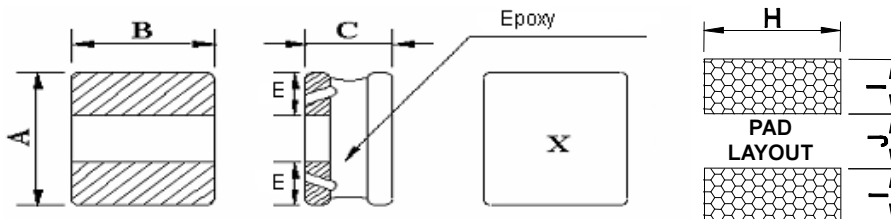
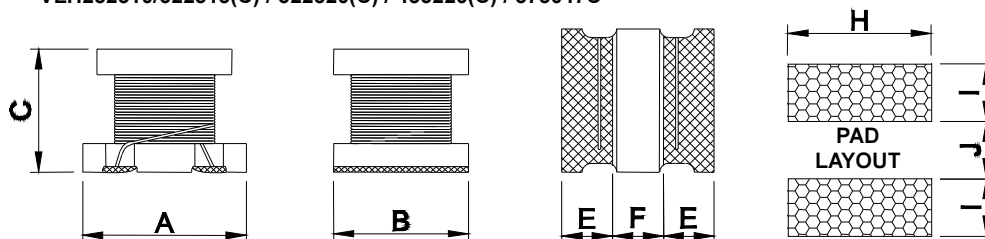


SMD Power Inductor

VLH252010E / 252012E



VLH252510/322515(C) / 322520(C) / 453226(C) / 575047C



Dimensions

Unit: mm

| Type | A | B | C | E | F | H | I | J |
|-----------|---------|---------|----------|----------|----------|-----|------|-----|
| 252010E | 2.5±0.2 | 2.0±0.2 | 1.02 max | 0.8 ref | - | 2.0 | 0.85 | 0.8 |
| 252012E | 2.5±0.2 | 2.0±0.2 | 1.20 max | 0.8 ref | - | 2.0 | 0.85 | 0.8 |
| 252510 | 2.5±0.2 | 2.5±0.2 | 1.05 max | 0.9 ref | 0.7 ref | 2.5 | 1.2 | 0.8 |
| 322515(C) | 3.2±0.3 | 2.5±0.2 | 1.55±0.3 | 1.05±0.3 | 1.05±0.3 | 2.0 | 1.5 | 1.0 |
| 322520(C) | 3.2±0.3 | 2.5±0.2 | 2.0±0.3 | 0.7min. | 0.7min. | 2.0 | 1.5 | 1.0 |
| 453226(C) | 4.5±0.3 | 3.2±0.2 | 2.6±0.4 | 1.0min. | 1.0min. | 3.0 | 2.0 | 1.2 |
| 575047C | 5.7±0.3 | 5.0±0.3 | 4.7±0.3 | 1.3min. | 1.7min. | 5.0 | 2.0 | 2.0 |

Features

- The miniature chip inductors is wound on a special ferrite core.
- VLH322515/322520/453226 are low DC resistance.
- VLH322520C/453226C/565047C are low DC resistance, high current capacity, and high impedance characteristics. They are excellent for using as a choke coil in DC power supply circuits.

Applications

- Pagers, Cordless Phone
- High Frequency Communication Products
- Personal Computers
- Disk Drives And Computer Peripherals
- DC Power Supply Circuits

Characteristics for 252010E/ 252012E/252510/322515C

- Rated DC Current(I sat): The current when the inductance becomes 30% typical its initial value (Ta=25°C)
- Temperature Rise Current(I rms): The actual current when the temperature of coil becomes Δ T40°C.. (Ta=25°C)
- Operating temperature range: -40~125°C

Inductance and rated current ranges

| | | |
|------------|--------------|-------------|
| VLH252010E | 1.00~22μH | 2.20~0.50A |
| VLH252012E | 1.00~22μH | 2.80~0.55A |
| VLH252510 | 1.00~22μH | 2.30~0.51A |
| VLH322515 | 1.00~100μH | 1.00~0.1A |
| VLH322520 | 1.00~560μH | 0.445~0.04A |
| VLH453226 | 1.00~2200μH | 0.50~0.03A |
| VLH322515C | 0.47~120μH | 3.40~0.17A |
| VLH322520C | 1.00~560μH | 1.00~0.06A |
| VLH453226C | 1.00~470μH | 1.08~0.09A |
| VLH575047C | 0.12~10000μH | 6.00~0.05A |

