Wire Wound Type Common Mode Filter

HSF1210F2SO-SERIES

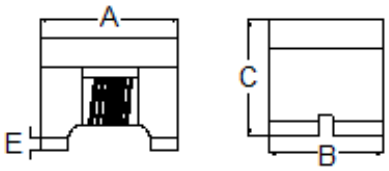
1. Features

1. High common mode impedance at high frequency cause excellent noise suppression performance.
2. HSF1210F2SO series realizes small size and low profile. 1.2x1.0x0.9 mm.
3. 100% Lead(Pb) & Halogen-Free and RoHS compliant.
4. Excellent for USB3.0
5. Operating temperature -40~+125℃ (Including self - temperature rise).

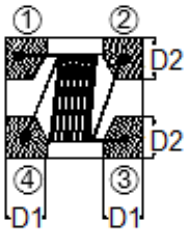
Halogen-free

RoHS

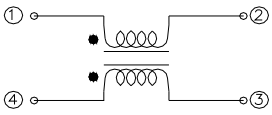
2. Dimension



Series	A(mm)	B(mm)	C(mm)	D1(mm)	D2(mm)	E(mm)
1210F2SO	1.20±0.20	1.00±0.20	0.90 max.	0.35±0.10	0.35±0.10	0.03 min.



Bottom View



Schematic Diagram

3. Part Numbering

HSF	1210	F	2	S	O	-	900	T	02
A	B	C	D	E	F		G	H	I

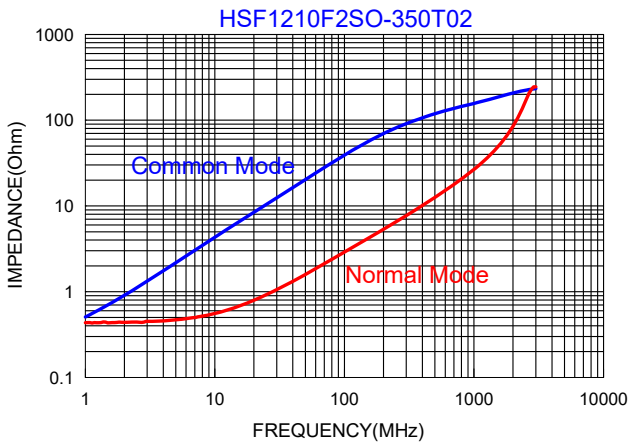
A: Series
B: Dimension
C: Material — Ferrite
D: Number of Lines — 2=2 lines
E: Type — S=Shielded, N=Unshielded
F: Category Code — Industrial Grade
G: Impedance — 900=90Ω
H: Packaging — T=Taping and Reel, B=Bulk
I : Rated Current — 02=200mA

