

Standard Stall Series
Assembly & Installation Instructions



## System Equine

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## **BEFORE YOU START**

NOTE: All measurements are based on finished wood sizes. Example 2" x 6" finished size is 1 1/2" x 5 1/2"

## Questions to Be Answered...

Careful consideration when designing your barn layout will save you time, money and frustration.

Do you want the horses to see one another?  □ Solid partition walls			
·			
☐ Grilled partition walls			
□ Privacy partition walls			
Do you want to have the horses look out the front of the			
stalls?			
☐ Flip down V- doors			
☐ Swing out feed doors			
☐ Shutter doors			

Do you want to be able to feed from outside the stall?

☐ Swing out feed doors

■ Swing Down doors

☐ Feed Opening

What type of latch do you like?

□ Slide latch

☐ Top latch catch

☐ Horseshoe Latch

What type of wood are you using?

☐ 1 1/2" width is the standard thickness of the

U-Channel.

Are you concerned with good ventilation?

□ Grilled Front Walls

☐ Grilled side walls

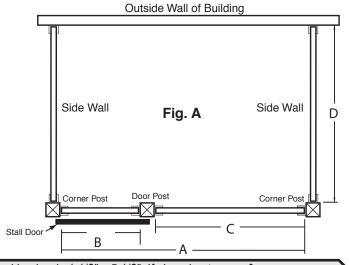
☐ Full Grill doors



Standard Stall Sizes are 10'x10', 12'x12', 10'x12' Make sure to plan for additions to your stable ahead of time. System Standard Stalls feature options such as removable walls, feed doors, V-Doors & more.

## ANY SIZE STALL CAN BE BUILT USING THE SYSTEM STALL SYSTEM

- 1. Corner posts can be set 10' or 12' (or any other spacing as desired) on center to fit building design or special needs. The Grill length (See C in fig A) of a standard 10' stall front is 65" and 91" for a 12' stall front. (See Fig. A). However, grill sections can be combined to create any size of stall front you desire.
- 2. The inside distance between the door posts (See B in fig A) must be 48". Posts used for the installation may be 6X6, 4x4, or 4X6. If top of posts are not going to be anchored then a sufficient amount of post should be placed deep enough in the footing to provide adequate holding power. (We recommend a 3' depth)
- 3. Install the corner posts first followed by the door posts. Make sure all posts are plumb, true and level.





Keep in mind the finished size for  $2^{\circ}$  x  $6^{\circ}$  dressed lumber is  $1 \frac{1}{2^{\circ}}$  x  $5 \frac{1}{2^{\circ}}$ . If choosing tongue & groove as your filler wood take in to account the loss of height due to the tongue & grooves. We recommend you use pressure treated wood for the bottom two boards of your stall system.

NOTE: Wall sections that span over 12' long will require a 4" x 4" center support post.

## WOOD SPECS FOR SYSTEM STALL SYSTEMS

SECTION	10 FT. STALL	12 FT. STALL	14 FT. STALL
Front walls (for header channel)	10 - 2" X 6" X 10' 1 - 2" X 10" X 10'	10 - 2" X 6" X 12' 1 - 2" X 10" X 12'	10 - 2" X 6" X 14' 1 - 2" X 10" X 14'
Grill Partitions	9 - 2" X 6" X 10' 1 - 2" X 10" X 10'	9 - 2" X 6" X 12' 1 - 2" X 10" X 12'	9 - 2" X 6" X 14' 1 - 2" X 10" X 14'
Solid Partitions	18 - 2" X 6" X 10'	18 - 2" X 6" X 12'	18 - 2" X 6" X 14'
Posts* 4X4 4X6	3 Needed per stall system except when stalls are added next to each other.		
6X6	*See Fig. A above.		

# STEPS TO EASY INSTALLATION...

#### **POST INSTALLATION**



When you auger posts, all posts should be installed with the top at least 8' above the ground. If the posts are not properly secured at the top, they must be buried to a depth of at least 3' to provide adequate stability.

NOTE: Post can be installed in several ways. The most common is to auger into the ground and using post anchoring plates.

#### STFP 1

Refer to Fig. A page 2 to determine post locations for the size of stall that has been selected.

#### STEP 2

Install the corner posts first, being careful to stay within the distances A and D as given in the chart.

#### STEP 3

Install the door post to distance B to a tolerance of + or - 1/4".

NOTE: Make sure all posts are checked for level on all sides.

