



Multilayer Band Pass Filter (Balance Output Type)

For 2400–2500MHz

DEA202450BT-7210A1

2.0x1.25mm [EIA 0805]*

* Dimensions Code JIS[EIA]

Multilayer Band Pass Filter (Balance Output Type)

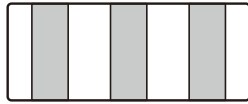
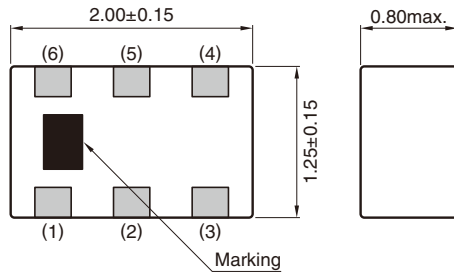
Conformity to RoHS Directive

For 2400–2500MHz

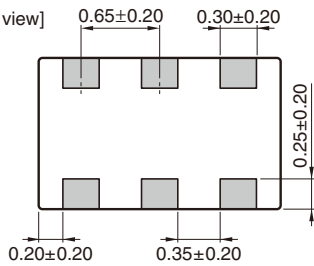
DEA202450BT-7210A1

SHAPES AND DIMENSIONS

[Top view]



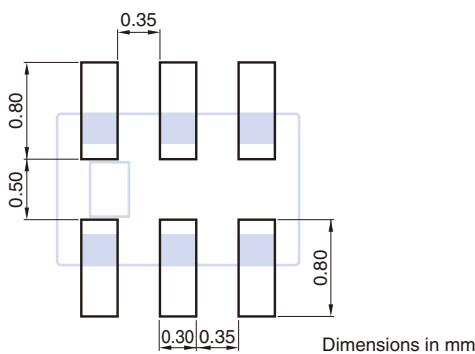
[Bottom view]



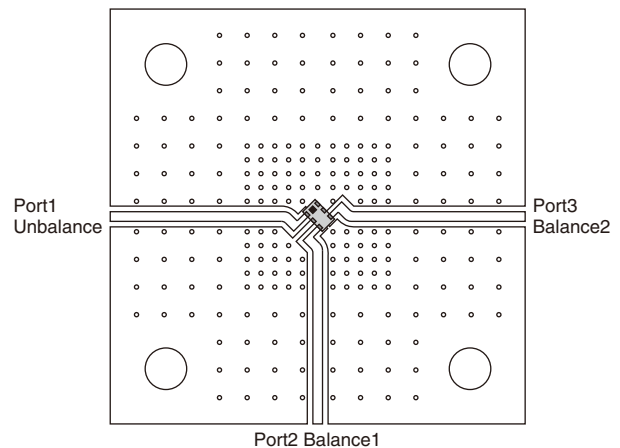
Terminal functions	
1	Unbalanced port
2	GND
3	Balanced port
4	Balanced port
5	GND
6	GND

Dimensions in mm

RECOMMENDED LAND PATTERN



EVALUATION BOARD



Line width is designed to match 50Ω characteristic impedance depending on PCB material and thickness.

Port extension value is 139.56ps for all port.

RoHS Directive Compliant Product: See the following for more details related to RoHS Directive compliant products. <http://product.tdk.com/en/environment/rohs/>

- All specifications are subject to change without notice.
- Before using these products, be sure to request the delivery specifications.

DEA202450BT-7210A1

ELECTRICAL CHARACTERISTICS

Item	Frequency Range (MHz)	Min.	Typ.	Max.
Unbalanced Port Characteristic Impedance (Ω)			50 (Nominal)	
Balanced Port Characteristic Impedance (Ω)			Matched to TI CC253x, CC254x, CC85xx series	
Insertion Loss (dB)	2400 to 2500	—	0.95	1.5
Attenuation (dB)	4800 to 5000	15	28	—
	7200 to 7500	20	33	—
Return Loss at Unbalanced Port (dB)	2400 to 2500	10	22	—
Phase Balance (deg.)	2400 to 2500	165	183	195
Amplitude Balance (dB)	2400 to 2500	-2	-0.67	2

