

LXY Series

- Adoption of innovative electrolyte and new technologies
- Endurance with ripple current : 2,000 to 8,000 hours at 105°C
- Solvent resistant type (see PRECAUTIONS AND GUIDELINES)
- RoHS2 Compliant
- AEC-Q200 compliant : Please contact Chemi-Con for more details, test data, information.

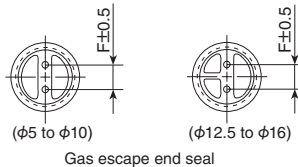


SPECIFICATIONS

| Items | Characteristics | |
|--|---|--|
| Category Temperature Range | -55 to +105°C | |
| Rated Voltage Range | 10 to 63V _{dc} | |
| Capacitance Tolerance | ±20% (M) (at 20°C, 120Hz) | |
| Leakage Current | I=0.01CV or 3μA, whichever is greater. Where, I : Max. leakage current (μA), C : Nominal capacitance (μF), V : Rated voltage (V) (at 20°C after 2 minutes) | |
| Dissipation Factor (tan δ) | Rated voltage (V _{dc}) | 10V 16V 25V 35V 50V 63V |
| | tan δ (Max.) | 0.19 0.16 0.14 0.12 0.10 0.10 |
| | When nominal capacitance exceeds 1,000μF, add 0.02 to the value above for each 1,000μF increase. (at 20°C, 120Hz) | |
| Low Temperature Characteristics (Max. Impedance Ratio) | Z(-55°C)/Z(+20°C) | 10 to 50V _{dc} : 3max. 63V _{dc} : 6max. (at 120Hz) |
| | Endurance | The following specifications shall be satisfied when the capacitors are restored to 20°C after subjected to DC voltage with the rated ripple current is applied (the peak voltage shall not exceed the rated voltage) for the specified period of time at 105°C. |
| | Time | φ 5 & 6.3 : 2,000hours φ 8 : 3,000hours φ 10 : 5,000hours φ 12.5 : 7,000hours φ 16 & 18 : 8,000hours |
| | Capacitance change | ≤ ±20% of the initial value |
| | D.F. (tan δ) | ≤200% of the initial specified value |
| | Leakage current | ≤The initial specified value |
| Shelf Life | The following specifications shall be satisfied when the capacitors are restored to 20°C after exposing them for 1,000 hours at 105°C without voltage applied. Before the measurement, the capacitor shall be preconditioned by applying voltage according to Item 4.1 of JIS C 5101-4. | |
| | Capacitance change | ≤ ±20% of the initial value |
| | D.F. (tan δ) | ≤200% of the initial specified value |
| | Leakage current | ≤The initial specified value |

DIMENSIONS [mm]

- Terminal Code : E



| φD | 5 | 6.3 | 8 | 10 | 12.5 | 16 |
|-----|------------|-----|-----|-----|------|-----|
| φd | 0.5 | 0.5 | 0.6 | 0.6 | 0.6 | 0.8 |
| F | 2.0 | 2.5 | 3.5 | 5.0 | 5.0 | 7.5 |
| φD' | φD+0.5max. | | | | | |
| L' | L+1.5max. | | | | | |

PART NUMBERING SYSTEM



Please refer to "Product code guide (radial lead type)"

RATED RIPPLE CURRENT MULTIPLIERS

- Frequency Multipliers

| Capacitance(μF) | Frequency(Hz) | | | |
|-----------------|---------------|------|------|------|
| | 120 | 1k | 10k | 100k |
| 10 to 180 | 0.40 | 0.75 | 0.90 | 1.00 |
| 220 to 560 | 0.50 | 0.85 | 0.94 | 1.00 |
| 680 to 1,800 | 0.60 | 0.87 | 0.95 | 1.00 |
| 2,200 to 3,900 | 0.75 | 0.90 | 0.95 | 1.00 |
| 4,700 to 8,200 | 0.85 | 0.95 | 0.98 | 1.00 |

The endurance of capacitors is reduced with internal heating produced by ripple current at the rate of halving the lifetime with every 5°C rise.
When long life performance is required in actual use, the rms ripple current has to be reduced.

