

SMD Power Inductors - HSF 、 HSB Series

FEATURES

- * SMD power inductors
- * High saturation characteristic core for large saturation current and low loss
- * Closed magnetic circuit design reduces leakage flux
- * High precision and lower DCR
- * Operating temperature range: -40 to +125°C(including self-temperature rise)
- * Halogen free, RoHS compliant
- * Moisture Sensitivity Level (MSL): 1

APPLICATIONS

- Server, desktop computer, notebook
- · Graphics, memory
- · Industrial equipment, telecom base station
- Multi-phase and Vcore regulators
- Battery power systems

ORDERING CODE(标志示例)

<u>HSF</u> _____ - ___ _

- (1) (2) (3) (4)
 - (1) HSF/HSB 向华料号 Part Number
 - (2) 尺寸 Dimensions
 - (4) 电感量 Inductance
 - (5) 电感量公差 Inductance Tolerance

MARKING(印字要求)



- RXX: Product Inductance Value(Ex. R15=150nH)
- YYWW: Manufactured Datecode
 - (Ex. 2105=2021Year 05 Week)



SMD Power Inductors - HSF100875 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	Е		
		10.2±0.2	8.0max	7.3±0.2	2.2±0.2	2.54±0.5		
HSF100875				v W				

HSF100875 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF100875T-R12K	120	0.29	80	56		
HSF100875T-R15K	150	0.29	73	56		
HSF100875T-R17K	170	0.29	66	56		
HSF100875T-R22K	220	0.29	50	56	24	700
HSF100875T-R27K	270	0.29	40	56		
HSF100875T-R30K	300	0.29	35	56		
HSF100875T-R40K	400	0.29	25	56		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF 090609 Series

D E	e & Dimensions(mm)					
0.01	C D	В	Α	рното	SERIES	
2.6typ 2.5typ	9.0max 2.6typ	6.4max	9.6max			
		A				
RXX	o R	Ω -				
				12 100		
		E			HSF090609	
					HSF090609	

HSF090609 series Electrical Characteristics

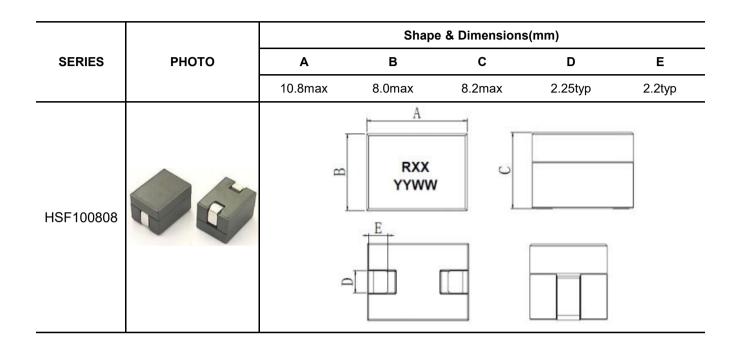
Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
Part NO.	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF090609T-R15K	150	0.17	75	66		500
HSF090609T-R17K	170	0.17	65	66	04	
HSF090609T-R18K	180	0.17	60	66	24	
HSF090609T-R30K	300	0.17	33	66		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF 100808 Series



HSF100808 series Electrical Characteristics

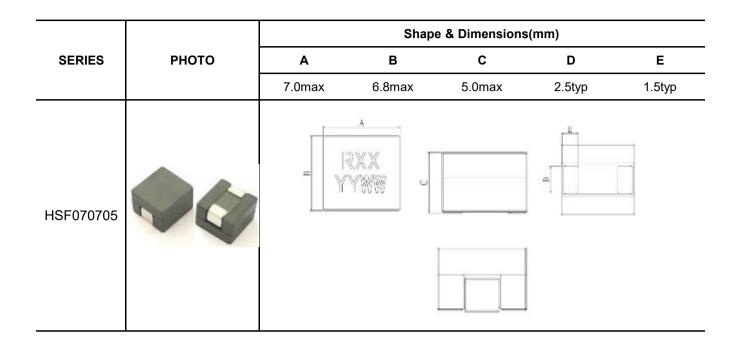
Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF100808T-R10K	100	0.18	100+	74		
HSF100808T-R12K	120	0.18	89	74		
HSF100808T-R15K	150	0.18	75	74		
HSF100808T-R18K	180	0.18	61	74	24	400
HSF100808T-R22K	220	0.18	56	74		
HSF100808T-R27K	270	0.18	44	74		
HSF100808T-R30K	300	0.18	36	74	1	

