# 242 Series Barrier Network Fuse



Agency Approvals			
Agency	Agency File Number	Ampere Range	
<b>91</b> °	E10480	0.050 - 0.250 A	

#### **Electrical Characteristics**

% of Ampere Rating	OpeningTime
100%	4 hours, Minimum
300%	10 seconds, Maximum
1000%	0.002 seconds, Maximum

#### **Electrical Characteristics**

### Description

The 242 Series hazardous area barrier network fuse offers a range of fuses designed to enable greater safety operating electronic equipment within potentially explosive environments.

#### Features

- High interrupting rating suitable for intrinsic safety protection of hazardous locations equipment.
- Available in both axial lead and surface mount.

RoHS - -

• RoHS compliant and Halogen-free

#### Applications

 Intrinsic saftey electrical equipment; Electrical connections and components, Test equipment

#### Additional Information





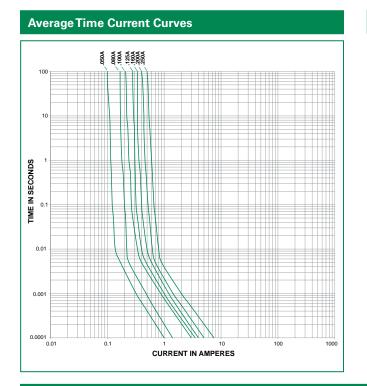


Samples

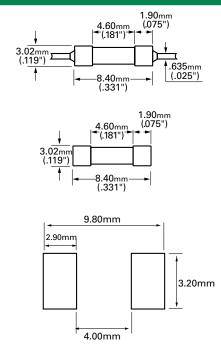
Ampere Rating (A)		Body Color Coding	Interrupting Rating	Nominal Cold Resistance (Ohms)	Nominal Melting I²t (A² Sec.)	Agency Approvals
	Amp Code					<b>7</b> .
0.050	.050	Red	4000A @ 250VAC/VDC	11.34	0.000103	х
0.080	.080	Green		8.19	0.000214	х
0.100	.100	Blue		3.60	0.000977	х
0.125	.125	Orange		3.78	0.001026	х
0.160	.160	Violet		3.00	0.00157	x
0.200	.200	Brown		2.68	0.0025	х
0.250	.250	Black		1.6	0.00579	x

# **Special Application Fuses** 242 Series Barrier Network Fuse





#### Dimensions

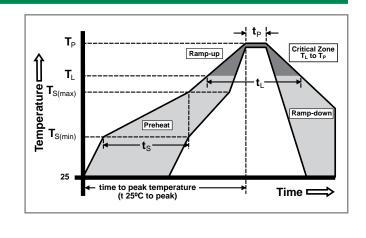


#### **Soldering Parameters**

Reflow Condition		Pb – Free assembly	
Pre Heat	-Temperature Min (T <sub>s(min)</sub> )	150°C	
	-Temperature Max (T <sub>s(max)</sub> )	200°C	
	-Time (min to max) (t <sub>s</sub> )	60 – 180 secs	
Average ramp up rate (Liquidus Temp $(T_L)$ to peak		5°C/second max	
T <sub>S(max)</sub> to T <sub>L</sub> - Ramp-up Rate		5°C/second max	
Reflow	-Temperature (T <sub>L</sub> ) (Liquidus)	217°C	
	- Temperature (t <sub>L</sub> )	60 – 150 seconds	
PeakTemperature (T <sub>P</sub> )		250 <sup>+0/-5</sup> °C	
Time within 5°C of actual peakTemp. $(t_p)$		20 – 40 seconds	
Ramp-down Rate		5°C/second max	
Time 25°C to peak Temperature (T <sub>P</sub> )		8 minutes Max.	
Do not exceed		260°C	

## **Product Characteristics**

Operating Temperature	-40°C to 125°C (Consider re-rating)	
Thermal Shock	Withstands 5 cycles of – $55^{\circ}$ C to $125^{\circ}$ C	
Vibration	Per MIL-STD-202 Method 201	
Insulation Resistance (After Opening)	Greater than 10,000 ohms.	



Wave Soldering

260°C, 10 seconds max.

#### **Part Numbering System**