◆STANDARD RATINGS

| WV (V _{dc}) | Cap (μF) | Case size φD×L(mm) | Impedance (Ω max./100kHz) | | Rated ripple current (mA rms/105°C, 100kHz) | Part No. | WV (V _{dc}) | Cap (μF) | Case size φD×L(mm) | Impedance (Ω max./100kHz) | | Rated ripple current (mA rms/105°C, 100kHz) | Part No. |
|-----------------------|----------|--------------------|---------------------------|-------|---|--------------------|-----------------------|----------|--------------------|---------------------------|--------------------|---|--------------------|
| | | | 20°C | -10°C | | | | | | 20°C | -10°C | | |
| 10 | 82 | 5×11.5 | 0.75 | 1.5 | 163 | ELXY100E□□820MEB5D | 35 | 27 | 5×11.5 | 0.75 | 1.5 | 163 | ELXY350E□□270MEB5D |
| | 180 | 6.3×11.5 | 0.35 | 0.70 | 273 | ELXY100E□□181MFB5D | | 56 | 6.3×11.5 | 0.35 | 0.70 | 273 | ELXY350E□□560MFB5D |
| | 220 | 6.3×15 | 0.25 | 0.50 | 390 | ELXY100E□□221MF15D | | 82 | 6.3×15 | 0.25 | 0.50 | 390 | ELXY350E□□820MF15D |
| | 330 | 8×12 | 0.17 | 0.34 | 445 | ELXY100E□□331MH12D | | 120 | 8×12 | 0.17 | 0.34 | 445 | ELXY350E□□121MH12D |
| | 390 | 10×12.5 | 0.12 | 0.24 | 625 | ELXY100E□□391MJC5S | | 120 | 10×12.5 | 0.12 | 0.24 | 625 | ELXY350E□□121MJC5S |
| | 470 | 8×15 | 0.13 | 0.26 | 555 | ELXY100E□□471MH15D | | 180 | 8×15 | 0.13 | 0.26 | 555 | ELXY350E□□181MH15D |
| | 680 | 8×20 | 0.095 | 0.19 | 740 | ELXY100E□□681MH20D | | 220 | 8×20 | 0.095 | 0.19 | 740 | ELXY350E□□221MH20D |
| | 680 | 10×16 | 0.084 | 0.17 | 825 | ELXY100E□□681MJ16S | | 220 | 10×16 | 0.084 | 0.17 | 825 | ELXY350E□□221MJ16S |
| | 1,000 | 10×20 | 0.062 | 0.13 | 1,040 | ELXY100E□□102MJ20S | | 330 | 10×20 | 0.062 | 0.13 | 1,040 | ELXY350E□□331MJ20S |
| | 1,200 | 10×25 | 0.052 | 0.11 | 1,260 | ELXY100E□□122MJ25S | | 390 | 10×25 | 0.052 | 0.11 | 1,260 | ELXY350E□□391MJ25S |
| | 1,500 | 10×30 | 0.044 | 0.088 | 1,440 | ELXY100E□□152MJ30S | | 560 | 10×30 | 0.044 | 0.088 | 1,440 | ELXY350E□□561MJ30S |
| | 1,800 | 12.5×20 | 0.046 | 0.092 | 1,340 | ELXY100E□□181MJ20S | | 560 | 12.5×20 | 0.046 | 0.092 | 1,340 | ELXY350E□□561MJ20S |
| | 2,200 | 12.5×25 | 0.034 | 0.068 | 1,690 | ELXY100E□□222MK25S | | 680 | 12.5×25 | 0.034 | 0.068 | 1,690 | ELXY350E□□681MK25S |
| | 2,700 | 12.5×30 | 0.030 | 0.060 | 1,950 | ELXY100E□□272MK30S | | 1,000 | 12.5×30 | 0.030 | 0.060 | 1,950 | ELXY350E□□102MK30S |
| | 3,300 | 12.5×35 | 0.024 | 0.048 | 2,220 | ELXY100E□□332MK35S | | 1,000 | 16×20 | 0.038 | 0.076 | 1,630 | ELXY350E□□102ML20S |
| | 3,300 | 16×20 | 0.038 | 0.076 | 1,630 | ELXY100E□□332ML20S | | 1,200 | 12.5×35 | 0.024 | 0.048 | 2,220 | ELXY350E□□122MK35S |
| 3,900 | 12.5×40 | 0.022 | 0.044 | 2,390 | ELXY100E□□392MK40S | 1,200 | 16×25 | 0.028 | 0.056 | 2,070 | ELXY350E□□122ML25S | | |
| 3,900 | 16×25 | 0.028 | 0.056 | 2,070 | ELXY100E□□392ML25S | 1,500 | 12.5×40 | 0.022 | 0.044 | 2,390 | ELXY350E□□152MK40S | | |
