



# High-voltage reliable DC overcurrent protection in electric vehicle applications



Eaton's Bussmann™ series of xEV fuses offer a wide range of high voltage DC-rated overcurrent protection devices for electric vehicle power management.

## Product description

Eaton's Bussmann™ series of xEV fuses offer a wide range of high voltage (up to 1000 V) DC-rated overcurrent protection devices for electric vehicle power management. They are available in 6 mm, 10 mm, and 14 mm diameters. Many families have more compact or shorter lengths than standard footprints, providing higher power density without sacrificing performance or reliability. Eaton's xEV fuses are suited for PCB integration required for automotive power management and conversion systems. Automotive applications for Eaton's xEV fuses include onboard chargers, 3-phase EVSE and charging infrastructure, and onboard EV powertrain and distribution systems.

## Features and benefits

- More compact footprints compared to other 10- and 14-mm cartridge fuse diameters
- High voltage ratings within the 6, 10, and 14-mm diameters; up to 1000 V
- Multiple termination styles with cartridge, bolt down, and PCB
- Allows ease of integrating fuses in customer applications
- Provides an optimum balance of footprint, cost, and ratings

## Product specifications

Size	Voltage rating	Current rating	Maximum interrupting rating	Base fuse dimensions (Dia. x L)	Mounting options
6 mm	Up to 500 Vac/dc	15 to 40 A	20 kA @ 500 Vac/dc	6.3 x 32 mm	Axial leaded (4) PCB THT terminal options PCB clips, HVI in-line holder, and HVP, S-8000 panel mount holder
10 mm	Up to 500 Vac Up to 1000 Vdc	5 to 100 A	20 kA @ 500 Vdc 50 kA @ 1000 Vdc	10 x 25, 32 and 38 mm	PCB THT terminals Bolt down terminals PCB or bus bar clips
14 mm	Up to 420 Vac Up to 1000 Vdc	40 to 80 A	20 kA @ 500 Vdc 50 kA @ 1000 Vdc	14 x 38 mm	PCB THT terminals Bolt down terminals PCB or bus bar clips

Rated current	12	15	20	25	30	40	50	60	70	80
<b>450 Vdc</b>										
6 mm	X	X	X	X	X	X				
10 mm						X	X	X		
14 mm							X	X	X	X
<b>500 Vdc</b>										
6 mm	X	X	X	X	X					
10 mm	X	X	X	X	X	X	X			
14 mm							X	X	X	X
<b>750 to 800 Vdc</b>										
6 mm										
10 mm	X	X	X	X	X	X	X			
14 mm							X	X	X	X
<b>1000 Vdc</b>										
6 mm										
10 mm	X	X	X	X	X					
14 mm						X	X			

**Eaton**  
**Electronics Division**  
 1000 Eaton Boulevard  
 Cleveland, OH 44122  
 United States  
[Eaton.com/electronics](http://Eaton.com/electronics)

© 2023 Eaton  
 All Rights Reserved  
 Printed in USA  
 Publication No.  
 August 2023

Eaton is a registered trademark.

All other trademarks are property  
 of their respective owners.

Follow us on social media to get the  
 latest product and support information.

