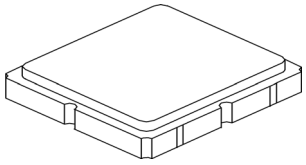
AEC-Q200

RoHS Compliance
This component is compliant with RoHS directive.
This component was always RoHS compliant from the first date of manufacture.

RF3631D

427.5 MHz SAW Filter

- ***Advanced $LiTaO_3$ Design for Low Insertion Loss***
- ***Hermetically-sealed Surface Mount package***



SM3838-6 Case

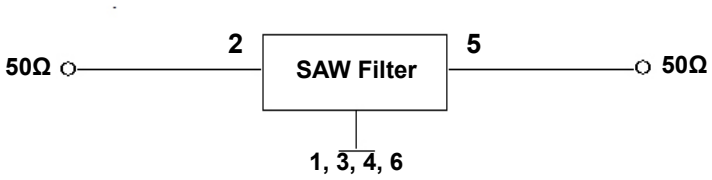
Absolute Maximum Ratings

Rating	Value	Units
Maximum Input Power	+10	dBm
DC Voltage between Terminals	3	VDC
Operable Temperature Range	-40 to +125	°C
Specification Temperature Range	-40 to +85	°C
Storage Temperature Range	-40 to +85	°C

Characteristic	Sym	Notes	Minimum	Typical	Maximum	Units
Center Frequency	f_C			427.5		MHz
1.0 dB Bandwidth				19.5		dB
3.0 dB Bandwidth				23.6		
Insertion Loss 420 to 435 MHz	IL			1.5	3.0	
Attenuation (reference from 0 dB):						dB
10 to 360 MHz			50	56		
360 to 400 MHz			47	53		
487 to 600 MHz			47	51		
600 to 1000 MHz			43	48		
Source Impedance				50		Ω
Load Impedance				50		
Case			SM3838-6, 3.8 x 3.8 mm Footprint			
Lid Symbolization (YY=Year, WW=week, S=shift)			B55/YWWS			

Electrical Connections

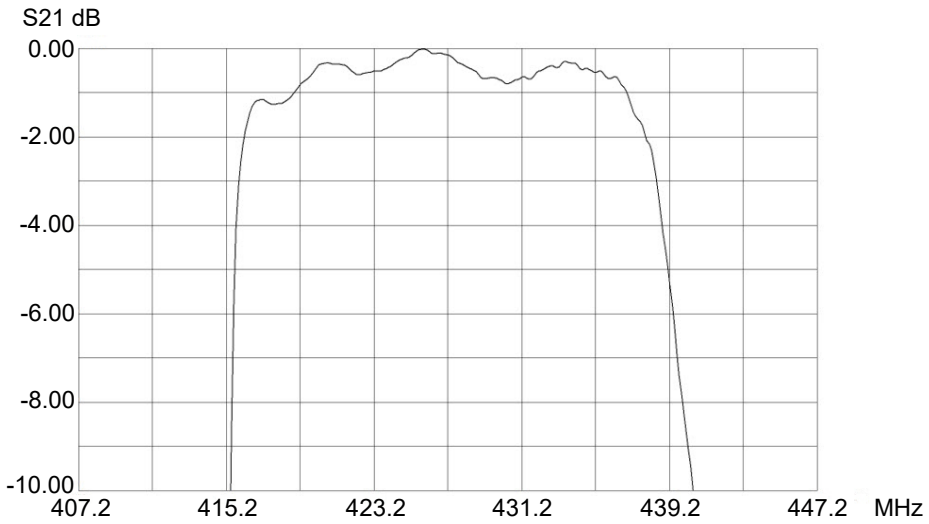
Connection	Terminals
RF Input	2
RFOutput	5
Case Ground	All Others