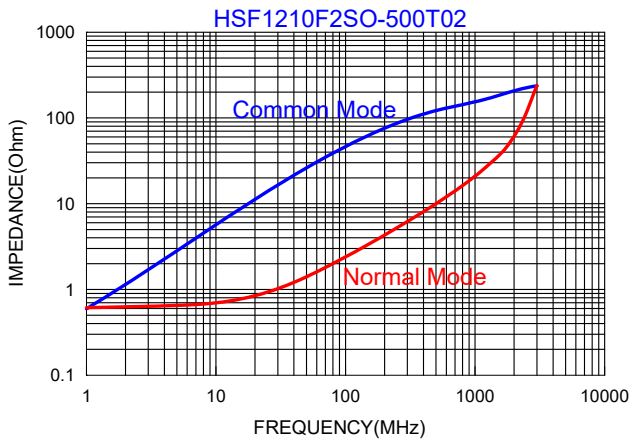
4. Specification

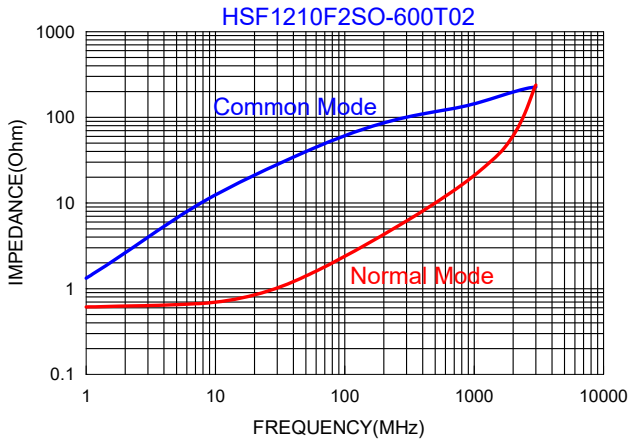
TAI-TECH Part Number	Common mode Impedance (Ω)	Test Frequency (MHz)	DCR (Ω) max.	Rated Current (mA) max.	Rated Volt. (Vdc) max.	Withstand Volt. (Vdc) max.	Insulation Resistance (Ω) min.
HSF1210F2SO-350T02	35±25%	100	0.30	200	50	125	10M
HSF1210F2SO-500T02	50±25%	100	0.30	250	50	125	10M
HSF1210F2SO-600T02	60±25%	100	0.30	250	50	125	10M
HSF1210F2SO-900T02	90±25%	100	0.40	200	50	125	10M

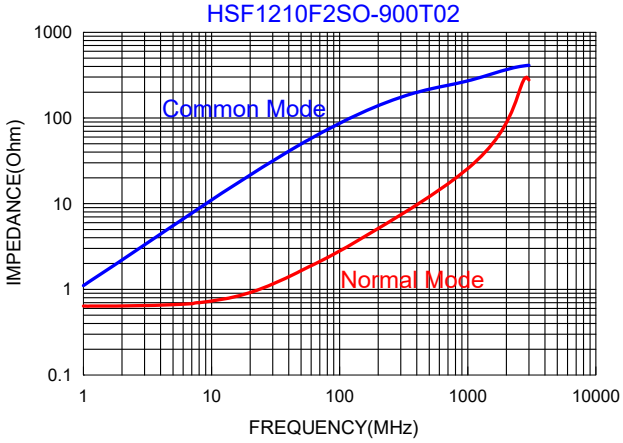
Note:

- All test data referenced to 25℃ ambient.

