

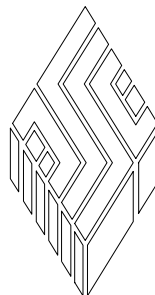


Regal Stainless Steel Cages

- *Strong, durable, welded stainless steel*
- *Many sizes and styles to fit your needs*
- *Combine to form dozens of arrangements*
- *Wide range of handy accessories*

New Model Numbers: 12000-00-CTCTEI, 12000-00-CTDREI,
12000-00-DRCTEI, 12000-00-DRDREI, 12000-00-DREPEI, 12000-00-DRFNEI,
12001-00-DRHJEI, 12000-00-EPDREI, 12000-00-EPEPEI, 12000-00-EPFNEI,
12000-00-EPGLEI, 12000-00-EPHJEI, 12001-00-EPHJEI, 12000-00-FNDREI,
12000-00-FNEPEI, 12000-00-FNFNEI, 12000-00-FNGLEI, 12000-00-FNHJEI,
12001-00-FNHJEI, 12001-00-FNJFEI, 12001-00-FNLBEI

Former Model Numbers: 102100-2, 102101-2, 102102-2,
103103-2, 102104-2, 102105-2, 102124-2, 102106-2, 102107-2,
102108-2, 102109-2, 102110-2, 102111-2, 102112-2, 102113-2,
102114-2, 102115-2, 103116-2, 102117-2, 102118-2, 102119-2



SSCI

Wheeling, IL (800) 323 7366

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Wheeling, Illinois 60090, USA

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Chapter 1 - General Information



Introduction

SSCI's Regal stainless steel cages are painstakingly engineered and crafted with quality and design features that you cannot find elsewhere. Made of heavy, 22 ga Type 304 stainless steel, the Regal cage is seam-welded into one strong, homogenous unit. All elements of the cage door are welded at every intersection, and the door fits close to the cage frame to protect the animal and minimize fluid leakage. All interior corners are curved to prevent the accumulation of debris and facilitate cleaning. The sturdy, 12 ga barrel-type hinges can be mounted to either side of the cage for your convenience.

Regal cages are available in a wide variety of sizes, with single or double-doors, and can be grouped into dozens of different arrangements to suit your facility's needs. Arrangements can easily be added to or reconfigured at any time. An extensive range of accessories, including shelves, full-view doors, heated cages, front/back cages, trim panels, stationary and mobile bases, therapy doors, and any many others, can be provided to tailor your cages to your exact requirements. SSCI provides expert design services to custom-fit your cages to your facility.

About this Manual

Every attempt has been made to insure that the information in this manual is correct and complete. SSCI, however, always welcomes our customer's suggestions for improvements to our products and associated publications.

Information and Safety Notices

In this manual you will find important information under the headings **Note:** and **CAUTION:**.

Notes

Under **Note:** headings, you will be given additional information pertinent to the subject discussed in that paragraph or step.

Example:

Measure two lengths of strapping to reach from one side of the center support, around the cage, to the other side of the center support. **Note:** The strapping should not pass over or under the center support.

CAUTIONS

Under **CAUTION:** headings, you will be alerted to potentially hazardous conditions which, if ignored or mishandled, could result in injury to yourself, or damage to the equipment.

Example:

CAUTION: Assembling and installing the Regal cages is not difficult. The cages are heavy, however, and we recommend that unpacking and assembly be done by at least two people.

SSCI Contact Information

Contact SSCI Customer Service by mail, telephone, or fax. The department is available from 8:30am to 5:00pm, Central Time, Monday through Friday. Closed holidays.

Address: Suburban Surgical Co., Inc.
275 Twelfth Street
Wheeling, Illinois 60090

Telephone: Illinois - (847) 537-9320, ext. 3518
Toll Free - (800) 323-7366

Fax: (847) 537-9061

Web: www.suburbansurgical.com

Models

Regal stainless steel cages are available in a variety of models, with single doors and double doors. All cage bodies measure 28.25 in. (71.75 cm) front to back. Cages measure 30.188 in. (76.68 cm) deep overall, including latch.

New Part Number	Former Part Number	Doors	Cage Size (inches)	Cage Size (centimeters)
12000-00-CTCTEI	102100-2	Single	18W x 18H	45.72W x 45.72H
12000-00-CTDREI	102101-2	Single	24W x 18H	60.96W x 45.72H
12000-00-DRCTEI	102102-2	Single	18W x 24H	45.72W x 60.96H
12000-00-DRDREI	102103-2	Single	24W x 24H	60.96W x 60.96H
12000-00-DREPEI	102104-2	Single	30W x 24H	76.20W x 60.96H
12000-00-DRFNEI	102105-2	Single	36W x 24H	91.44W x 60.96H
12001-00-DRHJEI	102124-2	Double	48W x 24H	121.92W x 60.96H
12000-00-EPDREI	102106-2	Single	24W x 30H	60.96W x 76.20H
12000-00-EPEPEI	102107-2	Single	30W x 30H	76.20W x 76.20H
12000-00-EPFNEI	102108-2	Single	36W x 30H	91.44W x 76.20H
12000-00-EPGLEI	102109-2	Single	42W x 30H	106.68W x 76.20H
12000-00-EPHJEI	102110-2	Single	48W x 30H	121.92W x 76.20H
12001-00-EPHJEI	102111-2	Double	48W x 30H	121.92W x 76.20H
12000-00-FNDREI	102112-2	Single	24W x 36H	60.96W x 91.44H
12000-00-FNEPEI	102113-2	Single	30W x 36H	76.20W x 91.44H
12000-00-FNFNEI	102114-2	Single	36W x 36H	91.44W x 91.44H
12000-00-FNGLEI	102115-2	Single	42W x 36H	106.68W x 91.44H
12000-00-FNHJEI	102116-2	Single	48W x 36H	121.92W x 91.44H
12001-00-FNHJEI	102117-2	Double	48W x 36H	121.92W x 91.44H
12001-00-FNJFEI	102118-2	Double	60W x 36H	152.40W x 91.44H
12001-00-FNLBEI	102119-2	Double	72W x 36H	182.88W x 91.44H

Table 1 - Regal Stainless Steel Cages - Models

Other Regal Models

Other versions of the Regal cages are available to meet your special requirements. Descriptions, pictures, and information on SSCI products can be found in our current catalog, and on our website at www.suburbansurgical.com. To order these products, refer to *Parts Ordering Procedure on Page 51*.

- Full-view back cages
- Front and back door cages
- Heated cages
- Transport cages
- Intensive care units
- Bases for intensive care units
- Cage doors for custom-built cages
- Stacking cat cages

Accessories

SSCI provides a variety of accessories for Regal cages to custom-fit them to your requirements. Descriptions, pictures, and information on SSCI products can be found in our current catalog, and on our website at www.suburbansurgical.com. To order accessories, refer to *Parts Ordering Procedure on Page 51*.

- Removable divider panels for double door cages
- Stainless steel resting shelves
- Top panels
- End panels
- Swivel casters
- Cage handles
- Noise reduction strapping
- Squeeze-back panels
- Oxygen therapy doors
- Pulmo-Aide compressors
- IV hooks
- Animal transfer doors
- Food and water bowls and holders
- Card holders
- Clipboards
- Medicine bins with clipboards
- Plastisol-coated, removable cage floors
- Stainless steel, removable cage floors
- Litter pans

Safety

CAUTION: When the cage is mounted on a mobile base, the wheel brakes should be engaged any time the assembly is not actually being moved. Be especially careful when the unit is not on a level surface and may be free to roll uncontrolled.

Refer to *Using the Wheel Brakes* on Page 44.

Care and Cleaning of Stainless Steel

Introduction

Stainless steel is steel alloyed with chromium to make it highly resistant to stain, rust, and corrosion. **Note:** This does NOT mean that stainless steel will *never* rust or corrode. Science has not yet developed a steel which is completely stainless or corrosion PROOF.

The type of stainless steel and finish selected by SSCI for Regal cages is the best available for the intended use.

Cleaning and Cleansers

The basic rule of thumb is to use the mildest cleaning agent that will do the job effectively. After cleaning, always rinse thoroughly with clear water, and dry completely. Frequent cleaning will prolong the service life of stainless steel equipment and will help maintain a bright, pleasing appearance.

Ordinary deposits of waste and fluids can usually be removed with soap and water. More stubborn deposits or tightly adhering debris may require harder scrubbing and possibly the use of commercial cleaning products acceptable for use on metal surfaces. When using any cleaning agent, rub in the direction of the polish lines or “grain” of the metal. For high luster finishes, clean soft cloths or pads should be used.

If especially rough cleaning is necessary, use “stainless steel” wool, nylon, or plastic scrubbers. Test these scrubbers in an inconspicuous area first to be sure they do not mar or scratch the stainless steel finish.

Minor scale build-up and some hard water spotting may be removed by washing with vinegar, followed by a neutralizing rinse with clear water and a thorough drying with a soft cloth. For heavy deposits of scale, 5% oxalic acid (use warm), 5-15% sulfamic acid, or 5-10% phosphoric acid may be used. Always follow with a neutralizing rinse of clean water and a thorough drying.

Deodorizing Agents, Disinfectants, and Sanitizers

The large selection of brands and combinations of chemicals available for deodorizing, disinfecting, and sanitizing is staggering. Select one or more agents for use in your facility only after weighing all the benefits claimed by each product. Often this choice is made without adequate consideration of the effects these agents may produce on equipment or furnishings.

CAUTION: Before selecting a chemical to employ in your facility, review label statements regarding use with metals (stainless steel). Always consult the chemical supplier if there are any doubts.

Avoid prolonged use of chlorides (such as chlorine bleach), bromides, iodides, and thiocyanates on stainless steel surfaces as these chemicals will cause pitting, corrosion, and metal discoloration. Allowing salty solutions to evaporate and dry on stainless steel may also contribute to corrosive conditions.

In summary, select chemical deodorizers, disinfectants, and/or sanitizers only after weighing all possible benefits and known adverse effects.

Effect on Warranty

The warranty for this product is void if the care and cleaning instructions provided in this manual are not followed.

Cleaning Requirements

Clean the Regal cage exactly in accordance with the cleaning instructions provided on *Page 46* of this manual.
Failure to follow these instructions can void your warranty.

Warranty

Suburban Surgical Company, Inc. warrants the original purchaser that our products are of the highest standards in material and workmanship. Our stainless steel components are guaranteed to last a lifetime assuming they are used as intended, properly maintained and cared for. Mechanical, electrical, electronic, hydraulic, and any product's devices carry a one year warranty.

Items purchased by Suburban Surgical Company, Inc. from other manufacturers and incorporated into our equipment are covered by the respective manufacturer's warranties.

Warranties will not apply if it is determined by Suburban Surgical Company, Inc. that the equipment became defective due to an accident, misuse, abuse, improper maintenance or alteration. Warranty freight charges are covered for the first year only.

Comments:

Chapter 2 - Parts Identification

Introduction

This chapter helps you in verifying that all required parts are present in the shipment, and aids you in identifying the various parts as you use them during assembly and installation.

If you have problems or require additional assistance, please feel free to call SSCI Customer Service at (800) 323-7366.

Unpacking and Inspection

CAUTION: Unpacking and assembling Regal cages is not difficult. The cages are heavy, however, and we recommend that unpacking and assembly be done by at least two people.

If the shipping containers appear damaged in any way, contact the shipping company immediately. Save all damaged packing materials to assist in proving liability for damage.

Carefully inspect all items while you unpack them. If any damage is noted, or if parts appear to be missing, call SSCI Customer Service at (800) 323-7366.

Unpack all cartons and packages to determine if all cages, bases, and hardware have been received. Match all hardware to the *Sales Agreement* and *Arrangement Drawing*. Refer to *Parts Included* starting on *Page 10* to identify parts.

Inspect all cartons and packages again to insure that no items have been overlooked. **Note:** Floor supports are packed *under* the bottom cardboard piece in the cage shipping carton and can easily be overlooked. Be sure to retrieve them before discarding the carton!

Parts Included

The parts included in the shipment fall into four categories:

- Cage(s)
- Base (if supplied by SSCI)
- Floor supports
- Assembly hardware

Cages

Each cage is individually packaged in its own shipping carton. (Floor supports are shipped in this carton under the bottom cardboard.) Refer to Table 1 on *Page 3* for a complete listing of cage part numbers, sizes, and door arrangements.

Bases

SSCI mobile and stationery bases are individually packaged in their own shipping tubes. For mobile bases, casters are included in a separate package. Refer to the *Owner's Manual* included with the base for assembly procedures.

Floor Supports

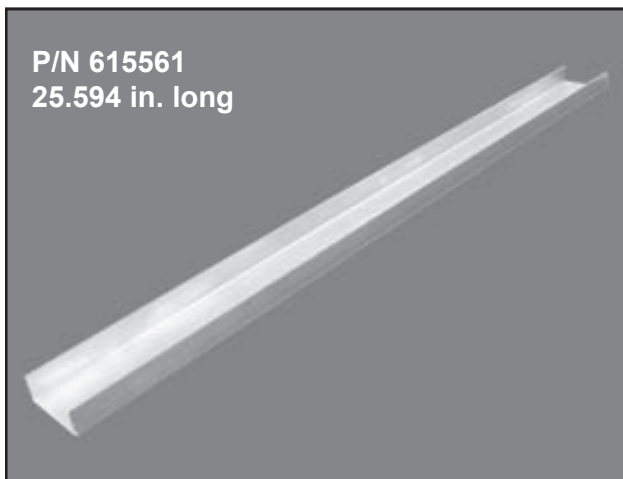
NOTE: The stainless steel floor supports are packed beneath the cage, *UNDER* the bottom cardboard, in the shipping carton. Be sure to retrieve them before discarding the carton!

There are two types of floor supports:

- Center supports
- Rear supports

Center Supports

All center supports (Figure 1) are identical but the quantity used varies with the size of the cage. The part number is 615561.



- One center support is used on 18 in., 24 in. and 30 in. wide cages.
- Two center supports are used on 36 in., 42 in. and 48 in. wide cages.
- Three center supports are used on 60 in. and 72 in. wide cages.

Figure 1. Center Support

Rear Supports

Only one rear support (Figure 2) is used with each cage, but its length will vary to match the cage width. Refer to Table 2 for part numbers.

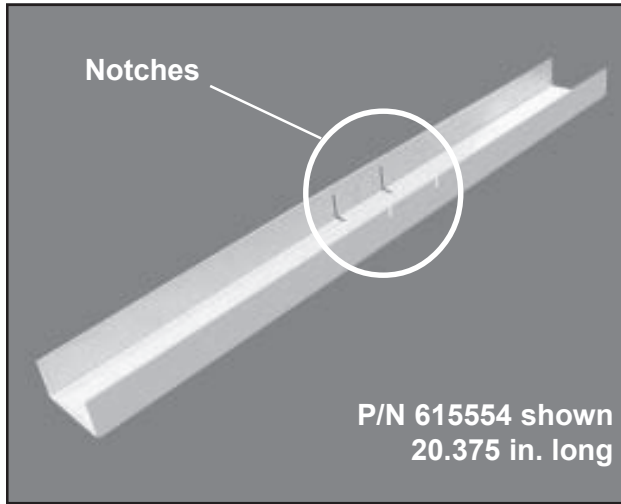


Figure 2. Typical Rear Support

Cage Width	Part Number
18 in. (45.72 cm)	615553
24 in. (60.96 cm)	615554
30 in. (76.20 cm)	615555
36 in. (91.44 cm)	615556
42 in. (106.68 cm)	615557
48 in. (121.92 cm)	615558
60 in. (152.40 cm)	615559
72 in. (182.88 cm)	615560

Table 2. Rear Support Part Numbers

Assembly Hardware

General

The hardware items and quantities supplied with your cages are matched to your specific cage arrangement. Make sure that the quantity of each item matches that on your *Sales Agreement* and your *Arrangement Drawing*.

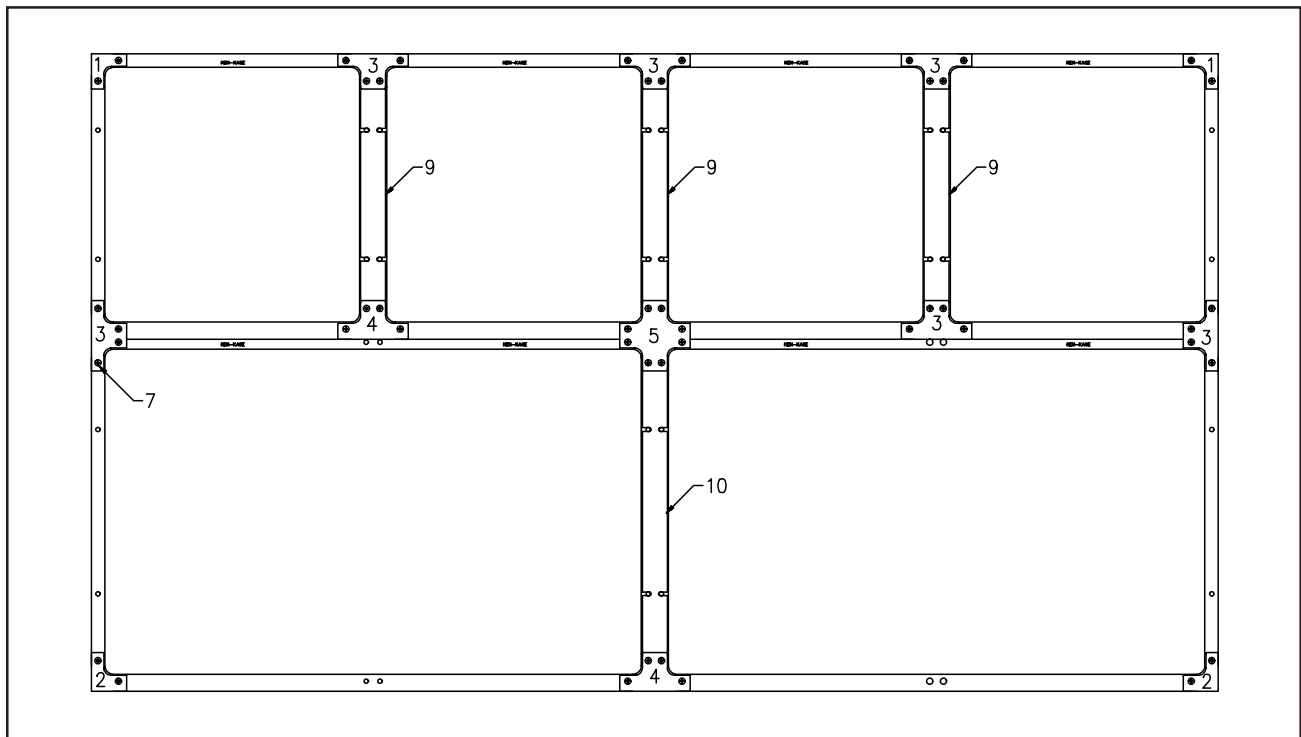


Figure 3. Typical Cage Arrangement With Assembly Hardware Items Numbered

Note: If you change your existing cage arrangement, you may need additional hardware items to assemble the new cage layout.

