High Current, Encapsulated Surface-Mount Ferrite Inductors



STANDARD ELECTRICAL SPECIFICATIONS

PART NUMBER	L_0 IND. ± 15 % AT 0 A (µH)	DCR MAX. (Ω)	HEAT RATING CURRENT DC MAX. (A)	SATURATION CURRENT DC (A) (1)
IHSM7832ER1R0L	1.0	0.011	9.0	5.3
IHSM7832ER1R2L	1.2	0.012	8.8	4.8
IHSM7832ER1R5L	1.5	0.012	8.6	4.4
IHSM7832ER1R8L	1.8	0.013	8.5	4.0
IHSM7832ER2R2L	2.2	0.014	8.4	3.6
IHSM7832ER2R7L	2.7	0.016	8.2	3.2
IHSM7832ER3R3L	3.3	0.017	8.1	2.8
IHSM7832ER3R9L	3.9	0.02	7.3	2.6
IHSM7832ER4R7L	4.7	0.023	6.7	2.4
IHSM7832ER5R6L	5.6	0.025	6.0	2.3
IHSM7832ER6R8L	6.8	0.028	5.6	2.1
IHSM7832ER8R2L	8.2	0.032	5.3	1.9
IHSM7832ER100L	10	0.036	5.0	1.7
IHSM7832ER120L	12	0.04	4.8	1.5
IHSM7832ER150L	15	0.043	4.5	1.4
IHSM7832ER180L	18	0.047	4.2	1.3
IHSM7832ER220L	22	0.054	3.8	1.2
IHSM7832ER270L	27	0.074	3.4	1.1
IHSM7832ER330L	33	0.084	3.0	1.0
IHSM7832ER390L	39	0.095	2.8	0.9
IHSM7832ER470L	47	0.12	2.6	0.9
IHSM7832ER560L	56	0.14	2.4	0.82
IHSM7832ER680L	68	0.16	2.1	0.76
IHSM7832ER820L	82	0.184	1.9	0.72
IHSM7832ER101L	100	0.226	1.7	0.68
IHSM7832ER121L	120	0.305	1.5	0.61
IHSM7832ER151L	150	0.362	1.4	0.54
IHSM7832ER181L	180	0.399	1.3	0.48
IHSM7832ER221L	220	0.536	1.1	0.44
IHSM7832ER271L	270	0.599	0.95	0.4
IHSM7832ER331L	330	0.714	0.86	0.36
IHSM7832ER391L	390	0.819	0.8	0.33
IHSM7832ER471L	470	1.1	0.74	0.31
IHSM7832ER561L	560	1.2	0.68	0.29
IHSM7832ER681L	680	1.58	0.63	0.26
IHSM7832ER821L	820	2.08	0.573	0.23
IHSM7832ER102L	1000	2.42	0.51	0.21
IHSM7832ER122L	1200	2.68	0.46	0.19
IHSM7832ER152L	1500	3.15	0.4	0.17
IHSM7832ER182L	1800	4.2	0.34	0.15
IHSM7832ER222L	2200	4.62	0.31	0.135
IHSM7832ER272L	2700	6.3	0.29	0.12
IHSM7832ER332L	3300	7.09	0.27	0.11
IHSM7832ER392L	3900	9.14	0.25	0.1
IHSM7832ER472L	4700	10.6	0.23	0.09
IHSM7832ER562L	5600	11.8	0.21	0.08
IHSM7832ER682L	6800	15.8	0.19	0.0775
IHSM7832ER822L	8200	21.8	0.17	0.0725
IHSM7832ER103L	10 000	24.6	0.16	0.07
IHSM7832ER123L	12 000	28.4	0.14	0.0625
IHSM7832ER153L	15 000	37.8	0.12	0.055
IHSM7832ER183L	18 000	44.1	0.11	0.05

Notes
- All test data is referenced to 25 °C ambient
- Test condition: 1 kHz, 1 V
- Operating temperature range -55 °C to +125 °C

(1) DC current (A) that will cause L_0 to drop approximately 5 %

FEATURES

- Wirewound ferrite core with flame retardant epoxy encapsulant (UL 94 V-0)
- Superior environmental protection and moisture resistance
- Tin-lead (SnPb) terminations available (see package code options)
- Material categorization: for definitions of compliance please see www.vishay.com/doc?99912

Pb-free

RoHS COMPLIANT

APPLICATIONS

Power line noise filters, filters for switching regulated power supplies, DC/DC converters, SCR, and triac controls and RFI suppression.

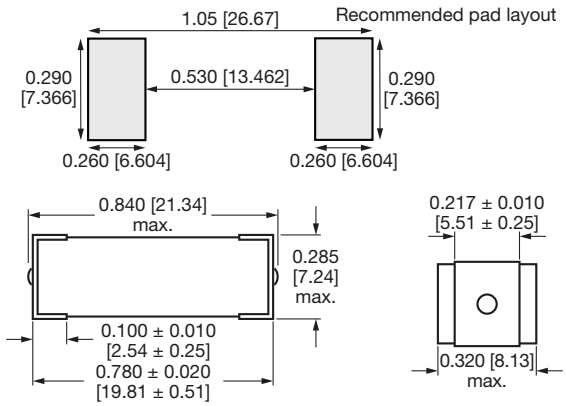
MECHANICAL SPECIFICATIONS

Core: high resistivity ferrite core

Encapsulant: epoxy

Terminals: 100 % Sn over Ni

DIMENSIONS in inches [millimeters]



PART MARKING

- Model
- Inductance value
- Date code

PACKAGE CODE OPTIONS

ER = pure tin terminal plating (RoHS-compliant) with tape and reel packaging

EB = pure tin terminal plating (RoHS-compliant) with bulk packaging

RG = tin-lead terminal plating (non-RoHS) with tape and reel packaging

PJ = tin-lead terminal plating (non-RoHS) with bulk packaging

For technical questions, contact: magnetics@vishay.com

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DESCRIPTION

IHSM-7832	3.9 µH	± 15 %	ER	e3
MODEL	INDUCTANCE VALUE	INDUCTANCE TOLERANCE	PACKAGE CODE	JEDEC® LEAD (Pb)-FREE STANDARD

GLOBAL PART NUMBER

I	H	S	M	7	8	3	2	E	R	3	R	9	L
PRODUCT FAMILY				SIZE				PACKAGE CODE		INDUCTANCE VALUE			TOL.

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