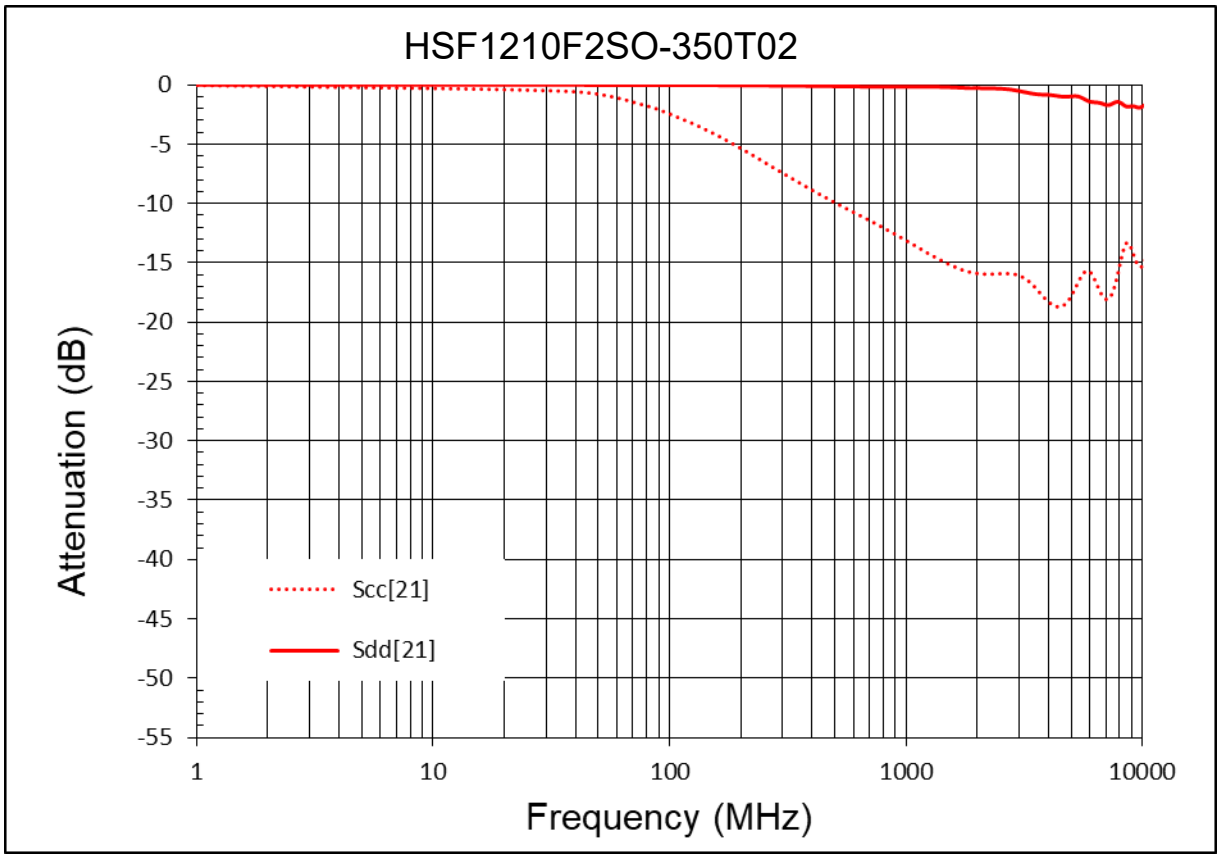

HSF1210F2SO-350T02
IMPEDANCE(Ohm)
1000
100
10
1
0.1
Common Mode
Normal Mode
1
10
100
1000
10000
FREQUENCY(MHz)

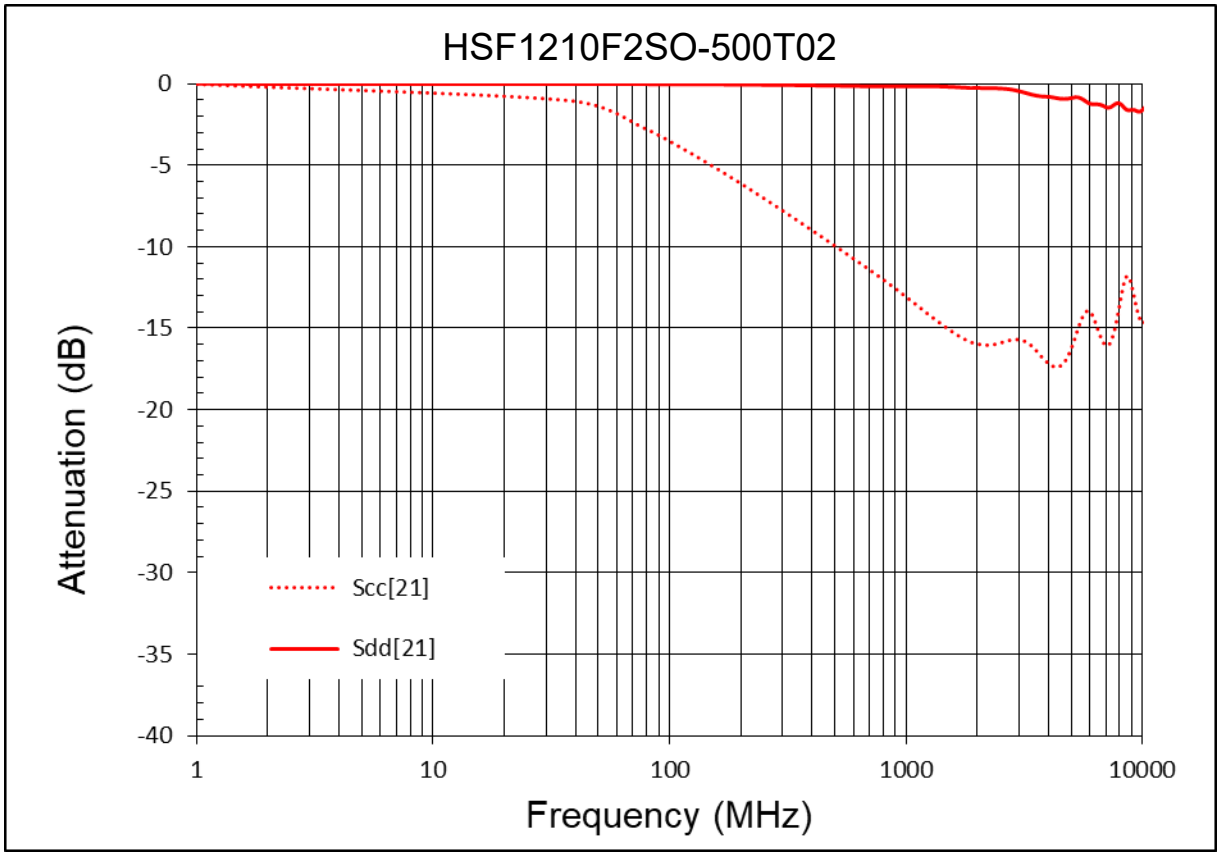

HSF1210F2SO-500T02
IMPEDANCE(Ohm)
1000
100
10
1
0.1
Common Mode
Normal Mode
1
10
100
1000
10000
FREQUENCY(MHz)

