

Schedule Of Finish Hardware

May 05, 2026

PROJECT

Name: SCMTC WESTERN TRANSIT CENTER

Address: 461 2ND AVE S
WAITE PARK MN 56304

Phone:

Superintendent:

Engineer:

CONTRACTOR

Name: KNB CONTRACTING LLC

Address: 10464 MONROE AVE NW
SOUTH HAVEN MN 55382

Phone: 320-261-5144

Contact: KAZ HULTGREN

ARCHITECT

Name: OERTEL ARCHITECTS

Address: 1795 SAINT CLAIR AVENUE
ST. PAUL MN 55105

Phone: (651)696-5186

Project Number:

HARDWARE SUPPLIER

Project Manager: MARCUS ANDERSON



TWIN CITY HARDWARE
723 HADLEY AVE N

OAKDALE MN 55128

651-735-2200

Fax:


SCMTC WESTERN TRANSIT CENTER

Control No.53233

MSA53233

Submitted By: MARCUS ANDERSON

May 05, 2026

Project Name Metro Bus Transit Station		
<input type="checkbox"/> APPROVED	<input type="checkbox"/> REJECTED	
<input checked="" type="checkbox"/> For Review	<input type="checkbox"/> NOT REVIEWED	
BY Ryan DATE		
SUBMITTAL# SPEC		

This review is only for general conformance of the project and general compliance. Corrections or comments made on these drawings during this review do not relieve Contractor/Subcontractor from compliance with the requirements of the plans and specifications. Contractor is responsible for all dimensions and fabrication to be confirmed and correlated at the job site

HARDWARE SCHEDULE

Heading 01

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
109		1	SGL	DOOR	106 TO 109	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90
110		1	SGL	DOOR	106 TO 110	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90

Arch Set Name: 01

2 Openings - Each to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	MORTISE LOCK	L9050.R.06.A.626.10-072.134.LIP1-3/16.MK.BAA		626	SAN
1	EA	WALL STOP	WS406/407-CCV		US32D	IVE



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HARDWARE SCHEDULE

Heading 02

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
103		1	SGL	DOOR	102 TO 103	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90
114		1	SGL	DOOR	113 TO 114	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90
115		1	SGL	DOOR	113 TO 115	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90
116		1	SGL	DOOR	113 TO 116	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90

Arch Set Name: 02

4 Openings - Each to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	MORTISE LOCK	L9056.R.06.A.626.10-072.134.LIP1-3/16.OS-OCC.IS-LOC.MK. BAA		626	SAN
1	EA	CLOSER, REGULAR ARM	4050A.RWPA.689		689	LCN
1	EA	KICK PLATE	8400 10 X 34 X B-CS		US32D	IVE
1	EA	WALL STOP	WS406/407-CCV		US32D	IVE



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HARDWARE SCHEDULE

Heading 03

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
112		1	SGL	DOOR	106 TO 112	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90
117		1	SGL	DOOR	113 TO 117	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90

Arch Set Name: 03

2 Openings - Each to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	MORTISE LOCK	L9080.R.06.A.626.10-072.134.LIP1-3/16.MK.BAA		626	SAN
1	EA	WALL STOP	WS406/407-CCV		US32D	IVE



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HARDWARE SCHEDULE

Heading 04

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Deg Act/InAct
111		1	PR	DOORS	EXT FROM 111	3-0/3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RHRA	90/90

Arch Set Name: 04

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfr
6	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5 X NRP	BOTH	630	IVE
2	EA	FLUSH BOLT, AUTOMATIC, EXTENSION	FB51P-12-MD	INACT	US32D	IVE
1	EA	DUST PROOF STRIKE	DP2		US26D	IVE
1	EA	MORTISE LOCK	L9080.R.06.A.626.10-072.134.LIP1-3/16.MK.BAA	BOTH	626	SAN
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104F	INACT	US32D	GLY
1	EA	CLOSER, PARALLEL ARM	4050A.SHCUSH.689	ACT	689	LCN
2	EA	KICK PLATE	8400 10 X 35 X B-CS		US32D	IVE
1	EA	WEATHER STRIPPING	429AA-S X 72 X 84			ZER
2	EA	DOOR SWEEP	8198AA X 36 W			ZER
1	EA	THRESHOLD	8655A X 72			ZER
1	EA	DRIP CAP	142AA X 76			ZER



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HARDWARE SCHEDULE

Heading 05

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
106B		1	SGL	DOOR	102 TO 106	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90
108A		1	SGL	DOOR	102 TO 108	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LH	90

Arch Set Name: 05

2 Openings - Each to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	ELECTRIC POWER TRANSFER	EPT 10 X BAA		SP28	VON
1	EA	ELECTRIC MORTISE LOCK	L9092EU.R.06.A.626.10-072.134.LIP1-3/16.CON.MK.BAA		626	SAN
1	EA	CLOSER, REGULAR ARM	4050A.RWPA.689		689	LCN
1	EA	KICK PLATE	8400 10 X 34 X B-CS		US32D	IVE
1	EA	WALL STOP	WS406/407-CCV		US32D	IVE
1	EA	GASKETING, CATEGORY G	188S-BK 17' PSA		BK	ZER
1	EA	POWER SUPPLY	PS902 X 900-2RS			VON



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HARDWARE SCHEDULE

Heading 06

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
101B		1	SGL	DOOR	EXT FROM 101	3-0 x 8-0 x 1 3/4 ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	LHR	90

Arch Set Name: 06

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
1	EA	ELECTRIC CONTINUOUS HINGE	112HD X 95 X EPT X [EPT C/L @ 30]		US28	IVE
1	EA	ELECTRIC POWER TRANSFER	EPT 10 X BAA		SP28	VON
1	EA	RIM EXIT DEVICE	MEL-25-R-DT X 512DT(US32D) X 3'-0 DEVICE X 299		US32D/ US26D	FAL
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER	4050A.EDA.689		689	LCN
1	EA	DOOR SWEEP	8198AA X 36 W			ZER
1	EA	THRESHOLD	8655A X 36			ZER
1	EA	DRIP CAP	142AA X 40			ZER
1	EA	POWER SUPPLY	PS902 X 900-2RS			VON



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HARDWARE SCHEDULE

Heading 07

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
113A		1	SGL	DOOR	EXT FROM 113	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	LHR	90

Arch Set Name: 07

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5 X NRP		630	IVE
1	EA	ELECTRIC POWER TRANSFER	EPT 10 X BAA		SP28	VON
1	EA	RIM EXIT DEVICE	MEL-25-R-NL X 512NL(US32D) X 3'-0 DEVICE X 299		US32D/ US26D	FAL
1	EA	MORTISE CYLINDER	26-091.626.112.MK		626	SAN
1	EA	CLOSER, PARALLEL ARM	4050A.SCUSH.689		689	LCN
1	EA	KICK PLATE	8400 10 X 34 X B-CS		US32D	IVE
1	EA	WEATHER STRIPPING	429AA-S X 36 X 84			ZER
1	EA	DOOR SWEEP	8198AA X 36 W			ZER
1	EA	THRESHOLD	8655A X 36			ZER
1	EA	DRIP CAP	142AA X 40			ZER
1	EA	POWER SUPPLY	PS902 X 900-2RS			VON



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HARDWARE SCHEDULE

Heading 08

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
101A		1	SGL	DOOR	EXT FROM 101	3'-0" x 8'-0" x 1 3/4" ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	RHR	90

Arch Set Name: 08

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfr
1	EA	ELECTRIC CONTINUOUS HINGE	112HD X 95 X EPT X [EPT C/L @ 30]		US28	IVE
1	EA	ELECTRIC POWER TRANSFER	EPT 10 X BAA		SP28	VON
1	EA	RIM EXIT DEVICE	MEL-25-R-NL X 512NL(US32D) X 3'-0" DEVICE X 299		US32D/ US26D	FAL
0	EA	MORTISE CYLINDER	26-091.626.112.MK		626	SAN
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER, AUTO OPERATOR	4642.REGARM.689.MC		689	LCN
1	EA	DOOR SWEEP	8198AA X 36 W			ZER
1	EA	THRESHOLD	8655A X 36			ZER
2	EA	ACTUATOR	8310-853.630		630	LCN
1	EA	DRIP CAP	142AA X 40			ZER
1	EA	POWER SUPPLY	PS902 X 900-2RS			VON



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HARDWARE SCHEDULE

Heading 09

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
102		1	SGL	DOOR	EXT FROM 102	3-0 x 8-0 x 1 3/4 ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	LHR	90
106A		1	SGL	DOOR	EXT FROM 106	3-0 x 8-0 x 1 3/4 ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	RHR	90

Arch Set Name: 09

2 Openings - Each to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
1	EA	ELECTRIC CONTINUOUS HINGE	112HD X 95 X EPT X [EPT C/L @ 30]		US28	IVE
1	EA	ELECTRIC POWER TRANSFER	EPT 10 X BAA		SP28	VON
1	EA	RIM EXIT DEVICE	MEL-25-R-NL X 512NL(US32D) X 3'-0 DEVICE X 299		US32D/ US26D	FAL
0	EA	MORTISE CYLINDER	26-091.626.112.MK		626	SAN
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER	4050A.EDA.689		689	LCN
1	EA	DOOR SWEEP	8198AA X 36 W			ZER
1	EA	THRESHOLD	8655A X 36			ZER
1	EA	DRIP CAP	142AA X 40			ZER
1	EA	POWER SUPPLY	PS902 X 900-2RS			VON



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HARDWARE SCHEDULE

Heading 10

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
101D		1	SGL	DOOR	101 FROM 102	3-0 x 8-0 x 1 3/4 ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	RHR	90

Arch Set Name: 10

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfg
1	EA	CONTINUOUS HINGE	112HD X 95		US28	IVE
1	EA	EXIT DEVICE TRIM ONLY	512DT (R V M C)		US32D	FAL
1	EA	PUSH BAR	250DT		US26D	FAL
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER, AUTO OPERATOR	4642.REGARM.689.MC		689	LCN
2	EA	ACTUATOR	8310-853.630		630	LCN



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HARDWARE SCHEDULE

Heading 11

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
101C		1	SGL	DOOR	101 FROM 102	3-0 x 8-0 x 1 3/4 ALD Door/ ALF Frame NON-RTD Door/NON-RTD Frame	LHR	90

Arch Set Name: 11

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
1	EA	CONTINUOUS HINGE	112HD X 95		US28	IVE
1	EA	EXIT DEVICE TRIM ONLY	512DT (R V M C)		US32D	FAL
1	EA	PUSH BAR	250DT		US26D	FAL
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER	4050A.EDA.689		689	LCN



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HARDWARE SCHEDULE

Heading 12

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
113B		1	SGL	DOOR	106 TO 113	3-0 x 7-0 x 1 3/4 HMD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90

Arch Set Name: 12

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	PUSH PLATE	8200 X 6 X 16		US32D	IVE
1	EA	PULL PLATE	8303-0 X 4 X 16		US32D	IVE
1	EA	CLOSER, REGULAR ARM	4050A.RWPA.689		689	LCN
1	EA	KICK PLATE	8400 10 X 34 X B-CS		US32D	IVE
1	EA	WALL STOP	WS406/407-CCV		US32D	IVE



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HARDWARE SCHEDULE

Heading 13

Mark	KeyGroup	Qty	Mode	Description	Location	Size / Material / Rating	Hand	Degree
108B		1	SGL	DOOR	106 TO 108	3-0 x 7-0 x 1 3/4 WD Door/ HMF Frame NON-RTD Door/NON-RTD Frame	RH	90

Arch Set Name: 13

Opening to receive:

Qty	UM	Type	Description	Attached To	Finish	Mfgr
3	EA	HINGE, 4 1/2, STD WT	BAA 5BB1 X 4.5 X 4.5		652	IVE
1	EA	PUSH PLATE	8200 X 6 X 16		US32D	IVE
1	EA	PULL PLATE	8303-0 X 4 X 16		US32D	IVE
1	EA	OVERHEAD STOP/HOLDER, CONCEALED	104S		US32D	GLY
1	EA	CLOSER, REGULAR ARM	4050A.RWPA.689		689	LCN
1	EA	KICK PLATE	8400 10 X 34 X B-CS		US32D	IVE



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HARDWARE SCHEDULE

End of Schedule



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25-R Series

Rim device

Panic exit hardware

The Falcon 25-R Series rim device meets the demanding requirements of high traffic installations with a single-point, rim type latch and a streamlined touch bar design. This device can also be electrified for maximum ease of use and accessibility.



299 Strike



2789
Dogging key



Cylinder dogging

Single door application

Device	Door size	Door strike	Door stile (in)	Min door opening width
25-R	3'	299	4"	2' 7 1/2"
		264	3 7/8"	2' 7 3/8"
		1439	3 1/4"	2' 6 3/4"
		1606	3 5/8"	2' 7 1/8"
25-R	4'	299	4"	3' 1 1/2"
		264	3 7/8"	3' 1 3/8"
		1439	3 1/4"	3' 3/4"
		1606	3 5/8"	3' 1 1/8"

Double door application

Device	Door size	Strike x mullion	Door stile (in)	Min door opening width
25-R	3'	299 x 2923	4 1/8"	2' 7 1/2"
		299 x 4023	4 3/8"	2' 7 1/2"
		264 x 2923	4"	2' 7 3/8"
		264 x 4023	4 1/4"	2' 7 3/8"
		1439 x 2923	3 7/8"	2' 7 1/4"
		1439 x 4023	4 1/8"	2' 7 1/4"
		1606 x 2923	4 1/4"	2' 7 1/8"
		1606 x 4023	4 1/2"	2' 7 1/8"
25-R	4'	299 x 2923	4 1/8"	3' 1 1/2"
		299 x 4023	4 3/8"	3' 1 1/2"
		264 x 2923	4"	3' 1 3/8"
		264 x 4023	4 1/4"	3' 1 3/8"
		1439 x 2923	3 7/8"	3' 1 1/4"
		1439 x 4023	4 1/8"	3' 1 1/4"
		1606 x 2923	4 1/4"	3' 1 1/8"
		1606 x 4023	4 1/2"	3' 1 1/8"
25-Vx 25-R	3'	1609	3 1/2"	2' 7 5/8" for 3 1/2" Min stile
25-Vx 25-R	4'	1609	3 1/2"	3' 1 5/8" for 3 1/2" Min stile

Specifications

Hand:	Non-handed
Finishes:	US3 (605); US4 (606); US10 (612); US11 (643e); US15 (619); US19 (622); US26 (625); US26D (626); US32 (629); US32D (630); US28 (628), 313AN (710) (see page 17 for finishes)
Strikes:	299 strike standard (see page 15 for additional info)
Latchbolt:	Stainless steel, 3/4" throw
Deadlocking latchbolt:	Standard
Dogging feature:	Half turn hex dogging standard. No threaded parts to wear out
Cylinder dogging:	Specify "CD" prefix. Uses 1 1/8" long mortise cylinder with standard cam
Double cylinder – classroom security:	Available with L function for 25-R-L less dogging and F-25-R-L devices only. Specify handing. Cylinders sold separately. See price book for compatible cylinder options.
Stock sizes:	See chart to left; cut to size in the field
Doors:	1 3/4" thick, wood or metal. Specify thickness if other than 1 3/4".
Projections:	2 3/4" maximum, 2" dogged
Mounting height:	40 1/4" from CL to finished floor
Electric functions:	Can be interfaced with building security systems. Motorized electric latch retraction (fail secure only), FSA/FSE trim, security monitoring, delayed egress and exit alarm available
Fasteners:	All mounting screws are concealed, sheet metal screws and machine screws standard.
Sex bolts:	Recommended when device is used with hollow core wood, composite or light gauge hollow metal doors. For EO device, specify 8 – 425 (#10-24) SNB. For devices with trim, specify 2 – 425 (#10-24) SNB.
ANSI:	Certified ANSI A156.3-2001 grade 1 standards
Center case and working parts:	Center case is heavy wrought and sintered metal parts
Shim kits:	For glass lite applications; 1/4" thick, specify SK25-RM
579 Strike retrofit kit:	Consult factory

25 Series

Strikes and accessories

Strikes

at hollow metal doors

For rim devices



264
2 7/8" x 1 1/4" x 9/16"
(H x W x D)
Panic device only.



299
7 7/8" x 1 1/4" x 13/16"
(H x W x D)
Panic device only.



299F
2 7/8" x 1 1/4" x 13/16"
(H x W x D)



499F
3 5/8" x 1 1/2" x 16/16"
(H x W x D)



1439 Blade stop
1 3/4" x 1 7/8" x 1/2"
(H x W x D)
Panic device only.



1606
2 7/8" x 1 3/8" x 3/8"
(H x W x D)
Panic device only.



1609
3 1/4" x 1 1/16" x 3/8"
(H x W x D)
Requires coordinator.
Panic device only.

at aluminum doors

For surface and concealed vertical rod devices



2130
(F)25-V and (F)25-C
standard bottom strike for
grouting into concrete or
masonry floors.



3788
Furnished top
of (F)25-V.



4155
Optional strike.
Panic device only.

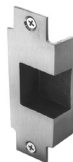


4188
Top strike for
(F)25-C.

For mortise lock devices

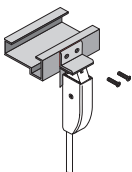


1279
Closed strike used on
single doors and on fire
exit hardware doors with
coordinator.



F1280
Open back strike used on pairs of
1 3/4" doors without astragal or
coordinator. Can be used on stock
hollow metal doors. F1280 "B" label
(1 1/2 hr.) stainless steel strike
available.

Accessories



4215
Angle bracket for flush transom applications.
Does not require elimination of latch retention
feature. Accepts 3788 strike for 25-V device.

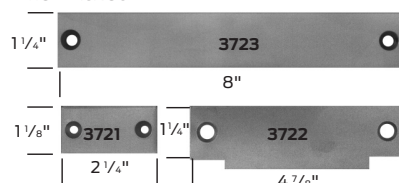
Surface vertical extension rods

Extension rods are
available in 12", 24"
and 36" lengths in
all finishes. Both
ends tapped and
all-thread included
as connector.

Concealed extension rods

Extension rods are
available in 12", 24"
and 36". Both ends
have pressed-in,
threaded inserts.

Filler Plates



3721/ 3722/ 3723
Steel filler plates

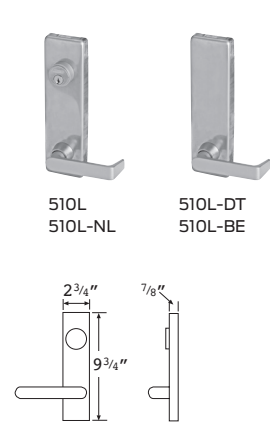
3721 Cylindrical lock front filler
3722 Strike filler - set no. SC for 161 cutout
3723 Mortise lock front filler
3722 Strike filler - set no. SM for 86 cutout

25 Series

Trim designs

Functionality built into the trim, facilitating easy door preps, easy field retrofit and easy ordering.

Lever trims (510L)



Lever designs



Avalon (AVA)
Projection 3 1/4"



Quantum (QUA)
Projection 3 1/4"



Dane (DAN)
Projection 3"



Broadway (BRW)
Projection 3 1/5"



Boardwalk (BRK)
Projection 3 1/5"



Danish (DSH)
Projection 2 9/10"



Latitude (LAT)
Projection 3 1/10"



Longitude (LON)
Projection 3 1/10"



Sutro (SUT)
Projection 3 1/4"

All levers return to within 1/2" of door.

Escutcheon: 9 3/4" (H) x 2 3/4" (W) (specify handing) brass finish.

Protected by easily replaceable shear pin.

Lever is reversible, supplied RHR if not specified. For keyed functions, see page 14 for cylinder requirements.

Vandal - resistant lever trims (511L)

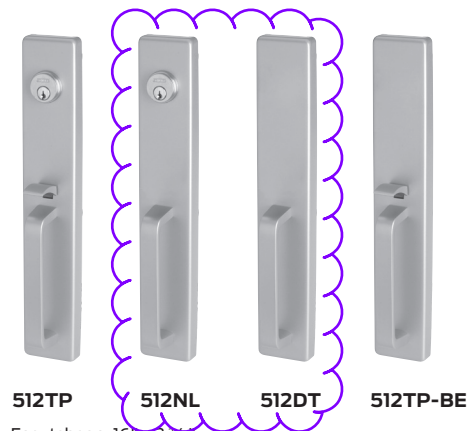


Provides resistance to rotation, making damage of trim due to attack from the outside less likely.

Designed to operate normally after vandalism attempts without the need for maintenance personnel intervention.

- Heavy duty, vandal-resistant, ANSI A156.3 grade 1 security trim
- Lever deflects up to 22 ft-lb for a minimum of 10,000 vandal-resistant cycles
- Vandal resistance is present in both lever rotation directions
- After lever is fully deflected, lever stops rotating and a shear pin breaks at 70 ft-lb to prevent damage to unit
- Available on 25 rim, vertical, mortise, and concealed devices
- Retrofits all existing 25 trim without additional door prep
- Works with all electric lock and unlock functions
- Available in all finishes and lever designs including Avalon, Boardwalk, Broadway, Dane, Danish, Latitude, Longitude, Sutro, and Quantum

Pull trims (512)



Escutcheon: 16" x 2 3/4"
Grip: 6 1/4" C-C
Projection: 2 11/16"
Brass
For keyed functions, see page 14 for cylinder requirements.

Delta (717)



717DT

Knob trims (513K)



513K-DT
513K-BE
513K
513K-NL

Round ball knob
Escutcheon: 9 3/4" x 2 3/4"
Projection: 4"
Brass

For keyed functions, see page 14 for cylinder requirements.

Cylinder only (NL-OP)

Key retracts latch bolt.
Cylinder sold separately
(see page 14).













25 Series

Trim chart and finish chart

Function

	Lock/ unlock	NL	DT	BE	FSA/ FSE
Lever (510)	510L	510L-NL	510-DT	510L-BE	510L-FSA 510L-FSE
Vandal-resistant lever (511)	511L	—	—	—	511L-FSA 511L-FSE
Pull trims (512)	512TP	512-NL	512DT	512TP-BE	512L-FSA 512L-FSE
Knob (513)	513K	513K-NL	513K-DT	513K-BE	513L-FSA 513L-FSE
Delta (717)	—	—	717DT	—	—

25 Series finishes


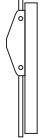


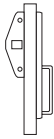
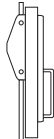
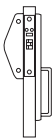

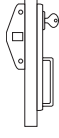
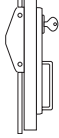
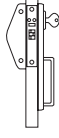
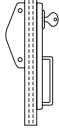
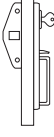
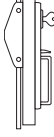
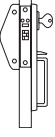
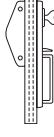
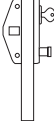
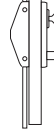
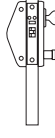
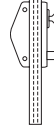
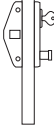
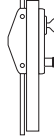
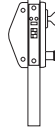
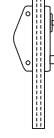
	Color	US number	BHMA number
	Brass, bright	US3	605
	Brass, satin	US4	606
	Bronze, satin	US10	612
	Bronze, aged	US11	643e*
	Nickel, satin	US15	619*
	Black, matte	US19	622*
	Chromium, bright	US26	625
	Chromium, satin	US26D	626
	Anodized aluminum	US28	628
	Stainless Steel, bright	US32	629
	Stainless Steel, satin	US32D	630
	Anodized duranodic	313AN	710

*Available on select devices and trims

25 Series

Types and functions

This page shows all 25 Series device and trim functions.

