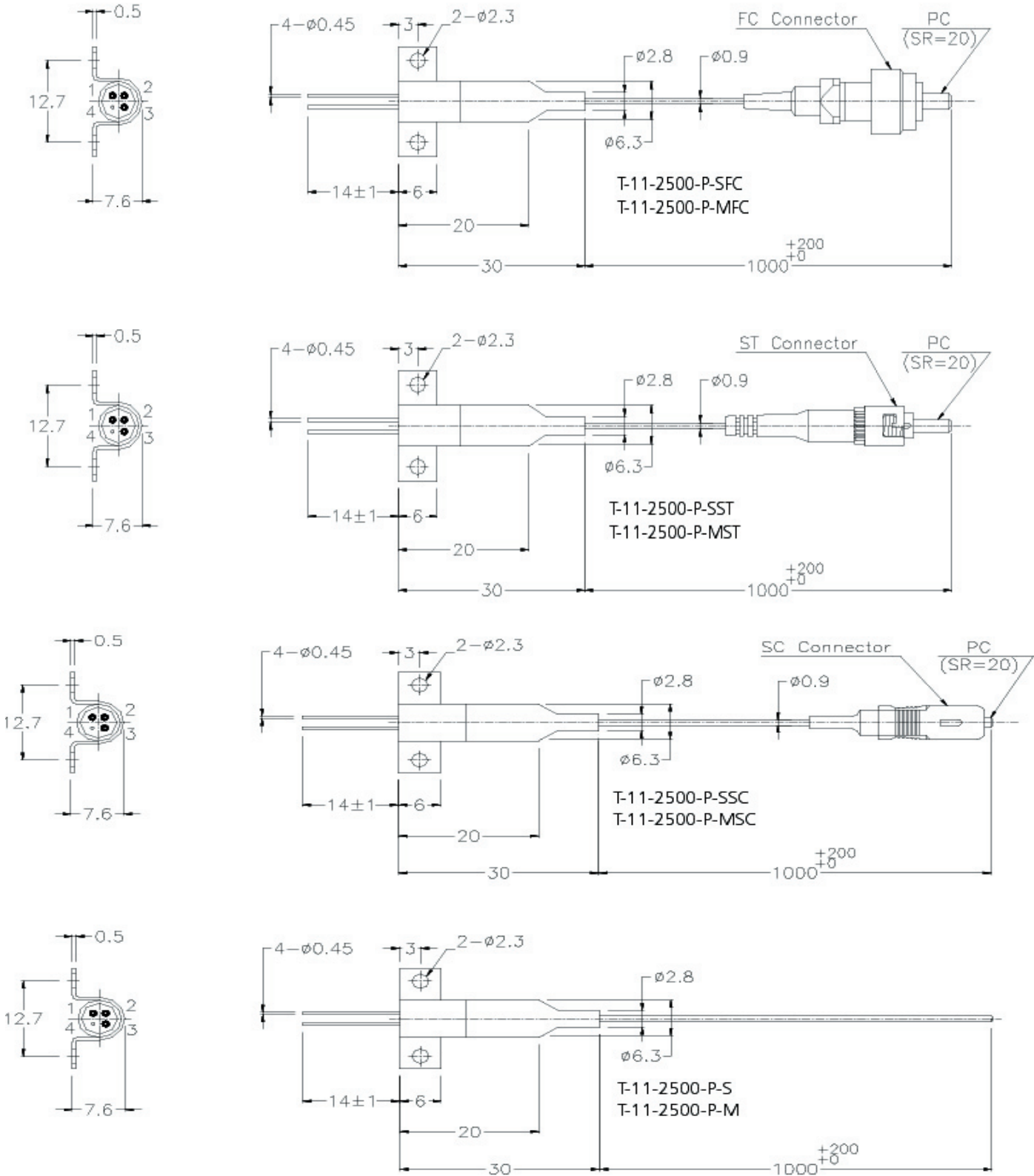


T-11-2500-R/P-XXX

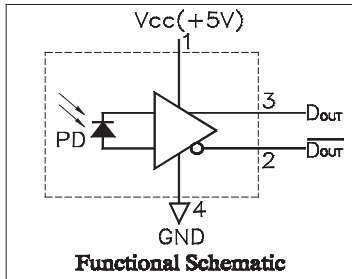
Outline drawing-Pigtailed

PIN-TIA Receiver Modules-Pigtailed

Units in mm



Pin Assignment



Pin assignment

- 1~Vcc
- 2~ \overline{Dout}
- 3~Dout
- 4~GND (CASE)

Warnings

Handling Precautions: This device is susceptible to damage as a result of electrostatic discharge (ESD). A static free environment is highly recommended. Follow guidelines according to proper ESD procedures.

Laser Safety: Radiation emitted by laser devices can be dangerous to human eyes. Avoid eye exposure to direct or indirect radiation.

Legal Notice

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