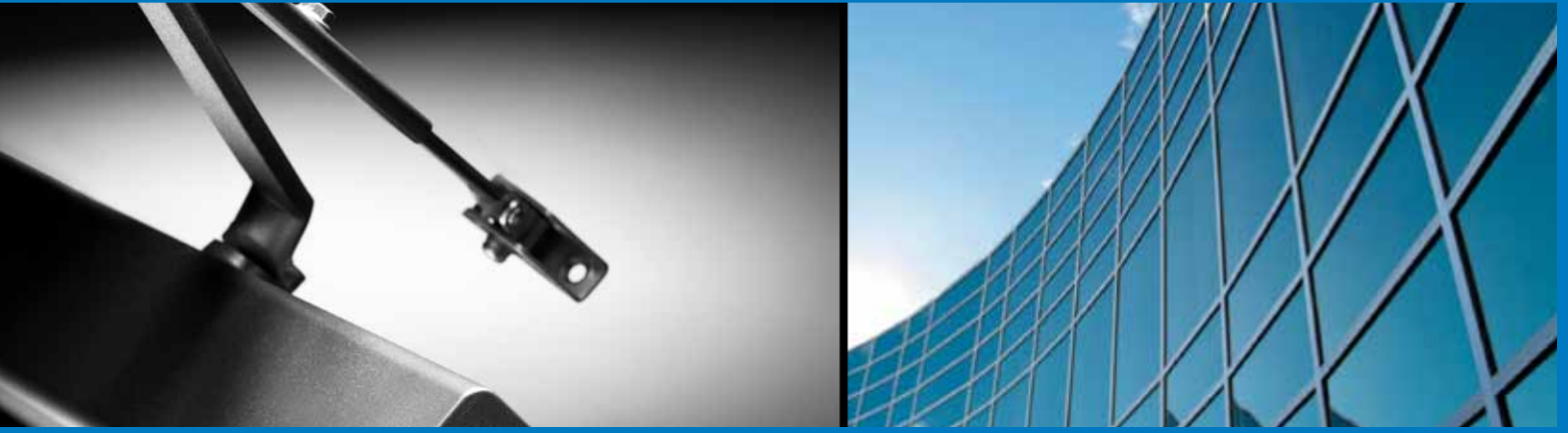


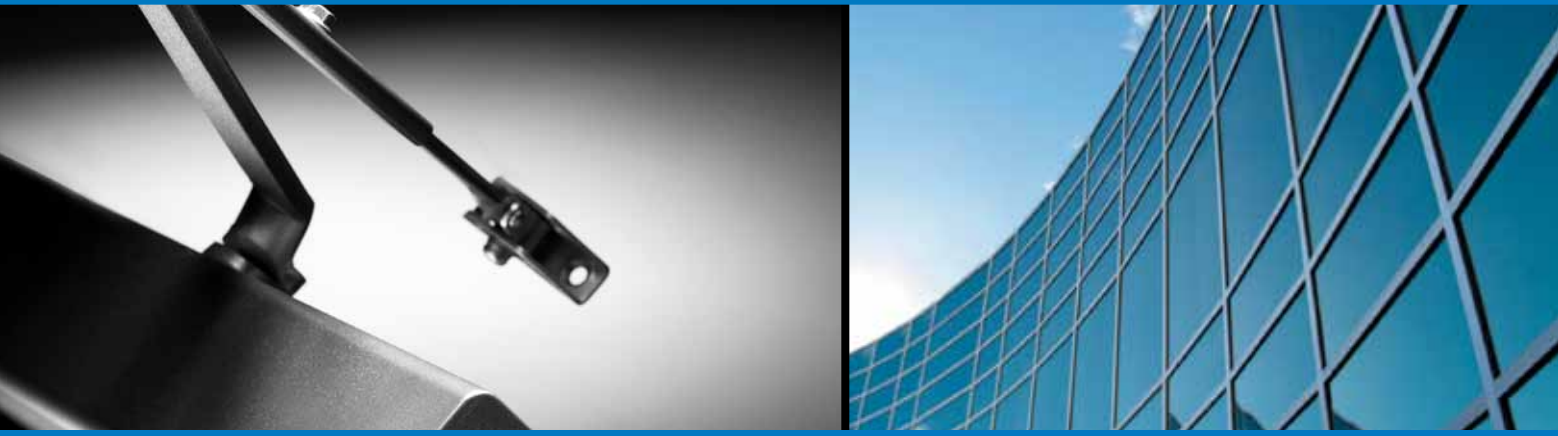
Door Closers



Hager door closers offer architects, contractors, and building owners a superior product with proven reliability. In fact, our 5100, 5200, and 5300 Series Grade 1 models are the only closers in the industry that are both BHMA certified and backed by a lifetime warranty. That makes them a no-risk choice for virtually any building type.

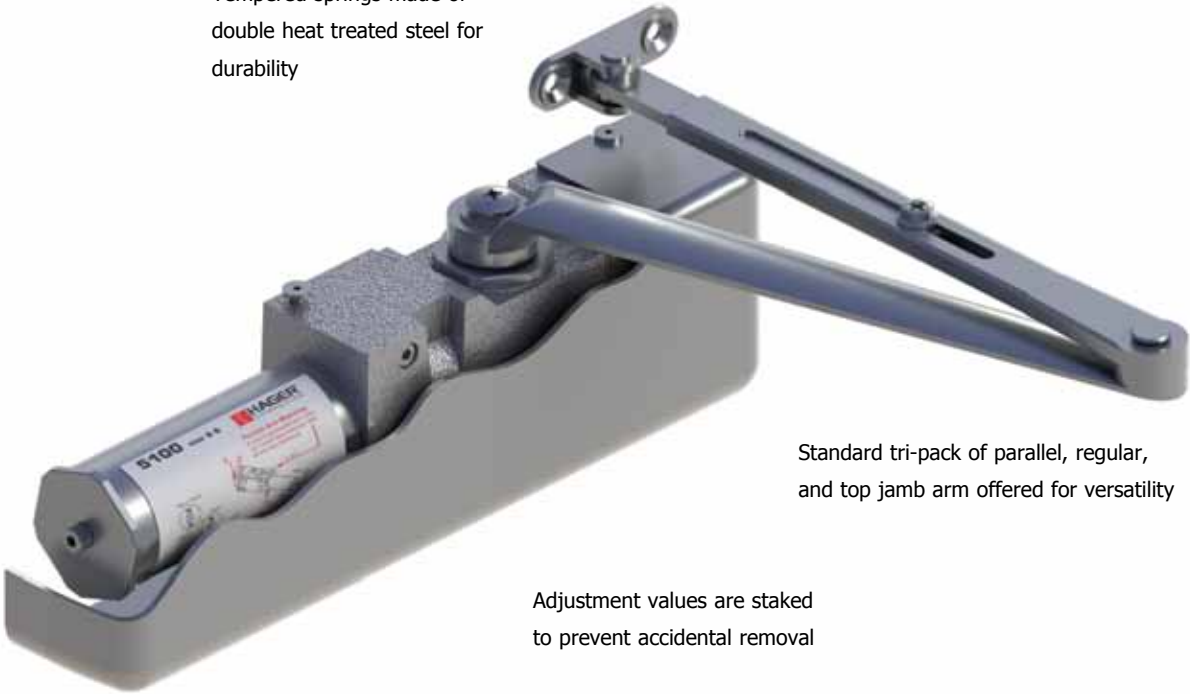
With Hager, you get a door closer that's packaged with everything needed for quick installation, regardless of the application. Hager door closers are tri-packed for mounting three ways: parallel arm, regular arm, and top jamb. They are non-handed, packaged with a parallel arm bracket and thru-bolts at no extra charge, and adjustable for various door sizes.

5100 Series



Hager 5100 Series Grade 1 door closer is constructed of cast iron, which makes it ideal for heavy duty, high use and abusive environments. Hager door closers are the only closers in the industry that are both BHMA certified and backed by a lifetime warranty.

Tempered springs made of double heat treated steel for durability



Standard tri-pack of parallel, regular, and top jamb arm offered for versatility

Adjustment values are staked to prevent accidental removal



DOOR CLOSERS

Hager Companies offers a variety of surface door closers to meet a wide range of applications and uses. Heavy duty, Grade 1 door closers are ideal for schools, hospitals, and other high-use environments.

Surface door closers are easy to install, with only a few holes for the body and the arm, requiring a minimum amount of preparation of the door and frame.

There are a number of factors to consider when choosing how to mount your closer. These factors can be influenced by aesthetics, environment, or application. The main things to consider when defining how to mount a surface door closer include:

- Architectural appearance
- Accessibility to the closer arm
- Space limitations of the frame above the door
- Space limitations on the top rail of the door
- Closer position on the door

There are three basic methods of mounting surface door closers to the door and frame: regular arm, parallel arm, and top jamb mounts. All Hager door closers are supplied standard with a tri-pack for mounting any of the three types of applications. The package includes regular, parallel, and top jamb arm mounts.

REGULAR ARM

The regular arm application is used when there is ample room on the top rail of the door and you are not concerned about the arm extending out away from the door. The closer body is mounted on the hinge side of the top rail of the door. The forearm is then mounted to the frame face by a mounting shoe. The arm projects at approximately a 90° angle away from the door. The regular arm mount will make the closer more power-efficient than the parallel arm or top jamb mount.

PARALLEL ARM

The depth of the top rail is an important consideration when using this application. The closer body is mounted on the top rail of the door opposite the hinge side of the door. The forearm is mounted by a parallel arm bracket to the underside of the frame. The arm is parallel to the door, which makes it less likely to be damaged and aids in the overall aesthetics. The power efficiency of the closer may be reduced by the mounting applications.

TOP JAMB

This is the preferred method of mounting a closer if you are faced with a narrow rail on a door. The closer body is mounted to the frame face above the door, opposite the door hinge side. The forearm is then mounted to the top rail of the door. The top jamb mount is more power-efficient than the parallel arm application.

DOOR CLOSER SIZING CHART

Exterior (and Vestibule) Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	36" (914 mm)	42" (1067 mm)	48" (1219 mm)
Regular Arm & Top Jamb	Size 3	Size 4	Size 5	Size 5	Size 6
Parallel Arm	Size 3	Size 4	Size 5	Size 5	-

Interior Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	34" (865 mm)	38" (965 mm)	48" (1219 mm)	54" (1372 mm)	60" (1524 mm)
Regular Arm & Top Jamb	Size 1	Size 2	Size 3	Size 4	Size 5	Size 6	Size 6
Parallel Arm	Size 1	Size 2	Size 3	Size 4	Size 5	Size 5	-





DOOR HANDING

Hager Companies' surface door closers are all non-handed, meaning they can be placed on a door so that they will operate a left-opening or a right-opening door. Some of the accessories that can be ordered with these closers are handed and the hand of the door should be specified when ordering a closer with these components.

CLOSER SIZING

The American National Standards Institute (ANSI) has set the standard for sizing and has ensured that each manufacturer's closers are tested to the same standards. The door closer sizing chart on page 4 shows the closer size required to fit your door size and application.

MEETING ADA REQUIREMENTS

Doors and doorways that are non-labeled and part of an accessible route shall comply with Section 404 of the ANSI 117.1 standard.

Door closers shall be adjusted so that from the open position of 90°, the time required to move the door to an open position of 12° shall be 5 seconds minimum.

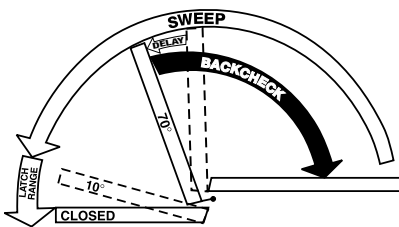
The maximum force for pushing open or pulling open an interior hinged door (other than a fire door) is five pounds.

FIRE DOORS

Fire doors shall have the minimum opening force allowable by the appropriate administrative authority.

CLOSER ADJUSTMENT

All Hager Companies' door closers are equipped with key control valves that allow for easy adjustments while decreasing the chances for tampering.



SWEEP AND LATCHING SPEEDS

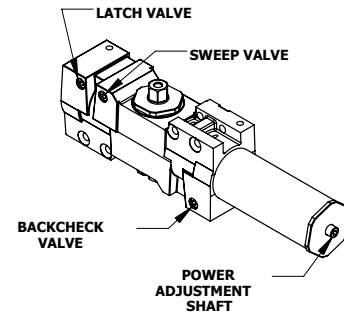
Two separate valves control the closing speed of the door. The sweep speed controls the speed of the door from full opening to within approximately 2° to 10° of the closed position. The latching speed valve controls the speed of the door from approximately 2° to 10° to full closing.

BACKCHECK

Backcheck starts at approximately 70° door opening and slows the door as it opens. This feature is not to be used as a positive stop. An auxiliary stop must be used.

DELAYED ACTION

The delayed action feature is available for all 5100 Series applications. The closing time between 90° and 70° shall be a minimum of 20 seconds, but is adjustable to be even slower.



ADJUSTABLE SPRING FEATURE

The 5100 Series closer offers an adjustable spring feature for sizing. Spring power of the closer can be increased or decreased by turning the power adjustment shaft clockwise.

