



RFM Integrated Device, Inc.

PRODUCT SPECIFICATION

Part Number: CDR6004

DR Filter, GNSS, 1475 MHz,
BW 100, IL 2

ELECTRICAL CHARACTERISTICS

This filter satisfies Table 1 at Temperature Range : -30 to +85°C



CENTER FREQUENCY : fo=1475MHz

PASSBAND WIDTH : fo ±50 MHz

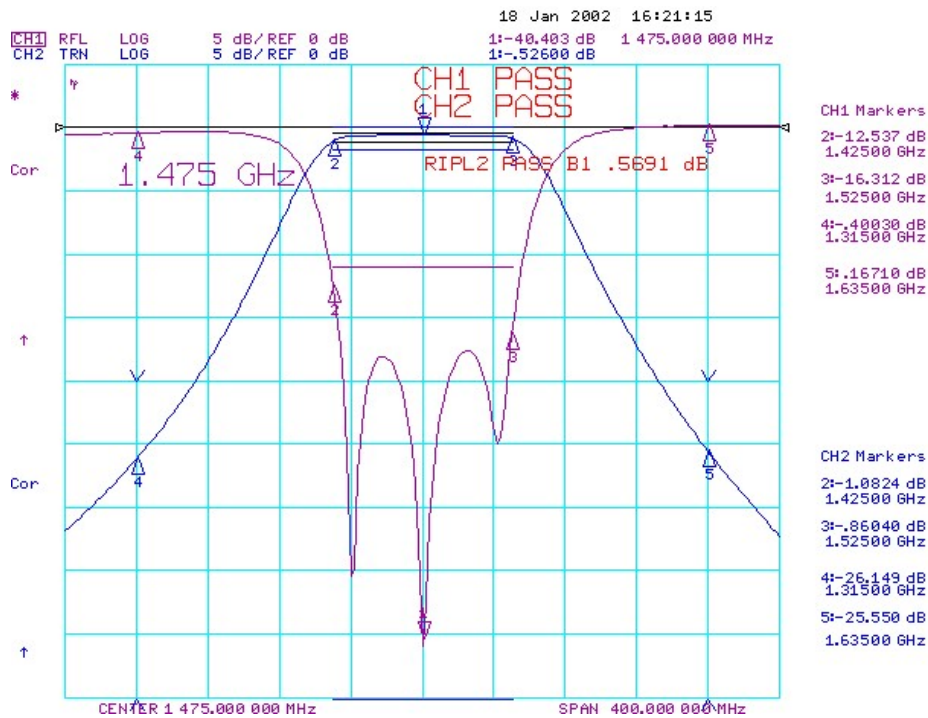
INPUT/OUTPUT IMPEDANCE : 50Ω

Max. INPUT POWER : 1 W

TABLE 1

NO.	ITEM		SPECIFICATION
1	PASS BAND INSERTION LOSS		2.0 dB or less
2	PASS BAND RIPPLE		1.0 dB or less
3	PASS BAND RETURN LOSS		9.6 dB or more
4	STOP—BAND	at fo-160MHz	19dB or more
	ATTENUATION	at fo+160MHz	19dB or more
Item NO.4 specifies the absolute value of attenuation.			

ELECTRICAL RESPONSE



4.RELIABILITY

4-1.STANDARD CONDITION

This standard shall satisfy the condition of Table 1 after the following test 4-2.

4-2.TEST METHOD

The filter shall withstand the following test condition.

4-2-1.Low temperature hold test :-40°C

Unit shall be subjected to the above condition for 10 hours and then be left for more than 2 hours at room temperature.

4-2-2.High temperature hold test:+85°C

Unit shall be subjected to the above condition for 10 hours and then be left for more than 2 hours at room temperature.

4-2-3.Humidity soak test : $60\pm 2^{\circ}\text{C}$, 90~95% relative humidity.

Unit shall be subjected to the above condition for 24 hours and then be left for more than 2 hours at room temperature.

4-2-4.Vibration test

The vibration of 5 G acceleration (Freq. 5 to 500Hz) and the sweep (0.1 octave per minute) are applied in three directions for 2 hours each.

4-2-5.Shock test

A half sine wave shock with a maximum acceleration of 30 G/11 msec. Is applied in six directions at right angles to each other by three times each.

4-2-6.Heat test

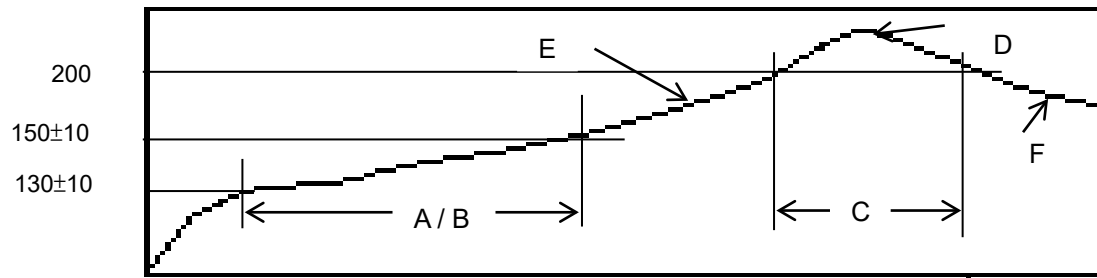
After the lead pins of the unit are soaked in solder bath at $270 \pm 10^{\circ}\text{C}$ for 5 seconds and then be left for more than 1 hour at room temperature.

5.OTHER

In case of any problem regarding this specification, both customer and manufacturer shall discuss and solve it.

2. SOLDERING CONDITION (RECOMMENDED)

SOLDER TEMPERATURE PROFILE (Reflow Soldering)



A : Preheating Times → 80~120 Sec. B : Preheating Times → 40~80 Sec.

C : Soldering Time → 20~30 Sec. D : Top Temp. → 220±10 °C

E : Max. → 10°C / Sec. F : Max. → 8°C / Sec.

Composition of Cream Solder : 62Sn / 36Pb / 2Ag

Soldering with iron

Soldering condition : Soldering iron temperature 270±10 °C

Soldering time less than 3 seconds.

3. SHAPE AND DIMENSION

