

SMD High Current Inductors

Fixed Inductor for Surface Mounting

SPH13060

Construction

- Metal alloy powder core
- Shielded construction

Features

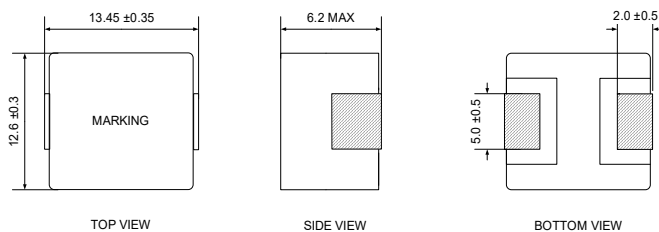
- Operating temperature -40 ~ +125°C
- Qualified to AEC-Q200
- Solder reflow temperature 260°C peak
- Low buzz noise
- High saturation current
- Suitable for lead-free reflow soldering

Applications

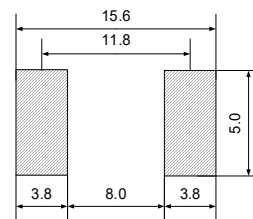
- Automotive / PDA / Notebook systems
- DC/DC converters
- Low profile, high current power supplies



Dimensions(Unit:mm)



Recommended Land Pattern(Unit:mm)



Electrical Characteristics

Ordering code	Inductance range (μH)	DCR(mΩ,MAX)	SRF(TYP,MHz)	Isat*1(A,TYP)	Irms*2(A,TYP)	Marking
SPH13060-3R3M	3.3±20%	6.8	19.0	25.0	17.5	3R3
SPH13060-4R7M	4.7±20%	9.0	15.0	24.0	15.0	4R7
SPH13060-5R6M	5.6±20%	11.0	13.0	22.5	13.0	5R6
SPH13060-6R8M	6.8±20%	13.5	12.0	19.0	12.0	6R8
SPH13060-8R2M	8.2±20%	16.0	11.5	13.5	11.0	8R2
SPH13060-100M	10±20%	20.7	8.1	12.5	10.0	100
SPH13060-120M	12±20%	23.0	7.9	10.0	9.0	120
SPH13060-150M	15±20%	29.0	7.7	9.0	8.5	150
SPH13060-180M	18±20%	35.0	6.8	8.0	7.5	180
SPH13060-220M	22±20%	39.5	6.5	7.5	7.0	220
SPH13060-270M	27±20%	56.0	6.0	6.5	6.0	270
SPH13060-330M	33±20%	75.0	4.7	6.0	5.5	330
SPH13060-470M	47±20%	90.0	4.0	5.5	5.0	470
SPH13060-680M	68±20%	140.0	3.5	4.5	4.0	680
SPH13060-101M	100±20%	200.0	2.5	3.5	3.0	101
SPH13060-121M	120±20%	235.0	2.4	3.2	2.0	121
SPH13060-151M	150±20%	350.0	2.0	2.7	1.5	151

※Test Equipment

*Inductance : Agilent 4284A (100kHz, 1.0V)

*DCR Meter : ABM3245 (20mΩ~2MΩ)