USE OF DOOR STOPS

It is important to use an auxiliary door stop in order to protect the wall, trim, door, and closer. A stop should be used even when a closer with backcheck is used.

HOW TO SELECT THE PROPER CLOSER

1. Size and Weight of Door
5100 Series closers are non-sized so that closing force can be adjusted in the field to accommodate various door sizes, weights, and applications.
2. Interior Application
Where possible, the standard regular arm application should be used as it is the most efficient in terms of power and control.
3. Exterior Application
Exterior doors require greater closing forces because of draft and wind conditions. Therefore, where possible, use an extra heavy duty arm for these applications.
4. Degree of Opening
The closer should permit the door to open far enough to allow for easy traffic flow. The selection of the proper arm and position on the door are very important.
5. Function
Closers can be equipped with special arms that can serve many functions such as hold open, positive stop, or hold open stop when necessary.
6. Abusive Environment
Closers can be equipped with extra heavy duty arms that can withstand vandalism and extreme use.



DOOR CLOSERS

HOW TO ORDER

5100 PAR 14 ALM HD FC RH SX1G DLY

Mount

PAR - Parallel Arm Mount
MLT - Multi-Mount

Finish

ALM - Sprayed Aluminum
BRZ - Sprayed Bronze
DBZ - Sprayed Dark Bronze
GOL - Sprayed Gold
US3 - Bright Brass
US26 - Bright Chrome
US26D - Satin Chrome

Covers

FC - Full Cover
MC - Metal Cover

Fastener Options

SX1G - Sex Bolts for 1-3/8" Door
SX1N - Sex Bolts for 1-3/4" Door
SX2 - Sex Bolts for 2" Door
SX2D - Sex Bolts for 2-1/4" Door

Handing

RH - Right Hand
LH - Left Hand
(specify when ordering 5108)

Miscellaneous

DLY - Delayed Action

Size

14 - 1 thru 4 Adj. - ADA
26 - 2 thru 6 Adj.

Arm Options

HD - Extra Heavy Duty Arm
HO - Hold Open Arm
HDHO - Extra Heavy Duty Hold Open Arm
LA - Long Arm
HDHOS - Extra Heavy Duty Hold Open Stop Arm
HDHOCS - Extra Heavy Duty Hold Open Cushion Stop Arm
HDS - Extra Heavy Duty Stop Arm
HDCS - Extra Heavy Duty Cushion Stop Arm

Product Group

5100 - Cast Iron, Grade 1

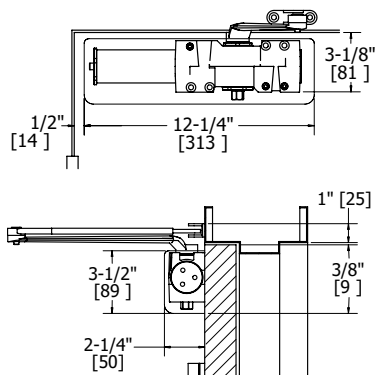




5100 SERIES APPLICATIONS

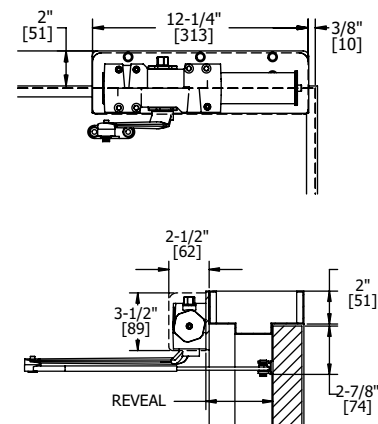
Regular Arm Mount (Pull Side)

- Opening: Templating allows up to 120°
 Hold Open: Hold Open points from 90° up to 120° with Hold Open arm
 Frame Face: 1-1/4" (32 mm) minimum
 Ceiling Clearance: 1-1/4" (32 mm) minimum
 Top Rail:
 - Less than 3-3/4" (95 mm) requires drop plate, 5109
 - Drop plate requires 2" (51 mm) minimum
 Top Rail Clearance: 4" (102 mm) from the top of door



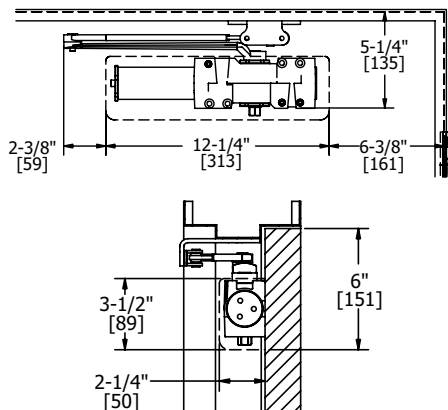
Top Jamb Mount (Push Side)

- Opening: Templating allows up to 120°
 Hold Open: Hold Open points 85° up to 120° with Hold Open arm
 Frame Face: Less than 3-1/2" (89 mm) requires drop plate, 5115
 Ceiling Clearance: Drop plate requires 4" (102 mm) minimum
 Top Rail: Requires 1-3/8" (35 mm) minimum
 Top Rail Clearance: 1-1/2" (38 mm) from the top of the door



Parallel Arm Mount (Push Side)

- Opening: Templating allows up to 180°
 Hold Open: Hold Open points from 90° up to 180° with Hold Open arm
 Top Rail:
 - Standard hollow metal 5/8" frame stop
 - Less than 5-1/2" (140 mm) from the stop requires drop plate, 5110
 - Drop plate requires 2" (51 mm) minimum from the stop
 Top Rail Clearance: 6-1/4" (159 mm) from the top of door





DOOR CLOSERS



5100 Series

Grade 1

Heavy Duty Surface Door Closer

Ideal for schools, hospitals, and other high-use environments

- Lifetime warranty
- Standard package contains 5101 closer body, 5102 closer cover, 5103 main arm assembly, 5104 standard screw pack, 5909 parallel arm bracket, and 5940 SNB screw pack for 1-3/4" (44 mm) doors



Certifications:

- BHMA Certified ANSI A156.4, adjustable sizes 2 to 6 - Standard
- ADA Compliant ANSI A117.1 Accessibility Code only for adjustable sizes 1 to 4 - Optional
- UL/cUL Listed for up to 3 hours
- UL10C Positive Pressure Rated
- UL10B Neutral Pressure Rated

Materials:

Cast iron

Cover:

- Full plastic cover - Standard
- Plated metal cover - Optional

Springs:

- One piece seamless steel spring tube
- Double heat treated steel, tempered springs

Valves:

- Adjustable latching and sweep speed valves
- Adjustable backcheck valve - Standard
- Delayed action valve - Optional
- Staked valves - Standard

Handing:

Non-handed

Arms & Brackets:

Tri-Pack: Regular, Parallel Arm, Top Jamb Mount - Standard

Door Thickness:

- 1-3/4" (44 mm) - Standard
- 1-3/8" - 2-1/4" (36 mm - 57 mm) thick door - Optional

Fasteners:

- Self-reaming, self-tapping wood and machine screws
- Sex nuts and bolts

Finishes:

- ALM, BRZ, DBZ, GOL, US3, US26, US26D
- Rust inhibiting primer - Standard

Notes:

- Full rack and pinion operation
- Precision machined, heat treated steel piston
- Triple heat treated steel spindle





5100 SERIES ARMS



5103

Main Arm

- Non-handed
- Forged steel
- Mounts regular, parallel arm, or top jamb mount



5106

Extra Heavy Duty Arm

- Non-handed parallel arm
- Forged steel



5107

Hold Open Arm

- Non-handed
- Forged steel
- Mounts pull side or top jamb with shallow reveal
- Friction Hold Open
- For use with 5909 bracket for parallel arm mount



5108

Extra Heavy Duty Hold Open

- Handed parallel arm (specify handing when ordering)
- Forged steel
- Provides Hold Open function
- Adjustable at the shoe
- Friction hold open
- Not for use on fire rated doors



5125

Extra Heavy Duty Stop Arm

- Non-handed parallel arm
- Forged steel
- Auxiliary stop in soffit shoe



5954

Extra Heavy Duty Hold Open Cushion Stop Arm

- Contains 5961 arm and 5950 spring cushion
- Non-handed parallel arm
- Forged steel
- Plunger Hold Open
- Hold Open function
- Auxiliary stop in soffit shoe



5955

Extra Heavy Duty Cushion Stop Arm

- Contains 5125 arm and 5950 spring cushion
- Non-handed parallel arm
- Forged steel
- Auxiliary stop in soffit shoe



5961

Extra Heavy Duty Hold Open Stop Arm

- Non-handed parallel arm
- Forged steel
- Plunger Hold Open
- Hold Open function
- Auxiliary stop in soffit shoe



DOOR CLOSERS

5100 SERIES ACCESSORIES



5101

Closer Body Only

- Full rack and pinion operation
- Precision machined heat treated steel piston
- Triple heat treated steel spindle



5102

Plastic Cover

- High impact non-corrosive full cover
- Cover projects 2-1/4" (57 mm) from door face
- Secured by two machine screws



5109

Drop Plate - Regular Arm Mount

- Required for hinge side mount when top rail is less than 3-3/4" (95 mm)
- Plate requires 2" (51 mm) minimum top rail



5110

Drop Plate - Parallel Arm Mount

- Required for parallel arm mount when top rail is less than 5-1/2" (140 mm), measured from the stop to the reveal
- Plate requires 2-1/2" (6 mm) minimum top rail



5111

Extra Heavy Duty Parallel Arm Support Bracket

- For use with stop arms when reveal is less than 3-1/16" (78 mm)
- Provides anchor for fifth screw



5112

Long Rod and Shoe

- Non-handed
- Cast steel
- Use for top jamb application
- Use for door reveals greater than 3" (76 mm) and up to 5" (127 mm)



5113

Blade Stop Spacer

- Required to lower parallel arm shoe to clear 1/2" (13 mm) blade stop for aluminum frames



5114

Drop Plate - Low Clearance

- For use when ceiling clearance prevents normal top jamb mounting
- For use when overhead door holder prevents normal top jamb mounting



5115

Drop Plate - Top Jamb Mount

- Required for top jamb when frame face is less than 3-1/2" (89 mm)
- Plate requires 1-3/4" (44 mm) minimum frame face
- For use with plastic cover



5909

Parallel Arm Bracket

- Supplied standard
- Supplied with standard hold open closer
- Can be used to convert regular or top jamb arm to parallel arm application



5935

Extra Clearance Parallel Arm Bracket

- Allows for up to 2" (51 mm) of clearance to mount additional hardware such as overhead door stops and holders
- Provides needed clearance not achieved with standard soffit plate



5950

Spring Cushion

- Non-handed
- Mounts to soffit shoe of 5125, 5961, 5906, and 5907 arms
- For use with extra heavy duty Hold Open and stop arms for abusive applications





5100 SERIES ACCESSORIES (CONTINUED)



5962

Metal Cover

- Cast zinc
- Cover projects 2-1/4" (56 mm) from door face
- Secured by two machine screws

5100 SERIES SCREW PACKS



5104

Screw Pack - Standard

- Self-drilling wood screws
- Self-drilling machine screws



5940

SNB Screw Pack - Standard

- Sex nuts and bolts for 1-3/4" (44 mm) doors
- Machine screws
- For use with 5100 Series closer only



5941

SNB Screw Pack - Optional

- Sex nuts and bolts for 1-3/8" (35 mm) doors
- Machine screws
- For use with 5100 Series closer only



5942

SNB Screw Pack - Optional

- Sex nuts and bolts for 2" (51 mm) doors
- Machine screws
- For use with 5100 Series closer only



5943

SNB Screw Pack - Optional

- Sex nuts and bolts for 2-1/4" (56 mm) doors
- Machine screws
- For use with 5100 Series closer only

TOUCH UP PAINT



2-659-0093

Door Closer Touch-Up Paint - Aluminum (ALM)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0094

Door Closer Touch-Up Paint - Bronze (BRZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0095

Door Closer Touch-Up Paint - Dark Bronze (DBZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0096

Door Closer Touch-Up Paint - Gold (GOL)

- Apply to existing closer covers, arm brackets, and fasteners



5200 Series



Hager 5200 Series Grade 1 door closer is ideal for schools, hospitals, and other high abuse and high traffic environments. It is constructed of an aluminum alloy and provides smooth door control. The 5200 Series door closer is easy to install and maintain--keeping your building safe and secure.

Slim line design provides a smaller footprint

Tempered springs made of double heat treated steel for durability



Standard tri-pack of parallel, regular, and top jamb arm offered for versatility



DOOR CLOSERS

Hager Companies offers a variety of surface door closers to meet a wide range of applications and uses. Heavy duty, Grade 1 door closers are ideal for schools, hospitals, and other high abuse and high traffic environments.

Surface door closers are easy to install, with only a few holes for the body and the arm, requiring a minimum amount of preparation of the door and frame. Not only are surface mounted door closers easier to install, they offer advantages with regard to adjustments that may need to be made because of variations in usage or environmental conditions.