Assembly hardware items consist of the following (refer to Figure 3 and the sub-sections below):

- (1) Corner top plates
- (2) Corner bottom plates
- (3) Top and side tee plates
- (4) Bottom tee plates
- (5) Cross plates
- Securing clips
- (9 and 10) Vertical molding strips
- Cap screws
- Double-face tape

Corner Top Plates (1)

Corner top plates (Figure 4) are used on the upper right and left corners in an arrangement. These plates measure 3 in. x 3 in. The part number is 12100-CT-AAAAAA. **Note:** Do not confuse them with the corner bottom plates which are slightly taller.

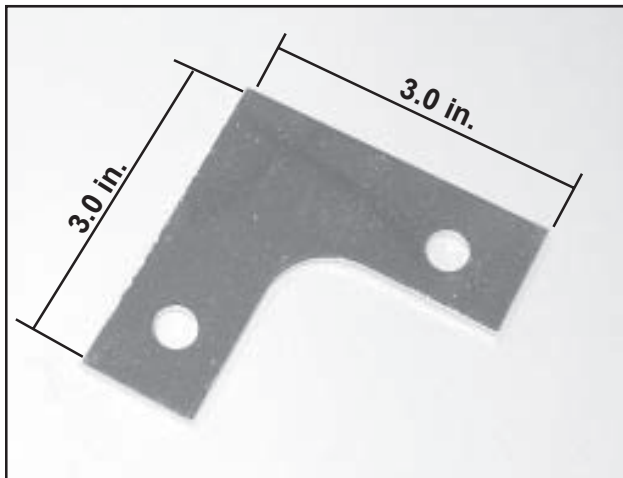


Figure 4. Corner Top Plate

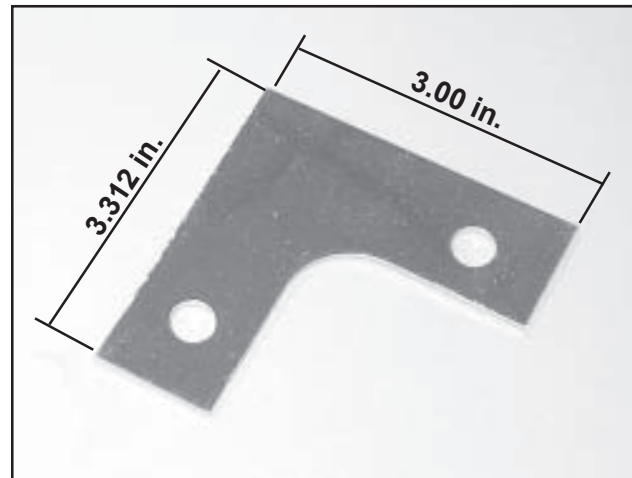


Figure 5. Corner Bottom Plate

Corner Bottom Plates (2)

Corner bottom plates (Figure 5) are used on the lower right and left corners in an arrangement. These plates measure 3.312 in. x 3 in. The part number is 12100-CB-AAAAAA.

Note: Do not confuse them with the corner top plates which are slightly shorter.

Top and Side Tee Plates (3)

Top and side tee plates (Figure 6) are used between cages on the top tier, and between tiers on either side of an arrangement. These plates measure 6 in. x 3 in. The part number is 12100-TS-AAAAAA. **Note:** Do not confuse them with the bottom tee plates which are slightly taller.

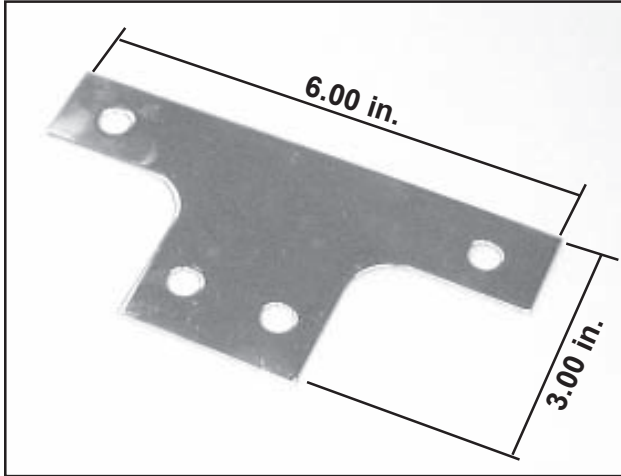


Figure 6. Top and Side Tee Plate

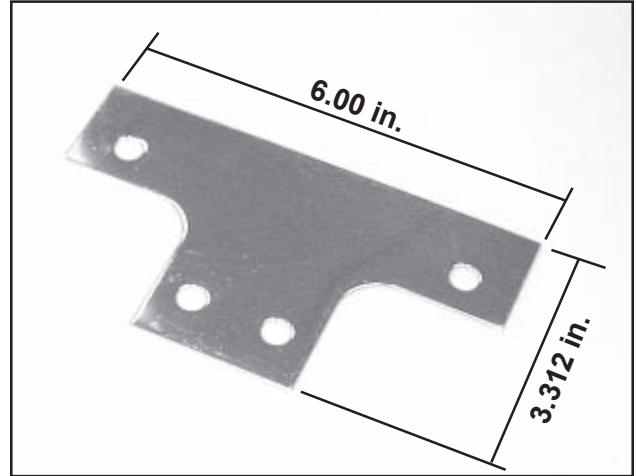


Figure 7. Bottom Tee Plate

Bottom Tee Plates (4)

Bottom tee plates (Figure 7) are used between cages on the lower tier in an arrangement. These plates measure 6 in. x 3.312 in. The part number is 12100-BT-AAAAAA. **Note:** Do not confuse them with the top and side tee plates which are slightly shorter.

Cross Plates (5)

Cross plates (Figure 8) are used to tie four cages together at the corners. These plates measure 6 in. x 6 in. The part number is 12100-IC-AAAAAA.

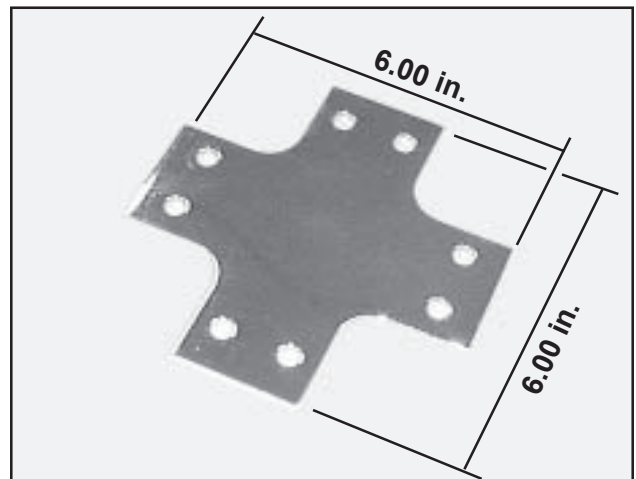


Figure 8. Cross Plate

Securing Clips

Securing clips (Figure 9) are used to tie cages together when the intersection of two cages in a tier does not match up with the intersections of the cages in the tier below. The part number is 12102-00-AAAAAA. Securing clips are not shown in Figure 3. Refer to *Page 32* for installation procedures.

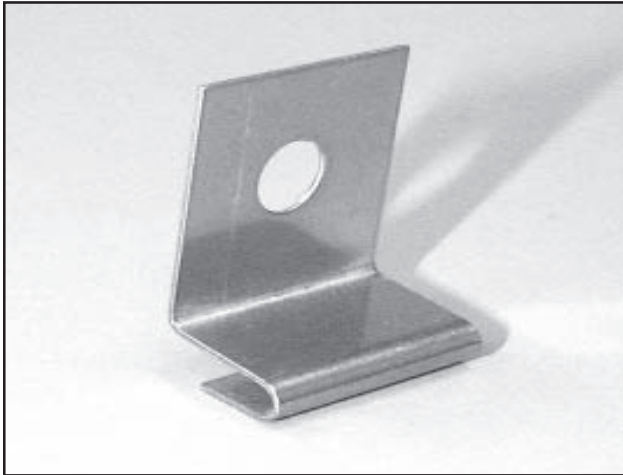


Figure 9. Securing Clip



Figure 10. Typical Vertical Molding Strip

Vertical Molding Strips (9 and 10)

Vertical molding strips (Figure 10) are provided with each cage arrangement. They cover the vertical space between cages, and prevent liquids and debris from seeping into hard-to-clean areas. The quantity used varies with the cage arrangement. Refer to Figure 26 on *Page 26* for installation procedures. Refer to Table 3 for part numbers.

Cage Height	Part Number
18 in. (45.72 cm)	12104-00-AACTAA
24 in. (60.96 cm)	12104-00-AADRAA
30 in. (76.20 cm)	12104-00-AAEPAA
36 in. (91.44 cm)	12104-00-AAFNAA

Table 3. Vertical Molding Strip Part Numbers

Cap Screws

A quantity of cap screws is provided to assemble the elements of each cage arrangement. The cap screws are 1/4-20 x 1/2", stainless steel, Phillips head. The part number is 850157.

Double-face Tape

A 30 ft. (9.14 m) roll of double-face foam tape, 1 in. wide, is provided with the assembly hardware. It is used to fasten the floor supports to the underside of the cage floor to stabilize the sheet metal. The part number is 008545.

Additional Hardware Items

All SSCI hardware components are also available separately to ensure that your arrangement can grow or adapt to your changing needs. If your requirements change and you want to add cages or reconfigure an existing arrangement, SSCI can help you determine what additional hardware may be required. SSCI's design team can help you plan your new or revised cage arrangement. Please call SSCI to put our design team to work for you.

Comments:

Chapter 3 - Assembly and Installation

General

This chapter guides you in assembling the SSCI Regal cages, mounting them on a suitable base, and joining several cages together to form a multi-cage arrangement. If you have problems or require additional assistance, please feel free to call SSCI Customer Service at (800) 323-7366.

Space Requirements

The space where you plan to place your cage arrangement must be at least 29 in. (73.66 cm) deep, PLUS the width of the widest cage door in the arrangement. This will allow cage doors to open fully. You must have sufficient space in front of the cage arrangement to handle patients conveniently and safely.

Preparation of the Base

General

Regal cages should be mounted on a secure base. Prepare the base before starting the assembly of the cage arrangement. The usual options are:

- SSCI stationary base
- SSCI mobile base
- Site-built concrete base
- Site-built wood base

SSCI Stationary Base

If an SSCI stationary base is to be used, assemble and level the base according to the instructions provided with the unit.

SSCI Mobile Base

If an SSCI mobile base is to be used, assemble the base according to the instructions provided with the unit. Mobile bases do not require leveling.

CAUTION: When working with a mobile base, make sure the brakes are ON so that the base does not move while you are trying to mount the cages. Such movement could create a hazardous condition.

Site-built Concrete Base

A site-built concrete base must be at least 3.5 in. (8.9 cm) high and 29 in. (73.66 cm) from front to rear (Figure 11). The top, front, and sides should have smoothly trowelled surfaces, with sharp edges and square corners. The top surface must be level front-to-rear and left-to-right.

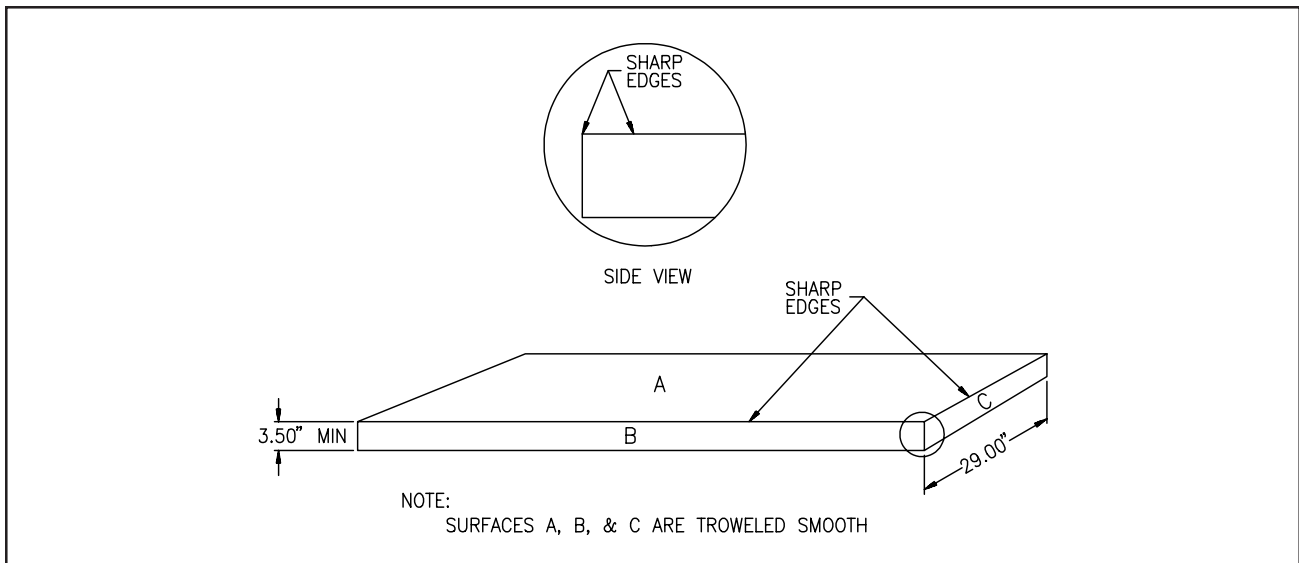


Figure 11. Site-built Concrete Base

Site-built Wood Base

A site-built wood frame base must be built of 2 x 4 lumber, set on edge, and at least 29 in. (73.66 cm) from front to rear (Figure 12). The front and rear supports should span the width of the cage arrangement and be parallel to each other. The rear support should be two 2 x 4's nailed together; the front support should be one 2 x 4. There should be 2 x 4 crossmembers at each end, with intermittent 2 x 4 crossmembers spaced on no more than 4 ft (1.22 m) centers. The top must be level front-to-rear and left-to-right.

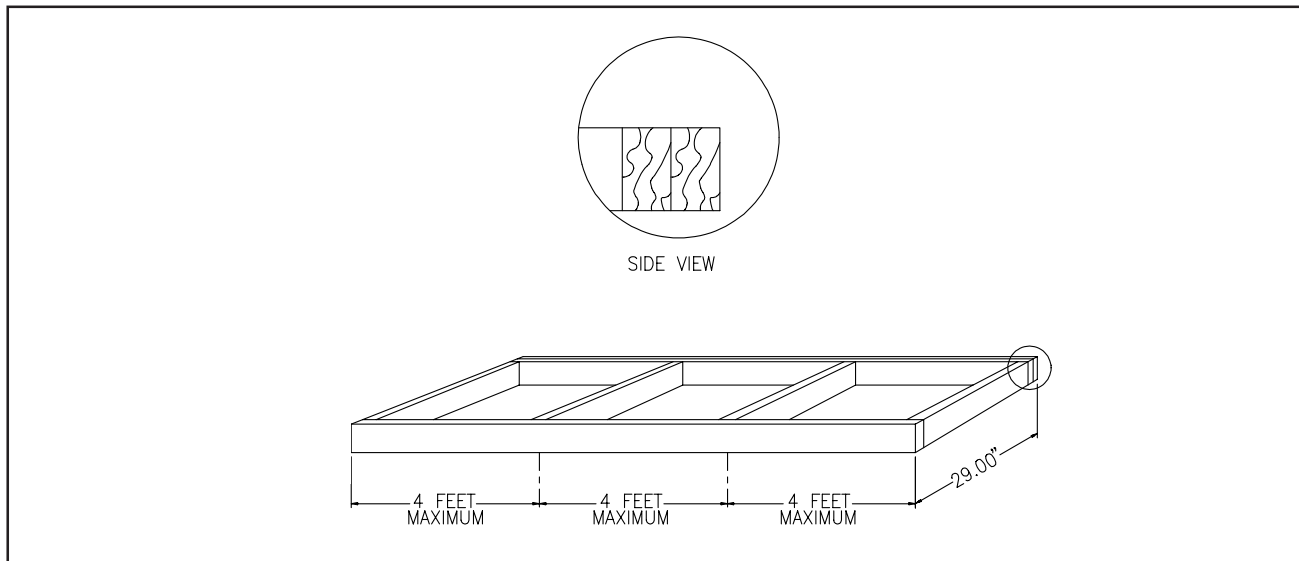


Figure 12. Site-built Wood Base

Cage Assembly and Installation

Arrangements and Tiers

An “arrangement” is any cage layout with more than one cage. In a multi-tiered cage arrangement, the tiers are numbered from the bottom up. The bottom tier is “Tier 1”, the next tier up is “Tier 2”, and so forth.

- All cages in one tier must be the same height.
- All tiers in the arrangement must be the same width.

There are four basic cage layouts (Figure 13):

- **A** - Single cage
- **B** - Two or more cages stacked vertically
- **C** - Two or more cages in one tier
- **D** - Three or more cages, side by side, and in more than one tier

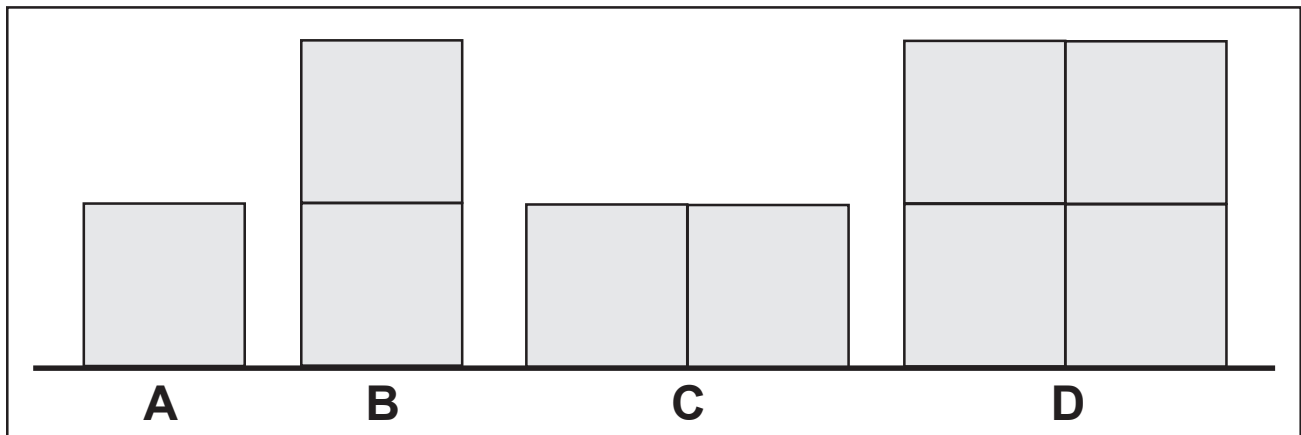


Figure 13. Basic Cage Layouts

Unpacking and Inspection

Refer to *Chapter 2 - Parts Identification* to verify that all required parts are present in the shipment, and to aid in identifying the various parts during the assembly/installation procedure.

Tools Required

You will need the following tools to assemble your cage(s).