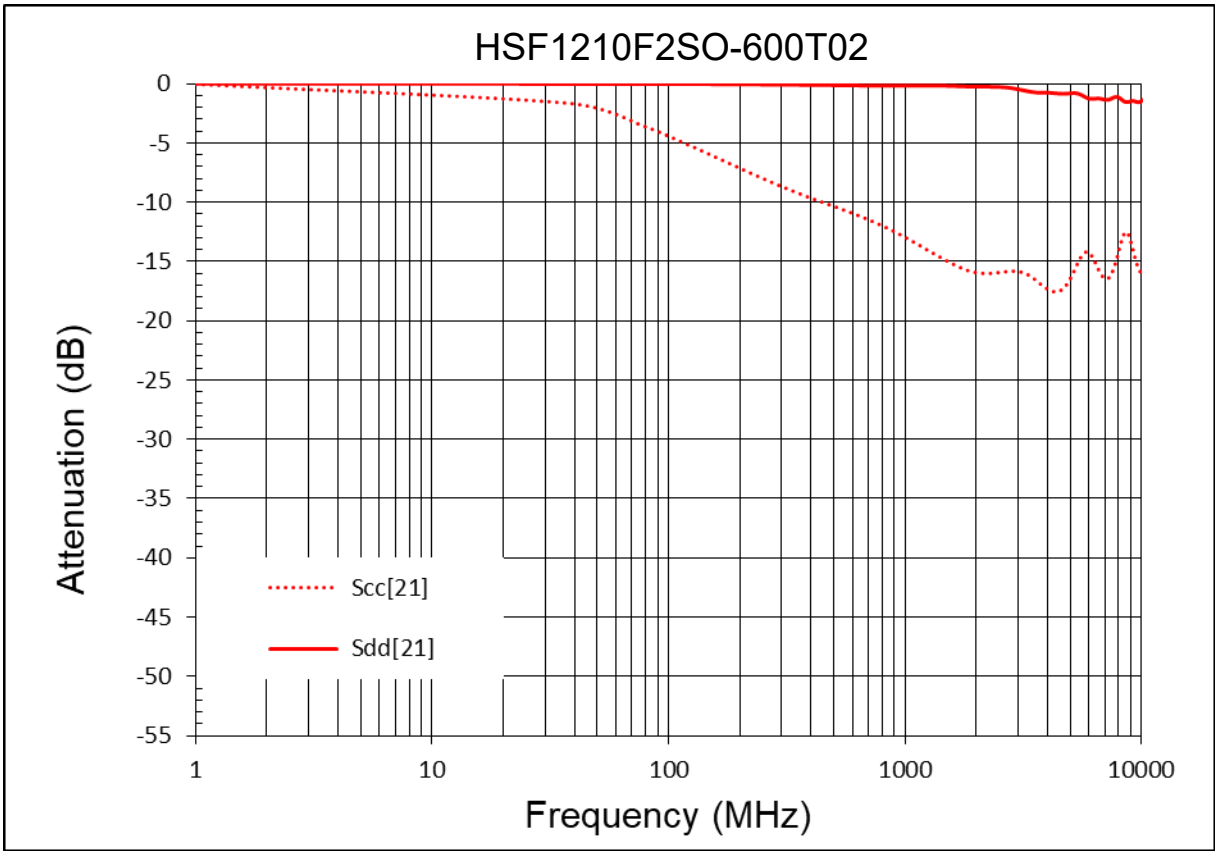

HSF1210F2SO-600T02
IMPEDANCE(Ohm)
1000
100
10
1
0.1
Common Mode
Normal Mode
1
10
100
1000
10000
FREQUENCY(MHz)