*Bias Current : Agilent 4284A + Agilent 42841A

*SRF : Agilent HP8753ES

*Notes

*1.Isat : DC current at which the inductance drops approximate 30%

*2.Irms : DC current that will cause an approximate ΔT of 40 °C

*Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

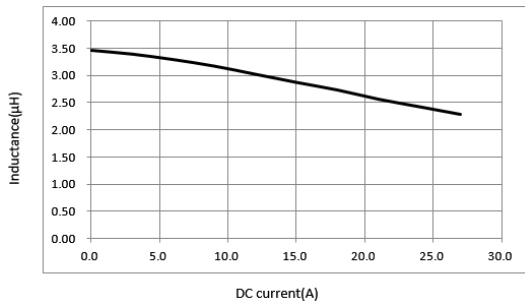
SMD High Current Inductors

Fixed Inductor for Surface Mounting

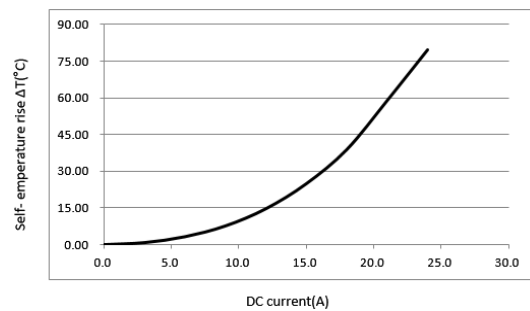
SPH13060

*SPH13060-3R3M

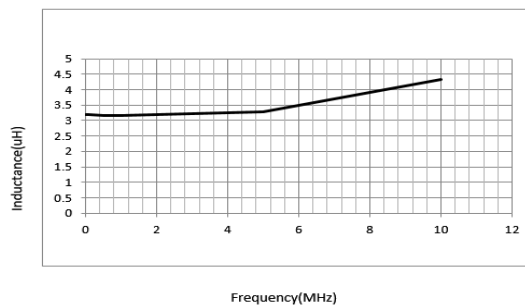
Inductance vs DC current



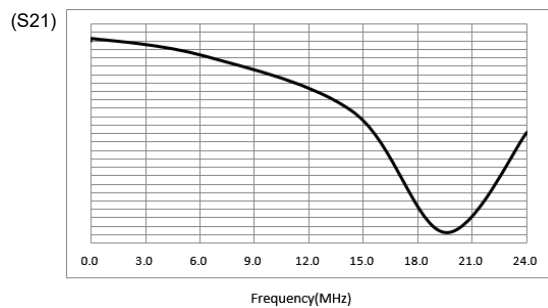
DC current vs Temperature



Inductance vs Frequency

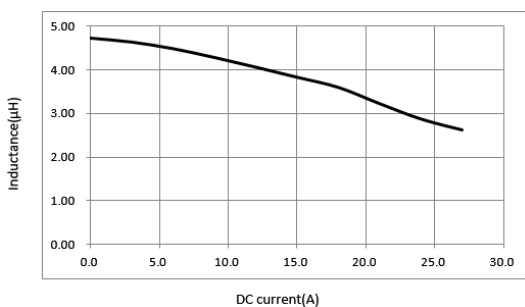


SRF(Self Resonance Frequency)

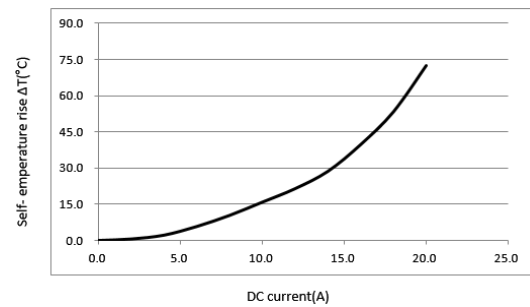


*SPH13060-4R7M

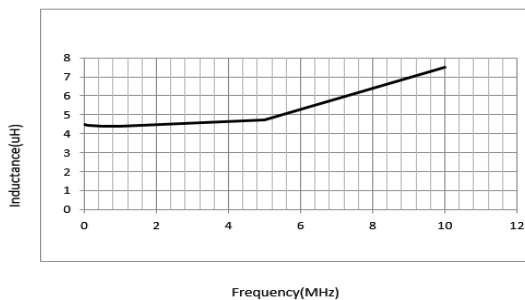
Inductance vs DC current



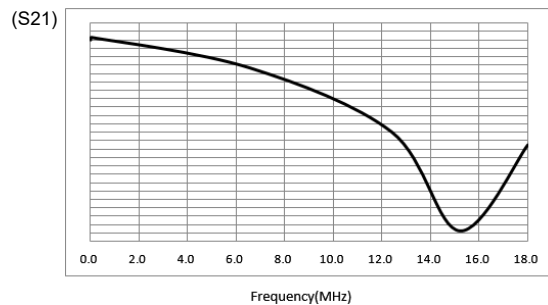
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

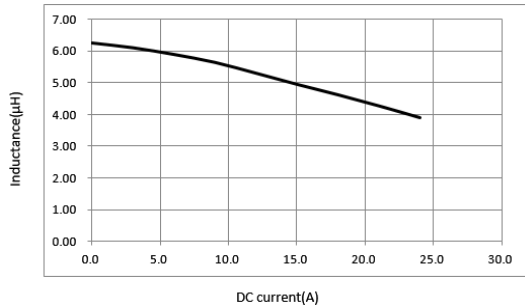
SMD High Current Inductors

Fixed Inductor for Surface Mounting

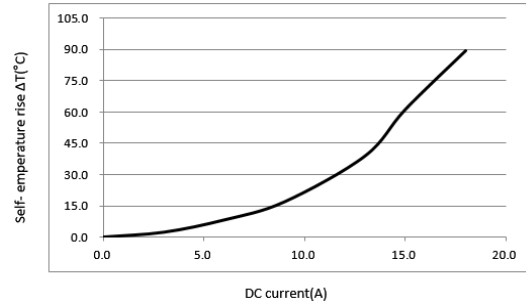
SPH13060

*SPH13060-5R6M

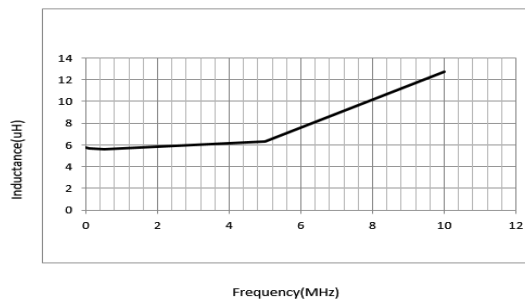
Inductance vs DC current



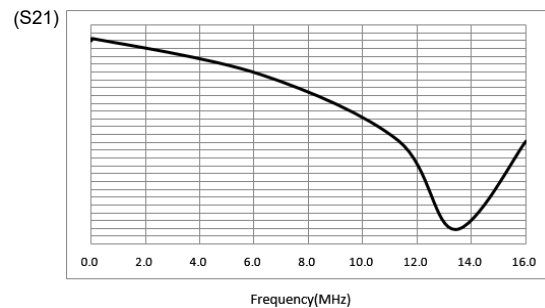
DC current vs Temperature



Inductance vs Frequency

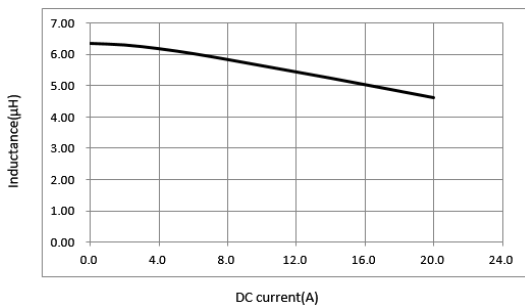


SRF(Self Resonance Frequency)

