Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

SAW Duplexer 433.20 / 434.640MHz — Model: TF0097A
Part No: MP07002 — Rev. No: 1

A. MAXIMUM RATING:

Electrostatic **S**ensitive **D**evice (**ESD**)

1. Input Power Level: 10dBm
2. DC Voltage: 0V
3. Operating Temperature: -40°C to +85°C
4. Storage Temperature: -40°C to +85°C

B. ELECTRICAL CHARACTERISTICS: SF2281D

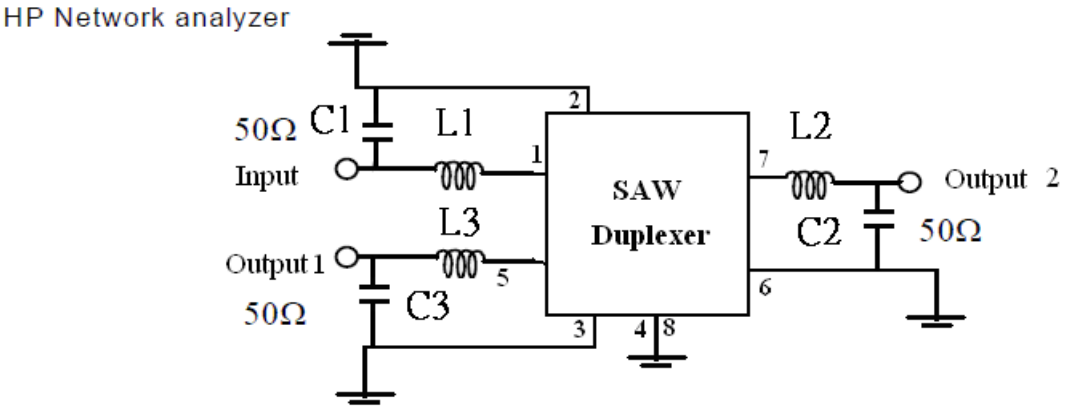
Pass Band	Unit	Min.	Typ.	Max.
Center frequency Fc	MHz	-	433.2	-
Insertion loss (433.10 ~ 433.30MHz) IL	dB	-	4	4.5
Amplitude Ripple (433.10 ~ 433.30MHz)	dB	-	1	1.5
VSWR (433.10 ~ 433.30MHz)			2	2.3
Attenuation (Reference level from 0dB)				
434.54 ~ 434.74MHz	dB	25	30	-
Fc +2.4MHz	dB	25	30	-
Fc -2.4MHz	dB	25	30	-
Pass Band II				
Center frequency Fc	MHz	-	434.64	-
Insertion loss (434.54 ~ 434.74MHz) IL	dB	-	4	4.5
Amplitude Ripple (434.54 ~ 434.74MHz)	dB	-	1	1.5
VSWR (434.54 ~ 434.74MHz)			2	2.3
Attenuation (Reference level from 0dB)				
433.10 ~ 433.30MHz	dB	25	30	-
Fc +2.4MHz	dB	30	35	-
Fc -2.4MHz	dB	30	35	-

Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

SAW Duplexer 433.20 / 434.640MHz — Model: TF0097A
Part No: MP07002 — Rev. No: 1

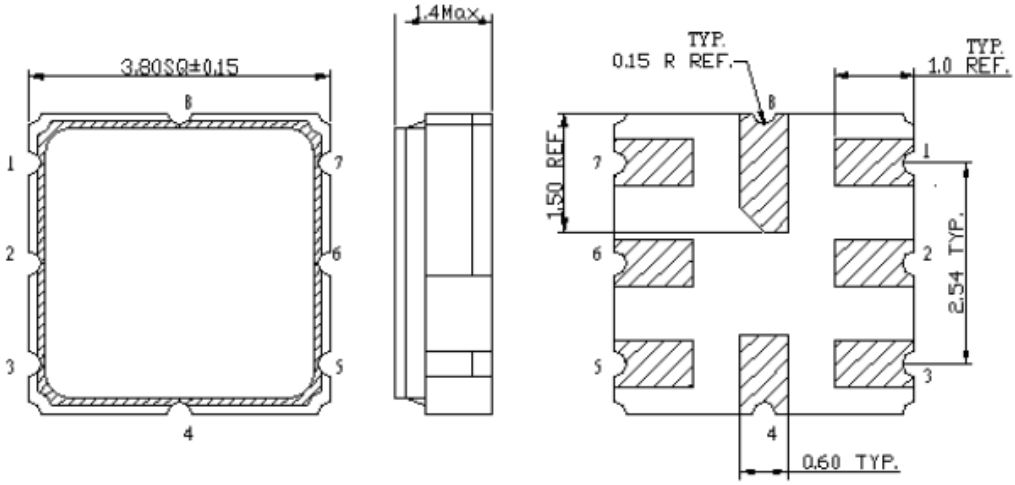
C. MEASUREMENT CIRCUIT:



