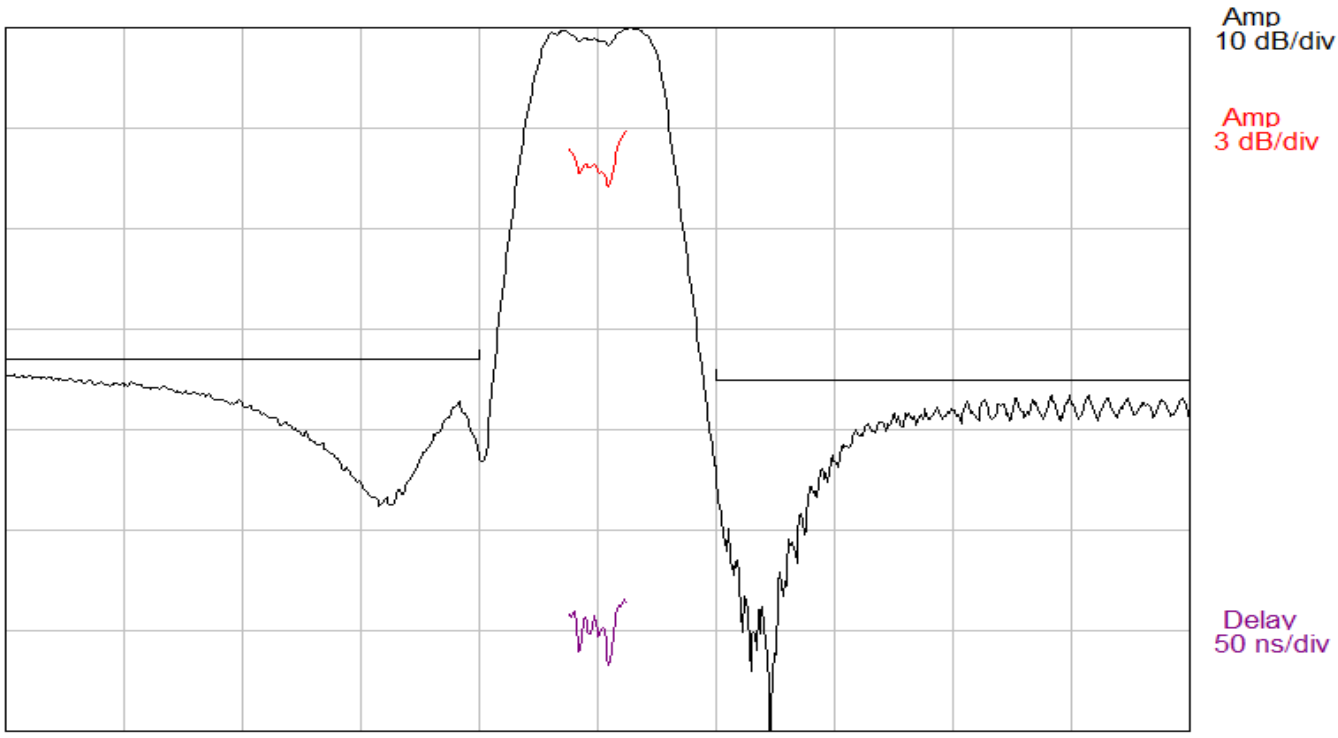
**404 MHz SAW Filter**
**12 MHz Bandwidth**
**Part Number SF0404HP03526S**

***HIGH POWER SAW FILTER***

## DESCRIPTION

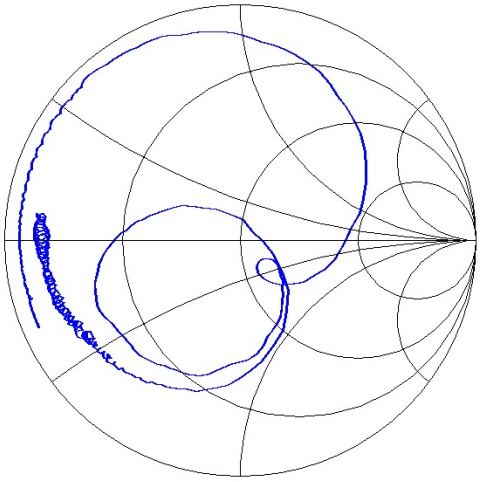
- 404 MHz Filter with 12 MHz Bandwidth
- 3.8 x 3.8 mm Ceramic LCC Package, 6 Pads
- RoHS compliant