| 5,600 | 16×30 | 0.025 | 0.050 | 2,350 | ELXY100E□□562ML30S | 1,800 | 16×30 | 0.025 | 0.050 | 2,350 | ELXY350E□□182ML30S | | |
| 6,800 | 16×35 | 0.022 | 0.044 | 2,550 | ELXY100E□□682ML35S | 2,200 | 16×35 | 0.022 | 0.044 | 2,550 | ELXY350E□□222ML35S | | |
| 8,200 | 16×40 | 0.018 | 0.036 | 2,900 | ELXY100E□□822ML40S | 2,700 | 16×40 | 0.018 | 0.036 | 2,900 | ELXY350E□□272ML40S | | |
| 16 | 56 | 5×11.5 | 0.75 | 1.5 | 163 | ELXY160E□□560MEB5D | 50 | 18 | 5×11.5 | 1.2 | 2.4 | 129 | ELXY500E□□180MEB5D |
| | 120 | 6.3×11.5 | 0.35 | 0.70 | 273 | ELXY160E□□121MFB5D | | 39 | 6.3×11.5 | 0.54 | 1.1 | 219 | ELXY500E□□390MFB5D |
| | 180 | 6.3×15 | 0.25 | 0.50 | 390 | ELXY160E□□181MF15D | | 56 | 6.3×15 | 0.34 | 0.68 | 310 | ELXY500E□□560MF15D |
| | 270 | 8×12 | 0.17 | 0.34 | 445 | ELXY160E□□271MH12D | | 68 | 8×12 | 0.30 | 0.60 | 340 | ELXY500E□□680MH12D |
| | 270 | 10×12.5 | 0.12 | 0.24 | 625 | ELXY160E□□271MJC5S | | 82 | 8×15 | 0.20 | 0.40 | 470 | ELXY500E□□820MH15D |
| | 330 | 8×15 | 0.13 | 0.26 | 555 | ELXY160E□□331MH15D | | 82 | 10×12.5 | 0.20 | 0.40 | 480 | ELXY500E□□820MJC5S |
| | 470 | 8×20 | 0.095 | 0.19 | 740 | ELXY160E□□471MH20D | | 120 | 8×20 | 0.14 | 0.28 | 610 | ELXY500E□□121MH20D |
| | 470 | 10×16 | 0.084 | 0.17 | 825 | ELXY160E□□471MJ16S | | 120 | 10×16 | 0.13 | 0.26 | 755 | ELXY500E□□121MJ16S |
| | 680 | 10×20 | 0.062 | 0.13 | 1,040 | ELXY160E□□681MJ20S | | 180 | 10×20 | 0.088 | 0.18 | 945 | ELXY500E□□181MJ20S |
| | 820 | 10×25 | 0.052 | 0.11 | 1,260 | ELXY160E□□821MJ25S | | 220 | 10×25 | 0.073 | 0.15 | 1,150 | ELXY500E□□221MJ25S |
| | 1,200 | 10×30 | 0.044 | 0.088 | 1,440 | ELXY160E□□122MJ30S | | 330 | 10×30 | 0.054 | 0.11 | 1,260 | ELXY500E□□331MJ30S |
| | 1,200 | 12.5×20 | 0.046 | 0.092 | 1,340 | ELXY160E□□122MK20S | | 330 | 12.5×20 | 0.059 | 0.12 | 1,190 | ELXY500E□□331MK20S |
| | 1,500 | 12.5×25 | 0.034 | 0.068 | 1,690 | ELXY160E□□152MK25S | | 470 | 12.5×25 | 0.044 | 0.088 | 1,490 | ELXY500E□□471MK25S |
| | 2,200 | 12.5×30 | 0.030 | 0.060 | 1,950 | ELXY160E□□222MK30S | | 560 | 12.5×30 | 0.039 | 0.078 | 1,720 | ELXY500E□□561MK30S |
| | 2,200 | 16×20 | 0.038 | 0.076 | 1,630 | ELXY160E□□222ML20S | | 680 | 12.5×35 | 0.033 | 0.066 | 1,890 | ELXY500E□□681MK35S |
| | 2,700 | 12.5×35 | 0.024 | 0.048 | 2,220 | ELXY160E□□272MK35S | | 680 | 16×20 | 0.050 | 0.10 | 1,420 | ELXY500E□□681ML20S |
| 2,700 | 16×25 | 0.028 | 0.056 | 2,070 | ELXY160E□□272ML25S | 820 | 12.5×40 | 0.029 | 0.058 | 2,030 | ELXY500E□□821MK40S | | |
| 3,300 | 12.5×40 | 0.022 | 0.044 | 2,390 | ELXY160E□□332MK40S | 820 | 16×25 | 0.034 | 0.068 | 1,880 | ELXY500E□□821ML25S | | |
| 3,900 | 16×30 | 0.025 | 0.050 | 2,350 | ELXY160E□□392ML30S | 1,000 | 16×30 | 0.030 | 0.060 | 2,150 | ELXY500E□□102ML30S | | |
| 4,700 | 16×35 | 0.022 | 0.044 | 2,550 | ELXY160E□□472ML35S | 1,200 | 16×35 | 0.027 | 0.054 | 2,320 | ELXY500E□□122ML35S | | |