• Ta: +25±5°C

TEMPERATURE RANGE

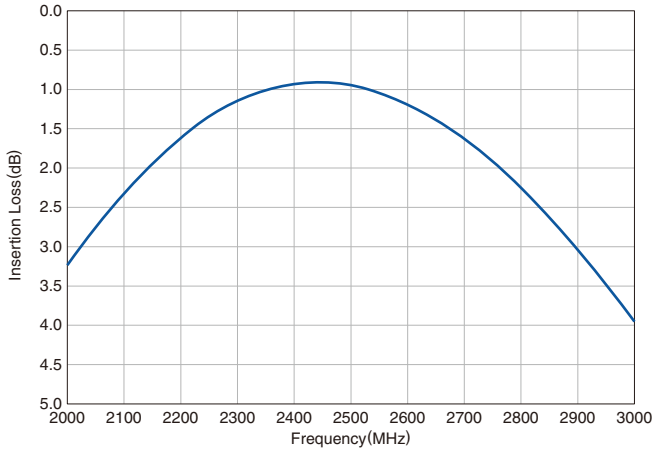
Operating temperature (°C)	Storage temperature (°C)
-40 to +85	-40 to +85

- All specifications are subject to change without notice.
- Before using these products, be sure to request the delivery specifications.

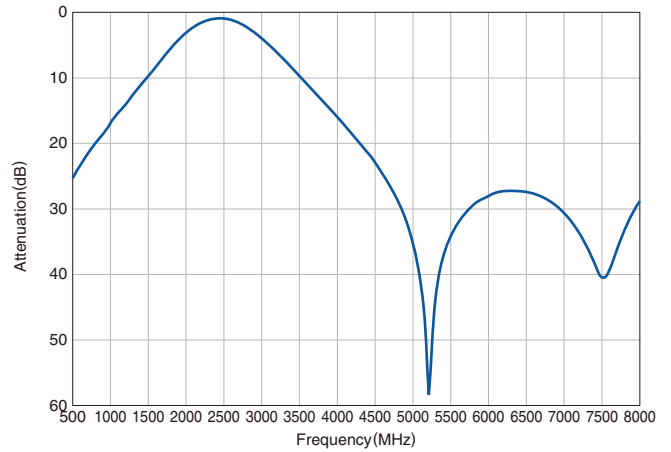
DEA202450BT-7210A1

FREQUENCY CHARACTERISTICS

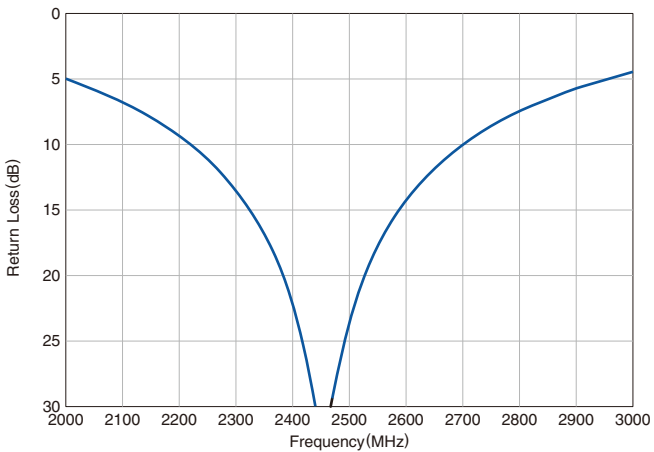
SDS21 INSERTION LOSS



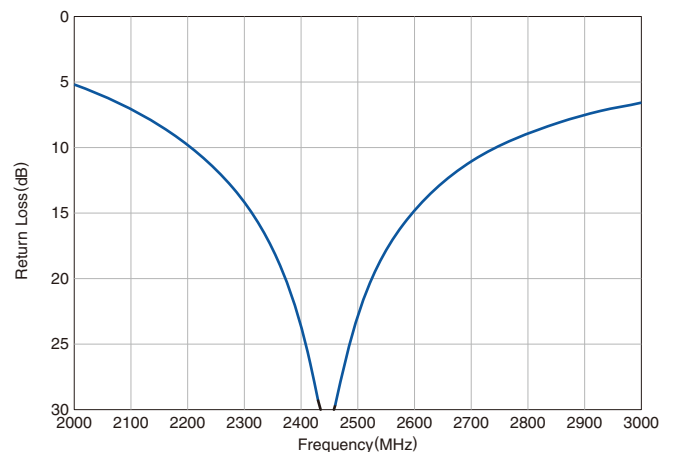
SDS21 ATTENUATION



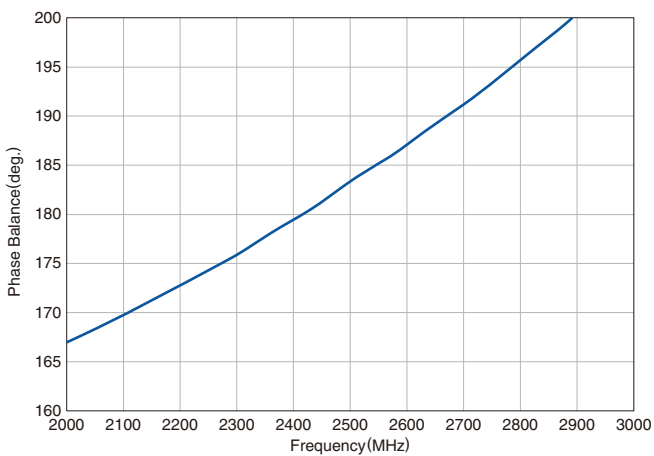
SSS11 RETURN LOSS at UNBALANCE PORT



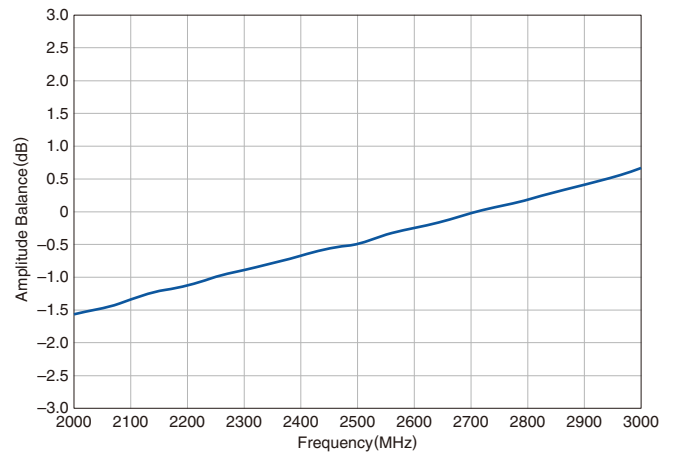
SDD22 RETURN LOSS at BALANCE PORT



PHASE BALANCE



AMPLITUDE BALANCE



- All specifications are subject to change without notice.
- Before using these products, be sure to request the delivery specifications.

RECOMMENDED REFLOW PROFILE



Preheating			Soldering			
