



# Radial Lead Resettable Polymer PTCs

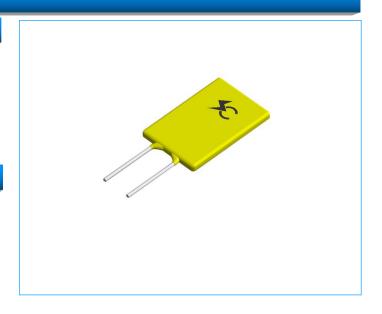
### SC135-400SZ0D

#### **Features**

- RoHS Compliant and Halogen-Free
- Radial leaded Devices
- Cured,flame retardant epoxy polymer insulating material meets UL94V-0 requirements
- Operation Current: 0.40 A, Maximum Voltage: 90 Vdc,
  Operating Temperature: -40°C to +85°C

#### **Applications**

- USB hubs, ports and peripherals
- Power ports
- ♦ IEEE1394 ports
- Motor protection
- ◆ Automotive application
- Computers and peripherals
- General electronics



#### **Electrical Parameters**

Part Number	I hold (A)	I trip (A)	V <sub>max</sub>	I <sub>max</sub> (A)	I <sub>max</sub>	I <sub>max</sub>	$P_{dtyp}$	Maximum Time To Trip		Resistance	
Fait Number Th	I hold (A)	I hold (A) I trip (A)	(Vdc)		(W)	Current (A)	Time (S)	R <sub>min</sub> (Ω)	R1 <sub>max</sub> (Ω)		
SC135-400SZ0D	0.40	0.80	90	10	1.50	2.00	20	0.65	1.65		

I hold= Hold current: maximum current at which the device will not trip at 25°C still air.

I <sub>trip</sub>= Trip current: minimum current at which the device will always at 25°C still air.

V <sub>max</sub>= Maximum voltage device can withstand without damage at rated current.

I max = Maximum fault current device can withstand without damage at rated voltage.

T trip=Maximum time to trip(s) at assigned current.

P<sub>divo</sub> = Typical power dissipation: typical amount of power dissipated by the device when in state air environment.

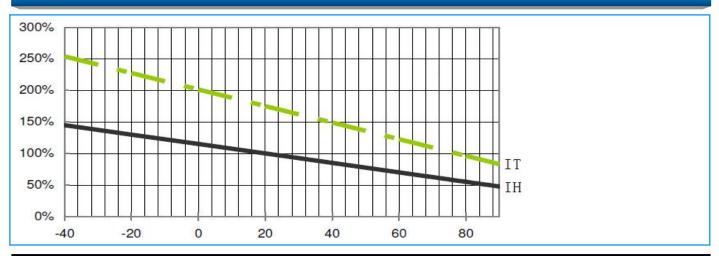
R<sub>min</sub>= Minimum device resistance at 25°C prior to tripping.

R <sub>max</sub>= Maximum device resistance at 25°C prior to tripping.

R1<sub>max</sub>= Maximum resistance of device at 25°C measured one hour after tripping.

Caution: Operation beyond the specified rating may result in damage and possible arcing and flame.

### **Temperature Derating Curve**



SOCAY Electronics Corp., Ltd.

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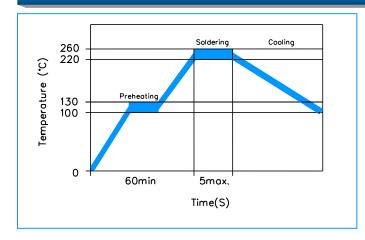
# **Radial Lead Resettable Polymer PTCs**

## SC135-400SZ0D

## **Test Procedures and Requirement**

Test	Test Conditions	Accept/Reject Criteria		
Resistance	In still air @25±2°C	$R_{min} \leq R \leq R_{max}$		
Hold Current	60 min, at I <sub>hold</sub> , In still air @25±2°C	No trip		
Time to Trip	Specified current, V <sub>max</sub> , @25±2°C	T≤Maximum Time To Trip		
Trip Cycle Life	V <sub>max</sub> , I <sub>max</sub> ,100 cycles	No arcing or burning		
Trip Endurance	Vmax,24hours	No arcing or burning		

# **Soldering Parameters**



Pre-Heating Zone	Refer to the condition recommended by the manufacturer. Max. ramping rate should not exceed 4°C/Sec		
Soldering Zone	Max. solder temperature should not exceed 260°C		
Cooling Zone	Cooling by natural convection in air		

#### **Physical Specifications**

Lead Material	0.03-1.85A Tin-plated Copper clad steel 2.50-5.00A Tin-plated Copper		
Soldering Characteristics	Solder ability per MIL-STD-202, Method 208E		
Insulating Material	Cured, flame retardant epoxy polymer meets UL 94V-0 requirements.		
Device Labeling	Marked with 'SC', voltage, current rating		

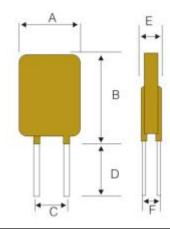




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# SC135-400SZ0D

#### **Dimensions**



Part Number	Dimensions (mm)					
r art Number	A (Max)	B (Max)	C (Typ)	D (Min)	E (Max)	F (Typ)
SC135-400SZ0D	9.0	15.5	5.1	7.6	3.5	1.5

## **Packaging Quantity**

Part Number	Quantity (pcs/reel)		
SC135-400SZ0D	1000		