Note: When ordering, please specify tolerance code. Tolerance: K=±10% L=±15% M=±20% .

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF070705 Series



HSF070705 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF070705T-R07K	70	0.32	65	39		900
HSF070705T-R10K	100	0.32	46	39	16	
HSF070705T-R12K	120	0.32	37	39		
HSF070705T-R15K	150	0.32	30	39		
HSF070705T-R18K	180	0.32	25	39		
HSF070705T-R22K	220	0.32	20	39		

Note: When ordering, please specify tolerance code. Tolerance: K=±10% L=±15% M=±20% .

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF040404 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	E		
		4.0max	4.0max	4.0max	1.4typ	0.9typ		
HSF040404			A RXX					

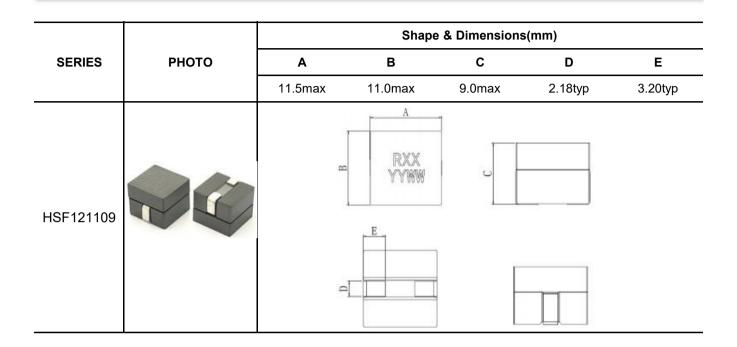
HSF040404 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
Fait NO.	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF040404T-R05K	55	0.32	30	40	10	1800
HSF040404T-R06K	66	0.32	26	40		
HSF040404T-R08K	80	0.32	22	40	12	
HSF040404T-R10K	100	0.32	17	40		

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF121109 Series



HSF121109 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier	Quantity
Part NO.	(nH)±10%	typical	(Amps)	(Amps)	Tape Width (mm)	(pcs/Reel)
HSF121109T-R15K	150	0.30	105	55		
HSF121109T-R18K	180	0.30	90	55		
HSF121109T-R22K	220	0.30	78	55		
HSF121109T-R25K	250	0.30	68	55		
HSF121109T-R29K	290	0.30	55	55	24	300
HSF121109T-R33K	330	0.30	54	55		
HSF121109T-R38K	380	0.30	45	55		
HSF121109T-R47K	470	0.30	38	55		
HSF121109T-R50K	500	0.30	32	55		

Note: When ordering, please specify tolerance code. Tolerance: $K=\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF100807 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	Е		
		10.7max	8.0max	7.0max	2.1±0.05	2.2±0.15		
HSF100807		m	A RXX YYWW	о 				
		0						

HSF100807 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier	Quantity
Part NO.	(nH)±10%	typical	(Amps)	(Amps)	Tape Width (mm)	(pcs/Reel)
HSF100807T-R15K	150	0.29	75	61		
HSF100807T-R18K	180	0.29	60	61		
HSF100807T-R22K	220	0.29	50	61		
HSF100807T-R27K	270	0.29	41	61	24	700
HSF100807T-R30K	300	0.29	35	61	24	700
HSF100807T-R33K	330	0.29	33	61		
HSF100807T-R39K	390	0.29	28	61		
HSF100807T-R47K	470	0.29	23.5	61		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF100705 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	E		
		10.2max	7.0max	5.0max	2.3±0.1	1.52±0.25		
HSF100705								

