

RoHS
Compliant



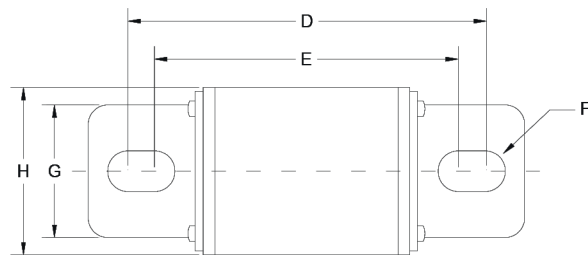
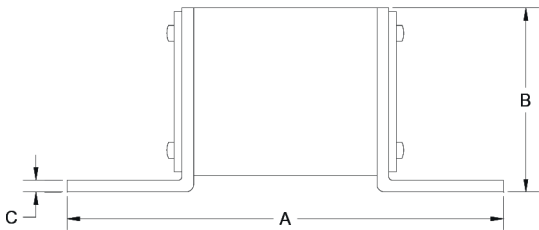
Description

This EV series fuses are specially engineered and tested to provide best-in-class protection performance in protecting high power battery charging and managing systems of Electrical Vehicles and Hybrid Electrical Vehicles, up to 1000V DC in ratings from 125A to 500A.

Features

- Reliable clearing of DC fault currents
- High cycling performance
- Low watt losses
- Ultra-compact size and power density
- High breaking capacity to 50kA
- QR code marks on each fuse for traceability

Diagram



Part Number	A	B	C	D	E	F	G	H
MP010937	117 ±1.5	24 ±1	2 ±0.1	100.5 ±1	87.5 ±1	φ8.5 ±0.5	32.5 ±0.5	36.3+1.2/-0.5
MP010938								
MP010939	126.5 ±1.5	48 ±0.8	3 ±0.15	106 ±1	89 ±1	φ10.5 ±0.3	34 ±0.5	47 ±0.5
MP010940								
MP010941								

