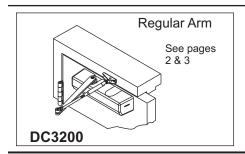
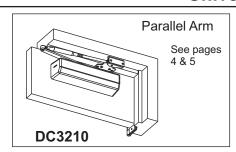
### DC3200 Series Multi-Sized 1 thru 6

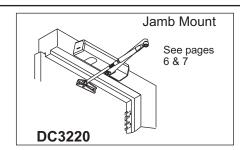


# **ASSA ABLOY**

### **Universal Door Closers**







### **IMPORTANT:**

- An improperly installed or incorrectly adjusted door closer may cause property damage or personal injury; and will void product warranty.
- To avoid personal injury, DO NOT DISASSEMBLE THIS DOOR CLOSER BODY.
- Door closers must be securely fastened to a properly reinforced door and frame with fasteners provided.
- Door closers with the "A1" HOLD OPEN ARM option are not permitted to be installed in fire door assemblies.

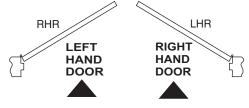
## **BEFORE INSTALLING:**



- The Americans with Disabilities Act (ADA) requires that doors having door closers have an opening force not to exceed 5 lbf. for interior doors, 8.5 lbf exterior doors. Use standard templating for regular arm and parallel arm applications. Jamb mounted applications use the template for 140° door opening to achieve the required opening force.
- The door closer's power size adjustment feature may require adjustment to its lowest setting to comply with ADA opening force guidelines.
- ADA compliant closers are: DC3200, DC3210, DC3220

Size of Door & Door Closer					
Type of Installation	Interior	Exterior In-swinging	Exterior Out-swinging	Recommended Closer Size	**Max. Opening Force Ibs/f
Regular & Top Jamb	2'4" 3'0" 3'6" 4'0" 4'6" 5'0"	2'6" 3'0" 3'6" *4'0"	3'0" 3'6" 4'0" *4'6"	1 2 3 4 5	8 14 16 22 24 26
Parallel Arm	2'4" 2'6" 3'0" 3'6" 4'0" 4'6"		2'6" 3'0" *3'6" *4'0"	1 2 3 4 5 6	8 14 16 22 24 26

# TO DETERMINE HAND OF YOUR DOOR:



<sup>\*\*</sup>NOTE: These forces are for standard templating with bearing type hinges and do not account for pressure differentials and draft.

### Installation Instructions

## **Regular Arm Application** DC3200 Series

## 1. Template

(191)

Mark Door and Jamb (for closer bracket and arm bracket) If top rail is 2-1/2" (64mm) or greater, use template FM131C provided.

If top rail is 1-3/4" (44mm) to 2-7/16 (62mm), see MOUNTING DIMENSIONS chart.



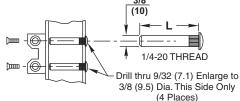
(44mm)

& OVER

Regular Arm

	top ran 10 1 0/1 ( 1 1111111) to 2 1/10 (02111111	,, 000 moon moon moo	O I TO OI IGIT.				
	*10-5/8	2-1/4	MOUNTING	DIMENSI	ONS	MIN. CLE	
(	HINGE OR PIVOT (270)	(57.2)	TOP RAIL	Α	В	DOOR	
- 1	<u> </u>	—— <del>                                   </del>			_	NHO	НО
	FRAME LINE B	ABMARRASIGET	2-1/2" & OVER	1"	7/8"	1-1/2"	1-11/16"
4		ARM BRACKET—	(64mm)	(25.4mm)	(23mm	) (39mm)	(43mm)
	4.5/46		1-3/4" MIN.	5/8 <b>"</b>	1-1/4"	1-7/8	2-1/16"
l	<b>△</b> 4-5/16 (109.5) □	TOP OF DOOR	(44mm)	(16mm)	(32mm		(53mm)
	(25.4)			DOOR		SEX NUT	
		<del>- •  </del>		THICKNES	s I	LENGTH "L"	
ľ				1-3/8" (35r	nm) 1-9	9/32 <sup>"</sup> (33mm)	

\* To obtain extra closing force add 3" (77mm) to dimensions marked. This will limit degree of door opening to 110°.