	Rim device ANSI type 1	Vertical rod device ANSI type 2	Mortise lock device ANSI type 3	Concealed vertical rod device ANSI type 8
Functions (ANSI)				
EO (01) Exit only, no trim.				
	25-R-EO	25-V-EO	25-M-EO	25-C-EO
DT (02) Entrance by trim when actuating bar is locked down.				
	25-R-DT	25-V-DT	25-M-DT	25-C-DT
NL (03) Entrance by trim when latchbolt is retracted by key. Key removable only when locked.				
	25-R-NL	25-V-NL	25-M-NL	25-C-NL
TP (05) Entrance by thumbpiece. Key locks or unlocks thumbpiece.				
	25-R-TP	25-V-TP	25-M-TP	25-C-TP
L or K (08) Entrance by knob or lever. Key locks or unlocks knob.				
	25-R-L/K	25-V-L/K	25-M-L/K	25-C-L/K
L(NL) or K(NL) (03) Entrance by knob or lever when latchbolt is retracted by key. Lever/knob is rigid. Key removable only when locked.				
	25-R-L/K(NL)	25-V-L/K(NL)	25-M-L/K(NL)	25-C-L/K(NL)

Motorized electric latch retraction

Motorized electric latch retraction for 24 and 25 Series devices

Motorized electric latch retraction (MEL) provides energy efficient electronic control of an exit device for an affordable around the door solution. The MEL option is Falcon's solution of choice for multifamily and commercial real estate facilities where cost competitive electromechanical latch retraction is desired. It is available on most Falcon 24 and 25 Series exit devices (not available for mortise 25-M or F-25-M).

These devices always provide mechanical egress. Motorized electric latch retraction can be used with credential readers to unlatch doors momentarily for authorized users, or it can be incorporated with systems to retract latches for extended periods of time to allow free entry. This is a convenient alternative to mechanical dogging. Doors with automatic operators also may use exit devices with electric latch retraction.

The MEL option is available on panic and fire rated devices. Because fire exit hardware must be self latching, an automatic fire alarm system must be incorporated to drop power to fire rated MEL devices in case of fire.

Features and benefits

- MEL option available on 24 and 25 Series exit devices, except 25-M (mortise)
- Energy efficient motorized latch retraction enables longer wire runs and the use of a standard Schlage power supply with option board (see page 33)
- Modular design allows for a simplified installation of the available MEL Conversion kit to existing mechanical Falcon 24 or 25 exit devices
- On-board installation and troubleshooting diagnostics built into the motor assembly
- Self-calibrating motor assembly
- Pushbar is pulled in electronically when dogged
- Vandal resistant – detects and responds to events of attack and tampering



MEL system requirements

The MEL has a low inrush current = 1.0 amps, so it can be used with standard Schlage power supplies. When powering multiple components, verify that the amperage requirement of all components combined does not exceed the power supply output rating.

- The MEL device is compatible with the following equipment: PS900 Series power supplies - PS902, 904, 906, 914; 900 Series Option Boards - 900-2RS, 900-4R and 900-4RL
- A power transfer (EPT, electrified hinge, or door loop) is required and sold separately

Compatible options

- Security monitoring (DM, LM, RX)
- Fail Safe/Fail Secure electric trim (FSA/FSE)

How to order:

- To order the MEL feature add "MEL" prefix to device designation (example: MEL-25-R-EO)¹
- To order the MEL feature with Allegion Connect, add "MEL" prefix and "CON" suffix to device designation
- To order the MEL conversion kit, please specify finish with part number (US3, US4, US10, US26, US26D, US32D, SP28, SP313)²

1. Mechanical dogging is not an option with MEL.

2. MEL kits may not be used to convert an EL device. MEL conversion kits are only compatible with mechanical Falcon 24 and 25 series exit devices.

Model no.	Description	Part number	Part number with Allegion Connect (-CON)
25-MELK-3	25 Motorized electric latch retraction kit 3'	47266630	47266630
25-MELK-4	25 Motorized electric latch retraction kit 4'	47266631	47266631
24-MELK-3	24 Motorized electric latch retraction kit 3'	47266632	47266632
24-MELK-4	24 Motorized electric latch retraction kit 4'	47266633	47266633

Application and wiring

Power supply PS902-2RS

120/240 VAC

900-2RS option card

SC I1 O1 I2 O2 GND

EPT-2/EPT-10

MEL #2

Input #2
(Required for independent operation only)

EPT-2/EPT-10

MEL #1

Input #1

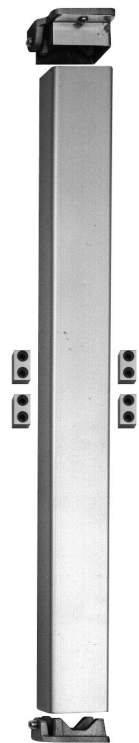
Device	Door size	Door strike	Minimum door opening width (Add 3.5" to standard)
MEL-24-R	3'	299	2' 11"
		264	2' 10 ⁷ / ₈ "
		1439	2' 10 ¹ / ₄ "
		1606	2' 10 ⁵ / ₈ "
MEL-24-R	4'	299	3' 5"
		264	3' 4 ⁷ / ₈ "
		1439	3' 4 ¹ / ₄ "
		1606	3' 4 ⁵ / ₈ "
MEL-24-C	3'	All	2' 10 ⁵ / ₈ "
MEL-24-C	4'	All	3' 4 ⁵ / ₈ "
MEL-24-V	3'	All	2' 10 ⁵ / ₈ "
MEL-24-V	4'	All	3' 4 ⁵ / ₈ "
MEL-25-R	3'	299	2' 11"
		264	2' 10 ⁷ / ₈ "
		1439	2' 10 ¹ / ₄ "
		1606	2' 10 ⁵ / ₈ "
MEL-25-R	4'	299	3' 5"
		264	3' 4 ⁷ / ₈ "
		1439	3' 4 ¹ / ₄ "
		1606	3' 4 ⁵ / ₈ "
MEL-25-C	3'	All	2' 10 ⁵ / ₈ "
MEL-25-C	4'	All	3' 4 ⁵ / ₈ "
MEL-25-V	3'	All	2' 10 ⁵ / ₈ "
MEL-25-V	4'	All	3' 4 ⁵ / ₈ "

EPT can be used for:	EPT cannot be used for:
Door thickness - 1 3/4" minimum	1 1/2" offset pivots
0-180 degree opening with up to 5" butt hinges ¹	Larger than 6" butt hinges
0-130 degree opening with up to 5 1/2" butt hinges ¹	Pocket pivots
0-110 degree opening with up to 6" butt hinges ¹	Swing clear hinges
0-180 degree opening with up to 3/4" offset pivots ¹	Center hung doors (center pivot)
	Balanced door

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25 Series

Accessories and options



F-4023 Shown

Removable mullion

- The 2923, F4023, 4023, KRF-4023 and KR-4023 steel mullions are for use with the 25-R devices on double door openings.
Advantage: Increased security and tighter closure. Minimizes door warpage and sag. Regulates the flow of in-and-out traffic
- Falcon removable mullions are easily removed and reinstalled for full width access
- Rim devices are used on both leaves, attaining a perfectly symmetrical opening
- The mullion assembly consists of a mullion, top and bottom mounting brackets and a screw pack
- The F4023 and KRF-4023 fire-rated mullions also include four stabilizer blocks as required for labeled installations
- Strikes are not furnished with the mullion. Please see page 15 for strike information
- Mullions may be cut on the job for doors under stock lengths
- KR Mullions require 1 1/4" mortise cylinder with standard A cam

Mullion features

- Mullion fittings - ductile iron
- F4023, 4023, KRF-4023 and KR-4023 - 2" x 3" x height
- 2923 mullion - 1 1/2" x 2 1/2" x height
- Prime coat only
- 7' or 8' door opening standard, other door opening as specified

Cylinders

- Cylinder supplied only when specified
- Cylinders keyed different

Sex bolts

- 325 (1/4"-20 thread)
- 425 (#10-24 thread)

Dummy touch bars

- Active and Inactive models only. Active model offered with RX or RX/KOR. Consult factory for details
- To order, specify 250DT X finish, or 250DT X finish X active touch bar

(F)25-R Double door application

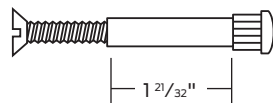
Strike	Installed with mullion	Min stile	B*
299	2923	4 1/8"	3"
299	4023	4 3/8"	3 1/4"
499-F	F-4023	4 1/2"	3 5/16"
264	2923	4"	2 7/8"
264	4023	4 1/4"	3 1/8"
1439	2923	3 7/8"	2 3/4"
1439	4023	4 1/8"	3"
1606	2923	4 1/4"	2 5/8"
1606	4023	4 1/2"	2 7/8"
1609	Surface 25-V	4"	2 3/8"

Cylinder reference

Device	Trim	Standard key cylinder	IC key cylinder
25 Series device	Cylinder dogging	985 - 1 1/8" Mortise (#4 cam)	C987 - 1 3/8" Mortise #5 cam (Blocking ring plus security collar must equal 1/4" thick)
25 Series device Rim & surface vertical	Cylinder only (NL - OP)	951- Rim cylinder	953 - Rim cylinder
25 Series device Mortise	Cylinder only (NL - OP)	* 986 - 1 1/4" Mortise (#4 cam)	** C987 - 1 3/8" Mortise (#5 cam)
25 Series trims	L, K, TP, NL	986 - 1 1/4" Mortise (#4 cam)	C987 - 1 3/8" Mortise (#5 cam)
25 Series trims concealed	718C, 718NL	986 - 1 1/4" Mortise cylinder	N/A
KR4023 mullion	N/A	986 - 1 1/4" Mortise cylinder (use Schlage B520-731 cam or similar)	C987 (#5 cam, 1/8" blocking ring)

*Cylinder must be spaced off of the door a minimum of 1/4" via a recessed blocking ring

** Cylinder must be spaced off of the door a minimum of 3/8" via a recessed blocking ring.



100 Series concealed overhead door holders/stops



100 Series heavy-duty

Glynn-Johnson offers a complete line of overhead door holders and stops, accommodating virtually all openings with solutions for even the most complex door control problems. These concealed holders and stops provide the most attractive and reliable heavy-duty door control available.

Glynn-Johnson 100 Series holders and stops provide the most reliable and versatile concealed overhead door control. They are designed for installation on virtually all types of doors mounted on conventional type butt hinges, pivots, continuous hinges, swing clear hinges and numerous other specialty hinges. When used in conjunction with many surface-applied door closers, 100 Series holders and stops provide the most effective control for entrance doors and vestibule doors of all types, as well as heavy or often used interior doors. Templates provided allow for variable mounting positions, ranging from 85° - 110° of opening.

Five models:

- 100H Series hold-open model
- 100HP Series internal hold-open model
- 100F Series friction hold-open model
- 100S Series stop-only model
- 100SE Series special stop-only model

Six sizes:

- Each model comes in six sizes.
- Simple
- Standardized

Three options:

- ADJ—Adjustable jamb bracket
- CJ—Jamb Bracket for use with LCN 5030 closer
- SOC—Pin-in-socket security screw package

Unmatched convenience:

- Non-handed
- Improved compatibility with door closers
- Single/double-acting doors
- Interior/exterior applications

- Reduced door prep
- Durable
- Improved corrosion resistance
- Function conversion kits are available

Materials and finishes

In heavy gauge brass or 300 Series stainless steel, these models offer the broadest range of finishes in the industry, complementing any design and offering the highest resistance to corrosion. Available in the following finishes:

Finishes	Description
US3	Polished brass
US4	Satin brass
US10	Satin bronze
US10B	Oil rubbed bronze
US32	Polished stainless steel
US32D	Satin stainless steel
SP4	Powder coat brass
SP10	Powder coat bronze
SP28	Powder coat aluminum
SP313	Powder coat dark bronze
SPBLK	Powder coat black

Models

These models provide a wide range of optional features, and are ideal for use on entrance and vestibule doors, large doors, doors opened frequently, or doors subject to abuse. These models are also furnished with an offset-style jamb bracket.

Designed for heavy-duty applications, 100 Series models will provide long-lasting protection to doors, frames, hinges, related hardware and surrounding walls or obstructions.

100H Series hold-open

(Suffix H) The hold-open function should be used where it is desired to hold a door open at a predetermined position for short or long periods of time, permitting an unobstructed traffic flow through the opening.

These models are both selective and adjustable, featuring the most reliable hold-open mechanism available. They feature a control knob which protrudes from the face of the door and turns the hold-open function on or off. Set in the inactive position, the unit acts as a stop and shock absorber. The tension on the hold-open mechanism can be adjusted using an allen wrench to offset air currents or other exterior conditions. The hold-open tension adjustment is located in the bottom of the track in the top of the door.

100HP Series internal hold-open

These models provide a hold-open unit with the hold-open mechanism built into the channel, thus reducing the door prep. The 100HP have a preset hold-open force that is not adjustable. The hold-open feature is not selectable in these units, so the doors are always held open.

100F Series friction hold-open

(Suffix F) Friction hold-open models provide an alternative holding method, ideal for heavy patient room doors, closet doors or similar applications where multiple hold-open positions are desired. The friction tension is adjusted using an allen wrench and an open end wrench. The friction tension adjustment is located on the top of the slider in the channel.

100S Series stop-only

(Suffix S) When the hold-open function is not required, the stop-only function provides the same effective door control minus the hold-open feature. The stop-only model may be used on fire doors.

100SE Series special stop-only

(Suffix SE) When stop-only models are used in conjunction with single point hold-open electronic door closers, they may be ordered without the shock-absorbing mechanism. Used as an auxiliary stop with these closers, they will prolong the life of the closer. The stop location is adjusted using an allen wrench on the stop block located in the channel. The SE option cannot be added to an existing unit. It must be factory ordered.

Note: Caution should be taken when using this option in other applications, as the elimination of the shock-absorbing spring can put added stress on the door and frame.

Application Information

UL Classification

The 100 Series stop-only models are classified by Underwriters Laboratories (UL) as miscellaneous fire door accessories. This classification applies to use on either hollow metal fire doors or wood fire doors. Where wood door manufacturer's listing allows for the cutout required for installation, concealed overhead stops may be used on those wood fire doors. These units may be used on doors of any rating. As a reminder, the miscellaneous fire door accessories (GVUX) section is defined by UL as: "Miscellaneous fire door accessories are intended in the individual listings. The accessories have been investigated to determine that when installed in accordance with the manufacturer's instructions, the accessories do not adversely affect the fire rating of the fire door and/or fire door frames."

Dead stop templating

If a wall or similar obstruction is in place at 110° or less opening angle (i.e. doors that open back-to-back), dead stop templating should be used. This includes all hold-open, friction and stop-only models, except when the "SE" option is used. The dead stop position is reached when the shock-absorbing spring is fully compressed, the initial degree of opening will be 5° to 7° less than the dead stop opening.

Example: If the holder is templated to a 100° dead stop, the door will hold open at an angle between 93° and 95° but no further than 100°.

Note: Do not use dead-stop templating on the 100SE Series since there is no shock-absorbing spring.

Environmental considerations

Environmental factors should always be considered when specifying overhead holders and stops. Doors that are positioned on a building's exterior or subject to corrosive conditions should be equipped with a holder constructed primarily of stainless steel or brass materials. For interior applications, steel is acceptable, though brass substrates generally provide a more attractive architectural-grade finish.

Options

Suffix ADJ (adjustable jamb bracket)

An additional option on the 100 Series is the adjustable jamb bracket, which allows the degree of hold-open or stop angle to be adjusted after installation. Suffix "ADJ" is available in all functions, but only in sizes 3, 4, 5 and 6. ADJ jamb bracket requires additional frame prep. The ADJ option cannot be added to an existing unit, it must be factory ordered.

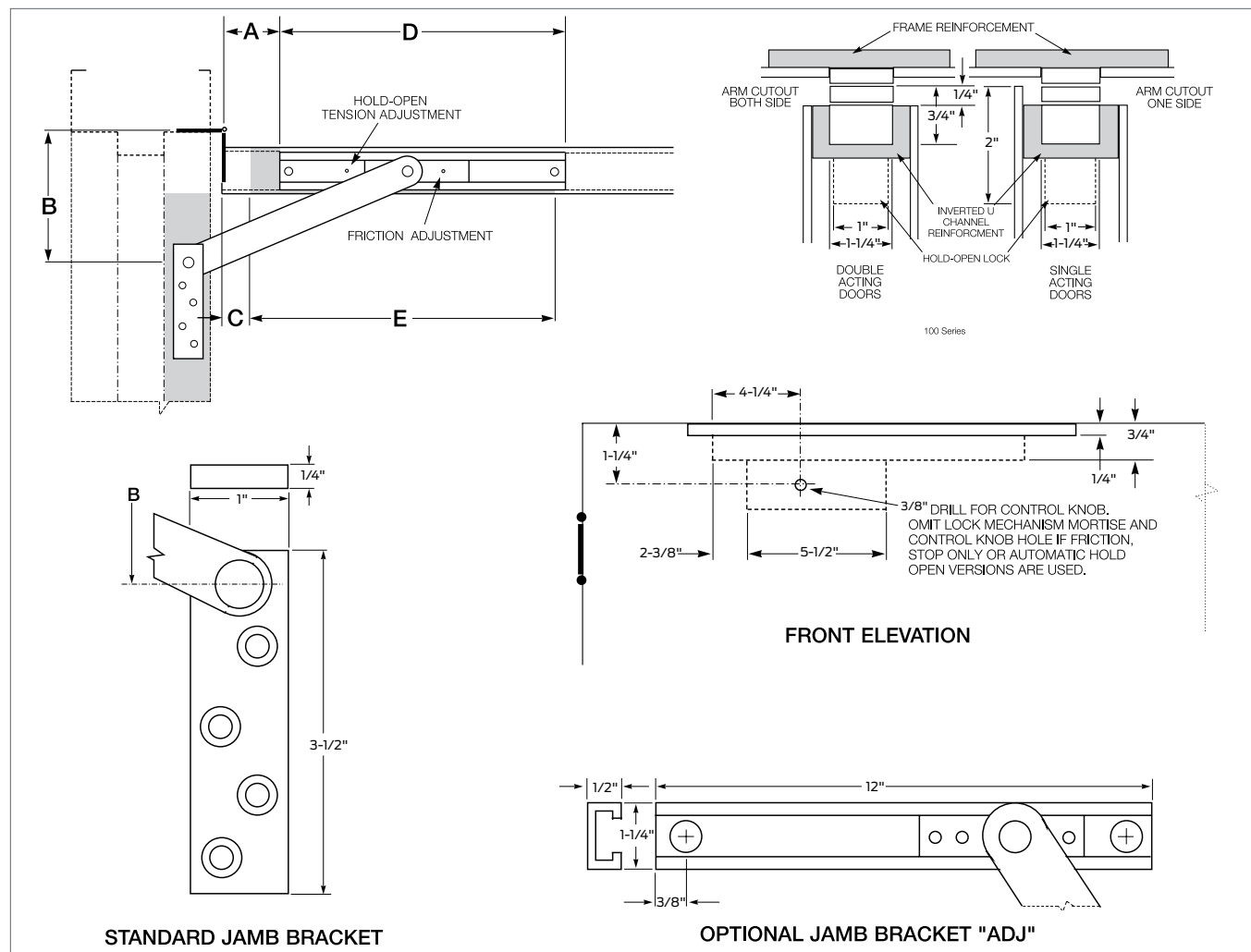
Suffix CJ (closer jamb bracket)

Provides a special jamb bracket needed for 100 Series units used with LCN 5030 closers. These special jamb brackets are handed, so handing will need to be specified when ordering the "CJ" option, CJLH for a left hand door and CJRH for a right hand door. The CJ option cannot be added to an existing unit, it must be factory ordered.

Suffix SOC (Pin-in-socket security screw package)

A screw package with pin-in-socket screws for mounting the jamb bracket to the frame is provided instead of the standard screw package.

100 Series concealed overhead door holders/stops



100 Series sizing chart²

Butt/offset pivots

Size	Door opening	Stop only	Hold open	Friction
1 ¹	18" - 23"	101S	101H	101F
2 ¹	23 1/16" - 27"	102S	102H	102F
3	27 1/16" - 33"	103S	103H	103F
4	33 1/16" - 39"	104S	104H	104F
5	39 1/16" - 45"	105S	105H	105F
6	45 1/16" - 51"	106S	106H	106F

Center hung

Door opening	Stop only	Hold open	Friction
-	-	-	-
-	-	-	-
33 1/16" - 39"	103S	103H	103F
39 1/16" - 45"	104S	104H	104F
45 1/16" - 51"	105S	105H	105F
51 1/16" - 59"	106S	106H	106F

Note: This chart illustrates the most common types of hinging and door opening sizes.
For unusual door details, contact Glynn-Johnson for availability.

¹These sizes are not available for use with offset pivots. Also not available with the ADJ option.

²Wood doors with automatic flush bolts or roller latches, consult factory.

BHMA/ANSI, A156.8 and Fed. spec. cross reference

G-J model	BHMA*	Fed. spec.
101-106 H	C01511	1160
101-106 S	C01541	-
101-106 F	C01531	-

* First numeral (0) designates optional material.

To specify:
Brass material, change 0 to 1
(i.e. C11511)
Stainless steel material, change 0 to 5
(i.e. C51511)

BHMA:
All 100 Series models are designed for heavy-duty applications and far exceed BHMA cycle test and force test requirements for Grade 1 holders and stops.

The template information on this page is for reference only and is not intended to serve as an installation template.
For more information, reference the Template Directory in the Document Library at us.allegion.com.



