

# **EBC Connectors**

E32 Female DIN 43589-1

An IDEAL Company

Anderson Power Products' family of Euro Battery Connectors (EBC) exceeds all the requirements of DIN 43589-1 and EN 1175-1. The connector design incorporates an innovative, cost effective contact carrier for ease of assembly.

The connectors have a Degree of Protection of IP23 per IEC 60529. The acid resistance and temperature range of the PBT-PC housing exceeds the requirements of EN 1175-1. Contacts are pure copper with silver plate for maximum conductivity.

All materials meet RoHS requirements and are selected to ensure years of reliable service under adverse battery environments.

#### **Features**

# Sturdy Advanced Polymer Housings

PBT-PC alloy housings provides superior resistance to acids and temperature extremes

# • DIN 43589-1 Voltage Keying

Dry-cell, wet-cell & universal keying plugs coded for 24/36/48/72/80 & 96 volts DC

#### Mating Compatibility with Connectors of Other Manufacturers

APP "E" series connectors offer dimensional compatibility for air tube and auxiliary contacts over and above the DIN 43589-1 compatibility of housings and main contacts



#### Silver Plated Pure Copper Contacts

For lowest voltage drop and superior performance

# **SPECIFICATIONS**

Electrical		Mechanical			
Current Rating (Amperes) *		Life			
UL	340	a. No Load (mating cycles)	>5000		
EN1175-1:1998	300	b. Under Load (Hot Plug 5 mating cycles @96V)	800A		
CSA	260				
Voltage Rating		Average Mating / Unmating Force (lbf)	12		
UL / CSA	600	(N)	53		
EN1175-1:1998	150	Degree of Protection	IP23		
Wire Range		Acid Resistence	1.38g / cm³		
- Power Contacts - AWG (mm²)	#1/0 to 4/0 (50 / 95)	Contact Retention - minimum (lbf)	100		
- Auxiliary Contacts - AWG (mm²)	#12 to #10 (4 / 6)	(N)	445		
Dielectric Withstanding Voltage (AC)	2,200	Air Tube Rating	2 bar		
Average Contact Resistance (micro-ohms)	30	-			
Operating Temperature (°C)	-25° to 75°	Materials			
(°F) -13° to 167°		Housing	PBT/PC blend		
		Contacts	Copper alloy, silver plate		
		Hardware	Steel, zinc chromate plate		

<sup>\*</sup> Current derating curves must be observed as current capacity will vary dependent on wire cross section and ambient temperature. Maximum current carrying capacity is measured at 40°C / 104°F using the maximum wire cross section permissible, crimped to contacts using APP recommended tooling.

# ORDERING INFORMATION

Col	nne	ctor Pa	rt Numbe Main	er S	elec	tic	On Coding	Α	uxiliary Contacts			
Series		Gender	Contact		Handle		Key	&	& Air Tubes		Packaging	
E32 <sup>3</sup>	**	5	50	-	1		0		2		9	
5 5	Socke	et								9	Individual	
1 00	00 None - Order Separately						0	None	8	Bulk		
50 5	) 50 mm² / #1/0 AWG					1	1 (2) Lower Auxiliary Contacts					
70 7	70 mr	n² / #2/0 AW	G					2	(2) Upper Auxiliary Conta	cts		
95 9	5 95 mm² / #3/0 AWG					4	4 (2) Lower Auxiliary Contacts &					
0 1	No			0	Grey, Wet Cell		(2) Upper Auxiliary Contacts					
1 E	Black					2	Green, Dry Cell	5	Air Tube			
						3	Yellow, Universal	6	Air Tube & (2) Upper Aux	liary	Contacts	

#### **Accessories**

Part	
Number	Description
E320-21	Twin air tube
E16-89	Handle kit - low profile
E32-89	Handle kit - high profile
A320LP-MK	Latch plate for mating side
A320HL-MK	Handle with latch & hardware
994G4	Manual release bracket & handle
993G4	Manual release mounting plate
	for mating half

<sup>\*\*</sup> A supplemental auxiliary holder will ship with each pair of contacts.

# E32 Female DIN 43589-1

# **ORDERING INFORMATION**

#### **Tooling**

Part

Number Description

1387G3 Hydraulic tool for power contacts

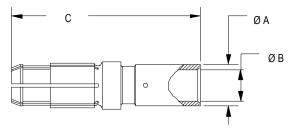
E160-36 Extraction tool

Note: For tooling die information, see tooling chart on website

#### **DIMENSIONS**

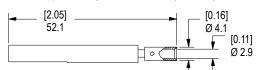
#### **Socket Contact**

Part - Wire -		- Øi	۹-	- Ø	В-	- C -		
Number	mm²	AWG	mm	in.	mm	in.	mm	in.
320-1150	50	#1/0	14.5	0.57	11.0	0.43	64.5	2.54
320-1170	70	#2/0	17.0	0.67	13.0	0.51	64.5	2.54
320-1195	95	#3/0	19.8	0.78	15.0	0.59	70.5	2.78



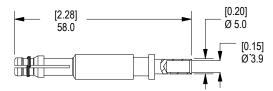
# **Upper Auxiliary Contact**

E320-35 upper auxiliary contact for 4 mm² (#12 AWG)

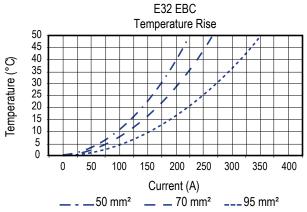


#### **Lower Auxiliary Contact**

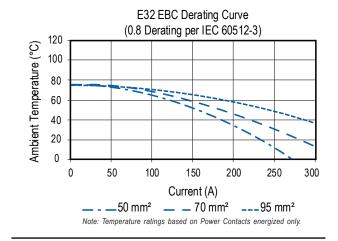
160-13 lower auxiliary contact for 6 mm² (#10 AWG)



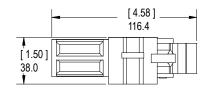
# TEMPERATURE CHARTS



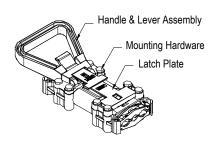
Note: Temperature ratings based on Power Contacts energized only.



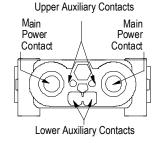
#### **Housing Side View**



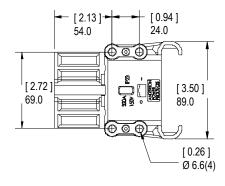
#### Handle / Lever Assembly / Latch



#### **Housing Front View**



# **Housing Top View**





All Data Subject To Change Without Notice

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