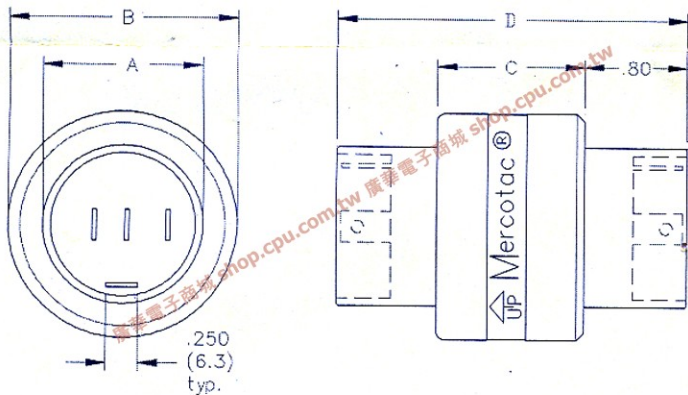


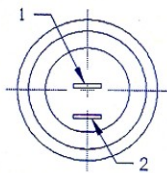


6196 Corte del Cedro #100  
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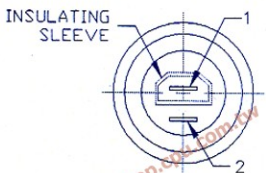
# HIGH VOLTAGE SERIES



MODEL	A	B	C	D
215-2K	.746(18.95)	1.246(31.65)	1.10(27.9)	2.69(68.3)
235				2.67(67.8)
335	.982(24.94)	1.573(39.95)	1.14(29.0)	2.72(69.1)
435	1.248(31.70)	1.770(44.96)		
±in(mm)	.002 (.05)		.01 (.25)	REF



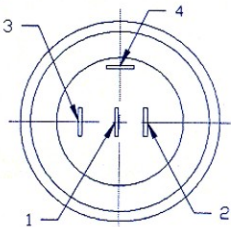
MODEL 235



MODEL 215-2K

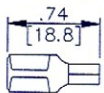


MODEL 335

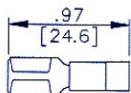


MODEL 435

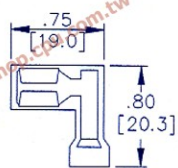
## CONTACT TAB ORIENTATION



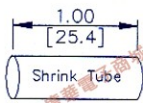
55252 (16-14awg)  
<552C2> (12-10awg)  
<552A2> (22-18awg)



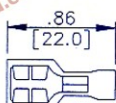
55250 (16-14awg)  
<55258> (12-10awg)  
<552A0> (22-18awg)



55251 (16-14awg)  
<55259> (12-10awg)  
<552A1> (22-18awg)



55253



552KA (22-18awg)  
<552KB> (14-16awg)  
{15amps Max. Current}

<OPTIONAL>

## AVAILABLE DISCONNECTS

## TECHNICAL SPECIFICATIONS

MODEL NUMBER:	215-2K	235	335	435
NUMBER OF CONDUCTORS	2	2	3	4
VOLTAGE RANGE (V) AC/DC	0-2000		0-500	
CURRENT RATING (AMPS)	2 @ 15	2 @ 30	3 @ 30	4 @ 30
MAXIMUM FREQUENCY RESPONSE (MHz)			100	
MERCURY CONTACT RESISTANCE			< 1 milliohm	
MAXIMUM ROTATING SPEED (RPM)	1200	1200	500	300
MAXIMUM BODY TEMPERATURE °C (°F)			60 (140)	
MINIMUM OPERATING TEMP. °C (°F)			-29 (-20)	
CIRCUIT SEPARATION (megOhm)			> 50	
TYPICAL ROTATION TORQUE NmX10 <sup>-4</sup> (gm·cm)	400	400	700	850

## ACCESSORIES

INSULATED DISCONNECT (18-22awg)	552A0		OPTIONAL	
INSULATED DISCONNECT (14-16awg)	55250			
INSULATED DISCONNECT (10-12awg)	55258		(2)	(3)
				(4)
UNINSULATED DISCONNECT (18-22awg)	552A2			OPTIONAL*
UNINSULATED DISCONNECT (14-16awg)	55252			OPTIONAL
UNINSULATED DISCONNECT (10-12awg)	552C2			OPTIONAL
SHRINK TUBE FOR UNINSULATED DISC.	55253			OPTIONAL
HIGH VOLT. INSULATED DISC. (18-22awg)	552KA	(4)		OPTIONAL **
HIGH VOLT. INSULATED DISC. (14-16awg)	552KB	(4)		OPTIONAL **
		OPTIONAL		OPTIONAL **
90° ANGLE INSULATED DISC. (18-22awg)	552A1			OPTIONAL
90° ANGLE INSULATED DISC. (14-16awg)	55251			OPTIONAL
90° ANGLE INSULATED DISC. (10-12awg)	55259		(2)	(3)
				(4)
				OPTIONAL *
RUBBER BOOT KIT FOR PROTECTION:	57235	57235	57335	57435

\* These optional disconnects may require additional clearance and slight bending of tabs.

\*\* Fully insulated High Voltage disconnects are limited to 15 amps of current.

**WARRANTY:** Units are guaranteed for one year from date of purchase against defective materials and workmanship. Replacement will be made except for defects caused by abnormal use or mishandling. All statements and technical information contained herein, or presented by the manufacturer or his representative are rendered in good faith. User must assume responsibility to determine suitability of the product for intended use. The manufacturer shall not be liable for any injury, loss or damage, direct or consequential arising out of the use, or attempt to use the product.

