

RF Products

Pin Diode Switches



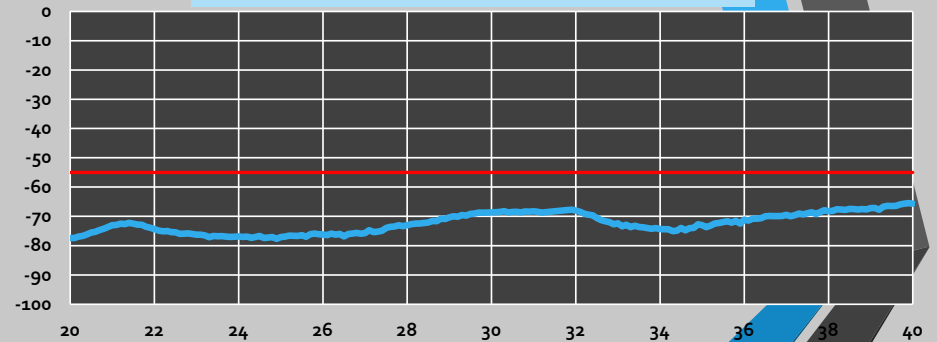
PIN DIODE RF SWITCHES

CP4 Series

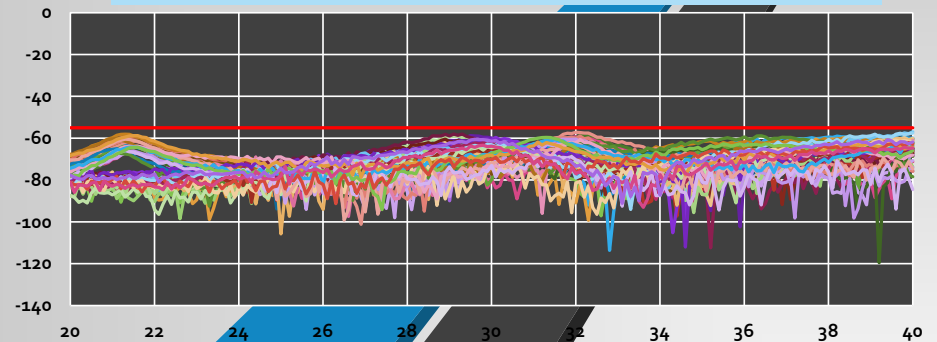
Features:

- Ultra Broadband: 0.01-50 GHz, Absorptive and Reflective available
- Narrow and Broadband frequencies up to 110GHz
- Coaxial (SMA, 2.92mm, 2.4mm) or Waveguide (WR-15, WR-12, WR-10) interfaces
- TTL Control
- Switching Speed: 200 ns
- DC BIAS: +5V/150mA, -12V/50mA (max)
- Typical RF performance characteristics (20-40 GHz, absorptive model):
 - Insertion Loss: < 5.0 dB
 - VSWR: < 2.0:1
 - Isolation: > 65 dB

CP4 Typical Isolation (20GHz to 40GHz)

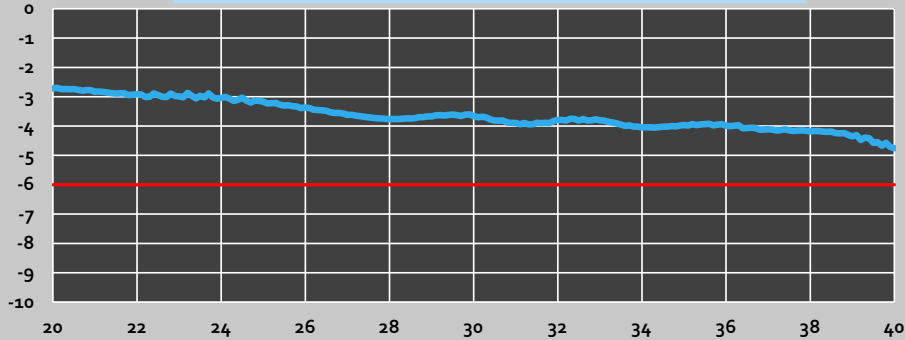


CP4 Isolation (20GHz to 40GHz)(Lot Size: 20 Switches)