1-21/32" (42mm)

#### NOTES:

- Check hand of door, see page 1.
- Right Hand Application Shown. Left Hand Opposite.
- Dimensions given in inches (mm). Do Not Scale Drawing.
- Closer must be installed in a true horizontal plane to ensure proper closer performance.
- Door opening (up to 180°) is dependent upon door, frame, wall and hinge/pivot conditions permitting.

### MOUNTING SCREW SPECIFICATIONS

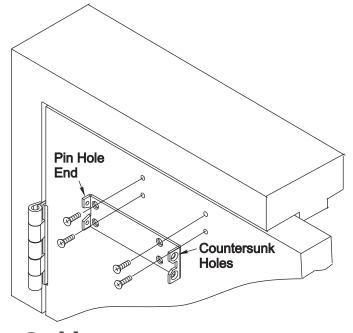
ARM AND CLOSER BRACKET

**CLOSER BRACKET** 

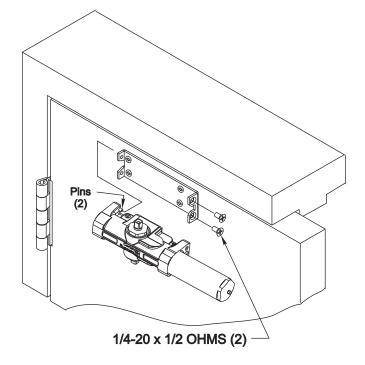
1/4-20 oval head machine screw or 1/4-14 self-drilling screw Type BSD. 3/16 (4.8) diameter pilot hole required for Wood Applications.

Option M54: Sex nuts, furnished when ordered

# 2. Install Closer Bracket



# 3. Mount Closer Body to Closer Bracket

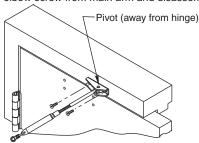


# **Regular Arm Application (Continued)**

# 4a. Attach Arm Bracket to Frame

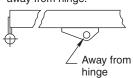
**NON-HOLD OPEN ARM ONLY:** 

Remove elbow screw from main arm and disassemble arm.



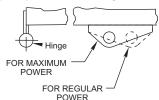
### **Standard Position**

Normal mounting position. Position with pivot point away from hinge.



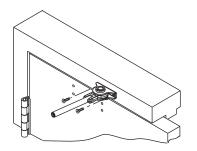
## For Additional 15% Closing Force

Reposition arm mounting bracket so that pivot point is toward hinge.



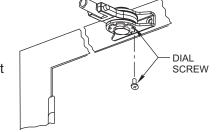
# 4b. Attach Arm Bracket to Frame HOLD OPEN ARM (A1 OPTION ONLY):

Remove elbow screw from main arm and disassemble arm.



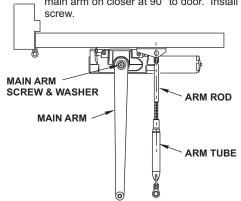
### **HOLD OPEN ARM:**

Position so that dial screw is on UNDERSIDE of bracket



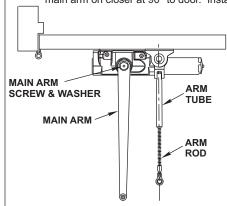
# 5a. Position Arm on Closer NON-HOLD OPEN ARM ONLY:

Remove elbow screw from main arm and disassemble arm. Place main arm on closer at 90° to door. Install and tighten main arm screw



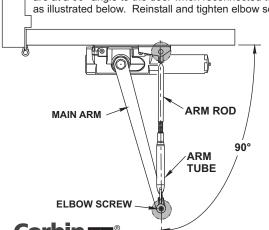
# 5b. Position Arm on Closer HOLD OPEN ARM ONLY:

Remove elbow screw from main arm and disassemble arm. Place main arm on closer at 90° to door. Install and tighten main arm screw.



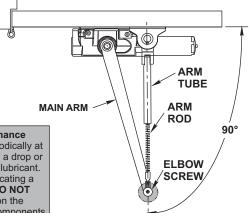
# 6a. Preload and Adjust Arm NON-HOLD OPEN ARM ONLY:

With door closed, adjust length of Arm Rod and Arm Tube until they are at a 90° angle to the door when reconnected to the Main Arm, as illustrated below. Reinstall and tighten elbow screw.