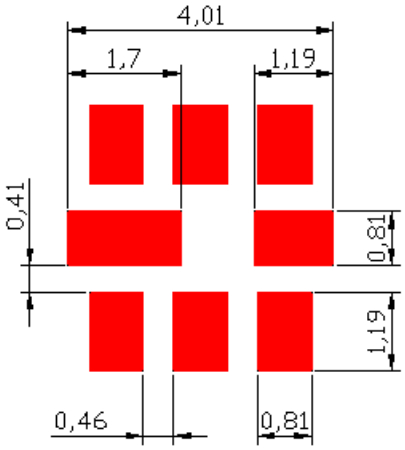
L1: 68nH; L2: 82nH; L3: 82nH; C1: 8pF; C2: 5pF; C3: 5pF

D. OUTLINE DRAWING:

1: Input
2, 3, 6: RF Ground
4, 8: Case Ground
5: Band 1 Output
7: Band 2 Output



E. PCB FOOTPRINT:

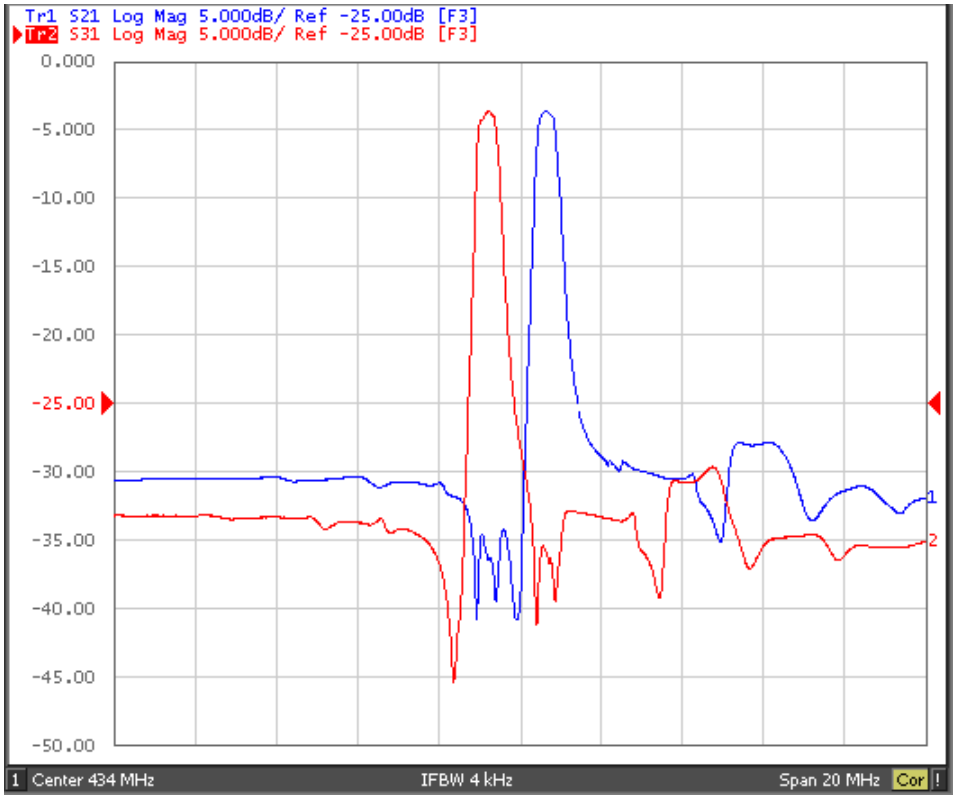


Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

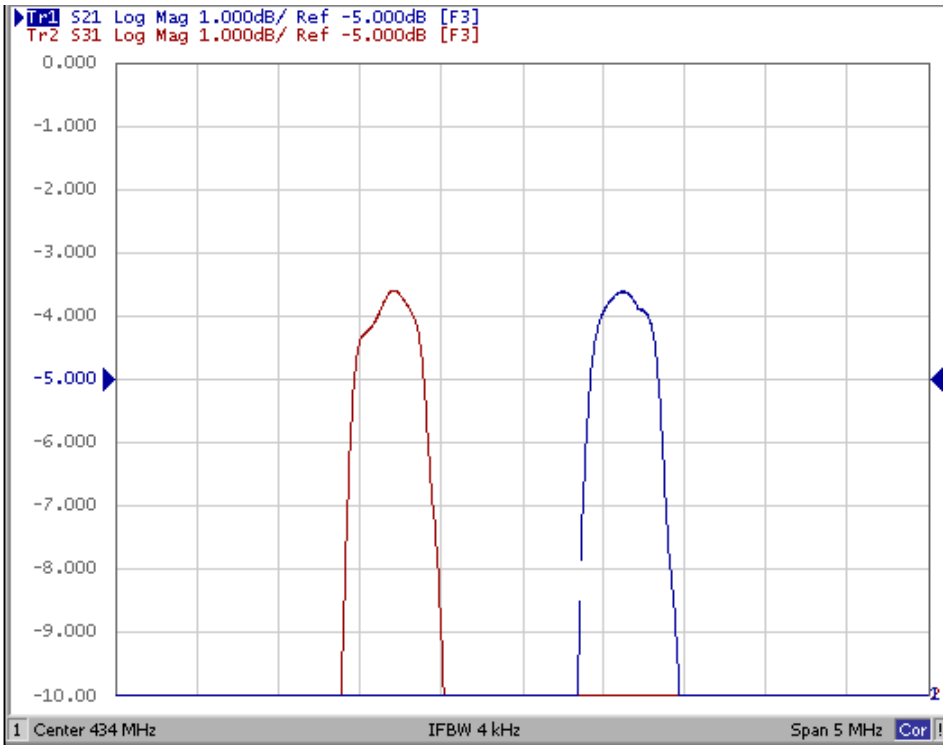
Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