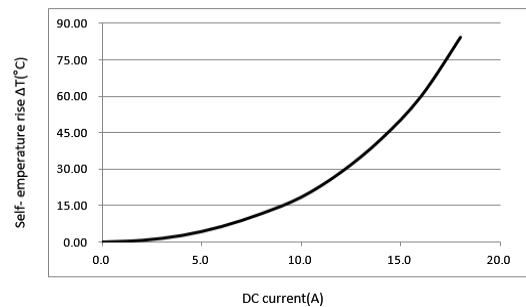


*SPH13060-6R8M

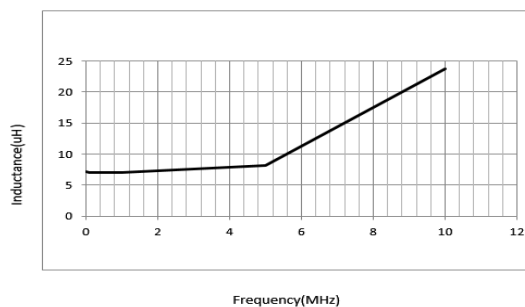
Inductance vs DC current



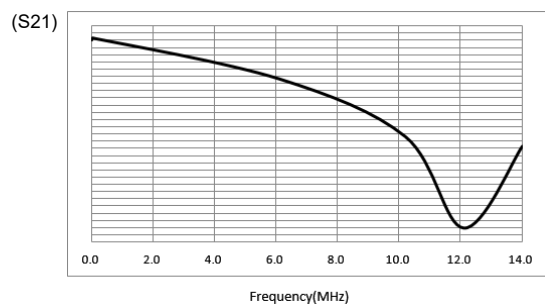
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

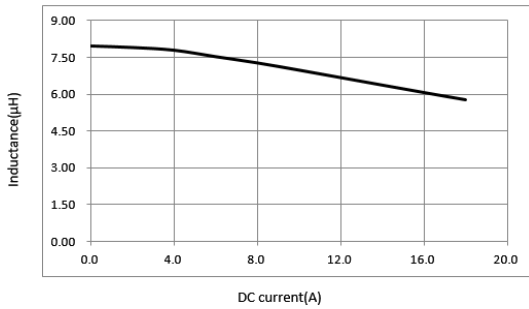
SMD High Current Inductors

Fixed Inductor for Surface Mounting

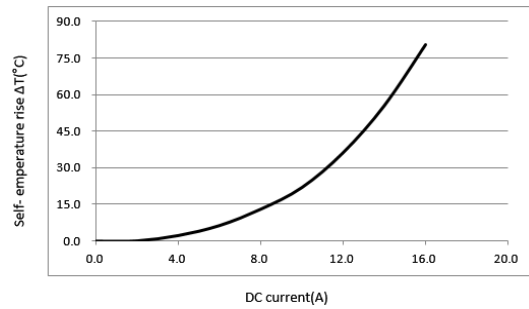
SPH13060

*SPH13060-8R2M

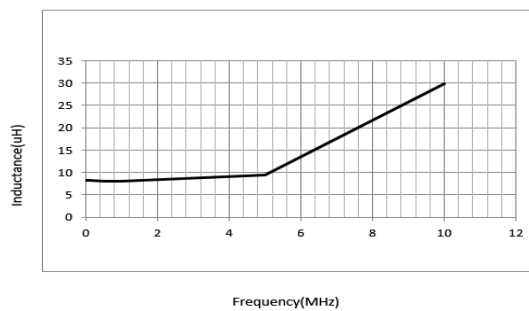
Inductance vs DC current



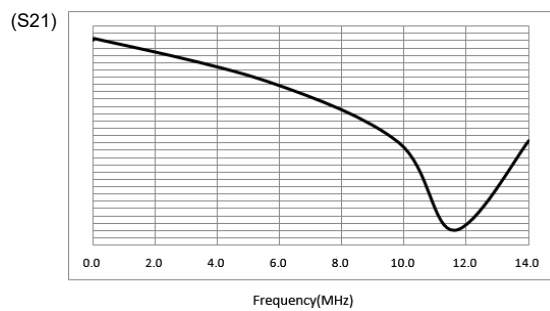
DC current vs Temperature



Inductance vs Frequency

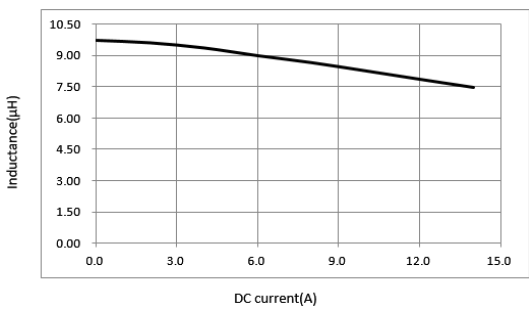


SRF(Self Resonance Frequency)