#### STEP 4

Dimension C should be treated as the variable dimension if a problem with post location should arise. In this event, it may be necessary to cut some of the grill components.

#### 



With all posts in place it is time to order your lumber and unpack the stall components. Review the assembly drawing to familiarize

yourself with the names and locations of the parts. Try not to mix boxes.

TO AVOID MISTAKES PERFORM EACH STEP IN THE SEQUENCE SHOWN.



CHECKING FOR SQUARE: Measure from one corner diagonally to the opposite corner (top left to bottom right) and repeat for the other corner, measurements should be the same. If they are not, tap the corner of the longest measurement until you have two equal measurements. This will ensure your work is square.

### FRONT WALL ASSEMBLY

#### STEP 1 (See Fig. 1B, on page 5)

- Install the 46" U-channels on the corner and door posts with the screws provided. (channels under grillwork)
- 1b. U-channels should be set back 1/2" from the front face of the posts.
- 1c. The U-channels should be set + or 1/2" above the floor.

#### STEP 2

Cut all necessary lumber to a length 1/4" to 3/8" less than the distance measured between the inside faces of the U-channel.

#### STEP 3

Installing the lumber in the U-channels.

- 3a. Slide the first board down to the bottom of the U-channel ensuring that it is level. (pressure treated lumber can be used for the bottom of the stall wall)
- 3b. Firmly secure the bottom board with the screws provided before installing the remaining boards.

#### STEP /

Install all remaining boards ensuring that they come to a height of 1 1/8" above the top of the U-channels. It may be required to rip cut a board to achieve the correct height.

#### STEP 5

Install the rubber grommets as shown in Detail D on page 5 for both the bottom and top grill channels.

#### STEP 6

Install the bottom grill channel flush with the top of the U-channels, secure

the channel with the screws provided.

#### STEP 7

At a height 36 3/8" install two 7" header U-channels above the top of the 46" U-channel.

#### STEP 8

Place the 2" x 10" header board in the 7" U-channels allowing it to extend 1/2" bellow the 7" U-channels. Use a screw at each end to hold the header board in place for now. Put the top grill channel in position on the bottom of the header board again hold in place with screws.

#### STEP 9

Insert the grill bars starting at one end. Place the grill bars in the top grill channel then lower into the bottom grill channel, repeat until all bars are in place. When all bars are in place remove the screws used to hold the header board and top grill channel. Push or pull down on the header board until it sits evenly on the top of the grill bars. Now secure the header and top grill channel in place with the screws provided.

#### STEP 10

THE FOLLOWING IS FOR 12' FRONTS OR LARGER ONLY. Install the one wall brace placing it on the inside of the wall.

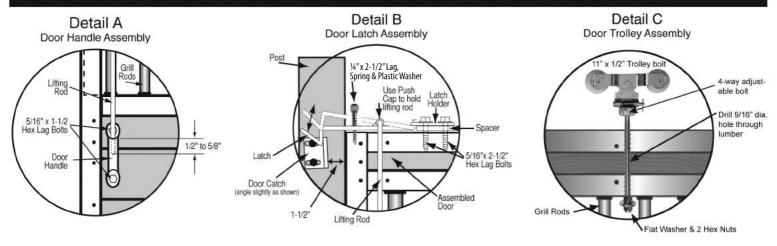
#### NOTE:

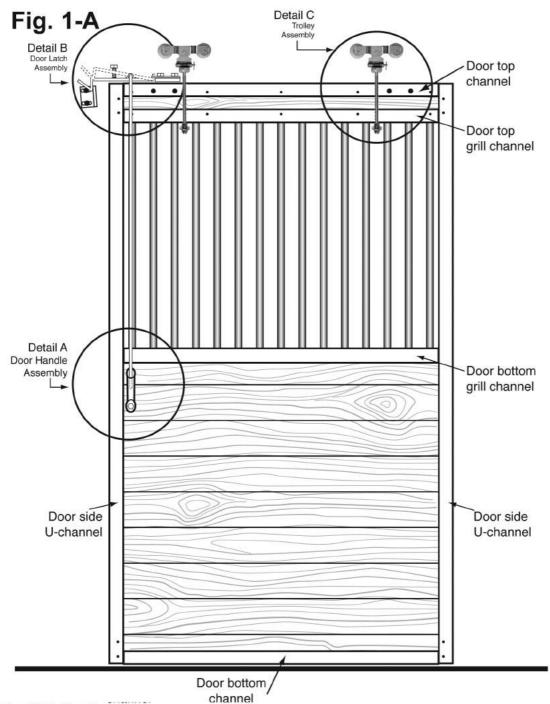
- 12' Front walls come with one 46" wall brace.
- Grilled partition walls come with two 46" wall braces, 1 for each side
- Solid partition walls come with two 94" wall braces one for each side.