There are a number of factors to consider when choosing how to mount your closer. These factors can be influenced by aesthetics, environment, or application. The main things to consider when defining how to mount a surface door closer include:

- Architectural appearance
- Accessibility to the closer arm
- Space limitations of the frame above the door
- Space limitations on the top rail of the door
- Closer position

There are three basic methods of mounting surface door closers to the door and frame: regular arm, parallel arm, and top jamb mounts. All Hager Companies' door closers are supplied standard with a tri-pack for mounting any of the three types of applications.

REGULAR ARM

The regular arm application is used when there is ample room on the top rail of the door and you are not concerned about the arm extending out away from the door. The closer body is mounted on the hinge side of the top rail of the door. The forearm is then mounted to the frame face by a mounting shoe. The arm projects at approximately a 90° angle away from the door. The regular arm mount will make the closer more power-efficient than the parallel arm or top jamb mount.

PARALLEL ARM

The depth of the top rail is an important consideration when using this application. The closer body is mounted on the top rail of the door opposite the hinge side of the door. The forearm is mounted by a parallel arm bracket to the underside of the frame. The arm is parallel to the door, which makes it less likely to be damaged and aids in the overall aesthetics. This mounting application will, however, reduce the power-efficiency of the closer.

TOP JAMB

This is the preferred method of mounting a closer if you are faced with a narrow rail on a door. The closer body is mounted to the frame face above the door, opposite the door hinge side. The forearm is then mounted to the top rail of the door. The top jamb mount is more power-efficient than the parallel arm application.

DOOR CLOSER SIZING CHART

Exterior (and Vestibule) Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	36" (914 mm)	42" (1067 mm)	48" (1219 mm)
Regular Arm & Top Jamb	Size 3	Size 4	Size 5	Size 6	
Parallel Arm	Size 3	Size 4	Size 5	-	

Interior Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	34" (865 mm)	38" (965 mm)	48" (1219 mm)	54" (1372 mm)	60" (1524 mm)
Regular Arm & Top Jamb	Size 1	Size 2	Size 3	Size 4	Size 5	Size 6	
Parallel Arm	Size 1	Size 2	Size 3	Size 4	Size 5	-	





DOOR HANDING

Hager Companies' surface door closers are all non-handed, meaning they can be placed on a door so that they will operate a left-opening or a right-opening door. Some of the accessories that can be ordered with these closers are handed and the hand of the door should be specified when ordering a closer with these components.

CLOSER SIZING

The American National Standards Institute (ANSI) has set the standard for sizing and has ensured that each manufacturer's closers are tested on the same basis. The chart on the previous page shows the closer size required to fit your door size and application.

MEETING ADA REQUIREMENTS

Doors and doorways that are non-labeled and part of an accessible route shall comply with Section 404 of the ANSI 117.1 standard.

Door closers shall be adjusted so that from the open position of 90°, the time required to move the door to an open position of 12° shall be 5 seconds minimum.

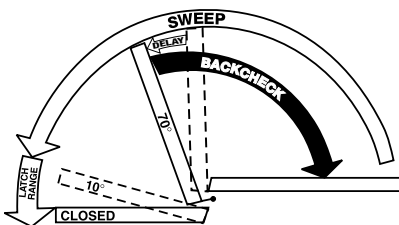
The maximum force for pushing open or pulling open an interior hinged door (other than a fire door) is five pounds.

FIRE DOORS

Fire doors shall have the minimum opening force allowable by the appropriate administrative authority.

CLOSER ADJUSTMENT

All Hager Companies' door closers are equipped with key control valves that allow for easy adjustments while decreasing the chances for tampering.



SWEEP AND LATCHING SPEEDS

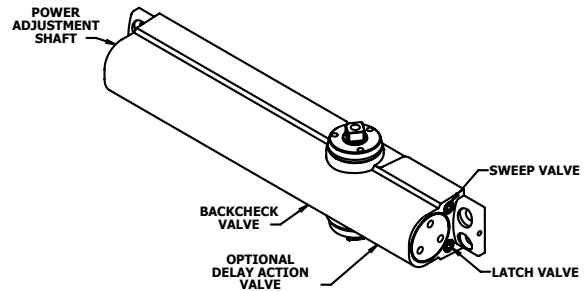
Two separate valves control the closing speed of the door. The sweep speed controls the speed of the door from full opening to within approximately 10° to 2° of the closed position. The latching speed valve controls the speed of the door from approximately 10° to 2° to full closing.

BACKCHECK

Backcheck starts at approximately 70° door opening and slows the door as it opens. This feature is not to be used as a positive stop. An auxiliary stop must be used.

DELAYED ACTION

The delayed action feature is available for all 5200 Series applications. The closing time between 90° and 70° shall be a minimum of 20 seconds, but is adjustable to be even slower.



ADJUSTABLE SPRING FEATURE

The 5200 Series closer offers an adjustable spring feature for sizing. Spring power of the closer can be increased or decreased by turning the power adjustment shaft clockwise.

USE OF DOOR STOPS

It is important to use an auxiliary door stop in order to protect the wall, trim, door, and closer. A stop should be used even when a holder arm or closer with backcheck is used.

HOW TO SELECT THE PROPER CLOSER

1. Size and Weight of Door
5200 Series closers are non-sized so that closing force can be adjusted in the field to accommodate various door sizes, weights, and applications.
2. Interior Application
Where possible, the standard regular arm application should be used as it is the most efficient in terms of power and control.
3. Exterior Application
Exterior doors require greater closing forces because of draft and wind conditions. Therefore, where possible, use an extra heavy duty arm for these applications.
4. Degree of Opening
The closer should permit the door to open far enough to allow for easy traffic flow. The selection of the proper arm and position on the door are very important.
5. Function
Closers can be equipped with special arms that can serve many functions such as hold open, positive stop, or hold open stop when necessary.
6. Abusive Environment
Closers can be equipped with extra heavy duty arms that can withstand vandalism and extreme use.



DOOR CLOSERS

HOW TO ORDER

5200 PAR 25 BRZ HD SLC LH SX2 DLY

Mount

PAR - Parallel Arm Mount
MLT - Multi-Mount

Product Group

5200 - Slim Body Aluminum, Grade 1

Finish

ALM - Sprayed Aluminum
BRZ - Sprayed Bronze
DBZ - Sprayed Dark Bronze
GOL - Sprayed Gold
US3 - Bright Brass
US26 - Bright Chrome
US26D - Satin Chrome

Size

14 - 1 thru 4 Adj. - ADA
25 - 2 thru 5 Adj.

Covers

SLC - Slim Line Cover
FC - Full Cover
MC - Metal Cover
PC - Pinion Cap

Fastener Options

SX1G - Sex Bolts for 1-3/8" Door
SX1N - Sex Bolts for 1-3/4" Door
SX2 - Sex Bolts for 2" Door
SX2D - Sex Bolts for 2-1/4" Door

Handing

RH - Right Hand
LH - Left Hand

Miscellaneous

DLY - Delayed Action

Arm Options

HD - Extra Heavy Duty Arm
HO - Hold Open Arm
HDHO - Extra Heavy Duty Hold Open Arm
LA - Long Arm
HDHOS - Extra Heavy Duty Hold Open Stop Arm
HDHOCS - Extra Heavy Duty Hold Open Cushion Stop Arm
HDS - Extra Heavy Duty Stop Arm
HDCS - Extra Heavy Duty Cushion Stop Arm

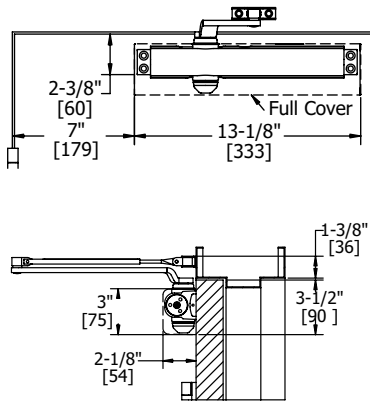




5200 SERIES APPLICATIONS

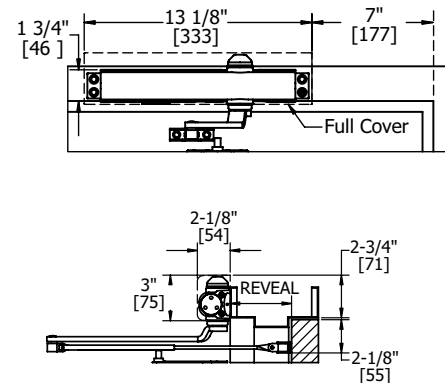
Regular Arm Mount (Pull Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open arm
- Frame Face: 1-3/8" (35 mm)
- Ceiling Clearance:
 - 1-3/4" (45 mm) minimum
 - 1-5/8" (41 mm) minimum for Hold Open arm
- Top Rail:
 - 2-1/2" (64 mm) minimum without drop plate
 - 1-5/8" (38 mm) minimum with drop plate, 5918
- Top Rail Clearance: 3-1/2" (89 mm) minimum



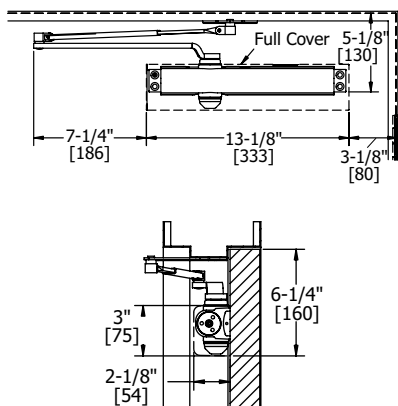
Top Jamb Mount (Pull Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open
- Frame Face:
 - 1-7/8" (48 mm) minimum
 - 1-1/8" (29 mm) minimum with drop plate, 5918
- Ceiling Clearance:
 - 2-3/4" (70 mm) minimum
 - 1-5/8" (41 mm) minimum with drop plate, 5918
- Top Rail: 2" (51 mm) minimum
- Top Rail Clearance:
 - 2-1/4" (57 mm) minimum
 - 2-1/2" (64 mm) minimum for hold-open
 - 3-3/8" (86 mm) minimum with drop plate, 5918
 - 3-5/8" (92 mm) minimum for Hold Open with drop plate



Parallel Arm Mount (Push Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open
- Top Rail:
 - Standard hollow metal 5/8" frame stop
 - 5-3/8" (137 mm) minimum
- Top Rail Clearance: 6-1/4" (159 mm) minimum





DOOR CLOSERS



5200 Series

Grade 1

Heavy Duty Surface Door Closer

Ideal for schools, hospitals, and other high-use environments

- Lifetime warranty
- Standard package contains 5201 closer body, 5202 closer cover, 5203 main arm assembly, 5204 standard screw pack, 5900 parallel arm bracket, and 5902 SNB screw pack for 1-3/4" (44 mm) door



Certifications:

- BHMA Certified ANSI A156.4, adjustable sizes 2 to 5 - Standard
- ADA Compliant ANSI A117.1 Accessibility Code only for adjustable sizes 1 to 4 - Optional
- UL/cUL Listed for up to 3 hours
- UL10C Positive Pressure Rated
- UL10B Neutral Pressure Rated

Materials:

Aluminum alloy

Cover:

- Full plastic cover - Standard
- Full size plated metal cover - Optional
- Slim line plastic cover - Optional

Springs:

Double heat treated steel, tempered springs

Valves:

- Adjustable latching and sweep speed valves
- Adjustable backcheck valve - Standard
- Delayed action valve - Optional
- Staked valves - Standard

Handing:

Non-handed

Arms & Brackets:

- Tri-Pack: Regular, Parallel Arm, and Top Jamb Mount - Standard
- 15% power adjustment in standard arm for regular and top jamb mount

Door Thickness:

- 1-3/4" (44 mm)
- 1-3/8" - 2-1/4" (36 mm - 57 mm) - Optional

Fasteners:

- Self-reaming, self-tapping wood and machine screws
- Sex nuts and bolts

Finishes:

- ALM, BRZ, DBZ, GOL, US3, US26, US26D
- Rust inhibiting primer - Standard

Notes:

- Full rack and pinion operation
- Precision machined, heat treated steel piston
- Triple heat treated steel spindle





5200 SERIES ARMS



5203

Main Arm

- Non-handed
- Forged steel
- Mounts regular, parallel arm, or top jamb mount



5207

Hold Open Arm

- Non-handed
- Forged steel
- Mounts pull side or top jamb with shallow reveal
- Friction Hold Open
- For use with 5914 bracket for parallel arm mount



5906

Extra Heavy Duty Hold Open Stop Arm

- Non-handed parallel arm
- Forged steel
- Hold Open function
- Auxiliary stop in soffit shoe
- Plunger Hold Open



5907

Extra Heavy Duty Stop Arm

- Non-handed parallel arm
- Forged steel
- Auxiliary stop in soffit shoe



5911

Extra Heavy Duty Arm

- Non-handed parallel arm
- Forged steel



5912

Extra Heavy Duty Hold Open

- Handed parallel arm (specify handing when ordering)
- Forged steel
- Provides Hold Open function
- Adjustable at the shoe
- Friction Hold Open



5956

Extra Heavy Duty Hold Open Cushion Stop Arm

- Contains 5906 arm and 5950 spring cushion arm
- Non-handed parallel arm
- Forged steel
- Plunger Hold Open
- Hold Open function
- Auxiliary stop in soffit shoe