F. FREQUENCY CHARACTERISTICS:

S21: Span 20MHz



S21: Span 5MHz



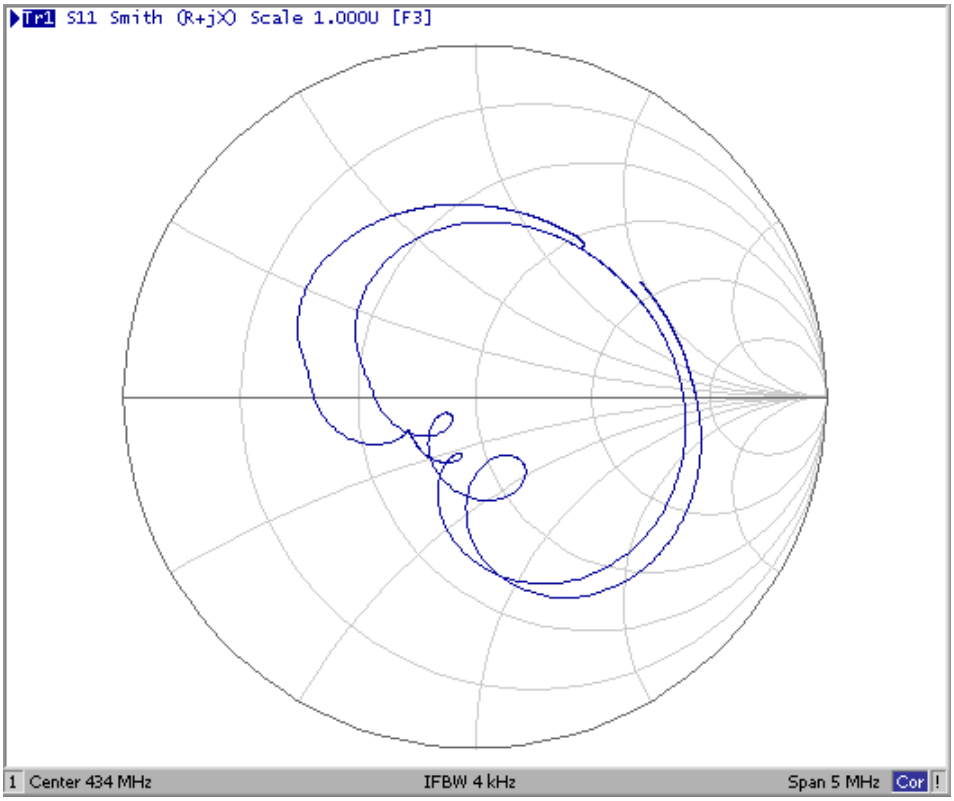
Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

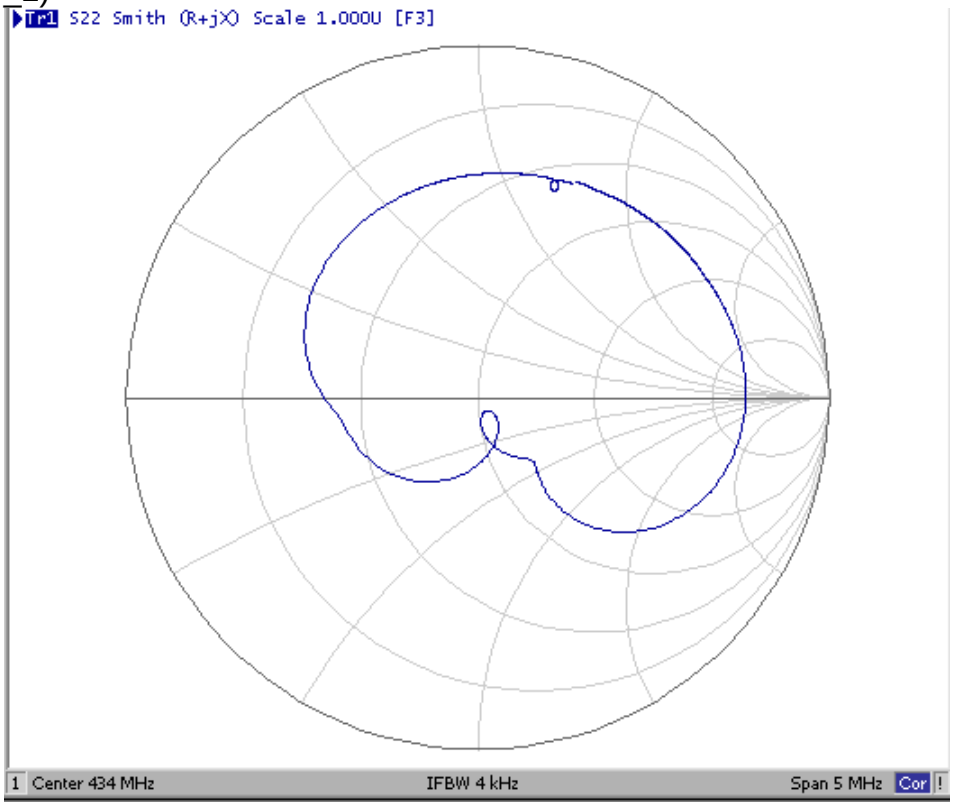
SAW Duplexer 433.20 / 434.640MHz — Model: TF0097A

Part No: MP07002 — Rev. No: 1

S11 (I/P)



S22 (O/P_2)