- Phillips screwdriver
- Utility knife

Assembly Sequence

When installing a cage arrangement, start with an end cage on Tier 1 (bottom tier). If one end of the arrangement is against a wall, start with that end. Assemble each new tier by starting at one end and working, cage-by-cage, toward the other end.

1. Assemble the center and rear supports to the first cage. Refer to *Assembly of Center and Rear Supports* on Page 21. **Note:** Be sure to apply the tape to the rear support correctly (*Step 7a* on Page 23). *There is a difference between how the tape is applied in Tier 1 cages and in higher cages.*
2. If desired, add noise reduction strapping to the cage and reverse the door hinges. Refer to *Installing Noise Reduction Strapping* on Page 28, and *Reversing the Door Hinges* on Page 30.
3. Place this first cage on the base. Refer to *Mounting the Cage to the Base (Tier 1)* on Page 24.

Note: For a cage arrangement between two walls, remove the hinges and/or latch L-brackets from the last two cages in each tier. This allows easier placement of the last cage and facilitates installation of the vertical molding strip.

4. Repeat *Steps 1* through *3* for each remaining Tier 1 cage until Tier 1 is complete.
5. If you wish to insulate the cages apply the fiberglass to each tier as it is completed, but before installing the next tier. Refer to *Insulating the Cages* on Page 33.
6. Assemble the center and rear supports to the first cage in Tier 2. Refer to *Assembly of Center and Rear Supports* on Page 21. **Note:** Be sure to apply the tape to the rear support correctly (*Step 7b* on Page 23). *There is a difference between how the tape is applied in Tier 1 cages and in higher cages.*
7. If desired, add noise reduction strapping to the cage and reverse the door hinges.
8. Place this cage in position on top of Tier 1. Refer to *Mounting Cages in Tier 2 or Higher* on Page 27.

9. Repeat *Steps 6 through 8* for each remaining cage until the arrangement is complete. If insulation is desired, remember to insulate each tier before adding the next tier.
10. If end panels are to be installed, do so now. Refer to *Adding End Panels to the Arrangement on Page 34*.
11. If a top panel is to be installed, do so now. Refer to *Adding a Top Panel to the Arrangement on Page 40*.
12. When the arrangement is completely assembled, tighten the cap screws on all the assembly hardware items.
13. If required, install divider panels into the double-door cages. Refer to *Using the Divider Panels - Installation on Page 45*.

Assembly of Center and Rear Supports

1. Turn the cage upside-down (Figure 14).
2. Remove the metal protector on the lower front cage flange (Figure 15).

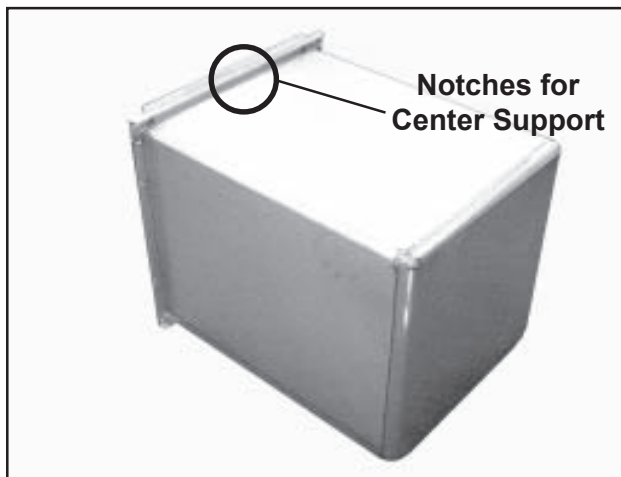


Figure 14. Cage Upside-down

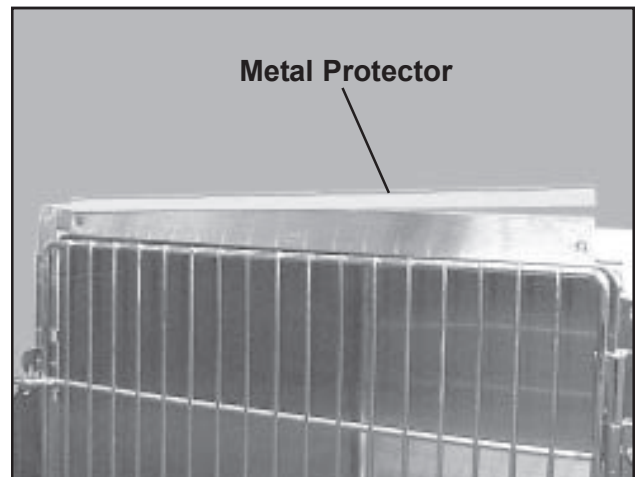


Figure 15. Removing the Metal Protector

3. Locate the center support(s) for this cage. Refer to *Center Supports on Page 10*. **Note:** Depending on the cage width, you may have 1, 2, or 3 center supports.
4. Apply double-face tape to the back of each of the center supports (Figure 16).
5. Peel back about 1/2 in. (no more) of the protective layer from one end of the tape.

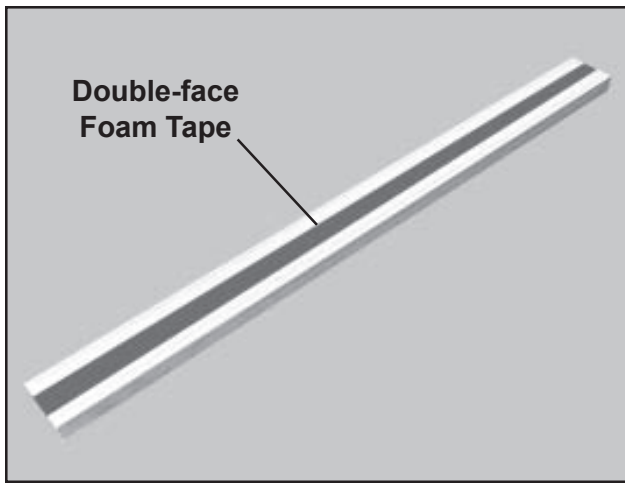


Figure 16. Applying Tape to the Center Support

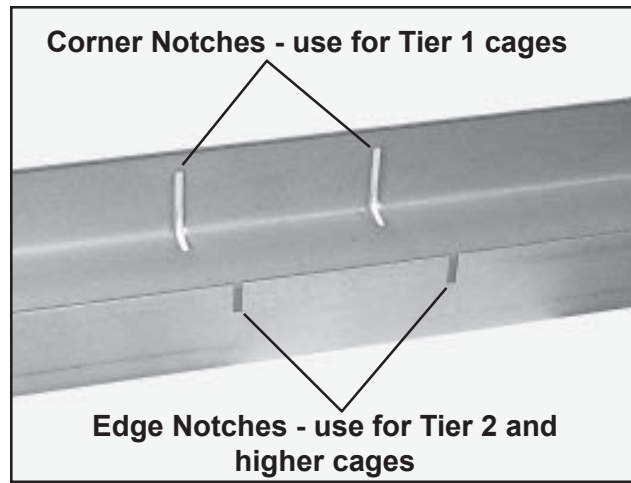


Figure 17. Notches in Rear Support

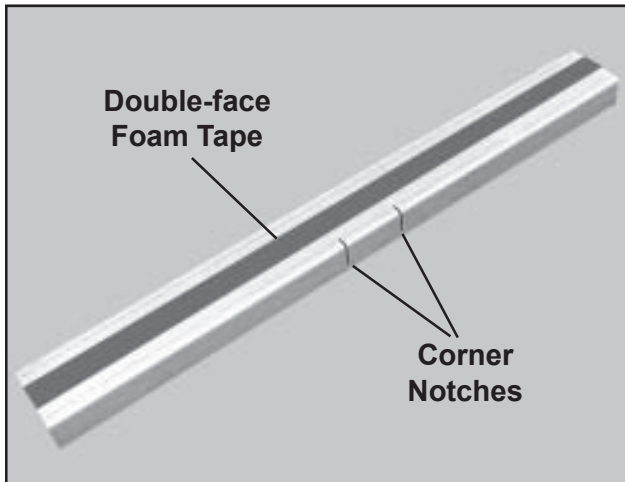


Figure 18. Applying Tape to the Rear Support for Tier 1 Cages

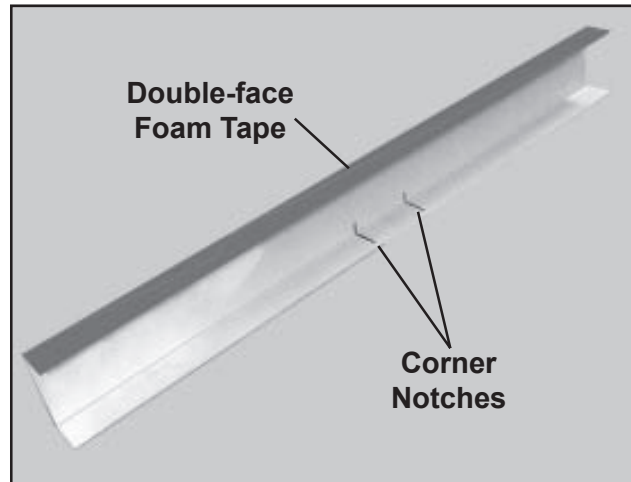


Figure 19. Applying Tape to the Rear Support for Tier 2 and Higher Cages

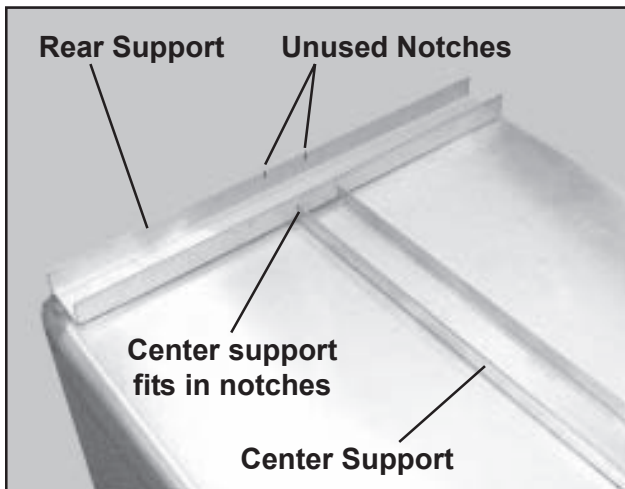


Figure 20. Rear and Center Supports on a Tier 1 Cage

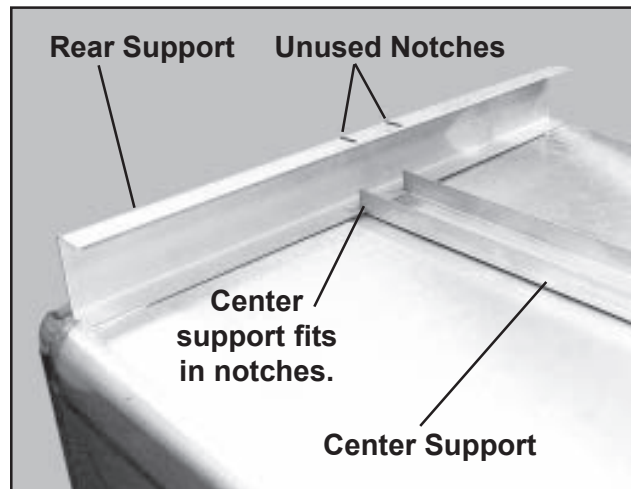


Figure 21. Rear and Center Supports on Tier 2 and Higher Cages

6. Locate the rear support for this cage. Refer to *Rear Supports* on *Page 11*.

Note: There are two sets of notches in the rear support; one set for Tier 1 cages; one set for higher tier cages (Figure 17).

Note: The tape is applied differently between Tier 1 cages and higher cages. **Note:** Make very sure you apply the tape to the correct side of the support. *If the rear supports are not mounted correctly, the cages will not be level.*

7.
 - a. **If this cage is for Tier 1** (bottom tier), apply double-face tape to the *back* of the rear support as shown in Figure 18.
 - b. **If this cage is for Tier 2 or a higher tier**, apply double-face tape to the *side* of the rear support as shown in Figure 19.
8. Peel back about 1/2 in. (no more) of the protective layer from one end of the tape.
9. Fit one end of the center support into the notches in the cage front frame member (Figure 14).
10. Fit the other end of the center support into the notches in the rear support and center the rear support on the cage, left-to-right (Figures 20 and 21).
11. When all supports are correctly positioned, lift them up slightly and unpeel the protective strip from the tape.
12. Press the supports down firmly to bond them to the bottom of the cage.
13. If noise reduction strapping is to be applied to the cage, do so now. Refer to *Installing Noise Reduction Strapping* on *Page 28*.
14. All single-door Regal cages come from the factory hinged on the left. If this cage is to be altered to hinged-right, do so now. Refer to *Reversing the Door Hinges* on *Page 30*.
15. Loosen all the cap screws on the front of the cage.

Mounting the Cage to the Base (Tier 1)

To mount the Tier 1 cages to the base, select the appropriate section below and follow the procedure given.

- For an SSCI stationary or mobile base - below
- For a site-built concrete or wood base - Page 25

SSCI Stationary or Mobile Base

CAUTION: When working with a mobile base, make sure the brakes are ON so that the base does not move while you are trying to mount the cages. Such movement could create a hazardous condition.

1. If this is a double-door cage, remove the two cap screws that hold the lower latch plate, and remove the plate (Figure 22).
2. Place the cage on the base so that base front flange fits between the cage body and the cage front flange (Figure 23, 24, and 25). The fit will be fairly tight and you may have to force the cage down slightly to align the holes properly. The rear of the cage will overhang the back of the base slightly.

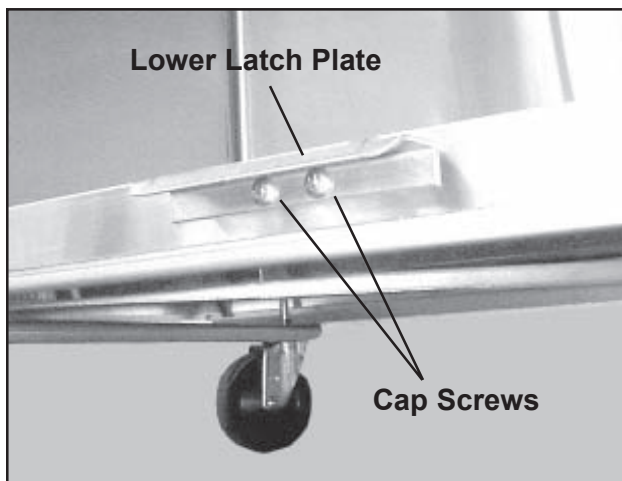


Figure 22. Removing the Lower Latch Plate

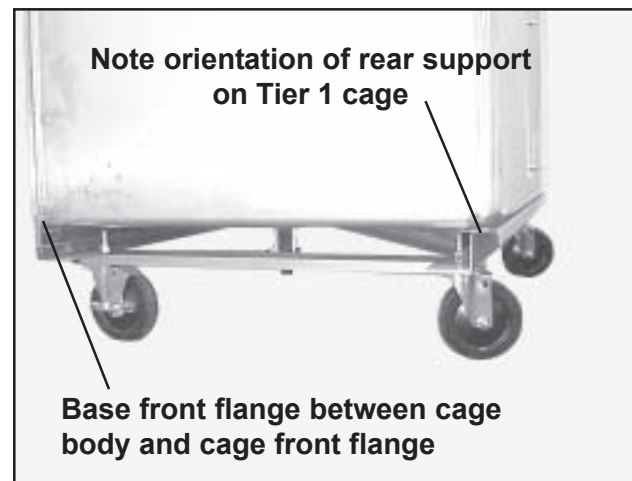


Figure 23. Placing the Cage on the Base (SSCI Mobile Base shown)

3. Refer to *Chapter 2, Parts Identification*. Examine Figure 3 and review the information under the sections entitled:
 - *Corner Bottom Plates - Page 12*
 - *Bottom Tee Plates - Page 13*
 - *Vertical Molding Strips - Page 14* (Also, refer to the installation drawing in Figure 26.)

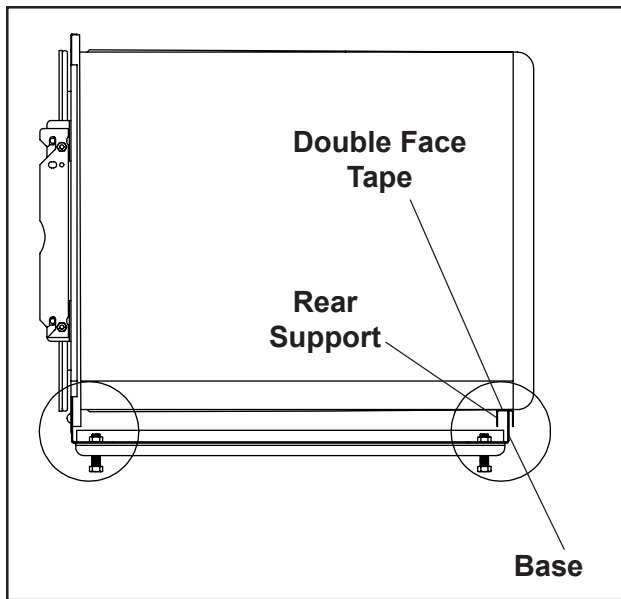


Figure 24. Cage Mounted on an SSCI Stationary Base

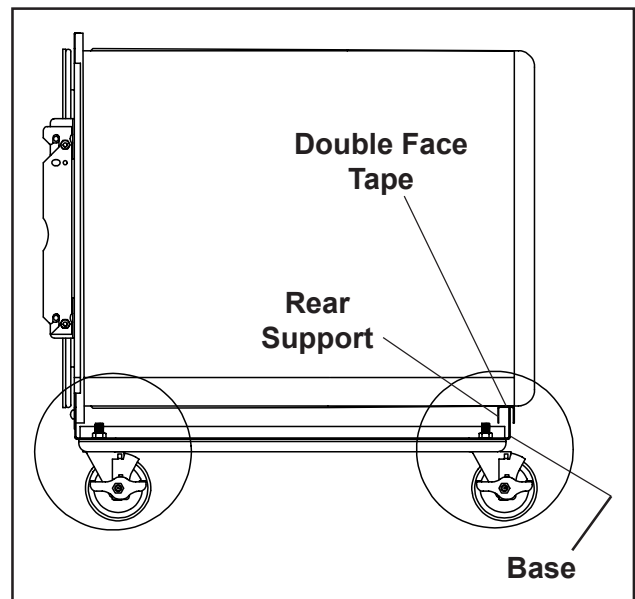


Figure 25. Cage Mounted on an SSCI Mobile Base

4. Using the appropriate pieces of hardware as listed in *Step 3*, loosely tie the cage to the base and its neighbor(s) (if any). DO NOT tighten the cap screws at this time.
5. If this is a double-door cage, loosely replace the lower latch plate but do not tighten the cap screws (Figure 22).