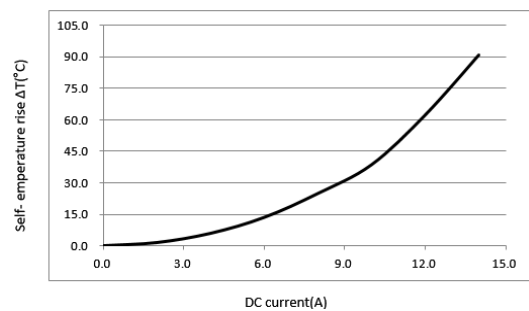


*SPH13060-100M

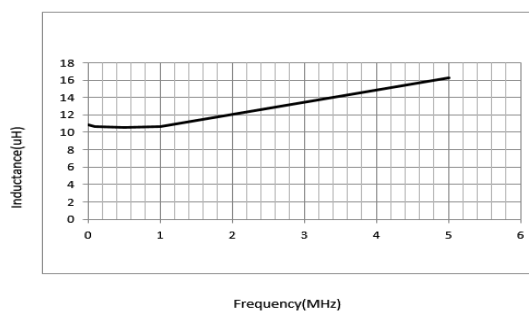
Inductance vs DC current



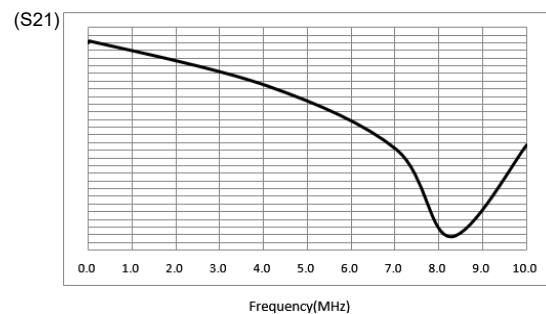
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

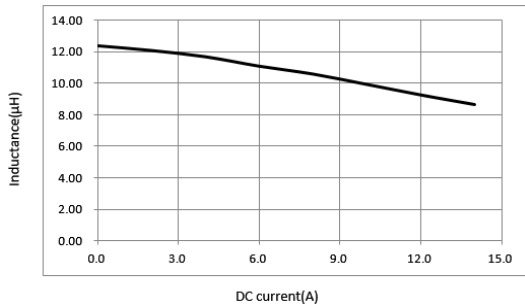
SMD High Current Inductors

Fixed Inductor for Surface Mounting

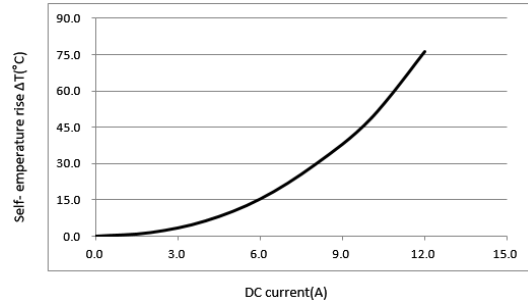
SPH13060

*SPH13060-120M

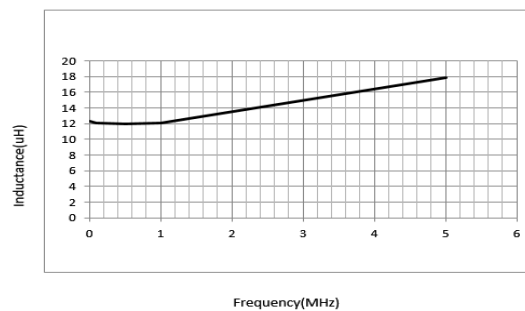
Inductance vs DC current



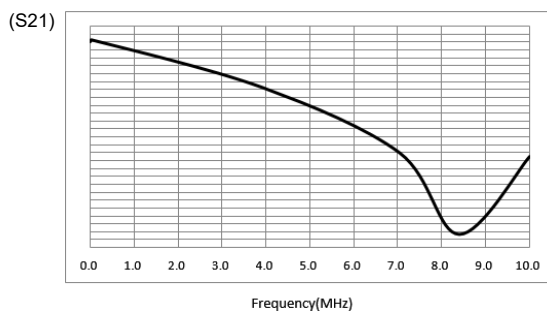
DC current vs Temperature



Inductance vs Frequency

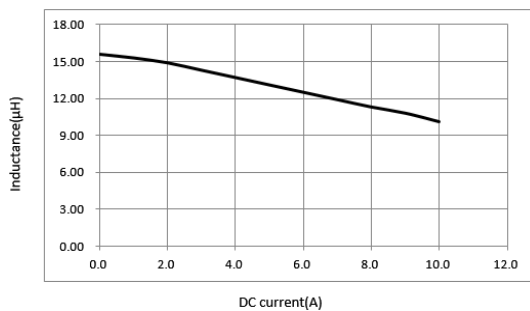


SRF(Self Resonance Frequency)

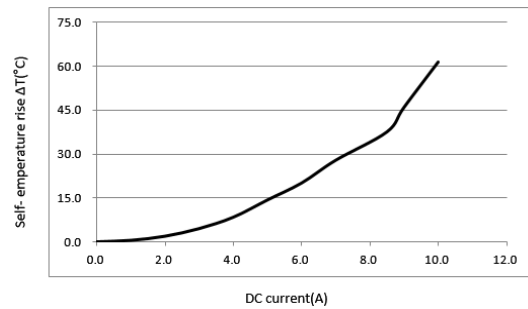


*SPH13060-150M

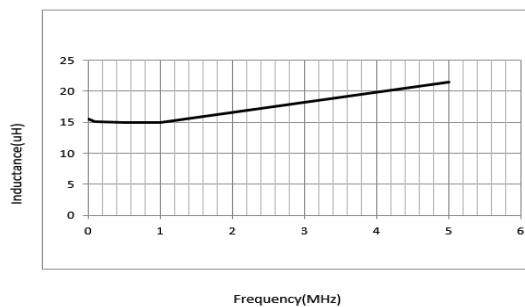
Inductance vs DC current



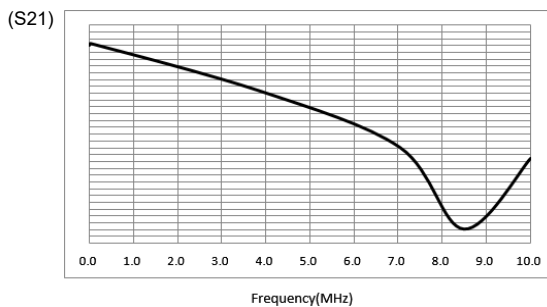
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