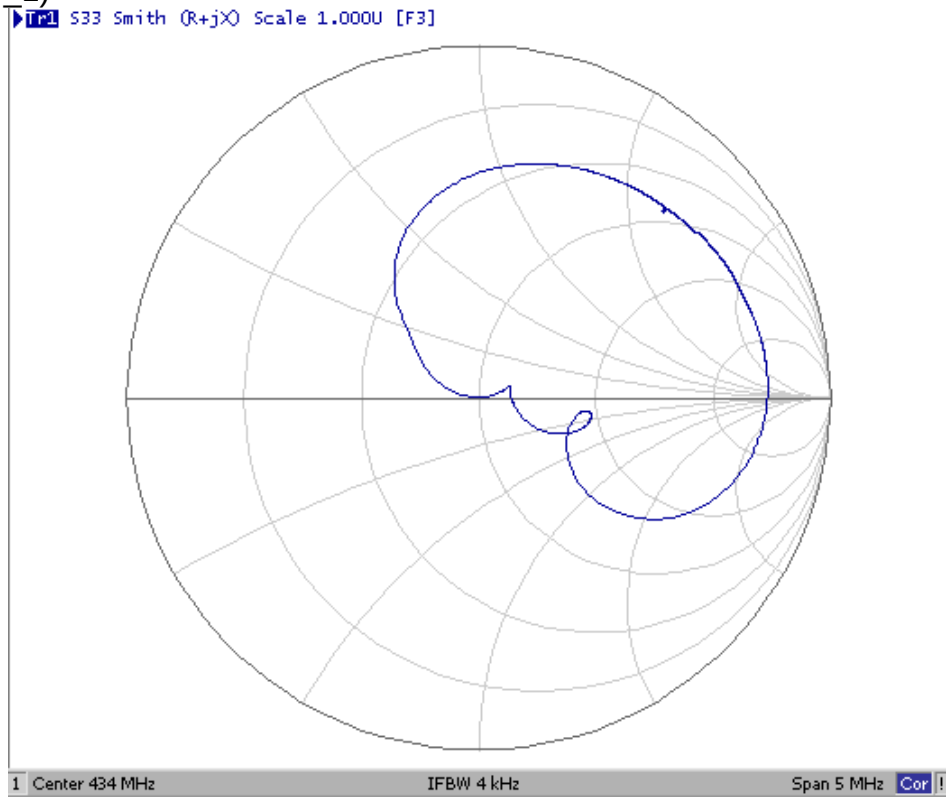


Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

SAW Duplexer 433.20 / 434.640MHz — Model: TF0097A
Part No: MP07002 — Rev. No: 1

S33 (O/P_1)