— Test equipment:

L&Q: HP4285A Precision LCR meter

DCR: Milli-ohm meter

— Electrical specifications at 25°C

Characteristics except 252010E/252012E/252510/322515C

- Rated DC Current: The current when the inductance becomes 10% lower than its initial value or the current when the temperature of coil increases Δ T20°C. The smaller one is defined as Rated DC Current. (Ta=25°C)
- Operating temperature range: -40~125°C

SMD Power Inductor
Product Identification

| VLH | 453226 | C | - | 101 | K |
|--------------|--|-------------------------------|-------------------------|---|---|
| Product Type | Dimensions (AxBxC) | Use | Appearance | Inductance | Inductance Tolerance |
| | 252010: 2.5x2.0x1.02 252012: 2.5x2.0x1.2 252510: 2.5x2.5x1.05 322515: 3.2x2.5x1.55 322520: 3.2x2.5x2.0 453226: 4.5x3.2x2.6 575047: 5.7x5.0x4.7 | C: Choke Use : General Use | -: Standard E: Epoxy | 1R0: 1.0 μ H 470: 47 μ H 101: 100 μ H | J: \pm 5% K: \pm 10% M: \pm 20% N: \pm 30% |

Electrical Characteristics

VLH252010E Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max.. | I rms(A) max. | I sat(A) max. | Marking Code |
|-------|--------------|-----------|----------------|------------------------|---------------|---------------|--------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.121 | 2.20 | 2.20 | A |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.193 | 1.80 | 1.90 | B |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.232 | 1.68 | 1.60 | C |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.372 | 1.34 | 1.20 | D |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.548 | 1.00 | 1.00 | E |
| 5R6 | 5.6 | M | 1MHz, 0.1V | 0.626 | 0.90 | 0.90 | F |
| 6R8 | 6.8 | M | 1MHz, 0.1V | 0.778 | 0.90 | 0.90 | G |
| 100 | 10 | M | 1MHz, 0.1V | 1.036 | 0.80 | 0.70 | H |
| 220 | 22 | M | 1MHz, 0.1V | 2.391 | 0.50 | 0.50 | I |

VLH252012E Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | I rms(A) max. | I sat(A) max. | Marking Code |
|-------|--------------|-----------|----------------|-----------------------|---------------|---------------|--------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.137 | 2.20 | 2.80 | A |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.190 | 1.86 | 2.20 | B |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.285 | 1.70 | 1.80 | C |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.454 | 1.20 | 1.30 | D |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.659 | 1.04 | 1.10 | E |
| 5R6 | 5.6 | M | 1MHz, 0.1V | 0.685 | 1.00 | 1.10 | F |
| 6R8 | 6.8 | M | 1MHz, 0.1V | 0.988 | 0.94 | 0.94 | G |
| 100 | 10 | M | 1MHz, 0.1V | 1.190 | 0.84 | 0.82 | H |
| 220 | 22 | M | 1MHz, 0.1V | 2.743 | 0.54 | 0.55 | I |

VLH252510- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) typical. | I rms(A) typical | I sat(A) typical |
|-------|--------------|-----------|----------------|---------------------------|------------------|------------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.085 | 1.90 | 2.30 |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.115 | 1.50 | 1.90 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.168 | 1.20 | 1.50 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.239 | 1.10 | 1.30 |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.316 | 0.90 | 1.10 |
| 5R6 | 5.6 | M | 1MHz, 0.1V | 0.420 | 0.83 | 0.98 |
| 6R8 | 6.8 | M | 1MHz, 0.1V | 0.487 | 0.80 | 0.90 |
| 8R2 | 8.2 | M | 1MHz, 0.1V | 0.548 | 0.71 | 0.84 |
| 100 | 10 | M | 1MHz, 0.1V | 0.610 | 0.68 | 0.79 |
| 220 | 22 | M | 1MHz, 0.1V | 1.552 | 0.40 | 0.51 |