Site-built Concrete or Wood Base

1. Place the cage on the base so that cage front flange overlaps the front of the base (Figures 27 and 28).
2. Refer to *Chapter 2, Parts Identification*. Examine the Figure 3 and review the information under the sections entitled:
 - *Corner Bottom Plates - Page 12*
 - *Bottom Tee Plates - Page 13*
 - *Vertical Molding Strips - Page 14* (Also, refer to the installation drawing in Figure 26.)
3. Using the appropriate pieces of hardware as listed in *Step 2*, loosely tie the cage to its neighbor(s) depending on its location in the arrangement. DO NOT tighten the cap screws at this time.

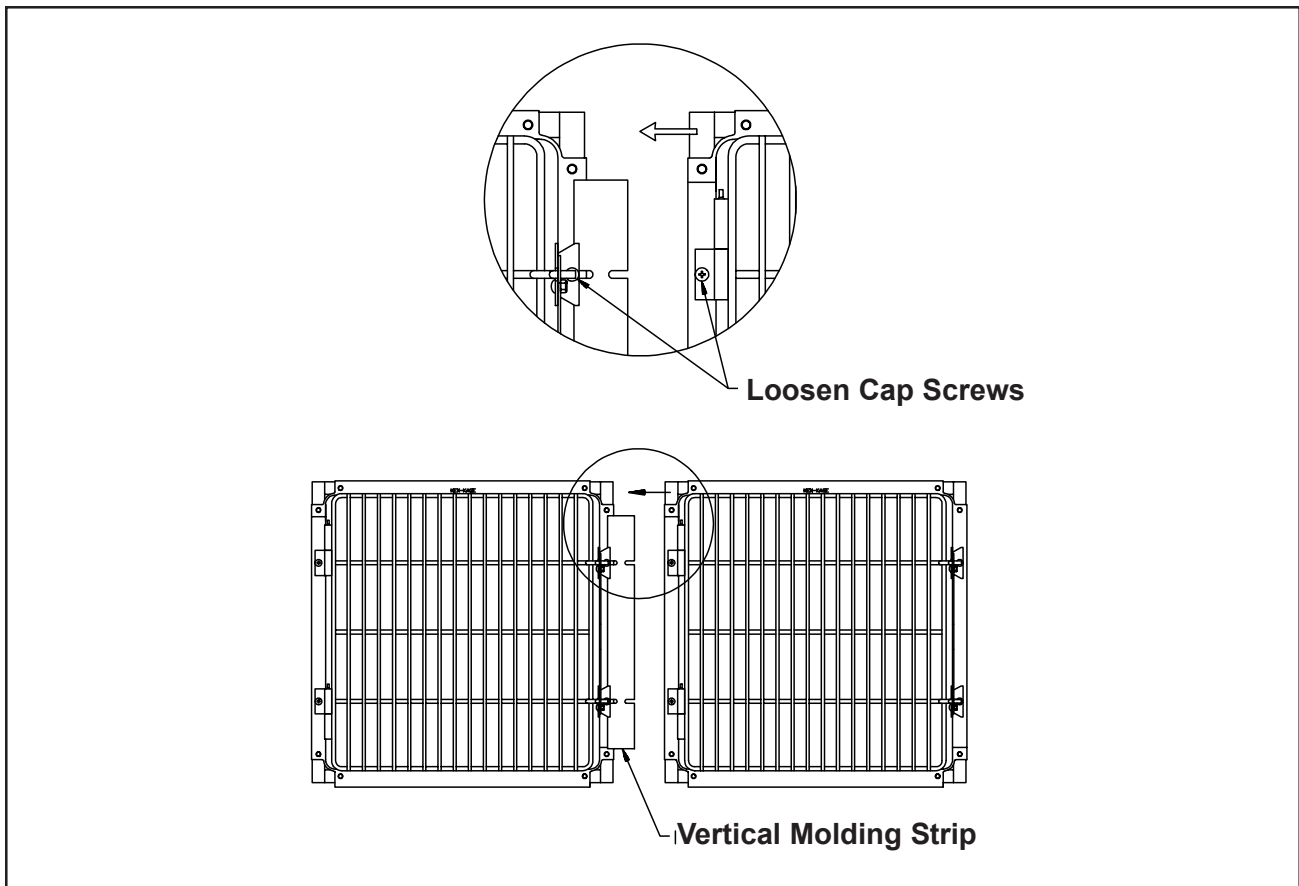


Figure 26. Installing a Vertical Molding Strip

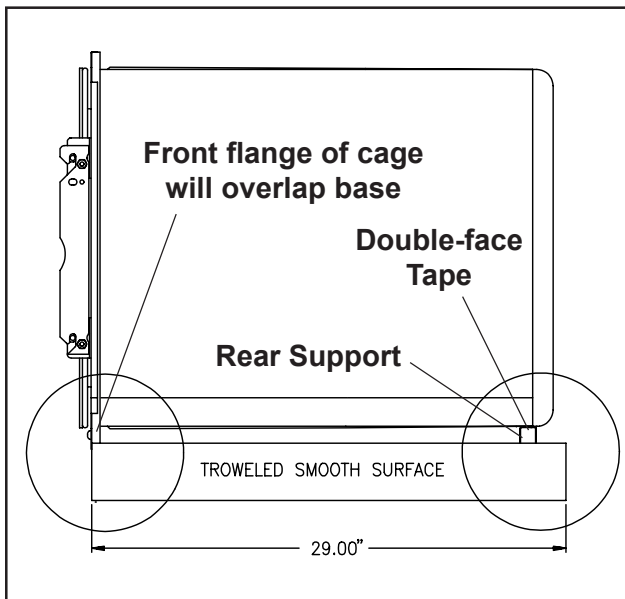


Figure 27. Cage Mounted on Site-built Concrete base

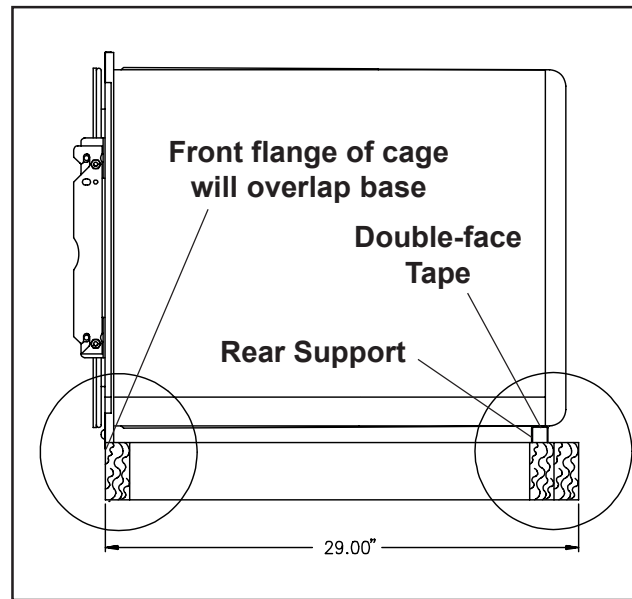


Figure 28. Cage Mounted on Site-built Wood base

Mounting Cages in Tier 2 or Higher

This section guides you in installing cages to Tier 2 or higher tiers. Install the cages to each tier by starting on one end and working, cage-by-cage, toward the other end.

Note: Make sure that the rear supports are correctly installed. If they are not, the cages will not be level (Refer to *Step 7b* on *Page 23*).

Note: If insulation is being used, remember to install the fiberglass to each tier before installing the next tier.

1. Prepare the first cage in the tier (center and rear supports installed, etc.) and place it on top the lower tier at whichever end you want to start.
2. Prepare the next cage and mount it adjacent to the cage you just installed.
3. Refer to *Chapter 2, Parts Identification*. Examine Figure 3 and review the information under the sections entitled:
 - *Corner Top Plates - Page 12*
 - *Top and Side Tee Plates - Page 13*
 - *Cross Plates - Page 13*
 - *Vertical Molding Strips - Page 14* (Also, refer to the installation drawing in Figure 26.)
4. Using the appropriate pieces of hardware as listed in *Step 3*, loosely tie the cages to each other and to the tier below. DO NOT tighten the cap screws.

Note: If the intersection of any two cages in this tier does not match up with the intersection of two cages below them, use securing clips to tie the upper cages to the lower. Refer to *Using Securing Clips to Connect Cages* on *Page 32*.
5. Repeat *Steps 1* through *4* for all the remaining cages in the tier.
6. Repeat *Steps 1* through *5* for all remaining tiers in the arrangement.
7. Tighten all assembly hardware cap screws.

Installing Noise Reduction Strapping

General

The specially-designed vinyl noise reduction strapping wraps around Regal stainless steel cages to reduce vibrations and kennel noise. The adhesive backing allows you to easily apply the strapping to your cages before assembling the cage arrangement. Always install the strapping before mounting the cage to the base. Refer to Table 4 for strapping part numbers.

Strapping	Part Number
15 ft. Strip (4.57 m)	12135-00-CHAAAA
30 ft. Roll (9.14 m) as supplied	008545
100 ft. Coil (30.38 m)	12135-00-PJAAAA

Table 4. Noise Reduction Strapping Part Numbers

Strapping Requirements

Refer to Table 5 to determine how much noise reduction strapping is required for your size Regal cage.

Tools Required

- Utility Knife
- Measuring tape

Installation Procedure

To install noise reduction strapping, follow the procedure below:

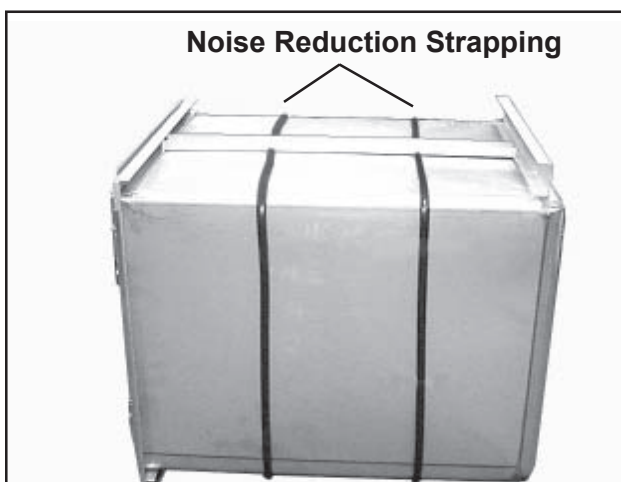


Figure 29. Noise Reduction Strapping on a Regal Cage

1. Measure two lengths of strapping to reach from one side of the center support, around the cage, to the other side of the center support.
Note: The strapping should not pass over or under the center support.
Note: On cages with more than one center support, it is not necessary to apply strapping between the center supports.
2. Remove the strapping protective strip to expose the adhesive surface.
3. Press the strapping onto the cage. Use two strips per cage, spaced so that the cage is divided approximately into thirds, front-to-back (Figure 29).

New Part Number	Cage Size (inches)	Cage Size (centimeters)	Strapping Needed (feet)	Strapping Needed (meters)
12000-00-CTCTEI	18W x 18H	45.72W x 45.72H	12	3.66
12000-00-CTDREI	24W x 18H	60.96W x 45.72H	14	4.27
12000-00-DRCTEI	18W x 24H	45.72W x 60.96H	14	4.27
12000-00-DRDREI	24W x 24H	60.96W x 60.96H	16	4.88
12000-00-DREPEI	30W x 24H	76.20W x 60.96H	18	5.49
12000-00-DRFNEI	36W x 24H	91.44W x 60.96H	20	6.10
12001-00-DRHJEI	48W x 24H	121.92W x 60.96H	24	7.32
12000-00-EPDREI	24W x 30H	60.96W x 76.20H	18	5.49
12000-00-EPEPEI	30W x 30H	76.20W x 76.20H	20	6.10
12000-00-EPFNEI	36W x 30H	91.44W x 76.20H	22	6.71
12000-00-EPGLEI	42W x 30H	106.68W x 76.20H	24	7.32
12000-00-EPHJEI	48W x 30H	121.92W x 76.20H	26	7.92
12001-00-EPHJEI	48W x 30H	121.92W x 76.20H	26	7.92
12000-00-FNDREI	24W x 36H	60.96W x 91.44H	20	6.10
12000-00-FNEPEI	30W x 36H	76.20W x 91.44H	22	6.71
12000-00-FNFNEI	36W x 36H	91.44W x 91.44H	24	7.32
12000-00-FNGLEI	42W x 36H	106.68W x 91.44H	26	7.92
12000-00-FNHJEI	48W x 36H	121.92W x 91.44H	28	8.53
12001-00-FNHJEI	48W x 36H	121.92W x 91.44H	28	8.53
12001-00-FNJFEI	60W x 36H	152.40W x 91.44H	32	9.75
12001-00-FNLBEI	72W x 36H	182.88W x 91.44H	36	10.97

Table 5. Noise Reduction Strapping Requirements

Reversing the Door Hinges

General All single-door Regal cages come from the factory hinged on the left and latched on the right. The doors are ambidextrous, however, and can be easily reversed to open the other way if desired. To reverse the hinges, follow the procedure below.

Tools Required

- Phillips screwdriver
- 7/16 in. wrench
- Punch (1/4 in. dia. max.)
- Small hammer or mallet

Procedure

1. With a punch and a small hammer, remove both hinge pins from the cage door (Figures 30 and 31).
2. Remove the door from the cage.



Figure 30. Hinges on a Regal Cage

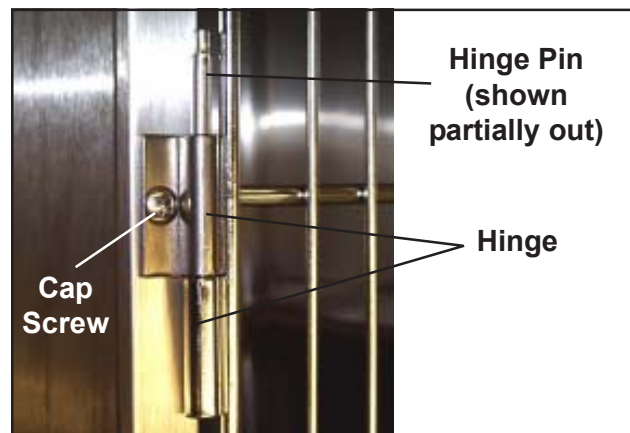


Figure 31. Door Hinge and Hinge Pin

3. Remove the cap screws that hold the hinges to the cage (Figure 31).
4. With a Phillips screwdriver and a 7/16 in. wrench, remove the cap screws that hold the latch connector to the L-brackets, and remove the latch connector from the cage (Figure 32).
5. With a Phillips screwdriver, remove the cap screws that hold the L-brackets to the cage, and remove the L-brackets (Figure 33).

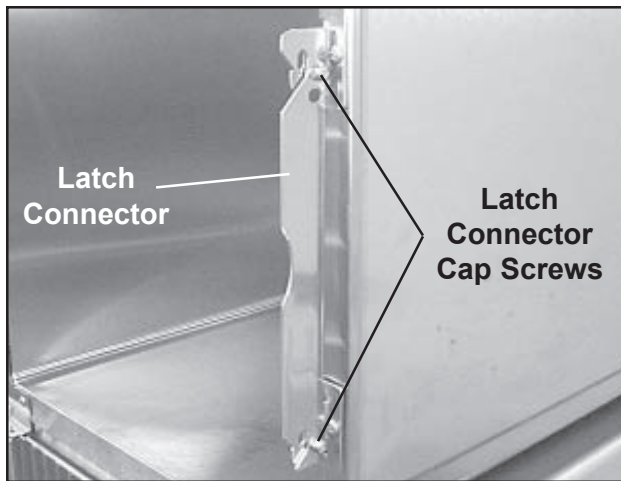


Figure 32. Removing the Latch Connector

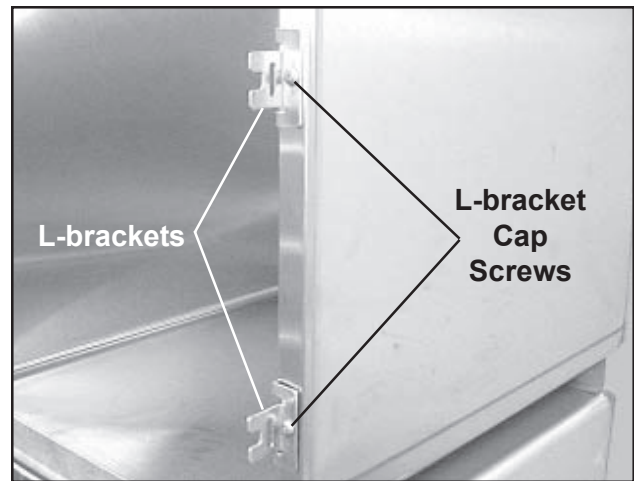


Figure 33. Removing the L-brackets

6. Reverse the L-brackets and mount them to the holes from which the hinges were removed.
7. Mount the latch connector to the L-brackets and secure it with the screws removed earlier. **Note:** The latch connector should be mounted outboard of the L-brackets (away from the center of the cage).
8. Mount the hinges to the holes from which the L-brackets were removed.
9. Reverse the door and rehang it on the hinges.
10. Insert the hinge pins (flat ends up).
11. Try operating the latch connector to open and close the door. It should operate smoothly and should lock automatically as the door closes. If not, refer to *Latch Adjustment* on Page 63.

Using Securing Clips to Connect Cages

Important: Many Regal Cage installations have been done without using the securing clips and, in most cases, these installations seem to work satisfactorily. SSCI, however, strongly recommends the use of the securing clips in appropriate locations in the cage arrangement. Using these clips produces a much stronger and more professional cage arrangement.

General

Securing clips are used to tie cages together when the intersection of two cages in a tier does not match up with the intersections of the cages in the tier below. Refer to *Securing Clips* on *Page 14*. An adequate quantity of securing clips is provided with the assembly hardware in the arrangement shipment. The part number of the securing clip is 12102-00-AAAAAA.

Installation

1. Remove the cap screw in the mounting holes in the lower cage (Figure 34)
2. Install the securing clip by hooking the slotted edge over the lip on the lower cage. Then, slide the clip between the top cages' frame and body until the hole in the clip lines up with the hole in the cage.
3. Replace the cap screw you removed earlier.