# 6b. Preload and Adjust Arm HOLD OPEN ARM ONLY:

With door closed, adjust length of Arm Rod and Arm Tube until they are at a  $90^{\circ}$  angle to the door when reconnected to the Main Arm, as illustrated below. Reinstall and tighten elbow screw.



### Extended Maintenance

Lubricate Arm periodically at shaded points with a drop or two of appropriate lubricant. NOTE: When lubricating a Hold Open Arm, DO NOT use any lubricant on the Holding Surface components

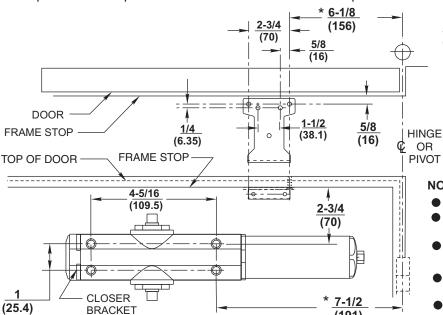
For Adjustments See Page 8

### Installation Instructions

## **Parallel Arm Application** DC3210 Series

# 1. Template

Mark Door and Jamb (for closer bracket and adapter plate) Use template FM131C provided or use dimensions in this template.



 Check hand of door, see page 1. Right Hand Application Shown. Left Hand

**ADAPTER** 

**PLATE** 

SPACER BLOCK

(When required)

NOTES:

Opposite. Dimensions given in inches (mm). Do Not Scale Drawing.

FRAME

5/8

(16)

DOOR

Closer must be installed in a true horizontal plane to ensure proper closer performance.

Door opening (up to 180°) is dependent upon door, frame, wall and hinge/pivot conditions permitting.

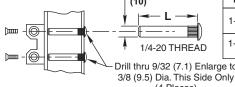
MOUNTING SCREW SPECIFICATIONS

This will limit degree of door opening to 110°.

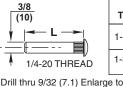
ARM AND CLOSER BRACKET 1/4-20 oval head machine screw or 1/4-14 self-drilling screw Type BSD

Option M54: Sex nuts, furnished when ordered

\* To obtain extra closing force add 3" (77mm) to dimensions marked.



(191)

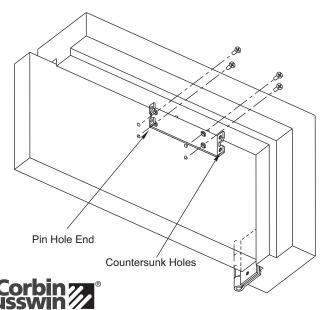


(4 Places)

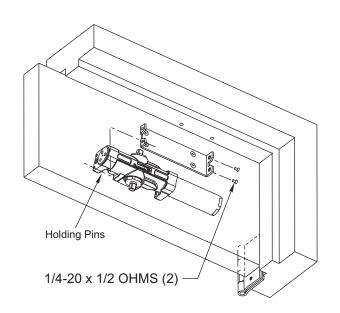
DOOR THICKNESS	SEX NUT LENGTH "L"		
1-3/8 <sup>"</sup> (35mm)	1-9/32 <sup>"</sup> (33mm)		
1-3/4" (44mm) & OVER	1-21/32 <sup>"</sup> (42mm)		

Parallel Arm

# 2. Install Closer Bracket

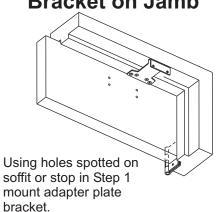


# 3. Mount Closer Body to Closer Bracket



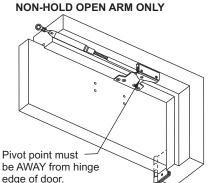
# **Parallel Arm Application (Continued)**

# 4. Mount Adapter Plate Bracket on Jamb

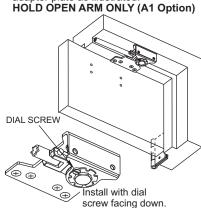


## 5. Mount Arm Bracket

Remove elbow screw from main arm and disassemble arm. Fasten arm bracket to adapter plate as illustrated.