■Electrical Characteristics
VLH322515- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. | SRF (MHz) min. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|-------------------|
| 1R0 | 1.0 | N | 1MHz, 0.1V | 0.078 | 1.000 | 100 |
| 1R5 | 1.5 | N | 1MHz, 0.1V | 0.068 | 1.200 | 100 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.126 | 0.790 | 64 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.180 | 0.700 | 50 |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.195 | 0.650 | 43 |
| 100 | 10 | K | 1MHz, 0.1V | 0.420 | 0.450 | 26 |
| 150 | 15 | K | 1MHz, 0.1V | 0.750 | 0.300 | 22 |
| 220 | 22 | K | 1MHz, 0.1V | 1.000 | 0.250 | 19 |
| 330 | 33 | K | 1MHz, 0.1V | 1.400 | 0.200 | 17 |
| 470 | 47 | K | 1MHz, 0.1V | 2.200 | 0.170 | 13 |
| 680 | 68 | K | 1MHz, 0.1V | 3.200 | 0.130 | 9 |
| 101 | 100 | K | 1MHz, 0.1V | 4.500 | 0.100 | 8 |

VLH322520- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.50 | 0.445 |
| 1R2 | 1.2 | M | 1MHz, 0.1V | 0.60 | 0.425 |
| 1R5 | 1.5 | K, M | 1MHz, 0.1V | 0.60 | 0.400 |
| 1R8 | 1.8 | K, M | 1MHz, 0.1V | 0.70 | 0.390 |
| 2R2 | 2.2 | K, M | 1MHz, 0.1V | 0.80 | 0.370 |
| 2R7 | 2.7 | K, M | 1MHz, 0.1V | 0.90 | 0.320 |
| 3R3 | 3.3 | K, M | 1MHz, 0.1V | 1.00 | 0.300 |
| 3R9 | 3.9 | K, M | 1MHz, 0.1V | 1.10 | 0.290 |
| 4R7 | 4.7 | K, M | 1MHz, 0.1V | 1.20 | 0.270 |
| 5R6 | 5.6 | K, M | 1MHz, 0.1V | 1.30 | 0.250 |
| 6R8 | 6.8 | K, M | 1MHz, 0.1V | 1.50 | 0.240 |
| 8R2 | 8.2 | K, M | 1MHz, 0.1V | 1.60 | 0.225 |
| 100 | 10 | J, K | 1MHz, 0.1V | 1.80 | 0.190 |
| 120 | 12 | J, K | 1MHz, 0.1V | 2.00 | 0.180 |
| 150 | 15 | J, K | 1MHz, 0.1V | 2.20 | 0.170 |
| 180 | 18 | J, K | 1MHz, 0.1V | 2.50 | 0.165 |
| 220 | 22 | J, K | 1MHz, 0.1V | 2.80 | 0.150 |
| 270 | 27 | J, K | 1MHz, 0.1V | 3.10 | 0.125 |
| 330 | 33 | J, K | 1MHz, 0.1V | 3.50 | 0.115 |
| 390 | 39 | J, K | 1MHz, 0.1V | 3.90 | 0.110 |
| 470 | 47 | J, K | 1MHz, 0.1V | 4.30 | 0.100 |
| 560 | 56 | J, K | 1MHz, 0.1V | 4.90 | 0.085 |
| 680 | 68 | J, K | 1MHz, 0.1V | 5.50 | 0.080 |
| 820 | 82 | J, K | 1MHz, 0.1V | 6.20 | 0.070 |
| 101 | 100 | J, K | 1MHz, 0.1V | 7.00 | 0.080 |
| 121 | 120 | J, K | 1MHz, 0.1V | 8.00 | 0.075 |
| 151 | 150 | J, K | 1MHz, 0.1V | 9.30 | 0.070 |
| 181 | 180 | J, K | 1MHz, 0.1V | 10.20 | 0.065 |
| 221 | 220 | J, K | 1MHz, 0.1V | 11.80 | 0.065 |
| 271 | 270 | J, K | 1MHz, 0.1V | 12.50 | 0.065 |
| 331 | 330 | J, K | 1MHz, 0.1V | 15.00 | 0.065 |
| 391 | 390 | J, K | 1MHz, 0.1V | 22.00 | 0.050 |
| 471 | 470 | J, K | 1KHz, 0.1V | 25.00 | 0.045 |
| 561 | 560 | J, K | 1KHz, 0.1V | 28.00 | 0.040 |