5957

Extra Heavy Duty Cushion Stop Arm

- Contains 5907 arm and 5950 spring cushion
- Non-handed parallel arm
- Forged steel
- Auxiliary stop in soffit shoe





DOOR CLOSERS

5200 SERIES ACCESSORIES



5201

Closer Body Only

- Full rack and pinion operation
- Precision machined, heat treated steel pistons
- Triple heat treated steel spindle



5202

Full Plastic Cover

- High impact non-corrosive full cover
- Cover projects 2-3/16" (56 mm) from door face
- Secured by 2 machine screws



5900

Parallel Arm Bracket

- Supplied standard with multimount closers
- Can be used to convert regular or top jamb arms to parallel arm application



5908

Long Rod and Shoe

- Non-handed
- Cast steel
- Use for top jamb application
- Use for reveals greater than 4" (102 mm) and up to 8" (203 mm)



5913

Blade Stop Spacer

- Required to lower parallel arm shoe to clear 1/2" (13 mm) blade stop for aluminum frames



5914

Hold Open Parallel Arm Bracket

- Supplied with all standard hold open closers
- Can be used to convert regular arm or top jamb arm hold open arms to parallel arm



5918

Drop Plate - Top Jamb, Narrow Top Rail

- For use with slim line cover
- For use when a narrow top rail prevents mounting directly to door surface
- For use when low ceiling clearance prevents normal top jamb mounting



5919

Pinion Cap

- High-impact, non-corrosive
- Fits over the pinion and extends 9/16" (14 mm)
- For use with slim line cover



5920

Slim Line Plastic Cover

- High-impact non-corrosive
- Cover projects 2-3/16" (56 mm) from the door face
- Secured by 2 machine screws
- Available in plastic only



5921

Drop Plate - Narrow Top Rail

- For use with a full cover
- For use when a narrow top rail prevents mounting directly to door surface



5922

Drop Plate - Top Jamb, Parallel Arm

- For use with parallel arm mount and no cover or slim line cover
- For use when low ceiling clearance prevents normal top jamb mounting; with full cover
- For use when an overhead door holder prevents normal top jamb mounting





5200 SERIES ACCESSORIES (CONTINUED)



5923

Drop Plate - Parallel Arm

- For use with a full cover
- For use with a parallel arm when narrow top rail prevents mounting directly to the door surface



5932

Metal Cover

- Cast zinc
- Cover projects 2-1/4" (57 mm) from door face
- Secured by two machine screws
- Not offered as slim line



5936

Extra Clearance Parallel Arm Bracket

- Allows for up to 2" (51 mm) of clearance to mount additional hardware such as overhead door stops and holders
- Provides needed clearance not achieved with a standard soffit plate



5950

Spring Cushion

- Non-handed
- Mounts to soffit shoe of 5125, 5961, 5906, 5907
- For use with extra heavy duty hold open and stop arms for abusive applications

5200 SERIES SCREW PACKS



5204

Screw Pack - Standard

- Self-drilling wood screws
- Self-drilling machine screws



5902

SNB Screw Pack - Standard

- Sex nuts and bolts for 1-3/4" (44 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5903

SNB Screw Pack - Optional

- Sex nuts and bolts for 1-3/8" (35 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5904

SNB Screw Pack - Optional

- Sex nuts and bolts for 2" (51 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5905

SNB Screw Pack - Optional

- Sex nuts and bolts for 2-1/4" (56 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only





DOOR CLOSERS

TOUCH UP PAINT



2-659-0093

Door Closer Touch-Up Paint - Aluminum (ALM)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0094

Door Closer Touch-Up Paint - Bronze (BRZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0095

Door Closer Touch-Up Paint - Dark Bronze (DBZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0096

Door Closer Touch-Up Paint - Gold (GOL)

- Apply to existing closer covers, arm brackets, and fasteners



5300 Series



Hager 5300 Series Grade 1 door closer is ideal for schools, hospitals, and other high abuse and high traffic environments. It is constructed of an aluminum alloy and provides smooth door control. The 5300 Series door closer is easy to install and maintain-- keeping your building safe and secure.

The closer covers (furnished standard) add the finishing touch to the concealment of the closer



Standard tri-pack of parallel, regular, and top jamb arm offered for versatility

Adjustment values are staked to prevent accidental removal



DOOR CLOSERS

Hager Companies offers a variety of surface door closers to meet a wide range of applications and uses. Heavy duty, Grade 1 door closers are ideal for schools, hospitals, and other high-use environments.

Surface door closers are easy to install, with only a few holes for the body and the arm, requiring a minimum amount of preparation of the door and frame. Not only are surface mounted door closers easier to install, they offer advantages with regard to adjustments that may need to be made because of variations in usage or environmental conditions.

There are a number of factors to consider when choosing how to mount your closer. These factors can be influenced by aesthetics, environment, or application. The main things to consider when defining how to mount a surface door closer include:

- Architectural appearance
- Accessibility to the closer arm
- Space limitations of the frame above the door
- Space limitations on the top rail of the door
- Closer position

There are three basic methods of mounting surface door closers to the door and frame: regular arm, parallel arm, and top jamb mounts. All Hager Companies' door closers are supplied standard with a tri-pack for mounting any of the three types of applications.

REGULAR ARM

The regular arm application is used when there is ample room on the top rail of the door and you are not concerned about the arm extending out away from the door. The closer body is mounted on the hinge side of the top rail of the door. The forearm is then mounted to the frame face by a mounting shoe. The arm projects at approximately a 90° angle away from the door. The regular arm mount will make the closer more power-efficient than the parallel arm or top jamb mount.

PARALLEL ARM

The depth of the top rail is an important consideration when using this application. The closer body is mounted on the top rail of the door opposite the hinge side of the door. The forearm is mounted by a parallel arm bracket to the underside of the frame. The arm is parallel to the door, which makes it less likely to be damaged and aids in the overall aesthetics. This mounting application will, however, reduce the power-efficiency of the closer.

TOP JAMB

This is the preferred method of mounting a closer if you are faced with a narrow rail on a door. The closer body is mounted to the frame face above the door, opposite the door hinge side. The forearm is then mounted to the top rail of the door. The top jamb mount is more power-efficient than the parallel arm application.

DOOR CLOSER SIZING CHART

Exterior (and Vestibule) Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	36" (914 mm)	42" (1067 mm)	48" (1219 mm)
Regular Arm & Top Jamb	Size 3	Size 4	Size 5	Size 6	
Parallel Arm	Size 3	Size 4	Size 5	-	

Interior Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	34" (865 mm)	38" (965 mm)	48" (1219 mm)	54" (1372 mm)	60" (1524 mm)
Regular Arm & Top Jamb	Size 1	Size 2	Size 3	Size 4	Size 5	Size 6	
Parallel Arm	Size 1	Size 2	Size 3	Size 4	Size 5	-	





DOOR HANDING

Hager Companies' surface door closers are all non-handed, meaning they can be placed on a door so that they will operate a left-opening or a right-opening door. Some of the accessories that can be ordered with these closers are handed and the hand of the door should be specified when ordering a closer with these components.

CLOSER SIZING

The American National Standards Institute (ANSI) has set the standard for sizing and has ensured that each manufacturer's closers are tested on the same basis. The chart on the previous page shows the closer size required to fit your door size and application.

MEETING ADA REQUIREMENTS

Doors and doorways that are non-labeled and part of an accessible route shall comply with Section 404 of the ANSI 117.1 standard.

Door closers shall be adjusted so that from the open position of 90°, the time required to move the door to an open position of 12° shall be 5 seconds minimum.

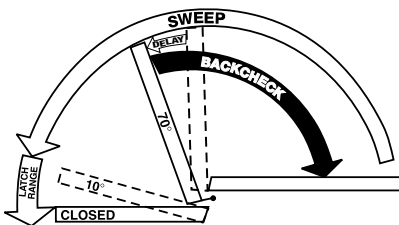
The maximum force for pushing open or pulling open an interior hinged door (other than a fire door) is five pounds.

FIRE DOORS

Fire doors shall have the minimum opening force allowable by the appropriate administrative authority.

CLOSER ADJUSTMENT

All Hager Companies' door closers are equipped with key control valves that allow for easy adjustments while decreasing the chances for tampering.



SWEEP AND LATCHING SPEEDS

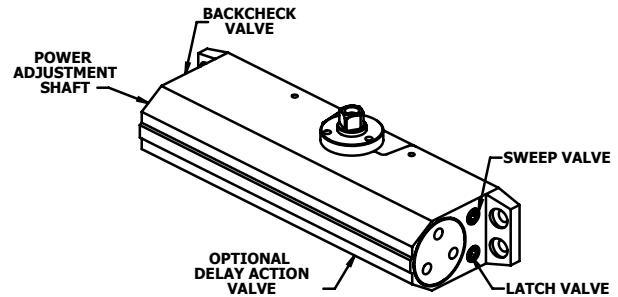
Two separate valves control the closing speed of the door. The sweep speed controls the speed of the door from full opening to within approximately 10° to 2° of the closed position. The latching speed valve controls the speed of the door from approximately 10° to 2° to full closing.

BACKCHECK

Backcheck starts at approximately 70° door opening and slows the door as it opens. This feature is not to be used as a positive stop. An auxiliary stop must be used.

DELAYED ACTION

The delayed action feature is available for all 5300 Series applications. The closing time between 90° and 70° shall be a minimum of 20 seconds, but is adjustable to be even slower.



ADJUSTABLE SPRING FEATURE

The 5300 Series closer offers an adjustable spring feature for sizing. Spring power of the closer can be increased or decreased by turning the power adjustment shaft clockwise.

USE OF DOOR STOPS

It is important to use an auxiliary door stop in order to protect the wall, trim, door, and closer. A stop should be used even when a holder arm or closer with backcheck is used.

HOW TO SELECT THE PROPER CLOSER

1. Size and Weight of Door
5300 Series closers are non-sized so that closing force can be adjusted in the field to accommodate various door sizes, weights, and applications.
2. Interior Application
Where possible, the standard regular arm application should be used as it is the most efficient in terms of power and control.
3. Exterior Application
Exterior doors require greater closing forces because of draft and wind conditions. Therefore, where possible, use an extra heavy duty arm for these applications.
4. Degree of Opening
The closer should permit the door to open far enough to allow for easy traffic flow. The selection of the proper arm and position on the door are very important.
5. Function
Closers can be equipped with special arms that can serve many functions such as hold open, positive stop, or hold open stop when necessary.
6. Abusive Environment
Closers can be equipped with extra heavy duty arms that can withstand vandalism and extreme use.



DOOR CLOSERS

HOW TO ORDER

5300 MLT 26 DBZ LA FC RH SX1G DLY

Mount

PAR - Parallel Arm Mount
MLT - Multi-Mount

Product Group

5300 - Aluminum, Grade 1

Finish

ALM - Sprayed Aluminum
BRZ - Sprayed Bronze
DBZ - Sprayed Dark Bronze
GOL - Sprayed Gold
US3 - Bright Brass
US26 - Bright Chrome
US26D - Satin Chrome

Covers

FC - Full Cover
PC - Pinion Cap

Fastener Options

SX1G - Sex Bolts for 1-3/8" Door
SX1N - Sex Bolts for 1-3/4" Door
SX2 - Sex Bolts for 2" Door
SX2D - Sex Bolts for 2-1/4" Door

Handing

RH - Right Hand
LH - Left Hand

Size

14 - 1 thru 4 Adj. - ADA
26 - 2 thru 6 Adj.