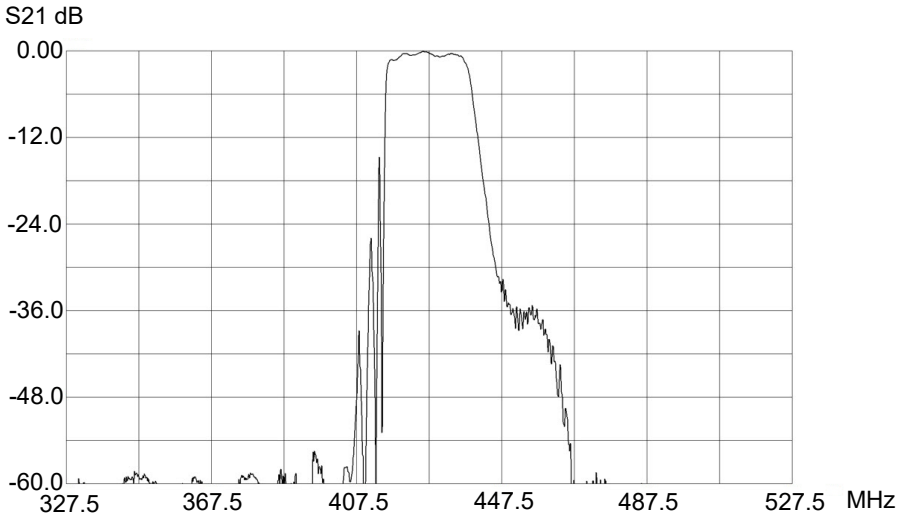


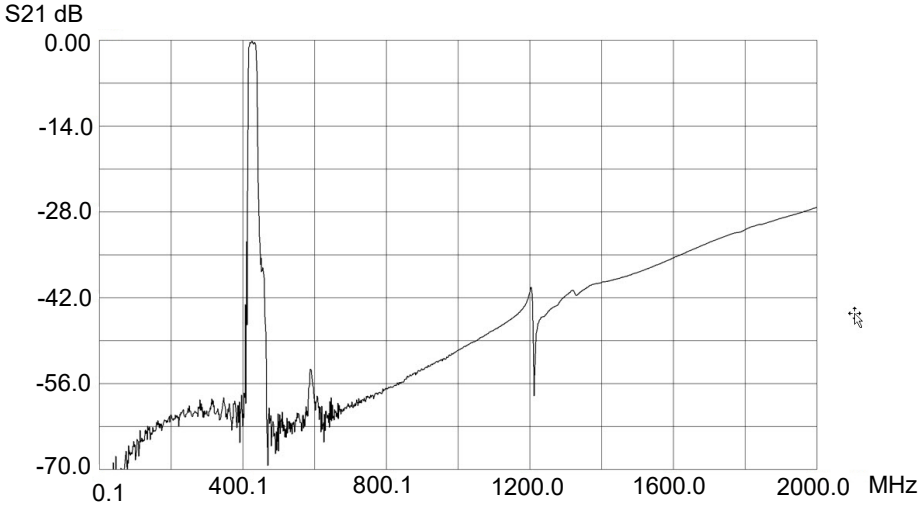
CAUTION: Electrostatic Sensitive Device. Observe precautions for handling.

NOTES:

1. All specifications apply over the operating temperature range with filter soldered to the specified demonstration board unless noted otherwise.
2. Ultimate rejection is dependent on PCB layout.
3. Specifications subject to change without notice.
4. Electrostatic Sensitive Device. Observe precautions for handling.
5. US and international patents may apply.
6. Murata, stylized Murata logo, and Murata N.A., Inc. are registered trademarks of Murata Manufacturing Co., Ltd.

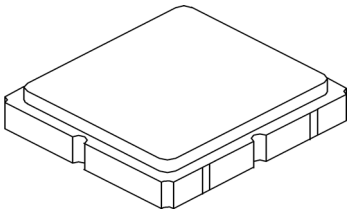


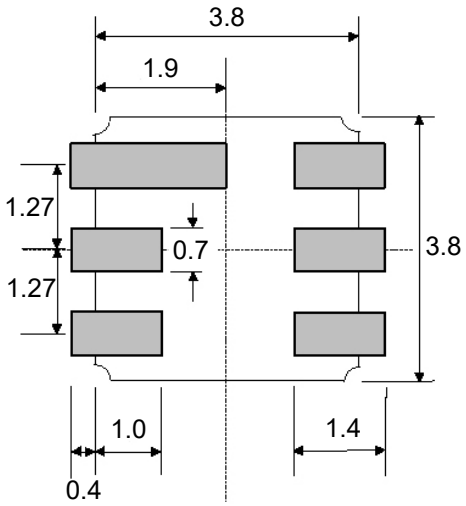




SM3838-6 Case

6-Terminal Ceramic Surface-Mount Case
3.8 X 3.8 mm Nominal Footprint





PCB Footprint

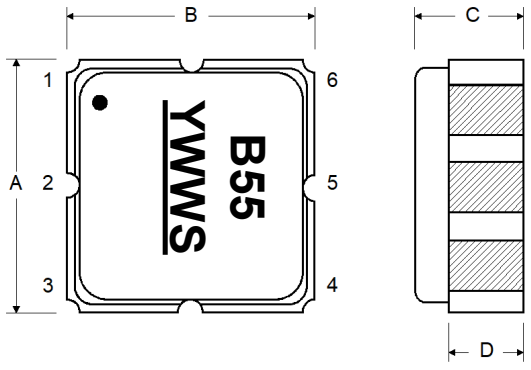
Case Dimensions

Dimension	mm			Inches		
	Min	Nom	Max	Min	Nom	Max
A	3.60	3.80	4.00	0.142	0.150	0.157
B	3.60	3.80	4.00	0.142	0.150	0.157
C	1.10	1.30	1.50	0.043	0.050	0.060
D	0.95	1.10	1.25	0.037	0.043	0.049
E	2.39	2.54	2.69	0.094	0.100	0.106
G	0.90	1.00	1.10	0.035	0.040	0.043
H	1.90	2.00	2.10	0.748	0.079	0.083
I	0.50	0.60	0.70	0.020	0.024	0.028
J	1.70	1.80	1.90	0.067	0.071	0.075
K	-	-	1.43	-	-	0.056

