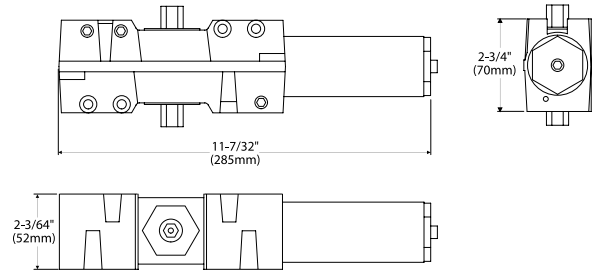


# EXTRA HEAVY DUTY DOOR CLOSER DC9016

## ANSI/BHMA Grade 1



### SPECIFICATIONS

<b>Adjustable Power Size</b>	1 Thru 6 meets ADA Barrier-Free requirements
<b>Body</b>	Cast Iron body
<b>Design</b>	Rack-and-Pinion
<b>Valves</b>	Separate and independent latch, sweep, and back-check pressure valves
<b>Handing</b>	Non-Handed
<b>Cover</b>	Plastic full cover standard
<b>Piston</b>	Tri-packed 38mm (1-1/2") diameter
<b>Pinion Shaft</b>	45/64" (18mm) diameter
<b>Projection</b>	2-9/32" (58mm), with full cover

### CODE COMPLIANCE



ANSI/BHMA A156.4 Grade 1 Closer  
 ANSI A117.1 ADA Accessibility  
 UL Listed for ANSI/UL10B and UL10C,  
 CAN/ULC S104 up to 3 Hours  
 UL 228 UBC Standard 7-2 (1997) NFPA 252  
 NFPA 80 National Fire Protection - Fire Door Assembly  
 NFPA101 National Fire Protection - Life Safety  
 ANSI/BHMA A156.18 Finishes

### STANDARD FINISHES

- AL Aluminum Painted
- DU Duro/Dark Bronze Painted
- 19G Graphite Black

*For additional finish options not listed, contact Sales Department for MOQ and lead times*

## FEATURES

### Cast Iron Body

Closer bodies are constructed of high grade cast iron designed for high traffic conditions

### Rack & Pinion Operation

Provides a smooth constant control of the door through its full opening and closing cycle. 180° door swing can be achieved when door, frame, and/or arm do not interfere

### Non-Handed

DC9016 door closer is non-handed and can be installed on either right or left hand swing doors

### Sweep Speed Control Valve

Allows adjustment of door speed from the door's full open position down to approximately 10° from the closed position

### Latch Speed Control Valve

Allows adjustment of door latch speed from approximately 10° down to the door's fully closed position

### Tri-Packed

DC90 Series closers are packed with self-tapping (SRT), sex nuts & bolts (SNB) and a parallel arm (PA) bracket to allow for regular, top jamb, and parallel arm installations

### Adjustable Back-Check Valve

Provides control of the door in the opening cycle, beginning at approximately 75° of door opening. It cushions the door opening when the door is forcibly opened beyond its preadjusted setting

### Standard Molded Cover

Molded from high impact material  
Covers are non-handed for all applications

### Multi-Sized Door Closer

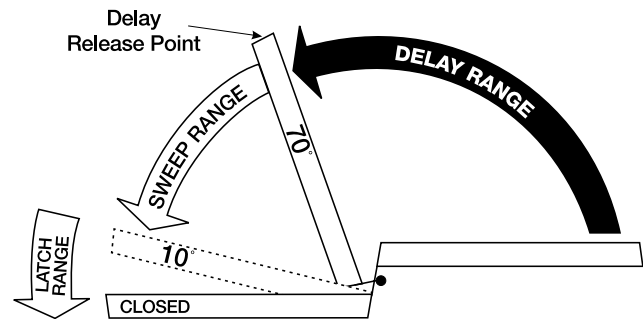
Ships as size 3 but easily adjustable through power range from 1 through 6. DC9016 Door Closer also conforms to the opening force requirements of the ADA and ANSI/BHMA standard A117.1 for interior doors

## OPTIONAL FUNCTIONS

### Delayed Action Closing

An optional hydraulic adjustable feature adds a third speed (DA) range to the closing cycle. This feature becomes effective when the door is opened and released at any point beyond 70°. The amount of time delay depends upon the angle of door release and valve adjustment. The valve can be adjusted with 4mm hex key (provided) from no delay time up to maximum delay times of:

Door opened	Approximate Time of Delay Cycle
180°	4~5 minutes
120°	2~3 minutes
90°	25~30 seconds