Electrical Characteristics

VLH453226- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.20 | 0.500 |
| 1R2 | 1.2 | M | 1MHz, 0.1V | 0.20 | 0.500 |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.30 | 0.500 |
| 1R8 | 1.8 | M | 1MHz, 0.1V | 0.30 | 0.500 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.30 | 0.500 |
| 2R7 | 2.7 | M | 1MHz, 0.1V | 0.32 | 0.500 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.35 | 0.500 |
| 3R9 | 3.9 | M | 1MHz, 0.1V | 0.38 | 0.500 |
| 4R7 | 4.7 | K, M | 1MHz, 0.1V | 0.40 | 0.500 |
| 5R6 | 5.6 | K, M | 1MHz, 0.1V | 0.47 | 0.500 |
| 6R8 | 6.8 | K, M | 1MHz, 0.1V | 0.50 | 0.450 |
| 8R2 | 8.2 | K, M | 1MHz, 0.1V | 0.56 | 0.450 |
| 100 | 10 | J, K | 1MHz, 0.1V | 0.56 | 0.400 |
| 120 | 12 | J, K | 1MHz, 0.1V | 0.62 | 0.380 |
| 150 | 15 | J, K | 1MHz, 0.1V | 0.73 | 0.360 |
| 180 | 18 | J, K | 1MHz, 0.1V | 0.82 | 0.340 |
| 220 | 22 | J, K | 1MHz, 0.1V | 0.94 | 0.320 |
| 270 | 27 | J, K | 1MHz, 0.1V | 1.10 | 0.300 |
| 330 | 33 | J, K | 1MHz, 0.1V | 1.20 | 0.270 |
| 390 | 39 | J, K | 1MHz, 0.1V | 1.40 | 0.240 |
| 470 | 47 | J, K | 1MHz, 0.1V | 1.50 | 0.220 |
| 560 | 56 | J, K | 1MHz, 0.1V | 1.70 | 0.200 |
| 680 | 68 | J, K | 1MHz, 0.1V | 1.90 | 0.180 |
| 820 | 82 | J, K | 1MHz, 0.1V | 2.20 | 0.170 |
| 101 | 100 | J, K | 1MHz, 0.1V | 2.50 | 0.160 |
| 121 | 120 | J, K | 1MHz, 0.1V | 3.00 | 0.150 |
| 151 | 150 | J, K | 1MHz, 0.1V | 3.70 | 0.130 |
| 181 | 180 | J, K | 1MHz, 0.1V | 4.50 | 0.120 |
| 221 | 220 | J, K | 1MHz, 0.1V | 5.40 | 0.110 |
| 271 | 270 | J, K | 1MHz, 0.1V | 6.80 | 0.100 |
| 331 | 330 | J, K | 1MHz, 0.1V | 8.20 | 0.095 |
| 391 | 390 | J, K | 1MHz, 0.1V | 9.70 | 0.090 |
| 471 | 470 | J, K | 1KHz, 0.1V | 11.80 | 0.080 |
| 561 | 560 | J, K | 1KHz, 0.1V | 14.50 | 0.070 |
| 681 | 680 | J, K | 1KHz, 0.1V | 17.00 | 0.065 |
| 821 | 820 | J, K | 1KHz, 0.1V | 20.50 | 0.060 |
| 102 | 1000 | J, K | 1KHz, 0.1V | 25.00 | 0.050 |
| 122 | 1200 | J, K | 1KHz, 0.1V | 30.00 | 0.045 |
| 152 | 1500 | J, K | 1KHz, 0.1V | 37.00 | 0.040 |
| 182 | 1800 | J, K | 1KHz, 0.1V | 45.00 | 0.035 |
| 222 | 2200 | J, K | 1KHz, 0.1V | 50.00 | 0.030 |