5 Knuckle, ball bearing full mortise hinge

- Recommended for medium weight doors (<150 lbs)
- Recommended for medium frequency usage (<400 cycles per day)
- Made with two ball bearing assemblies
- Recommended for use with a door closer
- Packed with fasteners for hollow metal and wood doors
 - 12-24 x 1/2 UFPHMS, 12 x 1 1/4 FPHWS
 - 10-24 x 1/2 UFPHMS, 10 x 1 FPHWS (3.5x3.5 hinge size only)

Specifications

Material substrate	Made from brass, 1040 steel or 304 series stainless steel
Certifications	<ul style="list-style-type: none"> ▪ Certified to ANSI/BHMA A156.1 for performance standards ▪ Meets ANSI/BHMA 156.7 for template hinge dimensions ▪ UL Classified for windstorm rated assemblies - R37965 ▪ UL10C Listed for steel only (3 hour)

Dimensions

Height x Width	Size (mm)	Gauge
3.5 x 3.5	89 x 89	0.123
4 x 4	102 x 102	0.130
4.5 x 4	114 x 102	0.134
4.5 x 4.5	114 x 114	0.134
5 x 4.5	127 x 114	0.146
5 x 5	127 x 127	0.146

Refer to General Hinge Information page to determine proper hinge for application

Options

NRP	Non-removable pin	TW4	Four wire
HT	Hospital tip	TW4M*	Four wire with monitor
SH	Security stud - comes standard with NRP	TW8	Eight wire
RC-1/4, RC-5/8	Rounded corners	TW8M*	Eight wire with monitor
SEC	Security fasteners - pin-in-socket (for hollow metal doors and frames only)	TW12	Twelve wire
		MON*	Monitor

*TW and MON options are not available on 4 x 4 or smaller.

Finishes

BHMA	Description	Substrate	Finish
600	Primer Paint	Steel	USP
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
614	Oxidized Bronze	Brass	US10A
619	Satin Nickel	Brass	US15
622	Matte Black	Brass	B-BLK
625	Bright Chrome	Brass	US26
626	Satin Chrome	Brass	US26D
643e/716	Aged Bronze	Brass	B-643e/716
695	Dark Bronze Painted	Brass	B-695/US10BE
629	Bright Stainless	Stainless steel	US32
630	Satin Stainless	Stainless steel	US32D
631	Matte Black	Steel	F-BLK
632	Bright Brass	Steel	US3
633	Satin Brass	Steel	US4
639	Satin Bronze	Steel	US10
640	Oil Rubbed Bronze	Steel	US10B
641	Oxidized Bronze	Steel	US10A
646	Satin Nickel	Steel	US15
651	Bright Chrome	Steel	US26
652	Satin Chrome	Steel	US26D
643e/716	Aged Bronze	Steel	F-643e/716
695	Dark Bronze Painted	Steel	F-695/US10BE

For other colors, consult factory.



WS406/WS407CVX, WS406/WS407CCV

Wall stops (convex and concave models)

- Constructed in sturdy yet economical wrought base of brass or stainless steel construction
- Feature concealed tamper-proof mounting
- Shipped factory preassembled backplate to reduce installation cost
- Easy installation by inserting screwdriver through small hole in rubber
- WS406/407CVX – convex rubber bumper, packed with fasteners for drywall/wood applications
- WS406/407CCV – concave rubber bumper which avoids damage to locks with projecting buttons, packed with fasteners for drywall/wood applications

Specifications

Material substrate	Made from brass and stainless steel
Certifications	<ul style="list-style-type: none"> WS406/407CVX Meets ANSI/BHMA 156.16, L22201 for brass and L52201 for stainless steel WS406/407CCV Meets ANSI/BHMA 156.16, L22251 for brass and L52251 for stainless steel

Dimensions

Base diameter	Base thickness	Overall projection
2 1/2"	3/8"	1"



WS406/WS407CVX

Finishes

BHMA	Description	Substrate	Finish
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
609	Blackened Brass	Brass	US5
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
619	Satin Nickel	Brass	US15
622	Matte Black	Brass	BLK
625	Bright Chrome	Brass	US26
626	Satin Chrome	Brass	US26D
–	Aged Bronze	Brass	643e/716
630	Stainless Steel	Stainless steel	US32D

For other colors, consult factory.

Note: WS406/407 is the full part number. 406 and 407 are not different products.

411R-W

Wall bumper - adhesive

- Adhesive-backed wall door stop for use on clean, smooth, flat surfaces only
- Non-marring white rubber
- Concave design permits knob to strike stop without damaging or engaging lock mechanism

Specifications

Material substrate	Made from rubber
--------------------	------------------

Dimensions

Base diameter	Base thickness	Overall projection
1 7/8"	3/8"	1 1/16"

Finish

BHMA	Description	Substrate	Finish
–	White	Rubber	R-W





Commercial protection plates (UL and non-UL models)

- All plates, metal and plastic, come standard with four beveled edges and countersunk mounting holes (B-CS)
- Protection plates must be ordered in 1/2" increments. Available in other sizes, consult customer service
- For 8402 UL Plates, UL mark appears in upper left corner. Not available on plastic protection plates (special cutouts are not allowed on UL kick plates)

Specifications

Material substrate	<ul style="list-style-type: none"> ▪ Available in .050" thick brass, stainless steel or aluminum; and 1/8" thick high impact polyethylene in clear or black ▪ Aluminum 5005 Series, brass C26800 Series, stainless steel 300 Series, plastic
Mounting hardware	<ul style="list-style-type: none"> ▪ Standard mounting package, 16 per pack <ul style="list-style-type: none"> – #6 x 5/8" Oval head screws ▪ Optional Tek/Torx package, specify TK-TX <ul style="list-style-type: none"> – #6 x 5/8" Self-drilling, self-tapping screws – #6 x 5/8" Torx screws
Certifications	<ul style="list-style-type: none"> ▪ Meets ANSI/BHMA A156.6 for J301 ▪ UL protection plates certified to UL10C

Number of screw packs required by plate size (specify Tek screws or Torx screws)

	22"-25"	26"-33"	34"-41"	42"-48"
4"-8"	1	1	1	1
9"-16"	1	1	1	1
17"-24"	1	1	1	2
25"-32"	1	1	2	2
33"-40"	1	2	2	2
41"-48"	2	2	2	2

Options

- Specify B-NH for no mounting holes (Not available on 8402. Available only with US32D, US32, US3, US4, US28, CLR, P-BLK only)
- Specify B-NHA for no mounting holes with adhesive (Not available on 8402.)
- Specify ERS prepped with extra row of screws
- Special Cut-outs are available as engineering special, consult customer service

Finishes

BHMA	Description	Substrate	Finish	Max sizes
605	Bright Brass	Brass	US3	24" x 48"
606	Satin Brass	Brass	US4	24" x 48"
612	Satin Bronze	Brass	US10	24" x 48"
613	Oil Rubbed Bronze	Brass	US10B	36" X 46"
619	Satin Nickel	Stainless	US15	24" x 48"
625	Bright Chrome	Stainless	US26	48" X 48"
626	Satin Chrome	Brass	US26D	30" x 36"
628	Satin Aluminum	Aluminum	US28	48" x 48"
629	Bright Stainless Steel	Stainless steel	US32	48" x 48"
630	Satin Stainless Steel	Stainless steel	US32D	48" x 48"
654	Satin Stainless Steel	Stainless steel	US32D	48" x 48"
695	Dark Bronze Powder Coat	Stainless steel	SP313/US10BE	24" x 48"
BLK	Matte Black	Stainless steel	BLK	24" x 48"
P-BLK	Black	Plastic	P-BLK	48" x 48"
CLR	Clear	Plastic	CLR	48" x 48"

Custom finishes are available as engineering special, consult customer service

Available accessories

- Gasket tape kit tape is recommended when using a brass plate on a metal door to reduce tarnishing from electrolytic oxidation
- One tape pack will cover an the perimeters of a 8" x 34" kickplate (Order 8401 gasket tape)

FB51P / FB51T

Top bolt and bottom bolts - metal doors

- FB51P top and bottom bolts (pair)
- FB51T top bolt only
- For use with metal doors only
- Constant latching—inactive door remains latched until the active door is opened, releasing the automatic bottom bolt and then the top bolt can be manually released (inactive door will re-latch automatically when closed)
- Low actuation forces
- Non-handed
- Bolt throw is $\frac{3}{4}$ " with a $\frac{7}{8}$ " vertical adjustment
- Bolt backset is $\frac{3}{4}$ "
- Standard rod length is 12", which is measured from the center of the flush bolt body to the bolt tip

Specifications

Mounting hardware	<ul style="list-style-type: none"> ▪ 8-32 X $\frac{3}{8}$" UFPHMS ▪ 10-12 X $1\frac{1}{4}$" Plastic anchor ▪ 6-32 X $\frac{3}{8}$" FPHMS ▪ 6 X $\frac{3}{4}$" FPHSMS ▪ 8 X 1" FPHSMS ▪ 10 X 1" FPHSMS
Certifications	<ul style="list-style-type: none"> ▪ Fits standard ANSI/BHMA A115.4 door frame preparations. ▪ UL10C Listed (3 hour) fire doors 8'0" X 10'0" when top and bottom bolts are used

Options

Optional rod lengths available for top bolt only on non-fire rated openings—18", 24", 36" and 48"

Dimensions

Body size (Width x Length x Depth)	Guide size (Width x Length x Height x Thickness)	Strike size (Width x Length x Thickness)	Rub plate size (Width x Length x Thickness)
1" x 6 $\frac{3}{4}$ " x 2"	1" x 1 $\frac{27}{32}$ " x 1 $\frac{1}{16}$ " x $\frac{3}{32}$ "	$\frac{15}{16}$ " x 2 $\frac{1}{4}$ " x $\frac{1}{16}$ "	1 $\frac{1}{4}$ " x 1 $\frac{11}{16}$ " x $\frac{3}{64}$ "

Finishes

BHMA	Description	Substrate	Finish
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
BLK	Matte Black	Stainless steel	—
629	Bright Stainless Steel	Stainless steel	US32
630	Satin Stainless Steel	Stainless steel	US32D

Custom finishes are available as engineering special, consult customer service.

Additional accessories

- Security pin screws
- DP1 and DP2 dust proof strike, see page 167





Dust proof strike

- DP1 - round face plate
- DP2 - rectangular face plate
- Designed for use with the bottom bolt of all flush bolts
- Spring-loaded plunger returns to floor or threshold level anytime flush bolt is retracted, eliminating need to clean standard floor strikes
- Strike hole is $\frac{3}{4}$ " diameter and $1\frac{1}{8}$ " deep

Specifications

Mounting hardware 8-32 X 1" FPHMS

Dimensions

DP1 face plate (Diameter)	DP2 face plate (Width x Length x Thickness)	Body (Diameter x Depth)
$1\frac{7}{16}$ "	$1\frac{5}{8}$ " x $3\frac{1}{2}$ " x $\frac{1}{8}$ "	$1\frac{3}{16}$ " x $1\frac{7}{8}$ "

Finishes

BHMA	Description	Substrate	Finish
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
619*	Satin Nickel	Brass	US15
622*	Matte Black	Brass	BLK
625	Bright Chrome	Brass	US26
626	Satin Chrome	Brass	US26D
643e/716*	Aged Bronze	Brass	—

*Finishes only available with DP2

Custom finishes are available as engineering special, consult customer service.

Additional accessories

- Security pin screws

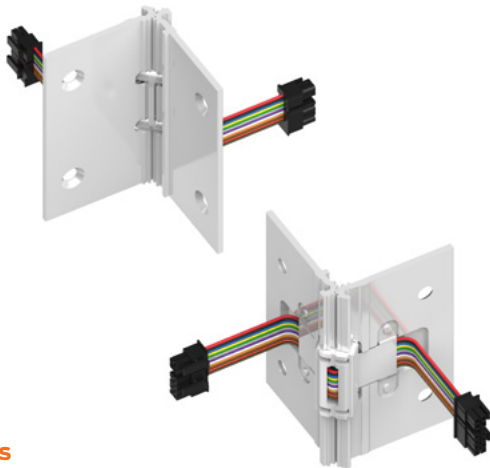


DP1



DP2

General information



Electrification options
Electric power transfer (EPT)
available on HD and XY models

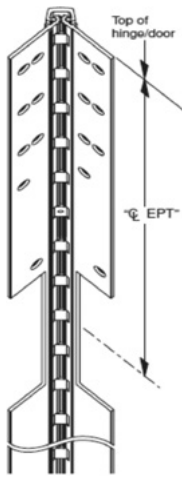
Electric power transfer provides the most secure and best solution for transferring power from the door frame to the edge of a swinging door.

Electrical through-wire panel with
Allegion Connect (TWP CON) (XY models only)

The redesigned XY Through-Wire Panel is heavy duty and easy-to-install. Hinge consists of single piece cover design for improved aesthetics and three sections with a standard bottom length and through-wire panel location.

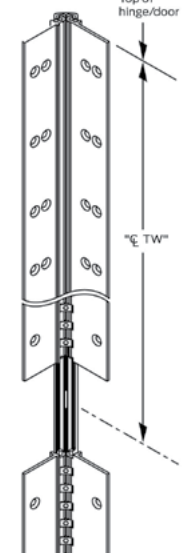
Provides electric power transfer from the frame to the door in order to supply power to an electrified mortise or cylindrical locks, exit devices with electric latch retraction, and/or electric strikes (pairs of doors).

EPT 112HD



Note: See ordering guide in price book for proper placement.

TWP XY Series



Electrical cutouts

Ives aluminum continuous hinges are available with factory modified cutouts to accommodate most electrical frame to door requirements.

When ordering indicate the following:

- 1. Door size.
- 2. Handing. LH, RH, LHR or RHR.
- 3. Manufacturer and model number of the electrical product being used.

Because clearances may vary between door and frame manufacturer, and locations can be influenced by the door hardware it is always recommend contacting Ives Customer Technical for specific template information.

In accordance with industry standards, all cutouts are made from top edge of door to center line of cut-out. If top of door to top of cut-out is provided, 4 5/8" are added to the dimension provided to determine the centerline of the cut-out.

Standard cut out locations for EPTs and TWP options

Standard length	HD	XY	XY
	EPT	EPT	TWP CON
83"	30"	30"	43.5"
85"	32"	32"	45.5"
95"	42"	42"	55.5"
119" (XY)	-	66"	79.5"
120" (HD)	67"	-	-

XY TWP CON is located 39.5 inches from bottom of the hinge. Consult factory for TWP locations on custom length hinges.

Hinges and pivots

Aluminum geared continuous hinges



Full mortise - narrow frame and door leaf

- For 1 3/4" doors
- Spread bearing design
- Non-handed for custom cut lengths
- Flush mounted, no inset
- 48" Maximum door width
- Beveled or square edge doors
- For doors weighing up to 450 pounds without reinforcing, 600 pounds with reinforcing

Specifications

Standard length	83", 85", 95", 120"
Standard mounting hardware	12-24 x 3/4" Steel self drilling/self tapping Phillips-head screw
Certifications	<ul style="list-style-type: none"> ▪ Exceeds Grade 1 ANSI/BHMA 156.26 for 150lbs and 300lbs ▪ UL10C listed (90 min)

Options

EPT	Electric power transfer
-----	-------------------------

Optional mounting hardware

SECHM	Security screws - hollow metal door and frame
SECWDHM	Security screws - 1/2 wood, 1/2 hollow metal
SECWDWD	Security screws - wood door and frame
TEKSWD	1/2 Self drill, self tap 1/2 wood
TF	Thread forming screws
WD	Wood door and frame

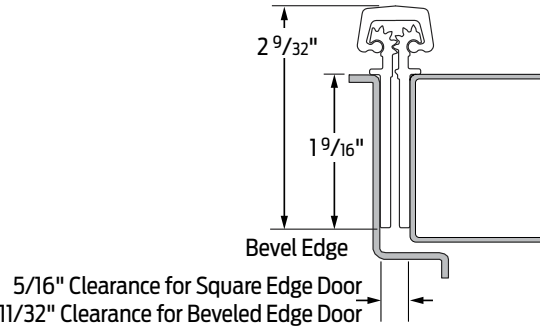
Finishes

BHMA	Description	Substrate	Finish
628	Clear Aluminum Anodized	Aluminum	US28
710	Dark Bronze Anodized	Aluminum	313AN
711	Black Anodized	Aluminum	315AN

Custom anodizing and painting are available, consult factory

For single door applications:

For pairs of doors see chart and general information.





Push/pull plate

- 8200 Push plate
- 8300 Pull plate, prep for pull (less pull)

Specifications

Available sizes	Plates are available in .050 thick brass, stainless steel or aluminum
Material substrate	Made from aluminum, brass or stainless steel (300 Series)
Mounting hardware	<ul style="list-style-type: none"> ▪ Standard mounting package <ul style="list-style-type: none"> – #6 x 5/8" Oval head screws ▪ Optional Tek/Torx package <ul style="list-style-type: none"> – #6 x 5/8" Self-drilling, self-tapping screws – #6 x 5/8" Torx screws
Widths and heights	<ul style="list-style-type: none"> ▪ 3" x 12" ▪ 3 1/2" x 15" ▪ 4" x 16" ▪ 6" x 16" ▪ 8" x 16"
Optional pull center to center spacing	<ul style="list-style-type: none"> ▪ For 8300 pull plates, plates are prepped with 2 3/8" holes for pull machining ▪ For holes prepped for G mounting hardware, consult customer service <ul style="list-style-type: none"> – 5 1/4" – 6" – 8" – 10" – 12"
Certifications	Meets ANSI/BHMA A156.6 for J301 materials

Finishes

BHMA	Description	Substrate	Finish
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
619	Satin Nickel	Brass	US15
625	Bright Chrome	Brass	US26
626	Satin Chrome	Brass	US26D
626-AM	Satin Chrome Antimicrobial	Brass	US26D-AM
628	Clear Anodized	Aluminum	US28
630	Satin Stainless	Stainless steel	US32D
630-AM	Satin Stainless Antimicrobial	Stainless steel	US32D-AM
631	Matte Black	Stainless steel	BLK
695	Dark Bronze Powder Coat	Stainless steel	SP313/US10BE

Note: For other colors, consult factory.

Additional information

- Specify PR when ordering a set of plates for back to back mounting
- Custom widths, heights, and special cut-outs are available as engineering special, consult customer service

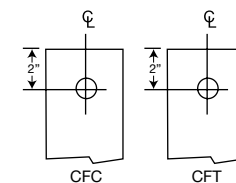
Plates cut for cylinder or thumb-turns

Plates are available with cutout for cylinder or thumb-turn; standard cutout is 2" from top and centered on plates up to 4" wide. For plates wider than 4" cutout is located 2" from outer edge, specify LH or RH. When pull location interferes with standard cutout location a detail drawing should be furnished with the order.

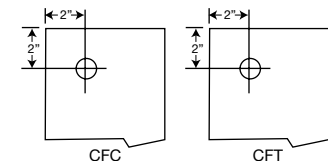
- Standard cutout is 1 1/4" for cylinder and 3/8" for thumb-turn.
- Specify CFC for cutout for cylinder or CFT for cutout for thumb-turn.



For plates up to 4"



For plates greater than 4" (RH shown)

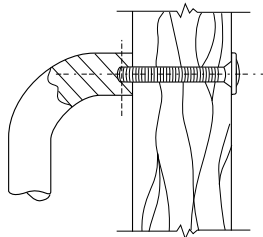


Mounting hardware

Mounting sizes

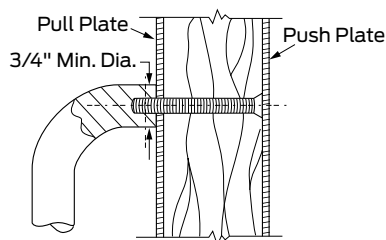
- All mounting hardware is for standard 1-3/4" doors with the exception of the glass door Q mount. Standard glass door thickness is 1/2".
- Optional mounting hardware for 2" and 2 1/4" doors for many pulls. See pull detail for availability.
- Other mounting hardware sizes available as engineering special. Consult Customer Service.

Through bolt mounts



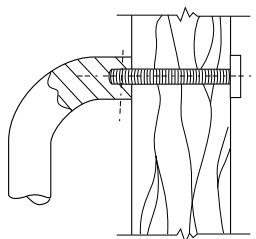
STD mount - Standard mount

- Through bolt mount with countersunk washers
- Hollow metal and wood door applications
- (2) 3/8-16 x 2 1/4" brass, flathead mounting screws, plated to match
- (2) 3/8-16 Countersunk washers, plated to match



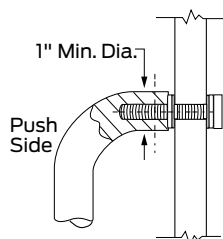
F mount - Countersunk holes

- Used with countersunk holes in doors
- Wood door applications
- (2) 2 1/4" steel flathead mounting screws, plated to match



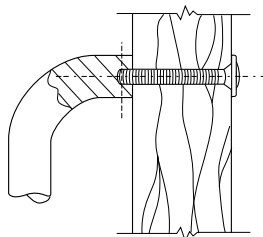
O mount - Decorative

- Decorative through bolt mount
- Hollow metal and wood door applications
- (2) 3/8-16 x 2 1/4" Decorative mounting bolts - machine screw, plated to match



Q mount - Decorative, glass doors

- Decorative through bolt mount
- Glass door applications
- (2) Decorative mounting bolts - machine screw, plated to match
- (2) Metal and vinyl washers



X mount - Security

- Security through bolt mount with countersunk washers
- Hollow metal and wood door applications
- (2) Flathead security pin in socket mounting screws, plated to match
- (2) Countersunk washers, plated to match



Pull plate

Specifications

Material substrate	Made from aluminum, brass or stainless steel (300 Series)
Mounting hardware	<ul style="list-style-type: none"> Heavy duty mounting hardware exceeds industry standards 3/8-16 mounting hardware Specify door thickness <ul style="list-style-type: none"> Standard mounting hardware for door thickness of 1 1/2" to 1 3/4" unless otherwise specified Optional package available for 2" and 2 1/4" thick doors Comes standard with through bolt screws and decorative washers Optional mounting hardware available (see general information section for details) A, F, G, I, L, N Mounting hardware for other door thicknesses are available as engineering special, consult customer service Standard mounting package for plate <ul style="list-style-type: none"> #6 x 5/8 Oval head screws Optional Tek/Torx package <ul style="list-style-type: none"> #6 x 5/8 Self-drilling, self-tapping screws #6 x 5/8 Torx screws
Widths and heights	<ul style="list-style-type: none"> 3 1/2" x 15" 4" x 16" 6" x 16"
Pull center to center spacing	<ul style="list-style-type: none"> 8" 10"
Certifications	Meets ANSI/BHMA A156.06

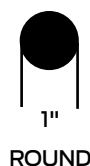
Finishes

BHMA	Description	Substrate	Finish
605	Bright Brass	Brass	US3
606	Satin Brass	Brass	US4
612	Satin Bronze	Brass	US10
613	Oil Rubbed Bronze	Brass	US10B
619	Satin Nickel	Brass	US15
625	Bright Chrome	Brass	US26
626	Satin Chrome	Brass	US26D
626-AM	Satin Chrome Antimicrobial	Brass	US26D-AM
628	Clear Anodized	Aluminum	US28
630	Satin Stainless	Stainless steel	US32D
630-AM	Satin Stainless Antimicrobial	Stainless steel	US32D-AM
631	Matte Black	Stainless steel	BLK
643e/716	Aged Bronze	Stainless steel	643e/716
695	Dark Bronze Powder Coat	Stainless steel	SP313/US10BE

Note: For other colors, consult factory.

