

# RoHS PO

# 209 Series Lead-Free 2AG, Slo-Blo® (Time-Lag) Fuse





#### **Agency Approvals**

Agency	Agency File Number	Ampere Range	
c <b>FU</b> °us	E10480	250mA-7A	
PS E	NBK210405-E10480G/H NBK210405-E10480C/D NBK210405-E10480E/F	1A-7A	
Œ		250mA-7A	

# **Description**

Littelfuse 209 Series (2AG) 350V, Time-Lag (Slo-Blo®) Fuses are available in cartridge form or with axial leads. This series provides the same performance characteristics as its 3AG counterpart, while occupying one-third the space. Sleeved fuses are available.

#### **Features**

- In accordance with Underwriter's Laboratories Standard UL 248-14
- Available in cartridge and axial lead form and
- with various forming dimensions
- RoHS compliant and Lead-free

### **Applications**

• Electronic Lighting Ballasts

#### **Electrical Characteristics for Series**

% of Ampere Rating	Opening Time	
100%	4 Hours, <b>Min.</b>	
135%	1 Hour, <b>Max</b> .	
200%	3 Sec. <b>Min.</b> ; 20 Sec. <b>Max.</b>	

# **Electrical Characteristic Specifications by Item**

Amp Ampere Code Rating (A)	Voltage	, , , Nominal Cold	Nominal	Agency Approvals				
	Rating	Rating (V)	Interrupting Rating	Resistance (Ohms)	Melting I <sup>2</sup> t (A <sup>2</sup> sec)	c <b>'71</b> °us	PSE	Œ
.250	0.25	350		2.410	0.216	×		х
.375	0.375	350		1.170	0.580	x		X
.500	0.5	350		0.688	1.160	x		X
.600	0.6	350		0.477	1.750	x		X
.750	0.75	350		0.340	2.950	×		х
.800	0.8	350		0.304	3.450	×		х
001.	1	350		0.210	5.640	×	X	х
1.25	1.25	350		0.1460	9.80	×	X	х
01.5	1.5	350	100A @	0.1077	15.0	×	X	х
002	2	350	350Vac	0.0689	30.0	×	X	х
2.25	2.25	350		0.0567	39.0	×	X	х
02.5	2.5	350		0.0502	50.0	×	X	х
003	3	350		0.0383	77.0	×	х	х
03.5	3.5	350		0.0312	110	×	X	×
004	4	350		0.0258	148	х	X	х
005	5	350		0.0186	267	×	×	х
006	6	350		0.0141	380	×	X	х
007	7	350		0.0116	464	х	X	х

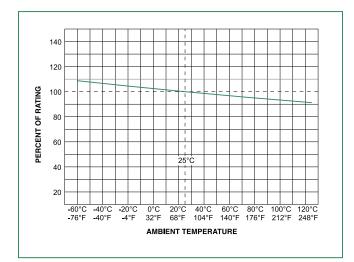
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Specifications are subject to change without notice.

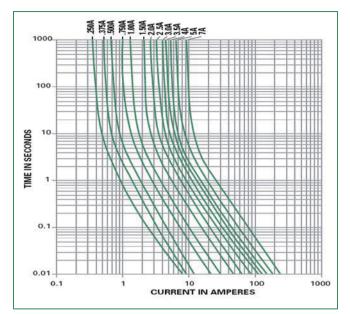
Please refer to www.littelfuse.com/series/209.html for current information.



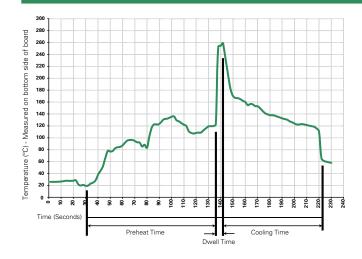
#### **Temperature Rerating Curve**



#### **Average Time Current Curves**



# **Soldering Parameters - Wave Soldering**



#### **Recommended Process Parameters:**

Wave Parameter	Lead-Free Recommendation		
Preheat:			
(Depends on Flux Activation Temperature)	(Typical Industry Recommendation)		
Temperature Minimum:	100° C		
Temperature Maximum:	150° C		
Preheat Time:	60-180 seconds		
Solder Pot Temperature:	260° C Maximum		
Solder DwellTime:	2-5 seconds		

#### **Recommended Hand-Solder Parameters:**

Solder Iron Temperature: 350° C +/- 5°C

Heating Time: 5 seconds max.

Note: These devices are not recommended for IR or Convection Reflow process.



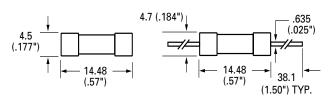
#### **Product Characteristics**

Materials	Body : Glass Cap : Nickel-plated brass Leads: Tin-plated Copper	
Terminal Strength	MIL-STD-202G, Method 211A, Test Condition A	
Solderability	Reference IEC 60127 Second Edition 2003-01 Annex A	
Product Marking	Cap1 : Brand logo, current and voltage ratings Cap2 : Series and agency approval marks	

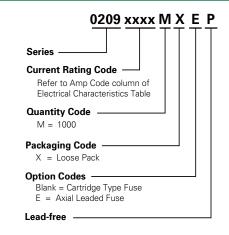
Operating Temperature:	−55°C to 125°C.
Thermal Shock:	MIL-STD-202G, Method 107G, Test Condition B (5 Cycles -65°C to +125°C).
Vibration	MIL-STD-202G, Method 201A
Humidity	MIL-STD-202G, Method 103B, Test Condition A: High RH (95%) and elevated temp (40°C) for 240 hours
Salt Spray	MIL-STD-202G, Method 101D, Test Condition B

#### **Dimensions**

# **209** 000P **Series 209** 000EP **Series**



# **Part Numbering System**



#### **Packaging**

Packaging Option	Packaging Specification	Quantity	Quantity & Packaging Code	Taping Width		
209 Series						
Bulk	N/A	1000	MX	N/A		
Bulk	N/A	1000	MXE	N/A		
Reel and Tape	EIA 296-E	1500	DRT1	T1=52mm (2.062")		

