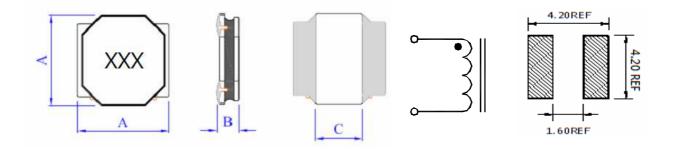
### **FEATURE**

- 1. Low profile and small size (Height: 2.60mm Max)
- 2. Low DC resistance
- Applications
- 1. Digital camera, PDA and others
- Shape and Dimension

## Schematics and Land Patterns(mm)



## $A=4.00\pm0.40$ m/m; B=2.60 m/m MAX; C=1.60 m/m REF

## Specification

Part Number	L(uH)	STAMP	DCR(mΩ Max)	Isat(A)	Irms
ESDIA4026-1R2N	1.2±30%	1R2	45.0	3.10	2.30
ESDIA4026-2R2M	2.2±20%	2R2	60.0	2.10	1.97
ESDIA4026-3R3M	3.3±20%	3R3	70.0	1.80	1.70
ESDIA4026-4R7M	4.7±20%	4R7	80.0	1.45	1.60
ESDIA4026-6R8M	6.8±20%	6R8	100	1.30	1.50
ESDIA4026-100M	10±20%	100	150	1.00	1.30
ESDIA4026-150M	15±20%	150	250	0.90	1.10
ESDIA4026-220M	22±20%	220	300	0.61	0.90
ESDIA4026-330M	33±20%	330	450	0.54	0.80
ESDIA4026-470M	47±20%	470	650	0.41	0.65

Note1. Measurement frequency of Inductance value: at 100KHz

Note3. Inductance Tolerance: M: ±20%; N: ±30%

Note4. Isat : This indicates the value of current when the inductances is 30% lower than its initial value at D.C. superimposition.(Ta=20°C)

Note5. Irms:D.C. current when at  $\Delta t=40^{\circ}C$  (typ.).(Ta=25 $^{\circ}C$ )

# **GENERAL CHARACTERISTICS**

- 1. Operating temperature range: -40 TO + 125°C (Includes temperature when the coil is heated)
- 2. External appearance: On visual inspection, the coil has no external defects.
- Terminal strength: After soldering. Between copper plate and terminals of coil. Push in two directions of X.Y withstanding at below conditions.

Terminal should not peel off. (refer to figure at right) 5. 0N 60 sec.

- 4. Insulating resistance: Over  $100M\Omega$  at 100V D.C. between coil and core.
- 5. Dielectric strength: No dielectric breakdown at 100V D.C. for 1 minute between coil and core.
- 6. Temperature characteristics: Inductance coefficient (0~2,000)x10-6/℃ (-25~+80°C degree Celsius), inductance deviation within±5.0%, after 96 hours.
- 7. Humidity characteristics(Moisture Resistance): Inductance deviation within ±5%, after 96 hours in 90~95% relative humidity at 40 ±2℃ and 1 hour drying under normal condition.
- 8. Vibration resistance: Inductance deviation within ±5%, after vibration for 1 hour. In each of three orientations at sweep vibration (10~55~10 Hz) with 1.5mm P-P amplitudes.
- 9. Shock resistance: Inductance deviation within ±5%, after being dropped once with 981m/s2 (100G) shock attitude upon a rubber block method shock testing machine, in three different orientations.
- 10. Resistance to Soldering Heat: 260°C, 10 seconds(See attached recommend reflow)
- 11. Storage condition: Temperature Range:  $0^{\circ}$ C  $\sim 35^{\circ}$ C ;  $-40^{\circ}$ C  $\sim 105^{\circ}$ C (after PCB) , Humidity Range: 50%  $\sim 70\%$  RH
- 12. Use components within 12 months. If 12 months or more have elapsed, check solderability before use.
- 13. Reflow profile recommend:

#### Lead-free heat endurance test

#### Lead-free the recommended reflow condition