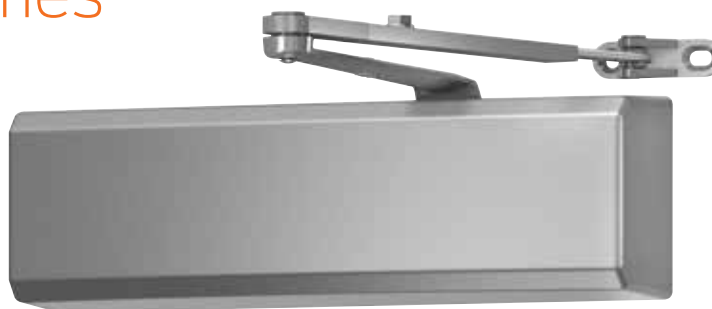
Additional information

- Specify PR when ordering a set of pulls for back to back mounting
- Plate to pull clearance is 1 1/2"
- For one back to back machined pull, specify NSGL
- Custom widths, heights, and special cut-outs are available as engineering special, consult customer service



1"
ROUND

4050A Series



The 4050A Series cast aluminum closer is engineered for durability and built tough to excel in the harsh environments of high frequency, high abusive traffic areas. Featuring the most common commercial footprint, it is ideal for commercial building applications that demand a combination of quality, reliability and value.

Features

Certifications	Grade 1 - ANSI A156.4, UL 10C, ADA, 100 hour salt spray, meets BAA - Buy American Act
Body construction	<ul style="list-style-type: none"> Cast aluminum body Full complement bearing 1 1/2" diameter piston 1/16" diameter double heat treated pinion journal
Fluid	All weather liquid X fluid
Handing	Non-handed
Templating	2 3/8" x 6 3/4" mounting hole pattern
Size	Adjustable spring size 1-6
Warranty	25 years

Cover	<ul style="list-style-type: none"> Plastic Cover (PC), standard Metal Cover (MC), optional
Fasteners	Self reaming and tapping screws (SRT)
Mounting	Hinge (pull side), top jamb (push side), parallel arm (push side)
Arms	Standard regular arm
Finishes/colors/ powder coat	<ul style="list-style-type: none"> 622 Matte black 689 Aluminum 690 Statuary bronze 691 Light bronze 693 Black 695 Dark bronze 696 Brass Custom colors optional Optional SRI primer - powder coat only

Special templates

Customized installation templates or products may be available to solve non-standard applications. Contact LCN Product Support for assistance.

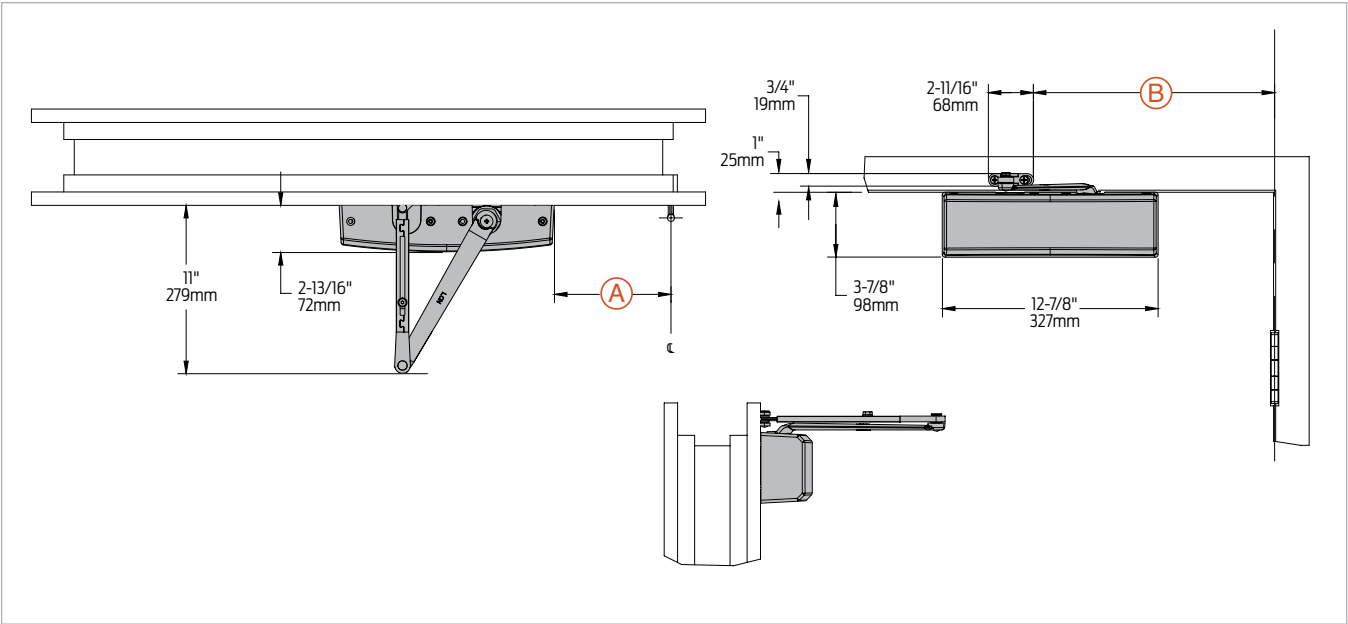
Mounting	Finish	Cover	Cylinder	Arm function*
Hinge (pull) side	Plastic	Non-handed	Regular (double)	Regular (double)
Top jamb (pull)	Metal	Non-sized	Standard (single)	Standard (single)
Top jamb (push)		Accessibility	Hold Open	Hold Open
Parallel arm	Powder coat	Delay Action***	Fusible Link	Fusible Link
Stop face	Plated	CYL AVB**	EDA/HEDA	EDA/HEDA
			CUSH/HEDASH	CUSH/HEDASH
			Double Egress	Double Egress

■ Available
 ■ Not available

* Closer available with less than 5.0 lbs. opening force on 36" door.
 ** Maximum opening/hold open point with standard template.
 *** Advanced Variable Back Check.
 *** Delay feature incorporates standard 4040 cylinder (not XP).

Mounting details

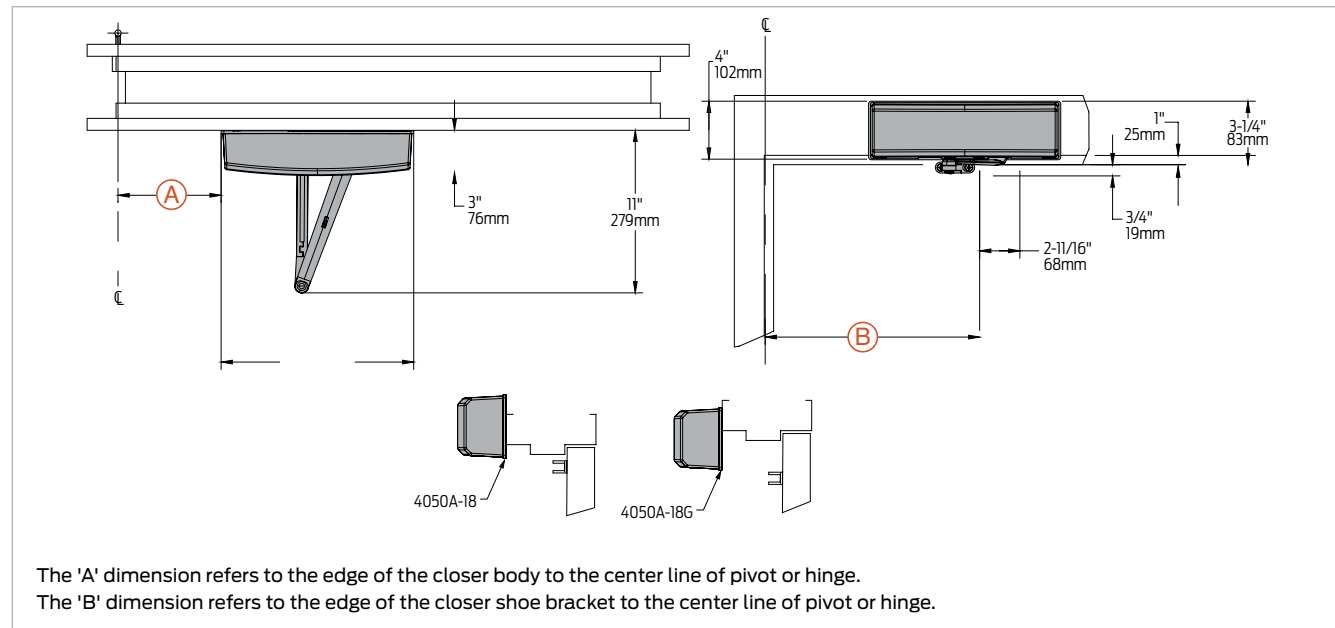
Hinge (pull) side mounting



Butt hinges	Should not exceed 5" (127 mm) in width
Auxiliary stop	Recommended at hold open point or where a door cannot swing beyond templated maximum opening
Reveal	Should not exceed 3/4" (19 mm) for Regular Arm or Hold Open Arm
Top rail	<ul style="list-style-type: none"> Less than 3 7/8" (98 mm) requires plate, 4050A-18. Plate requires 1 13/16" (44 mm) minimum
Clearance	2 13/16" (72 mm) behind door required for 90° installation
Delay action	Delays closing from 180°-70° Delay time adjustable up to approximately 1 minute
Maximum opening	<ul style="list-style-type: none"> Templating allows up to 180° Hold open points up to maximum opening with Hold Open Arm
	To 100°: A = 5 5/8" (143mm) B = 11 1/4" (286mm)
	100° to 120°: A = 4 3/8" (111mm) B = 10" (254mm)
	120° to 150°: A = 3 5/8" (92mm) B = 9 1/4" (235mm)
	150° to 180°: A = 2 5/8" (67mm) B = 8 1/4" (210mm)

Mounting details

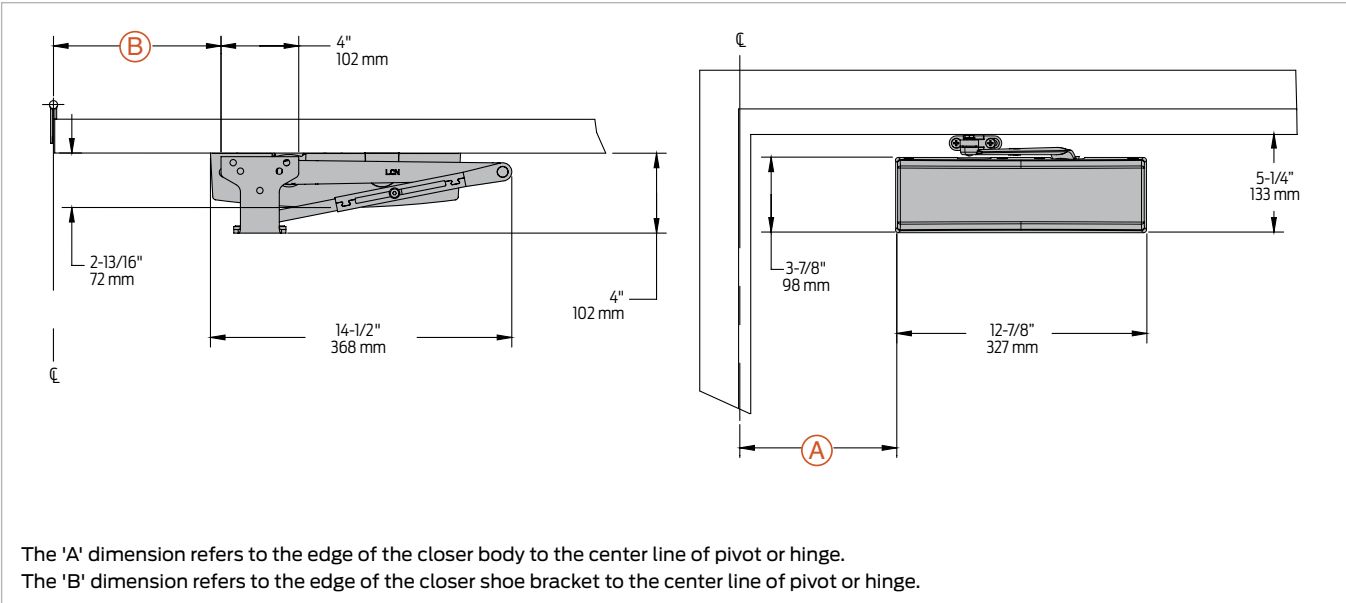
Top jamb (push) side mounting



Butt hinges	Should not exceed 5" (127 mm) in width		
Auxiliary stop	Recommended at hold open point or where a door cannot swing beyond templated maximum opening		
Reveal	Arm type	Reveal	Max opening
	Regular Arm	2 9/16"	Up to 180°
	Long Arm	4 13/16"	Up to 165°
	Hold Open Arm	2 9/16"	Up to 180°
	Hold Open Long Arm	4 13/16"	Up to 155°
Top rail	<ul style="list-style-type: none"> Closer on 4050-18 plate requires minimum 1 3/4" (45mm) Closer on 4050-18G plate requires minimum 3 3/8" (86mm) 		
Head frame	All top jamb installations require a plate <ul style="list-style-type: none"> 4050-18 plate requires minimum 3 1/4" (83mm) head frame and maximum stop height 5/8" (16mm) 4050-18G plate requires minimum 1 5/8" (41mm) head frame 		
Delay action	Delay closing from 180° to 70°. Delay time adjustable up to approximately 1 minute.		
Maximum opening	<ul style="list-style-type: none"> Templating allows up to 180° Hold open points up to maximum opening with Hold Open Arm 		
	To 100°:	A = 5 1/2" (140mm) B = 11 1/4" (286mm)	
	100° to 120°:	A = 4 1/4" (108mm) B = 10" (254mm)	
	120° to 150°:	A = 3 1/2" (89mm) B = 9 1/4" (235mm)	
	150° to 180°:	A = 2 1/2" (64mm) B = 8 1/4" (210mm)	

Mounting details

Parallel arm (push) side mounting



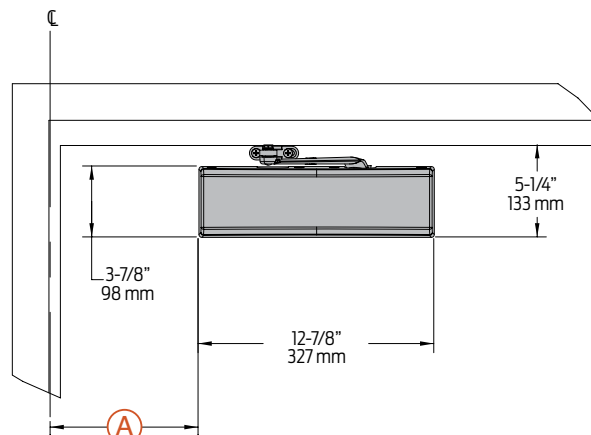
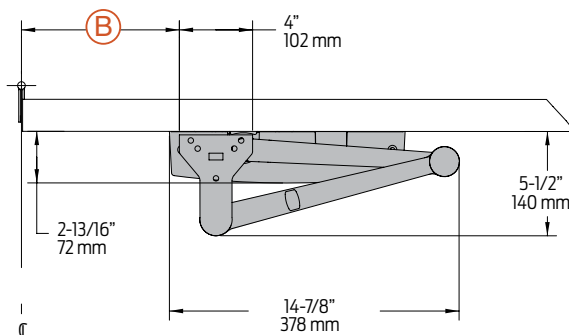
Butt hinges	Should not exceed 5" (127 mm) in width
Auxiliary stop	Recommended at hold open point, where the door cannot swing beyond templated maximum opening, or where Cush-n-Stop Arm is not used
Top rail	Less than 5 1/4" (133mm) measured from the stop requires plate, 4050A-18PA. Plate requires 2" (51mm) minimum from the stop.
Clearance	For 4050A-62PA shoe is 4" (102mm) from door face
Head frame	Flush or rabbeted requires PA shoe adapter, 4050A-419
Stop width	Minimum 1" (25mm)
Blade stop	Clearance requires 1/2" (13mm) blade stop spacer, 4050A-61
Delay action	Delays closing from 180°-70°. Delay time adjustable up to approximately 1 minute.
Auxiliary shoe	4050A-62A allows installation of Regular Arm with overhead holder/stop
Maximum opening	To 100°: A = 7 3/8" (187mm) B = 8 3/8" (213mm) 100° to 130°: A = 6 3/8" (162mm) B = 7 3/8" (187mm) 130° to 150°: A = 5 7/8" (149mm) B = 6 7/8" (175mm) 150° to 180°: A = 4 7/8" (124mm) B = 5 7/8" (149mm) Hold open points up to maximum opening with Hold Open Arm

Note: Optional mounting requires PA shoe, 4050A-62PA for Regular or Hold Open Arms.

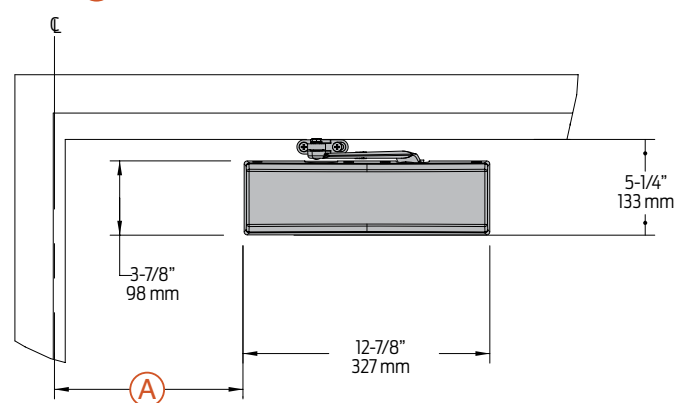
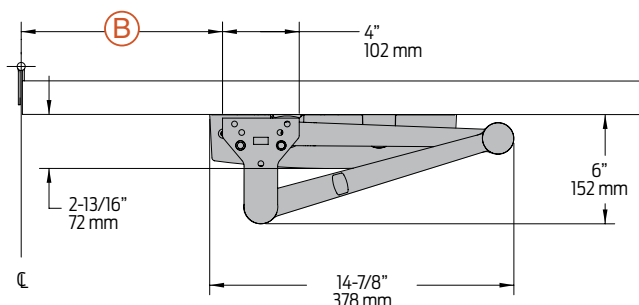
Mounting details

EDA and CUSH mounting

EDA mount



CUSH mount



The 'A' dimension refers to the edge of the closer body to the center line of pivot or hinge.

The 'B' dimension refers to the edge of the closer shoe bracket to the center line of pivot or hinge.

Clearance	4050A-62EDA is 5 1/2" (140mm) from door face. 6" (152mm) for CUSH	
Head frame	Flush or rabbeted requires flush panel adapter, 4050A-419	
CUSH Arm	Requires CUSH shoe support, 4050A-30 for fifth screw anchorage where reveal is less than 3 1/16" (78mm)	
Delay action	Delays closing from 180° to approximately 70°. Delay time adjustable up to approximately 1 minute.	
Maximum opening	EDA arm can be templated for points at: 100° CUSH arms can be templated for opening/hold open point at:	
	100°: A = 6 3/8" (162mm) B = 7 3/4" (197mm)	85°: A = 7 7/8" (200mm) B = 9 1/8" (232mm)
	100° to 130°: A = 4 7/8" (124mm) B = 6 1/4" (159mm)	90°: A = 7 1/8" (181mm) B = 8 1/2" (216mm)
	130° to 150°: A = 3 7/8" (98mm) B = 5 1/4" (133mm)	95°: A = 6 1/2" (165mm) B = 7 7/8" (200mm)
	150° to 180°: A = 2 7/8" (73mm) B = 4 1/4" (108mm)	100°: A = 6" (152mm) B = 7 1/4" (184mm)
	Hold open points up to maximum opening with HEDA arm	105°: A = 5 1/2" (140mm) B = 6 7/8" (175mm)
		110°: A = 5" (127mm) B = 6 3/8" (162mm)

Notes:

- SCUSH dead stop points are approximately 5° more than templated stop point
- Hold open at templated stop points
- 4050A Series closers ordered with EDA or CUSH arms include 4050A-201 fifth hole spacer to support the shoe

Accessories

Cylinders



4050A-3071
Cast aluminum cylinder assembly (CYL)

- Non-handed
- Heavy duty



4050A-3071 DEL
Delay action cylinder (CYLDEL)

- Cylinder used for delayed action closing
- Non-handed
- Heavy duty

Covers



4050A-72
Plastic Cover (PC)

- Non-handed
- Standard



4050A-72MC
Metal Cover (MC)

- Non-handed
- Required for plated finishes and custom powder coat finishes
- Optional

Alternate cover



4050A-72ALT
Alternate cover

- Non-handed
- Optional, sold separately (not packed with closer)

Arms



4050A-3077
Regular Arm (REGARM)

- Non-handed
- Mounts pull side or top jamb with shallow reveal
- Includes PA shoe, 4050A-62PA required for parallel arm mounting



4050A-3077L
Long Arm (LONG)

- Non-handed
- Includes long rod and shoe, 4050A-79LR for top jamb mount
- Optional



4050A-3049
Hold Open Arm (H)

- Non-handed
- Mounts pull side or top jamb with shallow reveal
- Hold open adjustable shoe
- 4050A closer includes 4050A-62PA shoe required for parallel arm mounting
- Optional



4050A-3049L
Hold Open Long Arm (HLONG)

- Non-handed
- Hold open adjustable shoe
- Includes long head and tube, 4050A-3048L for top jamb mount
- Optional



4050A-3077EDA
Extra Duty Arm (EDA)

- Non-handed
- Features forged, solid steel main and forearm for potentially abusive installations



4050A-3049EDA
Hold Open Extra Duty Arm (HEDA)

- Handed
- Features forged, solid steel main and forearm for potentially abusive installations
- Hold open function is adjusted at the shoe



4050A-3077EDA/62G
Extra Duty Arm with 62G Thick Hub Shoe (EDAW62G)

- Non-handed
- Features forged, solid steel main and forearm for potentially abusive installations
- 62G shoe provides additional blade stop clearance for use with additional door hardware such as an overhead holder



4050A-3049EDA/62G
Hold Open Extra Duty Arm with 62G Thick Hub Shoe (HEDA62G)

- Handed
- Features forged, solid steel main and forearm for potentially abusive installations
- 62G shoe provides additional blade stop clearance for use with additional door hardware such as an overhead holder
- Hold open function is adjusted at the shoe

Accessories

Arms (cont.)



