

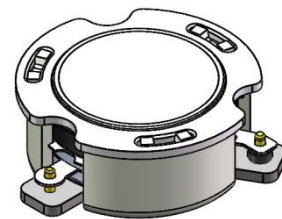


## DP3000C

### ENG PART:DP-20.4CM-2010T2025-CCW

2010MHz to 2025MHz Single-Junction Surface Mount Circulator

| REV. | DESCRIPTION   | REVISOR | DATE       | APPROVED |
|------|---------------|---------|------------|----------|
| A    | SAME AS REV.1 | ZZ.Zhu  | 2024/01/19 | Nick     |

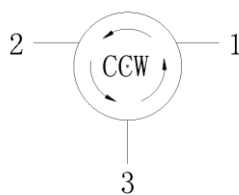


#### Applications:

- Wireless Infrastructure
- Power Amplifier

#### Features:

- Operating frequency range: 2010MHz to 2025MHz
- Operating temperature range: -40°C to +125°C
- Storage temperature range: -50°C to +150°C
- Small surface-mount package delivered on T&R
- BeOfree&RoHS compliant



Block Diagram



### Electrical Specifications:

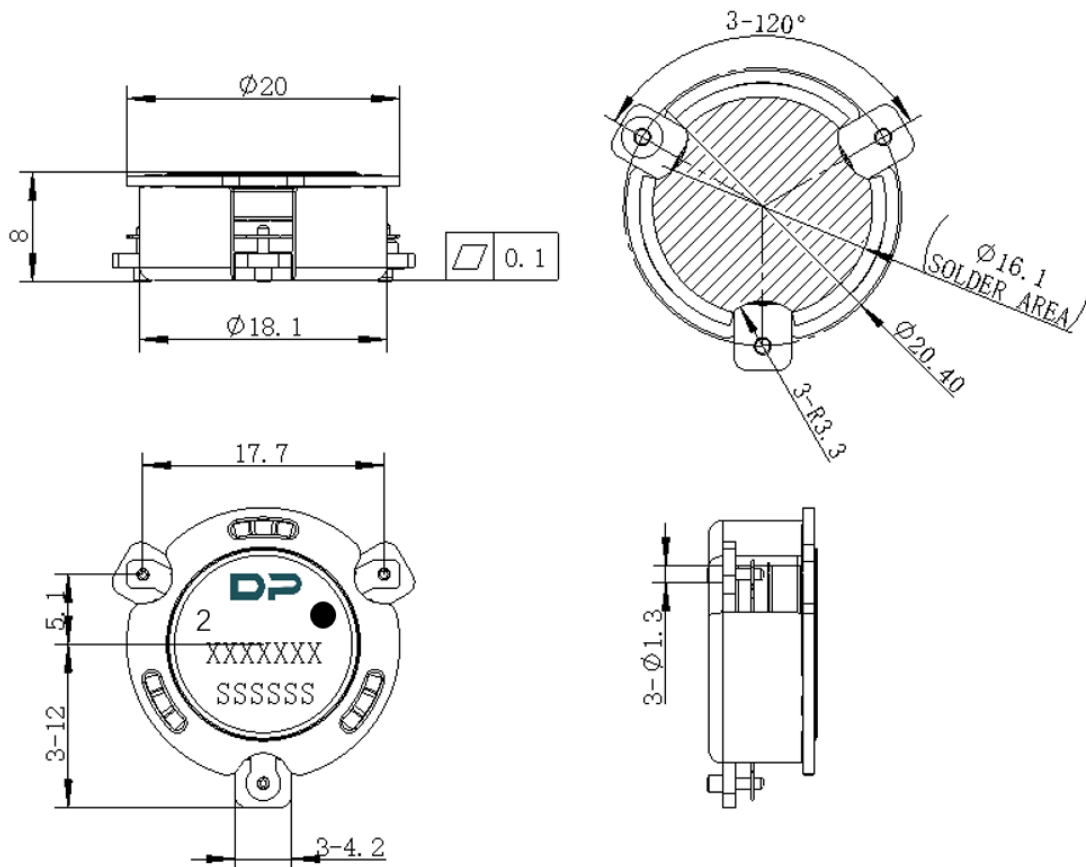
| ITEM                         | SPECIFICATION                 |          |
|------------------------------|-------------------------------|----------|
| Frequency                    | 2010~2025                     | MHz      |
| Direction                    | CCW                           |          |
| Impedance                    | Typ: 50                       | $\Omega$ |
| Insertion Loss (Max.)        | 0.20@25±5℃<br>0.25@-40~+125℃  | dB       |
| Isolation (Min.) (P2-P1)     | 25@25±5℃<br>21@-40~+125℃      | dB       |
| Return Loss (Min.)(P1、P2、P3) | 25@25±5℃<br>21@-40~+125℃      | dB       |
| 3rd IMD (Max.)               | -65@2x50W Tones, spacing 1MHz | dBc      |
| Group delay                  | -                             | ns       |
| Phase flatness               | -                             | °        |
| 2nd attenuation              | 10                            | dB       |
| 3rd attenuation              | 5                             | dB       |
| Power FWD/REV/PEAK           | 150/100/1200                  | W        |
| Impedance ,real              | 50±5                          | $\Omega$ |
| Impedance ,imaginary         | ±6j                           | $\Omega$ |
| Termination/Attenuator       | /                             | W/dB     |

Notes:

1. Exposure to maximum rating conditions for extended periods may reduce device reliability. There is no damage to device with only one parameter set at the limit and all other parameters set at or below their nominal value. Exceeding any of the limits listed here may result in permanent damage to the device.
2. Performance is guaranteed under the conditions listed in this table and over the operating temperature range.



### 3. Mechanical Specifications:



Unit: Millimeters

#### Notes:

1. The housing and pins are silver-plated.
2. Tolerance  $\pm 0.2$  mm unless otherwise specified.
3. Co-planarity Specification: 0.1 mm maximum.
4. Part Number, Lot Code, and Port Designation are printed on the top side of device.
5. The **XXXXXXX** on the label represents the part number
6. The **SSSSSS** on the label represents the serial number
7. The black dot on the label represents the input port