

# 40 Series

## Ohmicone® Silicone-Ceramic Conformal Axial Terminal Wirewound 1% and 5% Tolerance Standard



Ohmite 40 Series resistors are the most economical conformal silicone-ceramic coated resistors offered. These all-welded units are characterized by their low temperature coefficients and resistance to thermal shock, making them ideal for a wide range of electrical and electronic applications.

Units with 1% and 5% tolerances are identical in construction and electrical specifications. Durable but economical 40 Series resistors exceed industry requirements for quality.

### FEATURES

- Economical
- Applications include commercial, industrial and communications equipment
- Stability under high temperature conditions
- All-welded construction
- RoHS compliant; add "E" suffix to part number to specify.

### SERIES SPECIFICATIONS

| Series | Wattage | Ohms      | Voltage |
|--------|---------|-----------|---------|
| 41     | 1.0     | 0.10-6K   | 150     |
| 42     | 2.0     | 0.10-8K   | 100     |
| 43     | 3.0     | 0.10-20K  | 200     |
| 45     | 5.0     | 0.10-70K  | 460     |
| 47     | 7.0     | 0.10-80K  | 670     |
| 40     | 10.0    | 0.10-150K | 1000    |

Non-Inductive versions available. Insert "N" before tolerance code.  
Example: 42NJ27R

### CHARACTERISTICS

|                                |   |
|--------------------------------|---|
| <b>Coating</b>                 | Conformal silicone-ceramic.   |
| <b>Core</b>                    | Ceramic.  |
| <b>Terminals</b>               | Solder-coated copper clad axial. RoHS solder composition is 96% Sn, 3.5% Ag, 0.5% Cu                        |
| <b>Derating</b>                | Linearly from 100% @ +25°C to 0% @ +275°C.  |
| <b>Tolerance</b>               | ±5% (J type), ±1% (F type) (other tolerances available).  |
| <b>Power rating</b>            | Based on 25°C free air rating   |
| <b>Overload</b>                | Under 5 watts: 5 times rated wattage for 5 seconds. 5 watts and over: 10 times rated wattage for 5 seconds. |
| <b>Temperature coefficient</b> | Under 1Ω: ±90 ppm/°C; 1Ω to 9.99Ω: ±50 ppm/°C; 10Ω and over: ±20 ppm/°C                                     |
| <b>Operating temp. range</b>   | -55°C to 275°C  |

### DIMENSIONS

(in./mm max.)



| Series | Wattage | Length       | Diam.        | Lead ga. |
|--------|---------|--------------|--------------|----------|
| 41     | 1.0     | 0.437 / 11.1 | 0.125 / 3.2  | 24       |
| 42     | 2.0     | 0.406 / 10.3 | 0.219 / 5.6  | 20       |
| 43     | 3.0     | 0.593 / 15.1 | 0.219 / 5.6  | 20       |
| 45     | 5.0     | 0.937 / 23.8 | 0.343 / 8.7  | 18       |
| 47     | 7.0     | 1.280 / 32.5 | 0.343 / 8.7  | 18       |
| 40     | 10.0    | 1.900 / 48.3 | 0.406 / 10.3 | 18       |

(continued)

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## Ohmicone® Silicone-Ceramic Conformal Axial Terminal Wirewound 1% and 5% Tolerance Standard