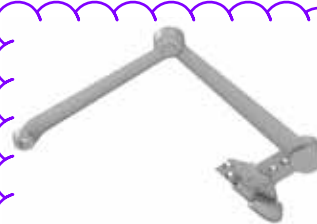
**4050A-3077CNS
Cush-n-Stop Arm (CUSH)**

- Non-handed
- Features solid forged steel main arm and forearm with stop in soffit shoe
- Optional



**4050A-3049CNS
Hold Open Cush-n-Stop Arm (HCUSH)**

- Provides hold open function with templated stop/hold open points
- Handle controls hold open function



**4050A-3077SCNS
Spring Cush-n-Stop Arm (SCUSH)**

- Non-handed
- For potentially abusive applications features solid forged steel main arm and forearm with spring loaded stop in the soffit shoe
- Optional



**4050A-3049SCNS
Spring Hold Open Cush-n-Stop Arm (SHCUSH)**

- Non-handed
- For potentially abusive applications features solid forged steel main arm and forearm with spring loaded stop in the soffit shoe
- Handle controls hold open function
- Optional

Installation accessories



**4050A-18
Plate**

- Required for hinge side mount where top rail is less than 3 7/8" (98 mm)
 - Requires minimum 1 3/4" (44 mm) top rail



**4050A-18G
Plate**

- Locates top jamb mounted closer flush with top of head frame face in flush ceiling condition
- Contact LCN Product Support for minimum head frame requirement



**4050A-18PA
Plate**

- Required for parallel arm mounting where top rail is less than 5 3/4" (146 mm), measured from the stop
 - Requires 2 1/4" (57 mm) minimum top rail



**4050A-30
CUSH shoe support**

- Provides anchorage for fifth screw used with CUSH arms, where reveal is less than 3 1/16" (78 mm)



**4050A-61
Blade stop spacer**

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



**4050A-419
Flush panel adapter**

- Provides horizontal mounting surface for parallel arm shoe on single rabbetted or flush frame



**4050A-62A
Auxiliary shoe**

- Requires a top rail of 7 13/16" (198 mm)
- Replaces -62PA for parallel arm mounting of regular arm with overhead holder/stop
- Optional



**4050A-62PA
PA shoe**

- Required for parallel arm mounting

Finishes

Standard powder coat finishes

LCN powder coating provides superior protection against the effects of weather conditions and is an environmentally friendly process. The high quality finish is chip resistant. Corrosion resistance surpasses 100 hours salt spray testing (four times the industry standard). Non-metallic components also provide the same high resistance to the effects of the elements. All LCN products must be shipped with a finish.

LCN standard finishes (ANSI/BHMA number):

622 Matte Black Paint



690 Statuary Bronze Paint



693 Gloss Black Paint



696 Brass Paint



689 Aluminum Paint



691 Light Bronze Paint



695 Dark Bronze Paint



Optional custom powder coat finishes

LCN offers custom powder coating to provide a custom appearance and all the corrosion resistance of standard powder coat finishes at a nominal additional cost. LCN uses the RAL numbering system for the 150+ custom colors available. Contact your local RSO representative for a brochure showing the available custom colors.

Note: Custom powder coat finishes require a metal cover.

Optional plated finishes

Visible components such as metal covers, arms, fasteners, and finish plates are plated to match the selected finish. Surface mounted tracks are powder coated to compliment the plated finish. Hidden assemblies such as cylinders, tracks, and mounting plates are supplied with a powder coated finish. Plated finishes require handing of closers.

Plated finishes:

616 Satin Bronze, Blackened	646 Satin Nickel
632 Bright Brass	651 Bright Chrome
633 Satin Brass	652 Satin Chrome
639 Satin Bronze	

Special Rust Inhibitor (SRI) process

For installations where a higher level of protection against weather conditions, or the effects of a potentially corrosive atmosphere is required, LCN offers a Special Rust Inhibitor (SRI) process. Ferrous metal components receive an SRI pretreatment and a standard powder coat finish of your choice, or a custom powder coat finish for a nominal additional cost. Closers treated with the SRI process exceed the 100 hour protection level available with standard LCN powder coated finishes. For details, contact your local RSO representative or the LCN factory.

Standard anodized finishes

LCN Senior Swing and Benchmark electromechanical automatic operators are offered with an anodized finish. Anodizing is an electrochemical process that thickens and toughens the protective oxide on aluminum metal.

LCN anodized finishes:

628 Aluminum, Clear Anodized
710 Dark Brown, Anodized

Materials

The LCN offering consists of well-made, reliable, long-lasting products that work in real-life applications. In addition to the mechanical advantages derived from proven designs, much of the durability of the closer and arm system is directly related to the materials used in their manufacturing.

Precision machined cast iron cylinders and forged steel pistons work together because of the compatibility of their basic elements. Heat-treated pinions and pistons spread the load over a large gear tooth system to better handle the wear and stress of millions of operating cycles. Upper and lower full complement pinion bearings provide the support and load capacity required by the design of the closer. All-weather fluid, Liquid X, reduces the amount of adjustments and maintenance needed and ensures consistent performance through every season.

Forged steel main arms are a durable alternative to lower-cost stamped steel arms. Specially designed shoe and elbow joints help each closer fit securely onto a variety of opening applications. A state-of-the-art, powder coat process delivers a high quality, corrosion resistant finish on all metal parts in popular architectural finishes.

Through state-of-the-art equipment, processes and people, we believe LCN will continue to provide the best solutions for our customers.

4640 Series



The 4640 auto equalizer is LCN's smart and reliable electrically powered low-energy automatic operator. It provides easy access for people with disabilities, or the elderly. Designed primarily for manual opening applications that occasionally required automatic opening.

Features

Certifications	Grade 1 - ANSI A117.1, A156.19, UL 10C, ADA, 100 Hour Salt Spray, Meets BAA - Buy American Act	Cover	Metal Cover (MC)
Body construction	<ul style="list-style-type: none"> Cast iron body Full complement bearing 1 1/2" diameter piston 3/4" diameter double heat treated pinion journal 	Fasteners	Wood and Machine Screws (WMS)
Fluid	All weather fluid	Mounting	Top jamb (push side)
Handling	Non-handed	Arms	<ul style="list-style-type: none"> Regular Arm (REGARM), standard Long Arm (LONG), optional
Size	Adjustable spring size 2-5	Finishes/colors/ powder coat	<ul style="list-style-type: none"> 689 Aluminum 690 Statuary Bronze 691 Light Bronze 693 Black 695 Dark Bronze 696 Brass Custom colors optional Optional SRI primer - powder coat only Optional plated finishes*
Warranty	2 years	*End caps are black	

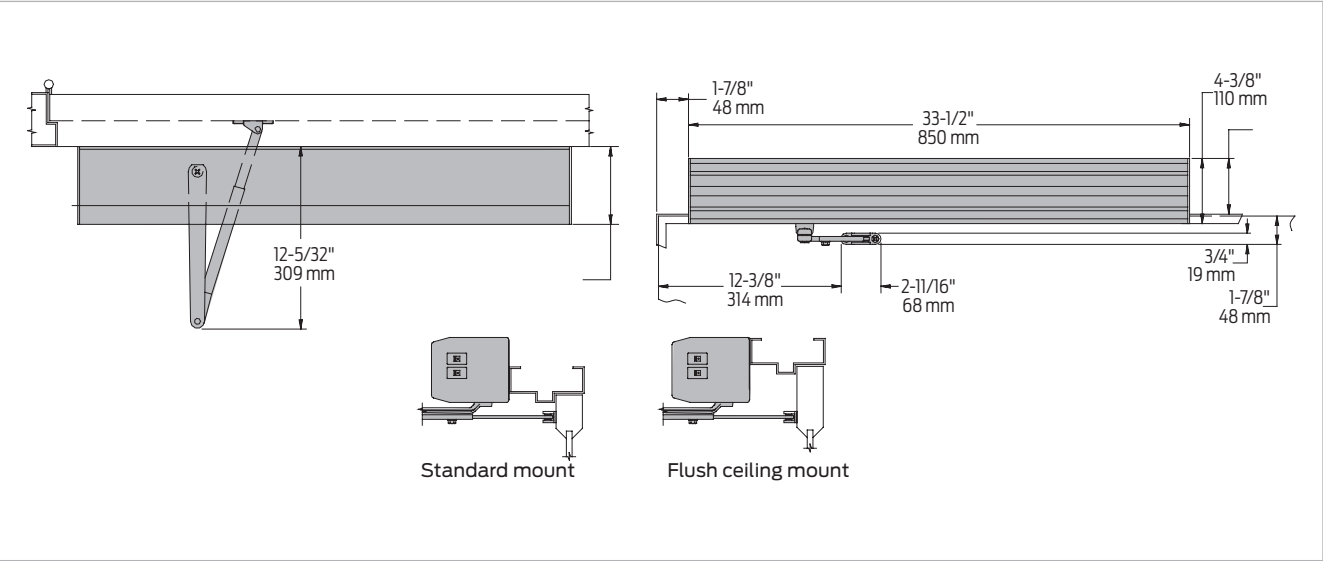
Special templates

Customized installation templates or products may be available to solve non-standard applications. Contact LCN Product Support for assistance.

	Mounting	Finish	Cover	Cylinder	Arm function*
4640	Top jamb (pull) side Top jamb (push) side Parallel arm Concealed Powder coat Plated	Plastic Metal	Non-handed Non-sized Accessibility Automatic operator Hold open DPS	Standard (single) Regular (double) EDA CUSH SCUSH	
	■ Available ■ Not available	■ Available ■ Not available	■ Available ■ Not available ♿ Meets ADA requirements (power mode). * See individual series for maximum manual opening. ** Switch provided for continuous Hold Open (4640 only).	■ Available ■ Not available	

Mounting details

Top jamb (push side) mounting



Butt hinges	Should not exceed 5" (127 mm) in width
Auxiliary stop	Recommended
Reveal	<ul style="list-style-type: none"> 4 1/2" (114 mm) allows up to 90° power opening and 100° manual opening 8" (203 mm) allows up to 90° power opening and 100° manual opening with long arm where standard rod and shoe is replaced with optional long rod and shoe, 4640-79LR
Top rail	<ul style="list-style-type: none"> Minimum 1 3/4" (44 mm) Flush ceiling installation requires 3 3/4" (95 mm) minimum
Head frame	Minimum 1 3/4" (44 mm) (the standard mounting plate is also used to meet flush ceiling conditions)
Opening time and force	<ul style="list-style-type: none"> Variable by adjustments to the electronic control module located on the operator assembly Maximum hold open time adjustable up to approximately five minutes
System diagram	See page 33 for typical system wiring and pages 34-35 for electrical data
Maximum opening	<ul style="list-style-type: none"> Templating allows 90° power opening and 100° manual opening Consult factory for all pivot mounted installations

- Notes:
- Actuators are sold separately, see pages 100-117
 - Comes with a digital control box utilizing a 4040XP heavy duty door closer with on-board diagnostics and power supply
 - Has a factory default memory that include "No Destruct" drive system
 - Guard rails or safety mats not required
 - 4640 has easily accessible switches to provide on/off and continuous hold open functions
 - CS options provides concealed on/off power switch
 - Control module provides timing and sequential door functions, electric strike controls and adjustments for opening speed and force

Accessories

Cylinders



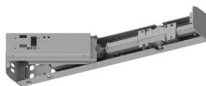
**4642-3971
Cast Iron Cylinder
Assembly (CYL)**

- Non-handed
- Standard



**4642-3071
Cast Iron Cylinder
Assembly (CYL)**

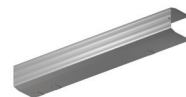
- Non-handed
- Mounting plate
- Includes; 4640-3454 Motor Clutch, 4640-3180 I/O Board Assembly and 4640-3462 Controller
- Standard



**4642-3071CS
Cast Iron Cylinder Assembly (CYL)**

- Non-handed
- Mounting plate
- Includes; 4640-3454 Motor Clutch, 4640-3180 I/O Board Assembly and 4640-3462 Controller
- Same as a 4640-3071 assembly except on/ off switch is concealed in endcap and no hold open switch is included (Separate key switches suggested)
- Optional

Covers



**4640-72MC
Metal Cover (MC)**

- Non-handed
- Standard

Arm



**4640-3077
Regular Arm (REGARM)**

- Non-handed



**4640-3077L
Long Arm (LONG)**

- Includes long rod and shoe, 4640-79LR for deep reveals



**4640-79
Rod and Shoe**

- For use with regular arm



**4640-79LR
Long Rod and Shoe**

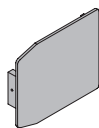
- Used for long arm with deep reveals

Installation accessories



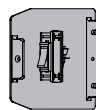
**4640-334
Switch End Cap**

- End cap (black powder finish coat only) with cut outs for installing on/off and hold open switches



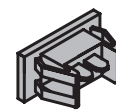
**4640-334-2
Blank End Cap**

- Black powder coat only



**4640-334CS
Switch End Cap**

- End cap and switch (black powder coat only) for concealed switch option



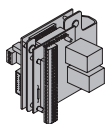
**4640-3179-1
On/Off Switch Assembly**

- Black rocker switch
- Plugs into high voltage PC board



**4640-3179-2
Hold Open Switch Assembly**

- Black rocker switch
- Field wired to low voltage PC board



**4640-3180
PC Board Assembly**

- High and low voltage PC boards connected to mounting bracket



**4640-3454
Motor/Clutch Assembly**

- A geared assembly in an LCN automatic operator that incorporates a "no destruct" feature



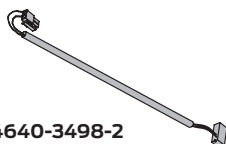
**4640-3462
Control Box Assembly**

- Digital controller with built-in 12/24 VDC power supply
- Programming and timing functions are adjusted on controller



**4640-3498-1
Ribbon Cable Connector**

- 16 wire ribbon cable connecting PC board assembly to controller



**4640-3498-2
AC Power Cable**

- 2 wire cable to connect 120 VAC from PC board assembly to controller

4 3/4" Square surface and flush mounts



8310-853

Hard Wired Wall Mount, Logo, 4 3/4" x 4 3/4"

- Hardwired low voltage actuator with stainless steel touch plate in 4 3/4" (121mm) square
- Engraved blue filled handicap symbol conforms to most accessibility codes
- Designed to mount in a flush or surface mount box (sold separately) in/on a vertical surface near the controlled door
- Optional mounting in single gang electrical box (by others) or double gang box (4" x 4" by others) or on an 8310-866 bollard post
- Heavy industrial grade components provide vandal resistant mounting and weather resistant switch standard



8310-853WP

Wireless Wall Mount Actuator Package, Logo, 4 3/4" x 4 3/4"

- Wireless, low profile, low voltage actuator with square, stainless steel touch plate in 4 3/4" (121mm) square
- Engraved blue filled handicap symbol conforms to most accessibility codes
- Surface mount box includes integral transmitter w/battery and actuator switch
- Heavy industrial grade components provide vandal resistant mounting and weather resistant switch standard
- Requires 8310-865 Receiver



8310-853T

Hard Wired Wall Mount, Logo and Text, 4 3/4" x 4 3/4"

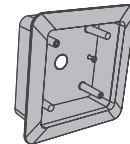
- Same as the 8310-853, with the added engraving of "Push to Open"



8310-853TWP

Wireless Wall Mount Actuator Package, Logo and Text, 4 3/4" x 4 3/4"

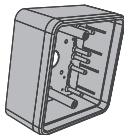
- Same as the 8310-853WP, with the added engraving of "Push to Open"



8310-867F

Flush Mounted Actuator

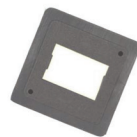
- Rugged Plastic Box, 4 3/4" Square
- Optional accessory - can be used w/any 4 3/4" square actuator



8310-867S

Surface Mount Box

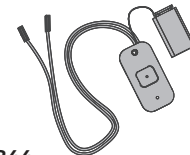
- Rugged Plastic Box, 4 3/4" Square
- Optional accessory - can be used w/any 4 3/4" square actuator



8310-801

Weather/Trim Ring

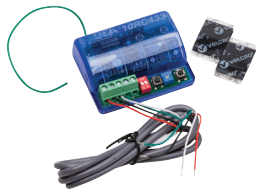
- Plastic Weather Ring, 4 3/4" Square
- Optional accessory - can be used w/any 4 3/4" square plastic mounting box



8310-844

Transmitter, Wireless, 1 Channel, Wall Mount, 9V

- Transmitter, Wireless, 1 Channel, 9V battery included
- Use to convert standard wall mount actuator to wireless
- Requires 8310-865 Receiver



8310-865

Wireless Receiver

- Receiver, Wireless, 1 Channel, w/Sequencing Feature
- Used in conjunction w/ Wireless Actuators and Transmitter(s) for push plate applications

Mortise Lock Comparison

L MECHANICAL



Applications

Schlage mechanical mortise locks represent the most diverse functional options of the whole series. Built on a universal lock case design, several functions in the L mechanical group can be changed and adapted to the building needs over time.

As a commercial mortise lock L Series is inherently more robust and secure than other types of locks against break-in. It's ideal in any institutional, government or educational setting.

Key Features

- Exceeds ANSI/BHMA Grade 1 operational and security standards
- Visual indicator options for locked/unlocked status available for many functions
- Over 50 standard mechanical functions, custom functions also offered
- Available Vandlgard® and ligature-resistant features
- "The Original" universal lock case allows creation of eight functions from a single lock body
- 12 finishes and 33 levers, two knobs, five roses and two escutcheon designs
- Supports Conventional, FSIC and SFIC cylinder formats in standard and Primus® designs
- Multiple key systems available: open, patented, restricted, and geographically exclusive

L WIRED ELECTRIFIED



Applications

The wired electrified L Series is ideal for new construction and high traffic areas where hardwired power ensures continuous operation and where electrified door prep, hinges and wiring can easily be incorporated into the building.

The electrified L Series is regularly used as part of an access control system for high security areas, or independently in areas that require a remote access switch.

Key Features

All mechanical features¹ plus:

- Auto-detects 12/24 VDC
- Selectable EL/EU
- 9 electrified functions
- Available Vandlgard® and ligature-resistant features
- Optional monitoring features: request-to-exit, door position switch, latchbolt, and deadbolt monitoring
- Motor-driven activation eliminates "hot levers" and ensures smooth, quiet, and dependable operation

LE WIRELESS ELECTRONIC



Applications

The Schlage LE mobile enabled wireless mortise lock is designed to affordably extend electronic access control deeper into the building beyond traditional perimeter and high security openings.

The LE is ideal for commercial real estate, K-12, higher education, assisted living, medical offices, or multi-family applications. Facilities can benefit from the enhanced security, efficiency, and convenience of upgrading to electronic credentials.

Key Features

All mechanical features¹ plus:

- Six functions with LED indicator, deadbolt, and interior push button options
- Compatible with Bluetooth, NFC, smart and proximity credentials from Schlage and other brands
- Sectional and escutcheon trim options
- 31 levers, 2 knobs and 9 finishes
- Integrated door position sensor (DPS) and request to exit (RX)
- Wireless configuration from smart phones/tablets
- Built-in Wi-Fi® enables automatic daily updates sent directly from host software
- Capable of networked real-time communication with the ENGAGE Gateway and software alliances
- Up to 2 years of battery life

1. Electrified and electronic locks are offered in fewer functions overall and electronic locks do not utilize mechanical indicator trims.

Trims & Finishes

The Standard Collection

The Standard Collection levers can be paired with exit devices and locks from our trusted Schlage and Von Duprin brands. And, they are built to the same exacting standards. Our Standard Collection levers offer a more traditional style that is appropriate for use in a number of commercial applications.

01



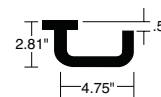
801 - Milled tactile warning

02

802 - Knurled tactile warning¹

03

(Tubular)

803 - Knurled tactile warning¹

05



805 - Milled tactile warning

06

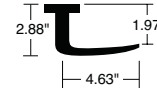
(Rhodes)



806 - Milled tactile warning

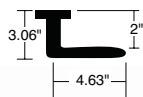
07

(Athens)



807 - Milled tactile warning

12

812 - Milled tactile warning
Handed

17

(Sparta)



817 - Milled tactile warning

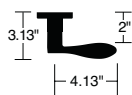
18



818 - Milled tactile warning

ACC

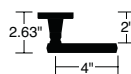
(Accent)



Handed

AST

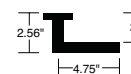
(Asti)



Handed

LAT

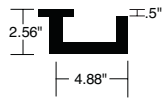
(Latitude)



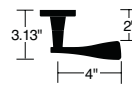
1. Knurled tactile warning available on 609, 612, 613, 625, 626, 629, and 630 finishes only.

The Standard Collection

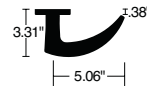
LON
(Longitude)



MER
(Merano)



OME
(Omega)



Handed

41



42



Levers shown with Schlage L Series mortise 'A' rose. Additional rose and escutcheon designs available. Knobs shown with rose that is unavailable in the L Series. See available A, B, and C rose options on page 14.

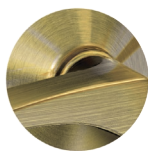
Finishes



605
Bright Brass



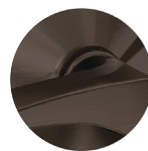
606
Satin Brass



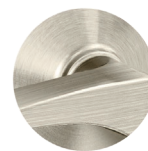
609
Antique Bronze



612¹
Satin Bronze



613¹
Oil Rubbed
Bronze



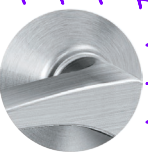
619
Satin Nickel



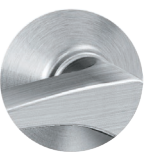
622
Matte Black



625
Bright Chrome



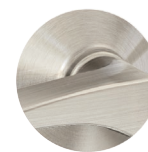
626
Satin Chrome



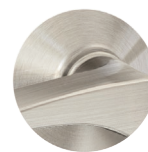
626AM
Satin Chrome
Antimicrobial



629²
Bright Stainless
Steel



630²
Satin Stainless
Steel



630AM²
Satin
Stainless Steel
Antimicrobial



643e
Aged Bronze

1. Available on standard levers only, not available on Latitude, Longitude, Accent, Asti, or Merano.

2. Not available on Accent, Asti, or Merano.

Escutcheons



L full face

Specify by adding 'L' after lever design.

Material: Cold-forged brass or stainless steel

Finishes: Available in all L Series finishes.

Size: 7-15/16" x 1-3/4" x 7/16" (202 mm x 44 mm x 11 mm)



L concealed

Specify by adding 'C' suffix to function and by adding 'L' after lever design.

Material: Cold-forged brass or stainless steel

Finishes: Available in all L Series finishes.

Size: 7-15/16" x 1-3/4" x 7/16" (202 mm x 44 mm x 11 mm)



N full face

Specify by adding 'N' after lever design.

Material: Heavy-wrought, reinforced brass or stainless steel

Finishes: Available in all L Series finishes.

Size: 7-7/8" x 2-1/2" x 7/16" (200 mm x 64 mm x 11 mm)

Roses



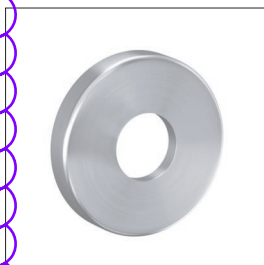
A rose

Available for use on L Series knob and lever designs. Specify by adding 'A' after lever design.