HSF100705 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF100705T-R08K	80	0.32	80	45	24	800
HSF100705T-R10K	100	0.32	62	45		
HSF100705T-R12K	120	0.32	56	45		
HSF100705T-R15K	150	0.32	50	45		
HSF100705T-R20K	200	0.32	33	45		
HSF100705T-R22K	220	0.32	30	45		

Note: When ordering, please specify tolerance code. Tolerance: $K=\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF090608 Series

		Shape & Dimensions(mm)					
SERIES	рното	Α	В	С	D	E	
		9.4±0.3	6.2±0.2	8.0max	2.14±0.2	2.3±0.5	
			A				
	6	B	RXX	0			
HSF090608			E				
		۵					

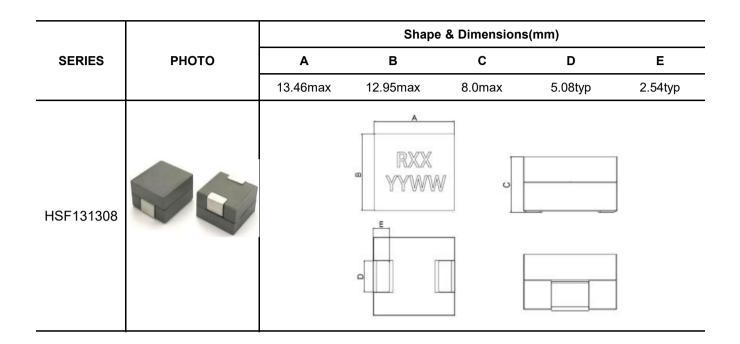
HSF090608 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF090608T-R10K	100	0.29	94	45		600
HSF090608T-R12K	120	0.29	79	45	24	
HSF090608T-R15K	150	0.29	65	45		
HSF090608T-R18K	180	0.29	54	45		
HSF090608T-R22K	220	0.29	44	45		
HSF090608T-R30K	300	0.29	32.5	45		

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF131308 Series



HSF131308 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF131308T-R18K	180	0.29	90	45		
HSF131308T-R21K	210	0.29	70	45		
HSF131308T-R26K	260	0.29	60	45	24	350
HSF131308T-R32K	320	0.29	50	45		
HSF131308T-R44K	440	0.29	35	45		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF110707 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	E		
		13.46max	12.95max	8.0max	5.08typ	2.54typ		
HSF110707				0				

HSF110707 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF110707T-R07K	70	0.29	100+	48		700
HSF110707T-R10K	100	0.29	100+	48		
HSF110707T-R12K	120	0.29	85	48		
HSF110707T-R15K	150	0.29	70	48		
HSF110707T-R23K	230	0.29	45	48	24	
HSF110707T-R30K	300	0.29	32	48	-	
HSF110707T-R40K	400	0.29	23	48		
HSF110707T-R50K	500	0.29	17	48		

Note: When ordering, please specify tolerance code. Tolerance: K=±10% L=±15% M=±20% $_{\circ}$

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF050506 Series

		Shape & Dimensions(mm)					
SERIES	рното	Α	В	С	D	Е	
		5.2max	5.0max	6.1max	2.0±0.2	1.4±0.2	
HSF050506	PC	m RX	X				

HSF050506 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF050506T-R05K	50	0.29	68	56	- 16	800
HSF050506T-R08K	80	0.29	44	56		
HSF050506T-R11K	110	0.29	31	56		
HSF050506T-R15K	150	0.29	17	56		

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB070711 Series

			Shap	e & Dimensions	(mm)	
SERIES	рното	Α	В	С	D	Е
		7.2max	11.2max	6.7max	3.3typ	1.9typ
HSB070711		ß	A	¢		

