DOOR CLOSER
D-4550 AND D-4551
INSTALLATION INSTRUCTIONS

SELECT PROPER APPLICATION FROM ILLUSTRATIONS BELOW. THEN FOLLOW INSTALLATION INSTRUCTIONS ON GIVEN PAGE.

STANDARD APPLICATION
PARALLEL ARM APPLICATION
TOP JAMB APPLICATION
TRACK RAIL APPLICATION

CLOSER MOUNTED ON HINGE SIDE OF DOOR
CLOSER MOUNTED ON STOP BOX OF DOOR
CLOSER MOUNTED ON FRAME ON STOP SIDE OF DOOR
CLOSER MOUNTED ON HINGE SIDE OF DOOR WITH TRACK-RAIL ON FRAME

USE PAGE 2
USE PAGE 3
USE PAGE 4
USE PAGE 5

ADJUST SPRING POWER ACCORDING TO CHART
FOR STANDARD, PARALLEL ARM, AND TOP JAMB APPLICATIONS

REFER PAGE 6 FOR TRACK RAIL APPLICATION

ADJUST SPRING POWER FOR DOOR WIDTH AS INDICATED IN CHART. TO INCREASE CLOSING POWER, TURN SPRING ADJUSTING NUT CLOCKWISE. MAXIMUM ADJUSTMENT IS APPROXIMATELY 21 Turns.

SPRING ADJUSTING NUT

FINAL ADJUSTMENT AND REGULATING PROCEDURES

REGULATING DOOR SPEED AND LATCHING SPEED

TURN SOCKET SCREW CLOCKWISE TO SLOW DOWN—OR COUNTER—CLOCKWISE TO SPEED UP DOOR MOVEMENT.

1/8" HEX SOCKET WRENCH

THIS VALVE CONTROLS LATCHING SPEED

ADJUSTING FOOT FOR ADDITIONAL CLOSING POWER

LESS POWER
MORE POWER

STANDARD POSITION

REGULATING BACKCHECK

THE INTENSITY OF BACKCHECK ACTION IS REGULATED BY VALVE SHOWN. TURN CLOCKWISE TO INCREASE—OR COUNTERCLOCKWISE TO DECREASE CHECKING.

CAUTION: SET VALVE FOR A SLIGHT CUSHIONING EFFECT. IT IS DAMAGING TO THE CLOSER IF THE CHECKING ACTION IS TOO ABRUPT. BACKCHECK SHOULD NEVER BE USED IN LIEU OF A DOOR STOP.

THIS VALVE CONTROLS BACKCHECK

FOR MODELS HAVING “DELAYED ACTION”


1/8" HEX SOCKET WRENCH

THIS VALVE CONTROLS DELAYED ACTION. TURN SOCKET SCREW CLOCKWISE TO SLOW DOWN OR COUNTER CLOCKWISE TO SPEED UP DOOR MOVEMENT.
### INSTALLATION INSTRUCTIONS

#### STANDARD APPLICATION

**CLOSER MOUNTED ON HINGE SIDE OF DOOR**

![Diagram of closer mounted on hinge side of door]

**DIMENSION**

<table>
<thead>
<tr>
<th>MAXIMUM DOOR OPENING</th>
<th>120°</th>
<th>180°</th>
</tr>
</thead>
<tbody>
<tr>
<td>A</td>
<td>11-5/8&quot;</td>
<td>9-5/8&quot;</td>
</tr>
<tr>
<td>B</td>
<td>8-1/2&quot;</td>
<td>6-1/2&quot;</td>
</tr>
</tbody>
</table>

1. **MARK LOCATION OF ATTACHING SCREWS ON DOOR AND FRAME AS SHOWN ABOVE.**
2. **ATTACH CLOSER TO DOOR WITH SHORT END OF CLOSER FACING TOWARD HINGE.**

**A**

**B**

**C**

**D**

**E**

**F**

**INSTALL COVER, AS FOLLOWS:**

- **ALIGN COVER OPENINGS WITH THE CLOSER SPINDLE, AND SNAP ENDS OF COVER INTO POSITION OVER CLOSER**
- **INSERT IS REMOVABLE PLACE IN UNUSED OPENING**