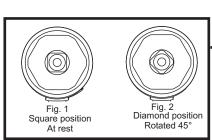
Remove elbow screw from main arm and disassemble arm. Fasten arm bracket to adapter plate as illustrated.

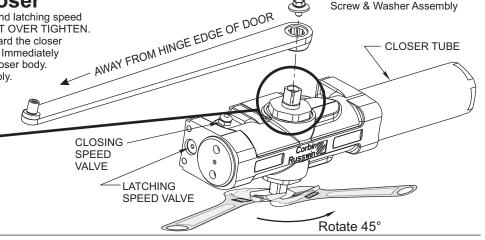


5/16 Hex Head

## 6. Position Arm onto Closer

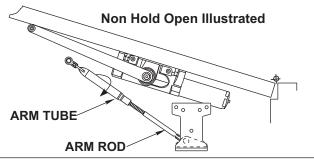
Using hex wrench provided, turn closing speed and latching speed valves clockwise until completely closed. DO NOT OVER TIGHTEN. Using wrench, turn under side of spindle 45° toward the closer tube until it reaches the diamond position (fig. 2). Immediately place arm on spindle so that it is parallel to the closer body. Install and tighten arm screw and washer assembly.





## 7. Connect and Position Arms

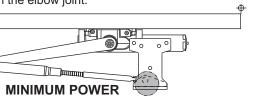
With door closed, adjust length of Arm Rod and Arm Tube so the arm forms a "V" when reconnected to the Main Arm, as illustrated below. Reinstall and tighten elbow screw.



# Hold Open Illustrated MAIN ARM ARM

# 8. Power Adjustment

To increase the power of the closer, re-adjust the arm so it is nearer the door. To decrease power, re-adjust the arm so it is farther away from the door and then secure screw in the elbow joint.



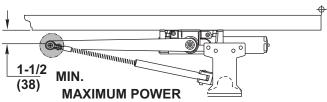
### Extended Maintenance

Lubricate Arm periodically at shaded points with a drop or two of appropriate lubricant.

ARM

**TUBE** 

**NOTE:** When lubricating a Hold Open Arm, **DO NOT** use any lubricant on the Holding Surface components.



ASSA ABLOY

3-0

For Adjustments See Page 8

**ROD** 

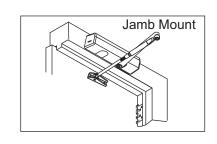
MAX

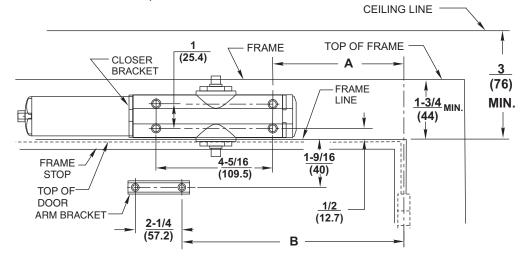
### Installation Instructions

# Jamb Mount Application DC3220 Series

# 1. Template

Mark Door and Jamb (for closer bracket and arm bracket) use dimensions in template below.





OPENING MAXIMUM	Α	В	HINGE CONDITION	
110°	8-7/8 (225)	13-3/8 (340)		
140°	7-3/8 (187)	11-7/8 (302)	Butts, Offset Pivots, and Swing Clear	
180°	5-7/8 (149)	10-3/8 (264)	Hinges	
140°	7-3/8 (187)	11-7/8 (302)	* CENTER HUNG	

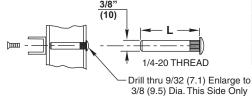
Dimensions "A" and "B" are taken from centerline of hinge as shown and apply to pivot point of swing clear hinges. Offset and centerhung pivots.

\*Must be single acting door.