Material: Cold-forged brass or stainless steel

Finishes: Available in all L Series finishes.

Size: 2-1/8" (54 mm) diameter



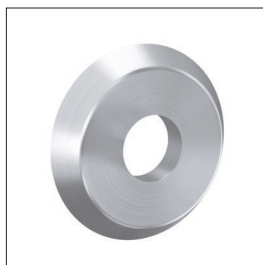
B rose

Available for use on L Series knob and lever designs. Specify by adding 'B' after lever design.

Material: Cold-forged brass or stainless steel

Finishes: Available in all L Series finishes.

Size: 2-9/16" (65 mm) diameter



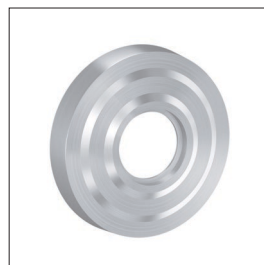
C rose

Available for use on L Series knob and lever designs. Specify by adding 'C' after lever design.

Material: Cold-forged brass or stainless steel

Finishes: 605, 606, 609, 619, 622, 625, 626, 629, 630, 643e.

Size: 2-5/8" (66 mm) diameter



AVA rose

Available for use with Asti (AST) lever only. Specify as ASTAVA.

Material: Cold-forged brass or stainless steel

Finishes: 605, 606, 609, 619, 622, 625, 626, 643e.

Size: 2-5/8" (66 mm) diameter



MER rose

Available for use with Merano (MER) lever only. Specify as MERMER.

Material: Cold-forged brass or stainless steel

Finishes: 605, 606, 609, 619, 622, 625, 626, 643e.

Size: 2-5/8" (66 mm) diameter

Thumbturns | Turns



ADA thumbturn (standard)
09-544



Large ADA thumbturn
09-509 x L583-363

Optional thumbturn trim for all deadbolt functions except L9463 and L463.



Basic thumbturn
09-509



Cylinder thumbturn
09-90x

Optional thumbturn trim for all deadbolt functions except L9463 and L463.



Coin turn
L283-124

For lock functions L9044 and L9444 with rose trim.

L Mechanical

Spring-loaded fusible link
inside lock case provides fail secure mode in case of fire

Security blocking hub
prevents lock picking by removing levers

Vandlgard®
feature option prevents damage from excessive force while in a locked state

Two piece anti-friction tongue
reduces wear

Field reversible latchbolt
allows change without opening case

Floating mounting tabs
automatically adjust to fit a beveled door edge

Breakaway spindle
prevents unsecured failures and provides easy replacement

Anti-saw pin
prevents cut through; included on deadbolt functions

Beauty, Brawn & Flexibility

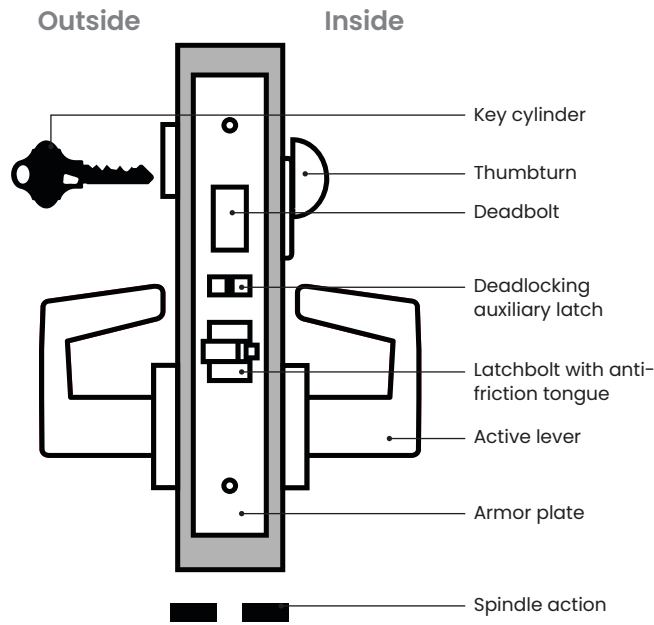
L Series mortise offers the greatest opportunity for customization to fit your needs. Featuring an extensive number of design choices, it's also the strongest, most secure mechanical lock in the Schlage portfolio.

- Several functions can be configured in push/pull or ligature-resistant trims
- Universal lock case design allows the L9050 function to be reconfigured into any of seven other functions
- 46 standard case mortise functions plus 6 small case mortise deadbolt functions
- 12 finishes plus two options for antimicrobial coating
- 33 ADA compliant lever options
- Available Vandlgard and/or key override feature options on several functions
- BAA compliant
- Locks are ANSI/BHMA Grade 1 certified
- Available with lead lining
- UL Listed 3-hour
- Perfectly suited to the LT Series tubular locks



Mechanical Lock Functions

Legend



Key

	Emergency thumbturn		Chevron style lock status indicator
	Coin turn		Inside and/or outside lock status indicator available
	Cylinder thumbturn		Hospital latch trim available
	Fixed lever		High-security ligature resistant trim available
	Knob (when lever option is not available)		Ligature-resistant lever trim available
	Solid spindle - connected lever movement		Ligature-resistant knob trim available
	Two-piece spindle - independent lever movement		

Product Identification Guide

LV9460 with XL11-635

Lock series and function code

- L = standard
- LV = Vandlgard option
- LM = multi-latch
- LMV = multi-latch with Vandlgard

0 = no lock case (dummy trim)

9 = functions with lock case

0 = no deadbolt

1 = dummy trim

4 = with deadbolt

Function code

Functions requiring special ordering nomenclature

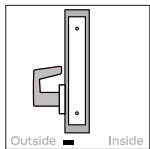


Vandlgard® feature helps protect the lock chassis from damage.

The Vandlgard optional feature available on many functions allows the outside lever to rotate freely down when in a locked state. This limits the ability of vandals to apply excessive force to the lever helping to prevent damage to internal components.

Non-Keyed Dummy Functions

Schlage L9175



**Half dummy trim
with lock case**

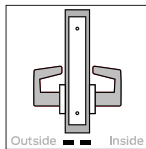
- Lever (or knob) only-one side; blank armor front without latchbolt
- Lever always fixed

Note: Includes blank armor front and lock case.

Door handing must be specified. May be ordered with optional XL11-743 armor front with cutout to receive deadbolt.

ANSI -

Schlage L9176



**Full dummy trim
with lock case**

- Levers (or knobs) only-both sides; blank armor front without latchbolt
- Both levers always fixed

Note: Includes blank armor front and lock case.

May be ordered with optional XL11-743 armor front with cutout to receive deadbolt.

Ordering: In a double-door application where dummy is used as the strike, order 10-091 armored front strike separately.

ANSI -

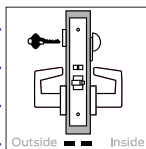
Single Cylinder Non-Deadbolt Functions

The L Series offers a multitude of functional options. But among them, the L9050 basic entrance/office function, is perhaps the most versatile in its ability to be transformed for other uses. With a few part changes this lock can be transformed into these functions:

- L9010** Passage latch
- L9025** Exit or communicating lock
- L9026** Exit lock with cylinder
- L9060** Apartment entrance lock
- L9070** Classroom lock, exterior lockdown only
- L9071** Classroom security lock, interior/exterior lockdown
- L9080** Storeroom lock

To learn more, reference the [L Series Universal Transformation Guide](#).

Schlage L/LV9050



Entrance/office lock

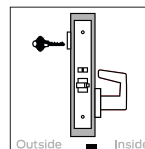
- Key cylinder outside; thumbturn inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever (or knob) from either side
- Outside lever is made inoperative by key outside or by turning inside thumbturn; Vandlgard® option allows both levers to rotate freely down while locked
- Key outside unlocks outside lever and retracts latchbolt
- Rotating inside thumbturn unlocks outside lever; turning inside lever retracts latchbolt but does not unlock
- Inside lever always free for immediate egress

Caution: Egress without fully rotating the thumbturn to vertical position can result in lock-out situations.

Note: Hospital latch and ligature-resistant trims not available with Vandlgard option.

ANSI F04

Schlage L9026



Exit lock with cylinder

- Key cylinder only, no lever (or knob) outside; lever only-inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever from inside
- Key outside retracts latchbolt
- Inside lever always free for immediate egress

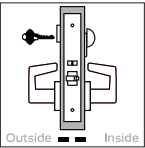
Note: Available in rose or L escutcheon trim only. When ordering, specify door handing.

ANSI -

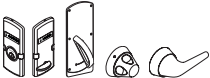
Single Cylinder Non-Deadbolt Functions

Schlage
L/LV9056
L/LV9056 with XL13-439

ANSI
-



Entrance/office lock with automatic unlocking



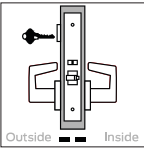
- Key cylinder outside; thumbturn inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever (or knob) from either side
- Outside lever is made inoperative by key outside or by turning inside thumbturn; Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside unlocks outside lever and retracts latchbolt; XL13-439 option also allows key override of thumbturn if being held in locked position
- Rotating inside thumbturn unlocks outside lever; turning inside lever retracts latchbolt and unlocks outside lever; closing door also unlocks preventing lock-out
- Inside lever always free for immediate egress

Note: Ligature-resistant trims not available with Vandlgard option.

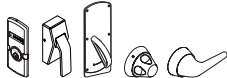
To order with key override, specify function and note XL13-439 as a special option.

Schlage
L/LV9070

ANSI
F05



Classroom lock, exterior lockdown only



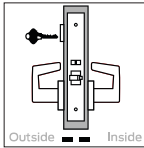
- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever from either side
- Outside lever is made inoperative by key outside; Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside unlocks outside lever and retracts latchbolt
- Inside lever always free for immediate egress

Note: Outside lever remains inoperative until unlocked by key.

Note: Hospital latch and ligature-resistant trims not available with Vandlgard option.

Schlage
L/LV9076

ANSI
F06



Classroom holdback lock, exterior lockdown only



- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever from either side
- Outside lever is made inoperative by key outside; Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside unlocks outside lever and retracts latchbolt
- Rotate inside lever while turning key 360° to activate retracted latch holdback feature; to deactivate, reverse key rotation 360°
- Inside lever always free for immediate egress

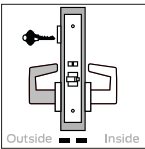
Note: Outside lever remains inoperative until unlocked by key.

Note: Locks with holdback feature are not UL listed. Installation should be in accordance with existing codes only.

Note: Ligature-resistant trims not available with Vandlgard option.

Schlage
L/LV9080

ANSI
F07



Storeroom lock

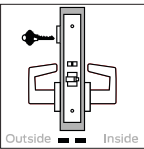


- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Outside lever always fixed; latchbolt retracted by inside lever; Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside retracts latchbolt
- Inside lever always free for immediate egress

Note: Hospital latch and ligature-resistant trims not available with Vandlgard option.

Schlage
L/LV9081

ANSI
-



Accessible storeroom lock

- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Latchbolt retracted by lever from either side
- Outside lever is made inoperative by key outside; Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside inserted and turned 280° unlocks allowing outside lever to retract latchbolt
- Inside lever always free for immediate egress

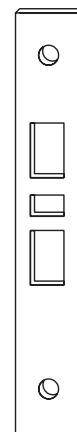
When ordering, specify door handing.

Parts & Options

L Series armored fronts are produced from brass or stainless steel material, finished to match lock trim and furnished complete with screws. Numbers for ordering separately or with locks are listed below. Armored fronts are specified in latch column of order form.

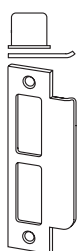
Armored Fronts		
Square corner		For locks with these configurations:
1-1/4" (32mm) width	1-1/16" (27mm) width	
09-662	09-668	Latch only
09-663	09-669	Latch x auxiliary latch
09-664	09-670	Latch x deadbolt
09-665	09-671	Deadbolt only
09-666	09-672	Latch x auxiliary latch x deadbolt
09-661	09-667	Blank (no holes)
09-713	–	Latch x auxiliary latch, non-UL (holdback functions L/LV9076 and L/LV9077)
09-717	–	Deadbolt only, small mortise case

Note: For 1-3/8" (35mm) doors, 1-1/16" (27mm) front should be specified. See price book for complete list.
For L9090, L9091, L9092, L9093, L9095 models with DPS, use armor 09-666 (1-1/4" wide) or 09-670 (1-1/16" wide).

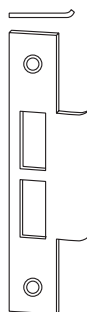


Standard square corner
1-1/4" (32 mm) width

All L Series strikes are produced from brass or stainless steel material, finished to match lock trim, and furnished complete with screws. Numbers for ordering separately or with locks are listed below.



10-072
Standard for L9000
1-1/4" x 4-7/8" x 1-3/16" lip
32 mm x 124 mm x 30 mm



10-091
Armored front strike
1-3/4" x 8" x 1-3/16" lip
32 mm x 203 mm x 30 mm



37-015
Wood frame reinforcer



10-079
Standard for L400
1-1/8" x 3-1/2"
32 mm x 89 mm



10-078
Optional for L400
1-1/4" x 4-7/8"
32 mm x 124 mm

Strikes		
Number	Lip length	Description
10-072	1-3/16" (30mm)	L9000 standard
	7/8" (22mm), 1" (25mm), 1-1/2" (38mm), 1-3/4" (44mm), 2" (51mm)	L9000 optional
10-073	No lip	L9460 Series deadlocks; deadbolt strike, standard
10-075	No lip	1/2" (13mm) rabbeted (use with 1-1/16" (27mm) armor)
10-078	No lip	1-1/4" x 4-7/8" with box, L400 optional
10-079	No lip	1-1/8" x 3-1/2" with box, L400 standard
10-091	1-3/16" (30mm)	Armored front strike, no box
K510-053	–	Strike box for 10-079
K10-066	–	Strike box, all except 10-079

*Specify hand of inactive leaf.

Trim Options

Know It's Locked.™

Patented, 180-Degree, High-Visibility Lock Status Indicator Trims

Lock status indication is about assuring safety and/or privacy. A classroom door that is visibly locked when seen from any angle, even 30' away can help students and teachers feel confident and secure. In restaurant settings, it can reduce patron time spent away from the table. In health care, it can inform staff of a patient's location when out of bed and give the patient a greater sense of privacy. Whether the need is for privacy on dressing rooms, mother's lactation rooms, or restroom doors or, more importantly, for security—to know it's locked when seconds count, status indication is a valuable feature available on most L Series mortise functions.

MADE TO BE SEEN

Clear messaging that can be seen across the room and from any position in sight of the door means teachers can focus on calming and protecting students in other ways. Schlage has designed indication trim allowing high visibility at a greater distance than other locks.

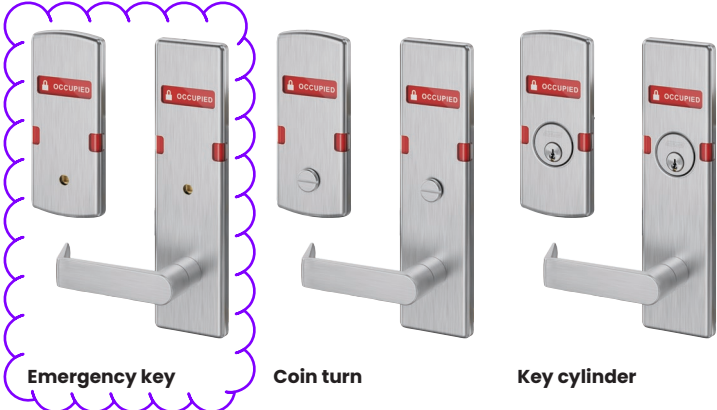
- Large main viewing windows are 2" x 0.6"
- Maximized message size
- Patented, 180-degree window for visibility from any angle
- High contrast, red and white color is easy-to-read for even the color blind
- Available in 38 functions (33 mechanical and three multi-latch)
- Most functions available as inside, outside, and dual (inside and outside) indication
- Available retrofit kits



Inside Trims



Outside Trims



Available Messages				
	LOCKED	OCCUPIED	DO NOT DISTURB	
	UNLOCKED	UNOCCUPIED		
Inside trim	IS-LOC	IS-OCC	IS-DND	IS-SYM
Outside trim	OS-LOC	OS-OCC	OS-DND	OS-SYM

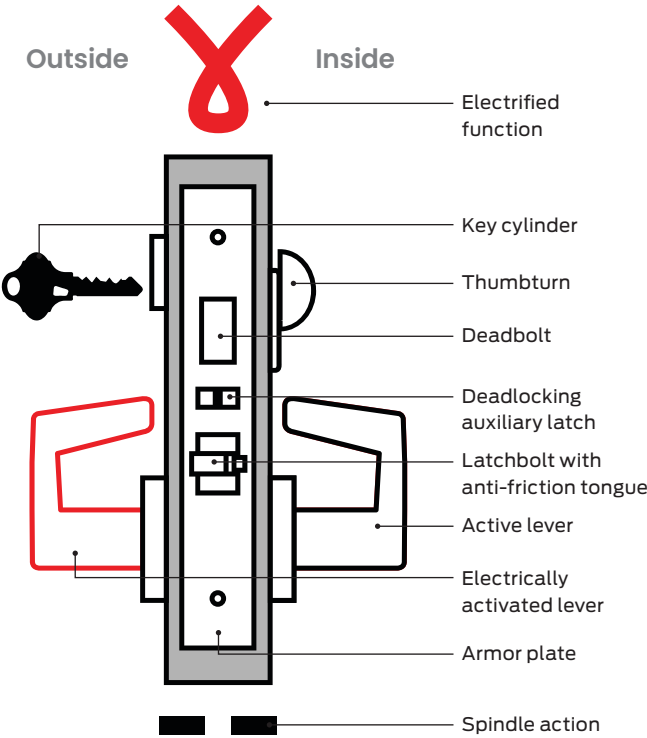


Chevron Indicator

Functions L9486, L9496, and L496 (sectional trim only) use the 09-611 chevron style indicator. Available in these messages: "OCCUPIED", "DO NOT DISTURB" or "LOCKED".

Wired Electrified Lock Functions

Legend



Key

Fixed lever

Solid spindle – connected lever movement

Two-piece spindle – independent lever movement

Hospital latch trim available

High-security ligature resistant trim available

Ligature-resistant lever trim available

Ligature-resistant knob trim available

Available electrified options include:

- RX** Request to Exit
- LX** Latch bolt monitor
- DPS** Door Position Switch
- DM** Deadbolt monitor (DM)

Product identification guide

LV9492EL with XL13-439

Lock series and function code

- L = standard
- LV = Vandlgard® option
- LM = multi-latch
- LMV = multi-latch with Vandlgard

0 = no lock case (dummy trim)

9 = functions with lock case

0 = no deadbolt

4 = with deadbolt

Function code

Electrified functions

- EL = electrically locked
- EU = electrically unlocked

Functions requiring special ordering nomenclature

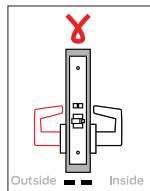


Vandlgard® feature helps protect the lock chassis from damage.

The Vandlgard optional feature available on many functions allows the outside lever to rotate freely down when in a locked state. This limits the ability of vandals to apply excessive force to the lever helping to prevent damage to internal components.

Non-Keyed Functions

Schlage L/LV9090EL/EU



**Electrically locking/
unlocking outside lever,
no cylinder**



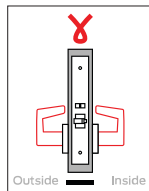
- Levers (or knobs) only both sides; latchbolt and deadlocking auxiliary latch
- Powered state: outside lever continuously locked (EL mode) or unlocked (EU mode); Vandlgard® option allows outside lever to rotate freely down while locked
- When power is removed (or power fails): in EL mode either lever will retract latchbolt; in EU mode outside lever is locked
- Inside lever always free for immediate egress

Note: Auto detects 12 or 24V DC.

Note: Ligature-resistant trims not available with Vandlgard option.

Ordering: Case-mounted switch allows field selectable EL/EU setting however, when ordering, please specify EL or EU.

ANSI - Schlage L/LV9091EL/EU



**Electrically locking/
unlocking both levers,
no cylinder**



- Levers (or knobs) only both sides; latchbolt and deadlocking auxiliary latch
- Powered state: both levers continuously locked (EL mode) or unlocked (EU mode); Vandlgard® option allows both levers to rotate freely down while locked
- When power is removed (or power fails): in EL mode either lever will retract latchbolt; in EU mode both levers are locked

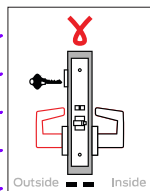
Note: Auto detects 12 or 24V DC.

Note: Ligature-resistant trims not available with Vandlgard option.

Ordering: Case-mounted switch allows field selectable EL/EU setting however, when ordering, please specify EL or EU.

Keyed Non-Deadbolt Functions

Schlage L/LV9092EL/EU



**Electrically locking/
unlocking outside lever,
outside cylinder**



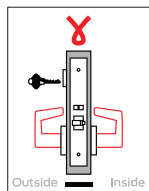
- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Powered state: outside lever continuously locked (EL mode) or unlocked (EU mode); Vandlgard® option allows outside lever to rotate freely down while locked
- Key outside retracts latchbolt but cannot change the normal locked or unlocked state of outside lever
- When power is removed (or power fails): in EL mode either lever will retract latchbolt; in EU mode outside lever is locked
- Inside lever always free for immediate egress

Note: Auto detects 12 or 24V DC.

Note: Hospital latch and ligature-resistant trims not available with Vandlgard option.

Ordering: Case-mounted switch allows field selectable EL/EU setting however, when ordering, please specify EL or EU.

ANSI - Schlage L/LV9093EL/EU



**Electrically locking/
unlocking both levers,
outside cylinder**



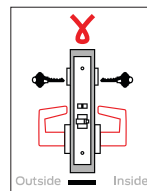
- Key cylinder outside with lever (or knob); lever only-inside; latchbolt and deadlocking auxiliary latch
- Powered state: both levers continuously locked (EL mode) or unlocked (EU mode); Vandlgard® option allows both levers to rotate freely down while locked
- Key outside retracts latchbolt but cannot change the normal locked or unlocked state of either lever
- When power is removed (or power fails): in EL mode either lever will retract latchbolt; in EU mode both levers are locked

Note: Auto detects 12 or 24V DC.

Note: Ligature-resistant trims not available with Vandlgard option.

Ordering: Case-mounted switch allows field selectable EL/EU setting however, when ordering, please specify EL or EU.