# SERVICE INSTRUCTIONS

Mercotac® connectors contain a small amount of liquid mercury and should be disposed of properly through recycling. Mercotac Inc. offers a recycling service for this purpose. When shipping spent units to Mercotac Inc., insert products into a plastic bag and package items being returned for UPS Ground shipment. Please state on paperwork "For Recycling", and identify shipments with company name and Phone / FAX numbers. (Do not send through USPS.)



1. Mercotac® connectors can be used both horizontally and vertically. However the "UP" arrow on the body of the connector should not point below horizontal. The connectors are reversible so they need not be installed upside down. It is preferable to store units upright (arrow up). <Fig 1>

2. The connector can be held or mounted by the body or plastic bushing, but was not designed to carry mechanical loads. One end should be allowed to float attached only by the connecting wires. In horizontal applications mount the connector with the body rotating to reduce mechanical loads on the bearing and internal components. **Never rigid mount both ends of the connector. This will cause connector failure.** Limit mounting eccentricity to .005" (.13mm). <Fig 2>

3. **Do not solder to the connector or bend tabs excessively as such misuse may cause connector failure and voids the warranty.**

4. Use stranded wires of ample length and flexibility to avoid mechanical loads. Avoid taut wires that pull on the connector. The wires should have enough free play to allow the connector end to rotate approximately ¼ turn. Wires, which allow too much free play, could wrap around the connector. Generally wires are strong enough to restrain the stationary end of the connector. A floating torque arm attached to the stationary bushing may be used if the wires are not adequate. <Fig 3>

5. Provide current protection (fuse) on wires attached to connector. Over-current conditions can cause failure of connector. **CAUTION:** The aluminum body may be electrically "hot" after failure. Disable power source before handling a suspected failed connector.

6. The push on terminals (right angle & straight) supplied with the modular connector series use an improved double wall barrel design vs. typical single wall barrel. The extra strength in the barrel improves electrical conductivity and wire grip. Some crimp tools do not have enough leverage to securely crimp this terminal which could cause poor connections. The shape of the crimp die also affects the quality of the crimp. A recommended crimp tool manufactured by Thomas & Betts is their model #WT112M. The model 215-2K incorporates insulation around the center pins to interface with the disconnects supplied. <Fig 4>

7. Vibration and mechanical shock will reduce service life or cause connector failure. Some installations may require a shock isolating mounting, such as rubber tubing. <Fig 5>

8. The connector contains plastic materials, which are sensitive to heat. Over-heating will cause reduced life or connector failure. Provide thermal insulation where necessary to prevent temperature of the unit from exceeding 140°F (60°C). <Fig 6>

9. **In food packaging applications:** Mercotac® connectors contain liquid mercury and other fluids. **Isolate connector from the food processing area by using a protective housing.** Short circuit failure at or in connection with a Mercotac® connector rarely but occasionally may result in leakage. The use of a protective housing may be advisable in these applications. <Fig 7>

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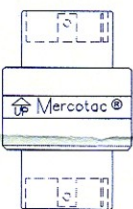


Fig 1

MODEL	BUSHING MOUNTING		BODY MOUNTING	
	A	B	A	B
215-2K 235	.748(19.00)		1.248(31.70)	
335	.984(25.00)	.80(20.3)	1.575(40.00)	.80(20.3)
435	1.250(31.75)		1.772(45.01)	

Fig 2 Mounting Dimensions

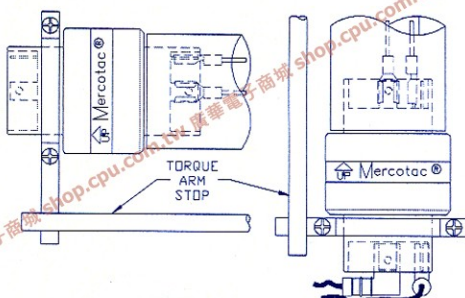
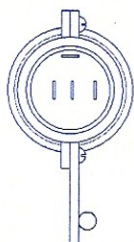
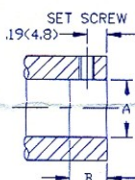


Fig 3 Floating Torque Arm Examples



Fig 4 Model 215-2K Insulated Center Pin

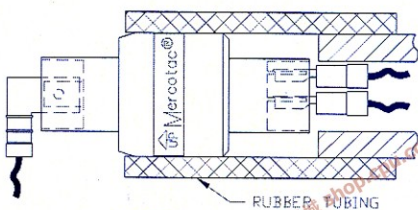


Fig 5 Vibration Isolation

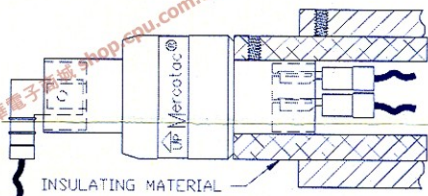


Fig 6 Thermal Insulation

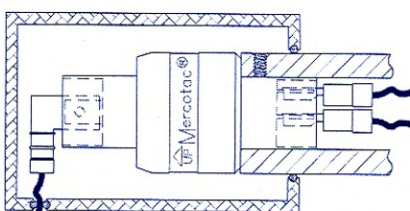


Fig 7 Protective Housing