



HIGH CURRENT INDUCTORS

MODEL NO : SHI-130065SD/SHI-130065FS**Features :**

- * SMD version.
- * Low core loss and efficiency performance.
- * Close magnetic path for low leakage flux.
- * Low DCR with flat wire design.
- * Compliant with RoHS and REACH.

Application :

- * DC/DC converter in power regulation system.
- * Automotive. * Routers. * Solar energy.

**Electrical Specification :**

PART NO	INDUCTANCE (μ H) $\pm 20\%$ @0ADC	INDUCTANCE (μ H) TYP @TEMPERATURE RISE CURRENT	TEMPERATURE RISE CURRENT (ADC) (NOTE 2)	SATURATION CURRENT (ADC) (NOTE 3)	DCR $\pm 10\%$ (m Ω)
SHI-130065SD-R20	0.20 $\pm 30\%$	0.17	32	65.0	0.37
SHI-130065SD-R47	0.47	0.36	30	50.0	0.64
SHI-130065SD-R82	0.82	0.65	26	35.0	1.04
SHI-130065SD-1R3	1.30	0.95	23	25.0	1.7
SHI-130065SD-2R0	2.00	1.45	20	22.0	2.5
SHI-130065SD-2R8	2.80	2.00	16.5	17.5	3.4
SHI-130065SD-3R7	3.70	2.85	13.5	16.0	4.9
SHI-130065SD-4R7	4.70	3.50	12.5	15.0	6.9
SHI-130065SD-6R0	6.00	4.70	10.5	14.0	8.3
SHI-130065FS-2R1	2.10	1.50	21.0	26.0	1.7
SHI-130065FS-3R0	3.00	2.20	17.0	23.0	2.5
SHI-130065FS-4R0	4.00	3.00	15.0	18.0	3.4
SHI-130065FS-5R4	5.40	3.80	14.0	14.5	4.9
SHI-130065FS-7R4	7.40	5.00	12.0	12.0	5.9
SHI-130065FS-9R2	9.20	6.30	10.5	10.5	7.6
SHI-130065FS-110	11.3	7.90	9.5	9.5	9.1
SHI-130065FS-130	13.0	9.30	8.5	9.0	11.0
SHI-130065FS-150	15.4	11.5	7.0	8.0	14.0
SHI-130065FS-180	18.0	14.0	6.6	7.5	22.0
SHI-130065FS-220	22.0	16.0	6.0	6.5	24.3
SHI-130065FS-330	33.0	23.0	5.3	5.5	30.5

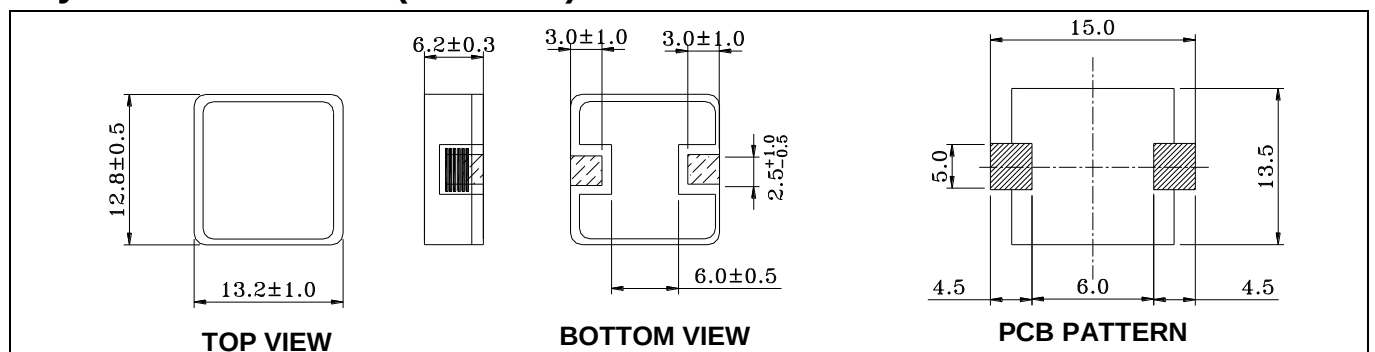
NOTE(1): Measuring condition: 100 KHZ, 0.1Vrms.

NOTE(2): $\Delta T = 40^\circ\text{C}$ approximately under the temperature rise current.