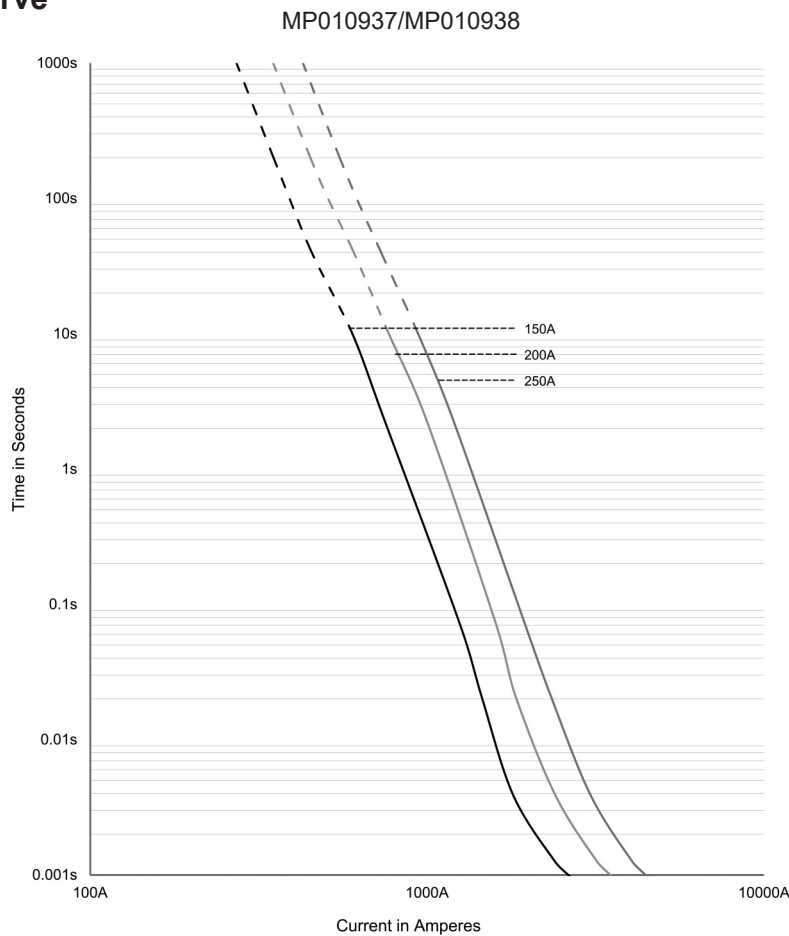
Dimensions : Millimetres

Electrical Specifications

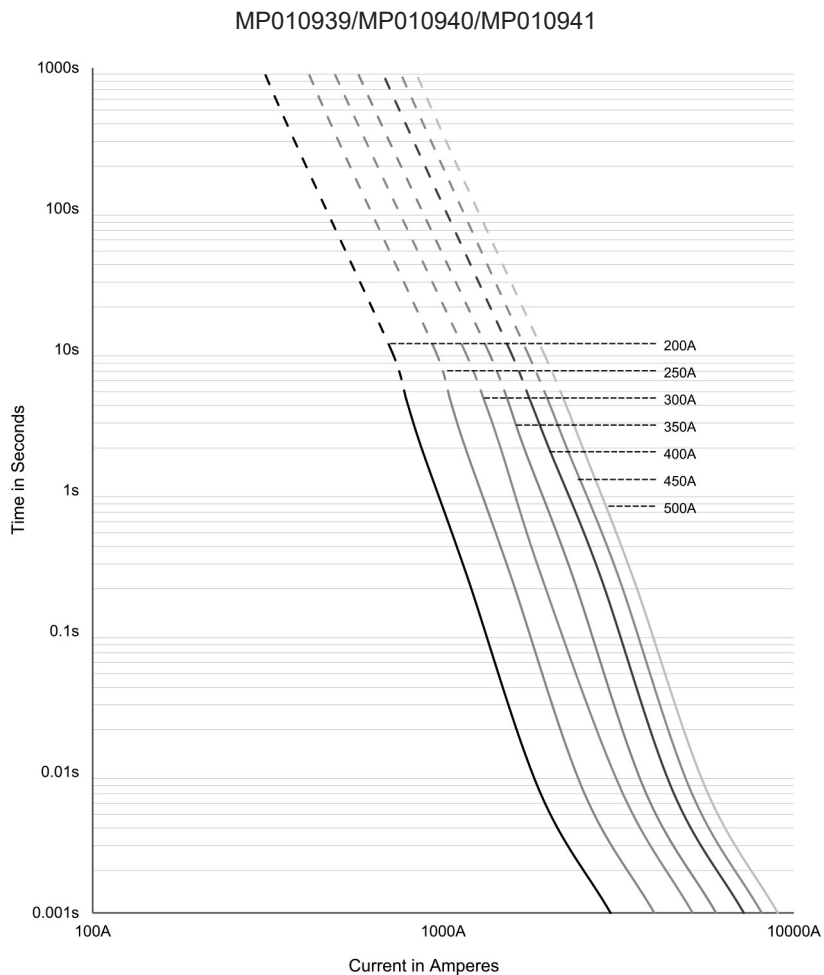
Size (mm)	Part Number	Rated Current	Ampere Code	Rated Voltage	Breaking Capacity		I ² t (A ² sec)		Watt Loss (W) 0.5 I _n
					UL**	Self-Certified	Piercing	Total @ 1000V DC	
74 × 36	MP010937	200 A	3200	1000V DC	-	4I _n ~50kA	-	-	6.6
	MP010938	250 A	3250		-	-	-	-	8.5
71 × 47	MP010939	350 A	3350		4I _n ~50kA	-	21600	115000	14.5
	MP010940	400 A	3400				28600	163000	17
	MP010941	450 A	3450				38200	223000	19.5

- ** --- UL File: E506668
- EFXxxxxa43 temperature rise: 0.5I_n < 50K.
- EFXxxxxa36 recommend mounting torque is 12+/-1.0Nm (M8);
EFXxxxxa43 recommend mounting torque is 20+/-1Nm (M10).

