

THE METHOD OF TESTING WAS IN SUBSTANTIAL CONFORMANCE WITH THE PROCEDURES DESCRIBED IN DASMA 108. THE PRESSURES SHOWN ON THE DRAWINGS WERE CALCULATED USING ASCE 7-98/02/05 WITH THE FOLLOWING PARAMETERS (5 FEET OF DOOR WIDTH IN END ZONE, ROOF SLOPE 10° OR LESS, AND I=1.0):

|                  |     |     |     |     |     |
|------------------|-----|-----|-----|-----|-----|
| WIND SPEED (MPH) | 151 | 137 | 130 | 124 | 119 |
| EXPOSURE LEVEL   | B   | C   | C   | D   | D   |
| MEAN ROOF HEIGHT | 30' | 15' | 25' | 15' | 25' |

| REV | DESCRIPTION OF REVISIONS | DATE | BY |
|-----|--------------------------|------|----|
|     |                          |      |    |

MAX SIZE 9'2" x 24"

DESIGN LOADS  
+32.6 PSF  
-38.2 PSF

TEST LOADS  
+48.9 PSF  
-57.3 PSF

Thomas L. Shelmerdine, PE (TX PE #85829)  
Structural Solutions, PA (TX Firm #F-004063)

STATE OF TEXAS  
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5921-G W. Friendly Ave., Greensboro, NC 27410



MODEL 1350 AMARR 2741  
MODEL 2700 AMARR 2742  
MODEL 2720 AMARR 2042

|      |                |              |                 |
|------|----------------|--------------|-----------------|
| SIZE | DRAWN BY DRD   | DATE 4/19/18 | DRAWING NUMBER  |
| B    | CHECKED BY DLJ | DATE 7/19/18 | IBC-1309-150-15 |

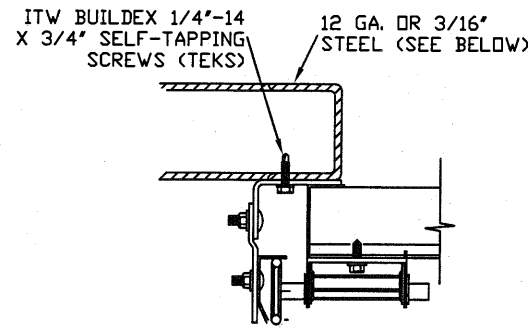
ENTREMATIC  
165 CARRIAGE COURT WINSTON-SALEM, NC. 27105

SHEET 1 OF 4

2" BRACKET MOUNT TO WOOD JAMB DETAIL  
N.T.S.

DOOR INTERIOR ELEVATION  
N.T.S.

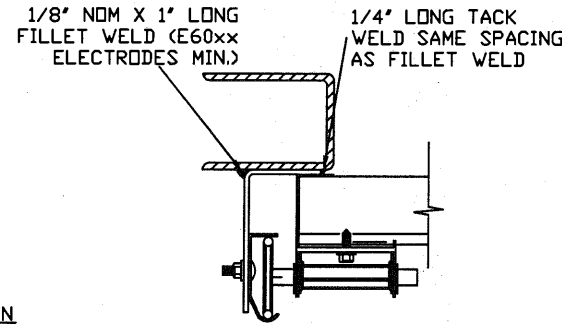
# TRACK CONNECTION DIRECTLY TO STRUCTURE OPTIONS



CLIP STYLE REVERSE ANGLE MOUNT SHOWN BRACKET, CONTINUOUS AND TAPERED ANGLE MOUNT AVAILABLE

12 GA. STEEL FRAMING  
232 LBS./SCREW ALLOWABLE LOAD - 6' FROM ENDS AND 18" O.C.  
REFER TO NOTES: 1, 2 AND 5

3/16" STEEL FRAMING  
569 LBS./SCREW ALLOWABLE LOAD - 6' FROM ENDS AND 24" O.C.  
REFER TO NOTES: 1, 2 AND 5



REVERSE ANGLE MOUNT SHOWN BRACKET, CONTINUOUS AND TAPERED ANGLE MOUNT AVAILABLE

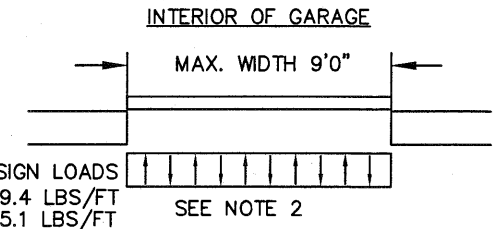
STEEL FRAMING 12GA DR BETTER  
1590 LBS./IN. ALLOWABLE LOAD - 6' FROM ENDS AND 24" O.C.  
REFER TO NOTES: 1, 2, 5, 6, 7, 8 AND 9