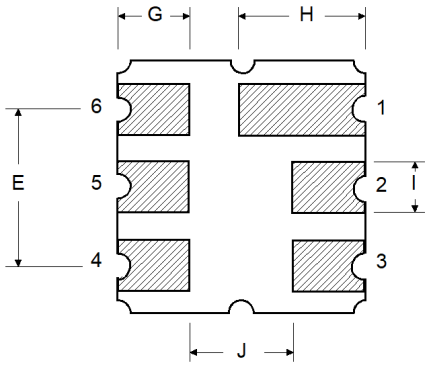
Case Material

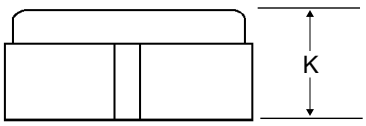
Materials	
Solder Pad Plating	0.3 to 1.0 µm Gold over 1.27 to 8.89 µm Nickel
Lid Plating	2.0 to 3.0 µm Nickel
Body	Al_2O_3 Ceramic
Pb Free	

TOP VIEW

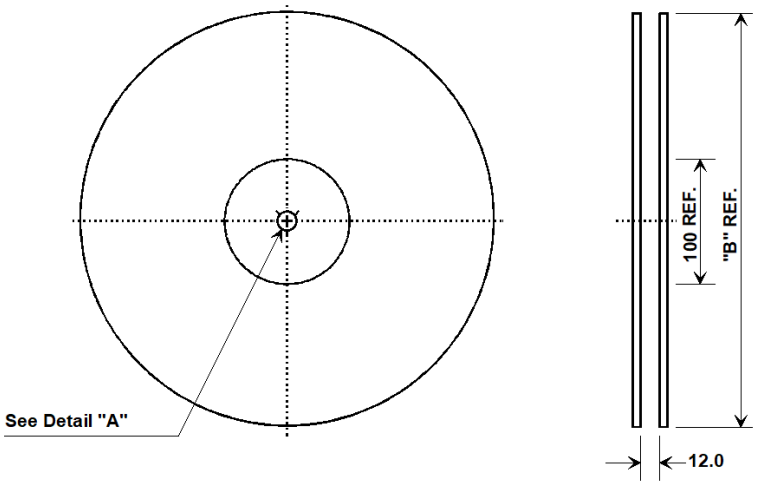


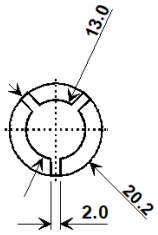
BOTTOM VIEW





Tape and Reel Specifications

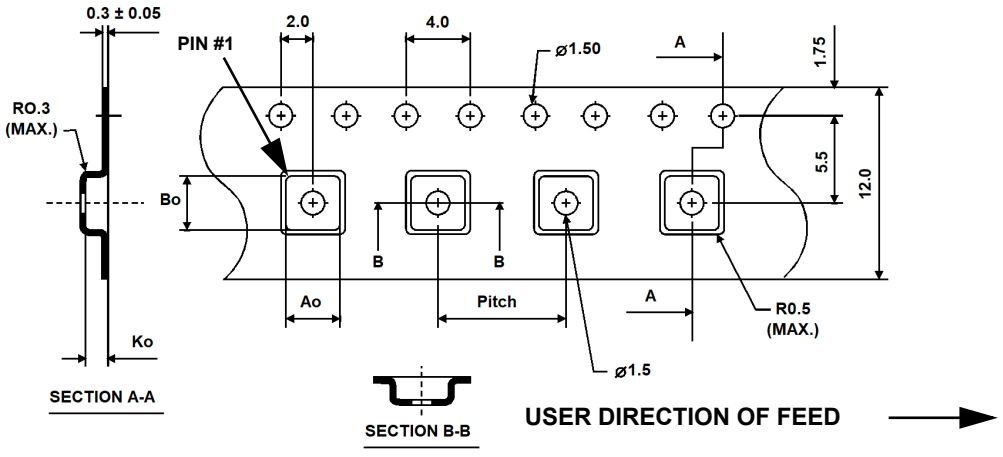




"B " Nominal Size		Quantity Per Reel
Inches	millimeters	
7	178	500
13	330	3000

COMPONENT ORIENTATION and DIMENSIONS

Carrier Tape Dimensions	
Ao	4.25 mm
Bo	4.25 mm
Ko	1.30 mm
Pitch	8.0 mm
W	12.0 mm



Recommended Reflow Profile