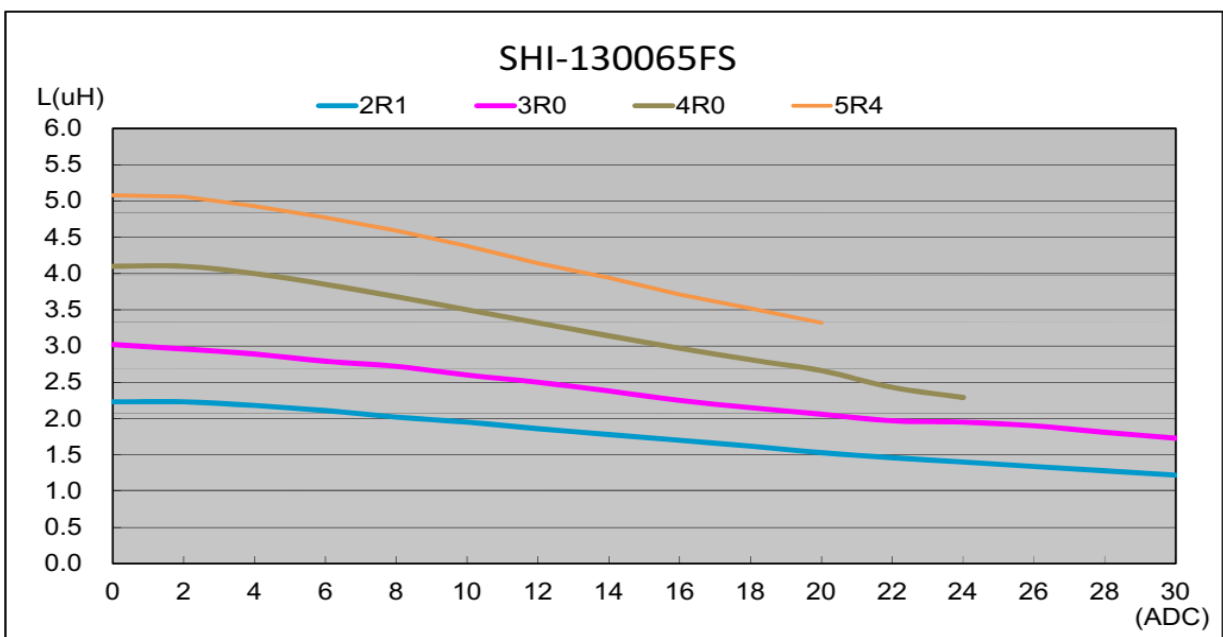
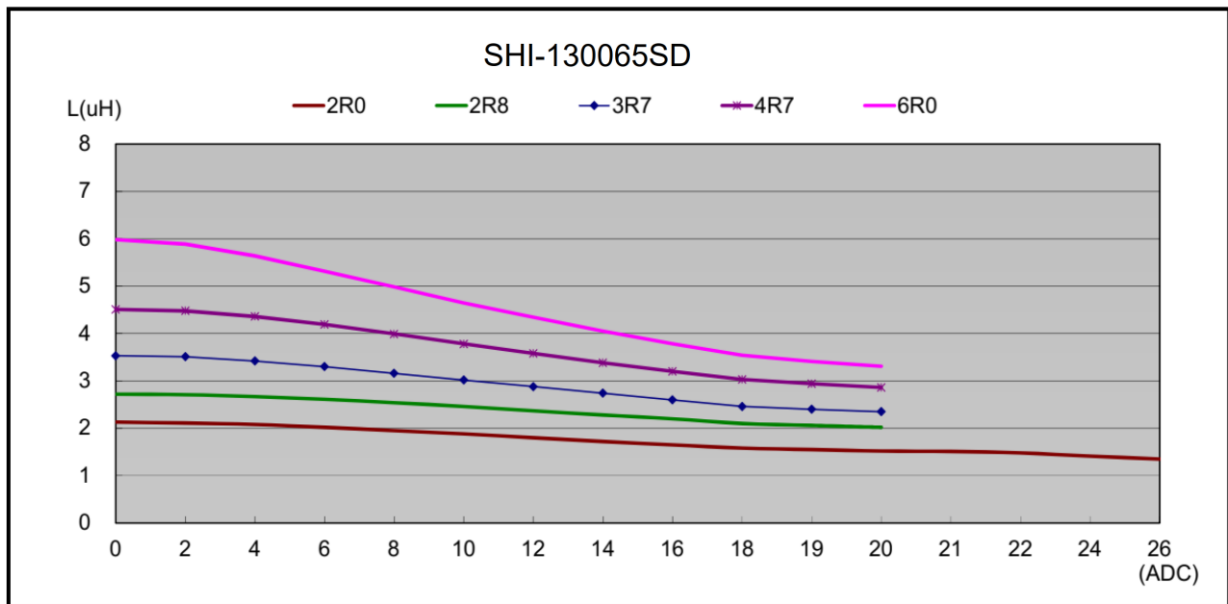
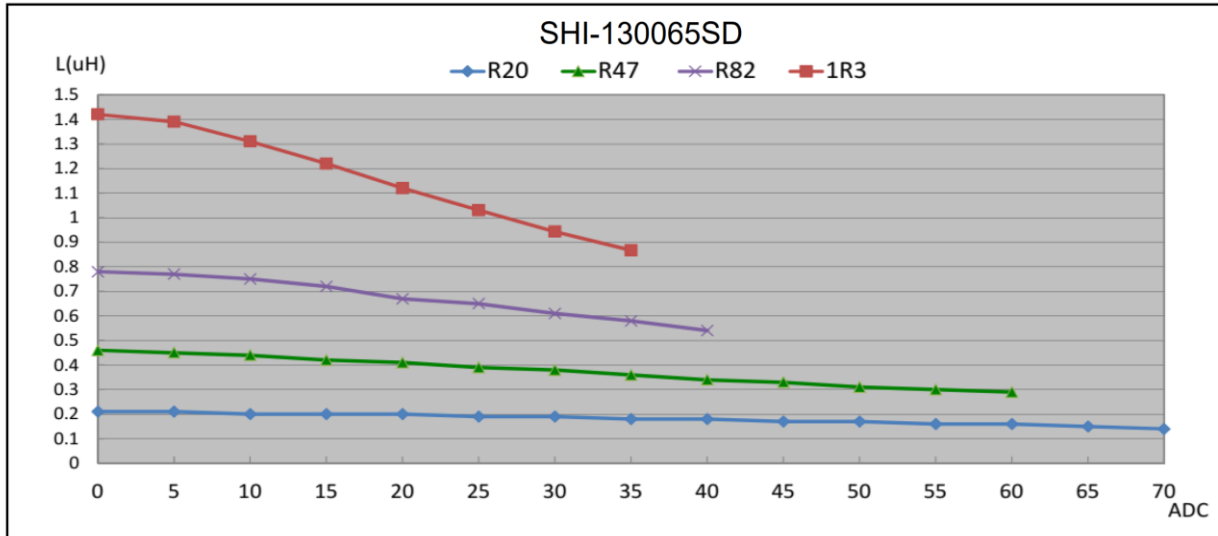
NOTE(3): The saturation current indicates the value of DC current is approximately 30% lower than its initial value of inductance.