Electrical Characteristics
VLH322515C- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) $\pm 20\%$ | Isat (A) max. | Irms (A) max. | SRF (MHz) min. |
|-------|-----------------|-----------|-------------------|--------------------------------|------------------|------------------|-------------------|
| R47 | 0.47 | N | 1MHz, 0.1V | 0.030 | 3.40 | 2.55 | 100 |
| 1R0 | 1.0 | N | 1MHz, 0.1V | 0.045 | 2.30 | 2.05 | 100 |
| 1R5 | 1.5 | N | 1MHz, 0.1V | 0.057 | 1.75 | 1.75 | 70 |
| 2R2 | 2.2 | N | 1MHz, 0.1V | 0.076 | 1.55 | 1.60 | 70 |
| 3R3 | 3.3 | N | 1MHz, 0.1V | 0.120 | 1.25 | 1.20 | 50 |
| 4R7 | 4.7 | N | 1MHz, 0.1V | 0.180 | 1.00 | 1.00 | 40 |
| 6R8 | 6.8 | N | 1MHz, 0.1V | 0.240 | 0.85 | 0.85 | 40 |
| 100 | 10 | M | 1MHz, 0.1V | 0.380 | 0.75 | 0.70 | 30 |
| 150 | 15 | M | 1MHz, 0.1V | 0.570 | 0.60 | 0.52 | 20 |
| 220 | 22 | M | 1MHz, 0.1V | 0.810 | 0.50 | 0.45 | 20 |
| 330 | 33 | M | 1MHz, 0.1V | 1.150 | 0.38 | 0.39 | 13 |
| 470 | 47 | M | 1MHz, 0.1V | 1.780 | 0.33 | 0.31 | 11 |
| 680 | 68 | M | 1MHz, 0.1V | 2.280 | 0.28 | 0.275 | 11 |
| 101 | 100 | M | 1MHz, 0.1V | 2.700 | 0.18 | 0.250 | 8 |
| 121 | 120 | M | 1MHz, 0.1V | 4.380 | 0.17 | 0.200 | 8 |

VLH322520C- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.078 | 1.000 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.126 | 0.790 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.165 | 0.500 |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.195 | 0.450 |
| 6R8 | 6.8 | M | 1MHz, 0.1V | 0.330 | 0.450 |
| 100 | 10 | M | 1MHz, 0.1V | 0.572 | 0.300 |
| 220 | 22 | K, M | 1MHz, 0.1V | 0.923 | 0.250 |
| 470 | 47 | K, M | 1MHz, 0.1V | 1.690 | 0.170 |
| 101 | 100 | J, K | 1MHz, 0.1V | 4.550 | 0.100 |
| 151 | 150 | J, K | 1MHz, 0.1V | 9.100 | 0.080 |
| 221 | 220 | J, K | 1MHz, 0.1V | 10.92 | 0.070 |
| 331 | 330 | J, K | 1MHz, 0.1V | 13.00 | 0.060 |
| 391 | 390 | J, K | 1MHz, 0.1V | 22.10 | 0.060 |
| 471 | 470 | J, K | 1MHz, 0.1V | 24.70 | 0.060 |
| 561 | 560 | J, K | 1MHz, 0.1V | 28.60 | 0.060 |