**NOTE:** FOOT MAY BE ADJUSTED FOR ADDITIONAL CLOSING POWER. (SEE PAGE 1.)

**POSITION OF MAIN ARM WHEN ASSEMBLING TO SPINDLE**

**INDEX MARK ON SPINDLE**

**MAIN ARM**

**ROD RIGHT ANGLE**

**FRAME**

**LEFT HAND DOOR**

**RIGHT HAND DOOR**

**Hinge Side of Door**

**Stop Side**

**Right Hand Door**

**Hinge Side**

**Left Hand Door**

**3-13/16"**

**1-3/4"**

**13-1/32"**

**9"**

**1-7/8"**

**2-7/16"**
1. Mark locations of attaching screws on door and frame as shown above.

2. Attach closer to door and foot bracket to frame (short end of closer toward hinge).

A

ASSEMBLE MAIN ARM TO CLOSER WITH INDEX MARK ON END OF SPINDLE 45° FROM AXIS OF ARM, AS ILLUSTRATED BELOW, USING A WRENCH ON THE BOTTOM SPINDLE TO ROTATE SPINDLE INTO POSITION. ATTACH ARM TO SPINDLE WITH WASHER AND SCREW.

B

INDEX MARK ON SPINDLE

LEFT HAND DOOR

MAIN ARM

LOCKNUT

ROD

FOOT BRACKET

INDEX MARK ON SPINDLE

RIGHT HAND DOOR

LOCKNUT

ROD

FOOT BRACKET

C

IF FOOT ASSEMBLY SHOWN ON PAGE 2 IS PACKED WITH CLOSER, CONVERT TO FOOT BRACKET ASSEMBLY ShOWN ABOVE AS FOLLOWS: REMOVE ROD ASSEMBLY FROM FOOT AND ATTACH ROD TO FOOT BRACKET USING WASHER AND SCREW SHOWN. TIGHTEN LOCKNUT SECURELY WHEN END OF MAIN ARM IS POSITIONED 1-1/2" AWAY FROM DOOR.

D

ADJUST AND REGULATE DOOR CLOSER AS DIRECTED AT PAGE 1.

E

INSTALL COVER AS FOLLOWS:

ALIGN COVER OPENINGS WITH THE CLOSER SPINDLE, AND SNAP ENDS OF COVER INTO POSITION OVER CLOSER

INSERT IS REMOVABLE PLACE IN UNUSED OPENING
1. MARK LOCATION OF ATTACHING SCREWS ON DOOR AND FRAME AS SHOWN ABOVE.

2. ATTACH CLOSER TO FRAME WITH SHORT END OF CLOSER FACING TOWARD HINGE.

ATTACH FOOT TO DOOR WITH PIVOT AWAY FROM HINGE AS ILLUSTRATED BELOW.

NOTE: FOOT MAY BE ADJUSTED FOR CLOSING POWER. (SEE PAGE 1.)

ADJUST AND REGULATE DOOR CLOSER AS DIRECTED AT PAGE 1.

INSTALL COVER AS Printer AS FOLLOWS:

ALIGN COVER OPENINGS WITH THE CLOSER SPINDLE, AND SNAP ENDS OF COVER INTO POSITION OVER CLOSER.
**INSTALLATION INSTRUCTIONS**

**TRACK RAIL APPLICATION**

**CLOSER MOUNTED ON HINGE SIDE OF DOOR WITH TRACK RAIL ON FRAME**

**RIGHT HAND DOOR ILLUSTRATED. SAME DIMENSIONS APPLY FOR LEFT HAND DOOR — MEASURED FROM HINGE C.**

**STOP SIDE**

**HINGE SIDE**

**LEFT HAND DOOR**

**HOLD OPEN DEVICE**

<table>
<thead>
<tr>
<th>Hold Open Angle</th>
<th>106°</th>
<th>86°</th>
<th>80°</th>
</tr>
</thead>
</table>

**G. OF HINGE PIVOT**

**1-3/4"**

**21-1/2"**

**20-1/4"**

**6 - #12-24 MACHINE SCREW OR #12 TAPPING SCREW**

**A**

**ASSEMBLE MAIN ARM TO CLOSER 45° AWAY FROM DOOR AS ILLUSTRATED BELOW. ATTACH ARM WITH WASHER AND SCREW. ATTACH CLOSER TO DOOR WITH SHORT END OF CLOSER FACING TOWARD HINGE.**