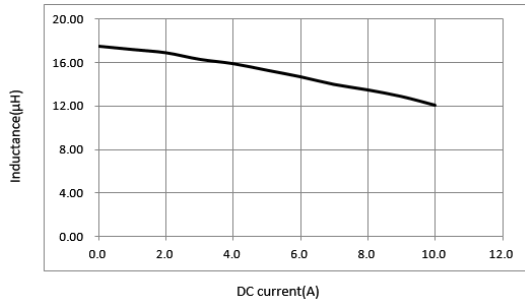
SMD High Current Inductors

Fixed Inductor for Surface Mounting

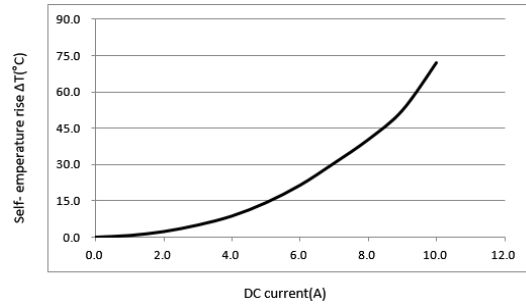
SPH13060

*SPH13060-180M

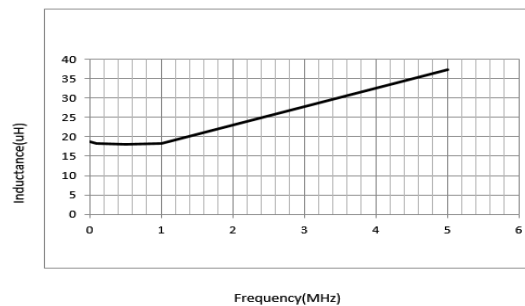
Inductance vs DC current



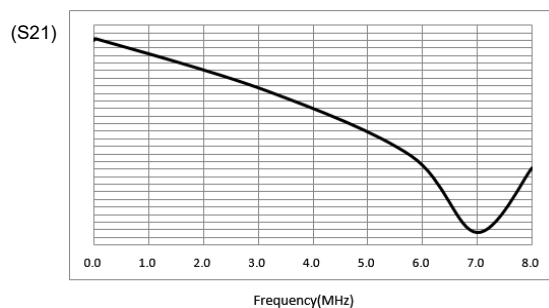
DC current vs Temperature



Inductance vs Frequency

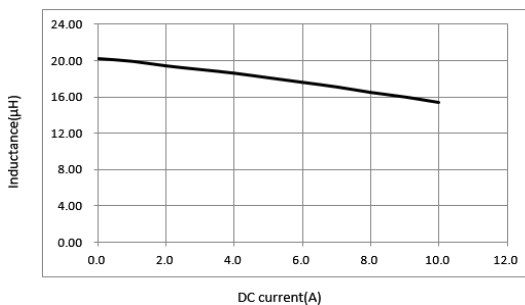


SRF(Self Resonance Frequency)

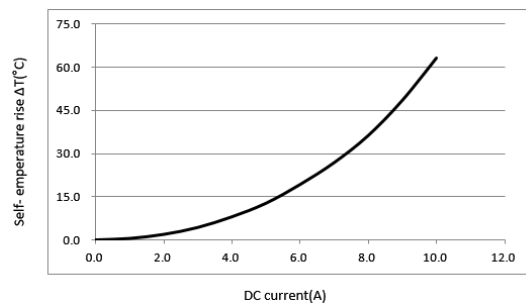


*SPH13060-220M

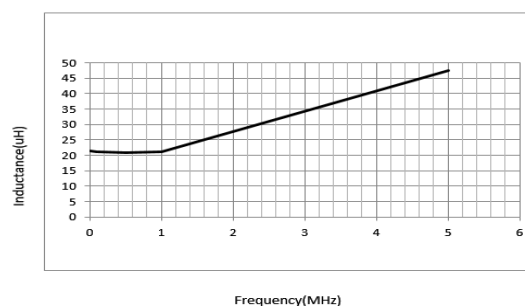
Inductance vs DC current



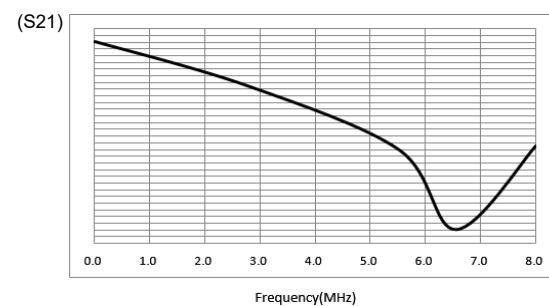
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