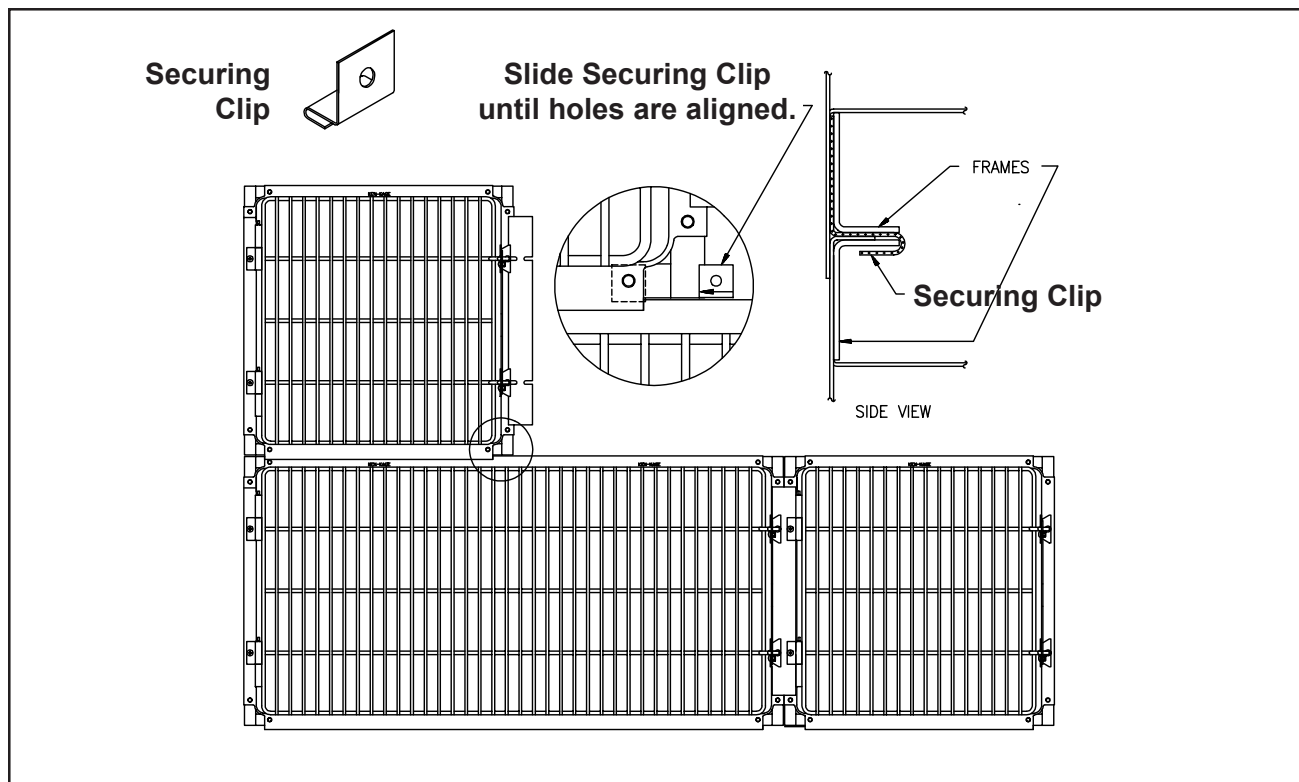


Figure 34. Mounting a Cage Using a Securing Clip

Insulating the Cages

General You can insulate your cage arrangement with fiberglass for increased animal comfort. Fiberglass insulation can be obtained from a local lumber yard or construction supply outlet.

CAUTION: Wear suitable eye and skin protection when working with fiberglass to prevent tissue irritation or damage from glass fibers.

Application Insulate each tier of cages before installing the next higher tier. Apply the insulation across the top and on both sides of the cages as shown in Figure 35.

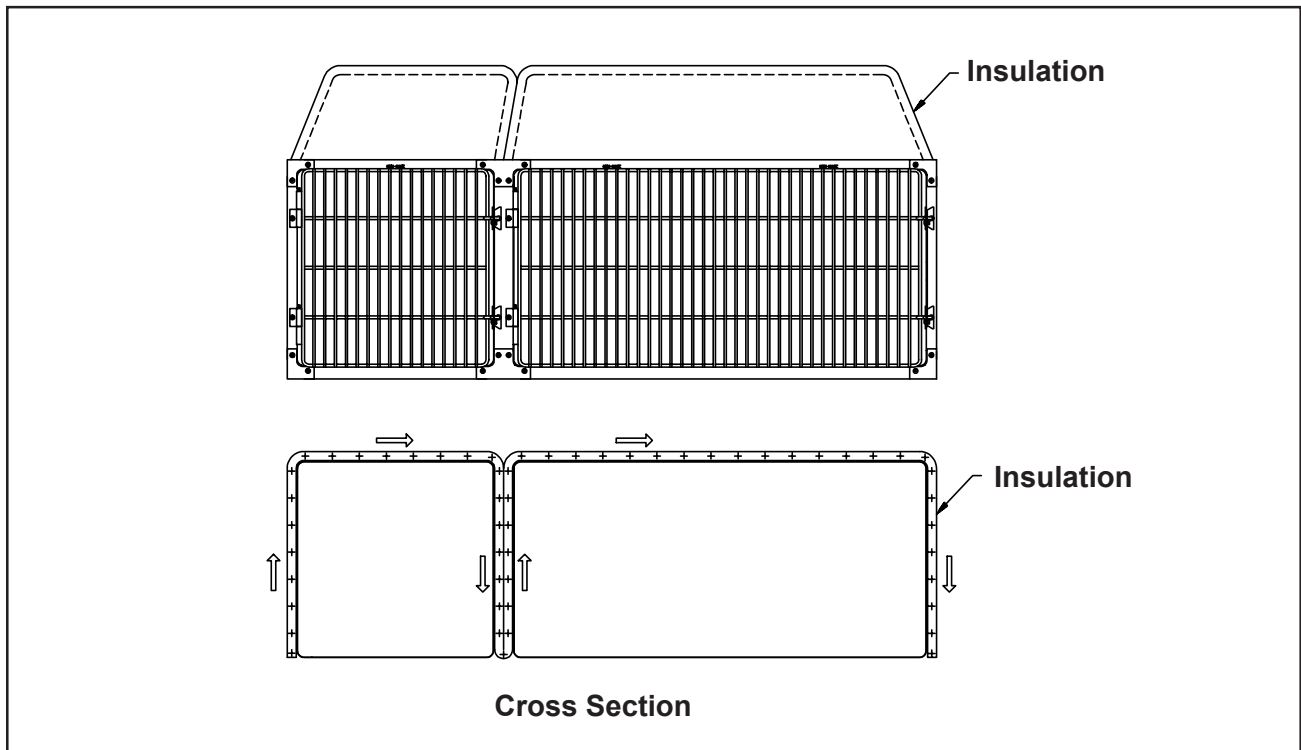


Figure 35. Applying Fiberglass Insulation to the Cage Arrangement

Adding End Panels to the Arrangement

General

Stainless steel end panels can be installed to give your cage arrangement a clean, finished look and to cover the spaces between cages where dust and dirt can hide. One panel is used for each end of each tier. End panels can be installed on one or both ends of the arrangement depending on your needs. Three types of parts are required to install end panels:

- End panels
- End panel uprights
- End panel brackets

End Panels

One end panel (Figure 36) is used for each end of each cage tier. There are no right or left panels - the same end panel can be used on either end of the arrangement. Select end panels according to the height of the tier (Table 6).

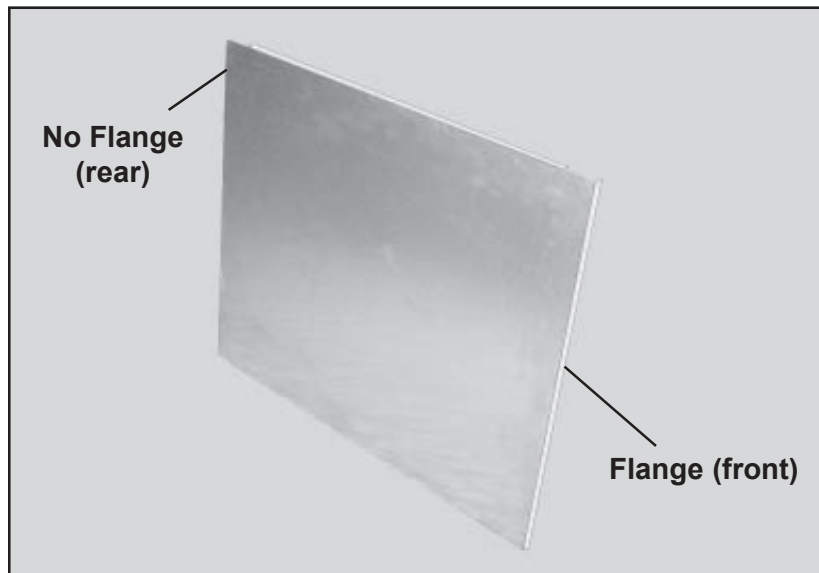


Figure 36. Typical End Panel

Tier Height	End Panel P/N
18 in. (45.72 cm)	12120-00-AACTEI
24 in. (60.96 cm)	12120-00-AADREI
30 in. (76.20 cm)	12120-00-AAEPEI
36 in. (91.44 cm)	12120-00-AAFNEI

Table 6. End Panel Part Numbers

End Panel Uprights

One end panel upright (Figure 37) holds the rear edges of the end panels to the cage arrangement. Two uprights are required if end panels are used on both ends of the arrangement. Select end panel uprights equal to the total height of the arrangement, excluding the base (Table 7).

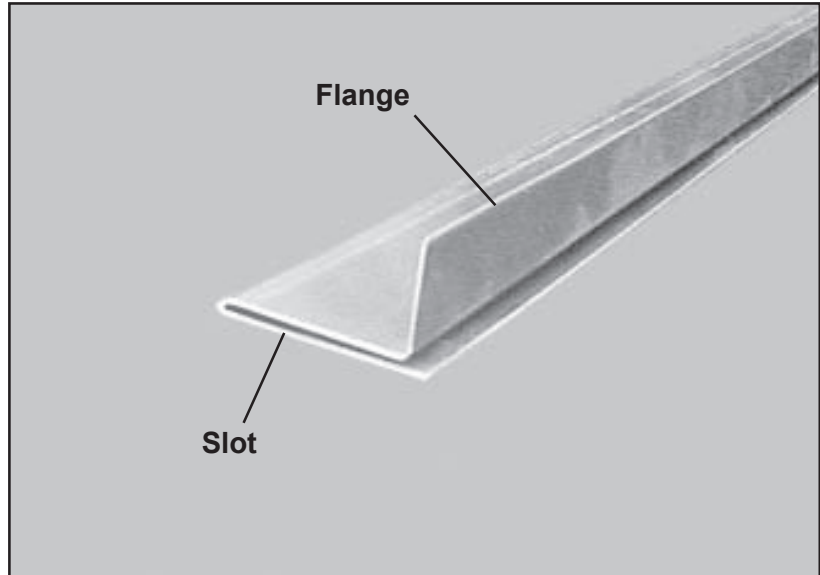


Figure 37. Typical End Panel Upright

Arrangement Height	End Panel Upright P/N
18 in. (45.72 cm)	12125-00-AACTAA
24 in. (60.96 cm)	12125-00-AADRAA
30 in. (76.20 cm)	12125-00-AAEPAA
36 in. (91.44 cm)	12125-00-AAFNAA
42 in. (106.68 cm)	12125-00-AAGLAA
48 in. (121.92 cm)	12125-00-AAHJAA
54 in. (137.16 cm)	12125-00-AAIHAA
60 in. (152.40 cm)	12125-00-AAJFAA
66 in. (167.64 cm)	12125-00-AAKDAA
72 in. (182.88 cm)	12125-00-AALBAA
78 in. (198.12 cm)	12125-00-AALZAA
84 in. (213.36 cm)	12125-00-AAMXAA
90 in. (228.60 cm)	12125-00-AANVAA
96 in. (243.84 cm)	12125-00-AAOTAA

Table 7. End Panel Upright Part Numbers

End Panel Brackets

End panel brackets (Figure 38) are used to fasten the end panel uprights to the cage arrangement. One bracket is required for Tier 1, and one additional bracket for each additional tier. Double the quantity of brackets required if end panels are used on both ends of the arrangement. The part number of the end panel bracket is 12130-00-AAAAAA.

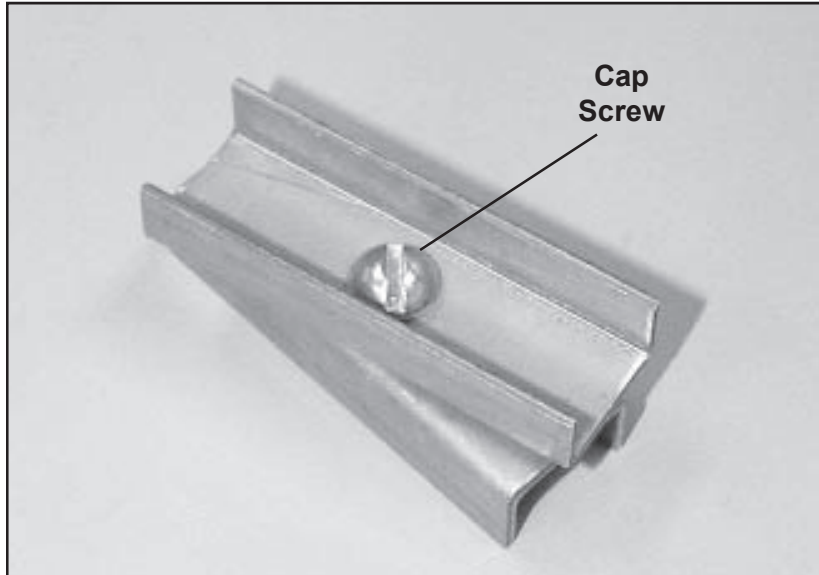


Figure 38. End Panel Bracket

End Panel Installation Procedure

Tools Required

- Phillips screwdriver
- Flat-blade screwdriver

Procedure Summary

Installing end panels is a three step operation:

1. Attaching the end panels to the cage
2. Mounting the end panel upright
3. Installing the end panel brackets

Attaching the End Panels to the Cage

1. Loosen all the cap screws on all the assembly hardware, hinges and L-brackets on the end of the cage to which the end panel is to be mounted (Figure 39).
2. With the flanged side to the front, slide the end panel down between the cage body and the cage flange (Figure 40). The end panel flange should point toward the cage.
3. Slide panel down until bottom of panel is even with bottom of cage (Figure 41). On higher tiers, panels should go down until they meet the end panel of the next lower tier.

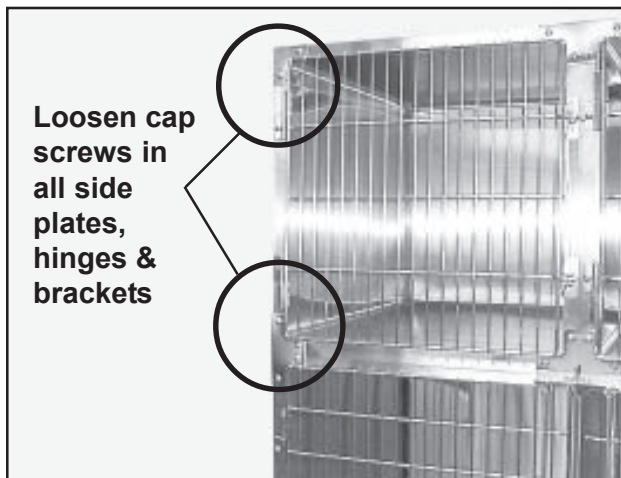


Figure 39. Loosening Side Hardware Cap Screws

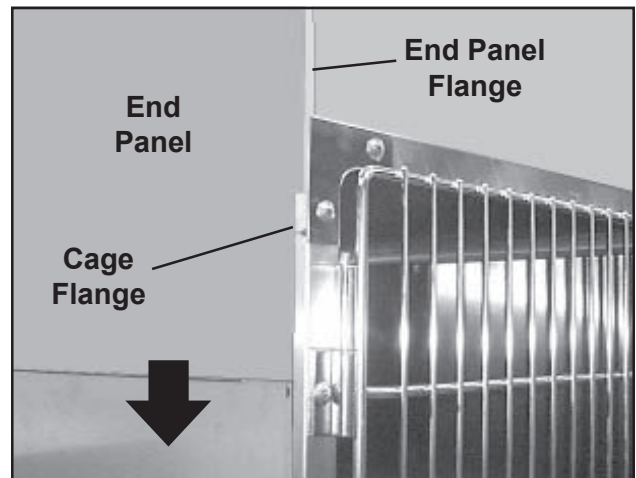


Figure 40. Mounting the End Panel to the Cages

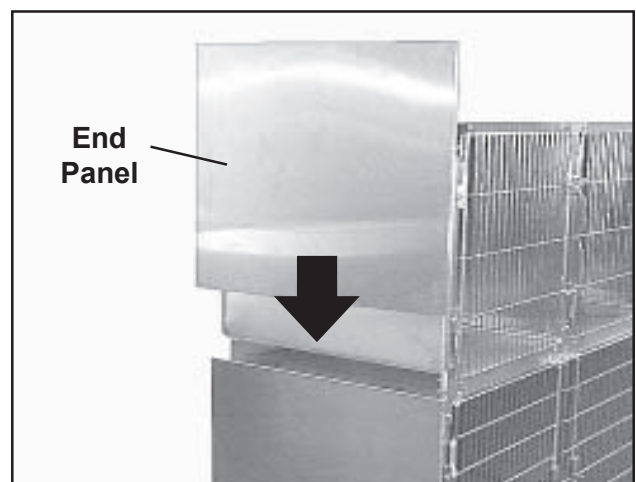


Figure 41. Sliding End Panel Onto Cage

Mounting the End Panel Uprights

1. Notice the slot in the end panel upright (Figure 42).
2. Slide the slot of the end panel upright onto the rear edges of the end panels. The flange of the upright should point toward the cages (Figure 43).
3. Push the upright onto the end panels as far as it will go. Make sure the lower end of the upright is even with the lower edge of the bottom panel.

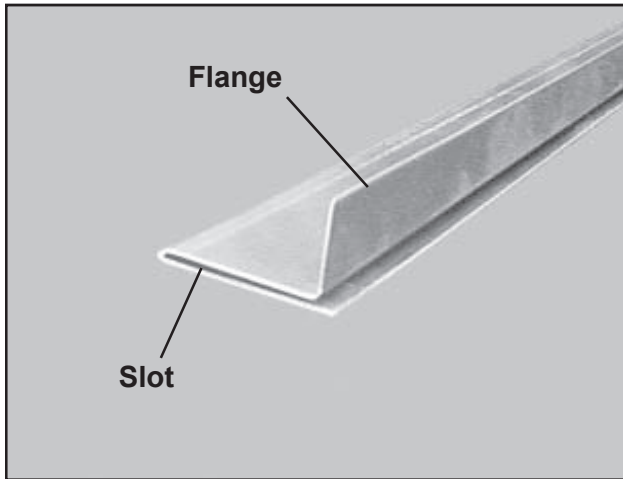


Figure 42. End Panel Upright

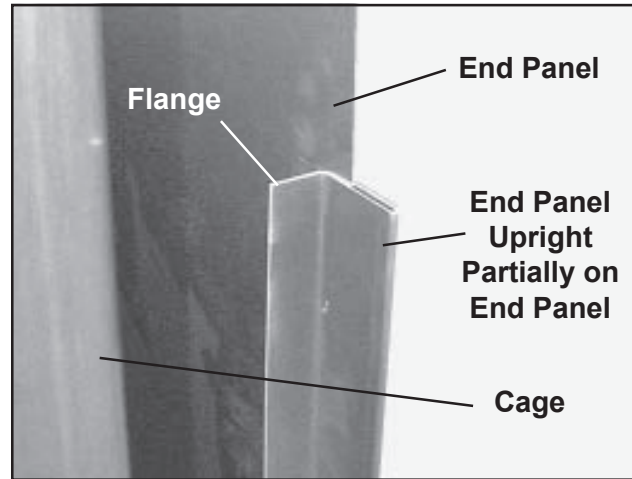


Figure 43. End Panel Upright being Mounted on End Panels

Installing the End Panel Brackets

1. With a flat-blade screwdriver, loosen the cap screw in one end panel bracket (Figure 38).
2. Slide the bracket between the rear support on top of the bottom cage and the upright (Figure 44).
3. Push the upright into the bracket and tighten the bracket cap screw.