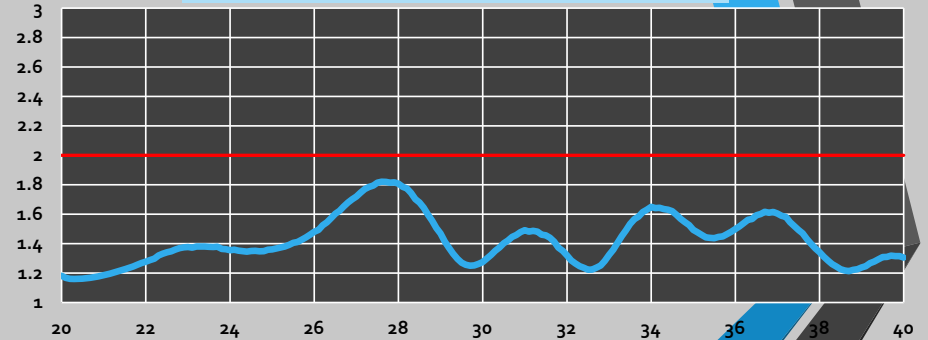


PIN DIODE RF SWITCHES

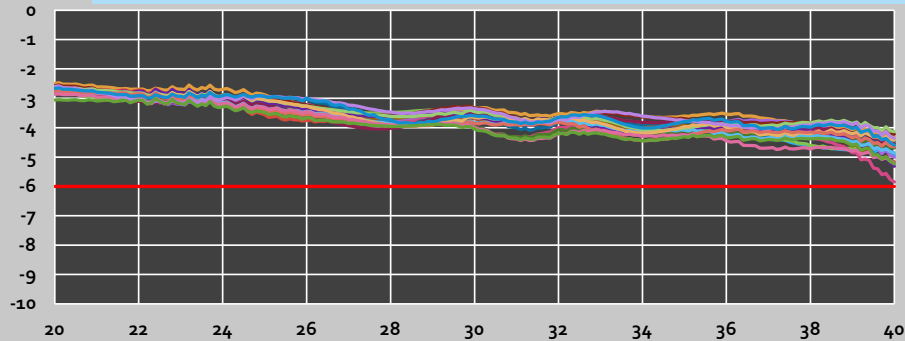
CP4 Typical Insertion Loss (20GHz to 40GHz)



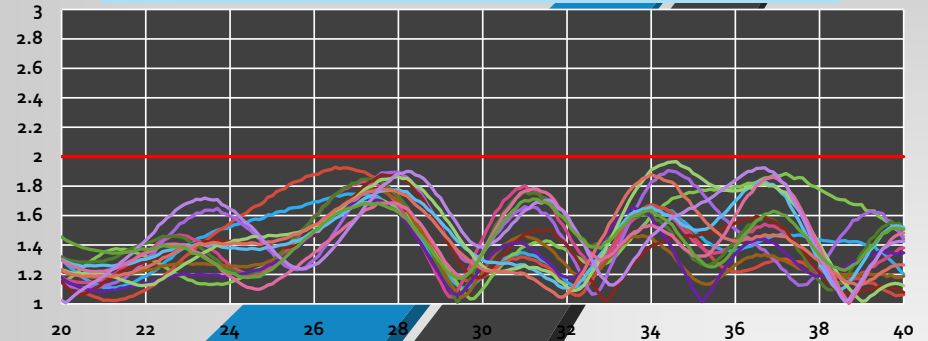
CP4 Typical VSWR (20GHz to 40GHz)



CP4 Insertion Loss (20GHz to 40GHz)(Lot Size: 20 Switches)



CP4 VSWR (20GHz to 40GHz)(Lot Size: 20 Switches)



