

PolySwitch® PTC Devices

Overcurrent Protection Device

PRODUCT: AHRF800

DOCUMENT: SCD26638 REV LETTER: E

REV DATE: JULY 26, 2016

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Specification Status: Released

Electrical Rating Voltage: 16V_{DC} MAX

Current: 100A MAX

Insulating Material:

Cured, Flame Retardant Epoxy Polymer meets UL94 V-0 Requirements

Lead Material:

20 AWG Tin Plated Copper (0.8 mm [0.032] nom. diameter)

Marking:

Manufacturer's Mark

Manufacturer's Mark

Mark H8 and Part Identification



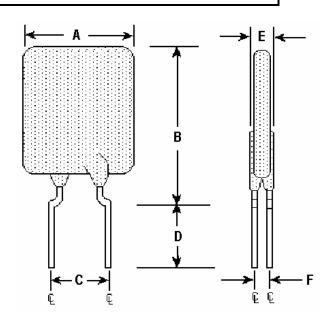


TABLE I. DIMENSIONS:

	Α		В		С		D		Е		F
	MIN	MAX	MIN	MAX	MIN	MAX	MIN	MAX	MIN	MAX	TYP
mm:		16.5		22.5	4.3	5.8	7.6			3	1.2
in*:		(0.65)		(0.88)	(0.17)	(0.23)	(0.3)			(0.12)	(0.05)

^{*}Rounded off approximation

T	TABLE II. PERFORMANCE RATINGS:							
	CURREN'	T RATINGS	TIME TO TRIP	IN RESISTAN	ITIAL CE VALUES	R _{а MAX}	TRIPPED-STATE POWER DISSIPATION	
	AMPS		SECONDS AT 25°C,	NDS AT 25°C, OHM		OHMS	WATTS AT	
	AT 25°C		40 A	AT 25°C		AT 25°C	25°C 16V	
	HOLD	TRIP	MAX	MIN	MAX	MAX	TYP	
	8.0	15.0	8.0	0.0072	0.0135	0.020	4.2	

Reference Documents: PS400, PS300 (reference for R_{1 MAX})

Precedence: This specification takes precedence over documents referenced herein.

Effectivity: Reference documents shall be the issue in effect on the date of invitation for bid.

CAUTION: Operation beyond the rated voltage or current may result in rupture, electrical arcing or flame.

Materials Information

ROHS Compliant ELV Compliant Pb-Free

Directive 2002/95/EC Compliant Directive 2000/53/EC Compliant





Halogen Free*

^{*} Halogen Free refers to: Br≤900ppm, Cl≤900ppm, Br+Cl≤1500ppm.



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TABLE III. AUTOMOTIVE SPECIFIC STRESS TESTS AND TEST CONDITIONS:

ELECTRICAL STRESS TESTS	TEST CONDITIONS (see note 2)
ESD Voltage Withstand (see note 1)	25kV
Short Circuit Fault Current Durability	25 cycles, 16V, 200A
Fault Current Durability	350 cycles, 16V/100A
End-of-life Mode Verification	1750 cycles, 16V/100A
Jump Start Endurance (see note 1)	3 cycles, 26V, 1 minute duration
Load Dump Endurance (see note 1)	10 cycles, 86.5V

Note 1: The PolySwitch devices are tested in series with a load resistance and the voltages specified in the test conditions are shared between the PolySwitch device and the load resistance as specified in PS400.

Note 2: Please refer to Appendix A of PS400 for the detailed test procedures.

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