### **MOUNTING SCREW SPECIFICATIONS**

ARM AND CLOSER BRACKET 1/4-20 oval head machine screw or 1/4-14 self-drilling screw Type BSD



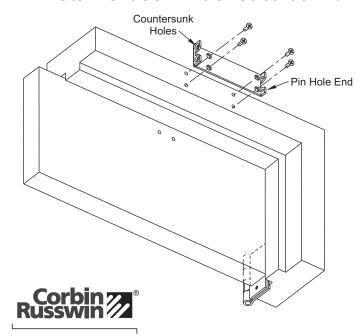


DOOR THICKNESS	SEX NUT LENGTH "L"		
1-3/8 <sup>"</sup> (35mm)	1-9/32 <sup>"</sup> (33mm)		
1-3/4" (44mm) & OVER	1-21/32 <sup>"</sup> (42mm)		

### NOTES:

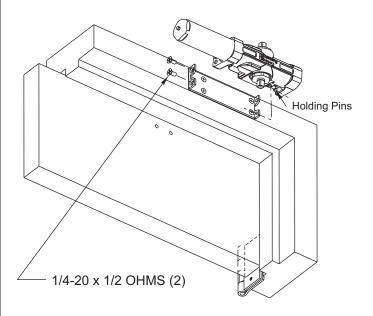
- Check hand of door, see page 1.
- Right Hand Application Shown. Left Hand Opposite.
- Dimensions given in inches (mm). Do Not Scale Drawing.
- Closer must be installed in a true horizontal plane to ensure proper closer performance.
- All degrees of door opening are dependent upon door, frame, wall and hinge/pivot conditions permitting.

## 2. Install Closer Bracket to Jamb



# 3. Mount Closer Body to Closer Bracket

(4 Places)

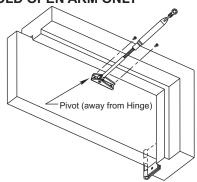


## **Jamb Mount Application (continued)**

### 4a. Attach Arm Bracket to Door

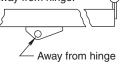
Remove elbow screw from main arm and disassemble arm. Attach Arm Bracket to door as shown.

### NON-HOLD OPEN ARM ONLY



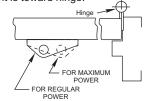
### **Standard Position**

Normal mounting position. Position with pivot point away from hinge.



# For Additional 15% Closing Force

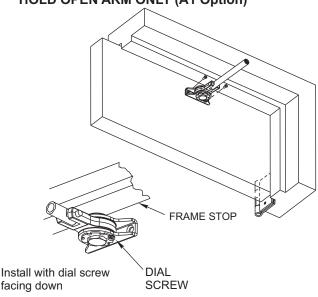
Reposition arm mounting bracket so that pivot point is toward hinge.



### 4b. Attach Arm Bracket to Door

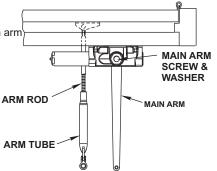
Remove elbow screw from main arm and disassemble arm. Attach Arm Bracket to door as shown.

**HOLD OPEN ARM ONLY (A1 Option)** 



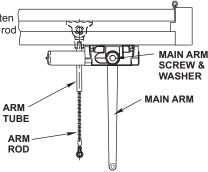
### 5a. Position Arm on Closer NON-HOLD OPEN ARM ONLY:

Place main arm on closer at 90° to frame. Install and tighten main arm screw.



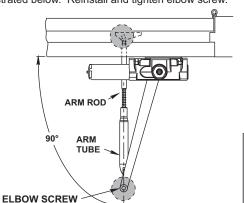
# **5b. Position Arm on Closer** HOLD OPEN ARM ONLY (A1 Option):

Place main arm on closer at 90° to frame. Install and tighten main arm screw. Thread the rod into the Arm Tube as shown.



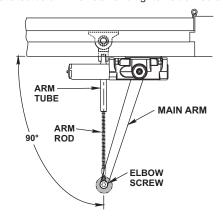
# 6a. Preload and Adjust Arm NON-HOLD OPEN ARM ONLY:

With door closed, adjust length of Arm Rod and Arm Tube until they are at a 90° angle to the door when reconnected to the Main Arm, as illustrated below. Reinstall and tighten elbow screw.



# 6b. Preload and Adjust Arm HOLD OPEN ARM ONLY (A1 Option):

With door closed, adjust length of Arm Rod and Arm Tube until they are at a 90° angle to the door when reconnected to the Main Arm, as illustrated below. Reinstall and tighten elbow screw.