HSB070711 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB070711T-R10K	100	0.29	100+	40		300
HSB070711T-R12K	120	0.29	75	40	-	
HSB070711T-R15K	150	0.29	72	40		
HSB070711T-R18K	180	0.29	60	40	24	
HSB070711T-R20K	200	0.29	55	40	24	
HSB070711T-R22K	220	0.29	50	40	_	
HSB070711T-R23K	230	0.29	45	40		
HSB070711T-R33K	330	0.29	28	40		

Note: When ordering, please specify tolerance code. Tolerance: K=±10% L=±15% M=±20% $_{\circ}$

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB100710 Series

		Shape & Dimensions(mm)						
SERIES	рното	Α	В	С	D	Е		
		10.0max	10.0max	7.0max	2.55±0.05	2.6±0.15		
HSB100710					c R10			

HSB100710 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB100710T-R10K	100	0.185	100+	50		350
HSB100710T-R12K	120	0.185	90	50	-	
HSB100710T-R15K	150	0.185	80	50		
HSB100710T-R18K	180	0.185	75	50	24	
HSB100710T-R20K	200	0.185	70	50	24	
HSB100710T-R22K	220	0.185	55	50	-	
HSB100710T-R28K	280	0.185	45	50		
HSB100710T-R33K	330	0.185	38	50		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB100612 Series

		Shape & Dimensions(mm)							
SERIES	рното	Α	В	С	D	Е			
		12.0max	10.0max	6.0max	2.4±0.3	3.0±0.4			
HSB100612		A	B	c [] [] [] []					

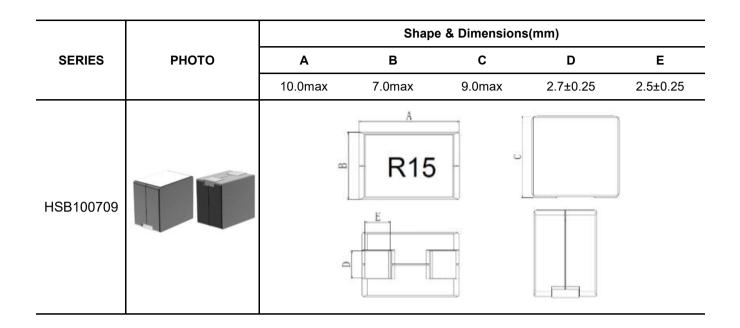
HSB100612 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	Isat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB100612T-R07K	70	0.125	170	77		
HSB100612T-R10K	100	0.125	125	77		
HSB100612T-R12K	120	0.125	105	77	24	300
HSB100612T-R15K	150	0.125	83	77		
HSB100612T-R33K	330	0.125	35	77		

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB100709 Series



HSB100709 series Electrical Characteristics

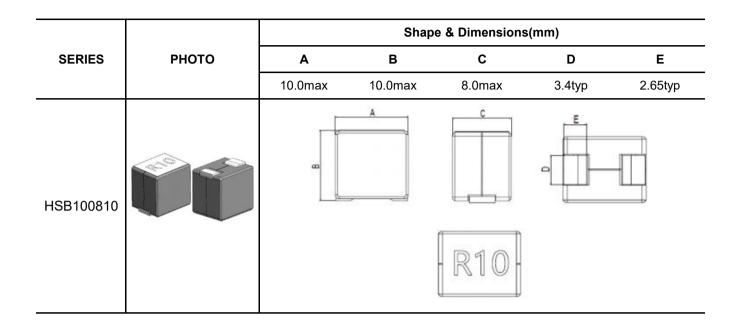
Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB100709T-R10K	100	0.18	100+	70		
HSB100709T-R12K	120	0.18	100+	70		
HSB100709T-R15K	150	0.18	75	70		
HSB100709T-R18K	180	0.18	65	70	24	400
HSB100709T-R22K	220	0.18	44	70		
HSB100709T-R33K	330	0.18	30	70		
HSB100709T-R40K	400	0.18	28	70		

Note: When ordering, please specify tolerance code. Tolerance: K=±10% L=±15% M=±20% $_{\circ}$