ANSI - Schlage L/LV9095EL/EU



**Electrically locking/
unlocking both levers,
double cylinder**



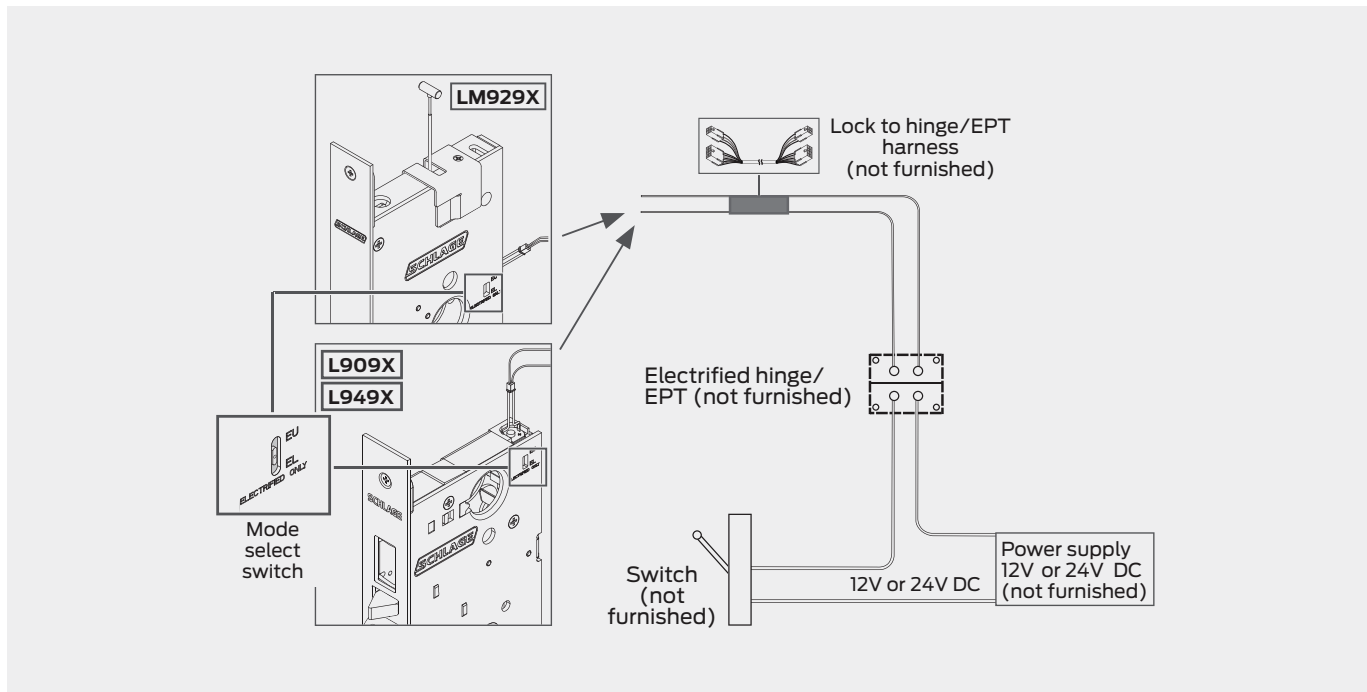
- Key cylinder both sides; latchbolt and deadlocking auxiliary latch
- Powered state: both levers (or knobs) continuously locked (EL mode) or unlocked (EU mode); Vandlgard® option allows both levers to rotate freely down while locked
- Key on either side retracts latchbolt but cannot change the normal locked or unlocked state of levers
- When power is removed (or power fails): in EL mode either lever will retract latchbolt; in EU mode both levers are locked

Note: Auto detects 12 or 24V DC.

Note: Hospital latch and ligature-resistant trims not available with Vandlgard option.

Ordering: Case-mounted switch allows field selectable EL/EU setting however, when ordering, please specify EL or EU.

Wiring Diagrams



Electrical Requirements

The L Series electrified locks are powered by DC power only. Do not use AC power. In addition to Allegion Connect connector, an extended-length molex-to-traditional terminal wiring harness is shipped with every lock.

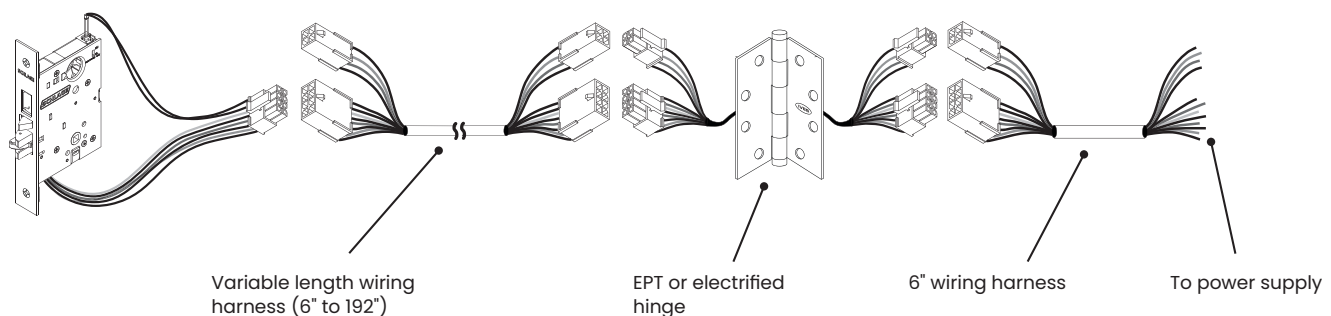
- Voltage: 12V or 24V DC (maximum 26.4 V, minimum 10.8 V)
- Peak current:
 - 12V operating voltage 1.0 amp
 - 24V operating voltage 0.4 amp
- Holding current: 0.1 amps
- Operating temperature: -32°F to 120°F (-0°C to 49°C)
- Maximum relative humidity: 93%

Available Options

- Request to Exit (RX)
- Latchbolt Monitor (LX)
- Door Position Sensor (DPS) – non-deadbolt functions only
- Deadbolt Monitor (DM) – deadbolt functions only (standard on electrified deadbolt functions)

Allegion Connect

This factory-installed Molex connector system utilizes quick-connect harnesses and hinges for a quick and easy way to connect power sources; all the way from your power supply to electrified door hardware. Alternately, the connector can be cut off and the lock installed with traditional wire splicing methods. Note that the Allegion Connect harnesses and hinges are sold separately.



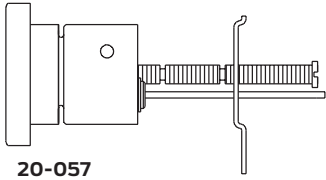
FSIC cylinders to use with rim and mortise exit devices

Security	Key mechanism	Pins	Patent protected keyway families	Rim cylinders for exit devices	Mortise cylinders for Von Duprin and other straight cam applications	
				Core and housing	Cylinder with compression ring, spring and blocking ring	Cylinder with compression ring and spring
Basic security	Standard pin and tumbler	6	— ¹	20-057	20-061	26-091
	Open keyways	Check pin	S (Everest 29)			
Enhanced security	Check pin	6	T (Everest 29)	20-057	20-061	26-091
	Restricted use	SL	R (Everest 29)	91-170	91-173	91-171
Upgraded security	Legacy Primus	6	S, T (Everest 29)	20-757	20-771	20-763
	Primus level restricted use, geographic exclusivity, and independent sidebar	Primus RP	Obverse ¹ (Classic)	20-757-RP	20-771-RP	20-763-RP
		Primus XP	S, T (Everest 29)	20-757-XP	20-771-XP	20-763-XP
		Primus XP SL	R (Everest 29)	91-870-XP	91-873-XP	91-871-XP
Housing less core				20-079	26-094	26-064

1. Out-of-patent keyways like Classic Obverse are available. Obverse, however, can gain patent protection in a Primus RP or XP cylinder. RP is recommended because patent coverage carries to 2029 versus 2024 for Primus XP.

Security	Key mechanism	Pins	Patent protected keyway families	Adams Rite MS, 4500 and 4700 Series, Lori 4500 Series, and Corbin Russwin DL3000 Series deadlocks/ deadlatches		Adams Rite 4070 deadbolt
				Cylinder with compression ring, spring and 3/16" plus 3/8" blocking rings	Cylinder with compression ring and spring	Cylinder with compression ring, spring and 3/16" plus 3/8" blocking rings
Basic security	Standard pin and tumbler	6	— ¹	20-062	26-098	20-091
	Open keyways	Check pin	S (Everest 29)			
Enhanced security	Check pin	6	T (Everest 29)	20-062	26-098	20-091
	Restricted use	SL	R (Everest 29)	91-174	91-172	91-175
Upgraded security	Legacy Primus	6	S, T (Everest 29)	20-766	--	20-722
	Primus level restricted use, geographic exclusivity, and independent sidebar	Primus RP	Obverse ¹ (Classic)	20-766-RP	--	20-722-RP
		Primus XP	S, T (Everest 29)	20-766-XP	--	20-722-XP
		Primus XP SL	R (Everest 29)	91-874-XP	--	91-875-XP
Housing less core				20-060 ²	--	20-090 ²

1. Out-of-patent keyways like Classic Obverse are available. Obverse, however, can gain patent protection in a Primus RP or XP cylinder. RP is recommended because patent coverage carries to 2029 versus 2024 for Primus XP.
2. Housing only - does not come with compression ring, spring, or blocking ring.



20-057



K510-711
Adams Rite
MS cam



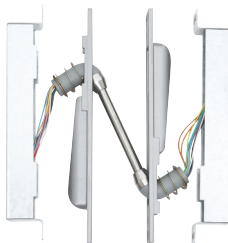
B520-378
Adams Rite
4070 cam

Power transfers and electromagnetic locks

Electrical power transfer (EPT)

Pneumatic transfer (PNT)

Electric Power Transfer provides a means of transferring electrical power from a door frame to the edge of a swinging door. The units are completely concealed when the door is in the closed position, and are ideal for installations involving abuse or heavy traffic.



Two models are available; EPT-2, two 18 gauge wires and EPT-10, ten 24 gauge wires. The EPT-2, EPT-10, and PNT-1 are UL listed as "miscellaneous fire door accessories". UL Listed for use on fire doors. PNT-1 has one 5/32" tube.

Door applications:

Degree of opening	Hinge type	Door thickness
0-180	Up to 5" butt hinges	1 3/4"
0-180	Up to 3/4" offset pivots	1 3/4"
0-130	5 1/2" butt hinges	1 3/4"
0-110	6" butt hinges	1 3/4"
0-90	Swing clear hinges	1 3/4"

Finishes

SP28 (sprayed aluminum)

SP313 (sprayed duranodic)

Dimensions

Housing	9" x 1 1/4" x 1 5/8" (229mm x 32mm x 38mm)
EPT-2	Two 18 gauge wires, Up to 2 AMPS @ 24VDC, with a 16 AMPS Maximum Surge
EPT-10	Ten 24 gauge wires, Up to 1 AMPS @ 24VDC, with a 16 AMPS Maximum Surge
PNT-1	5/32" Tubing

To order, specify:

1. EPT-2, EPT-10 or PNT-1.
2. Finish, SP28 or SP313.

Electromagnetic locks

Schlage has a rich heritage in electronic security. For years we have led the industry by providing a broad portfolio of solutions to meet the diverse needs of the market. Today, our electromagnetic locking portfolio continues to evolve to meet your changing needs.

Schlage electromagnetic locks are used to secure the door in conjunction with push bars, request to- exit devices, or credential readers for fail-safe applications when code compliance permits. You can use them on a single standalone door or as part of an access control system. Electromagnetic locks do not contain moving parts, making them extremely durable and preferred for high security applications.

Electromagnetic locks consist of an armature and a coil assembly, which become magnetized when an electric current passes through them. This magnetic field secures the door. Electromagnetic locks are fail-safe by design. To unlock the door simply remove power.

M400 Series electromagnetic locks

The M400 Series is a robust line of electromagnetic locks with unique new design elements that make them easy to install and secure.

Features:

- Auto voltage selection is standard
- Plus Package (P) adds magnetic bond sensor, relocking time delay, door status monitor
- Optional mounting kits available including: Top Jamb Mount, Double and Glass Door

Certifications:

- UL 1034
- UL 10C 3 hour fire rating
- BHMA Grade 1
 - M420 – 500 lb. hold force for traffic control
 - M450 – 1000 lb. hold force for high security
 - M490 – 1500 lb. hold force for max security

Electromagnetic specialty locks

Schlage's electromagnetic specialty locks provide flexibility for a variety of applications. They offer a depth of features and a proven record of performance.

Features and certifications:

M490DE: Delays egress with 15 second timer: includes integrated alarm

- Designed to meet NFPA 101 & BOCA, UL 10C 3 hr fire rating, UL 294, and BHMA 1500 lb. hold force

M490G: Gate lock is weather resistant for exterior swinging and sliding gates

- BHMA 1500 lb. hold force rated GF3000: Concealed locking mechanism enhances security and appearance
- UL 10C 3 hr fire rating, BHMA 1500 lb. hold force 320M: MiniLine is mortise designed for interior sliding doors
- UL 10C 3 hr fire rating, UL 1034 listed

40/70 Series Electromagnetic Locks

Ease of installation makes the 40/70 Series a perfect choice for retrofit applications. It is also easy to select and stock.

Features and Certifications:

- Magnetic bond sensor and door status monitor standard
- UL 10C 1 hour fire rating and BHMA Grade 1:
 - 40 Series – 500 lb. hold force
 - 70 Series – 1000 lb. hold force

Power supplies

PS900 Series power supplies



Overview:

The PS900 Series is a consolidated line of power supplies and accessories that offer enhanced flexibility and functionality specific to the changing needs of the access control market. The PS900 Series can be used in a variety of applications to convert high voltage AC power into the regulated low voltage DC outputs required by most access control devices. The PS900 Series protects devices downstream by providing Class 2*, filtered and regulated power. The full line is UL294 certified.

Features:

- Constant output rating at both 12 VDC or 24 VDC provides superior performance ; includes field selectable jumper
- Flat mounting of option boards provides easier access to terminal blocks for connection of electrified devices
- High voltage protective cover
- Battery back-up board auto-selects voltage
- Fire alarm relay can be configured to provide either switched or un-switched outputs from a power supply
- PS914 designed with high inrush current for powering solenoid-driven EL exit devices
- Universal 120-240 VAC input
- Low voltage DC, regulated and filtered
- Electronic power limiting foldback circuit for AC current overload protection
- Fused primary input
- AC status monitor- isolated SPDT contacts
- AC input and DC output LED status indicators
- Cover mounted AC input indication
- Hinged cover with lock down screws

Certifications:

- UL 294 certified—the standard for access control
- Class 2 rated*

The PS900 Series offers a variety of distribution options, including basic fuse protection, simple relay, and advanced logic providing complex sequencing and timing functions.

Connectors on the power supply

Product	Schlage PS902	Schlage PS904	Schlage PS906	Von Duprin PS914
Amperage	2 amps	4 amps	6 amps	4 amps with 16 amp inrush
Distribution boards	1	2	3	2
Battery back-up board	1	1	1	1
EL Compatible	No	No	No	Yes

Applications:

The PS900 Series of power supplies works with many electrified devices including Schlage electromagnetic locks, Schlage AD-Series hardwired locks, Schlage electrified mechanical locks, Von Duprin electrified strikes , Von Duprin exit devices, and many other brands.

Accessories:

The PS900 Series features seven option boards for use in a variety of applications. All PS900 Series power supplies option boards are UL 294 certified.

Option boards:

900-4R: 4 relay controlled output board to power multiple devices

900-4RL: 4 relay distribution board with logic is field configurable for time delay function, auto operator, security interlock

900-8F: Provides 8 individually fuse-protected outputs, giving the flexibility to power multiple devices and provide another layer of protection

900-8P: Provides 8 individually PTC -protected (thermally protected) outputs, giving the flexibility to power multiple devices and provide another layer of protection

900-FA: Emergency interface relay integrates with fire alarm and is used to cut power in case of emergency**

900-BB: Battery backup

900-2RS: 2 relay control board for electric latch panic devices (EL or QEL), electric strikes or electrified trim

900-BBK: Battery backup kit includes two 7A/hr batteries and provides up to four hours of backup power when cycled every 5 minutes at full load

Additional options:

900-KL: Key lock

BAA: Buy American Act compliant product

* PS906, output rating exceeds Class 2 power limits, but can provide Class 2 rated outputs when used with 900-8P distribution board.

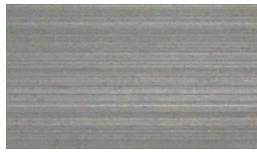
** One fire alarm board can be connected directly to the PS902. If a fire alarm board is desired for the PS904, PS906 or PS914 it can be connected to a distribution board.

Perimeter seals

Accessories and options



Finishes



A
Aluminum Mill Finish



AA
Aluminum Clear Anodized
(628, US28)



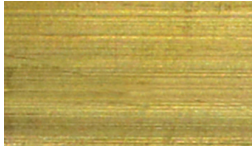
BK*
Aluminum Black Anodized
(711, US315AN)



D*
Aluminum Dark Bronze
Anodized (710, US313AN)



G*
Aluminum Gold Anodized
(688, US10AN)



B
Bronze, Architectural
Mill Finish



B-ORB
Oil-Rubbed Bronze
(613, US10B)

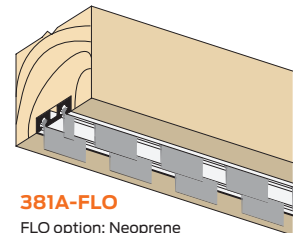
*Black, Dark Bronze and Gold anodized aluminum finishes will show wear over time and are not included in the standard warranty. Black, Dark Bronze and Gold anodized aluminum finished products may require a longer lead time, please contact customer service for accurate lead times.

Options

FLO	Air flow/ sound block	ZAG	Ligature resistant gasketing	SEC	Security screws
PSA	Pressure-sensitive adhesive	S	Order as a set		

Airflow/sound block (FLO)

Available as an option for mortised door shoe models #381 and #3546. The FLO configuration is a practical solution for applications requiring air flow while blocking light and sound as much as possible. The design uses sound-damping neoprene or EPDM seals which are notched and overlapped in staggered rows. This feature is commonly used for hotel doorways designed to exchange or amplify air conditioning between guest rooms and hallways.

**381A-FLO**

FLO option: Neoprene seals are notched and overlapped to facilitate air flow.

Pressure-sensitive adhesive (PSA)

PSA is available as an option for door sweep and meeting stile models #8192, #8193, and #8194. Perimeter seals that are supplied with PSA standard are designated by model numbers showing “-PSA.” When PSA is specified, the models will be provided with PSA applied instead of with holes and standard screws.

Ligature resistant gasketing (ZAG)

This patented ligature-resistant option prevents unintended usage of the gasketing, including harming oneself or others. When ZAG is specified, the rubber is scored before insertion into the aluminum extrusion. This allows for normal function for its specified purpose, but the seal will now break apart if removal is attempted or any weight is placed on the seal.

Order as a set (S)

Head and jamb gasketing and adjustable sealing systems can be ordered either as “straight-stick” components (order by length) or as a set of three components – two side jambs and a head jamb (order by size of door opening = Width" x Height"). Other perimeter seals are ordered only as “straight-stick.”

Security screws (SEC)

Tamper-resistant Torx security screws. Prevents unauthorized removal in hospitals, schools and public places.

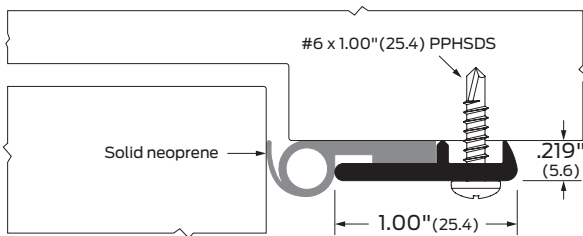


Perimeter seals

Head and jamb gasketing

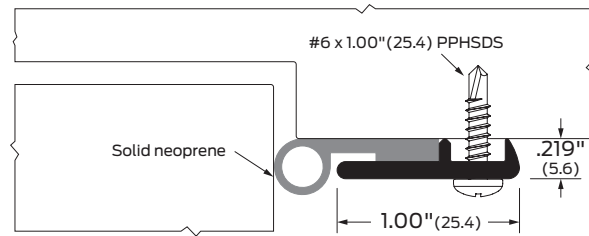


326



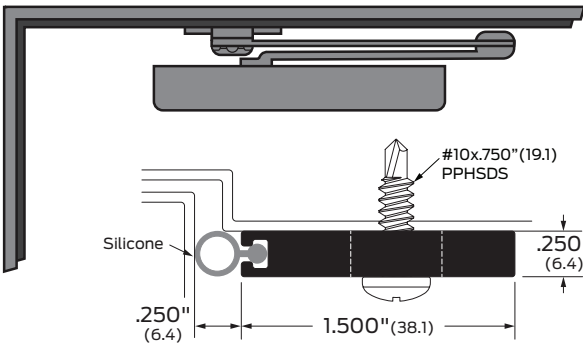
Finishes: AA, BK, D, G, B, B-ORB
Options: ZAG, S, SEC
ANSI/BHMA: 326AA, 326BK, 326D, 326G R3B164 R1B164
BHMA CERTIFIED
 Neoprene extruded bulb/finger for secure seal.

328



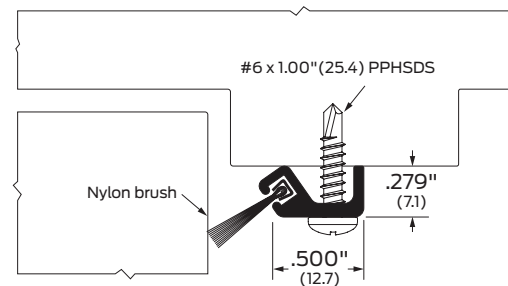
Finishes: AA, BK, D, G, B, B-ORB
Options: ZAG, S, SEC
ANSI/BHMA: 328AA, 328BK, 328D, 328G R3B164 R1B164
BHMA CERTIFIED
 ZAG option for mental health applications includes security screws

429



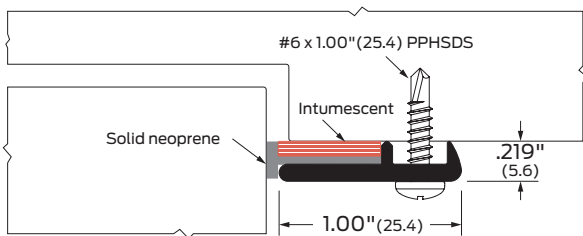
Finishes: AA, BK, D, G
Options: S, SEC
ANSI/BHMA: 429AA, 429BK, 429D, 429G R3E164
BHMA CERTIFIED
 Gasketing protection for closer bracket or door coordinator.