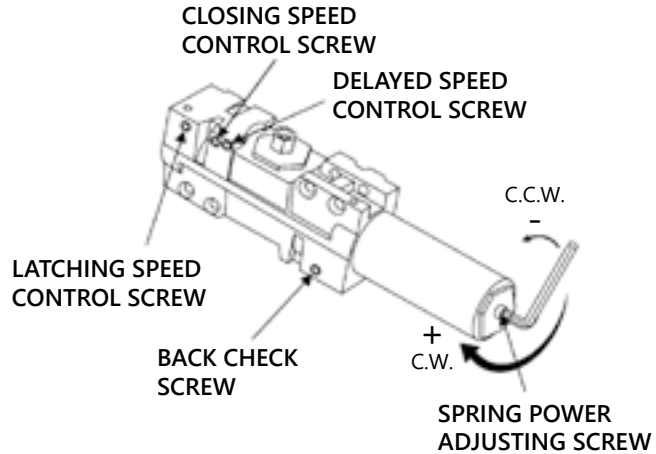
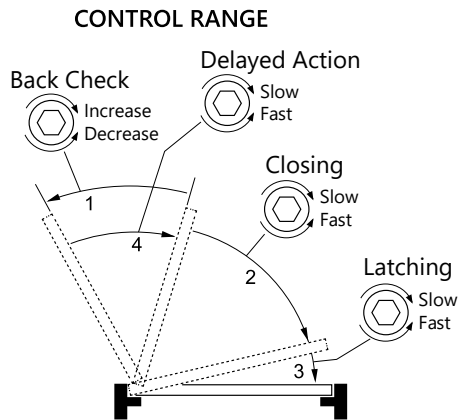
### Suggested Applications

Delayed Action closing allows slow-moving traffic to clear the opening before the door closer's "normal" closing cycle begins. Healthcare, Hospitals and Nursing Home facilities all use this feature because it allows sufficient time for persons in beds, wheelchairs or on crutches to pass through an opening without concern of the door closing on them. Delayed Action Closers can also accommodate openings for food service carts, hand trucks, and pallet jacks

### Pressure Relief Safety Valve

The (DA) hydraulic system contains a pressure relief valve. Any time the door is forced toward the closed direction while it is in the closing cycle, the valve will open and allow the door to close. This prevents damage to closer, arm, frame and door

APPLICATION CHART



Door Closer Size	Full Turns of Power-adjusting Screw*	Maximum Door Width		Applicable Door Weight
		Exterior (Swing out)	Interior	
1	-7	28" (0.71m)	32" (0.81m)	33~66 lbs (15~30kg)
2	-4	32" (0.81m)	36" (0.91m)	66~99 lbs (30~45kg)
3	0 (Preset)	36" (0.91m)	42" (1.07m)	99~143 lb (45~55kg)
4	+5	42" (1.07m)	48" (1.22m)	143~187 lbs (65~85kg)
5	+10	48" (1.22m)	54" (1.37m)	187~264 lbs (85~120kg)
6	+15	54"(1.37m)	58" (1.47m)	264~330 lbs (120~150kg)

**CLOCKWISE FOR POSITIVE NUMBERS (+)**



**COUNTER-CLOCKWISE FOR NEGATIVE NUMBERS (-)**



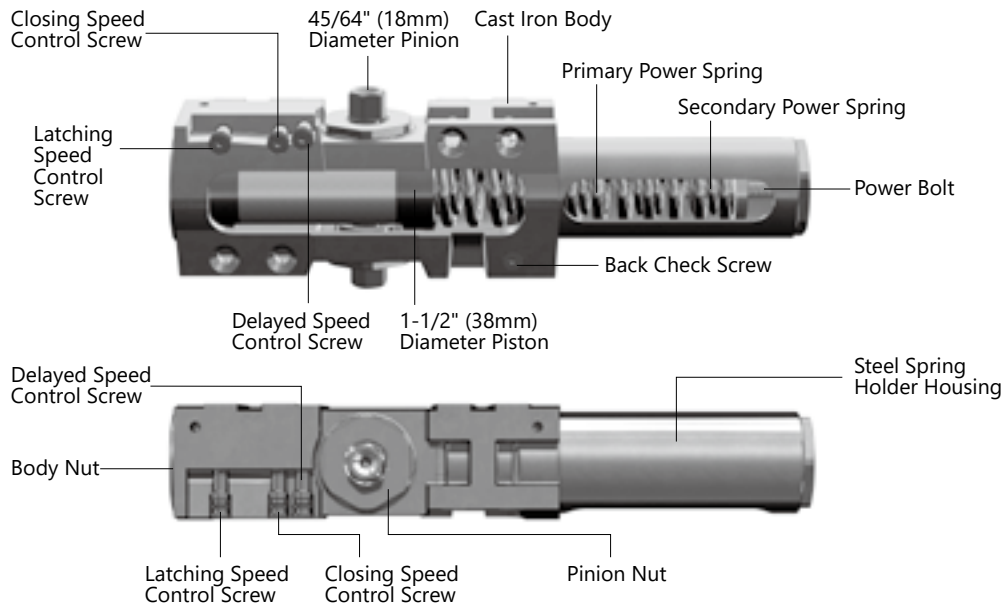
The closing force for DC9016 series door closers is adjustable from size 1 to size 6, as outlined in ANSI Standard A156.4. When these series of door closers are installed and adjusted to confirm to ADA reduced opening force requirements (5 lbs max.) for interior doors, they may not have adequate closing force to reliably close and latch door. Power adjustments charted on this page are recommended where possible to ensure proper door control

