

# Two-Way Power Divider

## 10 - 2000 MHz

DS-/DSS-313

V2.00

### Features

- Fully Hermetic Package
- 0.6 dB Typical Midband Loss
- 28 dB Typical Midband Isolation
- 1.2:1 Typical Midband VSWR
- MIL-STD-202 Screening Available

### Guaranteed Specifications\* (From - 55°C to + 85°C)

| Part Number                    | DS-313      | DSS-313       |
|--------------------------------|-------------|---------------|
| Frequency Range                | 10-2000 MHz | 10 - 2000 MHz |
| Insertion Loss (Less Coupling) |             |               |
| 20-1000 MHz                    | 1.1         | 1.1 dB Max.   |
| 10 - 1500 MHz                  | 1.3         | 1.3 dB Max.   |
| 1500 - 2000 MHz                | 1.8         | 1.8 dB Max.   |
| Isolation                      |             |               |
| 20 - 1000 MHz                  | 23          | 22 dB Min.    |
| 10 - 1500 MHz                  | 18          | 18 dB Min.    |
| 1500 - 2000 MHz                | 12          | 12 dB Min.    |
| Amplitude Balance              |             |               |
| 20 - 1000 MHz                  | 0.3         | 0.3 dB Max.   |
| 10 - 1500 MHz                  | 0.4         | 0.4 dB Max.   |
| 1500 - 2000 MHz                | 0.6         | 0.6 dB Max.   |
| Phase Balance                  |             |               |
| 20 - 1000 MHz                  | 4°          | 5° Max.       |
| 10 - 1500 MHz                  | 6°          | 8° Max.       |
| 1500 - 2000 MHz                | 8°          | 11° Max.      |
| VSWR(All Ports)                |             |               |
| 20 - 1000 MHz                  | 1.5         | 1.5 Max.      |
| 10 - 1500 MHz                  | 1.6         | 1.6 Max.      |
| 1500 - 2000 MHz                | 1.8         | 1.8 Max.      |

### Operating Characteristics

|                                     |                 |
|-------------------------------------|-----------------|
| Impedance                           | 50 Ohms Nominal |
| Maximum Power Rating or Input Power | 250 mW Max.     |
| Internal Load Dissipation           | 50 mW Max.      |

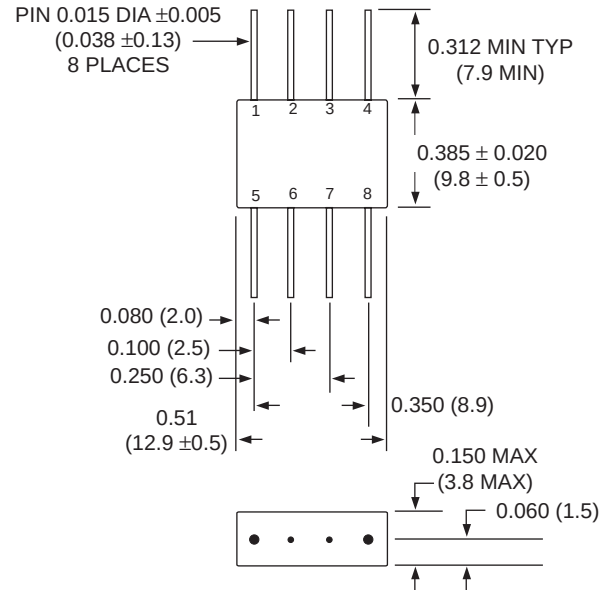
\*All specifications apply with 50 ohm source and load impedance.

### Pin Configuration

| Part Number | DS-313 | DSS-313 |
|-------------|--------|---------|
| Σ           | P1     | P1      |
| Output C    | P4     | P2      |
| Output D    | P8     | P4      |

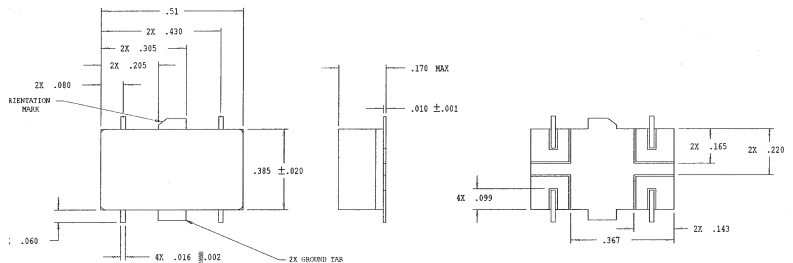
Case and all other pins are ground.

### FP-2



Dimensions in ( ) are in mm.  
 Unless Otherwise Noted: .xxx = ±0.010 (.xx = ±0.25)  
 .xx = ±0.02 (.x = ±0.5)  
 WEIGHT (APPROX.): 0.09 OUNCES 2.5 GRAMS

### SF-1



Dimensions in ( ) are in mm.  
 Unless Otherwise Noted: .xxx = ±0.010 (.xx = ±0.25)  
 WEIGHT (APPROX.): 0.07 OUNCES 2 GRAMS

## Ordering Information

### Part Number

DS-313

DSS-313

### Package

FP-2 Flatpack

SF-1 Surface Mount

## Typical Performance