8305



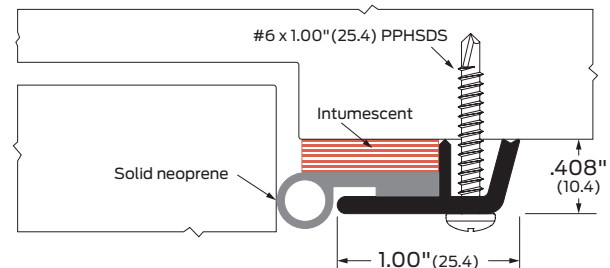
Finishes: AA, BK, D, G
Options: S, SEC
ANSI/BHMA: 8305AA, 8305BK, 8305D, 8305G R3A166

302FS



Finishes: AA, BK, D, G, B
Options: S, SEC
ANSI/BHMA: 302FS-AA, 302FS-BK, 302FS-D, 302FS-G R3R164

328FS



Finishes: AA, BK, D, G
Options: S, SEC
ANSI/BHMA: 328FS-AA, 328FS-BK, 328FS-D, 328FS-G R3R164
BHMA CERTIFIED

See Perimeter seals Accessories & options page for details.

Finishes:	Options:
AA Aluminum clear anodized	ZAG Ligature resistant gasketing
BK Aluminum black anodized	S Order as a set
D Aluminum dark bronze anodized	SEC Security screws
G Aluminum gold anodized	

Note:

All items on this page:

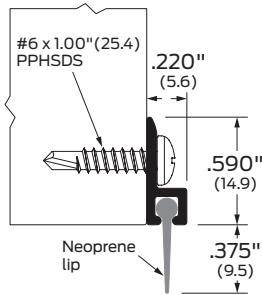




Perimeter seals

Door sweeps

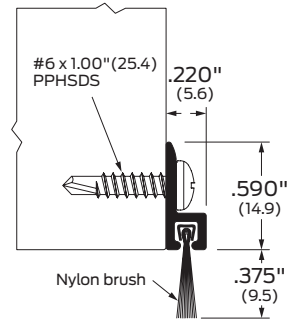
8194



Finishes: Options: ANSI/BHMA:
AA, BK, PSA, 8194AA, 8194BK, 8194D, 8194G R3B434
D, G SEC



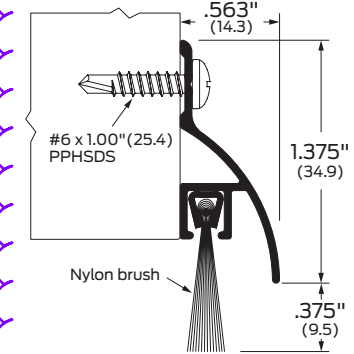
8193



Finishes: Options: ANSI/BHMA:
AA, BK, PSA, S, 8193AA, 8193BK, 8193D, 8193G R3A436
D, G SEC



8198

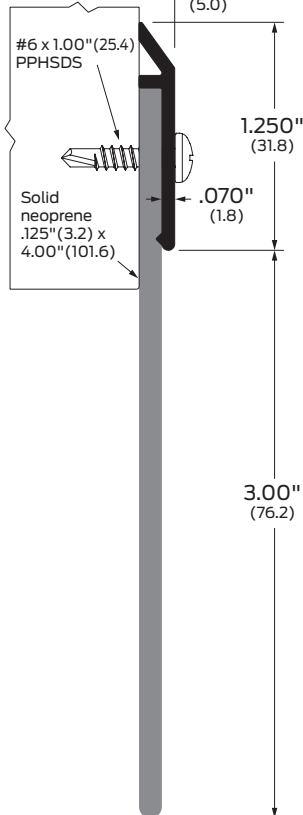


Finishes: Option: ANSI/BHMA:
AA, BK, SEC 8198AA, 8198BK, 8198D, 8199G R3A536
D, G

Surface-mounted with rain drip.



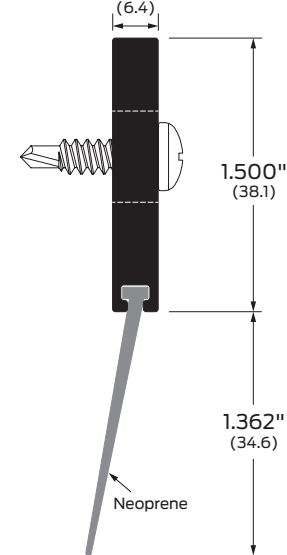
639W



Finishes: Option: ANSI/BHMA:
A, BK, SEC 639WA, 639WAA, 639WBK, 639WD, 639WG R3B434
D, G

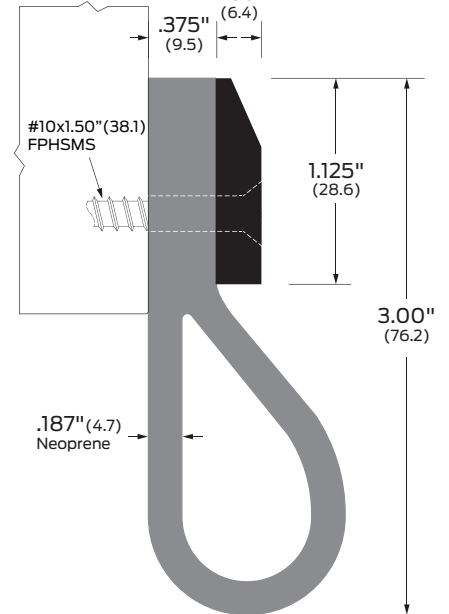


95



Finishes: Option:
AA, BK, SEC
D, G
Suitable for heavy-duty overhead door

93



Finishes:
A, BK,
D, G
Door sweep for industrial applications. 3/16" thick oil-resistant neoprene extrusion (Class II, Grade 60) Intended for garage door or overhead door. For hollow metal application.

Thresholds

Automatic door bottoms

Perimeter seals

Weatherstripping

Intumescent

Sound control

Specialty applications

Appendix

See Perimeter seals Accessories & options page for details.

Finishes:

A Aluminum mill finish
AA Aluminum clear anodized
BK Aluminum black anodized
D Aluminum dark bronze anodized
G Aluminum gold anodized

Options:

PSA Pressure-sensitive adhesive
S Order as a set
SEC Security screws

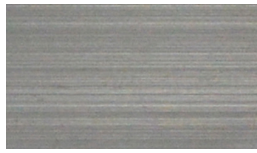
Note:

Door sealing systems

ADA Thresholds



Finishes



A
Aluminum Mill Finish



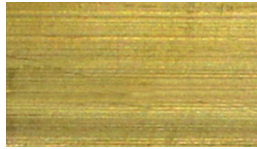
BK*
Black Anodized
(711, US315AN)



D*
Aluminum Dark Bronze
Anodized (710, US313AN)



G*
Aluminum Gold Anodized
(688, US10AN)



B
Bronze, Architectural
Mill Finish



B-ORB
Oil-Rubbed Bronze
(613/ US10B)



B-SAT
Satin Polished Bronze

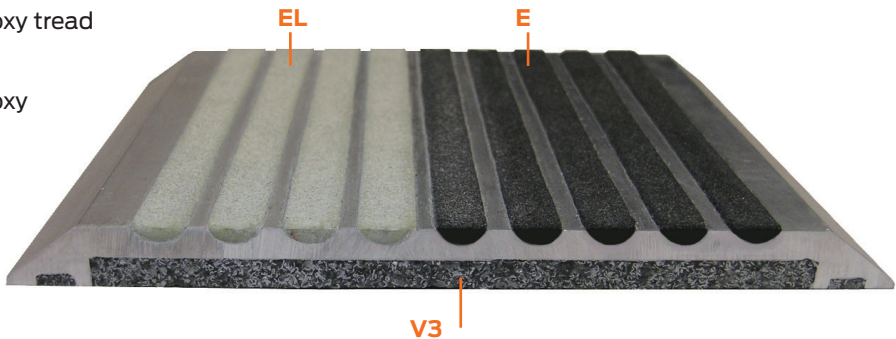


B-POL
High Buff Polished Bronze

*Black, dark bronze and gold anodized aluminum finishes will show wear over time and are not included in the standard warranty. Black, dark bronze and gold anodized aluminum finished products may require a longer lead time, please contact customer service for accurate lead times.

Options

- E** Epoxy abrasive tread
- EL** Photoluminescent and abrasive epoxy tread
- V3** Full body strength
- ELV3** Photoluminescent and abrasive epoxy tread, full body strength fill
- EV3** Epoxy and full body strength
- NH** No holes
- WH** Weep hole
(available on 76, 175 models only)
- BV** Beveled edges
(length only - 600 and 601)



Non-slip epoxy abrasive (E or EL)

Thresholds can be ordered with non-slip epoxy abrasive particles bonded into the grooves, with (EL) or without (E) photoluminescence for exit path markings. The tread provides a coefficient of friction of 1.02 dry and 0.98 wet to comply with ADA, OSHA and most local building code requirements.

Full body strength (V3)

An aluminum composite filler containing aluminum oxide and silicon carbide. Available as option for most profiles, with no requirement for customized extrusions. Ideal applications include: heavy commercial traffic in supply rooms, manufacturing plants, schools, cafeterias, automobile dealers, hospitals, industrial facilities. This option is not fire rated.

No holes (NH)

Models supplied standard without mounting holes are noted on the product pages. All other models are supplied standard with mounting holes. Specify NH to order models without mounting holes drilled.

Finishes:

- A** Aluminum mill finish
- BK** Aluminum black anodized
- D** Aluminum dark bronze anodized
- G** Aluminum gold anodized
- B** Bronze, architectural mill finish
- B-ORB** Oil-rubbed bronze

Options:

- E** Epoxy abrasive tread
- EL** Photoluminescent and abrasive epoxy tread
- V3** Full body strength
- EV3** Epoxy and full body strength
- ELV3** Photoluminescent and abrasive epoxy tread, full body strength fill

Note:

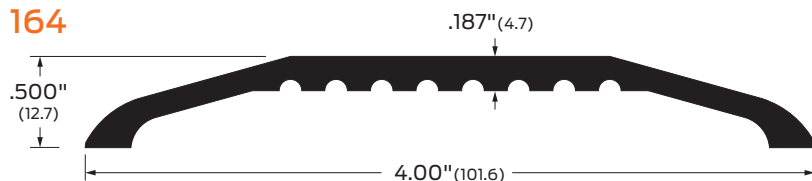
Special anchors available for mounting most thresholds on concrete surfaces.

Thresholds

Saddle thresholds



164

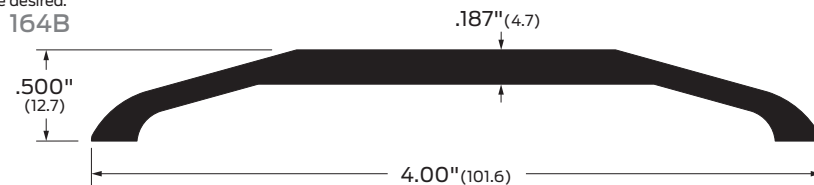


Finishes: ANSI/BHMA:
A, BK, D, G 164A, 164BK, 164D, 164G J32300, J32330
164A-E, 164BK-E, 164D-E, 164G-E J32400, J32430



Model #654 is a recommended alternative if epoxy and/or body strength fills are desired.

164B

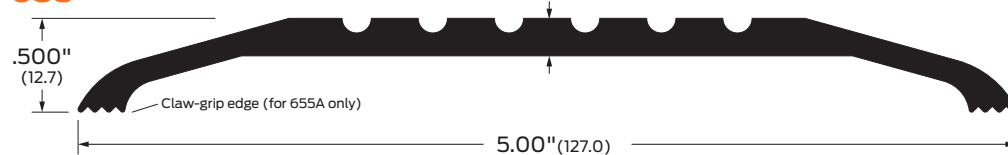


Finishes: ANSI/BHMA:
B, B-ORB 164B J12100, J12130
164B-E J12200, J12230

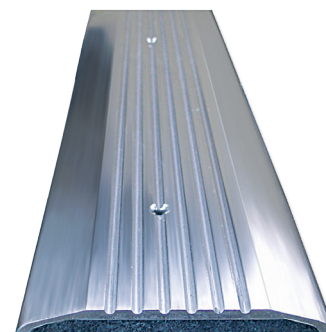


Model #654 is a recommended alternative if epoxy and/or body strength fills are desired.

655

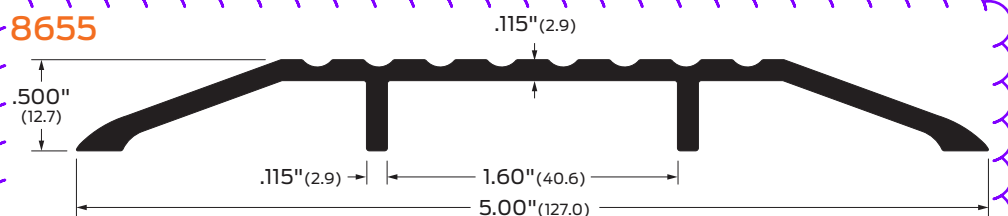


Finishes: A, BK, D, G, E, EL, V3, EV3, ELV3, B, B-ORB
Options: E, EL, V3, EV3, ELV3 (not available for B-ORB finish)
ANSI/BHMA: 655A, 655BK, 655D, 655G J32100, J32130
655A-E, 655BK-E, 655D-E, 655G-E J32200, J32230
655B J12100, J12130
655B-E J12200, J12230



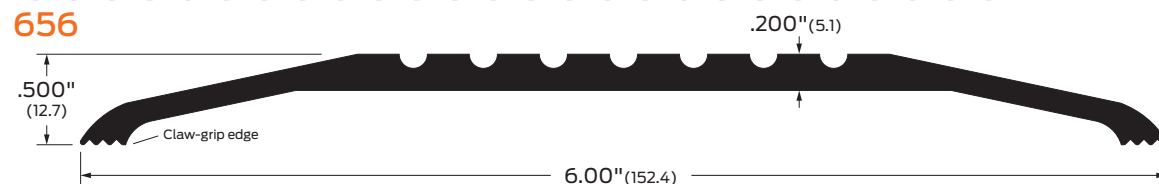
655A-V3 (Full body strength)

8655



Finishes: A, BK, D, G, E, EL, V3, EV3, ELV3
Options: E, EL, V3, EV3, ELV3
ANSI/BHMA: 8655A, 8655BK, 8655D, 865G J32100, J32130
8655A-E, 8655BK-E, 8655D-E, 8655G-E J32200, J32230

656



Finishes: A, BK, D, G, B, B-ORB
Options: E, EL, V3, EV3, ELV3 (not available for B-ORB finish)
ANSI/BHMA: 656A, 656BK, 656D, 656E J32100, J32130
656A-E, 656BK-E, 656D-E, 656G-E J32200, J32230
656B J12100, J12130
656B-E J12200, J12230

Supplied without mounting holes.

All items on this page:



See Thresholds Accessories & options page for details.

Finishes:

A Aluminum mill finish
BK Aluminum black anodized
D Aluminum dark bronze anodized
G Aluminum gold anodized
B Bronze, architectural mill finish
B-ORB Oil-rubbed bronze

Options:

E Epoxy abrasive tread
EL Photoluminescent and abrasive epoxy tread
V3 Full body strength
EV3 Epoxy and full body strength
ELV3 Photoluminescent and abrasive epoxy tread, full body strength fill

Note:

Special anchors available for mounting most thresholds on concrete surfaces.

Perimeter seals

Accessories and options

**Security thru sex bolt**

Offered for models #43 SP and #43STST, this assembly consists of:

- 1/4-20 X .75" (25.4) FPHSMS
- 1/4-20 X 1.50" (25.4) sex bolt

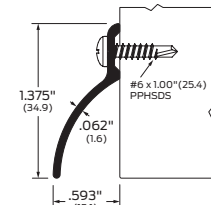
It may be used with doors up to 1 3/4" thick.

Replacement rubber seals

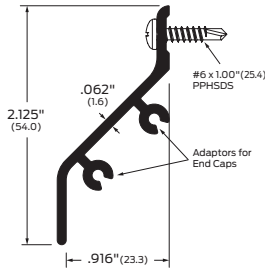
Replacement seals are available for perimeter seal models containing rubber components. See appendix for replacement rubber seals. If viewing an interim version of the catalog, please contact Tech Support for replacement rubber information.

Specialized perimeter seal accessories

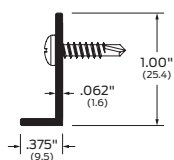
Specialty exterior protection – Rain drips for outswing doors.

11 Rain drip

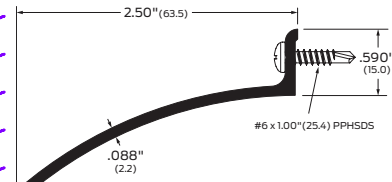
Finishes: AA, BK, D, G Option: SEC ANSI/BHMA: 11AA, 11BK, 11D, 11G R3Y936

141 Rain drip

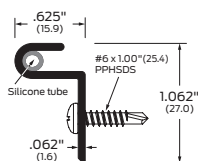
Finishes: AA, BK, D, G Option: SEC ANSI/BHMA: 141AA, 141BK, 141D, 141G R3Y936

25 Interlocking angle

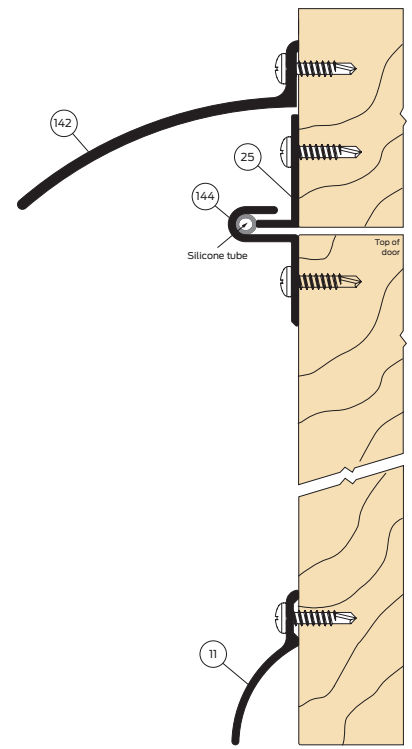
Finishes: AA, BK, D, G Option: SEC
This accessory can be used interlocking with rain seal model #144 to impede water ingress through perimeter seals on out-swinging doors.

142 Rain drip

Finishes: AA, BK, D, G Option: SEC ANSI/BHMA: 142AA, 142BK, 142D, 142G R3Y976

144

Finishes: AA, BK, D, G Option: SEC

Application
Order models separately.

All items on this page:



See Perimeter seals Accessories & options page for details.

Finishes:

AA Aluminum clear anodized
BK Aluminum black anodized
D Aluminum dark bronze anodized
G Aluminum gold anodized

Option:

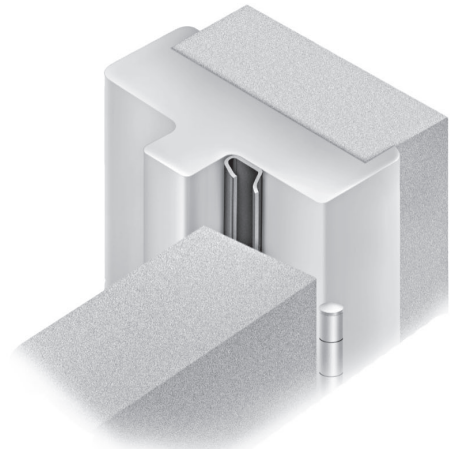
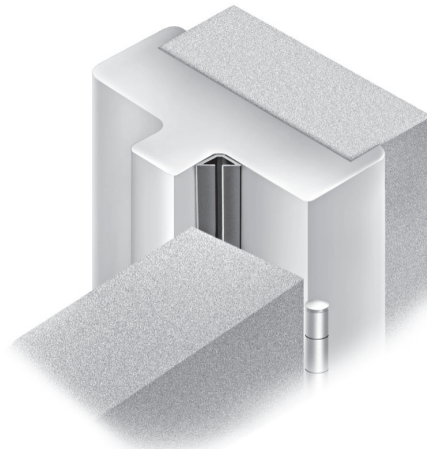
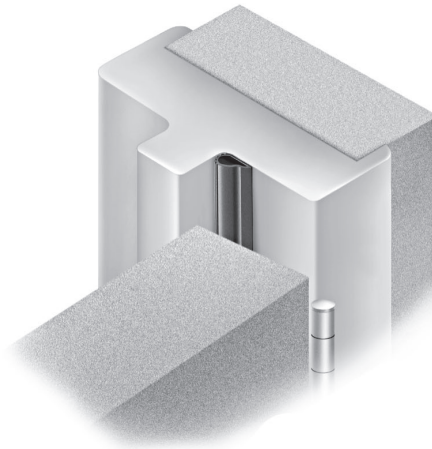
SEC Security screws

Note:

Weatherstripping

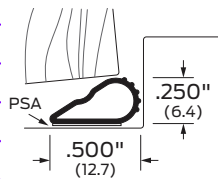
Self-adhesive weatherstripping

Solid neoprene and silicone seals



188 /488

188S/188FS/188BIO



Material/ Finishes:
 S: BK, BR, CL, GY, WH
 FS: BK
 BIO: BR

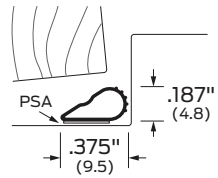
Options:
 ZAG
 ZAG
 ZAG

ANSI/BHMA:
 188S
 ROE151
 188FS
 ROU154
 -

S: PSA standard.
 FS: Intumescent rubber for fire and smoke protection. PSA standard.
 BIO: BioWall antimicrobial rubber. PSA standard.



488S/488FS/488BIO



Material/ Finishes:
 S: BK, BR, CL, GY, WH
 FS: BK
 BIO: BR

Options:
 ZAG
 ZAG
 ZAG

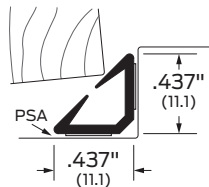
ANSI/BHMA:
 488S
 ROE154
 488FS
 ROU154
 -

S: PSA standard.
 FS: Intumescent rubber for fire and smoke protection. PSA standard.
 BIO: BioWall antimicrobial rubber. PSA standard.



8144

8144S/8144FS

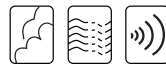


Finishes:
 S: BK
 FS: BK

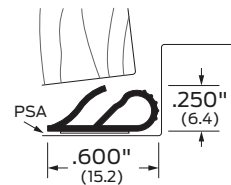
Options:
 ZAG
 ZAG

ANSI/BHMA:
 8144S
 ROE154
 8144FS
 ROU154

S: PSA standard.
 FS: Intumescent rubber for fire and smoke protection. PSA standard.



8145S



Finish:
 BK

Option:
 ZAG

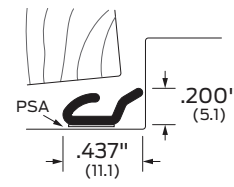
ANSI/BHMA:
 8145S
 ROE154

PSA standard.



8042

8042S



Finish:
 BK

Option:
 ZAG

ANSI/BHMA:
 8042S
 ROE154

PSA standard.



All items on this page:



See Weatherstripping Accessories & options page for details.

Finishes:

BK Black
BR Brown
CL Clear
GY Gray
WH White
B Architectural mill finish bronze

Option:

ZAG Ligature-resistant gasketing