### NOTES:

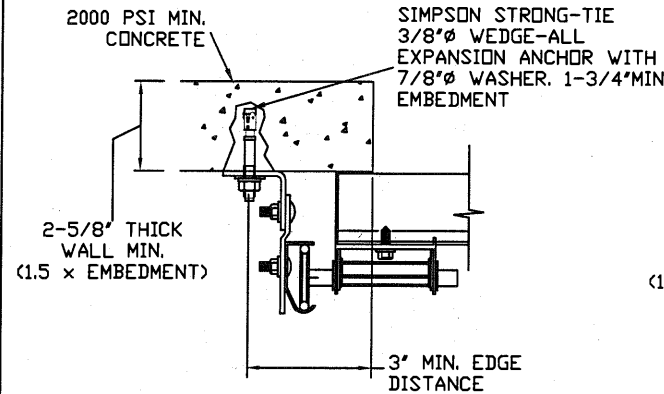
- ANCHORS TO BE EVENLY SPACED BETWEEN THE HEADER AND FLOOR.
- FIRST (BOTTOM) ANCHOR STARTING AT NO MORE THAN HALF OF THE MAXIMUM ON-CENTER DISTANCE. HIGHEST ANCHOR INSTALLED AT LEAST AS HIGH AS THE DOOR OPENING.
- MIN. EDGE DISTANCE OF 3" REQUIRED.
- USE WASHERS PROVIDED BY THE ANCHOR MANUFACTURER.
- SUPPORTING STRUCTURAL ELEMENTS SHALL BE DESIGNED BY A REGISTERED PROFESSIONAL ENGINEER FOR WIND LOADS IN ADDITION TO OTHER LOADS.
- MOST GARAGE DOOR TRACK IS GALVANIZED STEEL. USE ALL NECESSARY PRECAUTIONS WHEN WELDING GALVANIZED STEEL.
- ALL WELDS SHOULD BE PERFORMED BY A CERTIFIED WELDER OR INSPECTED BY A CERTIFIED WELDING INSPECTOR TO VERIFY THE INTEGRITY OF THE WELD.
- FILLET WELDS TO HAVE A STRAIGHT OR CONVEX FACE SURFACE.
- TACK WELD TOE OF ANGLE AT SAME SPACING TO PREVENT ROTATION OF TRACK ANGLE.

### SPECIFICATIONS AND NOTES

- ALL THE LOAD FROM THE DOOR IS TRANSFERRED TO THE VERTICAL TRACK, FROM THE TRACK THE LOAD IS TRANSFERRED TO THE VERTICAL JAMBS. THE HORIZONTAL JAMB OR HEADER RECEIVES NO PORTION OF THE LOAD TRANSFERRED FROM THE DOOR.
- EACH VERTICAL JAMBS RECEIVES MAXIMUM DESIGN LOADS OF: +149.4 LBS/FT & -175.1 LBS/FT
- DOOR AND HARDWARE WILL BE DESIGNED, MANUFACTURED AND INSTALLED WITH STANDARDS AS SET FORTH BY DASMA.
- DOOR SECTIONS SHALL BE 27 GA. (.015) MIN. EXTERIOR SKIN ROLLED FORMED, W/ BAKED ON POLYESTER FINISH
- SUPPORTING STRUCTURAL ELEMENTS SHALL BE DESIGNED BY A REGISTERED PROFESSIONAL ENGINEER FOR WIND LOADS INDICATED ON THIS DRAWING IN ADDITION TO OTHER LOADINGS.

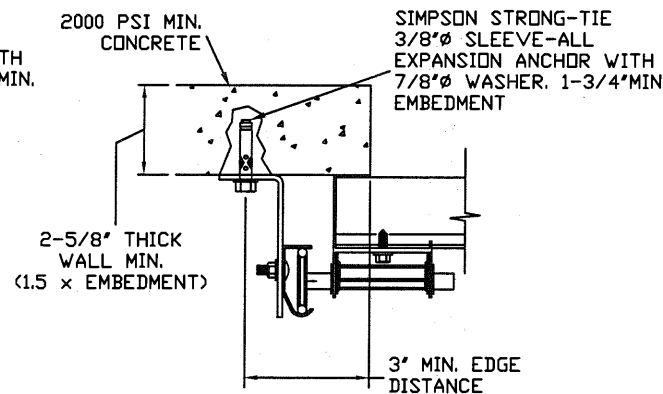


# WOOD JAMB ATTACHMENT TO STRUCTURE (OPTIONAL)



CLIP STYLE CONTINUOUS ANGLE MOUNT SHOWN BRACKET, REVERSE AND TAPERED ANGLE MOUNT AVAILABLE

2000 PSI CONCRETE OR GREATER  
351 LBS./EXPANSION ANCHOR ALLOWABLE LOAD - 6' FROM ENDS AND 24" O.C.  
REFER TO NOTES: 1, 2, 3, 4 AND 5



CONTINUOUS ANGLE MOUNT SHOWN BRACKET, CONTINUOUS AND TAPERED ANGLE MOUNT AVAILABLE

2000 PSI CONCRETE OR GREATER  
336 LBS./EXPANSION ANCHOR ALLOWABLE LOAD - 6' FROM ENDS AND 24" O.C.  
REFER TO NOTES: 1, 2, 3, 4 AND 5

