

# INDUCTORS

322520-453226-565050-SMD POWER CHOKES - SMT TYPE

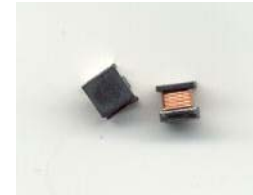
## TSD SDI

### APPLICATIONS

Excellent for power line DC-DC conversion applications used in hard disk, notebook computers and other electronic equipment.

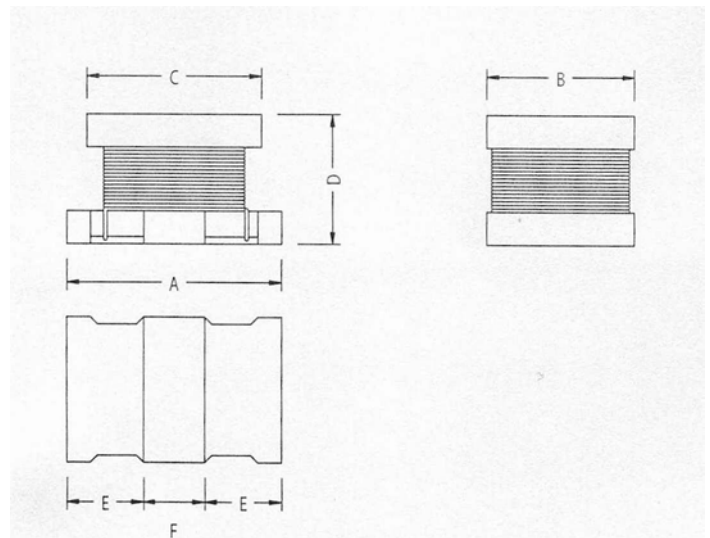
### FEATURES

- Magnetically Shielded surface mount inductor with high current rating
- Low resistance to keep power loss minimum



### MATERIALS CONSTRUCTION

- Core: Ferrite DR Core
- Wire: Enamelled copper wire
- Terminal: Ag+Cu+Ni+Sn/Pb



Shape	EIA	A	B	C	D	E(Ref)	F(Ref)
322520	1210	3.20±0.30	2.50±0.30	2.50±0.30	2.40Max	0.9	1.3
453226	1812	4.50±0.30	3.20±0.30	3.60±0.30	3.00Max	1.2	1.6
565050	2220	5.70±0.30	5.00±0.30	5.00±0.30	4.90Max	1.3	1.7

### SPECIFICATIONS

Temp Rise	40°C Max
Operating Temperature	-40°C~+85°C
Storage Temperature	-25°C~+125°C
Resistance to solder heat	260°C for 10 seconds
Rated current:	Based on Temperature & $\Delta L / L_{0A} = 10\% \text{ max.}$

### PART NUMBER IDENTIFICATION

TSD-SDI	322520	2R7	X
(1)	(2)	(3)	(4)
(1) Series Name			
(2) Dimension L x W x H			
(3) Inductance Code			
(4) Tolerance Code			
M=±20%			
K=±10%			

### TAPE AND REEL PACKAGING

Type	Pieces per reel	Plastic reel size
TSD SDI 322520	2,500	13"
TSD SDI 453226	2,500	13"
TSD SDI 565050	350	7"