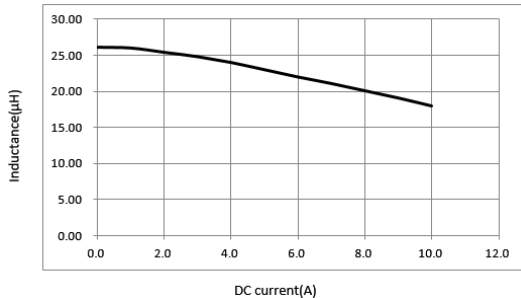
SMD High Current Inductors

Fixed Inductor for Surface Mounting

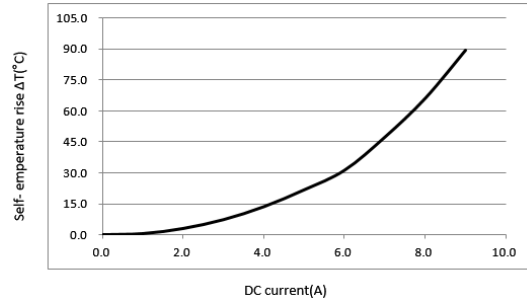
SPH13060

*SPH13060-270M

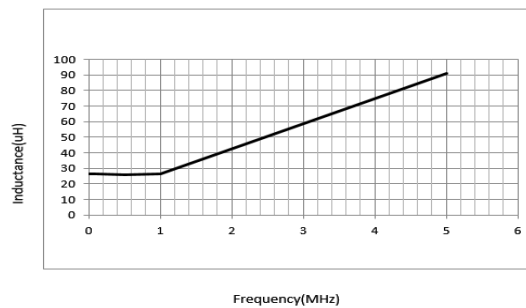
Inductance vs DC current



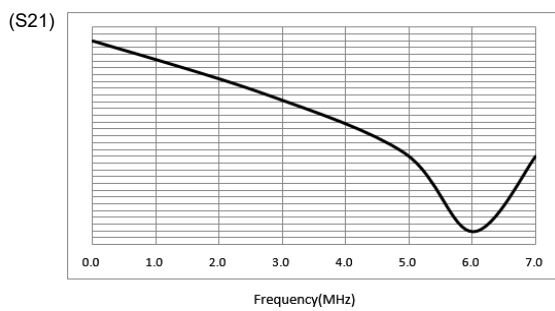
DC current vs Temperature



Inductance vs Frequency

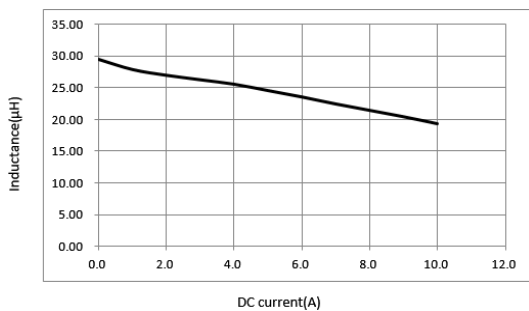


SRF(Self Resonance Frequency)

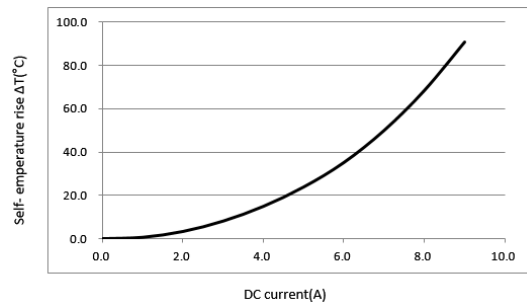


*SPH13060-330M

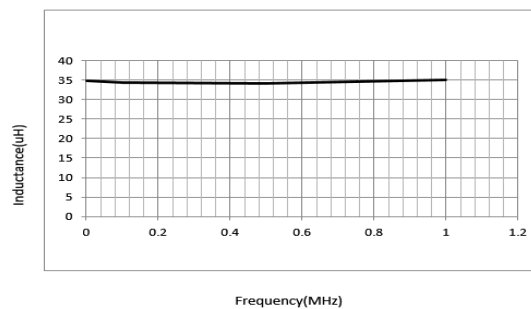
Inductance vs DC current



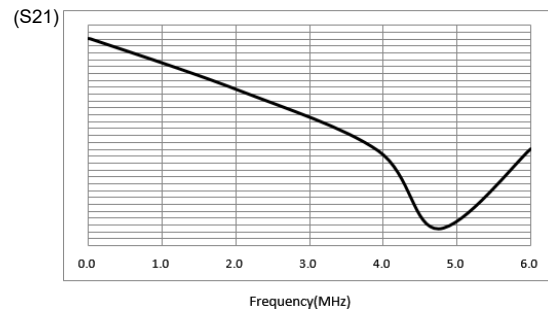
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