Miscellaneous

DLY - Delayed Action

Arm Options

HD - Extra Heavy Duty Arm
HO - Hold Open Arm
HDHO - Extra Heavy Duty Hold Open Arm
LA - Long Arm
HDHOS - Extra Heavy Duty Hold Open Stop Arm
HDHOCS - Extra Heavy Duty Hold Open Cushion Stop Arm
HDS - Extra Heavy Duty Stop Arm
HDCS - Extra Heavy Duty Cushion Stop Arm

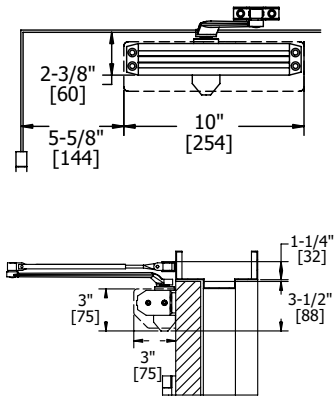




5300 SERIES APPLICATIONS

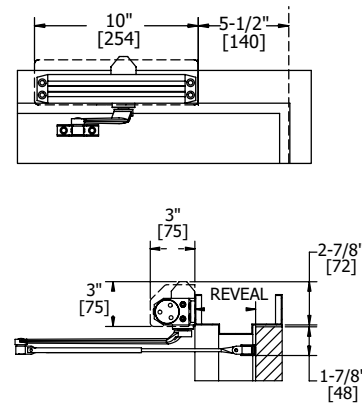
Regular Arm Mount (Pull Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open arm
- Frame Face: 1-3/8" (35 mm) minimum
- Ceiling Clearance:
 - 1-5/8" (41 mm) minimum
 - 1-5/8" (41 mm) minimum for Hold Open arm
- Top Rail: 2-1/2" (64 mm) minimum with drop plate, 5915
- Top Rail Clearance: 4-1/4" (108 mm) minimum from the top of the door



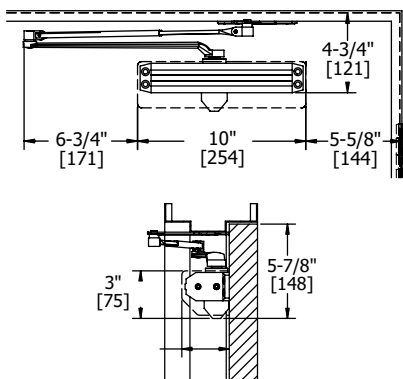
Top Jamb Mount (Push Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open
- Frame Face: 1-3/4" (45 mm) minimum
- Ceiling Clearance:
 - 2-3/4" (70 mm) minimum
 - 1-3/4" (44 mm) minimum with drop plate, 5918
- Top Rail: 1-7/8" (48 mm) minimum
- Top Rail Clearance:
 - 2-1/8" (54 mm) minimum
 - 2-3/4" (70 mm) minimum with drop plate, 5917
 - 2-1/4" (57 mm) minimum for Hold Open with drop plate, 5917
 - 3-5/8" (92 mm) minimum with drop plate, 5915



Parallel Arm Mount (Push Side)

- Opening: Templating allows up to 180°
- Hold Open: Hold Open points 90° up to 180° with Hold Open
- Top Rail:
 - Standard hollow metal 5/8" frame stop
 - 4-3/4" (121 mm) minimum
 - 4" (102 mm) minimum with Hold Open
 - 3-1/8" (79 mm) minimum with plate
 - 2-1/8" (54 mm) minimum with Hold Open and plate
- Top Rail Clearance: 5-3/4" (146 mm) minimum from the top of the door





DOOR CLOSERS



5300 Series

Grade 1

Heavy Duty Surface Door Closer

Ideal for schools, hospitals, and other high-use environments

- Lifetime warranty
- Standard package contains 5301 closer body, 5302 closer cover, 5303 main arm assembly, 5304 standard screw pack, 5900 parallel arm bracket, and 5902 SNB screw pack for 1-3/4" (44 mm) door



Certifications:

- BHMA Certified ANSI A156.4, adjustable sizes 2 to 6 - Standard
- ADA Compliant ANSI A117.1 Accessibility Code only for adjustable sizes 1 to 4 - Optional
- UL/cUL Listed for up to 3 hours
- UL10C Positive Pressure Rated
- UL10B Neutral Pressure Rated

Materials:

Aluminum alloy

Cover:

Full plastic cover and pinion cap

Springs:

Double heat treated steel, tempered springs

Valves:

- Adjustable latching and sweep speed valves
- Adjustable backcheck valve - Standard
- Delayed action valve - Optional
- Staked valves - Standard

Handing:

Non-handed

Arms & Brackets:

- Tri-Pack: Regular, Parallel Arm, and Top Jamb Mount - Standard
- 15% power adjustment in standard arm for regular and top jamb mount

Door Thickness:

- 1-3/4" (44 mm)
- 1-3/8" - 2-1/4" (36 mm - 57 mm) Optional

Fasteners:

- Self-reaming, self-tapping wood and machine screws
- Sex nuts and bolts

Finishes:

- ALM, BRZ, DBZ, GOL
- Rust inhibiting primer - Standard

Notes:

- Full rack and pinion operation
- Precision machined, heat treated steel piston
- Triple heat treated steel spindle





5300 SERIES ARMS

**5303****Main Arm**

- Non-handed
- Forged steel
- Mounts regular, top jamb, or parallel arm mount
- For use with 5900 bracket for parallel arm mount

**5307****Hold Open Arm Assembly**

- Non-handed
- Forged steel
- Mounts pull side or top jamb with shallow reveal
- Friction Hold Open
- For use with 5914 bracket for parallel arm mount

**5906****Extra Heavy Duty Hold Open Stop Arm**

- Non-handed parallel arm
- Forged steel
- Hold Open function
- Auxiliary stop in soffit shoe
- Plunger Hold Open

**5907****Extra Heavy Duty Stop Arm**

- Non-handed parallel arm
- For use in abusive environments
- Auxiliary stop in soffit shoe

**5911****Extra Heavy Duty Arm Assembly**

- Non-handed parallel arm
- Forged steel
- For use in abusive environments

**5912****Extra Heavy Duty Hold Open Arm Assembly**

- Handed parallel arm (specify handing when ordering)
- Forged steel
- Provides Hold Open function
- Adjustable at the shoe
- Friction Hold Open

**5956****Extra Heavy Duty Hold Open Cushion Stop Arm**

- Contains 5906 arm and 5950 spring cushion arm
- Non-handed parallel arm
- Forged steel
- Plunger Hold Open
- Hold Open function
- Auxiliary stop in soffit shoe

**5957****Extra Heavy Duty Cushion Stop Arm**

- Contains 5907 arm and 5950 spring cushion
- Non-handed parallel arm
- Forged steel
- Auxiliary stop in soffit shoe



DOOR CLOSERS

5300 SERIES ACCESSORIES



5301

Closer Body Only

- Full rack and pinion operation
- Precision machined, heat treated steel pistons
- Triple heat treated steel spindle



5302

Full Plastic Cover

- High impact non-corrosive full cover - Standard
- Cover projects 2-3/16" (56 mm) from door face
- Secured by 2 machine screws
- Available in plastic only



5900

Parallel Arm Bracket

- Supplied standard with multimount closers
- Can be used to convert regular or top jamb arms to parallel arm application



5901

Pinion Cap

- Supplied standard
- High-impact, non-corrosive
- Fits over the pinion and extends 1" (25 mm)



5908

Long Rod and Shoe

- Non-handed
- Cast steel
- Use for top jamb application
- Use for reveals greater than 4" (102 mm) and up to 8" (203 mm)



5913

Blade Stop Spacer

- Required to lower parallel arm shoe to clear 1/2" (13 mm) blade stop for aluminum frames



5936

Extra Clearance Parallel Arm Bracket

- Allows for up to 2" (13 mm) of clearance to mount additional hardware such as overhead door stops and holders
- Provides needed clearance not achieved with a standard soffit plate



5950

Spring Cushion

- Non-handed
- Mounts to soffit shoe of 5125, 5961, 5906, 5907
- For use with extra heavy duty hold open and stop arms for abusive applications





5300 SERIES ACCESSORIES (CONTINUED)



5914

Hold Open Parallel Arm Bracket

- Supplied with all standard Hold Open closers
- Used to convert 5307 Hold Open arms to parallel arm



5915

Drop Plate – Narrow Rail Overhead Holder

- For use when an overhead door holder prevents normal top jamb mounting
- For use when a narrow rail prevents the closer from being mounted directly to the door
- For use with parallel arm and no cover
- For use when low ceiling clearance prevents normal top jamb mounting
- Includes screw pack



5916

Drop Plate – Narrow Rail Parallel Arm

- For use when a narrow rail prevents the closer from being mounted directly to the door
- For use with parallel arm and full plastic cover
- Includes screw pack



5917

Drop Plate – Top Jamb, Low Clearance

- For use when ceiling clearance is between 1-3/4" (44 mm) and 2-5/8" (67 mm)
- For use when an overhead door holder prevents normal top jamb mounting
- For use with no cover

5300 SERIES SCREW PACKS



5304

Screw Pack - Standard

- Self-drilling wood screws
- Self-drilling machine screws



5902

SNB Screw Pack - Standard

- Sex nuts and bolts for 1-3/4" (44 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5903

SNB Screw Pack - Optional

- Sex nuts and bolts for 1-3/8" (35 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5904

SNB Screw Pack - Optional

- Sex nuts and bolts for 2" (51 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5905

SNB Screw Pack - Optional

- Sex nuts and bolts for 2-1/4" (56 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



DOOR CLOSERS

TOUCH UP PAINT



2-659-0093

Door Closer Touch-Up Paint - Aluminum (ALM)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0094

Door Closer Touch-Up Paint - Bronze (BRZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0095

Door Closer Touch-Up Paint - Dark Bronze (DBZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0096

Door Closer Touch-Up Paint - Gold (GOL)

- Apply to existing closer covers, arm brackets, and fasteners



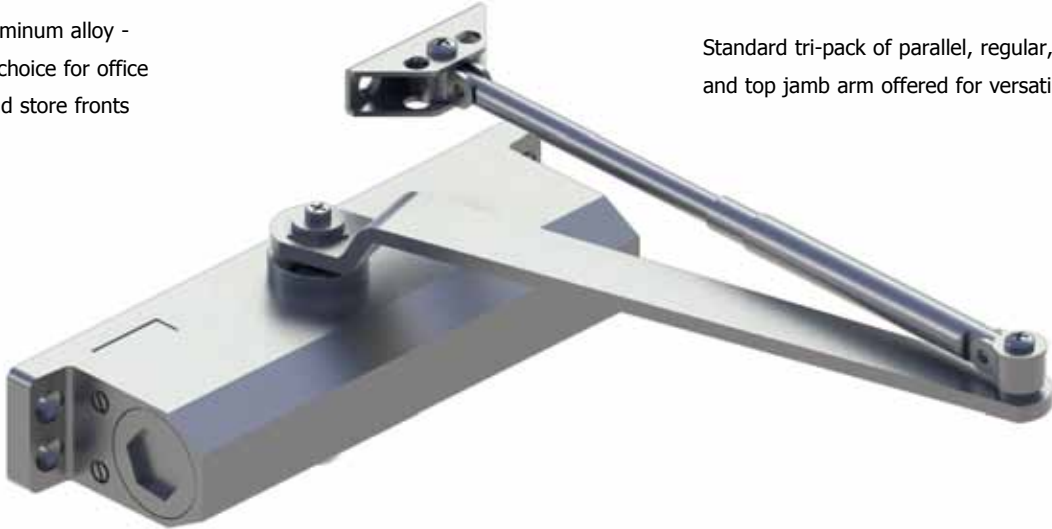
5400 Series



Hager 5400 Series Grade 2 door closer is ideal for light duty, commercial applications such as store fronts, churches, and hotels. It is constructed of an aluminum alloy and has been tested for strength and abuse. The 5400 Series door closer is ideal for low frequency openings and has a five-year warranty.

Made of aluminum alloy -
the proven choice for office
buildings and store fronts

Standard tri-pack of parallel, regular,
and top jamb arm offered for versatility



Adjustment values are staked
to prevent accidental removal



DOOR CLOSERS

Hager Companies offers a variety of surface door closers to meet a wide range of applications and uses. Standard duty Grade 2 door closers are ideal for less abusive commercial applications such as office buildings and store fronts.

Surface door closers are easy to install, with only a few holes for the body and the arm, requiring a minimum amount of preparation of the door and frame. Not only are surface mounted door closers easier to install, they offer advantages with regard to adjustments that may need to be made because of variations in usage or environmental conditions.

There are a number of factors to consider when choosing how to mount your closer. These factors can be influenced by aesthetics, environment, or application. The main things to consider when defining how to mount a surface door closer include:

- Architectural appearance
- Accessibility to the closer arm
- Space limitations of the frame above the door
- Space limitations on the top rail of the door
- Closer position

There are three basic methods of mounting surface door closers to the door and frame: regular arm, parallel arm, and top jamb mounts. All Hager Companies' door closers are supplied standard with a tri-pack for mounting any of the three types of applications.

REGULAR ARM

The regular arm application is used when there is ample room on the top rail of the door and you are not concerned about the arm extending out away from the door. The closer body is mounted on the hinge side of the top rail of the door. The forearm is then mounted to the frame face by a mounting shoe. The arm projects at approximately a 90° angle away from the door. The regular arm mount will make the closer more power-efficient than the parallel arm or top jamb mount.

PARALLEL ARM

The depth of the top rail is an important consideration when using this application. The closer body is mounted on the top rail of the door opposite the hinge side of the door. The forearm is mounted by a parallel arm bracket to the underside of the frame. The arm is parallel to the door, which makes it less likely to be damaged and aids in the overall aesthetics. This mounting application will, however, reduce the power-efficiency of the closer.

TOP JAMB

This is the preferred method of mounting a closer if you are faced with a narrow rail on a door. The closer body is mounted to the frame face above the door, opposite the door hinge side. The forearm is then mounted to the top rail of the door. The top jamb mount is more power-efficient than the parallel arm application.

DOOR CLOSER SIZING CHART

Exterior (and Vestibule) Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	36" (914 mm)	42" (1067 mm)	48" (1219 mm)
Regular Arm & Top Jamb	Size 3	Size 4	Size 5	-	-
Parallel Arm	Size 3	Size 4	Size 5	-	-

Interior Door Width

Minimum Door Width (24")

	24" (610 mm)	30" (762 mm)	34" (865 mm)	38" (965 mm)	48" (1219 mm)	54" (1372 mm)	60" (1524 mm)
Regular Arm & Top Jamb	-	Size 2	Size 3	Size 4	Size 5	Size 6	-
Parallel Arm	-	Size 2	Size 3	Size 4	Size 5	-	-





DOOR HANDLING

Hager Companies' surface door closers are all non-handed, meaning they can be placed on a door so that they will operate a left-opening or a right-opening door. Some of the accessories that can be ordered with these closers are handed and the hand of the door should be specified when ordering a closer with these components.