## TYPICAL PERFORMANCE

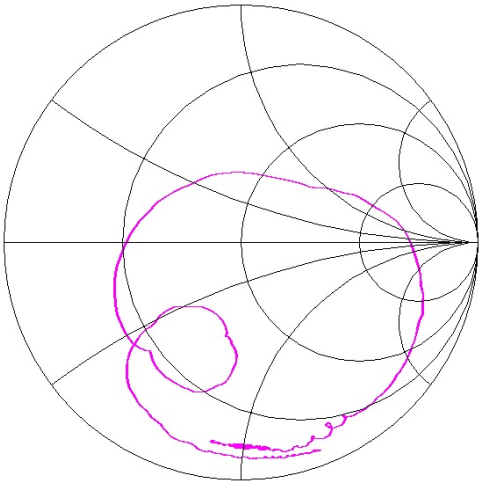



Center = 404 MHz, 20 MHz/div (250 kHz incr)

**$S_{11}$ (304-504 MHz)**



**$S_{22}$ (304-504 MHz)**



**Spectrum Control, Inc.**
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## SPECIFICATION

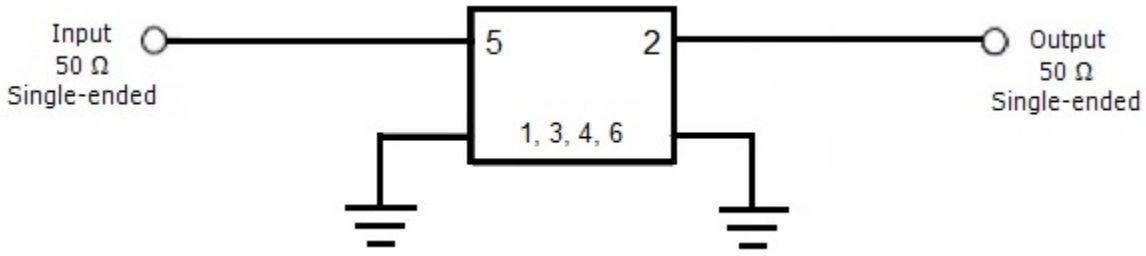
| Parameter | Min | Type | Max | Units |
|---|---|---|---|---|
| Insertion Loss | --- | 4.0 | 4.4 | dB |
| Device Delay | --- | 0.033 | --- | µsec |
| Center frequency (FC, 3dB)[1] | --- | 404.11 | --- | MHz |
| 3 dB Bandwidth[1] | 12 | 19.91 | --- | MHz |
| Lower 3 dB Frequency[1] | --- | 394.15 | 398 | MHz |
| Upper 3 dB Frequency[1] | 410 | 414.06 | --- | MHz |
| 35 dB Bandwidth[1] | --- | 35.51 | --- | MHz |
| Lower 35 dB Frequency[1] | 384 | 386.19 | --- | MHz |
| Upper 35 dB Frequency[1] | --- | 421.70 | 424 | MHz |
| Amplitude Ripple (399-409 MHz) | --- | 1.65 | 3 | dB p-p |
| Rejection (306-393 MHz)[1] | 33 | 35 | --- | dB |
| Rejection (418-506 MHz)[1] | 35 | 37 | --- | dB |
| Input Return Loss (399-409 MHz)[2] | --- | 5.1 | --- | dB |
| Output Return Loss (399-409 MHz)[2] | --- | 4.9 | --- | dB |
| Material Temperature Coefficient | -50 | | | ppm/˚C |
| Source and Load Impedance | 50 | | | ohms |
| Ambient Temperature | 25 | | | ˚C |

Notes: 1. Parameter value is referenced to the insertion loss value.
2. Part is to operate in a 50 ohm single-ended system.