**B**

**INSERT SLIDER OF ARM INSIDE TRACK RAIL AS ILLUSTRATED BELOW.**

**C**

**ASSEMBLE END CAPS ON BOTH ENDS OF TRACK RAIL. ATTACH TRACK RAIL ON FRAME WITH SCREW.**

**D**

**ADJUST AND REGULATE DOOR CLOSER AS DIRECTED AT PAGE 1**

**E**

**INSTALL COVER, AS FOLLOWS:**

**ALOUD COVER OPENING WITH TRACK RAIL SPINDLE AND TAMP ENDS OF COVER INTO POSITION OVER CLOSER.**

**INSERT IS REMOVABLE PLACE IN UNDERSIZED OPENING.**

**ADJUST SPRING POWER ACCORDING TO CHART FOR TRACK RAIL APPLICATION**

<table>
<thead>
<tr>
<th>Closer Size</th>
<th>Max. Door Width</th>
<th>Turns of Spring Adjusting Nut</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>Exterior</td>
<td>Interior</td>
</tr>
<tr>
<td>1</td>
<td>less than 2'6&quot;</td>
<td>2' - 8&quot;</td>
</tr>
<tr>
<td>2</td>
<td>less than 2'6&quot;</td>
<td>2' - 8&quot;</td>
</tr>
<tr>
<td>3</td>
<td>3' - 6&quot;</td>
<td>3' - 2&quot;</td>
</tr>
<tr>
<td>4</td>
<td>3' - 6&quot;</td>
<td>3' - 8&quot;</td>
</tr>
</tbody>
</table>

* D-4550T Identical closer can be used as Standard, Parallel Arm, and Top Jamb Application. Spring power is adjustable, as indicated in chart.
**Installation Instructions**

**Heavy Duty Parallel Arm Application**

**Closer Mounted on Stop Side of Door**

*Left Hand Door Illustrated. Same Dimensions Apply for Right Hand Door—Measured from Hinge C.*

<table>
<thead>
<tr>
<th>Dimension</th>
<th>Hold-Open Angle for Hold-Open Models</th>
<th>Stop Angle for with Stop Models</th>
<th>Max Opening Angle for Without Stop Models</th>
</tr>
</thead>
<tbody>
<tr>
<td>A B</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>11-1/8&quot;</td>
<td>95°</td>
<td>85°</td>
<td>95° Note</td>
</tr>
<tr>
<td>10-1/2&quot;</td>
<td>90°</td>
<td>90°</td>
<td>100° Note</td>
</tr>
<tr>
<td>9-3/8&quot;</td>
<td>100°</td>
<td>100°</td>
<td>120° Note</td>
</tr>
<tr>
<td>8-1/4&quot;</td>
<td>110°</td>
<td>110°</td>
<td>160° Note</td>
</tr>
<tr>
<td>6-5/8&quot;</td>
<td>133°</td>
<td>133°</td>
<td>180° Note</td>
</tr>
</tbody>
</table>

*Note: A supplemental door stop is always recommended for installations not incorporating a stop in the closer arm. Damage to the door, frame and closer may occur if no stop is used.

**A**

1. Mark locations of attaching screws on door and frame as shown above.
2. Attach closer to door and foot bracket to frame (short end of closer toward hinge).

**B**

Assemble main arm to closer with index mark on end of spindle 45° from axis of arm, as illustrated below, using a wrench on the bottom spindle to rotate spindle into position. Attach arm to spindle with washer and screw.

**C**

Mount closer on door and mount parallel bracket to frame stop as per template.

**D**

Adjust and regulate door closer as directed on page 1 for speed, latching action, backcheck, and delayed action. Caution: backcheck is essential to prevent arm from striking arm stop with impact.

**E**

Install cover as follows:

Align cover openings with the closer spindle, and snap ends of cover into position over closer.

For hold-open arm: a quarter turn on the control handle will engage or disengage the hold-open function.

*Exceed Your Expectations™*