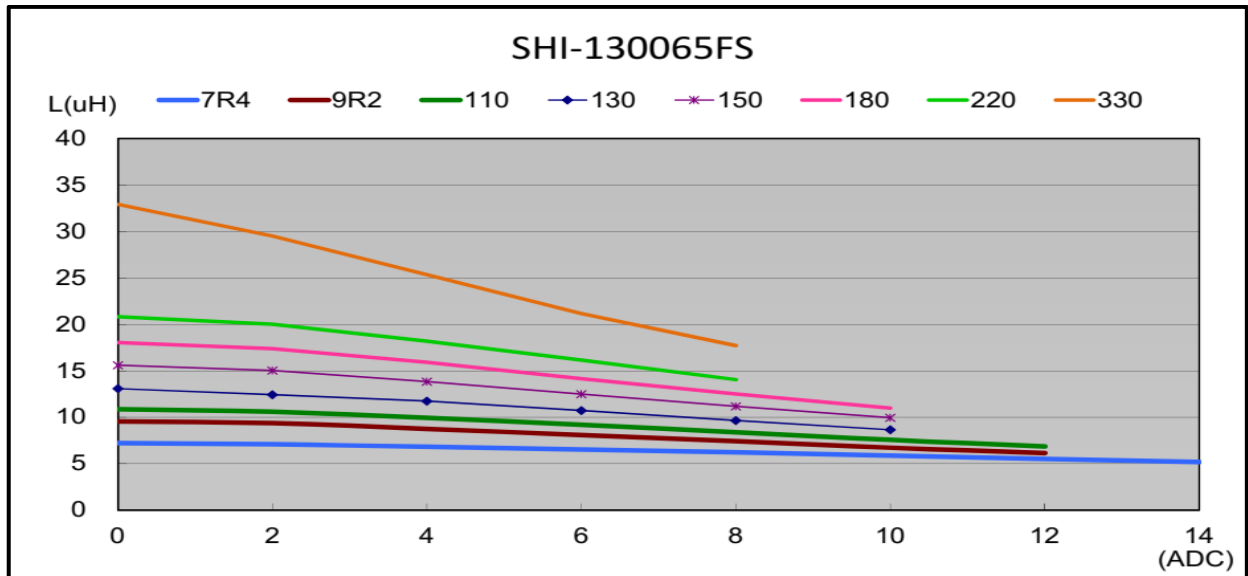
NOTE(4): Operating temperature range: $-40^\circ\text{C} \sim +150^\circ\text{C}$.