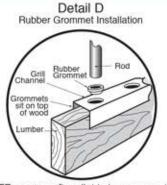
There are two 7" header U-Channels provided with each stall door to install an optional 2"x10" lumber header in the door opening for added strength. Installation instructions for Optional Header are on page 8 of this manual.

# DOOR ASSEMBLY ILLUSTRATION



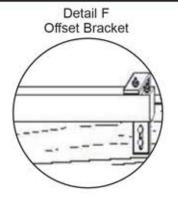


# FRONT WALL ASSEMBLY



NOTE: use a soft mallet to tap grommets into place. Grommets are really hard to remove if set into U-Channel properly.

# Detail E Facemount Bracket



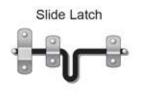


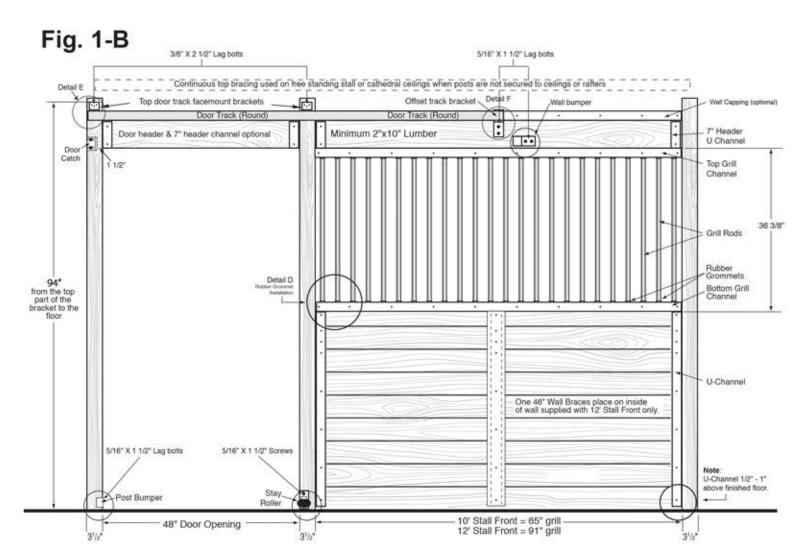












# SIDE WALL ASSEMBLY (GRILLED & SOLID PARTITIONS)

#### NOTE:

The U-channel required for a solid wall partition is 94 1/2" long The U-channel required for a grilled wall partition is 46" long

#### STEP 1

First, select the U-channel for the type of wall partition to be installed. Install one U-channel in the center on either the corner or outside wall at + or - 1" above the stall floor.

#### STEP 2

Cut all the necessary lumber to a length 1/4" to 3/8" less than the distance measured between the inside faces of the U-channels.

#### STEP 3

Installing the lumber in the U-channels

- 3a. Slide the first board down the U-channels all the way to the floor and ensure that it is level.
- 3b. Firmly secure with the screws provided.

#### NOTE: For solid partition walls

- Install all remaining boards and secure with the screws provided
- Install the two 94" wall braces (one each side) with the screws provided.

## STEP 4 NOTE: Remaining steps are for grill partition walls.

Install all remaining boards ensuring that they come to a height of 1 1/8" above the top of the U-channels. It may be required to rip cut a board to achieve the correct height.

#### STEP 5

Install the rubber grommets as shown in Detail D on page 5 for both the bottom grill channel and the corresponding top grill channel.

Use a soft face mallet or your fingers to install the rubber grommets into place.

#### STEP 6

Install the bottom grill channel flush with the top of the U-Channels. NOTE:

- For a 10' partition wall, two 6' and two 4' grill channel are utilized
- For a 12' partition wall, two 6' grill channels are utilized
- For a 14' partition wall, four 6' grill channels and two 21.5" channels are utilized. NOTE: Wall sections that span over 12' long will require a 4" x 4" center support post.
- Install the 6' channel first by butting it flush with the face of the post. Install
  the second channel for the appropriate distance. It may be necessary to
  cut this component. Then attach channels with the screws provided.

#### STEP 7

At a height 36 3/8" install two 7" header U-channels above the top of the 46" U-channel.