**CAUTION!!**

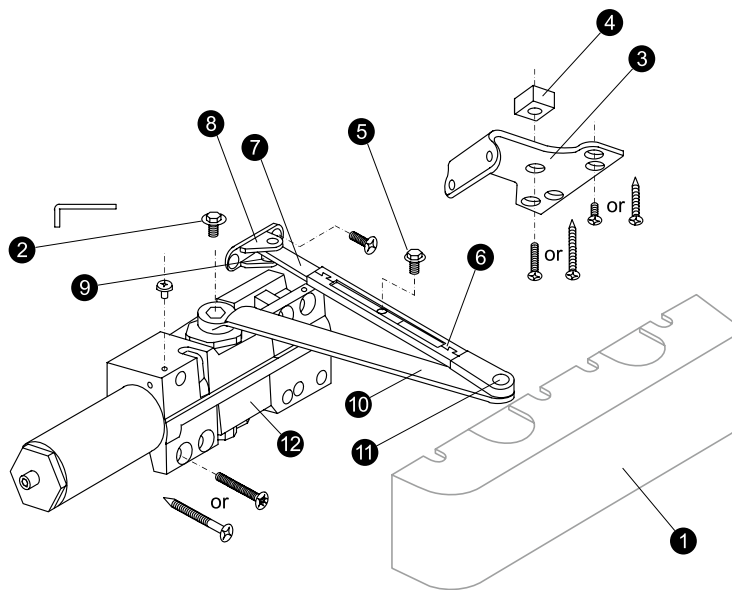
Turns required are approximate because of various door conditions and locations. You may have to further adjust spring tension to suit your requirements

# DC9016 DOOR CLOSER

## CUTAWAY VIEW



## EXPLODED DIAGRAM

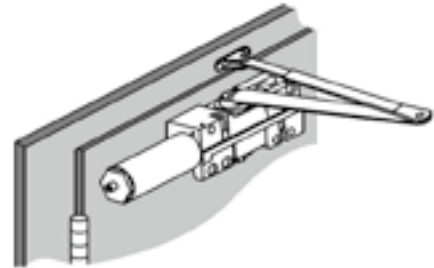
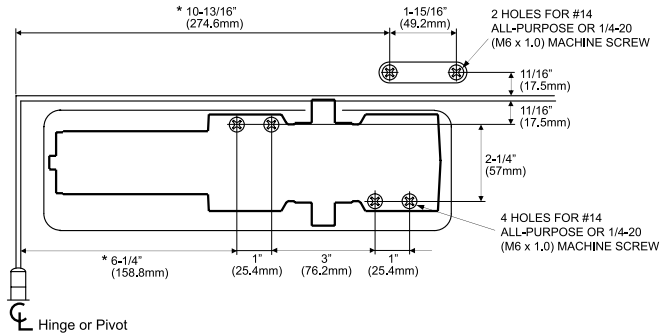


1. Cover
2. Pinion Arm Screw
3. Parallel Arm Bracket
4. Parallel Bracket Spacer Block
5. Adjustable Arm Screw
6. Adjustable Arm Sleeve
7. Adjustable Arm
8. Regular Shoe Plate
9. Bushing
10. Main Arm
11. Arm Pin
12. Closer Body