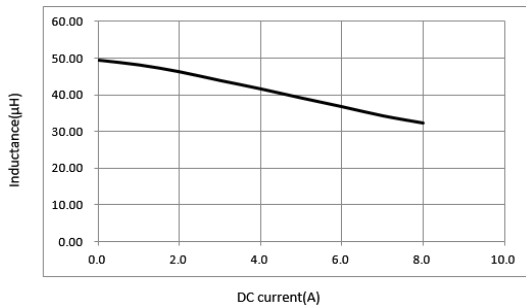
SMD High Current Inductors

Fixed Inductor for Surface Mounting

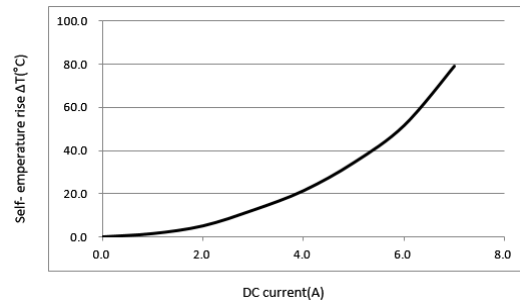
SPH13060

*SPH13060-470M

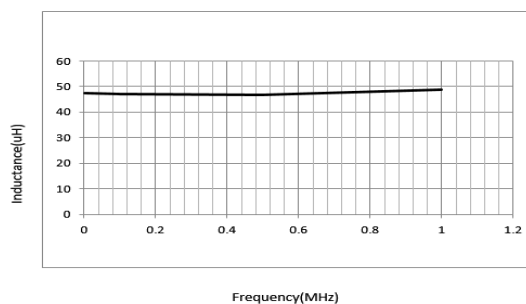
Inductance vs DC current



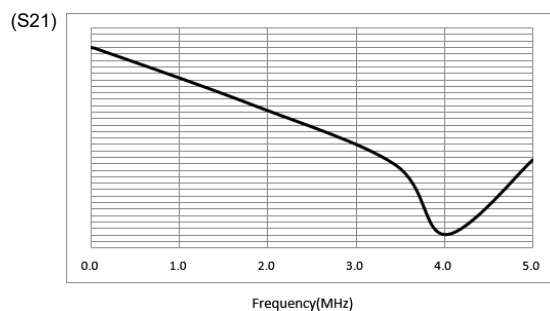
DC current vs Temperature



Inductance vs Frequency

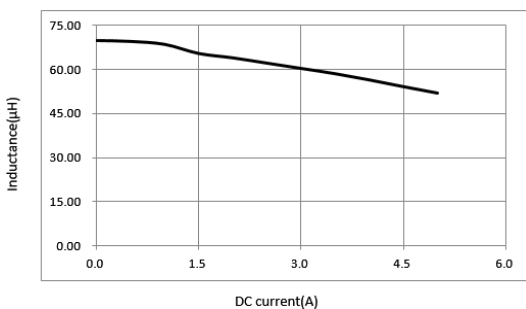


SRF(Self Resonance Frequency)

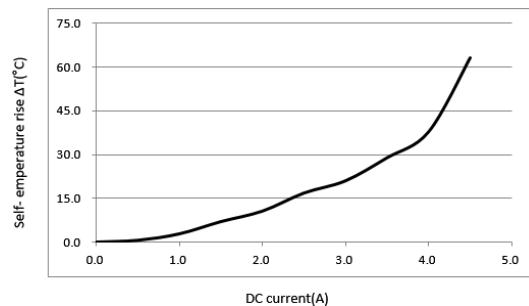


*SPH13060-680M

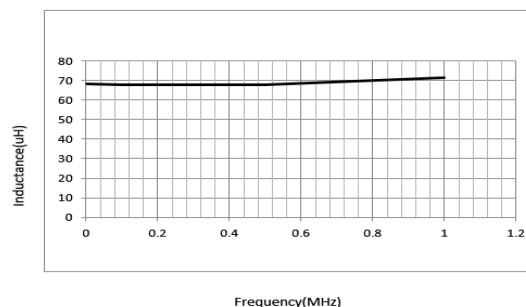
Inductance vs DC current



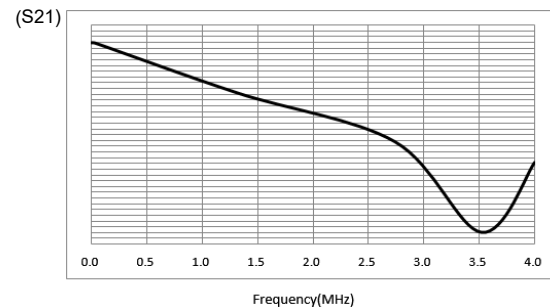
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

