SMTDRH SERIES

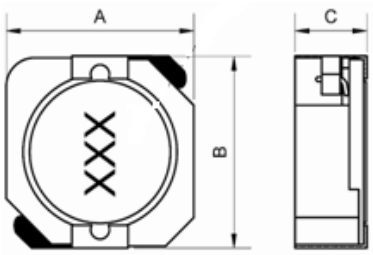
SHIELDED SMT POWER INDUCTORS.

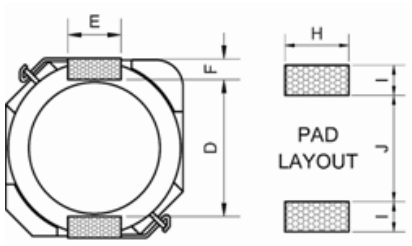


Applications :

- Automotive reliability comply with **AEC-Q200** grade 1
- Power supply for VTRs.
- LCD televisions.
- Portable communication equipment.
- DC/DC converters, etc.

Shape and Dimensions (Dimensions are in mm) :





Item	A Max.	B Max.	C Max.
SMTDRH104RM	10.3	10.4	4.0
SMTDRH105RM	10.3	10.4	5.0

Item	D	E	F	H	I	J
SMTDRH104RM	7.7	3.0	1.2	3.6	1.7	7.3
SMTDRH105RM	7.7	3.0	1.2	3.6	1.7	7.3

Features :

- Directly connected electrode on ferrite core.
- Ideal inductors for DC-DC conversion.
- High power, High saturation inductors.
- With magnetic shield against radiation.
- Available on tape and reel for auto surface mounting.

Product Identification :

SMT	DRH104R	M -	470	N
1	2	3	4	5

(1) Type : **S**urface **M**ountable **T**ype.

(2) Style : **DR** Core with **RI** shield , **104R** is size.

(3)Vehicle product code : **M= temp. -40~125℃**

(4) Inductance : **470** for **47** uH.

(5)Inductance tolerance : **N** : ± 30%.

Characteristics :

- Saturation Current(Isat):The current when the inductance becomes 30% lower than is initial value.(Ta=20℃)
- Temperature Rise Current(Irms):The current when temperature of coil increases up to max.△T=40℃.(Ta=20℃)
- Operating temperature : -40℃ to 125℃.

Test equipments :

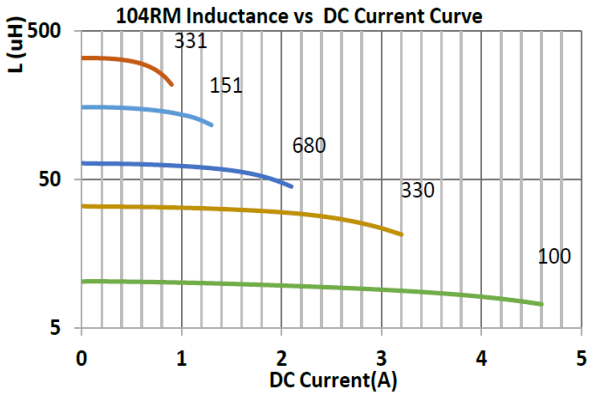
- Inductance measured at 0Adc on HP 4284A LCR meter or equivalent.
- DCR measured on Chroma 16502 micro-ohmmeter or equivalent.
- Electrical specifications at 25℃.

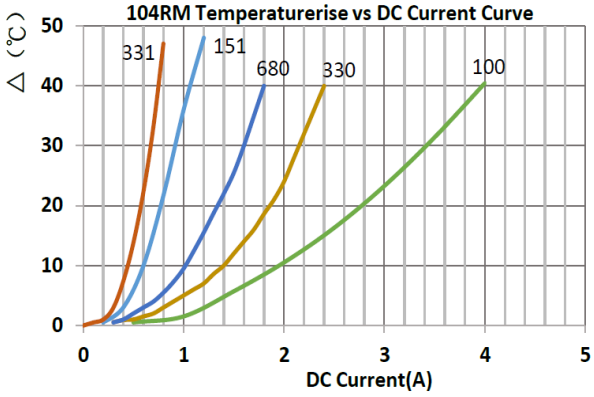
● SMTDRH104RM series

Part NO.	L(uH)	DCR(Ω)		I sat (A)		I rms (A)	
		Max.	Typ.	Max.	Typ.	Max.	Typ.
SMTDRH104RM-7R0N	7.0	27m	21m	4.80	6.00	3.80	4.80
SMTDRH104RM-100N	10	35m	27m	3.70	4.60	3.20	4.00
SMTDRH104RM-150N	15	50m	42m	3.40	4.00	2.50	3.10
SMTDRH104RM-220N	22	73m	60m	2.80	3.50	2.30	2.80
SMTDRH104RM-330N	33	110m	87m	2.40	3.00	2.00	2.40
SMTDRH104RM-470N	47	0.128	0.11	1.75	2.18	1.80	2.20
SMTDRH104RM-680N	68	0.213	0.16	1.70	2.10	1.50	1.80
SMTDRH104RM-101N	100	0.304	0.23	1.45	1.78	1.30	1.60
SMTDRH104RM-151N	150	0.506	0.42	1.11	1.39	0.85	1.05
SMTDRH104RM-221N	220	0.756	0.58	0.96	1.20	0.78	0.92
SMTDRH104RM-331N	330	1.20	0.96	0.70	0.88	0.65	0.75