CLOSER SIZING

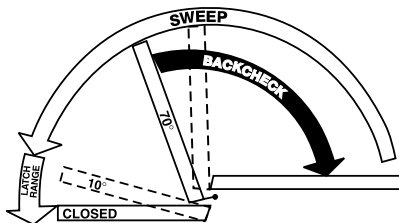
The American National Standards Institute (ANSI) has set the standard for sizing and has ensured that each manufacturer's closers are tested on the same basis. The chart on the previous page shows the closer size required to fit your door size and application.

FIRE DOORS

Fire doors shall have the minimum opening force allowable by the appropriate administrative authority.

CLOSER ADJUSTMENT

All Hager Companies' door closers are equipped with key control valves that allow for easy adjustments while decreasing the chances for tampering.



SWEEP AND LATCHING SPEEDS

Two separate valves control the closing speed of the door. The sweep speed controls the speed of the door from full opening to within approximately 10° to 2° of the closed position. The latching speed valve controls the speed of the door from approximately 10° to 2° to full closing.

BACKCHECK: OPTIONAL FOR 5400 SERIES

Backcheck starts at approximately 70° door opening and slows the door as it opens. This feature is not to be used as a positive stop. An auxiliary stop must be used.

USE OF DOOR STOPS

It is important to use an auxiliary door stop in order to protect the wall, trim, door, and closer. A stop should be used even when a holder arm or closer with backcheck is used.

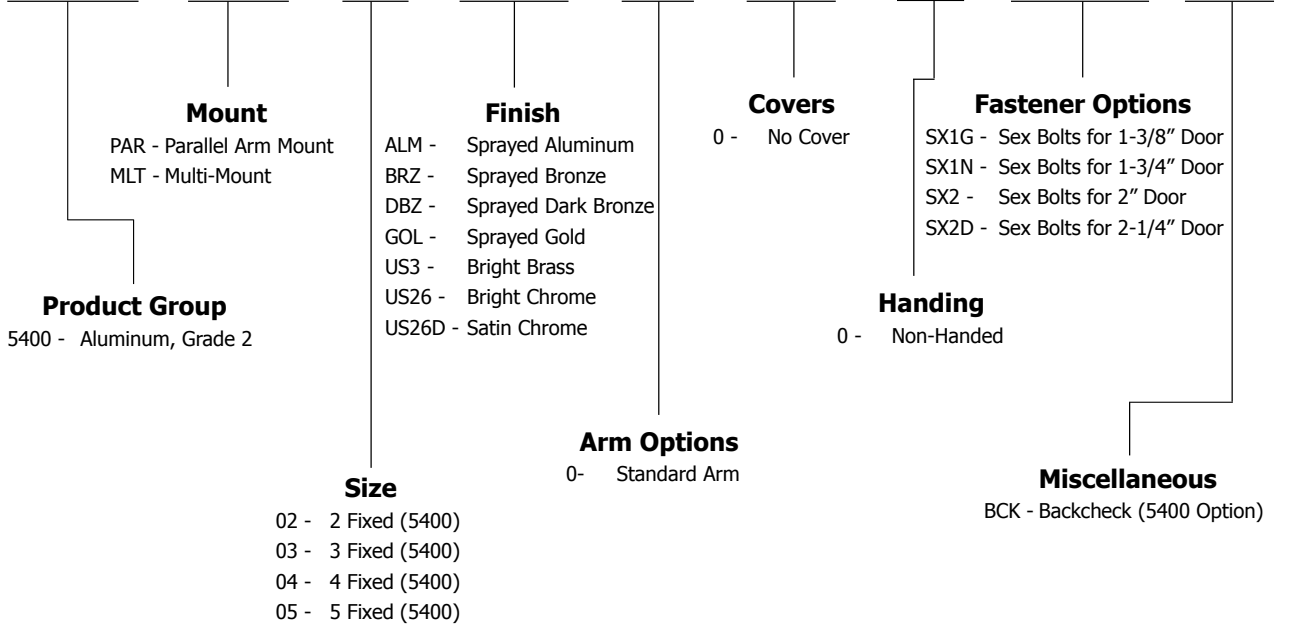




DOOR CLOSERS

HOW TO ORDER

5400 PAR 02 ALM 0 0 0 SX1G BCK

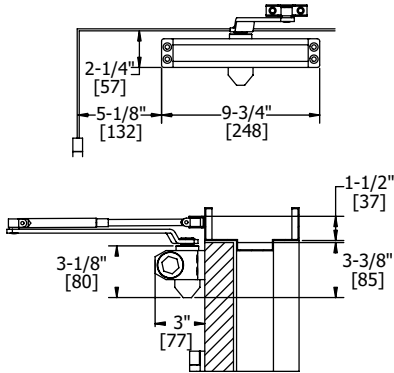




5400 SERIES APPLICATIONS

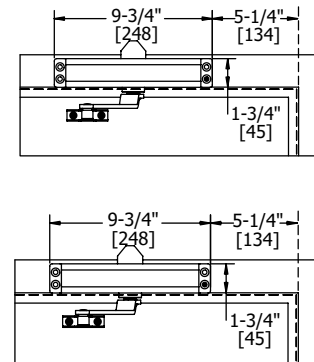
Regular Arm Mount

Opening: Templating allows up to 180°
 Frame Face: 1-1/2" (38 mm) minimum
 Ceiling Clearance: 1-3/4" (44 mm) minimum
 Top Rail: 2-1/4" (57 mm) minimum
 Top Rail Clearance: 3-1/2" (89 mm) minimum



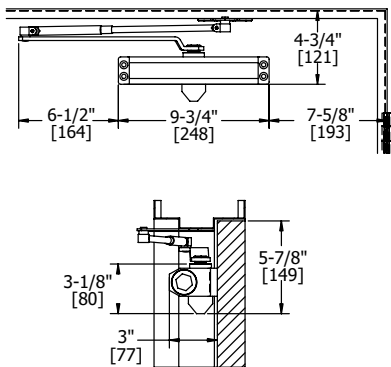
Top Jamb Mount

Opening: Templating allows up to 180°
 Frame Face: 1-3/4" (45 mm) minimum
 Ceiling Clearance: 2-3/4" (70 mm) minimum
 Top Rail: 1-7/8" (48 mm) minimum
 Top Rail Clearance: 2-1/8" (54 mm) minimum



Parallel Arm Mount

Opening: Templating allows up to 180°
 Top Rail: • 5/8" (16 mm) frame stop
 • 4-3/4" (121 mm) minimum
 Top Rail Clearance: 5-3/4" (146 mm) minimum





DOOR CLOSERS



5400 Series

Grade 2

Standard Duty Surface Door Closer

Ideal for light duty commercial applications

- Five-year warranty
- Standard package contains 5401 closer body, 5901 pinion cap, 5403 main arm assembly, 5404 standard screw pack, 5900 parallel arm bracket, and 5902 SNB screw pack for 1-3/4" (44 mm) door

- Certifications:
- BHMA Certified ANSI A156.4, Sizes 2, 3, 4, 5 - Must specify
 - UL/cUL Listed for up to 3 hours
 - UL10C Positive Pressure Rated
 - UL10B Neutral Pressure Rated
- Materials: Aluminum alloy
- Cover: Pinion cap
- Springs: Double heat treated steel, tempered springs
- Valves:
- Adjustable latching and sweep speed valves
 - Adjustable backcheck valve - Optional
 - Staked valves - Standard
- Handing: Non-handed
- Arms & Brackets:
- Tri-Pack: Regular, Parallel, and Top Jamb Arm Mount - Standard
 - 15% power adjustment in standard arm for regular and top jamb mount
- Door Thickness:
- 1-3/4" (44 mm) - Standard
 - 1-3/8" - 2-1/4" (36 mm - 57 mm) - Optional
- Fasteners:
- Self-reaming, self-tapping wood and machine screws
 - Sex nuts and bolts
- Finishes:
- ALM, BRZ, DBZ, GOL
 - Rust inhibiting primer - Standard
- Notes:
- Precision machined, heat treated steel piston
 - Triple heat treated steel spindle





5400 SERIES ARMS



5403

Main Arm

- Non-handed
- Punched steel
- Mounts regular, parallel arm, or top jamb mount
- For use with 5900 bracket for parallel arm mount

5400 SERIES ACCESSORIES



5401

Closer Body Only

- Full rack and pinion operation
- Triple heat treated steel spindle



5900

Parallel Arm Bracket

- Supplied standard with multimount closers
- Can be used to convert regular or top jamb arms to parallel arm application



5901

Pinion Cap

- Supplied standard
- High-impact, non-corrosive
- Fits over the pinion and extends 1" (25 mm)



5913

Blade Stop Spacer

- Required to lower parallel arm shoe to clear 1/2" (13 mm) blade stop for aluminum frames

5400 SERIES SCREW PACKS



5404

Screw Pack - Standard

- Self-drilling wood screws
- Self-drilling machine screws



5902

SNB Screw Pack - Standard

- Sex nuts and bolts for 1-3/4" (44 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5903

SNB Screw Pack - Optional

- Sex nuts and bolts for 1-3/8" (35 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5904

SNB Screw Pack - Optional

- Sex nuts and bolts for 2" (51 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



5905

SNB Screw Pack - Optional

- Sex nuts and bolts for 2-1/4" (56 mm) doors
- Machine screws
- For use with 5200, 5300, 5400 Series closers only



DOOR CLOSERS

TOUCH UP PAINT



2-659-0093

Door Closer Touch-Up Paint - Aluminum (ALM)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0094

Door Closer Touch-Up Paint - Bronze (BRZ)

- Apply to existing closer covers, arm brackets, and fasteners



2-659-0095

Door Closer Touch-Up Paint - Dark Bronze (DBZ)

- Apply to existing closer covers, arm brackets, and fasteners



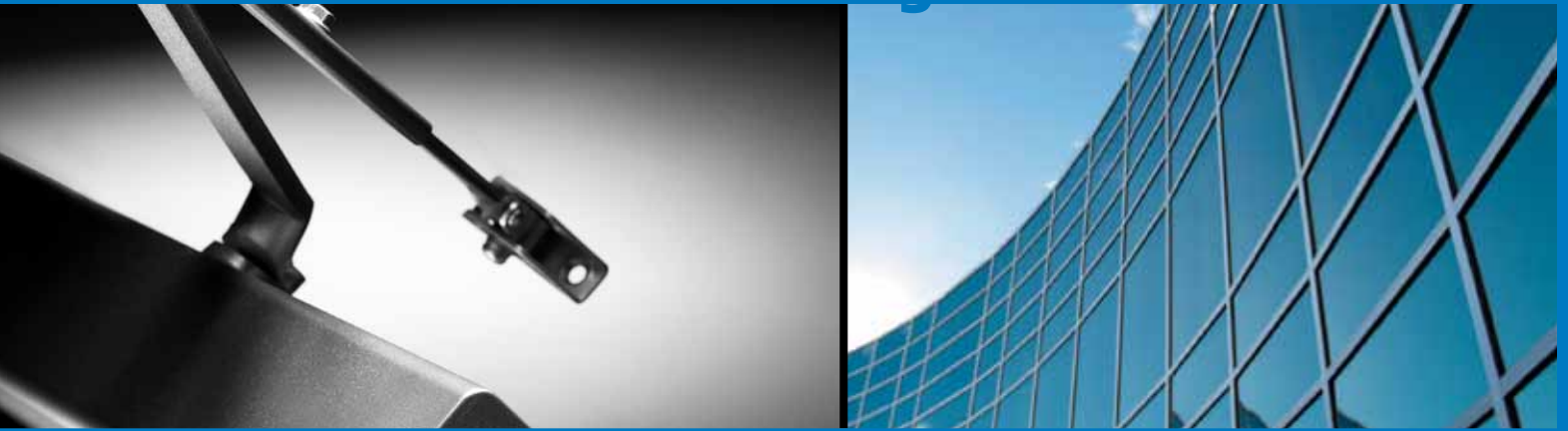
2-659-0096

Door Closer Touch-Up Paint - Gold (GOL)

- Apply to existing closer covers, arm brackets, and fasteners



Electromagnetic Door Holders



Hager electromagnetic door holders are designed for virtually any remote door release application and are ideal for holding doors open until released by a remote or switching device. They are primarily used to hold fire and smoke barrier doors open.

