# Protistor® size 2x122 aR

#### **SEMICONDUCTOR PROTECTION FUSES**

# SQUARE BODY HIGH-SPEED FUSE-LINKS DC PROTECTION



Mersen DC offers provide a very high performant protection for railway power and auxiliary circuits. Mersen DC Semiconductor fuse-links were developed to provide improved performance required by today's new DC equipment. These fuse-links are typically operated at more elevated temperature than other fuse type, have lower I²t to minimize damage to protected components on short circuits, lower watts loss and longer life.

#### TECHNICAL DATA OVERVIEW

	Voltage DC	2000 VDC
	Ampere Range (A)	500 800 A
	Speed/Characteristic	aR
	Product Size	2x122
	Package	1
	Weight	3.35 kg

#### **FEATURES & BENEFITS**

- Extremely fast acting
- Extremely current limiting
- Very low I<sup>2</sup>t
- Worldwide acceptability
- Superior cycling ability

#### **APPLICATIONS**

- Protection of inverters
- Protection of motor drives
- Protection of UPS systems
- Protection of similar 2000V or less equipments
- Railway power and auxiliary circuits

#### **STANDARDS**

• IEC 60269-4 compliance

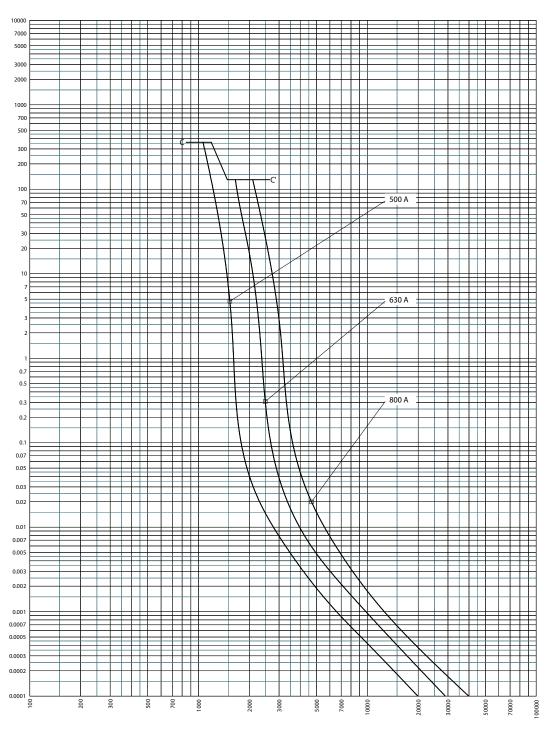
# PRODUCT RANGE

#### Size 2x122 SR 2000VDC

Catalog number	Item number	Rated voltage DC (IEC)	Rated current In	Rated breaking capacity DC	Max. total I²t @1600V for L/R=15ms	Max. total I <sup>2</sup> t @1600V for L/R=45ms	Power dissipation at In	Power dissipation at 0.8 In	Operating I <sup>2</sup> t at Rated Voltage	Package	Weight
D2122SD20C500QF	E076640	2000 V	500 A	100 kA	200000 A²s	348000 A²s	274 W	145 W	200000 A <sup>2</sup> s	1	3.35 kg
D2122SD20C630QF	F076641	2000 V	630 A	100 kA	468000 A²s	800000 A²s	314 W	155 W	468000 A²s	1	3.35 kg
D2122SD20C800QF	V096066	2000 V	800 A	100 kA	876000 A²s	1520000 A²s	367 W	182 W	876000 A <sup>2</sup> s	1	3.35 kg

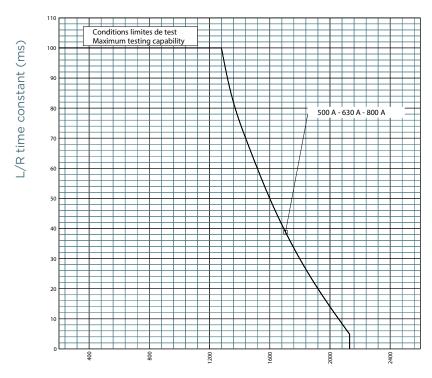
# TIME CURRENT CHARACTERISTIC CURVES

Pre-arcing time (s)



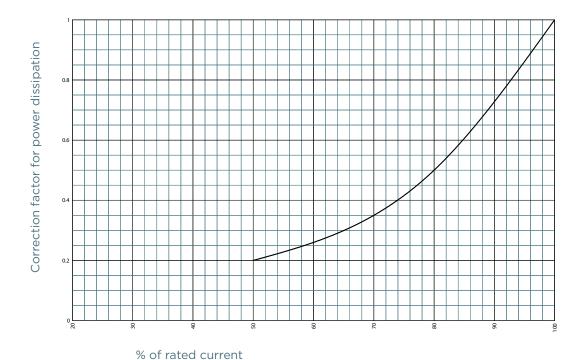
RMS value of pre-arcing/melting current (A) +- 8%

# L/R TIME CONSTANT VS DC VOLTAGE CAPABILITY

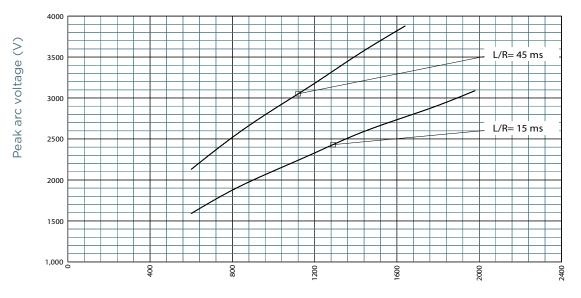


DC voltage capability (V)

# POWER DISSIPATION



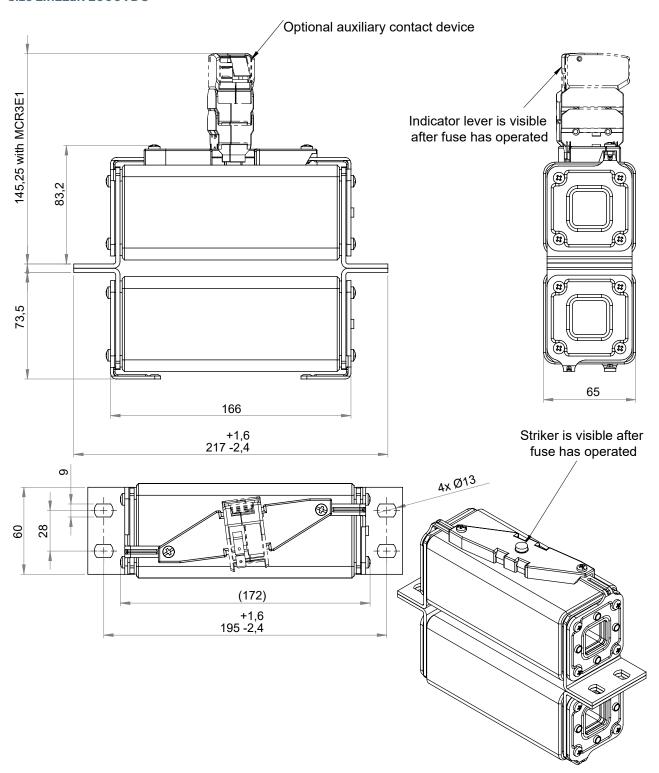
# PEAK ARC VOLTAGE



Applied DC voltage (V)

# **DIMENSIONS**

#### Size 2x122aR 2000VDC



Dimensions in mm