#### STEP 8

Place the 2" x 10" header board in the 7" U-channels allowing it to extend 1/2" below the 7" U-channels. Use a screw at each end to hold the header board in place for now. Put the top grill channel in position on the bottom of the header board again hold in place with screws.

#### STEP 9

Insert the grill bars starting at one end. Place the grill bars in the top grill channel then lower into the bottom grill channels, repeat until all bars are in place. When all bars are in place, remove the screws used to hold the header board and top grill channel. Push or pull down on the header board until it seats evenly on the top of the grill bars. Now secure the header and top grill channel in place with the screws provided.

#### STEP 10

Install the two wall braces, 46" for grilled walls or 94 1/2" for solid walls, placing one on each side of the wall opposite each other and centred in the partition

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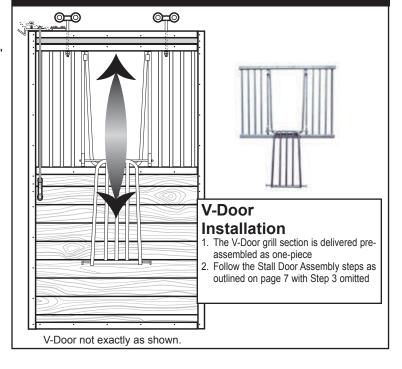
#### **FEED DOOR STYLES** Pull down Hinge Point **Swing-Out Feed Door Installation** 1. First decide where you want the swing-out feed door located. 2. Omit 7 bars from the grill section (Stay at least one bar from either end of the grill section) 3. The swing-out feed door comes completely assembled and ready for installation and is installed in the same way as the grill bars. Hinge Point **Feed Opening** Installation 1. First decide where you want the feed opening. 2. Cut two bars to the desired length, 22" long bars will leave approximately a 12" opening. 3. Slide feed opening over the two outer bars of the opening. Let the feed opening plate rest on the bottom grill channel. Insert the two cut bars in the top grill channel and slide the feed opening up until it is tight with the two bars. Use the self-drilling self-tapping screws to hold the feed opening plate in place. Note:

### **FLIP DOWN V-DOOR**

Screw through feed opening plates into

the outer bars of the opening. Place

screw at all four corners as shown.



# STALL DOOR ASSEMBLY



Only put screws on the front or outside of the stall door.

#### STEP 1

Cut 10 pieces of 2" x 6" lumber to a length of 50 1/2".

#### STEP 2

Lay out door components as shown in Fig. 2, on a flat surface.

#### STFP 3

Insert the rubber grommets into the rod holes on the top and bottom grill channels as shown in Detail D on page 5.

#### STEP 4

Door Header Assembly

Locate the door top channel and the door top grill channel and one

piece of 2" x 6" lumber cut to 50 1/2". Place the lumber evenly between the two channels and fasten securely in place. IMPORTANT: Be sure the 3/4" punched holes for the trolley assembly line up.

#### STEP 5

Next take a drill with a 9/16" wood drill bit and drill straight through the wood of the door header using the 3/4" punched holes as a guide. If your drill bit is not long enough to drill all the way through, flip the header over and drill from the other side.

#### STEP 6

To pre-assemble the of door side U-channels see Fig. 2 below. Install door insert as shown inserting screws and tighten. Installation should allow 5 1/2" from top of door insert to top of door side U-channel.

#### STEP 7

Lay out door components as shown in Fig. 2, on a flat surface.

#### STEP 8

At this time turn to pages 4 & 8 for the installation of the door trolley assembly and door latch. Completing these steps at this time will make it much easier.

#### STEP 9

Position and secure in place the two pre-assembled door side U-channels on either side of the door header.

#### STFP 10

Place the bottom grill channel evenly on a piece of  $2^{\circ}$  x  $6^{\circ}$  x 50  $1/2^{\circ}$  lumber. Then position it between the door side U-channels tight to the inserts.

#### STEP 11

Now insert the grill bars starting at one side until all bars are in position. Then secure the bottom grill channel to the side U-channels with the screws.

