



SMD LINE FILTER

SF0903, 0904 SERIES

FEATURES:

- Low profile very effective in space conscious applications
- Low resistance filters have been designed for excellent electrical isolation
- High quality toroidal core
- Wide frequency range over 1000MHz
- Lead free construction

OPTIONS:

- Tape & Reel is Standard (Qty:1500pcs)
- Bulk packaging Available for Smaller Quantities

COMMON APPLICATIONS:

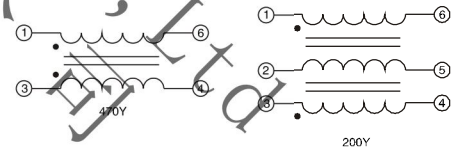
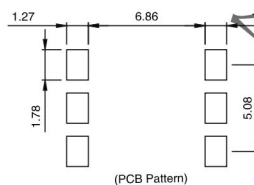
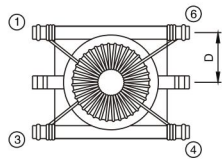
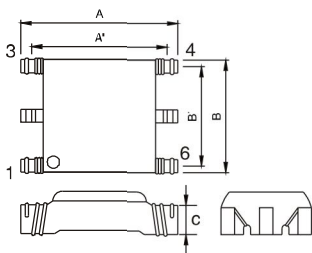
- Provide common mode noise attenuation
- Reduce conducted noise
- For the suppression of EMI in data lines and signal lines, e.g., CAN Bus

ELECTRICAL CHARACTERISTICS:

| Part Number | L(μH) 100K/0.1V | L-L(μH) 100K/0.02V | C(pF) 100K/0.02V | DCR(Ω) max. | Tums Ratio | Insertion Loss | | Impedance(z) | |
|-------------|--------------------|-----------------------|---------------------|----------------|---------------|----------------|------------------|--------------|--------|
| | | | | | | Freq.rang | db | Freq.rang | min(Ω) |
| SF0903 | | | | | | | | | |
| 470YAB | 47.0 min. | 0.18 ⁺⁰ | 20 ⁺⁰ | 0.4 | 1:1 | 1~100MHz | 20 ⁻⁰ | 10~30MHz | 1000 |
| 200YAB | 20.0 min. | 0.10 ⁺⁰ | 18 ⁻⁰ | 0.4 | 1:1:1 | 30~300MHz | 20 ⁻⁰ | 30~100MHz | 800 |

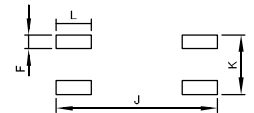
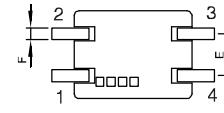
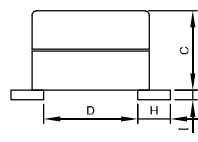
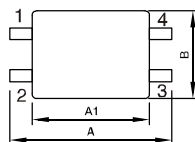
| Part Number | L(1-4) @100KHz,0.1Vrms (μH) | L-L(1-4) @100KHz,0.1Vrms typ.(2-3 short) max. | DCR (winding) (Ω) max. | Rated Current max. | winding |
|-------------|-----------------------------------|--|------------------------------|--------------------------|---------|
| SF0904 | | | | | |
| 110YL | 11 ± 25% | 0.050(μH) | 0.120 | 0.50 A | Bifilar |
| 250YL | 25 ± 25% | 1.500(μH) | 0.200 | 0.50 A | Bifilar |
| 510YL | 51 ± 25% | 2.000(μH) | 0.300 | 0.50 A | Bifilar |
| 471YL | 470 ± 25% | 0.280(μH) | 0.280 | 0.50 A | Bifilar |
| 102YL | 1000 ± 25% | 0.290(μH) | 0.400 | 0.50 A | Bifilar |
| 472YL | 4700 ± 25% | 0.300(μH) | 0.700 | 0.20 A | Bifilar |

TECHNICAL INFORMATION & PHYSICAL CHARACTERISTICS:



SF 0903-A SERIES

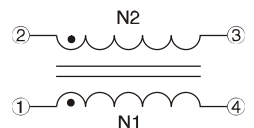
- Materials:
 1. Core: Ferrite Toroidal Core(0903-A), Ferrite Core(0904)
 2. Wire: Enamelled Copper Wire(Class F)
 3. Base: Phenolic(0903-A), PPHS(UL940V-0)(0904)
 4. Terminal: Cu / Ni / Sn (0904)
 5. Adhesive: Epoxy Resin (0904)
 6. Case: PPHS(UL940V-0)(0904)



SF 0904 SERIES

Dimensions(mm)

| Series | A | A1 | B | B1 | C | D |
|--------|----------|-----------|----------|-----------|----------|-----------|
| SF0903 | 9.20max. | 7.24 typ. | 6.60 max | 5.08 typ. | 2.50 max | 2.54 typ. |



"•": Polarity

Note:
All specifications subject to change without notice.

| Series | A1 | A | B | C | D | E | F | H | I | J | K | L | M |
|---------|------------|----------|------------|------------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|-----------|
| SF0904L | 9.20 ± 0.3 | 7.1 typ. | 6.00 ± 0.3 | 5.00 ± 0.3 | 5.32 typ. | 2.49 typ. | 0.60 typ. | 1.92 typ. | 0.25 typ. | 9.60 ref. | 3.40 ref. | 2.20 ref. | 1.00 ref. |