PIN DIODE RF SWITCHES

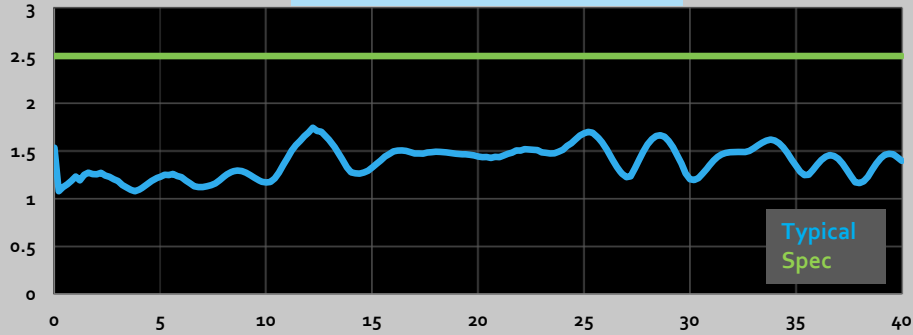
20 MHz to 40 GHz SP4T Reflective PIN Diode Switches

Features:

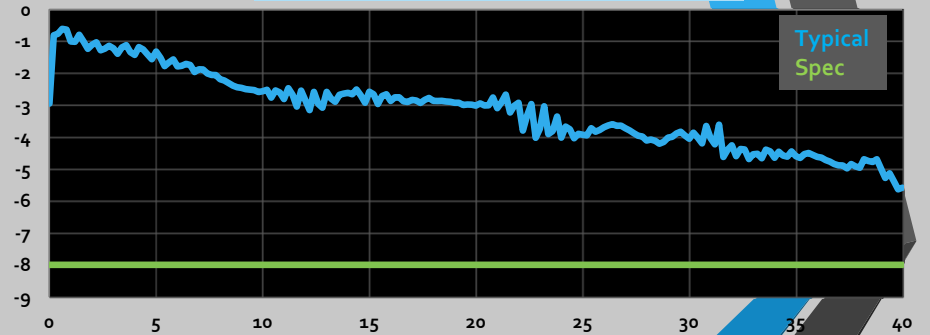
- Frequency: 20 MHz to 40 GHz
- VSWR: 2.5:1 (max)
- Insertion Loss: 7 dB (max)
- Isolation: 40 dB (min)
- Power Handling: +27 dBm destructive / +20 dBm non-degrading
- Switching Speed: 200 ns (max)
- DC Bias: +/-5V @ 100mA (typ)
- Control: TTL
- RF Connectors: 2.92 mm (f)

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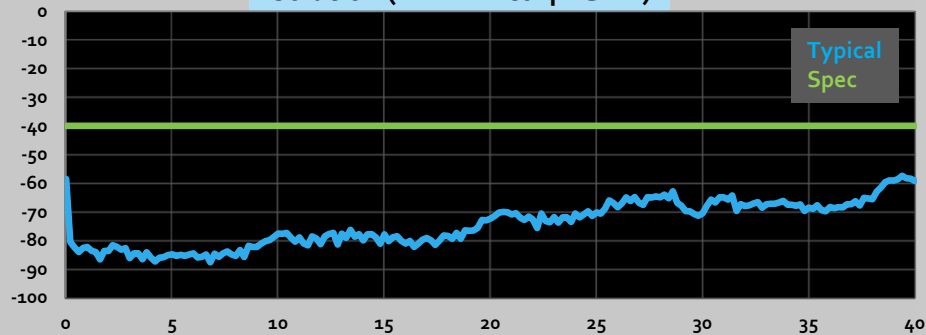
VSWR (20 MHz to 40 GHz)



Insertion Loss (20 MHz to 40 GHz)



Isolation (20 MHz to 40 GHz)