#### STEP 12

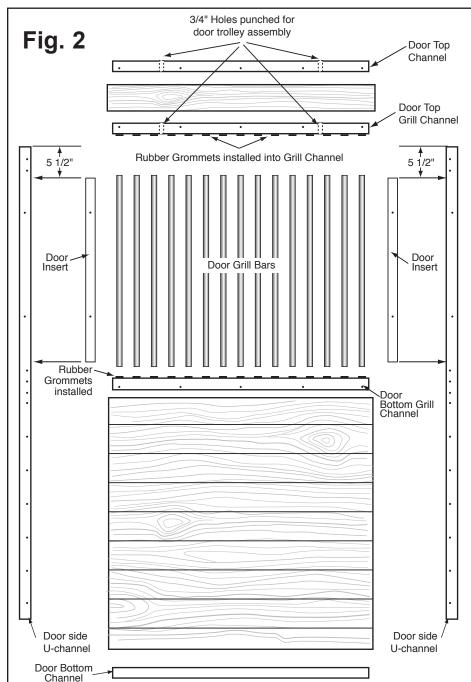
Now fill up the rest of the door with the 2" x 6" x 50 1/2" lumber.

#### STEP 13

Insert the door bottom channel over the last piece of lumber and flush with the bottom of the door side U-channels. Insert and tighten screws.

#### STEP 13

Make sure the door is square (see Tip on page 3) and the door top & bottom channels butt against the door side U-channels. Insert and tighten all the screws down the length of both door side U-channels. Note: Only put screws in front or outside face of door. Screws placed on back or inside of door may interfere with the door operation.



#### LED STALL DOOR ASSEMBL . GRILL



Only put screws on the front or outside of the stall door.

Cut two pieces of dressed 2" x 6" and one piece of dressed 2" x 8" lumber to a length of 50 1/2".

#### STEP 2

Insert the rubber grommets into the rod holes of all for grill channels.

Lay out all door components as shown in Fig. 3, on a flat surface.

#### STEP 4

Door Header Assembly

Take door top channel and the door top grill channel (3 1/2" bar spacing) and one piece of the dressed 2" x 6" board cut to 50 1/2" long. Place the channels evenly on the board and fasten securely in place. Repeat these steps for the bottom door channel and bottom door grill channel (2" bar spacing)

#### STEP 5

Center Grill Assembly:

Take the dressed 2" x 8"x 50 1/2" long board with the remaining top grill channel (3 1/2" bar spacing) and the bottom grill channel (2" bar spacing) Place the channels evenly on the board and fasten securely in place.

#### STEP 6

Door Side Insert Pre-assembly:

See Fig. 1 below. Install door insert as shown inserting screws and tighten. Installation should allow 5 1/2" from top of door insert to top of door side U-channel.

#### STEP 7

Lay out door components as shown in Fig. 3, on a flat surface.

Position and secure in place the two preassembled door side U-channels on either side of the door header.

#### STEP 9

Place a center grill assembly in the approximate center of the door between the door side U-channels.

#### STEP 10

Now insert the grill bars starting at one side until all bars are in position. Then secure the center grill assembly to the side U-channels with the screws.

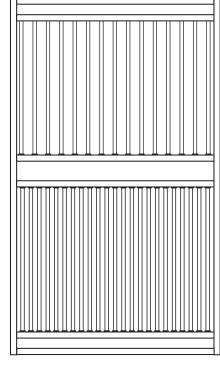
Now place the remaining bars in the bottom section of the door and slide the bottom door grill assembly up in to the side U-channels be sure it is flush with bottom of the side U-channels then secure in place.

#### STEP 12 Door Top

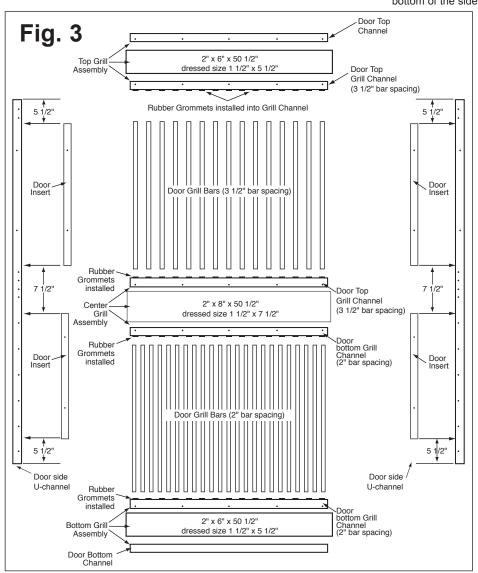
Make sure the door is square and the door top & bottom channels butt against the door side U-channels. Insert and tighten all the screws down the length of both door side U-channels. Note: Only put screws in front or outside face of door. Screws placed on back or inside of door may interfere with the door operation.