Temp.	Temp.	Time	Critical zone (T3 to T4)		Temp.	Time
T1	T2	t1	T3	t2	T4	t3*
150°C	200°C	60 to 120sec	217°C	60 to 120sec	240 to 260°C	30sec max.

* t3 : Time within 5°C of actual peak temperature
 The maximum number of reflow is 3.

使用注意事项

在使用本产品前，请务必随附采购规格书。

安全注意事项

使用本产品时，请注意安全事项。

⚠ 注意

本产品目录中记载的产品是指在通用标准用途意义上使用于一般电子设备（AV 设备，通信设备，家电产品，娱乐设备，计算机设备，个人设备，办公设备，计测设备，工业机器人），并且该一般电子设备要在通常的操作和使用方法下使用。

对于需要高度安全性和可靠性的，或者设备的故障，误动作，运转不良可能会给人的生命，身体及财产等造成损害，以及有可能产生莫大社会影响的以下用途（以下称‘特定用途’）中的适用性，性能发挥，品质，本公司不予保证。

产品被在本产品目录的范围、条件之外，或者在特定用途中使用，本公司对它造成的损害和信赖性不承担任何责任。

- | | |
|-------------------------|--------------------|
| (1) 航天航空设备 | (8) 公共信息处理设备 |
| (2) 交通运输设备（汽车，电动火车，船舶等） | (9) 军事设备 |
| (3) 医疗设备 | (10) 电加热设备、燃烧设备 |
| (4) 发电控制设备 | (11) 防灾 / 预防犯罪设备 |
| (5) 原子能源相关设备 | (12) 安全设备 |
| (6) 海底设备 | (13) 其他不被视为常规用途的用途 |
| (7) 交通控制设备 | |

为了能够更安全地使用产品，对使用本产品目录中所记载产品的设备进行设计时，请确保符合该设备的使用用途及状态的保护回路和装置，并设置备用回路等。