NOTE(5): Storage time :The recommended storage time of Inductor is maximum 12 months, and don't suggest to use the parts over 12 months.

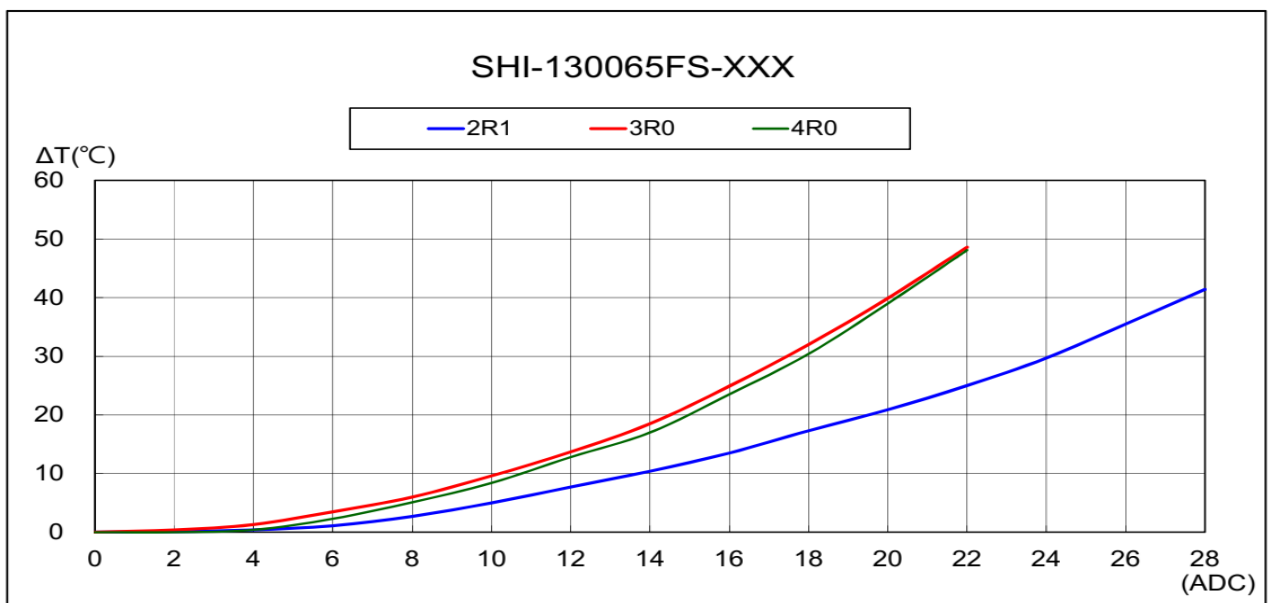
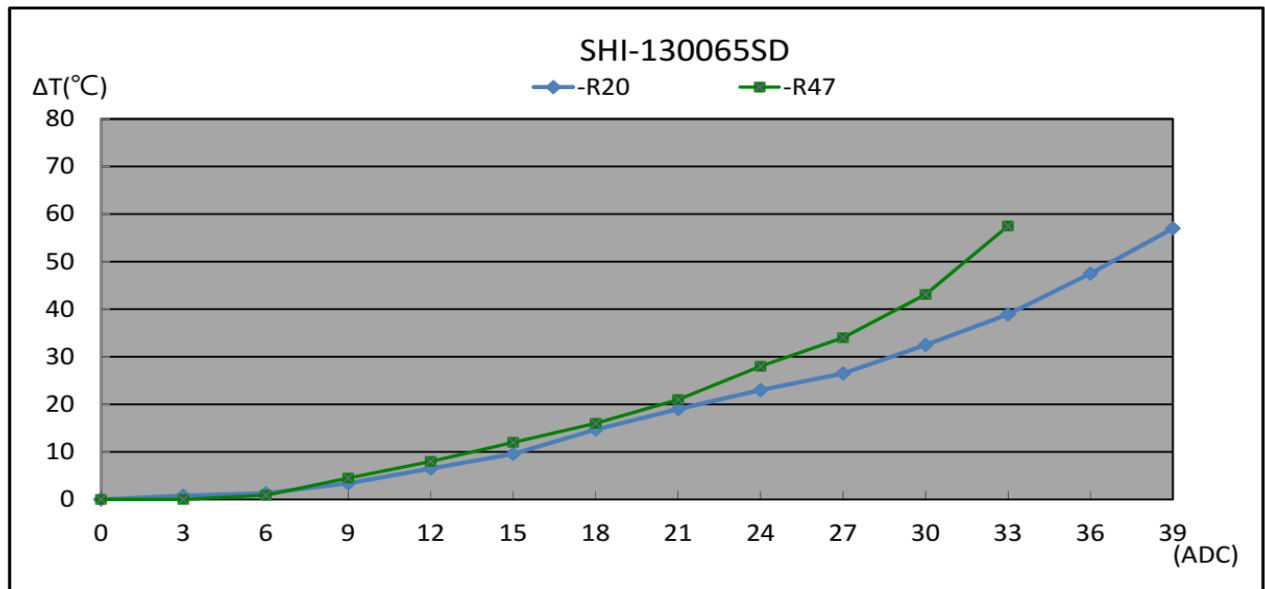
Physical Dimension : (unit :mm)