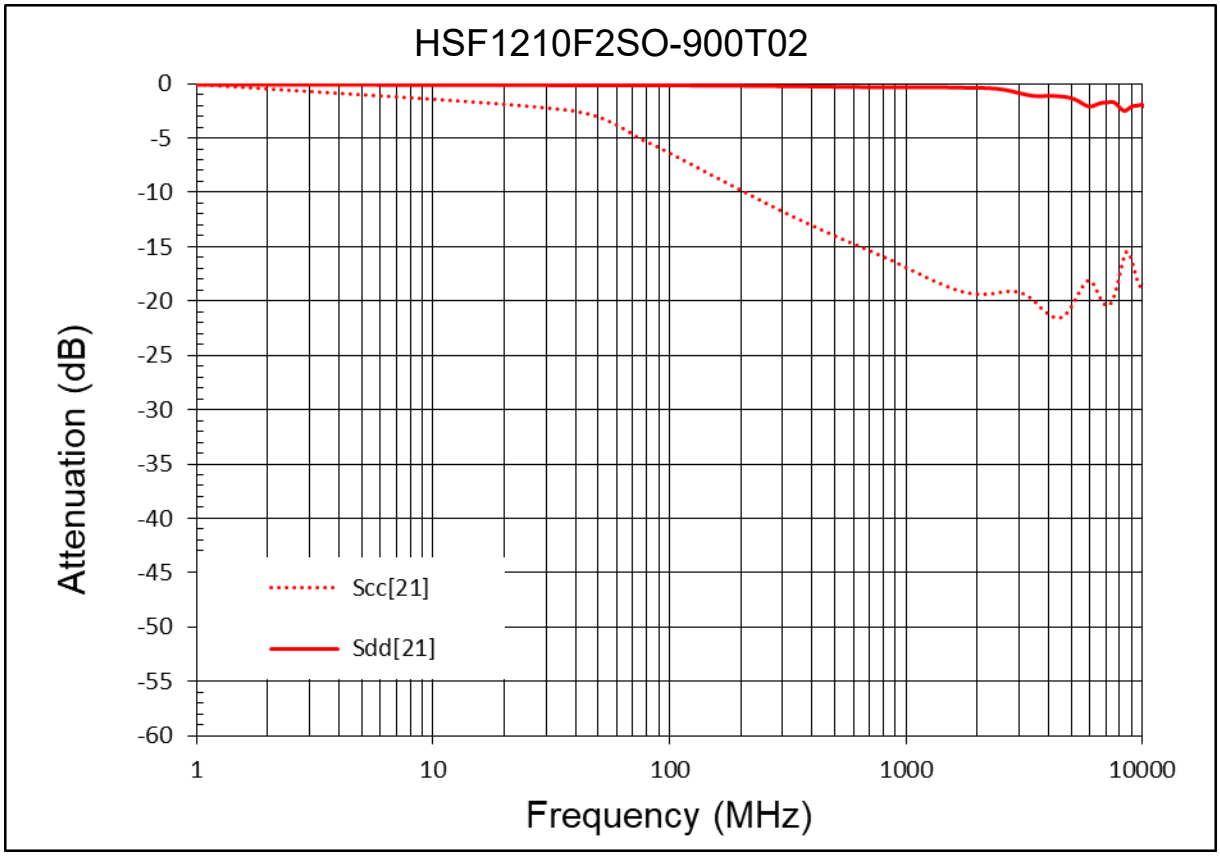

HSF1210F2SO-900T02
IMPEDANCE(Ohm)
1000
100
10
1
0.1
Common Mode
Normal Mode
1
10
100
1000
10000
FREQUENCY(MHz)

Sdd21&Scc21


HSF1210F2SO-350T02
Attenuation (dB)
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-55
Scc[21]
Sdd[21]
1
10
100
1000
10000
Frequency (MHz)


HSF1210F2SO-500T02
Attenuation (dB)
0
-5
-10
-15
-20
-25
-30
-35
-40
1
10
100
1000
10000
Frequency (MHz)
Scc[21]
Sdd[21]


HSF1210F2SO-600T02
Attenuation (dB)
0
-5
-10
-15
-20
-25
-30
-35
-40
-45
-50
-55
1
10
100
1000
10000
Frequency (MHz)
Scc[21]
Sdd[21]



5. Recommended PC Board Pattern

	HSF1210F2S
L(mm)	1.55
H(mm)	1.10
G1(mm	0.65
G2(mm	0.30