#### NOTE: ONLY A SLIDE LATCH CAN BE USED WITH THIS DOOR.

View of finished door



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## **DOOR TROLLEY ASSEMBLY (see Detail C page 4)**

#### STFP 1

Assemble Round Track Trolley as per enclosed instructions.

#### STFP 2

Drill through pre-punched hole in door top channel using a 9/16" drill bit.

#### STEP 3

Insert bolt and pre-assembled roller assembly through hole, use flat washer and 2 hex nuts to secure in place that are included in your Round Track Trolley Package.

## TOP DOOR LATCH & HANDLE ASSEMBLY (see Detail B page 4)

#### STEP 1

Position the latch, spacer and latch holder in place on door, use the two 5/16" x 2 1/2" hex lag bolts to fasten them to the door.

#### STEP 2

Screw the 1/4" x 2 1/2" guide lag bolt with the spring and washer in position leaving the latch approximately 1/2" to 5/8" of vertical movement.

#### STEP 3

Attach the lifting rod to the latch with the locking push cap.

#### STEP 4

Place the door in position and allow the lifting rod to hang level to determine the door handle location.

#### STEP 5

Lifting rod should extend approximately 1/2" to 5/8" below the top of the inside of the door handle.

#### STFP 6

Fasten handle to door using the two 5/16" x 1 1/2" hex lag bolts.

### DOOR INSTALLATION

#### STFP 1

Note: If using 3.5" posts, you will find that the facemount brackets will stick out in between the posts. You may choose to hammer the overhanging sections of the brackets back or simply cut off and file down any excess.

#### DOOR TRACK BRACKET INSTALLATION:

Three track mounting brackets are included in the hardware kit; 2 brackets are top mounting facemount brackets with 5 bolt holes and 1 bracket is a offset style bracket and has one top bolt and two wallmount bolt holes.

#### STEP 2

Our Round track has five notches in it across the top. To determine the proper side to hang the track over the door opening, starting at the first notch at the end, measure 52" to the third notch. This will allow you to hang the facemount side brackets onto the posts,based on a 48" opening for your door. Simply slide the notch of the facemount bracket into the hole on the track and tap the bracket towards the outside with a hammer.

#### SIEP 3

Measure 93" from the ground up each stall door post and mark a horizontal line across each post. With help, lift your track so that the top of each facemount bracket lines up with corresponding line. Attach the brackets with 1 lag bolt into post. Reinforce with 2 screws into each hole on either side of the lag. (2 people required for this step)

#### STEP 4

With help lift the door up and maneuver the trolleys into the door track. Leave door at door opening supported by facemount brackets.

#### STEP 5

Now complete the door track assembly by inserting the remaining end cap (DETAIL H - FIG 1B -PAGE 4) and offset bracket (DETAIL F - FIG 1B -PAGE 4) on the end of the track.

IMPORTANT: Level the track before securing the offset bracket.

#### SHUTTER DOORS:

10' Track with 1 Facemount Bracket & 3 Offset Track Brackets

#### STEP 6

With the door open and flush with the center door post install the wall bumper to the header at the top back of the door. See FIG 1-B.

#### STEP 7

Secure the stay roller to the bottom center of the center door post. See FIG 1-B.

#### STEP 8

Attach the post bumper to the bottom of the corner post approximately 1/2" off the floor. See FIG 1-B.

#### STEP 9

With the door in the closed position and approximately 3/8" away from touching the post bumper. Install the door catch to the corner post approximately 1/8" to 1/4" below the top to the door. See detail B page 4

#### DOOR OPTIONAL HEADER ASSEMBLY

#### STEP 1

There are two 7" long U-channels provided with each stall door to install an "optional" 2 "X 10" header board in the door opening behind the track and directly in line with the lumber above the grill section.

#### STEP 2

Fasten the 7" U-channels 1" back from the front of the posts with the bottom edge of the U-channel at a height of 83" and level from the finished floor using the #12 X 1 1/4" screws provided.

#### \*NOTE:

These U-channels are mounted at the same height as the ones used in the grilled front or grilled partition.

#### STEP 3

Slide a piece of 2" X 10" lumber into the U-channels and leave 2" of lumber protruding below the U-channels. Insert and tighten all screws on both side of the U-channels.

\*NOTE

2 X 10 lumber length is 1/2" less than the stall door opening.

#### STEP 4

If optional wall capping is used, cut to desired length and slide firmly over the bottom and top edge of the 2" X 10" lumber in the door opening and secure with screws.