VLH453226C- Type

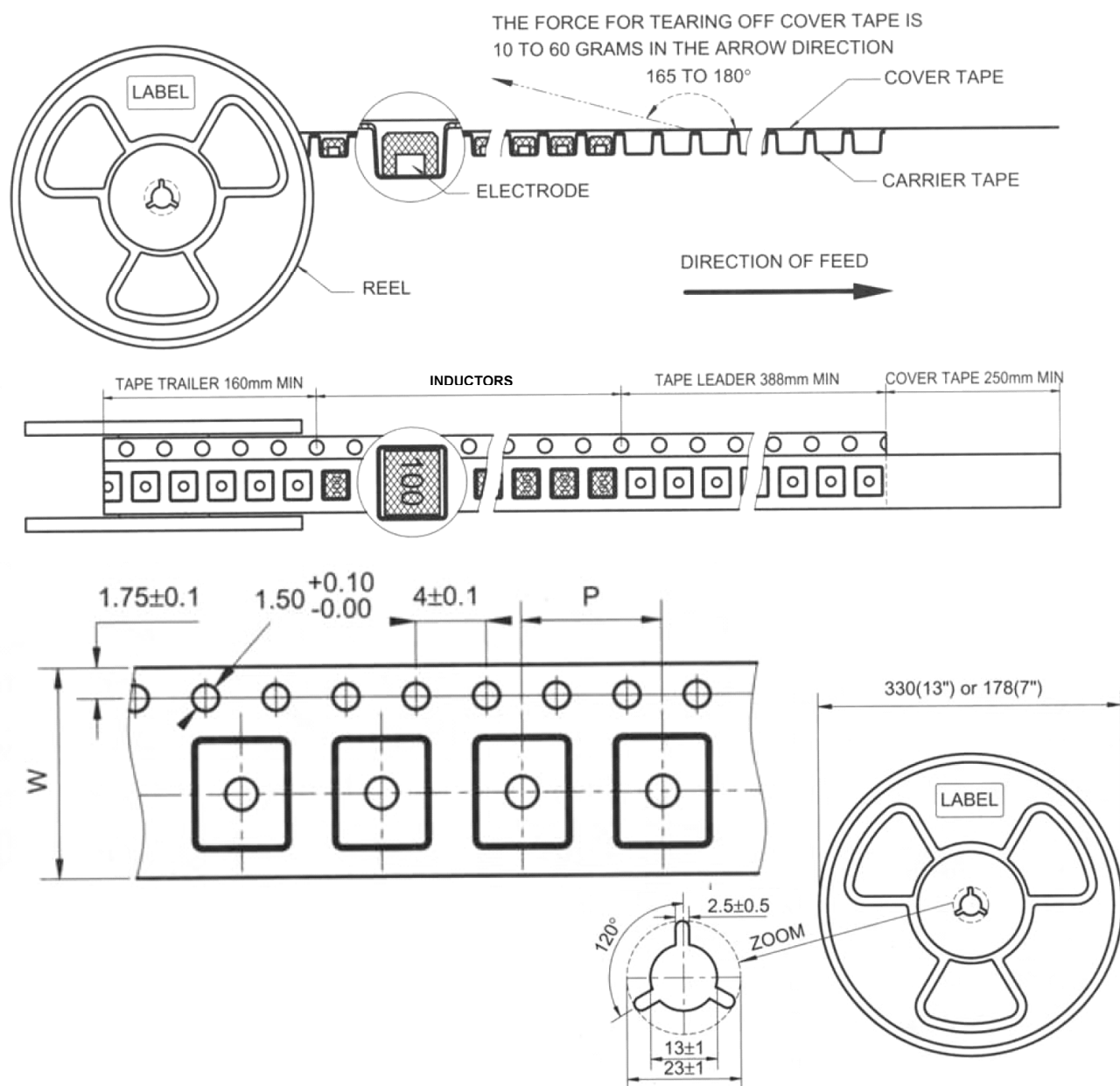
| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.08 | 1.080 |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.09 | 1.000 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.11 | 0.900 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.13 | 0.800 |
| 4R7 | 4.7 | K, M | 1MHz, 0.1V | 0.15 | 0.750 |
| 6R8 | 6.8 | K, M | 1MHz, 0.1V | 0.20 | 0.720 |
| 100 | 10 | J, K | 1MHz, 0.1V | 0.24 | 0.650 |
| 150 | 15 | J, K | 1MHz, 0.1V | 0.32 | 0.570 |
| 220 | 22 | J, K | 1MHz, 0.1V | 0.60 | 0.420 |
| 330 | 33 | J, K | 1MHz, 0.1V | 1.00 | 0.310 |
| 470 | 47 | J, K | 1MHz, 0.1V | 1.10 | 0.280 |
| 680 | 68 | J, K | 1MHz, 0.1V | 1.70 | 0.220 |
| 101 | 100 | J, K | 1MHz, 0.1V | 2.20 | 0.190 |
| 151 | 150 | J, K | 1MHz, 0.1V | 3.50 | 0.130 |
| 221 | 220 | J, K | 1MHz, 0.1V | 4.00 | 0.110 |
| 331 | 330 | J, K | 1MHz, 0.1V | 6.80 | 0.100 |
| 471 | 470 | J, K | 1KHz, 0.1V | 8.50 | 0.090 |