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB100810 Series



HSB100810 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB100810T-R10K	100	0.13	100+	65	24	300
HSB100810T-R12K	120	0.13	100+	65		
HSB100810T-R15K	150	0.13	75	65		
HSB100810T-R18K	180	0.13	65	65		
HSB100810T-R27K	270	0.13	42	65		
HSB100810T-R32K	320	0.13	40	65		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB110810 Series

			Shap	e & Dimensions	ns(mm)					
SERIES	рното	Α	В	С	D	E				
		10.7max	9.4±0.2	7.5max	2.4±0.3	3.0±0.4				
HSB110810		R								

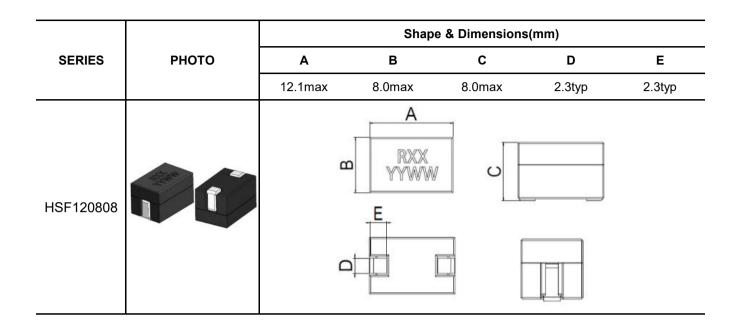
HSB110810 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB110810T-R20K	200	0.23	70	38		
HSB110810T-R22K	220	0.23	64	38		
HSB110810T-R27K	270	0.23	55	38	24	350
HSB110810T-R30K	300	0.23	50	38		
HSB110810T-R32K	320	0.23	42	38	1	

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSF120808 Series



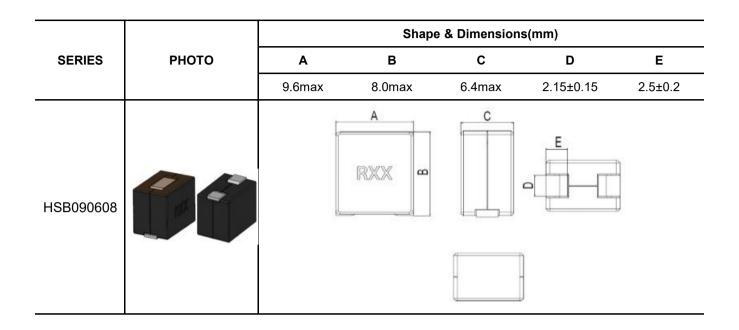
HSF120808 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSF120808T-R15K	150	0.29	85	50		
HSF120808T-R18K	180	0.29	72	50		
HSF120808T-R21K	210	0.29	65	50	24	500
HSF120808T-R23K	230	0.29	61	50		
HSF120808T-R25K	250	0.29	55	50		

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.



SMD Power Inductors - HSB090608 Series



HSB090608 series Electrical Characteristics

Part No.	Inductance	RDC(mΩ)	lsat	Irms	Carrier Tape Width	Quantity
	(nH)±10%	typical	(Amps)	(Amps)	(mm)	(pcs/Reel)
HSB090608T-R10K	100	0.29	94	51		
HSB090608T-R12K	120	0.29	79	51		
HSB090608T-R15K	150	0.29	65	51		
HSB090608T-R18K	180	0.29	55	51	24	600
HSB090608T-R22K	220	0.29	44	51		
HSB090608T-R28K	280	0.29	34	51		
HSB090608T-R30K	300	0.29	32.5	51		

Note: When ordering, please specify tolerance code. Tolerance: K= $\pm 10\%$ L= $\pm 15\%$ M= $\pm 20\%$.

- All test data is referenced to 25°C ambient;
- Inductance value test condition at 100KHz, 0.1V;
- Isat: Peak current for approximately 20% rolloff;
- Irms: DC current for an approximate temperature rise of 40 °C without core loss;
- Reel Diameter is 330mm.