# INDUCTORS

322520-SMD POWER CHOKES - SMT TYPE

## TSD SDI

### ◆ ELECTRICAL SPECIFICATIONS

Part Number	Inductance (uH)	Q Min	Testing Freq(KHz)		RDC (Ω)Max	IDC (mA)Max	SPF (MHz)Max.
			L	Q			
TSD-SDI 322520-R10X	0.10	10	1000	2520	0.25	700	200
TSD-SDI 322520-R18X	0.18	10	1000	2520	0.25	650	200
TSD-SDI 322520-R27X	0.27	10	1000	2520	0.25	600	200
TSD-SDI 322520-R39X	0.39	10	1000	2520	0.25	530	200
TSD-SDI 322520-R56X	0.56	10	1000	2520	0.25	530	160
TSD-SDI 322520-R68X	0.68	10	1000	2520	0.25	470	160
TSD-SDI 322520-R82X	0.82	10	1000	2520	0.25	450	120
TSD-SDI 322520-1R0X	1.0	10	1000	1000	0.50	445	100
TSD-SDI 322520-1R2X	1.2	10	1000	1000	0.60	425	100
TSD-SDI 322520-1R5X	1.5	10	1000	1000	0.60	400	75
TSD-SDI 322520-1R8X	1.8	10	1000	1000	0.70	390	60
TSD-SDI 322520-2R2X	2.2	10	1000	1000	0.80	370	50
TSD-SDI 322520-2R7X	2.7	10	1000	1000	0.90	320	43
TSD-SDI 322520-3R3X	3.3	10	1000	1000	1.00	300	38
TSD-SDI 322520-3R9X	3.9	10	1000	1000	1.10	290	35
TSD-SDI 322520-4R7X	4.7	20	1000	1000	1.20	270	31
TSD-SDI 322520-5R6X	5.6	20	1000	1000	1.30	250	28
TSD-SDI 322520-6R8X	6.8	20	1000	1000	1.50	240	25
TSD-SDI 322520-8R2X	8.2	20	1000	1000	1.60	225	23
TSD-SDI 322520-100X	10	25	1000	1000	1.80	190	20
TSD-SDI 322520-120X	12	25	1000	1000	2.00	180	18
TSD-SDI 322520-150X	15	25	1000	1000	2.20	170	16
TSD-SDI 322520-180X	18	25	1000	1000	2.50	165	15
TSD-SDI 322520-220X	22	25	1000	1000	2.80	150	14
TSD-SDI 322520-270X	27	25	1000	1000	3.10	125	13
TSD-SDI 322520-330X	33	25	1000	1000	3.50	115	12
TSD-SDI 322520-390X	39	25	1000	1000	3.90	110	11
TSD-SDI 322520-470X	47	25	1000	1000	4.30	100	11
TSD-SDI 322520-560X	56	25	1000	1000	4.90	85	10
TSD-SDI 322520-680X	68	25	1000	1000	5.50	80	9.0
TSD-SDI 322520-820X	82	25	1000	769	6.20	70	8.5
TSD-SDI 322520-101X	100	30	1000	769	7.00	80	8.0
TSD-SDI 322520-121X	120	30	1000	769	8.00	75	7.5
TSD-SDI 322520-151X	150	30	1000	769	9.30	70	7.0
TSD-SDI 322520-181X	180	30	1000	769	10.2	65	6.0
TSD-SDI 322520-221X	220	30	1000	769	11.8	65	5.5
TSD-SDI 322520-271X	270	30	1000	769	12.5	65	5.0
TSD-SDI 322520-331X	330	30	1000	769	13.0	65	5.0
TSD-SDI 322520-391X	390	30	1000	769	22.0	50	5.0
TSD-SDI 322520-471X	470	30	1	769	25.0	45	5.0
TSD-SDI 322520-561X	560	30	1	769	28.0	40	5.0

Note:

- 1) Inductance measured by LCR Meter HP 4284A,
- 2) RDC measured by Milliohm meter HP 4338A

# INDUCTORS

453226-SMD POWER CHOKES - SMT TYPE

## TSD SDI

### ◆ ELECTRICAL SPECIFICATIONS

Part Number	Inductance (uH)	Q Min	Testing Freq(KHz)		RDC (Ω)Max	IDC (mA)Max	SPF (MHz)Max.
			L	Q			
TSD-SDI 453226-1R0X	1.0	20	1000	2520	0.20	500	120
TSD-SDI 453226-1R2X	1.2	20	1000	2520	0.20	500	100
TSD-SDI 453226-1R5X	1.5	20	1000	2520	0.30	500	85
TSD-SDI 453226-1R8X	1.8	20	1000	2520	0.30	500	75
TSD-SDI 453226-2R2X	2.2	20	1000	2520	0.30	500	62
TSD-SDI 453226-2R7X	2.7	20	1000	2520	0.32	500	53
TSD-SDI 453226-3R3X	3.3	20	1000	2520	0.35	500	47
TSD-SDI 453226-3R9X	3.9	20	1000	1000	0.38	500	41
TSD-SDI 453226-4R7X	4.7	30	1000	1000	0.40	500	38
TSD-SDI 453226-5R6X	5.6	30	1000	1000	0.47	500	33
TSD-SDI 453226-6R8X	6.8	30	1000	1000	0.50	450	31
TSD-SDI 453226-8R2X	8.2	30	1000	1000	0.56	450	27
TSD-SDI 453226-100X	10	35	1000	1000	0.56	400	23
TSD-SDI 453226-120X	12	35	1000	1000	0.62	380	21
TSD-SDI 453226-150X	15	35	1000	1000	0.73	360	19
TSD-SDI 453226-180X	18	35	1000	1000	0.82	340	17
TSD-SDI 453226-220X	22	35	1000	1000	0.94	320	15
TSD-SDI 453226-270X	27	35	1000	1000	1.1	300	14
TSD-SDI 453226-330X	33	35	1000	1000	1.2	270	12
TSD-SDI 453226-390X	39	35	1000	1000	1.4	240	11
TSD-SDI 453226-470X	47	35	1000	1000	1.5	220	10
TSD-SDI 453226-560X	56	35	1000	1000	1.7	200	9.3
TSD-SDI 453226-680X	68	35	1000	1000	1.9	180	8.4
TSD-SDI 453226-820X	82	35	1000	1000	2.2	170	7.5
TSD-SDI 453226-101X	100	40	1000	769	2.5	160	6.8
TSD-SDI 453226-121X	120	40	1000	769	3.0	150	6.2
TSD-SDI 453226-151X	150	40	1000	769	3.7	130	5.5
TSD-SDI 453226-181X	180	40	1000	769	4.5	120	5.0
TSD-SDI 453226-221X	220	40	1000	769	5.4	110	4.5
TSD-SDI 453226-271X	270	40	1000	769	6.8	100	4.0
TSD-SDI 453226-331X	330	40	1000	769	8.2	95	3.6
TSD-SDI 453226-391X	390	40	1000	769	9.7	90	3.3
TSD-SDI 453226-471X	470	40	1	769	11.8	80	3.0
TSD-SDI 453226-561X	560	40	1	769	14.5	70	2.7
TSD-SDI 453226-681X	680	40	1	769	17.0	65	2.5
TSD-SDI 453226-821X	820	40	1	769	20.5	60	2.2
TSD-SDI 453226-102X	1000	40	1	769	25.0	50	2.0
TSD-SDI 453226-122X	1200	40	1	769	30.0	45	1.8
TSD-SDI 453226-152X	1500	40	1	769	37.0	40	1.6
TSD-SDI 453226-182X	1800	40	1	769	45.0	35	1.5
TSD-SDI 453226-222X	2200	40	1	769	50.0	30	1.3