| 5,600 | 16×40 | 0.018 | 0.036 | 2,900 | ELXY160E□□562ML40S | 1,500 | 16×40 | 0.024 | 0.048 | 2,540 | ELXY500E□□152ML40S | | |
| 25 | 39 | 5×11.5 | 0.75 | 1.5 | 163 | ELXY250E□□390MEB5D | 63 | 10 | 5×11.5 | 1.9 | 4.8 | 103 | ELXY630E□□100MEB5D |
| | 82 | 6.3×11.5 | 0.35 | 0.70 | 273 | ELXY250E□□820MFB5D | | 18 | 6.3×11.5 | 1.0 | 2.5 | 161 | ELXY630E□□180MFB5D |
| | 120 | 6.3×15 | 0.25 | 0.50 | 390 | ELXY250E□□121MF15D | | 33 | 6.3×15 | 0.61 | 1.6 | 233 | ELXY630E□□330MF15D |
| | 150 | 8×12 | 0.17 | 0.34 | 445 | ELXY250E□□151MH12D | | 47 | 8×12 | 0.47 | 1.2 | 274 | ELXY630E□□470MH12D |
| | 180 | 10×12.5 | 0.12 | 0.24 | 625 | ELXY250E□□181MJC5S | | 56 | 10×12.5 | 0.27 | 0.68 | 418 | ELXY630E□□560MJC5S |
| | 220 | 8×15 | 0.13 | 0.26 | 555 | ELXY250E□□221MH15D | | 68 | 8×15 | 0.34 | 0.85 | 360 | ELXY630E□□680MH15D |
| | 330 | 8×20 | 0.095 | 0.19 | 740 | ELXY250E□□331MH20D | | 68 | 10×16 | 0.21 | 0.53 | 525 | ELXY630E□□680MJ16S |
| | 330 | 10×16 | 0.084 | 0.17 | 825 | ELXY250E□□331MJ16S | | 82 | 8×20 | 0.21 | 0.53 | 500 | ELXY630E□□820MH20D |
| | 470 | 10×20 | 0.062 | 0.13 | 1,040 | ELXY250E□□471MJ20S | | 120 | 10×20 | 0.16 | 0.40 | 650 | ELXY630E□□121MJ20S |
| | 560 | 10×25 | 0.052 | 0.11 | 1,260 | ELXY250E□□561MJ25S | | 150 | 10×25 | 0.13 | 0.33 | 783 | ELXY630E□□151MJ25S |
| | 820 | 10×30 | 0.044 | 0.088 | 1,440 | ELXY250E□□821MJ30S | | 180 | 10×30 | 0.10 | 0.25 | 960 | ELXY630E□□181MJ30S |
| | 820 | 12.5×20 | 0.046 | 0.092 | 1,340 | ELXY250E□□821MK20S | | 220 | 12.5×20 | 0.11 | 0.28 | 870 | ELXY630E□□221MK20S |
| | 1,000 | 12.5×25 | 0.034 | 0.068 | 1,690 | ELXY250E□□102MK25S | | 270 | 12.5×25 | 0.074 | 0.19 | 1,150 | ELXY630E□□271MK25S |
| | 1,500 | 12.5×30 | 0.030 | 0.060 | 1,950 | ELXY250E□□152MK30S | | 330 | 16×20 | 0.085 | 0.22 | 1,100 | ELXY630E□□331ML20S |
| | 1,500 | 16×20 | 0.038 | 0.076 | 1,630 | ELXY250E□□152ML20S | | 390 | 12.5×30 | 0.068 | 0.17 | 1,280 | ELXY630E□□391MK30S |
| | 1,800 | 12.5×35 | 0.024 | 0.048 | 2,220 | ELXY250E□□182MK35S | | 470 | 12.5×35 | 0.063 | 0.16 | 1,390 | ELXY630E□□471MK35S |
| 1,800 | 16×25 | 0.028 | 0.056 | 2,070 | ELXY250E□□182ML25S | 470 | 16×25 | 0.055 | 0.14 | 1,480 | ELXY630E□□471ML25S | | |
| 2,200 | 12.5×40 | 0.022 | 0.044 | 2,390 | ELXY250E□□222MK40S | 560 | 12.5×40 | 0.051 | 0.13 | 1,530 | ELXY630E□□561MK40S | | |
| 2,700 | 16×30 | 0.025 | 0.050 | 2,350 | ELXY250E□□272ML30S | 680 | 16×30 | 0.046 | 0.12 | 1,720 | ELXY630E□□681ML30S | | |
| 3,300 | 16×35 | 0.022 | 0.044 | 2,550 | ELXY250E□□332ML35S | 820 | 16×35 | 0.040 | 0.10 | 1,910 | ELXY630E□□821ML35S | | |
| 3,900 | 16×40 | 0.018 | 0.036 | 2,900 | ELXY250E□□392ML40S | 1,000 | 16×40 | 0.036 | 0.090 | 2,070 | ELXY630E□□102ML40S | | |

□□ : Enter the appropriate lead forming or taping code.