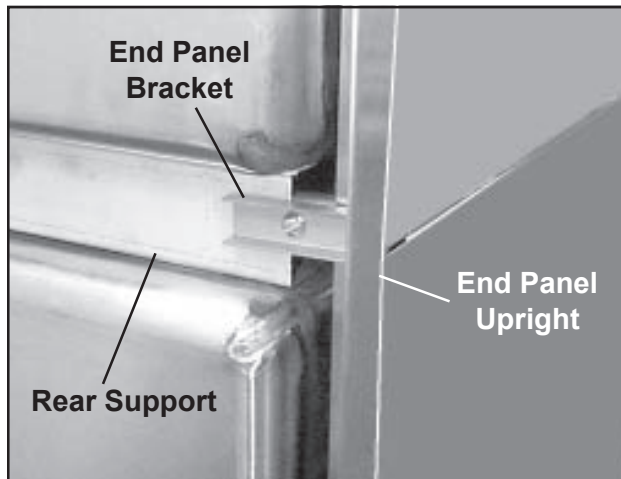


Figure 44. End Panel Bracket Mounted Between Rear Support and End Panel Upright

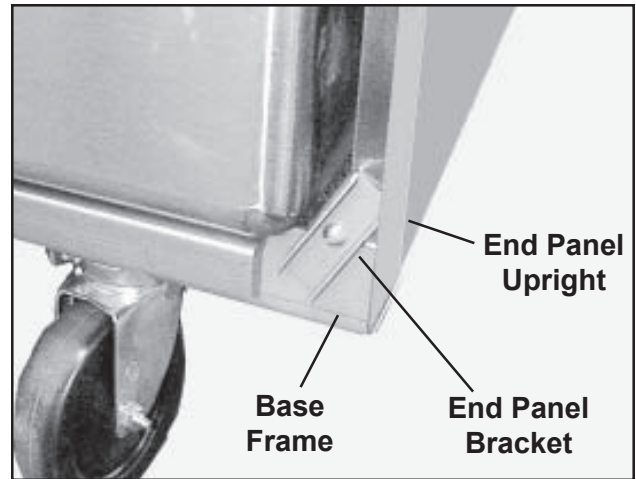


Figure 45. Bracket on Lower End of Upright

4. Repeat *Steps 1* through *3* to install a bracket between the base frame and the upright. **Note:** You will have to place the bracket at an angle (Figure 45).
5. If the arrangement has three or more tiers, repeat *Steps 1* through *3* on the rear support between each two tiers. **Note:** There will be no bracket at the top of the upright.
6. When all panels, uprights, and brackets are installed, tighten all the assembly hardware cap screws.

Adding a Top Panel to the Arrangement

General

A stainless steel top panel can be installed to give your cage arrangement a clean, finished look and to cover the spaces between the cages where dust and dirt can hide. Only one panel is needed to cover the complete arrangement. Panels are available to cover all arrangements up to 72 in. wide. Refer to Table 8 for top panel part numbers.

Arrangement Width	Top Panel P/N
18 in. (45.72 cm)	12140-00-CTAAEI
24 in. (60.96 cm)	12140-00-DRAAEI
30 in. (76.20 cm)	12140-00-EPAAEI
36 in. (91.44 cm)	12140-00-FNAAEI
42 in. (106.68 cm)	12140-00-GLAAEI
48 in. (121.92 cm)	12140-00-HJAAEI
60 in. (152.40 cm)	12140-00-JFAAEI
72 in. (182.88 cm)	12140-00-LBAAEI

Table 8. Top Panel Part Numbers

Tools and Supplies Required

- Phillips screwdriver
- Flat-blade screwdriver
- Electric drill (optional)
- 3/16 in. dia. drill bit (optional)
- Pop-riveter (optional)
- 3/16 in. pop rivets (optional)

Procedure

1. Install the end panel(s) before installing the top panel (Refer to *Adding End Panels to the Arrangement* on Page 34).
2. Loosen all the cap screws on the top corner and tee plates on all the cages on the top tier (Figure 46).
3. Examine the top panel in Figure 47 and identify the front and rear of your top panel.

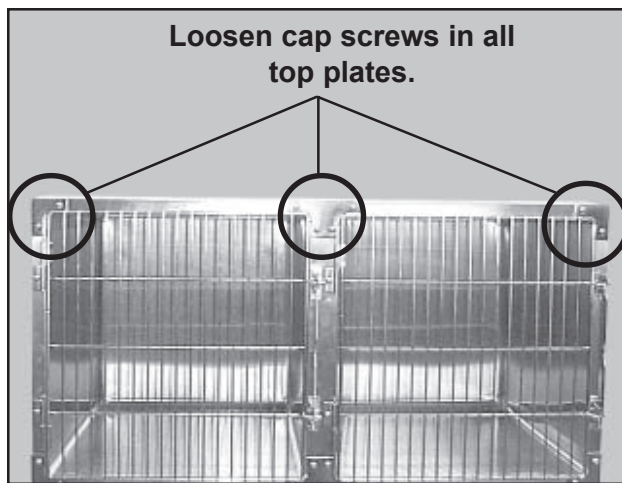


Figure 46. Loosening Top Hardware Cap Screws

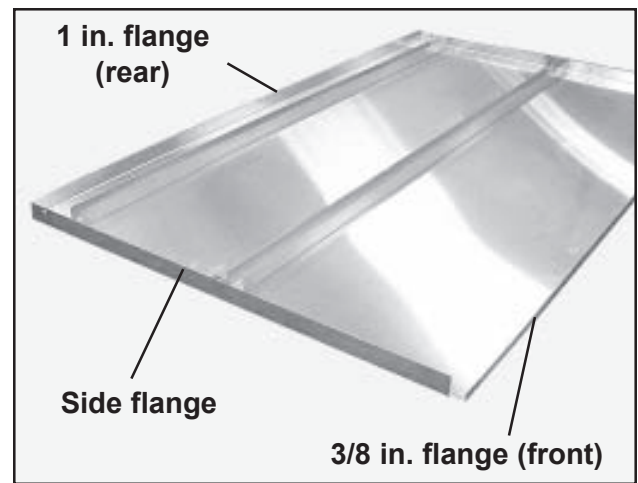


Figure 47. Typical Top Panel (underside shown)

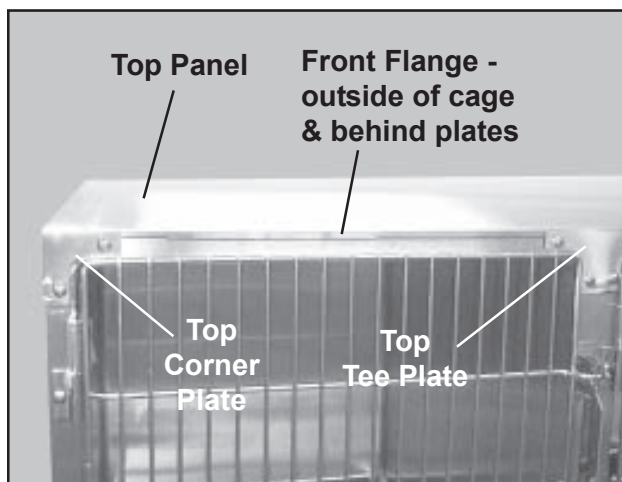


Figure 48. Top Panel - Front View

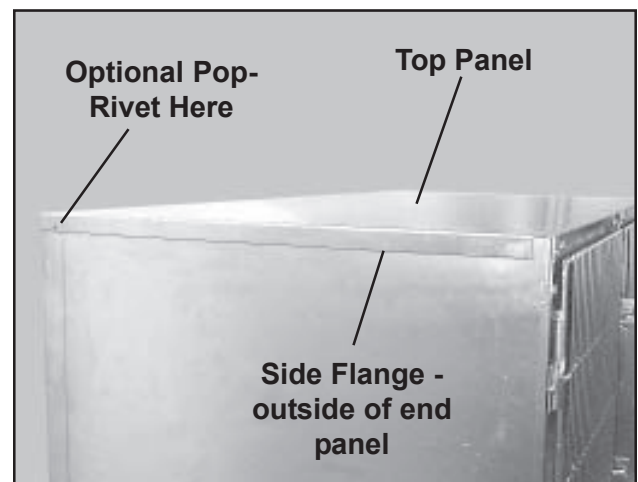


Figure 49. Top Panel - End View

4. Place your top panel on top of the arrangement so that:
 - the front flange (3/8 in.) fits between the cages and the top corner and tee plates (Figure 48).
 - the side flanges fit outside of the end panels (Figure 49).
5. Tighten all the cap screws on the top corner and tee plates.

Note: Steps 6 and 7 are optional.

6. Drill a 3/16 in. hole through the end panel behind hole in the top panel side flange (Figure 49).
7. Fasten the top panel to the end panel with a 3/16 in. pop-rivet.

Chapter 4 - Use and Care

Using Your Regal Cage Arrangement

Opening the Doors

On single-door cages, lift up on the latch connector and pull the door open (Figure 50).

On double-door cages, squeeze the latch handles toward each other and swing the doors open (Figure 51). Doors can be opened separately, or both together.

Closing and Locking the Doors

On single-door cages, each door is held closed by a self-actuating latch connector. When you close the door, the latch connector rides up and over the door pins and then drops down, automatically locking the door.

On double-door cages, when you close the door, the latch mechanism automatically locks the door as it swings shut.

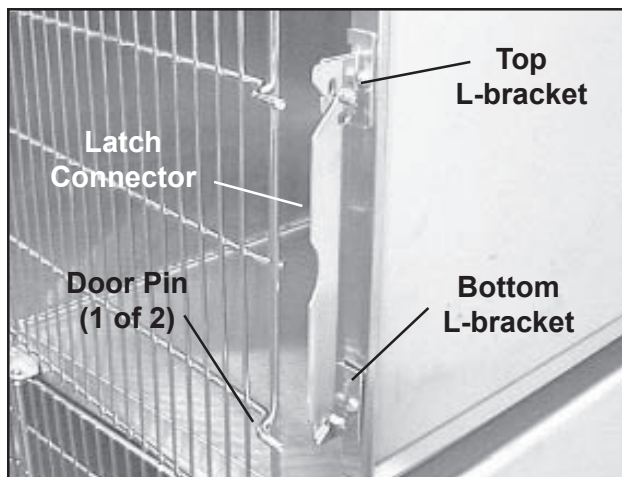


Figure 50. Single-door Cage Latch

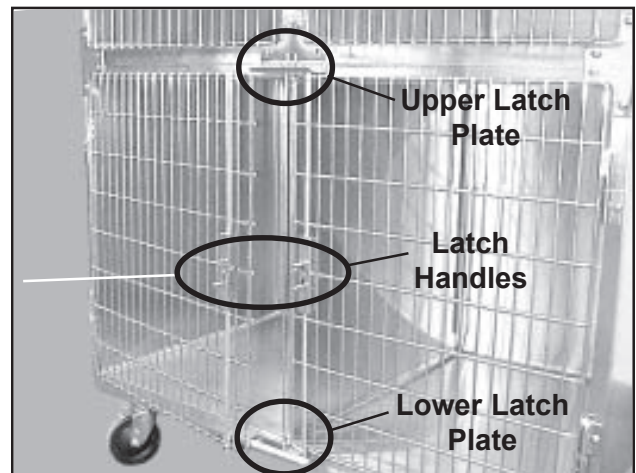


Figure 51. Double-door Cage Latch

Latch Adjustment

If the latch and/or door are not properly adjusted, you may have difficulty in opening the door, and it may not lock automatically when closed. To adjust the door, refer to *Latch Adjustment* on Page 63.

Moving the Base and Cages (Mobile Bases Only)

When mounted on an mobile base, a cage arrangement can be moved from place to place as needed. To move the mobile base and cage assembly, release the wheel brakes, push or pull the assembly to its new location, and then engage the brakes again.

CAUTION: The wheel brakes should be engaged any time the base is not actually being moved. Be especially careful when the base not on a level surface and may be free to roll uncontrolled.

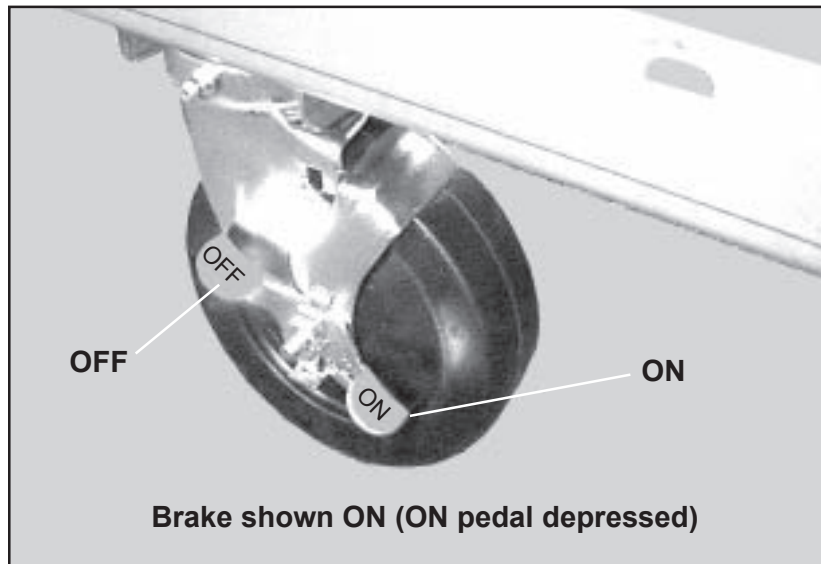


Figure 52. Wheel Brake ON/OFF Pedal

Using the Wheel Brakes (Mobile Bases Only)

Brakes are mounted on the front casters on SSCI mobile bases. The words **ON** and **OFF** are stamped onto the ends of the brake lever (Figure 52). To engage the wheel brake, step down on the end of the brake lever marked **ON**. To release the brake, step down on the end marked **OFF**.

CAUTION: The wheel brakes should be engaged any time the base is not actually being moved. Be especially careful when the base is not on a level surface and may be free to roll uncontrolled.

Reversing the Door Hinges (Single-door Cages Only)

All single-door Regal cages come from the factory hinged on the left and latched on the right. The doors are ambidextrous, however, and can be easily reversed to open the other way if desired. To reverse the hinges, refer to *Reversing the Door Hinges* on Page 30.

Using the Divider Panels (Double-door Cages Only)

Stainless steel divider panels can be installed into double-door cages to turn one large cage into two smaller ones. The panels can be installed and removed easily and quickly for maximum flexibility. The panel is held in place at the rear by a full-height divider channel, and at the front by a retaining rod that fits into the upper and lower latch plates.

Installation

1. Open both cage doors.
2. Slide the divider panel into the cage and engage it into the divider channel at the rear of the cage (Figure 53).
3. Pass the round end of the retaining rod up through the upper latch plate, then fit the flat end of the rod down into the lower latch plate.

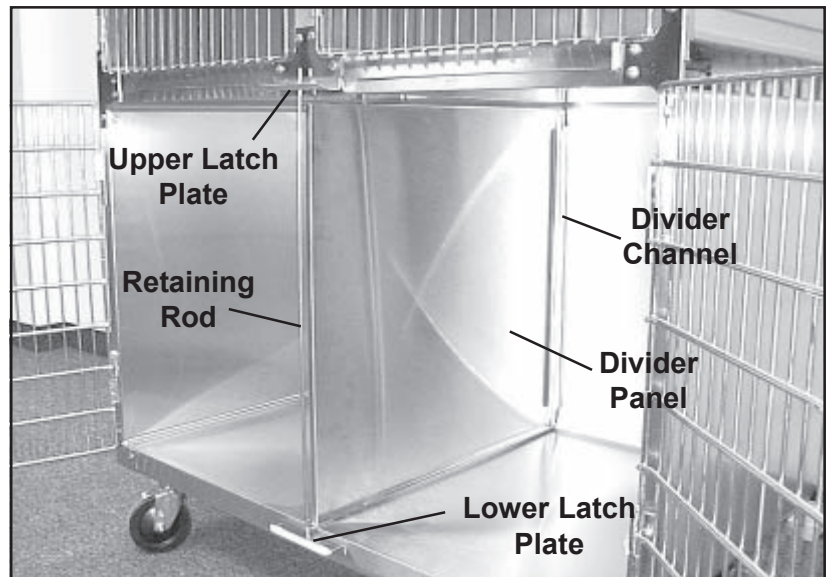


Figure 53. Installing the Divider Panel

Removal

1. Open both cage doors.
2. Lift the retaining rod up until it clears the lower latch plate, then lower the rod until the top end clears the upper latch plate.
3. Slide the divider panel out of the cage.

Keeping Your Regal Cage Clean

Introduction

You will no doubt want to clean your Regal cage frequently. Maintaining high standards of sanitation will be an important priority for your facility. Refer to *Care and Cleaning of Stainless Steel* on Page 5 for more detailed information.

Whenever necessary, rinse the cage with clear water and dry thoroughly with clean, soft cloths.

Cleaning Procedures

Ordinary deposits of waste and fluids can usually be removed with soap and water. Stubborn deposits may require scrubbing with “stainless steel” wool, nylon, or plastic scrubbers and/or the use of commercial cleaning products. Always scrub in the direction of the “grain” of the metal. Rinse with clear water and dry thoroughly with clean, soft cloths.

Minor scale build-up and some hard water spotting may be removed by washing with vinegar, followed by a neutralizing rinse of clear water, and a thorough drying with clean, soft cloths.

If especially rough cleaning is necessary, use “stainless steel” wool, nylon, or plastic scrubbers. Test these scrubbers in an inconspicuous area first to be sure they do not mar or scratch the stainless steel finish.

For heavy deposits of scale, 5% oxalic acid (use warm), 5-15% sulfamic acid, or 5-10% phosphoric acid may be used. As always, rinse with clear water, and dry thoroughly with clean soft cloths.

Avoid prolonged use of chlorides (such as chlorine bleach), bromides, iodides, and thiocyanates. Never allow salty solutions to dry on the stainless steel.

CAUTION: The warranty for this product is void if the care and cleaning instructions provided in this manual are not followed.

Routine Maintenance

The only routine maintenance required on Regal cage arrangements is the semiannual inspection and lubrication of the casters on SSCI mobile bases. Refer to the *Owner's Manual* supplied with the mobile base for information on inspection, lubrication, parts replacement procedures, and part numbers for casters and brakes.

Chapter 5 - Maintenance and Repairs

Replacement Parts

Tables 9 and 10 show the replacement parts available for Regal cages. For parts not listed, contact SSCI Customer Service at (800) 323-7366. Refer to *Parts Ordering Procedure* on Page 51.

