Capacitor and Electronic Component

Product Overview
## Aluminum Electrolytic Capacitors
(www.kemet.com/aluminum)

<table>
<thead>
<tr>
<th>Technology</th>
<th>Advantages</th>
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</table>
| Axial Leads and Radial Crown | • Long life in industrial applications  
• High vibration resistance  
• Operational up to 150°C |
| Screw Terminal and Snap-In | • Long life electrolyte for 550 V and 125°C operation  
• Wide variety of terminal mounting options  
• Press-fit options available  
• Optimized designs available |
| Single-Ended Radial and Surface Mount | • Popular surface mount and radial sizes  
• Available with up to 105°C rating  
• Operational life up to 10,000 hours |
| Conductive Polymer Single-Ended Radial and Surface Mount | • Solid polymer electrolyte  
• Stable ESR across temperature range  
• Very low ESR  
• High ripple current |

## Ceramic Capacitors
(www.kemet.com/ceramic)

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| Surface Mount: C0G, X8L, X8R, X7R, X5R, Z5U, Y5V  
Chip Arrays, SnPb Terminations, Floating Electrode, Open Mode, Surface Mount Stacks, RF and Microwave | • Industry-leading C0G  
• Board flex mitigation technologies  
• Wide high voltage product range (500 VDC to 10K VDC)  
• Up to 200°C BME and 260°C PME  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |
| Ledged: C0G, X7R  
BME and PME-based dielectrics  
Based on high voltage and high temperature surface mount technologies | • Industry-leading C0G  
• Board flex mitigation technologies  
• Wide high voltage product range (500 VDC to 10K VDC)  
• Up to 200°C BME and 260°C PME  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |
| Disc: Safety/EMI Capacitors  
Available with X1 and Y2 ratings | • Industry-leading C0G  
• Board flex mitigation technologies  
• Wide high voltage product range (500 VDC to 10K VDC)  
• Up to 200°C BME and 260°C PME  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |

## Film Capacitors
(www.kemet.com/film)

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| Ledged: Polypropylene, Polyester, PET  
Designed for DC, AC, pulse, and safety/EMI applications | • Self-healing dielectrics  
• Segmented available on some series  
• AEC-Q200 available on some series  
• Safety ratings available on some series  
• High humidity available on some series  
• Multiple package options  
• Low ESR options available |
| Power Applications: Paper, Film, Box, Can, Axial  
Designed for motor run, transient suppression, and capacitative AC power supplies | • Self-healing dielectrics  
• Segmented available on some series  
• AEC-Q200 available on some series  
• Safety ratings available on some series  
• High humidity available on some series  
• Multiple package options  
• Low ESR options available |
| Surface Mount: PET, PEN, and PPS dielectrics  
Ultra-stable for filtering, coupling, and bulk capacitance applications | • Self-healing dielectrics  
• Segmented available on some series  
• AEC-Q200 available on some series  
• Safety ratings available on some series  
• High humidity available on some series  
• Multiple package options  
• Low ESR options available |

## Polymer Capacitors
(www.kemet.com/polymer)

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| Polymer Electrolytic KO-CAP®: Industrial Grade, High Reliability/COTS, Automotive Grade | • High capacitance in a small size  
• Low ESR and surge current robust  
• Stable capacitance across time, temperature and voltage  
• Long life solid electrolytic design  
• High energy density with low height profile  
• Commercial, Industrial, Automotive and COTS Grades available |
| Aluminum Polymer AO-CAP | • High capacitance in a small size  
• Surface mount stacks available  
• Low ESR and surge current robust  
• Operating temperature range up to 230°C  
• Non-magnetic capability available on many SMD products  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |
| Hermetically Sealed Axial | • High capacitance in a small size  
• Surface mount stacks available  
• Low ESR and surge current robust  
• Operating temperature range up to 230°C  
• Non-magnetic capability available on many SMD products  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |

## Supercapacitors
(www.kemet.com/supercapacitor)

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| Radial | • Maximum operating temperature of 85°C  
• Wide operating voltage range  
• Enables backup times from seconds to minutes  
• Unique construction offers long operational life |
| Surface Mount | • Maximum operating temperature of 85°C  
• Wide operating voltage range  
• Enables backup times from seconds to minutes  
• Unique construction offers long operational life |

## Tantalum MnO₂ Capacitors
(www.kemet.com/tantalum)

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| Standard, High Temperature, High Reliability/COTS, MIL-PRF CWR, Fused, Automotive Grade, Space Grade | • High capacitance in a small size  
• Surface mount stacks available  
• Low ESR and surge current robust  
• Operating temperature range up to 230°C  
• Non-magnetic capability available on many SMD products  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |
| Hermetically Sealed Axial, Radial Dipped, Molded Axial and Radial | • High capacitance in a small size  
• Surface mount stacks available  
• Low ESR and surge current robust  
• Operating temperature range up to 230°C  
• Non-magnetic capability available on many SMD products  
• Commercial, Industrial, Automotive, MIL-PRF and Space Grades available |
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| **EMI Cores (www.kemet.com/emicores)** | - Round Cable: Bead, Toroidal and Snap-On Cores  
- Flat Cable: Split and Solid Cores  
- Broad frequency range  
- Meets IEC, CISPR and ECE EMI standards  
- Meets regional FCC, EN and VCCI standards |
| **EMI Filters (www.kemet.com/emifilters)** | - General Purpose, IEC-Inlet/Power Entry Modules, Chassis Mount, Feed-Through Filters and Capacitors, Special Purpose  
- Wide range available from one source  
- Accommodates broad variety of applications  
- Customized solutions available |
| **Flex Suppressors Sheets (www.kemet.com/flexsuppressor)** | - Sheets: 0.03 – 1.0 mm thicknesses for permeabilities ranging from 20 – 130 µ  
- High magnetic permeability  
- Low magnetic loss  
- Ultra-thin flexible sheets with self adhesive option  
- Effective from 1 MHz – 10 GHz  
- IR reflow capable versions available  
- Ideal for use in portable equipment |
| **Inductors (www.kemet.com/inductors)** | - Common Mode AC Line Filters (Chokes) available in Toroidal and Rectangular Configurations  
- High permeability core  
- Compact size, low profile and light weight  
- Nickel-zinc ferrite core  
- Magnetic nonshield type  
- Operating temperature range up to 105°C  
- Metal composite core  
- High permeability and low DC resistance  
- Reduced acoustic noise  
- Small packages with high saturation current |
| **Piezoelectric Actuators (www.kemet.com/actuators)** | - Resin Coated, Encapsulated Metal Case  
- Accurate nanometer positioning  
- High-speed response  
- High reliability and long operational life  
- Low power consumption  
- High electrostrictive factor |
| **Miniature Signal Relays (www.kemet.com/signalrelays)** | - Surface Mount and Through-Hole  
- Compact, lightweight, ultra-low profile  
- Low power consumption  
- Extremely durable plastic sealing  
- High withstanding voltage |
| **Sensors (www.kemet.com/sensors)** | - Current Sensors: Alternating Current, Zero-Phase Current Transformers  
- Compact and lightweight designs  
- High sensitivity  
- Flame retardancy available  
- Ideal for threshold thermal control  
- High reliability and long operational life  
- Sensing temperature range of +30°C to +130°C  
- Excellent temperature accuracy of ±2.5°C (TRS)  
- High-speed switching  
- Excellent environmental durability  
- Screw clamp for easy installation  
- No control circuit required  
- Wide range of surface mount sizes available  
- Up to 150°C operating temperature range  
- Automotive and Industrial Grade  
- RoHS, GADSL, REACH and AEC-Q200 |
| **Varistors (www.kemet.com/varistors)** | - Surface Mount, Dual Function  
- Wide range of surface mount sizes available  
- Up to 150°C operating temperature range  
- Automotive and Industrial Grade  
- RoHS, GADSL, REACH and AEC-Q200 |
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