Dual voltage inputs for ease of installation

High holding force to keep the door secure



Very low current draw for energy efficiency



DOOR CLOSERS

ELECTROMAGNETIC DOOR HOLDERS

Performance Data

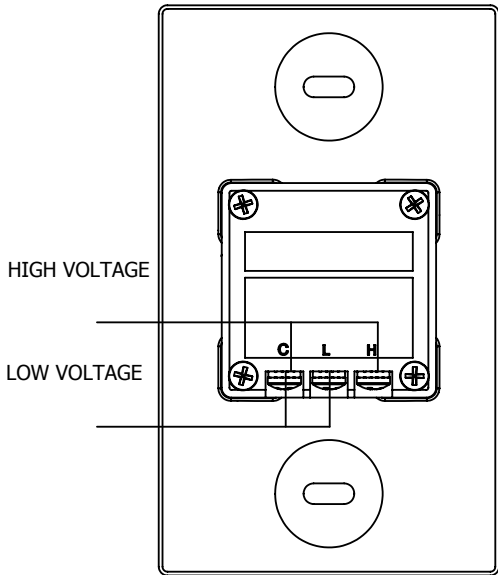
MODEL	VOLTAGE	DC/mA	AC/mA	TERMINALS	LB.	KG.
1224	12V	40	38	C&L	30	13.6
	24V	40	36	C&H	30	13.6
24120	24V	20	19	C&L	40	18.1
	120V		20	C&H	35	15.8
24220	24V	20	19	C&L	20	9.0
	220V		15	C&H	22	9.8

MODEL	VOLTAGE	DC/mA	AC/mA	TERMINALS	LB.	KG.
1224	24V	85	81	C&L	75	34.0
24120	120V		100	C&L	110	49.8

***High Holding Force/Special Applications:**
 To obtain the performance values in the above table, apply high listed voltage to low voltage terminals (C&L).

NOTE: This configuration can only be applied to models 1224 and 24120.

DUAL VOLTAGE (REAR VIEW SHOWN)



EXTENSION ROD/ADJUSTABLE EXTENSION ROD

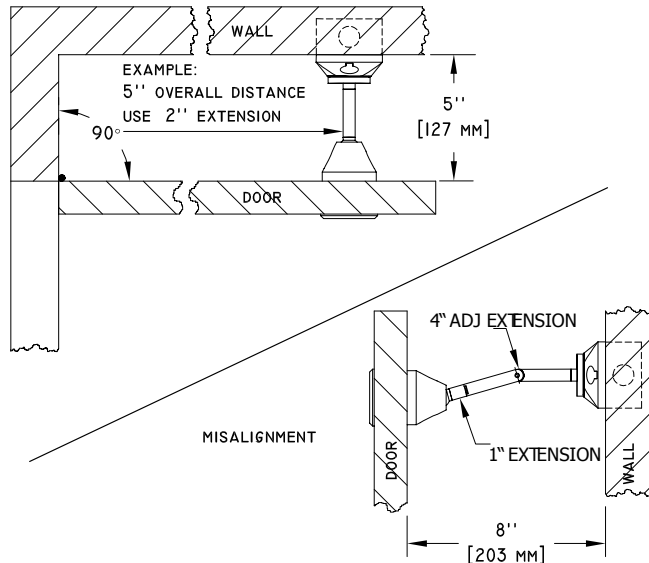
To calculate extension rod length needed, use the formula below based on style holder being used.

Flush mount: Measure distance from door to wall when held at desired opening. Subtract 3" (76 mm) to obtain extension rod length needed.

Recessed mount: Measure distance from door to wall when held at desired opening. Subtract 2-3/8" (60 mm) to obtain extension rod length needed.

Surface mount: Measure distance from door to wall when held at desired opening. Subtract 4-5/8" (117 mm) to obtain extension rod length needed.

See example below using flush mount.





HOW TO ORDER ELECTROMAGNETIC DOOR HOLDERS

380**Product Group**380 - Electromagnetic
Door Holder**F****Mount**F - Flush
G - Floor, Single Door
H - Floor, Double Door
R - Recessed
S - Surface**120024****Voltage**120024 -12/24V
240120 -24/120V
240220 -24/220V**LS****Finish**300 - Plated Brass
LS - Powder Chrome
L2 - Powder Dark Bronze

HOW TO ORDER ACCESSORIES

381**Product Group**

381 - Accessory

E**Specifier**A - Adjustable Extension Rod
B - Surface Back Box
C - Catch Disc
D - Drilling Fixture
E - Extension Rod
H - Mounting Hardware
S - Catch Plate Assembly
W - Extension Wrenches**5****Size (Extension Rods)**5 = 1/2"
1 = 1"
15 = 1-1/2"
2 = 2"
3 = 3"
4 = 4"**LS****Finish**300 - Plated Brass
LS - Powder Chrome
L2 - Powder Dark
Bronze



DOOR CLOSERS



380 Series

Grade 1

Heavy Duty Commercial, Institutional Electromagnetic Door Holder
Ideal for hospitals, hotels, schools, and other commercial buildings

- **One-year warranty**
- **Designed for use with self-closing fire and smoke barrier doors**
- **Low current draw**
- **Fail safe: when electrical current is interrupted, doors release to close automatically**



Certifications:

- UL/ULC listed
- Meets ANSI 156.15 for C00011
- California State Fire Marshall listed (CSFM)
- City of New York MEA approved
- Factory Mutual

Materials:

Zinc alloy

Voltages:

Standard dual voltage AC or DC inputs of 12&24V, 24&120V, 24&220V models

Holding Force:

Typical holding force of 25-40 pounds; performance value can be increased to 110 pounds on special applications

Mount:

Single or double coil floor, surface, flush, and recessed mount

Total Projection:

- Recessed mount: 2-11/32" (60 mm)
- Flush mount: 3-1/16" (78 mm)
- Surface mount: 4-5/8" (117 mm)
- Floor mount (single door): 5" (127 mm)
- Floor mount (double door): 9-5/8" (244 mm)

Fasteners:

Hardware package, mounting bracket

Finishes:

US3, LS, L2

Notes:

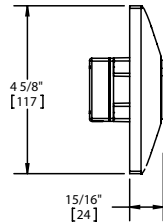
- Optional aluminum extension and misalignment rods available
- Drill fixture available
- Replacement catch disc and catch plate assemblies available
- Adhesive template included



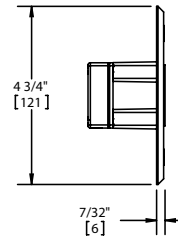


380 SERIES HOLDERS

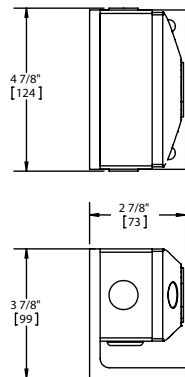
380F
Flush Mount



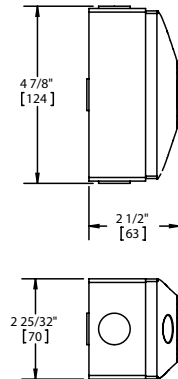
380R
Recessed Mount



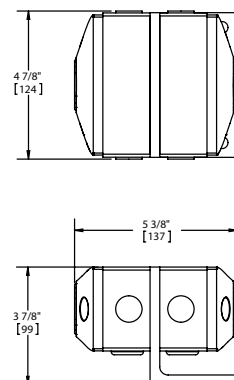
380G
Floor Mount (Single Door)



380S
Surface Mount



380H
Floor Mount (Double Door)





DOOR CLOSERS

380 SERIES ACCESSORIES



381A

Adjustable Extension Rod

Available extension lengths 1-1/2" (38 mm), 2" (51 mm), 4" (102 mm)



381E

Extension Rod

Available extension lengths 1/2" (13 mm), 1" (25 mm), 1-1/2" (38 mm), 2" (51 mm), 3" (76 mm), 4" (102 mm)



381B

Surface Back Box

2-25/32" x 4-7/8" x 1-1/2" (71 mm x 124 mm x 38 mm)
Supplied with 380G, 380H, 380S



381H

Mounting Hardware Package

Includes screws, nuts, concrete anchors, and drill bit



381C

Catch Disc

Replacement for the 381S catch plate assembly



381S

Catch Plate Assembly

Swivel design allows catch disc to move in all directions to assist with slight misalignment issues



381D

Drilling Fixture

Attach to the door for quick and accurate hole locations



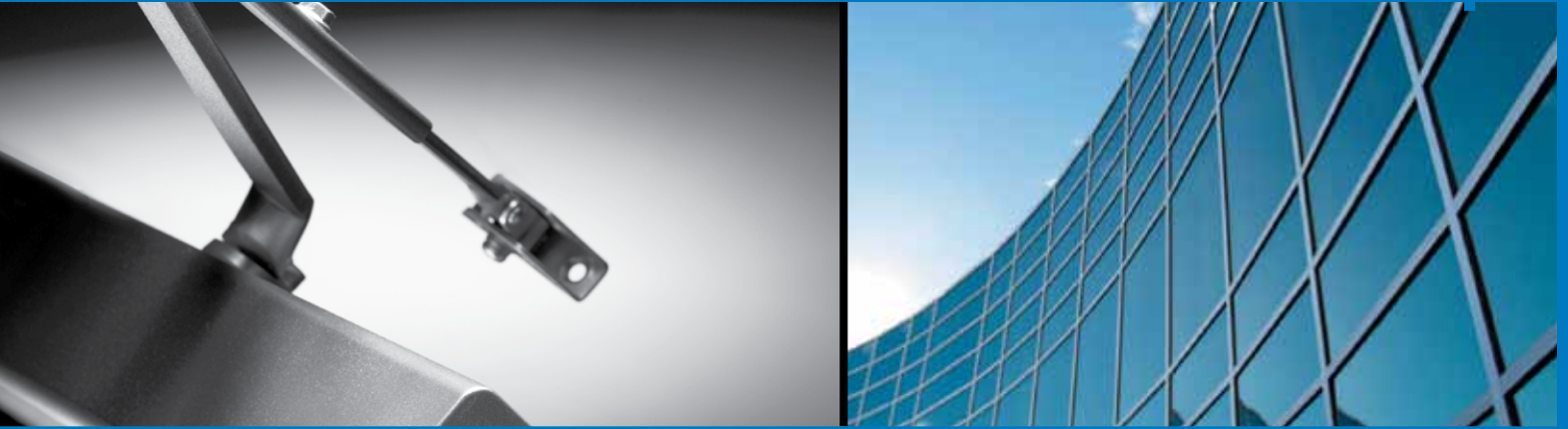
381W

Extension Wrenches

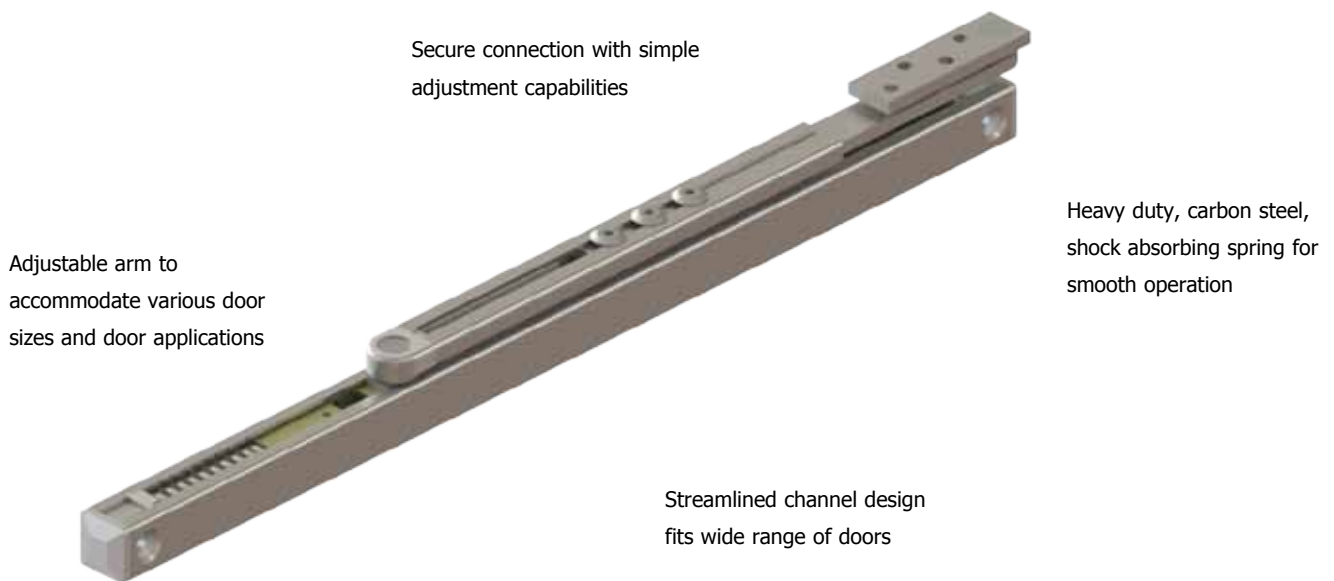
Used to tighten extension rods to catch plate assembly



Overhead Door Holders and Stops



Hager overhead door holders and stops are utilized to control and protect door assemblies. By providing a high quality product with an adjustable arm to simplify installation, Hager Companies continues to be a door hardware industry leader.





DOOR CLOSERS

Hager Companies offers a variety of door hardware products to accommodate virtually all door openings. Overhead door holders and stops are designed to meet the requirements of many door applications. Hager overhead door holders and stops are compatible with a variety of door closers and are ideal for meeting the demands of high traffic areas.