Part Name	Part Number	Quantity	Replacement Instructions
Hinge Pin	450006	2 on single door cages 4 on double door cages	Page 52
Cage Door	Refer to Table 10	1 on single door cages 2 on double door cages	Page 53
Door Hinge	615552	2 on single door cages 4 on double door cages	Page 54
Latch Connector (single door cages only)	Refer to Table 10	1	Page 55
L-bracket (single door cages only)	615394	2	Page 56
Latch Plate (double door cages only)	615403	2	Page 57
Divider Panel (double-door cages only)	12110-00-AADREI	1 on 24 in high cages	Page 58
	12110-00-AAEPEI	1 on 30 in high cages	
	12110-00-AAFNEI	1 on 36 in high cages	
Divider Panel Retaining Rod (double-door cages only)	18005-00-AADMAA	1 on 24 in high cages	Page 59
	18005-00-AAENAA	1 on 30 in high cages	
	18005-00-AAFKAA	1 on 36 in high cages	
Divider Channel (double door cages only)	615836	1 on 24 in high cages	Page 60
	611080	1 on 30 in high cages	
	611081	1 on 36 in high cages	
Corner Top Plate	12100-CT-AAAAAAA	2	Page 61
Corner Bottom Plate	12100-CB-AAAAAAA	2	
Top & Side Tee Plate	12100-TS-AAAAAAA	Varies with arrangement	
Bottom Tee Plate	12100-BT-AAAAAAA	Varies with arrangement	
Cross Plate	12100-IC-AAAAAAA	Varies with arrangement	
Vertical Molding Strip	Refer to Table 10	Varies with arrangement	
Cage Arrangement Handle	12108-00-AAAAAAA	Optional item	

Table 9. Replacement Parts Available for Regal Cages

Table 10 gives part numbers of parts that are too numerous to fit conveniently into Table 9.

New Part Number	Cage Size (inches)	Doors (qty)	Latch Connector (1)	Vertical Molding Strips
12000-00-CTCTEI	18W x 18H	209790 (1)	616438	12104-00-AACTAA
12000-00-CTDREI	24W x 18H	209791 (1)	616438	12104-00-AACTAA
12000-00-DRCTEI	18W x 24H	209792 (1)	611077	12104-00-AADRAA
12000-00-DRDREI	24W x 24H	209793 (1)	611077	12104-00-AADRAA
12000-00-DREPEI	30W x 24H	209794 (1)	611077	12104-00-AADRAA
12000-00-DRFNEI	36W x 24H	209795 (1)	611077	12104-00-AADRAA
12001-00-DRHJEI	48W x 24H (DD*)	210166 (2)	none	12104-00-AADRAA
12000-00-EPDREI	24W x 30H	209796 (1)	611078	12104-00-AAEPAA
12000-00-EPEPEI	30W x 30H	209797 (1)	611078	12104-00-AAEPAA
12000-00-EPFNEI	36W x 30H	209798 (1)	611078	12104-00-AAEPAA
12000-00-EPGLEI	42W x 30H	209799 (1)	611078	12104-00-AAEPAA
12000-00-EPHJEI	48W x 30H	209800 (1)	611078	12104-00-AAEPAA
12001-00-EPHJEI	48W x 30H (DD*)	209827 (2)	none	12104-00-AAEPAA
12000-00-FNDREI	24W x 36H	209801 (1)	611079	12104-00-AAFNAA
12000-00-FNEPEI	30W x 36H	209802 (1)	611079	12104-00-AAFNAA
12000-00-FNFNEI	36W x 36H	209814 (1)	611079	12104-00-AAFNAA
12000-00-FNGLEI	42W x 36H	209803 (1)	611079	12104-00-AAFNAA
12000-00-FNHJEI	48W x 36H	209804 (1)	611079	12104-00-AAFNAA
12001-00-FNHJEI	48W x 36H (DD*)	209828 (2)	none	12104-00-AAFNAA
12001-00-FNJFEI	60W x 36H (DD*)	209829 (2)	none	12104-00-AAFNAA
12001-00-FNLBEI	72W x 36H (DD*)	209830 (2)	none	12104-00-AAFNAA

* DD = Double-door

Table 10. Replacement Part Numbers for Regal Cage Doors, Latch Connectors, and Vertical Molding Strips

General Information

- Many of the threaded fasteners used on SSCI products are secured with thread adhesive to insure structural integrity. Removing any screw or bolt may be difficult at first.
- During disassembly, retain all hardware items such as screws, nuts, lockwashers, etc. for reassembly.
- If you have problems with any procedure, please feel to call SSCI Customer Service at (800) 323-7366.

Parts Ordering Procedure

Order new equipment, accessories, and/or replacement parts directly through SSCI Customer Service. You can order by mail, telephone, or fax. Refer to *SSCI Contact Information* on *Page 2* for address, telephone, and fax numbers. When ordering, please provide the following information:

- Your name
- Company name
- Company account number
- Telephone number
- Fax number
- e-mail address
- Shipping address
- Billing address (if different from shipping address)
- Names, part numbers, and quantities of items being ordered
- Credit card number and expiration date, or other payment information
- Preferred method of shipment
- Information on whether the items are required on a normal or urgent basis

Routine Maintenance

The only routine maintenance required on Regal cage arrangements is the semiannual inspection and lubrication of the casters on SSCI mobile bases. Refer to the *Owner's Manual* supplied with the mobile base for information on inspection, lubrication, parts replacement procedures, and part numbers for casters and brakes.

Parts Replacement Procedures

The following sections guide you in replacing worn, damaged, or missing parts on a Regal cage or cage arrangement.

Hinge Pin P/N 450006

Tools Required

- Punch (1/4 in. dia. max.)
- Small hammer or mallet

Procedure

1. Use a punch and a small hammer to drive the existing pin upward, and out of the hinge (Figure 54).
2. Place the new hinge pin into the top of the hinge, flat end up, and gently drive it downward until it seats.
3. Open and close the door several times to make sure it swings and latches easily. If you have a problem, refer to *Latch Adjustment* on Page 63.

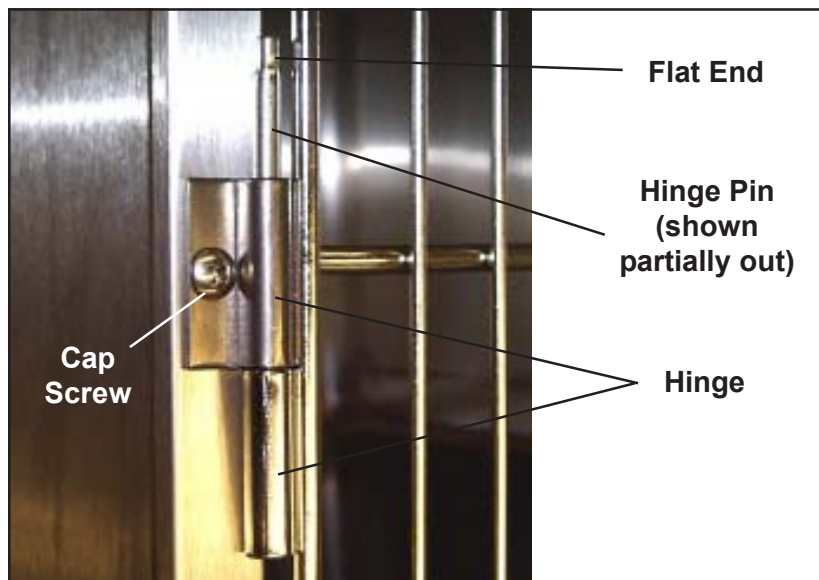


Figure 54. Door Hinge and Hinge Pin

Cage Door
Refer to Table 10
for Part Number

General

The instructions in this section are suitable for any size Regal cage door.

Tools Required

- Punch (1/4 in. dia. max.)
- Small hammer or mallet

Procedure

1. If there are any accessories on the cage door that you wish to reuse (card holders, food and water bowls, etc.) remove them from the door.
2. With a punch and a small hammer, drive both hinge pins upward, and out of the hinges (Figure 54).
3. Make sure the door is not latched.
4. Remove the door from the cage.
5. Place the new door in position on both hinges.
6. Place the hinge pins into the tops of the hinges, flat end up, and gently drive them downward until they seat.
7. Open and close the door several times to make sure it swings and latches easily. If you have a problem, refer to *Latch Adjustment* on Page 63.
8. Replace any needed accessories on the door.

Door Hinge
P/N 615552

Tools Required

- Punch (1/4 in. dia. max.)
- Small hammer or mallet
- Phillips screwdriver

Procedure

1. With a punch and a small hammer, drive both hinge pins upward, and out of the hinges (Figure 54).
2. Make sure the door is not latched.
3. Remove the door from the cage.
4. Remove the cap screw (Figure 54) that holds the hinge in place and remove the hinge.
5. Mount the new hinge in place with the cap screw you removed in *Step 4*.
6. Place the door in position on both hinges.
7. Place the hinge pins into the tops of the hinges, flat end up, and gently drive them downward until they seat.
8. Open and close the door several times to make sure it swings and latches easily. If you have a problem, refer to *Latch Adjustment* on *Page 63*.

Latch Connector

Refer to Table 10
for Part Number

Tools Required

- Phillips screwdriver
- 7/16 in. wrench

Procedure

1. Unlatch the cage door and swing it fully open.
2. With a Phillips screwdriver and a 7/16 in. wrench, remove the two cap screws and nuts that hold the latch connector to the L-brackets (Figure 55), and remove the latch connector.
3. Install the new latch connector to the two L-brackets and secure with the cap screws and nuts.
Note: Don't tighten the screws/nuts so far that the latch connector cannot move up and down freely.
4. Open and close the door several times to make sure it swings and latches easily. If you have a problem, refer to *Latch Adjustment* on Page 63.

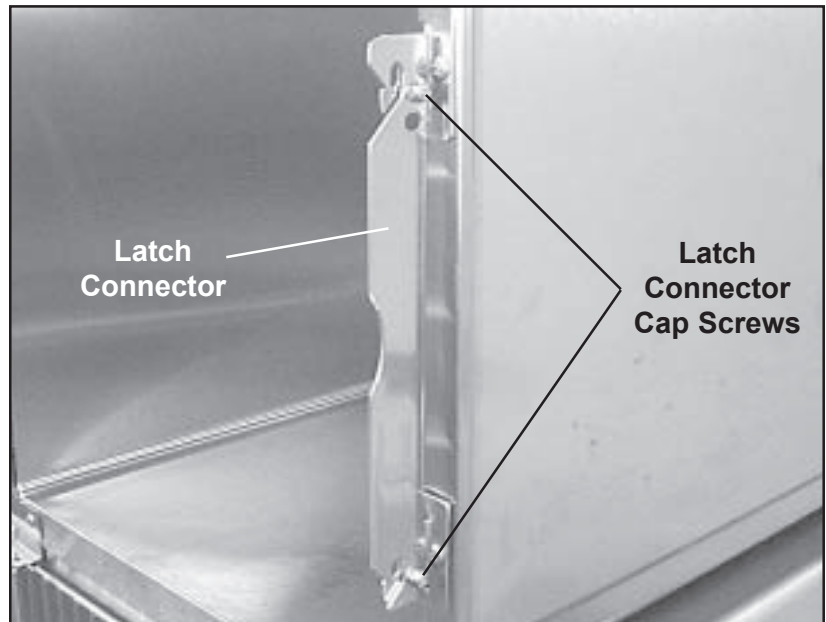


Figure 55. Removing the Latch Connector

**L-bracket
P/N 615394**

General

There are two L-brackets on each single-door Regal cage. The L-brackets may be mounted on either side of the cage.

Tools Required

- Phillips screwdriver
- 7/16 in. wrench

Procedure

1. Unlatch the cage door and swing it fully open.
2. With a Phillips screwdriver and a 7/16 in. wrench, remove the two cap screws and nuts that hold the latch connector to the L-brackets (Figure 55), and remove the latch connector.
3. With a Phillips screwdriver, remove the cap screw that holds the L-bracket in place, and remove the L-bracket (Figure 56).
4. With the cap screw you removed in *Step 3*, mount the new L-bracket to the cage.

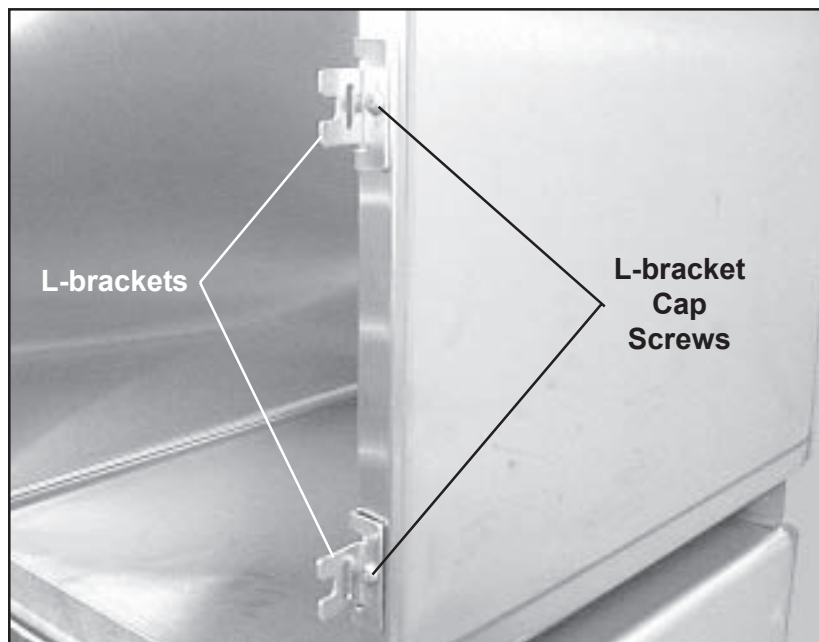


Figure 56. Removing the L-brackets

5. Install the latch connector to the two L-brackets and secure with the cap screws and nuts. **Note:** Don't tighten the screws/nuts so far that the latch connector cannot move up and down easily.
6. Open and close the door several times to make sure it swings and latches easily. If you have a problem, refer to *Latch Adjustment* on Page 63.

Latch Plate P/N 615403

General

Latch plates are present only on double-door cages. There are two latch plates, one on top and one on the bottom. Both plates are removed and installed in the same way.

Tool Required

- Phillips screwdriver

Procedure

1. Unlatch both cage doors and swing them fully open.
2. Remove the divider panel, if installed.
3. With a Phillips screwdriver, remove the two cap screws that hold the latch plate to the cage, and remove the plate (Figure 57).

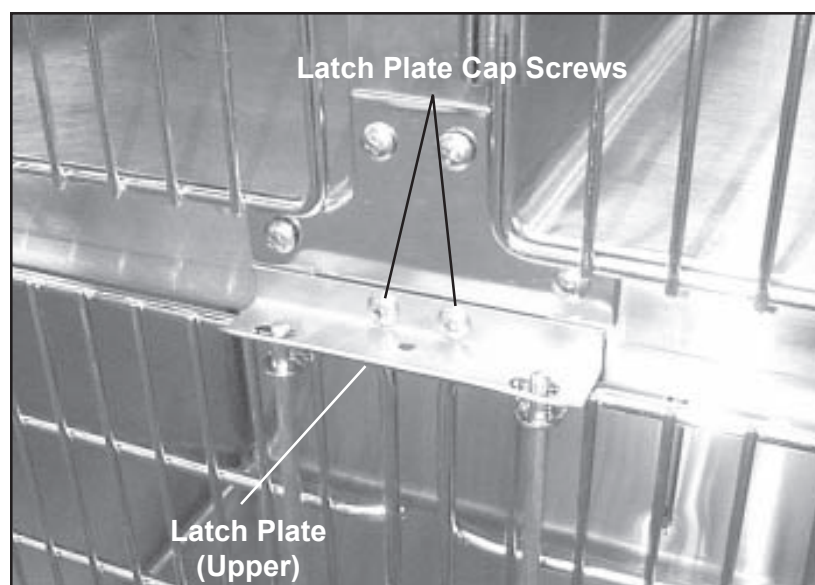


Figure 57. Removing the Latch Plate.

4. Mount the new latch plate to the cage with the same cap screws removed in *Step 2*.
5. Open and close the doors several times to make sure they latch easily. If you have a problem, loosen the latch plate, move it as necessary, and retighten it. Recheck and adjust again if necessary.
6. Replace the divider panel, if desired.

Divider Panel
Refer to Table 9
for Part Number

General

Divider panels are only used on double-door cages.

Procedure

1. Open both cage doors.
2. Lift the retaining rod up until it clears the lower latch plate, then lower the rod until the top end clears the upper latch plate (Figure 58).
3. Slide the old divider panel out of the cage.
4. Slide the new divider panel into the cage and into the divider channel at the rear of the cage.
5. Pass the round end of the retaining rod (Figure 59) up through the center hole in upper latch plate (Figure 58), then fit the flat end of the rod down into the lower latch plate.

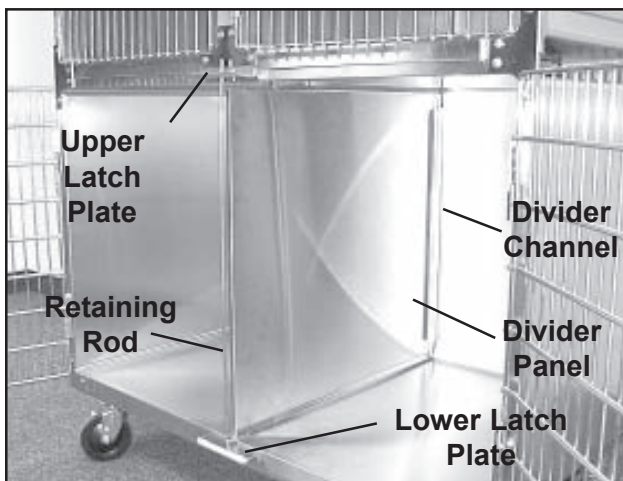


Figure 58. Removing the Divider Panel Retaining Rod

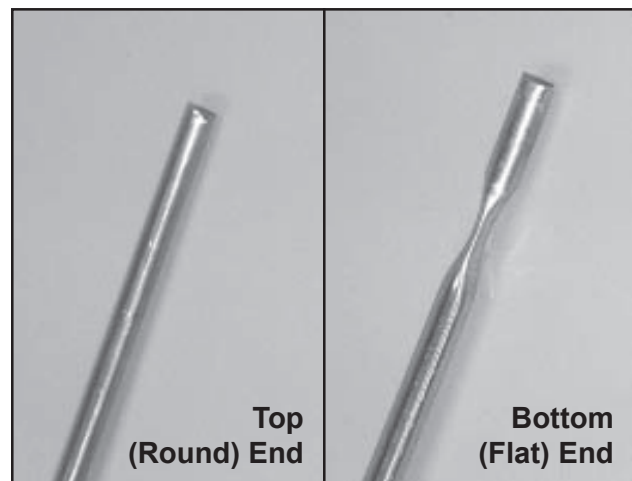


Figure 59. Divider Panel Retaining Rod

6. Open and close the doors several times to make sure they latch easily. If you have a problem, loosen the latch plate, move it as necessary, and retighten it. Recheck and adjust again if necessary.