### ORDERING INFORMATION

#### Standard part numbers

| Ohmic value | Part No.<br>Prefix ><br>Suffix > | Wattage and Tolerance |   |              |    |   | Ohmic value | Part No.<br>Prefix ><br>Suffix > | Wattage and Tolerance |    |              |     |   | Ohmic value | Part No.<br>Prefix ><br>Suffix > | Wattage and Tolerance |    |  |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
|-------------|----------------------------------|-----------------------|---|--------------|----|---|-------------|----------------------------------|-----------------------|----|--------------|-----|---|-------------|----------------------------------|-----------------------|----|--|-----|---|---|----|---|---|---|---|---|----|---|---|---|---|----|
|             |                                  | 1% Tolerance          |   | 5% Tolerance |    |   |             |                                  | 1% Tolerance          |    | 5% Tolerance |     |   |             |                                  | 1% Tolerance          |    | 5% Tolerance   |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
|             |                                  | 1                     | 3 | 5            | 10 | 1 | 2           | 3                                | 5                     | 10 |              |     | 1 | 2           | 3                                | 5                     | 10 | 1  | 2   | 3 | 5 | 10 |   |   | 1 | 3 | 5 | 10 | 1 | 2 | 3 | 5 | 10 |
| 0.1         | R10                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 68           | 68R | ✓ | ✓           | ✓                                | ✓                     | ✓  | 2,200  | 2K2 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 0.15        | R15                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 75           | 75R | ✓ | ✓           | ✓                                | ✓                     | ✓  | 2,500  | 2K5 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.2         | R20                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 82           | 82R | ✓ | ✓           | ✓                                | ✓                     | ✓  | 2,700  | 2K7 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.25        | R25                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 100          | 100 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 3,000  | 3K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.3         | R30                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 120          | 120 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 3,300  | 3K3 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.33        | R33                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 125          | 125 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 3,500  | 3K5 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.4         | R40                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 150          | 150 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 3,900  | 3K9 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.5         | R50                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 180          | 180 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 4,000  | 4K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 0.75        | R75                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 200          | 200 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 4,500  | 4K5 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 1           | 1R0                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 220          | 220 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 4,700  | 4K7 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 1.5         | 1R5                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 225          | 225 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 5,000  | 5K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 2           | 2R0                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 250          | 250 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 6,000  | 6K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 2.2         | 2R2                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 270          | 270 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 6,800  | 6K8 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 3           | 3R0                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 300          | 300 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 7,000  | 7K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 4           | 4R0                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 330          | 330 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 7,500  | 7K5 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 5           | 5R0                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 350          | 350 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 8,000  | 8K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 7.5         | 7R5                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 390          | 390 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 9,000  | 9K0 | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 10          | 10R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 400          | 400 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 10,000   | 10K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 12          | 12R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 450          | 450 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 12,000   | 12K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 15          | 15R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 470          | 470 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 13,000   | 13K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 18          | 18R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 500          | 500 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 15,000   | 15K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 20          | 20R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 560          | 560 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 17,000   | 17K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ |    |
| 22          | 22R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 600          | 600 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 20,000   | 20K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 25          | 25R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 680          | 680 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 22,000   | 22K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 27          | 27R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 750          | 750 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 25,000   | 25K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 30          | 30R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 800          | 800 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 30,000   | 30K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 33          | 33R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 820          | 820 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 33,000   | 33K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 35          | 35R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 900          | 900 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 35,000   | 35K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 39          | 39R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,000        | 1K0 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 40,000   | 40K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 40          | 40R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,100        | 1K1 | ✓ | ✓           | ✓                                | ✓                     | ✓  | 50,000   | 50K | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓ | ✓  | ✓ | ✓ | ✓ | ✓ | ✓  |
| 47          | 47R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,200        | 1K2 | ✓ | ✓           | ✓                                | ✓                     | ✓  | ✓ = Standard values<br>✖ = Non-standard values subject to minimum handling charge per item |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
| 50          | 50R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,500        | 1K5 | ✓ | ✓           | ✓                                | ✓                     |    |  |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
| 56          | 56R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,800        | 1K8 | ✓ | ✓           | ✓                                | ✓                     |    |  |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
| 56          | 56R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 1,800        | 1K8 | ✓ | ✓           | ✓                                | ✓                     |    |  |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |
| 62          | 62R                              | ✓                     | ✓ | ✓            | ✓  | ✓ | ✓           | ✓                                | ✓                     | ✓  | 2,000        | 2K0 | ✓ | ✓           | ✓                                | ✓                     |    |  |     |   |   |    |   |   |   |   |   |    |   |   |   |   |    |

Shaded values involve very fine resistance wire and should not be used in critical applications without burn-in and/or thermal cycling.





Компания «ЭлектроПласт» предлагает заключение долгосрочных отношений при поставках импортных электронных компонентов на взаимовыгодных условиях!

Наши преимущества:

- Оперативные поставки широкого спектра электронных компонентов отечественного и импортного производства напрямую от производителей и с крупнейших мировых складов;
- Поставка более 17-ти миллионов наименований электронных компонентов;
- Поставка сложных, дефицитных, либо снятых с производства позиций;
- Оперативные сроки поставки под заказ (от 5 рабочих дней);
- Экспресс доставка в любую точку России;
- Техническая поддержка проекта, помощь в подборе аналогов, поставка прототипов;
- Система менеджмента качества сертифицирована по Международному стандарту ISO 9001;
- Лицензия ФСБ на осуществление работ с использованием сведений, составляющих государственную тайну;
- Поставка специализированных компонентов (Xilinx, Altera, Analog Devices, Intersil, Interpoint, Microsemi, Aeroflex, Peregrine, Syfer, Eurofarad, Texas Instrument, Miteq, Cobham, E2V, MA-COM, Hittite, Mini-Circuits, General Dynamics и др.);

Помимо этого, одним из направлений компании «ЭлектроПласт» является направление «Источники питания». Мы предлагаем Вам помощь Конструкторского отдела:

- Подбор оптимального решения, техническое обоснование при выборе компонента;
- Подбор аналогов;
- Консультации по применению компонента;
- Поставка образцов и прототипов;
- Техническая поддержка проекта;
- Защита от снятия компонента с производства.



#### Как с нами связаться

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