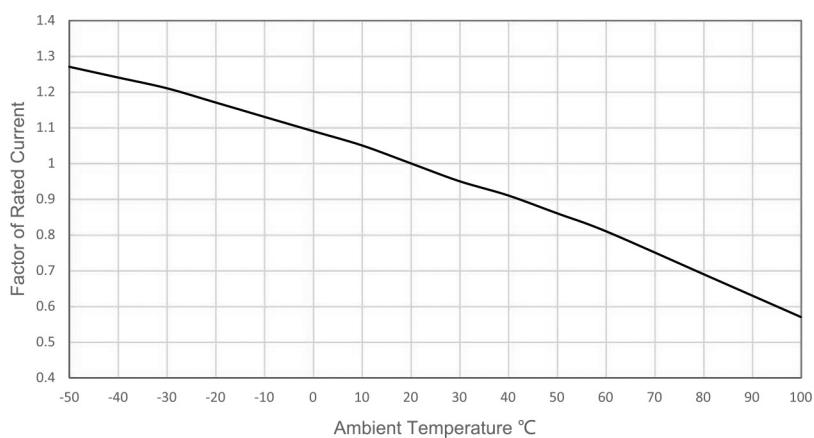
Time Current Curve



Time Current Curve

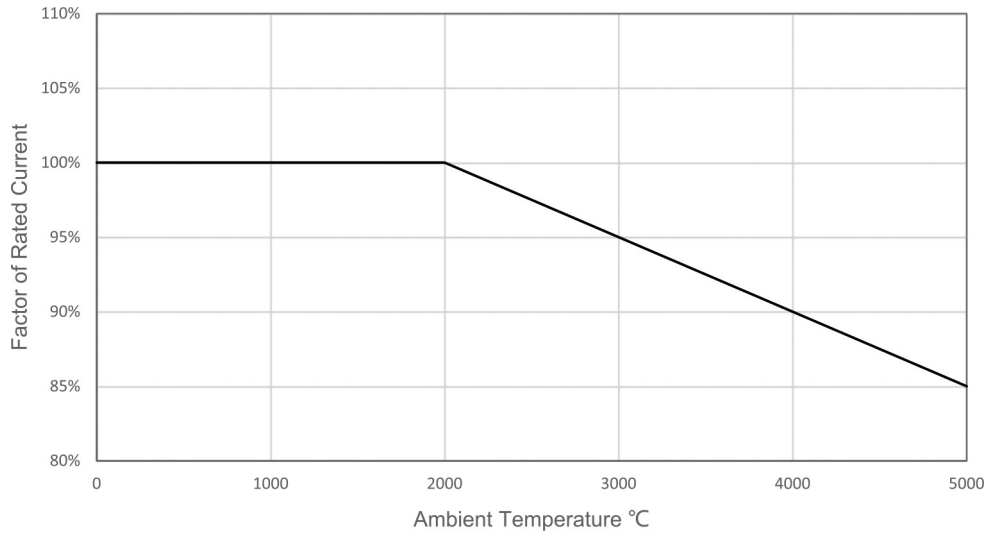


Temperature Derating Curve



Re-rating with High Altitude

The formula for calculating current load at high altitude: $I = I_n * (1 - (h-2000)/100*(0.5/100))$ h is altitude, less than 5000m.



Part Number Table

Description	Part Number
Automotive EV Fuse, 200A, 1000V DC	MP010937
Automotive EV Fuse, 250A, 1000V DC	MP010938
Automotive EV Fuse, 350A, 1000V DC	MP010939
Automotive EV Fuse, 400A, 1000V DC	MP010940
Automotive EV Fuse, 450A, 1000V DC	MP010941

Important Notice : This data sheet and its contents (the "Information") belong to the members of the AVNET group of companies (the "Group") or are licensed to it. No licence is granted for the use of it other than for information purposes in connection with the products to which it relates. No licence of any intellectual property rights is granted. The Information is subject to change without notice and replaces all data sheets previously supplied. The Information supplied is believed to be accurate but the Group assumes no responsibility for its accuracy or completeness, any error in or omission from it or for any use made of it. Users of this data sheet should check for themselves the Information and the suitability of the products for their purpose and not make any assumptions based on information included or omitted. Liability for loss or damage resulting from any reliance on the Information or use of it (including liability resulting from negligence or where the Group was aware of the possibility of such loss or damage arising) is excluded. This will not operate to limit or restrict the Group's liability for death or personal injury resulting from its negligence. Multicomp Pro is the registered trademark of Premier Farnell Limited 2019.