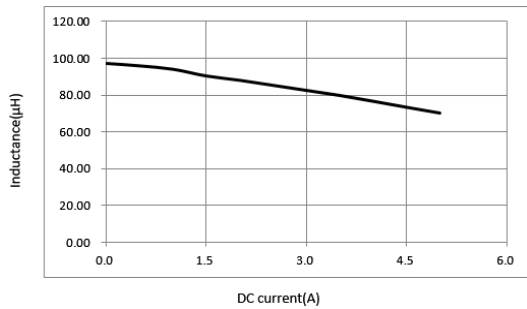
SMD High Current Inductors

Fixed Inductor for Surface Mounting

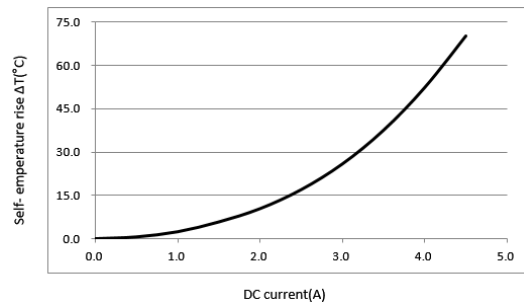
SPH13060

*SPH13060-101M

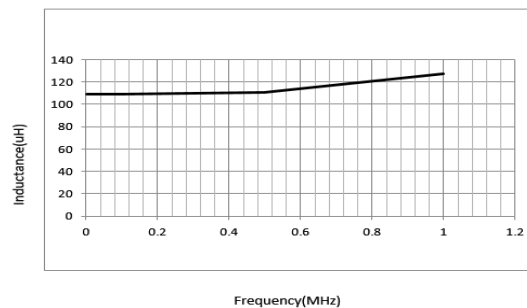
Inductance vs DC current



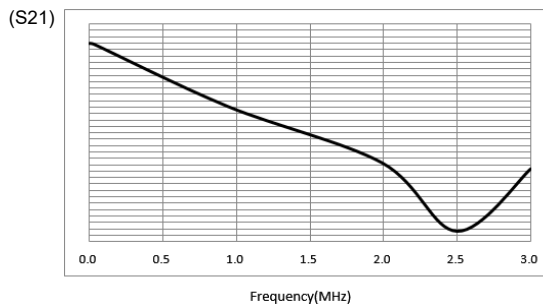
DC current vs Temperature



Inductance vs Frequency

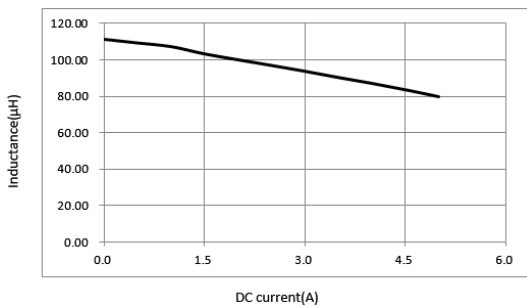


SRF(Self Resonance Frequency)

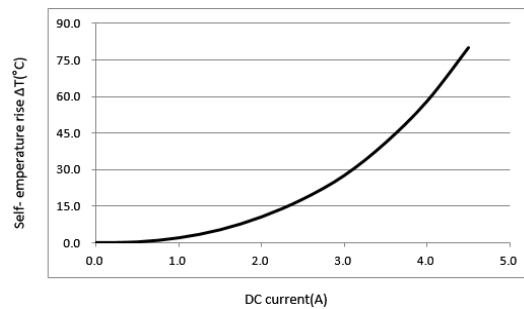


*SPH13060-121M

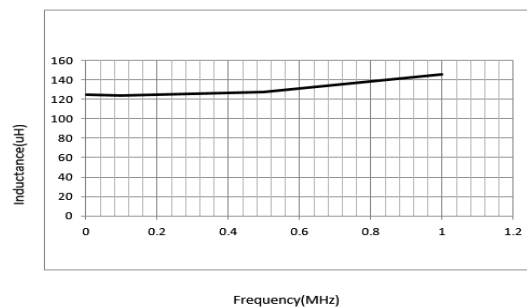
Inductance vs DC current



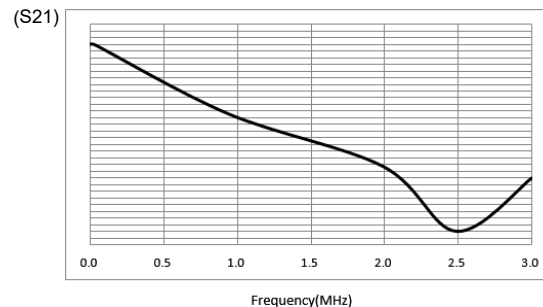
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21

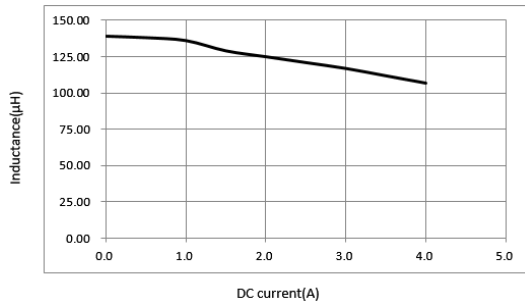
SMD High Current Inductors

Fixed Inductor for Surface Mounting

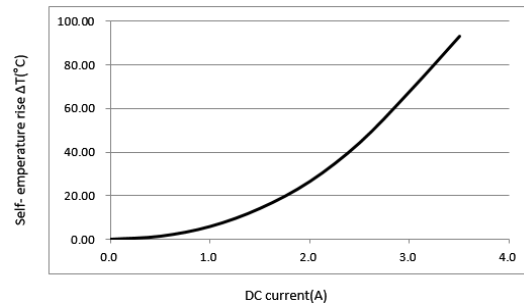
SPH13060

*SPH13060-151M

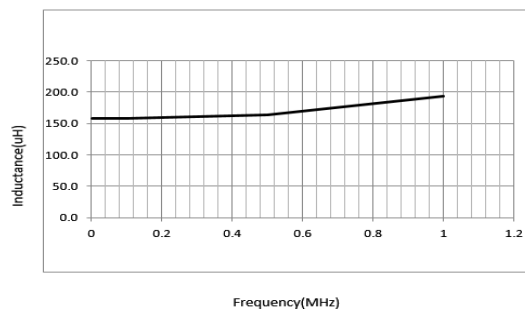
Inductance vs DC current



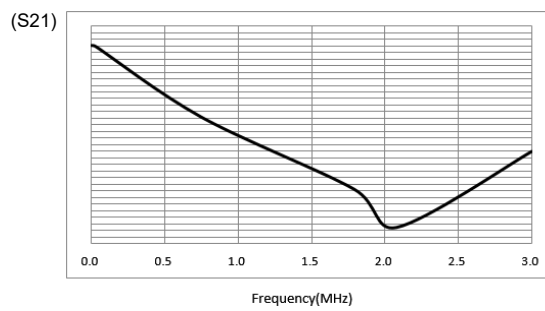
DC current vs Temperature



Inductance vs Frequency



SRF(Self Resonance Frequency)



Specifications subject to change without notice. Please check our website for latest information.

Revised 07/24/21