MOUNTING DIAGRAMS

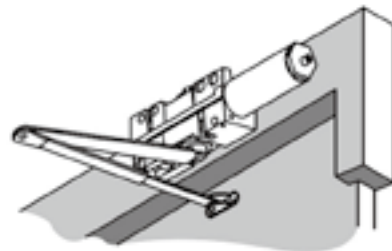
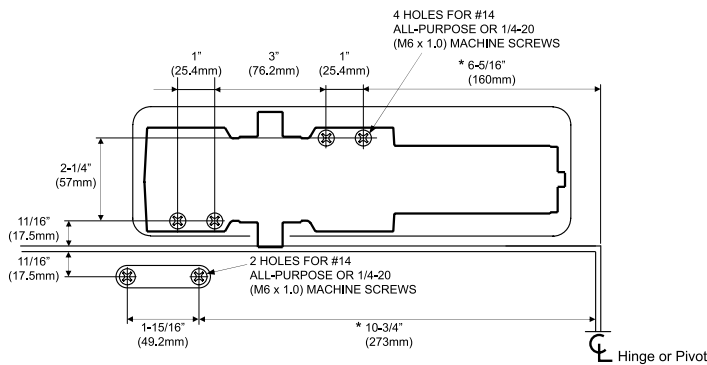
**Regular Mounting (Pull Side)**

Regular arm is the most common and strongest mounting option. Usually the closer is mounted on the door and the arm is mounted on the frame



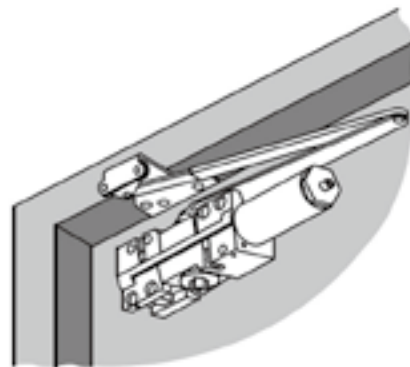
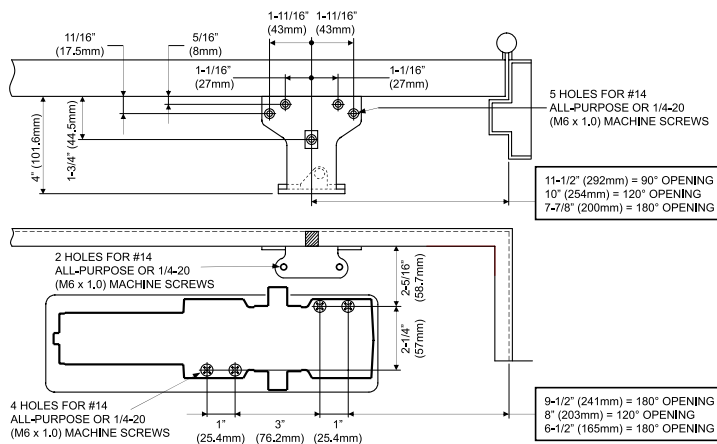
**Top Jamb Mounting (Push Side)**

Closer body is mounted to the frame with the arm straight out. Ideal for exterior door installations. You must consider frame depth reveal. Extended arm may be required



**Parallel Arm Mounting (Push Side)**

Closer body on door with parallel bracket on stop of frame. Arm is parallel to the door and does not stick out. Parallel arm installations have 25% less power than regular pull side mounting





### STANDARD ARMS

#### Regular / Parallel Arm with bracket

Regular non-handed arm with adjustable slider can be used for a wide range of frame conditions and can be mounted to hinge (pull) side, top jamb

For parallel arm, use parallel arm bracket to mount on stop of frame on other (push) side of the door. Frame should be reinforced for parallel arm bracket

### OPTIONAL ARMS

#### DC9016HO

##### Hold Open Arm



Non-handed arm with adjustable round slide arm for a wide range of frame conditions. Open to desired range, then tighten screw and lock nut: the door will hold in that position every time until changed. For parallel mount use parallel arm bracket

#### DC9016HCUSH

##### Hold Open Cush Arm



Non-handed heavy duty forged arm with cush stop and hold open parallel arm mount. Handle controls the hold open function. Must use frame reinforcement in stop to mount

#### DC9016EDA

##### Extra Heavy Duty Arm



Non-handed parallel arm features forged, solid steel main arm and forearm for high traffic installation

#### DC9016CUSH

##### Cush Arm



Non-handed heavy duty forged arm with cush stop, parallel arm mount. Must use frame reinforcement in stop to mount

#### DC9016ST

##### Sliding Track

Single lever (track) arm with a surface mounted closer designed for interior use on narrow head frames and top rails. Offers three mounting positions: Pull Side, Push Side, and Top Jamb

#### DC9016STH

##### Sliding Track Hold Open Arm



The Hold-Open options allows for hold-open points at 85°, 90°, 95°, 100°, 105° or 110° depending on clip location in track

OPTIONAL DROP PLATES – NARROW TOP RAIL

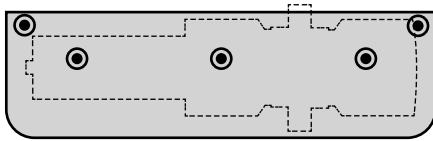
For use on doors with glass where the drop plates cover the back of the closer

Also used when top rail is narrow and prevents the closer from being mounted to a surface of wood or metal

Correct installation will permit 180° maximum opening. Please see Drop Plate Installation Guide for detailed instructions.