**Divider Panel
Retaining Rod**
**Refer to Table 9
for Part Number**

General

Divider panel retaining rods are present only on double-door cages. These rods are mounted on the divider panels and hold the front ends of the panels in place.

Procedure

1. Open both cage doors.
2. Lift the old retaining rod up until it clears the lower latch plate, then lower the rod until the top end clears the upper latch plate (Figure 58).
3. Pass the round end of the retaining rod (Figure 59) up through the center hole in upper latch plate (Figure 58), then fit the flat end of the rod down into the lower latch plate.
4. Open and close the doors several times to make sure they latch easily. If you have a problem, loosen the latch plate, move it as necessary, and retighten it. Recheck and adjust again if necessary.

Divider Channel

Refer to Table 9
for Part Number

General

Divider channels are present only on double-door cages. These channels are mounted inside the cage on the rear wall hold the divider panel in place. **Note:** Due to the difficulty in reaching the screw heads on the inside of the cage and the nuts on the rear of the cage at the same time, it will require two people to perform this procedure.

Tools Required

- Phillips screwdriver
- 7/16 in. wrench

Procedure

1. Remove the divider panel. Refer to *Divider Panel, Steps 1 through 3 on Page 58.*
2. With a Phillips screwdriver and a 7/16 in. wrench, remove the three cap screws and nuts (Figures 60 and 61) that hold the divider channel in place and remove the channel.

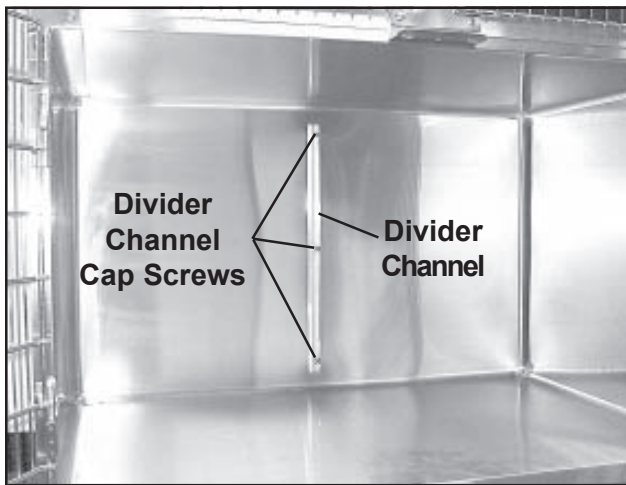


Figure 60. Cap Screws for Divider Channel (inside cage)

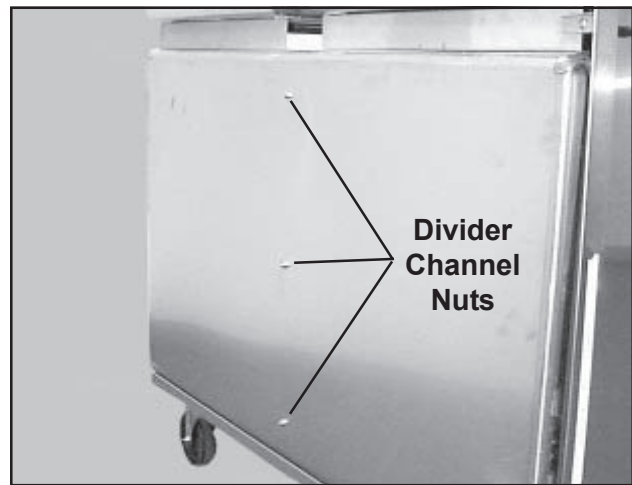


Figure 61. Nuts for Divider Channel (rear of cage)

3. Hold the new channel in place and secure with the three cap screws and nuts.
4. Replace the divider panel. Refer to *Divider Panel, Steps 4 and 5 on Page 58.*

**Assembly Hardware
(includes the
following:)**

Corner Top Plate
P/N 12100-CT-AAAAAA

Corner Bottom Plate
P/N 12100-CB-AAAAAA

Top and Side Tee Plate
P/N 12100-TS-AAAAAA

Bottom Tee Plate
P/N 12100-BT-AAAAAA

Cross Plate
P/N 12100-IC-AAAAAA

**Cage Arrangement
Handle
(Optional Item)**
P/N 12108-00-AAAAAA

Vertical Molding Strip
**Refer to Table 10
for Part Number**

General

All these assembly hardware items can be removed and replaced in the same way.

Tool Required

- Phillips screwdriver

Procedure

1. With a Phillips screwdriver, remove the cap screws holding the part to the cage and remove the part.
2. Hold the new part in place and secure with the cap screws removed above.

General

Depending on how your cage arrangement is set up, the vertical molding strip you want to replace may have door hinges on both sides, latch mechanisms on both sides, or hinges on one side and a latch mechanism on the other (Figure 62). These components will have to be removed to access the vertical molding strip.

Depending on what tier the vertical molding strip is on, above and below it will be a top and side tee plate, a bottom tee plate, or a cross plate. These too will have to be removed, to access the vertical molding strip.

Tools Required

- Punch (1/4 in. dia. max.)
- Small hammer or mallet
- Phillips screwdriver
- 7/16 in. wrench

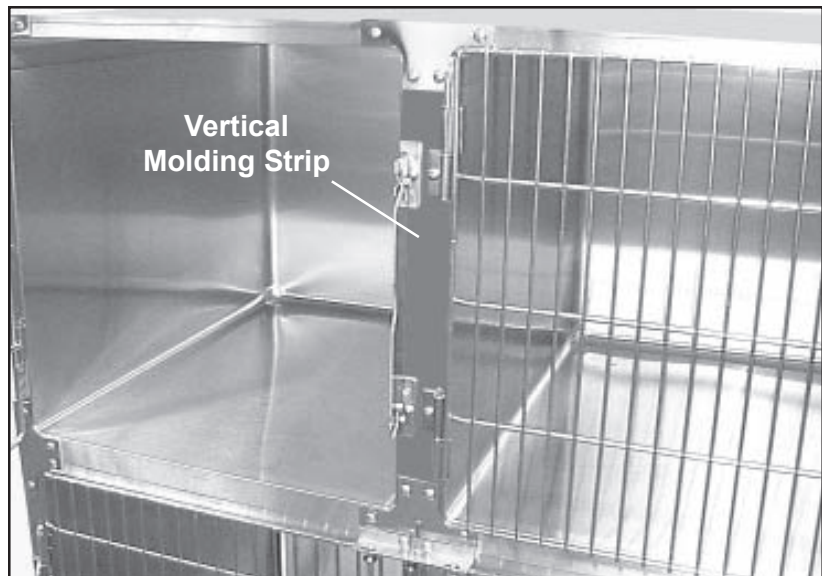


Figure 62. Typical Vertical Molding Strip in Place.

Procedure

1. Remove any hinges adjacent to the vertical molding strip. Refer to *Door Hinge, Steps 1 through 4* on *Page 54*.
2. Remove any latch mechanism adjacent to the vertical molding strip. Refer to *L-bracket, Steps 1 through 3* on *Page 56*.
3. Remove the assembly hardware plates above and below the vertical mounting strip.
4. Remove the vertical mounting strip.
5. Install the new vertical molding strip in place between the cages.
6. Replace the hardware plates above and below the strip.
7. Replace any latch mechanism you may have removed. Refer to *L-Bracket, Steps 4 and 5* on *Page 56*.
8. Replace any hinges you may have removed. Refer to *Door Hinge, Steps 5 through 8* on *Page 54*.

Latch Adjustment

If the latch connector and door are not properly adjusted, you may have difficulty in opening the door, and it may not lock automatically when closed. To adjust the door:

1. Loosen the L-bracket cap screws (Figure 63). On double-door cages, loosen the upper and lower latch plate cap screws (Figure 64).
2. Move the L-brackets (or latch plates) slightly as needed.
3. Retighten the hinge cap screws.
4. Try the door again, and repeat the adjustment until the latch mechanism works smoothly.

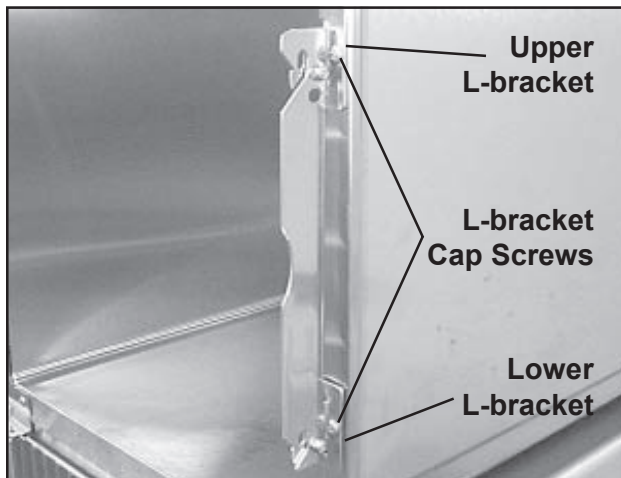


Figure 63. L-bracket Adjustment (single-door cages)

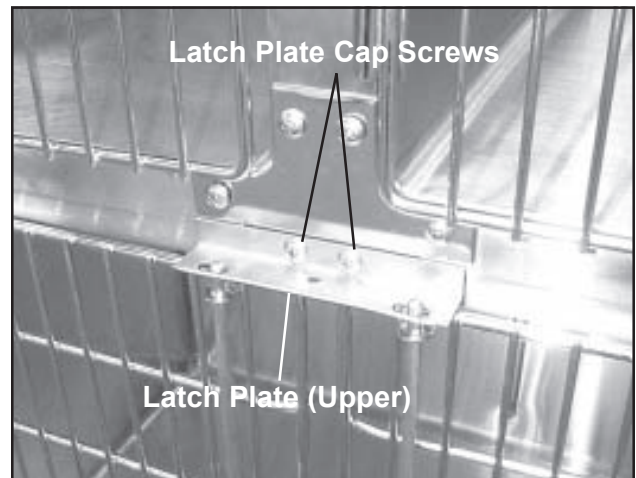


Figure 64. Latch Plate Adjustment (double-door cages)

If the above adjustments are not adequate to make the latch work correctly:

1. Loosen the cap screws on all the door hinges (Figure 65).
2. Move the entire door up or down slightly. On double-door cages, try to isolate the problem to one door. That will make adjustment a lot simpler!
3. Retighten the hinge cap screws.
4. Try the door again, and repeat the adjustment until the latch mechanism works smoothly.

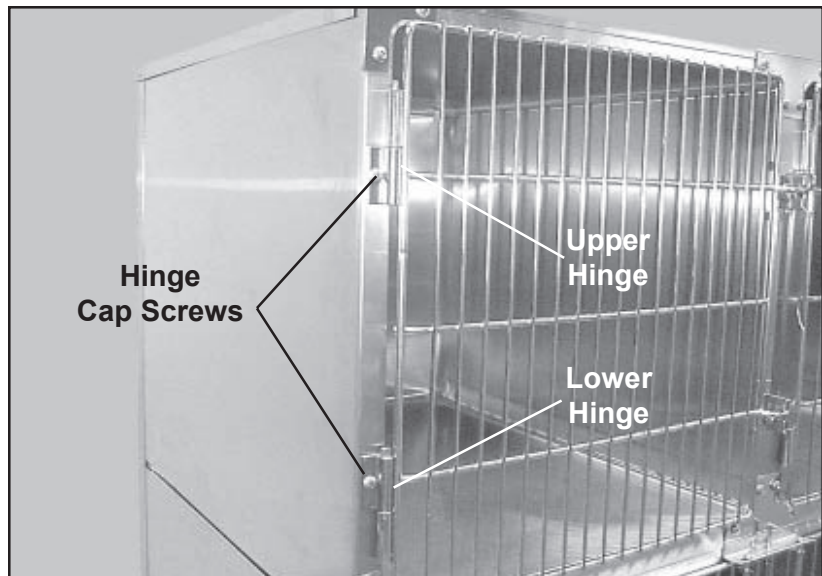


Figure 65. Adjusting the Door Hinges

If, after performing the previous adjustments, the door will still not open or latch properly, it is possible that it has been deformed in some way. Try the following:

1. Measure the door diagonally from upper-right to lower-left and record the measurement (Figure 66). Then, measure it again from upper-left to lower-right and record that measurement. .
2. Compare the two measurements; they should be identical. If they are more than a tiny fraction different, the door has been deformed.

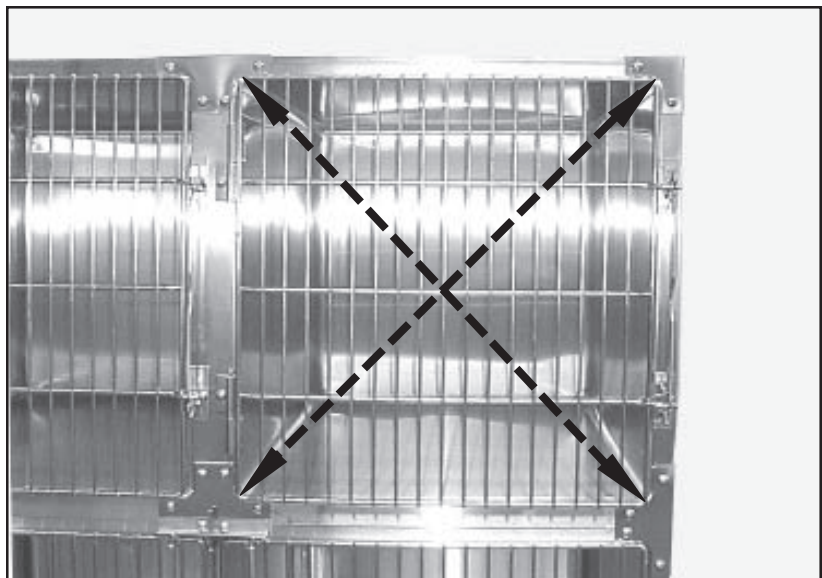


Figure 66. Measuring the Door for Deformation

3. Remove the door from the cage.
4. Hold the door by one of the corners of the longer dimension.
5. Rap the diagonally opposite corner of the door lightly on the floor. **Note:** You do not have to use great force; just one gentle rap is usually sufficient.
6. Remeasure the door and repeat the process until both dimensions are the same.
7. Remount the door.

Reversing the Door Hinges

All single-door Regal cages come from the factory hinged on the left and latched on the right. The doors are ambidextrous, however, and can be easily reversed to open the other way if desired. To reverse the hinges, refer to *Reversing the Door Hinges* on Page 30.

Chapter 6 - Troubleshooting

General

The following procedures will help you fix most of the problems that you might encounter with your Regal cage arrangement. If necessary, please feel free to call SSCI Customer Service at (800) 323-7366. Our experienced technical support personnel will be glad to help you.

For more information on contacting SSCI, refer to *SSCI Contact Information* on Page 2.

Part numbers for available replacement parts are shown on Pages 49 and 50. To order replacement parts, refer to *Parts Ordering Procedure* on Page 49.

Possible problems are listed below along with their page references:

- The cage door does not close or latch correctly. ----- Page 68
- The cage/base does not roll freely (mobile bases only). ----- Page 69
- The cage/base rolls even when the brakes are on (mobile bases only). Page 70

Returning Cage Elements for Repairs

RMA Numbers

If elements of your cage arrangement should require return to SSCI for repairs, discuss the problem with one of our Customer Service Representatives. Obtain an RMA number (Return Merchandise Authorization) from them before shipping the unit back. **Note:** SSCI will *not* accept merchandise returned without an RMA number.

Packing and Shipment

Package the component securely in a suitable container and staple or tape the cover securely in place. Ship documentation with the table including:

- Destination
- RMA Number
- Your name, company and address
- Your telephone number
- A description of the reason for returning the component

The door does not close or latch correctly.

Remedial Action

First: The latch brackets are probably out of adjustment. Refer to *Latch Adjustment* on Page 63.

Second: If your problem cannot be cured by any of the above adjustments, check the following cage components for damage

- Cage door
Refer to *Table 10* on *Page 50* for replacement part number. Refer to *Cage Door* on *Page 53* for replacement instructions.
- Latch L-brackets (single-door cages)
For replacement parts, order P/N 615394. Refer to *L-bracket* on *Page 56* for replacement instructions.
- Latch connector (single-door cages)
Refer to *Table 10* on *Page 50* for replacement part number. Refer to *Latch Connector* on *Page 55* for replacement instructions.
- Latch plates (double-door cages)
For replacement parts, order P/N 615403. Refer to *Latch Plate* on *Page 57* for replacement instructions.
- Door Hinges
For replacement parts, order P/N 615552. Refer to *Door Hinge* on *Page 54* for replacement instructions.

The cage/base does not roll freely (mobile bases only).

Remedial Action

Please refer to the *Owner's Manual* supplied with the mobile base for more information.

First: You may just have a caster brake locked. Check the front casters to make sure the **OFF** side of the brake lever is down. Refer to *Using the Wheel Brakes* on Page 44.

Second: Check all casters for condition. Are they dirty, wobbly, badly bent, or in any way damaged? Have they been lubricated in the last six months?

Animal hair, thread and other materials can accumulate in the wheel bushing and prevent the wheel from turning freely. If substantial foreign matter is visible, disassemble the caster assembly, clean it thoroughly, reassemble, and lubricate it (Refer to *Lubricating the Casters* in the *Base Owner's Manual*).

If a caster is heavily rammed into a solid object, it can be bent in such a way as to jam the ball bearings. If this is the case, the caster will be unable to align itself with the table's direction of movement and will have to be replaced.

If a caster assembly is damaged or showing excess wear, replace it.

To order a new caster, contact SSCI Customer Service and order the desired caster as shown in Table 11 below.

Caster Type	New Part Number	Former Part Number
Plain (no brake)	C008-21081110-FNF00	851152
With Brake	C008-21081111-FNF00	851151
Four casters used on bases from 1'6" through 6' wide. Six casters used on bases from 6'6" through 10' wide.		

Table 11. Caster Model Numbers

The cage/base rolls even when the brakes are on (mobile bases only).

Remedial Action

Please refer to the *Owner's Manual* supplied with the mobile base for more information.

First: Make sure the **ON** sides of the brake levers on the front casters are fully depressed.

Second: Check the front casters for condition. Are they dirty, wobbly, badly bent? Have they been lubricated in the last six months?

Hair, thread, and other materials can accumulate in the wheel bushing and prevent the brake from holding as it should. If substantial foreign matter is visible, disassemble the caster assembly, clean it thoroughly, reassemble, and lubricate it (Refer to *Lubricating the Casters* in the *Base Owner's Manual*). If cleaning and lubricating the casters does not fix the problem, replace the front casters.

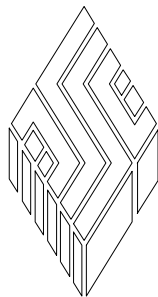
If a wheel/caster assembly is damaged or showing excess wear, replace it.

To order a new caster, contact SSCI Customer Service and order the desired caster as shown in Table 11 on *Page 69*.

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***For more information on SSCI's fine line of products
and accessories, talk to your SSCI sales representative.***



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