### **Extended Maintenance**

Lubricate Arm periodically at shaded points with a drop or two of appropriate lubricant. **NOTE:** When lubricating a Hold Open Arm, **DO NOT** use any lubricant on the Holding Surface components.



assa abloy

For Adjustments See Page 8

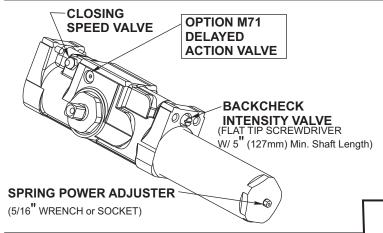
### **Spring Power Adjustment**

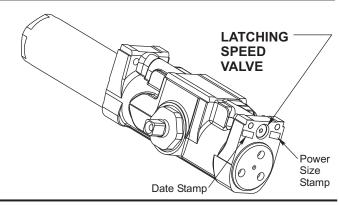
Locate spring power adjuster from Illustration below DC3200 Size 1 thru 6 Adjustment See Chart

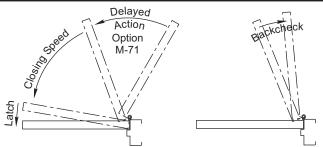
### DC3200 SPRING POWER ADJUSTMENT CHART

- All DC3200 closers are factory set at an approximate Size 3.
- Adjust closer as necessary for door size using this chart.
- Readjustment may be required to suit prevailing conditions.

	Size of D	No. of Full	Equivalent		
Interior	Exterior In Swing	Exterior Out Swing	(360°) Turns Clockwise of Power Adjuster	Closer Size (Approx.)	
2 <sup>'</sup> 4 <sup>''</sup> (712)	2 <b>'</b> 6" (764)		4	2	
2 <sup>'</sup> 6 <sup>''</sup> (764)	3 <b>'</b> 0" (915)		8	3	
3 <sup>'</sup> 0 <sup>''</sup> (915)	3 <b>'</b> 6" (1067)	2'6" (764)	12	4	
3 <sup>'</sup> 6 <sup>''</sup> (1067)	4 <b>'</b> 0" (1219)	3 <b>'</b> 0" (915)	16	5	







### Closing Speed Valve(3/32 Allen Wrench Provided)

To adjust speed of door closing from fully open to a position 2" to 5" from closed, turn Closing Speed Valve CLOCKWISE to SLOW closing, COUNTER-CLOCKWISE to SPEED closing.

### Latching Speed Valve3/32 Allen Wrench Provided)

After closing speed has been obtained, turn latching speed valve CLOCKWISE to SLOW latching or COUNTER-CLOCKWISE to SPEED latching for last 2" to 5" of door travel.

NOTE: Set combination of CLOSING and LATCHING speeds to between 3 and 7 seconds. Use of door by handicapped, elderly or small children may require even greater closing time.

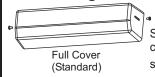
### **Delayed Action Valve**(3/32 Allen Wrench Provided)

Turn valve CLOCKWISE to SLOW closing, COUNTER-CLOCKWISE to SPEED closing. Delayed action may be adjusted from 20 seconds to 90 seconds, depending on degree of door swing. Delay occurs at the beginning of the door closing cycle from fully open down to 70°, where the closing speed valve then begins its control.

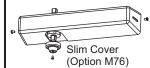
### **Backcheck Intensity Valve**

Turn valve COUNTER-CLOCKWISE to reduce backcheck or CLOCKWISE to increase backcheck. (Backcheck should be set to give a soft cushioning action, not a sudden stop.)

### **Installing Cover**



Slip cover over closer. Hold tightly against closer mounting surface. Secure on each side with 6-32 x 1/4" PBHMS screws.



Slim Cover Option M76 only Position spindle cap over unused spindle and secure with truss head screw.

### To Adjust Hold Open (A1 Option)

Open the door to desired position and tighten the hold open screw firmly (For RH application, turn screw on underside CLOCKWISE. For LH application, turn screw COUNTER-CLOCKWISE.) Place the hold open dial over the hex head of the bracket screw so that one of the slots in the dial is directly over small screw hole tapped in bracket. Seat the dial tightly over the bracket. INSERT DIAL SCREW AND TIGHTEN SECURELY.