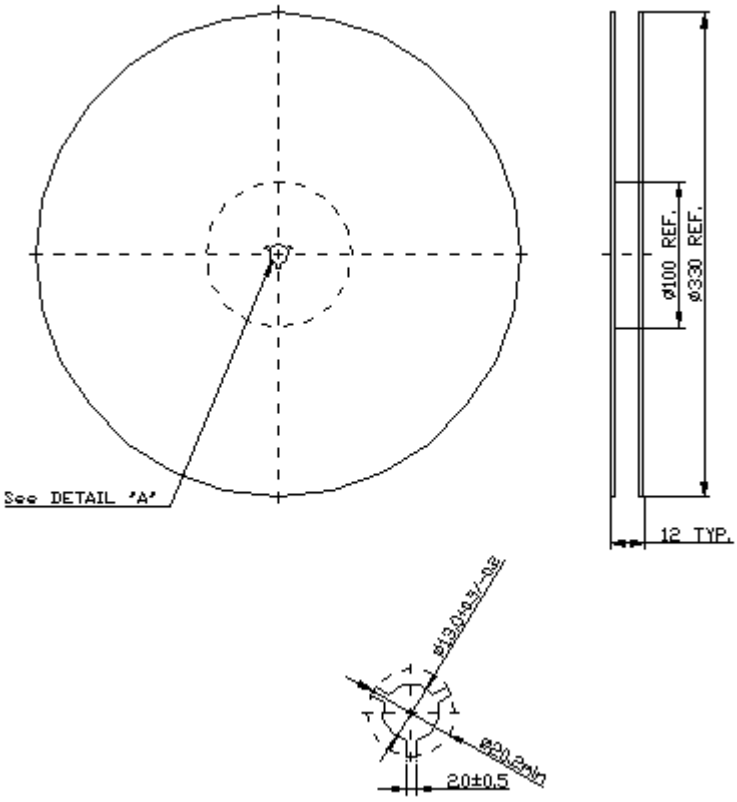


Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

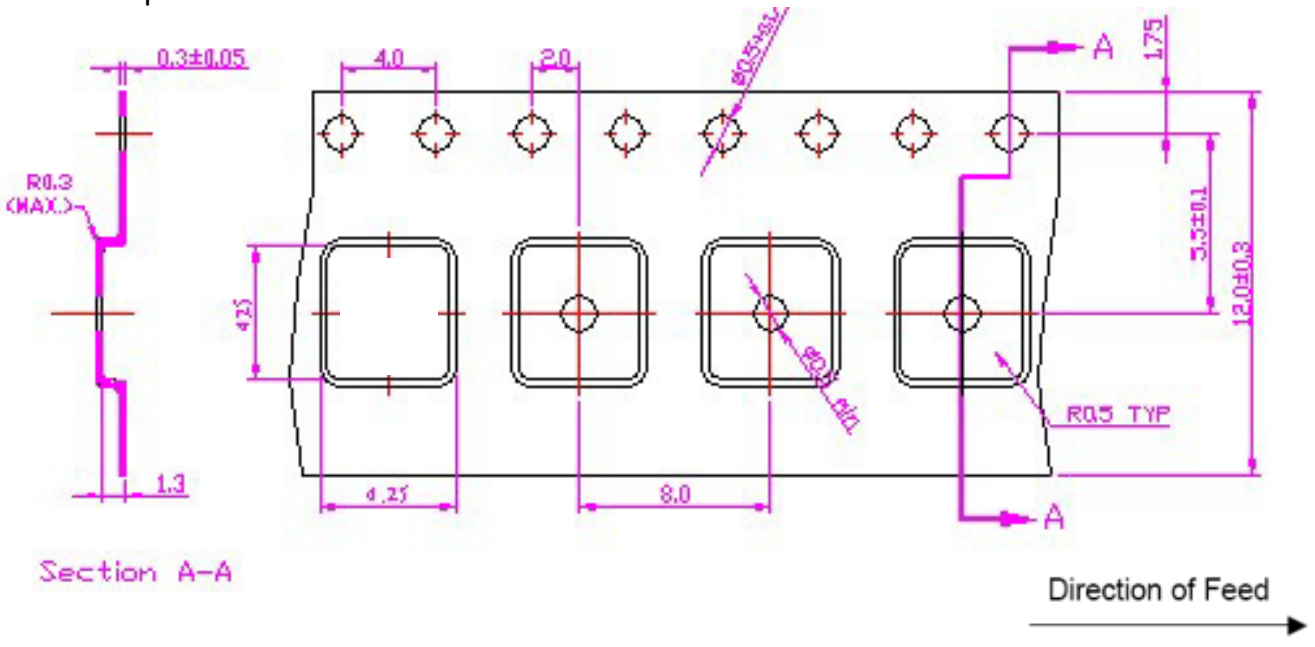
Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

G. PACKING:

1. Reel Dimension



2. Tape Dimension



Tel: +44 1460 256 100
Fax: +44 1460 256 101
www.golledge.com

Golledge Electronics Ltd
Eaglewood Park, ILMINSTER
Somerset, TA19 9DQ, UK

H. RECOMMENDED REFLOW PROFILE:

1. Preheating shall be fixed at 150 ~ 180°C for 60 ~ 90 seconds.
2. Ascending time to preheating temperature 150°C shall be 30 seconds min.
3. Heating shall be fixed at 220° for 50 ~ 80 seconds and at 245 ~ 260°C peak (min. 10 sec).
4. Time: 2 times.