## MAXIMUM RATINGS

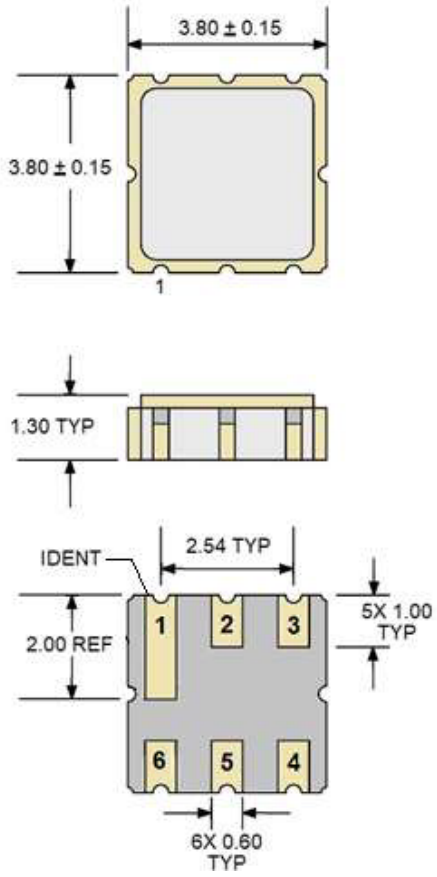
| Parameter | Min | Max | Units |
|---|---|---|---|
| Storage Temperature Range | -55 | 125 | ˚C |
| Input Power Level | - | +30 | dBm |

## CIRCUIT

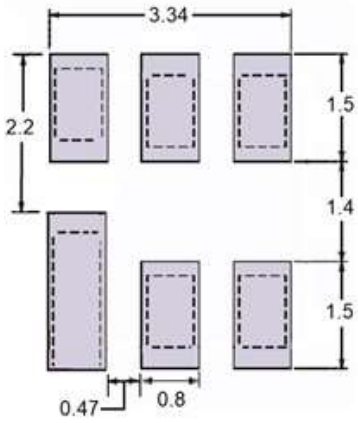



Notes:
1) Matching components are not required.
2) Recommended operation is in a 50 ohm system.

## PACKAGE OUTLINE




## SUGGESTED FOOTPRINT




**Units:** mm

Typical tolerances are ±0.15 mm except where indicated.

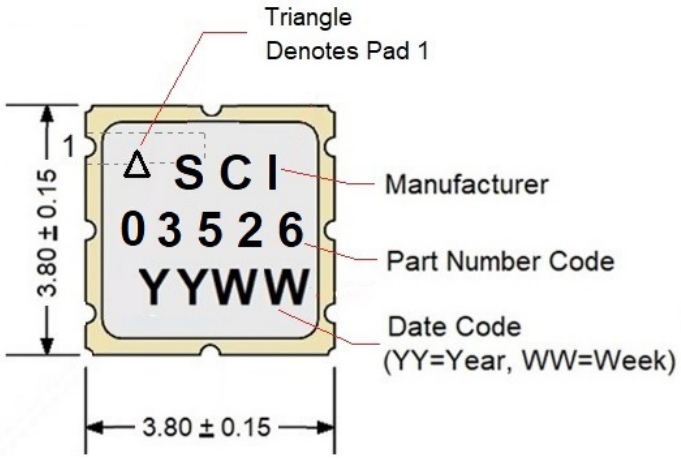
**Pad Configuration:**

| | |
|---|---|
| Input: | 5 |
| Output: | 2 |
| Ground: | All other pads |

**Package Material:**

Body: $Al_2O_3$ ceramic
Lid: Kovar, Ni plated
Terminations: Au plating 1 um min, over a 1.3-8.9 um Ni plating

## MARKING




ISO 9001 Registered



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