

EA31 Non-Spring Return Two Position Rotary Actuator



The Model EA31 actuator is a non-spring return gear driven crankshaft actuator for two position operation of dampers, valves or other equipment that doesn't require return to normal position upon power interruption. The hardened steel crankshaft is driven through a train of precision hobbled gears. The actuator is driven by a shaded pole motor that is completely submerged in oil and sealed in an aluminum case to assure long life and minimum maintenance. The gear train of the EA31 crank actuator is also sealed in oil. Working in conjunction with primary loop controllers, these power units are ideal for ON-OFF control of valves and dampers. The EA31 travel time is 30 seconds and its shaft rotation is a unidirectional 180° clockwise stroke from 0-180° or clockwise from 180-0°.

The Model EA31-00000-00-0-00 is UL/CSA listed. All other models are UL/cUL listed. It is compatible with the VB-7000 and VB-9000 valves in this catalog.

Ordering codes

Model Series	Base Model	Reserved	Options	Volts/Freq
EA	31	00		

Reserved	Logo/Label	Specials
000		00

Options	Volts/Frequency	Specials
00 None	0 120Vac, 60Hz	00 None
01 Two auxiliary SPDT switches	3 240Vac, 60Hz	
02 Four auxiliary SPDT switches	5 24Vac, 60Hz	
37 NEMA 4 cover		
	Logo/Label	
	0 Barber-Colman	
	E Eurotherm	

Features

- non-spring return two position operation
- 220 in-lbs torque – 30 sec travel
- oil immersed motor and gear train
- optional NEMA 4
- compatible with VB series valves

Specifications

Control action:

3 Wire, from SPDT switch, ON-OFF

Torque:

220 in-lbs., 30 sec travel

Shaft rotation:

Unidirectional clockwise 180 deg

Dimensions:

7"H x 5-3/8"W x 6-5/16"D

Weight:

8lbs.

Case:

Die cast aluminum with two 1/2" conduit knockouts on each side

Temperature:

-40 to 136°F (-40 to 58° C)

Humidity:

5 to 95% RH, non-condensing

Mounting:

Damper – any position

Valve – upright with EA31 above centerline of valve body. Allow 6" clearance above wiring-compartment.

Auxiliary switch:

SPDT adjustable, factory set to make or break at mid-stroke