Overhead door holders and stops are mounted at the top of the door, which eliminates tripping hazards and vandalism that are typical of floor or wall mounted stops. These products absorb the abusive shock with a heavy duty spring along with evenly distributing the load and impact along the track of the unit.

It is recommended to utilize overhead door stops and holders on doors furnished with door closers, as closers are not intended to stop the door and should not be expected to perform the functions of a door stop.

ADJUSTABLE ARMS

For inventory and installation simplification of overhead door holders and stops, Hager has developed an adjustable arm to combine door ranges into only two sizes.

METHODS OF INSTALLATION

Concealed Mounted

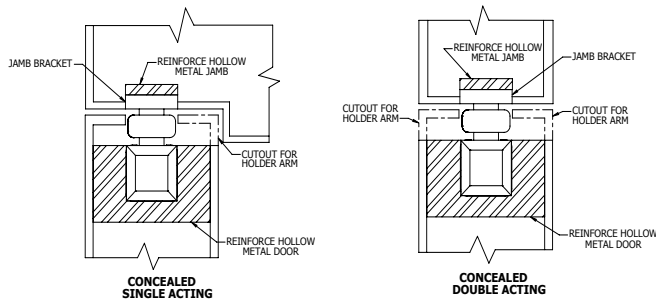
The installation of concealed overhead door holders and stops requires that the jamb bracket be mortised flush with the bottom of the jamb. The arm and channel must be mortised into the door so the arm is flush with the top of the door. Concealing the overhead door holders and stops in the top of the door creates a more attractive architectural look.

Single Acting Door

A cutout made for the arm on the stop side of the single acting door.

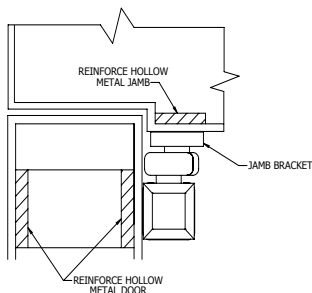
Double Acting Door

Double acting doors require a cutout for the arm on both sides of the door.



Surface Mounted

Surface mounted overhead door holder and stop installation requires the jamb bracket be surface mounted on the stop of the frame. The channel is also surface mounted on the face of the door. Hollow metal doors and jambs must be reinforced to provide necessary strength for the holder specified.





DOOR AND FRAME REINFORCEMENTS

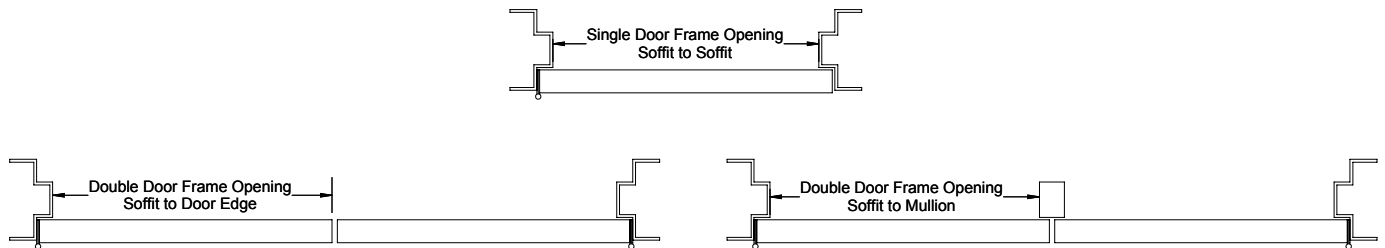
Hollow metal frames must be properly reinforced with 3/16" (5 mm) thick plates/channels that are at least 12" (305 mm) long. Hollow metal doors must be properly reinforced with 3/16" (5 mm) plates that are at least 2-1/2" (64 mm) wide over the length of the device. Templates and installation instructions are available online at www.hagerco.com.

HAGER'S DEFINITION OF "FRAME OPENING"

The "frame opening" is defined as the actual width of the frame, from soffit to soffit, not the width of the door.

Door Sizes - Medium Duty	
Size	Frame Opening
6000 SZ1	18"-33"
6000 SZ2	33"-51"

Door Sizes - Heavy Duty	
Size	Frame Opening
7000 SZ1	23"-39"
7000 SZ2	39"-54"



SELECTING DEGREE OF HOLD OPEN OR STOP

Overhead door holders and stops are designed to function effectively from 85° to 110°. The recommended minimum degree of hold open would be set at 95° to put the door lever, pull, and panic hardware beyond the flow of traffic.

When selecting the degree of hold open for doors opening against a wall or back to back, there is approximately 5° to 7° of spring engagement beyond the hold open or initial stop point, this is the dead stop.

For dead stop templating, the degree of opening should be set 5° to 7° less than the point of required dead stop to accommodate the full compression of the shock absorber.

HOW TO ORDER

60

15

CON

SZ1

US26D

SX1G

Component Type

- 15 - Friction
- 16 - Stop Only
- 17 - Hold Open

Mount

- CON - Concealed
- SRF - Surface

Size

- SZ1 - Size 1
- SZ2 - Size 2

Fastener Options

- SX1G - Sexbolts for 1-3/8" (mm) door
- SX1N - Sexbolts for 1-3/4" (mm) door
- SX2 - Sexbolts for 2" (mm) door
- SX2D - Sexbolts for 2-1/4" (mm) door

Product Group

- 60 - Medium Duty Overhead Door Holders and Stops
- 70 - Heavy Duty Overhead Door Holders and Stops

Finish

- US3 - Bright Brass
- US10B - Satin Bronze
- US26D - Satin Chrome
- US32D - Satin Stainless



DOOR CLOSERS

FUNCTIONS

16 - Stop Only

	<u>Heavy Duty</u>	<u>Medium Duty</u>
Concealed Mounted:	ANSI C01541	ANSI C01542
Surface Mounted:	ANSI C02541	ANSI C02542

The stop only function provides a reliable method of door control. A shock absorbing spring stops the door. It is UL Listed for fire rated components.

UL Classification

The **stop-only** models are classified by Underwriters Laboratories (UL) as Miscellaneous Fire Door Accessories. This classification applies to the use on either hollow metal fire doors or wood fire doors of any rating. The accessories have been investigated to determine that when properly installed with accordance to the manufacturer's instructions, they do not adversely affect the fire rating of the fire door or fire door frames.

17 - Hold Open

	<u>Heavy Duty</u>	<u>Medium Duty</u>
Concealed Mounted:	ANSI C01511	ANSI C01512
Surface Mounted:	ANSI C02511	ANSI C02512

The hold open function provides a selective hold open function with easy to adjust tension. It may be turned on or off and includes the stop only function. It is not for use on fire rated openings.

15 - Friction

	<u>Heavy Duty</u>	<u>Medium Duty</u>
Concealed Mounted:	ANSI C04531	ANSI C04532
Surface Mounted:	ANSI C05531	ANSI C05532

The multi-point friction hold open function mechanism is adjustable for resistance to door movement. It is not for use on fire rated openings.





6000 Series

Grade 2

Medium Duty Overhead Door Holder and Stop

For use on exterior and interior doors

Ideal for office buildings and other medium duty commercial applications

- **Adjustable arm to combine door ranges into two sizes**
- **Five-year warranty**
- **Standard screw pack**

Certifications:

- BHMA Certified ANSI A156.8 - 2005
- UL/cUL Listed for up to 3 hours (stop only)
- UL10C Positive Pressure Rated (stop only)
- UL10B Neutral Pressure Rated (stop only)

Mounting Style:

- Concealed (CON)
- Surface (SRF)

Doors:

- Single acting doors for concealed and surface mounted
- Double acting doors for concealed mounted only

Door Thickness:

- 1-3/4" (44 mm) thick door - Standard
- 1- 3/8"- 2-1/4" (36 mm -57 mm) thick door - Optional

Functions:

- Stop Only (16)
- Hold Open (17)
- Friction (15)

Handing:

Non-handed

Openings:

Degree of opening is fully adjustable and can be adapted to changing needs between 85° to 110°

Materials:

- Steel

Finishes:

- Stainless steel
- US26D, US10B, US3 (for steel)
- US32D (for stainless steel)

Fasteners:

Standard screw packet included for wood or metal door and frame applications

Notes:

- Adjustable arms provide easy installation
- Slide track design
- Adjustable in the field
- Heavy shock absorber spring provides 5° to 7° compression before deadstop
- Special templating upon request

Door Sizes	
Size	Frame Opening
6000 SZ1	18"-33"
6000 SZ2	33"-51"



DOOR CLOSERS

6000 SERIES ACCESSORIES



2-659-0101 | 2-659-0102 | 2-659-0103

Surface Mounted End Cap and Spring Replacement Kit

- Includes channel end caps and replacement spring
- 2-659-0101 is US26D, 2-659-0102 is US10B, 2-659-0103 is US3



2-659-0104

Concealed Mounted End Cap and Spring Replacement Kit

- Includes channel end caps and replacement spring



2-659-0105

Hold Open Replacement Kit

- Hold Open assembly



2-659-0106

Friction Replacement Kit

- Friction assembly

6000 SERIES SCREWPACKS



2-659-0098 | 2-659-0099 | 2-659-0100

Screwpack - Standard

- Includes machine screws, wood screws, sex nuts and bolts for 1-3/4" (44 mm) thick doors, arm set screws, and Allen wrench
- 2-659-0098 is US26D, 2-659-0099 is US10B, 2-659-0100 is US3



2-659-0107 | 2-659-0108 | 2-659-0109

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 1-3/8" (35 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0107 is US26D, 2-659-0108 is US10B, 2-659-0109 is US3



2-659-0110 | 2-659-0111 | 2-659-0112

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 2" (51 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0110 is US26D, 2-659-0111 is US10B, 2-659-0112 is US3



2-659-0113 | 2-659-0114 | 2-659-0115

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 2-1/4" (57 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0113 is US26D, 2-659-0114 is US10B, 2-659-0115 is US3





7000 Series

Grade 1

Heavy Duty Overhead Door Holder and Stop

For use on exterior and interior doors

Ideal for hospitals, schools, and other high traffic environments

- **Adjustable arm to combine door ranges into two sizes**
- **Five-year warranty**
- **Standard screw pack**

Certifications:

- BHMA Certified ANSI A156.8 - 2005
- UL/cUL Listed for up to 3 hours (stop only)
- UL10C Positive Pressure Rated (stop only)
- UL10B Neutral Pressure Rated (stop only)

Mounting Style:

- Concealed (CON)
- Surface (SRF)


Doors:

- Single acting doors for concealed and surface mounted
- Double acting doors for concealed mounted only

Door Thickness:

- 1-3/4" (44 mm) thick door - Standard
- 1- 3/8"- 2-1/4" (36 mm -57 mm) thick door - Optional

Functions:

- Stop Only (16) 
- Hold Open (17)
- Friction (15)

Handing:

Non-handed

Openings:

Degree of opening is fully adjustable and can be adapted to changing needs between 85° to 110°

Materials:

- Steel

Finishes:

- Stainless steel
- US26D, US10B, US3 (for steel)
- US32D (for stainless steel)

Fasteners:

Standard screw packet included for wood or metal door and frame applications

Notes:

- Adjustable arms provide easy installation
- Slide track design
- Adjustable in the field
- Heavy shock absorber spring provides 5° to 7° compression before deadstop
- Special templating upon request

Door Sizes	
Size	Frame Opening
7000 SZ1	23"-39"
7000 SZ2	39"-54"





DOOR CLOSERS

7000 SERIES ACCESSORIES



2-659-0119 | 2-659-0120 | 2-659-0121

Surface Mounted End Cap and Spring Replacement Kit

- Includes channel end caps and replacement spring
- 2-659-0119 is US26D, 2-659-0120 is US10B, 2-659-0121 is US3



2-659-0122
Concealed Mounted End Cap and Spring Replacement Kit

- Includes channel end caps and replacement spring



2-659-0123
Hold Open Replacement Kit

- Hold Open assembly



2-659-0124
Friction Replacement Kit

- Friction assembly

7000 SERIES SCREWPACKS



2-659-0116 | 2-659-0117 | 2-659-0118

Screwpack - Standard

- Includes machine screws, wood screws, sex nuts and bolts for 1-3/4" (44 mm) thick doors, arm adjustment screws, and Allen wrench
- 2-659-0116 is US26D, 2-659-0117 is US10B, 2-659-0118 is US3



2-659-0125 | 2-659-0126 | 2-659-0127

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 1-3/8" (35 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0125 is US26D, 2-659-0126 is US10B, 2-659-0127 is US3



2-659-0128 | 2-659-0129 | 2-659-0130

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 2" (51 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0128 is US26D, 2-659-0129 is US10B, 2-659-0130 is US3



2-659-0131 | 2-659-0132 | 2-659-0133

SNB Screwpack - Optional

- Includes machine screws and sex nuts and bolts for 2-1/4" (57 mm) thick doors
- For use with surface mounted overhead door holders and stops
- 2-659-0131 is US26D, 2-659-0132 is US10B, 2-659-0133 is US3