PIN DIODE RF SWITCHES

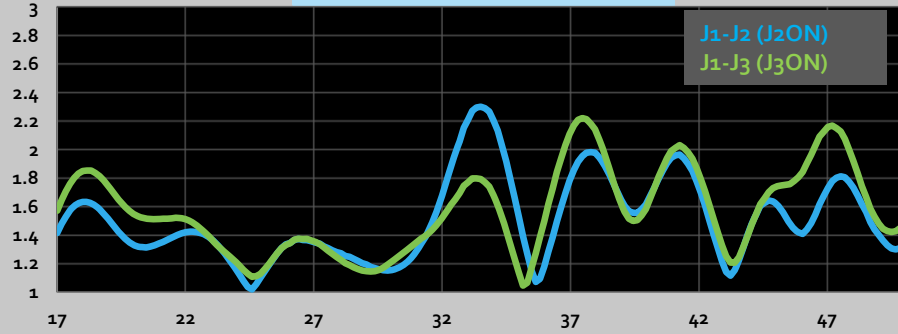
17 to 50 GHz SPDT Absorptive PIN Diode Switches

Features:

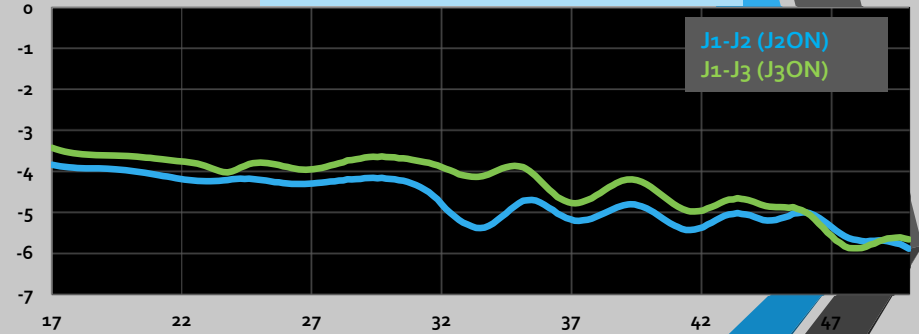
- Frequency: 17 to 50 GHz
- VSWR: 2.0:1 (goal), 2.5:1 (max)
- Insertion Loss: 4.5 dB (goal), 6.5 dB (max)
- Isolation: 60 dB (min)
- Power Handling: +27 dBm destructive / +24 dBm non-degrading
- Switching Speed: 100 ns (max)
- Voltage: +/-5V @ 50mA (typ)
- Control: TTL
- RF Connectors: 2.4 mm (f)

PIN DIODE RF SWITCHES

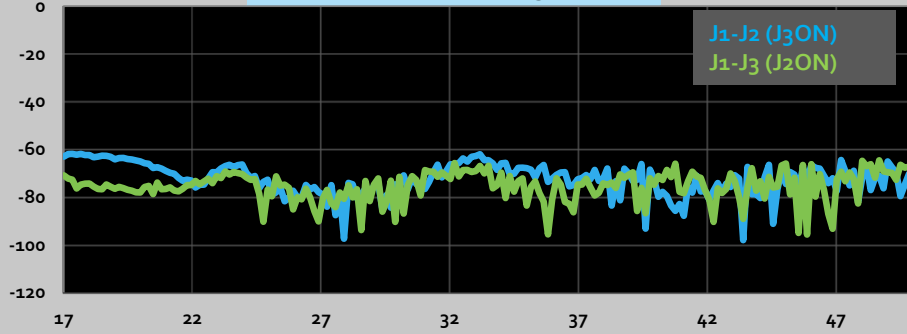
VSWR (17 GHz to 50 GHz)



Insertion Loss (17 GHz to 50 GHz)



Isolation (17 GHz to 50 GHz)



PIN DIODE RF SWITCHES

Other Options Available

- Switches can be tuned to specific frequency band or frequency range
- Insertion Loss, Isolation and VSWR (RL) requirements can be optimized to meet specific parameter
- Hermetically sealed versions available
- Other switch configurations available:
 - SPDT: CPD Series
 - SP3T to SP8T available in standard packages: CP3-CP8 Series
 - Higher throw count also available upon request