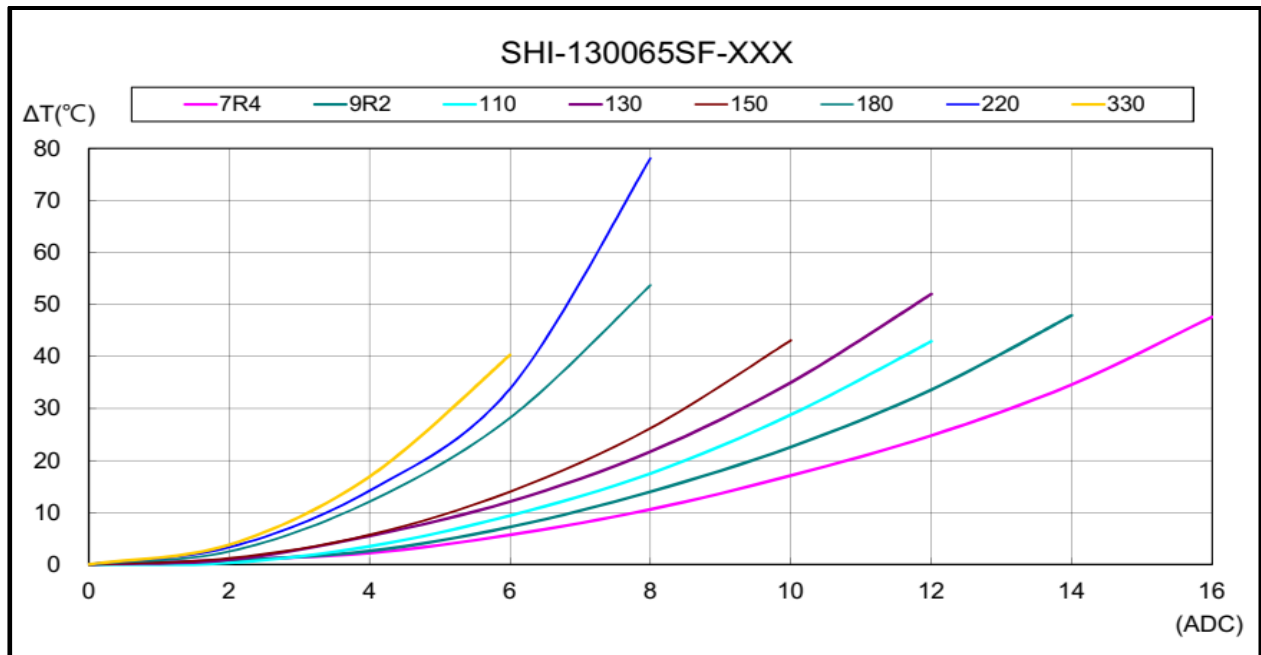
Inductance vs DC Bias:





Temperature Rise vs DC Bias:



**PACKAGING SPEC:**

1. REEL SIZE & UNITS PER REEL :13",400PCS.
2. TAPE WIDTH:24mm.
3. REEL WIDTH:29.5mm.
4. COMPONENT PITCH :16mm.