

# HVBD8 SERIES

**High Voltage Battery Disconnect** 

800A Continuous Duty / 1500VDC





# **APPLICATIONS**







Off-Road Vehicles



Electric







Mining

### **FEATURES**

## The Next Level in Battery Disconnect Technology

- **Robust Metal-Ceramic Hermetic Seal**
- Industry Leading Dielectric Withstand Voltage
- High Temperature Performance
- Ultra-Low Contact Resistance over Life
- . Ready for Harsh Environments

- Designed for OSHA compliant Lockout/Tagout (LOTO)
- **Optional Integrated Auxiliary Contacts**
- Patent Pending
- CE compliant
- Designed and Assembled in the USA

## PERFORMANCE

TABLE 1. SPECIFICATIONS			
CHARACTERISTIC	MEASURE		
Contact Arrangement	Form X, SPST		
Operating Voltage <sup>1</sup>	Up to 1500VDC (No Switching Under Load)		
Dielectric Withstand Voltage	5,375VDC, 1 minute		
Continuous Current <sup>2</sup>	800A continuous (350mm^2 Bus Bar)		
Overload Current <sup>2</sup>	See graphs on next page		
Make and Break <sup>1</sup> (400A @ 24VDC)	5,000 cycles		
Voltage Drop (Max at nominal load)	40mV		
Min Insulation Resistance	100Mohm		
Shock, 1/2 Sine, 11ms	25G		
Vibration, Sinusoidal (10-500Hz Peak)	4G		
Vibration, Sinusoidal (500Hz-2000Hz Peak)	20G		
Operating Temperature <sup>2</sup>	-55°C to 85°C		
Ingress Protection (Sealed Contacts)	Exceeds IP69, (Hermetically Sealed)		
Ingress Protection (Housing Feedthrough) <sup>3</sup>	IP67		
Weight	425g		
Case Material	PA GF		
Switch Lever Material	PA GF		
Mounting	100mm   C:C, 2X M8		
Mounting Position	Any		
Auxiliary Contacts	SPDT, 3A Continuous Duty		

<sup>&</sup>lt;sup>1</sup> The HVBD is designed to isolate at voltages up to 1500VDC. The HVBD is not intended for make/break switching above 100V. <sup>2</sup> 170°C max terminal temperature.

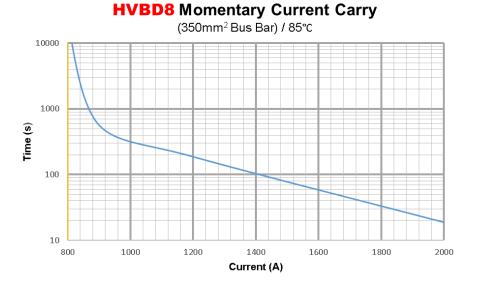
<sup>&</sup>lt;sup>3</sup> Gasket and or RTV required for feedthrough applications where IP67 is required at the housing flange mounting feature.



## **PERFORMANCE** (cont.)

#### **Application Notes**

- 170°C Max Terminal Temperature
- 350mm<sup>2</sup> Bus Bar
- Graphs provided for design reference; user to verify system temperatures

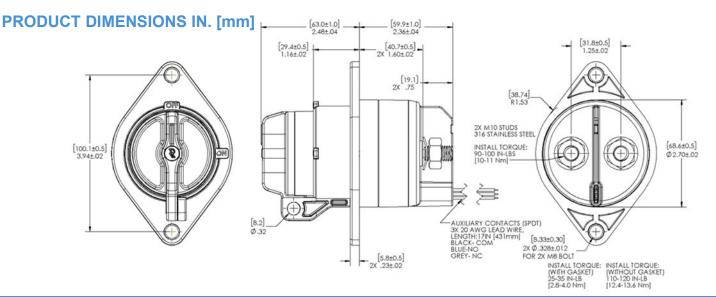


## **OPTIONS**

TABLE 2. PRODUCT NOMENCLATURE					
	CURRENT RATING	MOUNTING	AUXILIARY CONTACTS	HANDLE COLOR	
HVBD	<b>8</b> 800 Amp <b>A</b> 100 mm C:C	<b>1</b> 00 mm 0:0	A Included	R Red	
		X None	B Black		

#### **Optional SPDT auxiliary switch details**

- Main contacts close before auxiliary contacts when switching from OFF to ON
- Auxiliary contacts open before main contacts when switching from ON to OFF
- IP67 sealed
- Auxiliary contacts rated to (3A @ 12VDC 100k cycles)





# **AVAILABLE ACCESSORIES**

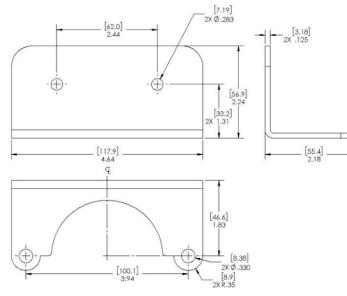
#### **LOTO Padlock**

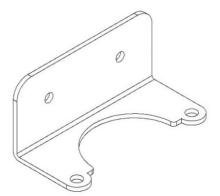
- Safe operation requires the use of an OSHA certified lockout/tagout (LOTO) padlock to ensure the switch remains in the off position
- Lockout Tagout Padlock Requirements:
  - Shackle DIA: 9/32"
  - Vertical Clearance: 3/4"
  - Horizontal Clearance: 5/8"
- Contact Rincon Power for OSHA certified lockout tagout padlock



#### **RP2099 Mounting Bracket**

Allows for 90-degree mounting

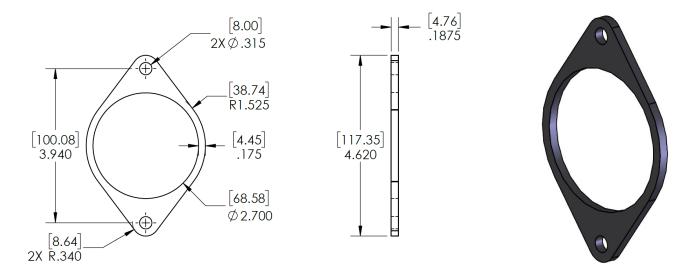






# AVAILABLE ACCESSORIES (cont.)

#### **RP2127 Mounting Gasket**



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