Note:

- 1) Inductance measured by LCR Meter HP 4284A,
- 2) RDC measured by Milliohm meter HP 4338A

# INDUCTORS

565050-SMD POWER CHOKES - SMT TYPE

## TSD SDI

### ◆ ELECTRICAL SPECIFICATIONS

Part Number	Inductance (uH)	Q Min	Testing Freq (KHz)	RDC ( $\Omega$ )Max	IDC (mA)Max	SPF (MHz)Max.
TSD-SDI 565050-1R0X	1.0	10	2.52	0.03	1800	95
TSD-SDI 565050-1R2X	1.2	10	2.52	0.04	1700	70
TSD-SDI 565050-1R5X	1.5	10	2.52	0.04	1600	55
TSD-SDI 565050-1R8X	1.8	10	2.52	0.05	1400	47
TSD-SDI 565050-2R2X	2.2	10	2.52	0.06	1300	42
TSD-SDI 565050-2R7X	2.7	10	2.52	0.07	1200	37
TSD-SDI 565050-3R3X	3.3	10	2.52	0.08	1120	34
TSD-SDI 565050-3R9X	3.9	10	2.52	0.09	1050	32
TSD-SDI 565050-4R7X	4.7	10	2.52	0.11	950	29
TSD-SDI 565050-5R6X	5.6	10	2.52	0.13	880	26
TSD-SDI 565050-6R8X	6.8	10	2.52	0.15	810	24
TSD-SDI 565050-8R2X	8.2	10	2.52	0.18	750	22
TSD-SDI 565050-100X	10	10	2.52	0.21	690	19
TSD-SDI 565050-120X	12	10	2.52	0.25	630	17
TSD-SDI 565050-150X	15	10	2.52	0.30	580	16
TSD-SDI 565050-180X	18	10	2.52	0.36	530	14
TSD-SDI 565050-220X	22	10	2.52	0.43	480	13
TSD-SDI 565050-270X	27	10	2.52	0.52	440	11.5
TSD-SDI 565050-330X	33	10	2.52	0.62	400	10.5
TSD-SDI 565050-390X	39	10	2.52	0.72	370	9.5
TSD-SDI 565050-470X	47	10	2.52	0.85	340	8.5
TSD-SDI 565050-560X	56	10	2.52	1.0	310	7.8
TSD-SDI 565050-680X	68	10	2.52	1.2	290	7.0
TSD-SDI 565050-820X	82	10	2.52	1.4	270	6.4
TSD-SDI 565050-101X	100	10	0.796	1.6	250	6.0
TSD-SDI 565050-121X	120	10	0.796	1.9	230	5.4
TSD-SDI 565050-151X	150	10	0.796	2.2	210	4.8
TSD-SDI 565050-181X	180	10	0.796	2.8	190	4.4
TSD-SDI 565050-221X	220	10	0.796	3.4	170	3.9
TSD-SDI 565050-271X	270	10	0.796	4.2	155	3.6
TSD-SDI 565050-330X	330	10	0.796	4.9	140	3.2

Note:

- 1) Inductance measured by LCR Meter HP 4284A,
- 2) RDC measured by Milliohm meter HP 4338A