Measuring Frequency : 7.0~330uH @100KHz 0.1V

Typical Performance curves:



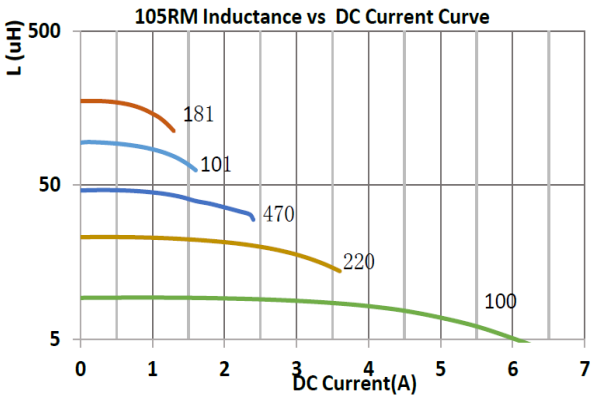


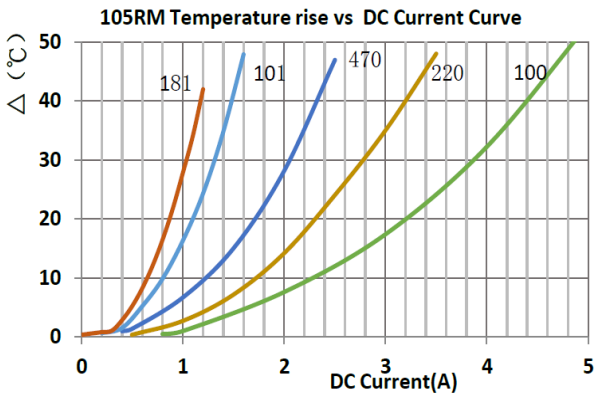
● SMTDRH105RM series

Part NO.	L(uH)	DCR(Ω)		I sat (A)		I rms (A)	
		Max.	Typ.	Max.	Typ.	Max.	Typ.
SMTDRH105RM-6R8N	6.8	18m	15m	5.60	7.00	5.00	6.05
SMTDRH105RM-8R2N	8.2	20m	17m	4.45	5.56	3.60	4.60
SMTDRH105RM-100N	10	26m	22m	4.10	5.10	3.50	4.40
SMTDRH105RM-120N	12	32m	25m	3.95	4.90	3.20	4.00
SMTDRH105RM-150N	15	40m	30m	3.36	4.20	2.90	3.60
SMTDRH105RM-180N	18	46m	36m	2.96	3.70	2.80	3.40
SMTDRH105RM-220N	22	59m	45m	2.65	3.30	2.60	3.20
SMTDRH105RM-270N	27	65m	49m	2.56	3.20	2.50	3.10
SMTDRH105RM-330N	33	81m	63m	2.20	2.70	2.10	2.60
SMTDRH105RM-390N	39	103m	85m	1.98	2.48	2.00	2.50
SMTDRH105RM-470N	47	122m	105m	1.90	2.35	1.90	2.30
SMTDRH105RM-560N	56	145m	115m	1.85	2.30	1.78	2.10
SMTDRH105RM-680N	68	0.19	0.14	1.61	2.02	1.58	1.90
SMTDRH105RM-820N	82	0.22	0.16	1.45	1.80	1.30	1.62
SMTDRH105RM-101N	100	0.25	0.21	1.21	1.52	1.20	1.50
SMTDRH105RM-121N	120	0.30	0.24	1.12	1.40	1.15	1.45
SMTDRH105RM-151N	150	0.35	0.27	1.05	1.32	1.10	1.38
SMTDRH105RM-181N	180	0.39	0.35	0.97	1.21	0.98	1.20
SMTDRH105RM-221N	220	0.48	0.41	0.86	1.08	0.89	1.10
SMTDRH105RM-271N	270	0.63	0.53	0.70	0.88	0.80	0.98
SMTDRH105RM-331N	330	0.78	0.62	0.68	0.85	0.72	0.90

Measuring Frequency : 6.8~330uH @100KHz 0.1V

Typical Performance curves:





* Due to the limited space, the catalogue shows the typical specifications only. For more specific details (characteristics graph, reliability, and others), kindly invite you to access 3L official website www.3lcoil.com for better known.