■Electrical Characteristics

VLH575047C- Type

| Codes | L (μ H) | Tolerance | Test Condition | DCR (Ω) max. | IDC (A) max. |
|-------|-----------------|-----------|-------------------|--------------------------|-----------------|
| R12 | 0.12 | M | 1MHz, 0.1V | 0.0098 | 6.000 |
| R27 | 0.27 | M | 1MHz, 0.1V | 0.0140 | 5.300 |
| R47 | 0.47 | M | 1MHz, 0.1V | 0.0182 | 4.800 |
| 1R0 | 1.0 | M | 1MHz, 0.1V | 0.0270 | 4.000 |
| 1R5 | 1.5 | M | 1MHz, 0.1V | 0.0310 | 3.700 |
| 2R2 | 2.2 | M | 1MHz, 0.1V | 0.0410 | 3.200 |
| 3R3 | 3.3 | M | 1MHz, 0.1V | 0.0500 | 2.900 |
| 4R7 | 4.7 | M | 1MHz, 0.1V | 0.0574 | 2.700 |
| 6R8 | 6.8 | M | 1MHz, 0.1V | 0.1040 | 2.000 |
| 100 | 10 | K, M | 1MHz, 0.1V | 0.1300 | 1.700 |
| 150 | 15 | K, M | 1MHz, 0.1V | 0.210 | 1.400 |
| 220 | 22 | K, M | 1MHz, 0.1V | 0.266 | 1.200 |
| 270 | 27 | K, M | 1MHz, 0.1V | 0.300 | 1.000 |
| 330 | 33 | K, M | 1MHz, 0.1V | 0.448 | 0.900 |
| 470 | 47 | K, M | 1MHz, 0.1V | 0.560 | 0.800 |
| 680 | 68 | K, M | 1MHz, 0.1V | 0.938 | 0.640 |
| 101 | 100 | K, M | 100KHz, 0.1V | 1.204 | 0.560 |
| 151 | 150 | K, M | 100KHz, 0.1V | 2.660 | 0.420 |
| 221 | 220 | K, M | 100KHz, 0.1V | 3.360 | 0.320 |
| 331 | 330 | K, M | 100KHz, 0.1V | 6.160 | 0.270 |
| 471 | 470 | K, M | 100KHz, 0.1V | 7.560 | 0.240 |
| 681 | 680 | K, M | 100KHz, 0.1V | 11.34 | 0.190 |
| 102 | 1000 | K, M | 10KHz, 0.1V | 14.42 | 0.150 |
| 222 | 2200 | K, M | 10KHz, 0.1V | 30.10 | 0.100 |
| 472 | 4700 | K, M | 10KHz, 0.1V | 61.04 | 0.070 |
| 103 | 10000 | K, M | 10KHz, 0.1V | 140.0 | 0.050 |

■ Tape and Reel specifications



Unit: mm

| Type | Tape size | | Parts Per Reel | |
|---------|-----------|----|----------------|------|
| | W | P | 7" | 13" |
| 252010E | 8 | 4 | 2000 | - |
| 252012E | 8 | 4 | 2000 | - |
| 252510 | 8 | 4 | 2000 | - |
| 322515 | 8 | 4 | 2000 | - |
| 322520 | 12 | 8 | 1000 | - |
| 453226 | 12 | 8 | 500 | - |
| 575047 | 16 | 12 | - | 1000 |

SMD Power Inductor

SMD Power Inductor Environmental Specifications

General

| Items | Specifications |
|--------------------------|---|
| Shelf Storage conditions | Temperature range: 15~28℃; Humidity: <80% relative humidity. Recommended product should be used within one year from the time of delivery. |

Environmental test

| Test Items | Specifications | Test Conditions / Test Methods |
|-------------------------------|--|--|
| High temperature Storage test | No case deformation or change in appearance. $\Delta L/L \leq 10\%$ | Temperature 85±2℃, Time: 48±2 hours, Tested after 1hour at room temperature. |
| Low temperature Storage test | | Temperature -25±2℃, Time: 48±2 hours, Tested after 1hour at room temperature. |
| Humidity test | | Temperature 40±2℃, 90~95% relative humidity Time: 96±2 hours Tested after 1hour at room temperature. |
| Thermal shock test | | First -25℃ 30minutes then 25℃ 10 minutes last 85℃ 30 minutes, as 1 cycle. Go through 5 cycles. Tested after 1 hour at room temperature. |

Mechanical test

| Test Items | Specifications | Test Conditions / Test Methods |
|------------------------------|--|---|
| Solderability test | Terminal area must have 90% minimum solder coverage. | Product with Lead-free terminal: Dip pads in flux then dip in solder pot at 245±5℃ for 3 seconds. |
| Resistance to Soldering Heat | No case deformation or change in appearance. | Flux should cover the whole of the sample before heating, then be preheated for about 2 minutes over temperature of 130~150℃. Immersing to 260±5℃ for 10 seconds. |
| Vibration test | No case deformation or change in appearance. $\Delta L/L \leq 10\%$ | Apply frequency 10~55Hz. 1.5mm amplitude in each of perpendicular direction for 2 hours. |
| Shock resistance | | Drop down with 981m/s ² (100G) shock attitude upon a rubber block method shock testing machine, for 1 time. In each of three orientations. |

The condition of reflow (recommendation)