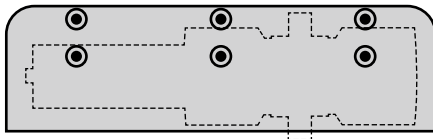
**DCDP90P1:**

Drop Plate for DC9016 Series Door Closer, Pull Side Mount



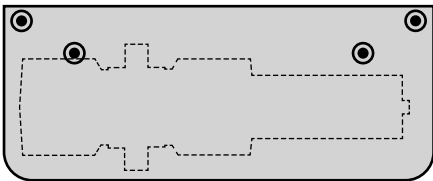
**DCDP90P2:**

Drop Plate for DC9016 Series Door Closer, Top Jamb Mount, Flush Ceiling



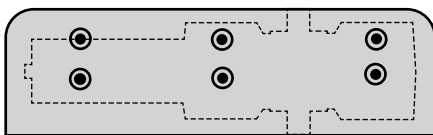
**DCDP90P3:**

Drop Plate for DC9016 Series Door Closer, Parallel Arm Mount



**DCDP90P4:**

Drop Plate for DC9016 Series Door Closer, Top Jamb Mount



COVER OPTIONS

**DCCV90F**

Plastic Full Cover



**DCCV90FSS**

Stainless Steel Cover



PARALLEL ARM BRACKET

**DCBK90**

Parallel Arm Bracket



FIXING PACKS

**DCFP90**

Standard self-tapping screws (SRT) for Closer body and parallel arm bracket




**DCFPSNB**

Standard sex nuts and bolts (SNB) fixing pack



## HOW TO ORDER

### Stocked DC90 Door Closer

Product	Power Size	Function	Finish
<b>DC90</b> ①	<b>16</b> ②	<b>DA</b> ③	<b>AL</b> ④
<b>PRODUCT</b>	<b>POWER SIZE</b>		<b>FUNCTION</b>
 DC90 Series	1-6		Blank Door Closer with Sleeve Arm, Plastic Full Cover (Standard) DA Door Closer with Delayed Action HO Door Closer with Friction Hold Open CUSH Door Closer with Cush Arm HCUSH Door Closer with Hold Open Cush Arm EDA Door Closer with Extra Duty Arm HEDA Door Closer with Hold Open Extra Duty Arm ST Door Closer with Slide Track Arm* STH Door Closer with Slide Track Hold Open Arm*
<b>4 FINISH</b>			
AL 28 Aluminum Painted DU 20 Duro/Dark Bronze Painted 19G Graphite Black			

\*Slide track arm is only available for AL finish

### ACCESSORY PRODUCT IDENTIFICATION

Item No.	Description
<b>DCCV90F</b>	Plastic Full Cover for DC90 Series Door Closer
<b>DCCV90FSS</b>	Stainless Steel Cover for DC90 Series Door Closer
<b>DCAM90HO</b>	Friction Hold Open Arm for DC90 Series Door Closer
<b>DCAM90CUSH</b>	Cush Arm for DC90 Series Door Closer
<b>DCAM90HCUSH</b>	Hold Open Cush Arm for DC90 Series Door Closer
<b>DCAM90EDA</b>	Extra Heavy Duty Arm for DC90 Series Door Closer
<b>DCAM90HEDA</b>	Hold Open Extra Duty Arm for DC90 Series Door Closer
<b>DCAM90ST</b>	Slide Track Arm for DC90 Series Door Closer
<b>DCAM90STH</b>	Slide Track Hold Open Arm for DC90 Series Door Closer
<b>DCDP90P1</b>	Drop Plate for DC90 Series Door Closer, Pull Side Mount
<b>DCDP90P2</b>	Drop Plate for DC90 Series Door Closer, Top Jamb Mount, Flush Ceiling
<b>DCDP90P3</b>	Drop Plate for DC90 Series Door Closer, Parallel Arm Mount
<b>DCDP90P4</b>	Drop Plate for DC90 Series Door Closer, Top Jamb Mount