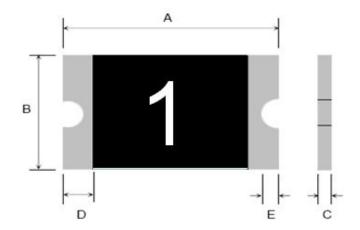
# JK-SMD0805-010 PPTC DEVICES

Part Number: Q/JKTD-15-010





Terminal pad materials: Tin-Plated Nickle-copper

Terminal pad solderability: Meets EIA specification RS 186-9E and ANSI/J-STD-002 Category 3.

Marking: Part identification 1=010

Table1:DIMENTION(Unit:mm)

| Model          | Marking | A    |      | В    |      | С    |      | D    | Е    |
|----------------|---------|------|------|------|------|------|------|------|------|
|                |         | Min. | Max. | Min. | Max. | Min. | Max  | Min. | Min. |
| JK-SMD0805-010 | 1       | 2.00 | 2.20 | 1.20 | 1.50 | 0.50 | 1.00 | 0.20 | 0.10 |

### Table2:PERFORMANCE RATINGS:

| Model          | Marking | V <sub>max</sub> | I <sub>max</sub> | I <sub>hold</sub> | I <sub>trip</sub> | Pd   | Maxin   | num   | ]          | Resistanc         | e                 |
|----------------|---------|------------------|------------------|-------------------|-------------------|------|---------|-------|------------|-------------------|-------------------|
|                |         |                  |                  | @25°C             | @25°C             | Тур  | Time To | Trip  |            |                   |                   |
|                |         |                  |                  |                   |                   |      | Current | Time  | Rimin      | Ri <sub>typ</sub> | R1 <sub>max</sub> |
|                |         | (Vdc)            | (A)              | (A)               | (A)               | (W)  | (A)     | (Sec) | $(\Omega)$ | $(\Omega)$        | $(\Omega)$        |
| JK-SMD0805-010 | 1       | 15.0             | 100              | 0.10              | 0.30              | 0.50 | 0.5     | 1.50  | 1.000      | 2.500             | 6.000             |

Table3:Test Conditons and Standards

| Item               | Test Conditon     | Standard                 |  |  |  |
|--------------------|-------------------|--------------------------|--|--|--|
| Initial Resistance | 25℃               | $1.000{\sim}2.500\Omega$ |  |  |  |
| $I_{H}$            | 25℃, 0.10A, 60min | No Trip                  |  |  |  |
| Ttrip              | 25℃, 0.5A         | ≤1.5s                    |  |  |  |
| Trip endurance     | 15V, 100A, 1hr    | No arcing or burning     |  |  |  |

Operating Temperature: -40℃ TO 85℃

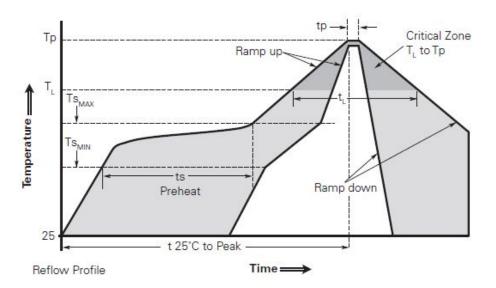
Packaging: Bulk ,5000pcs per bag

# JK-SMD0805-010 PPTC DEVICES

Part Number: Q/JKTD-15-010



#### **Solder reflow conditions**



| Pb-Free Assembly |  |  |  |
|------------------|--|--|--|
| 3°C/second max.  |  |  |  |
|                  |  |  |  |
| 150°C            |  |  |  |
| 200°C            |  |  |  |
| 60-120 seconds   |  |  |  |
|                  |  |  |  |
| 217°C            |  |  |  |
| 60-150 seconds   |  |  |  |
| 260°C            |  |  |  |
| ure              |  |  |  |
| 30 seconds max.  |  |  |  |
| 3°C/second max.  |  |  |  |
| 8 minutes max.   |  |  |  |
|                  |  |  |  |

Note: All temperatures refer to topside of the package, measured on the package body surface.

- Recommended reflow methods: IR, vapor phase oven, hot air oven, N2 environment for lead-free.
- Devices are not designed to be wave soldered to the bottom side of the board.
- Recommended maximum paste thickness is 0.25mm (0.010inch).
- Devices can be cleaned using standard industry methods and solvents.
- Soldering temprature profile meets RoHs leadfree process.

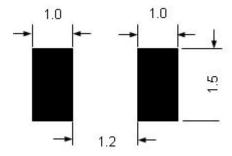
Notes: If reflow temperatures exceed the recommended profile, devices may not meet the performance requirements

### JK-SMD0805-010 PPTC DEVICES

Part Number: Q/JKTD-15-010



### Recommended pad layout (mm)



# WARNING

- · Use PPTC beyond the maximum ratings or improper use may result in device damage and possible electrical arcing and flame.
- · PPTC are intended for protection against occasional over current or over temperature fault conditions and should not be used when repeated fault conditions or prolonged trip events are anticipated.
- · Device performance can be impacted negatively if devices are handled in a manner inconsistent with recommended electronic, thermal, and mechanical procedures for electronic components.
- · Use PPTC with a large inductance in circuit will generate a circuit voltage (L di/dt) above the rated voltage of the PPTC.
- · Avoid impact PPTC device its thermal expansion like placed under pressure or installed in limited space.
- · Contamination of the PPTC material with certain silicon based oils or some aggressive solvents can adversely impact the performance of the devices.PPTC SMD can be cleaned by standard methods.
- · Requests that customers comply with our recommended solder pad layouts and recommended reflow profile. Improper board layouts or reflow profilecould negatively impact solderability performance of our devices.