### 2 X 6 VERTICAL JAMB ATTACHMENT TO WOOD FRAME STRUCTURE

5/16" X 3" LAG SCREWS STARTING 6" FROM ENDS THEN 24" O.C. (1 1/2" EMBEDMENT)

### 2 X 6 VERTICAL JAMB ATTACHMENT TO 2,000 PSI CONCRETE

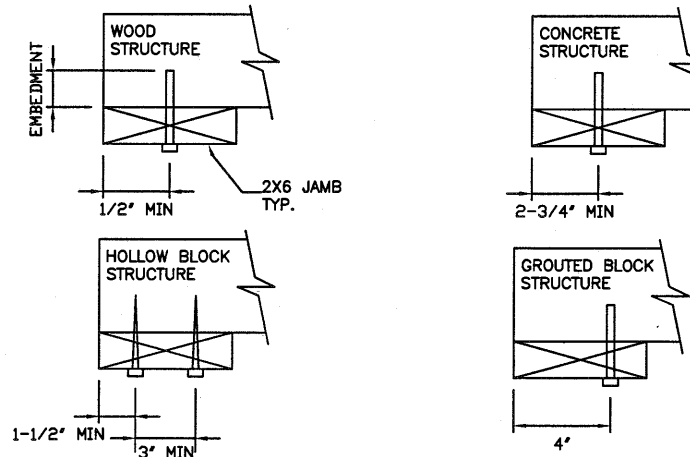
HILTI KWIK BOLT 3/8" X 4" STARTING 6" FROM ENDS THEN 24" O.C. (2 1/2" EMBEDMENT)  
HILTI SLEEVE ANCHOR 3/8" X 2-3/4" STARTING 6" FROM ENDS THEN 24" O.C. (1 1/4" EMBEDMENT)  
ITW/RAMSET REDHEAD (TRU-BOLT) 3/8" X 4" STARTING 6" FROM ENDS THEN 24" O.C. (2 1/2" EMBEDMENT)

### 2 X 6 VERTICAL JAMB ATTACHMENT TO HOLLOW C-90 BLOCK

SIMPSON 1/4" X 3" TITEN SCREWS STARTING 6" FROM ENDS, USE PAIRS OF FASTENERS (3" APART) AT 24" O.C. (1 1/2" EMBEDMENT)  
HILTI 1/4" X 2-3/4" KWIK-CON II+ SCREWS STARTING 6" FROM ENDS, USE PAIRS OF FASTENERS (3" APART) AT 24" O.C. (1 1/4" EMBEDMENT)

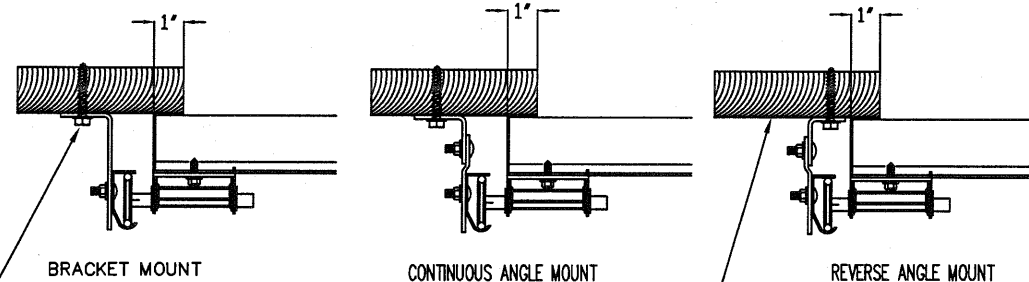
### 2 X 6 VERTICAL JAMB ATTACHMENT TO GROUTED C-90 BLOCK (2000 PSI GROUT)

HILTI SLEEVE ANCHOR 3/8" X 2-3/4" STARTING 6" FROM ENDS THEN 24" O.C. (1 1/4" EMBEDMENT)  
(OR, USE FASTENERS FOR HOLLOW C-90 BLOCK)  
\*LAGS AND BOLTS CAN BE COUNTERSUNK TO PROVIDE A FLUSH MOUNTING SURFACE.  
\*PREPARATION OF WOOD JAMBS BY OTHERS



# TRACK CONNECTION TO WOOD JAMB OPTIONS

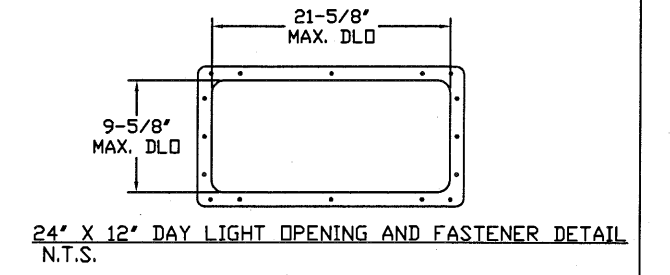
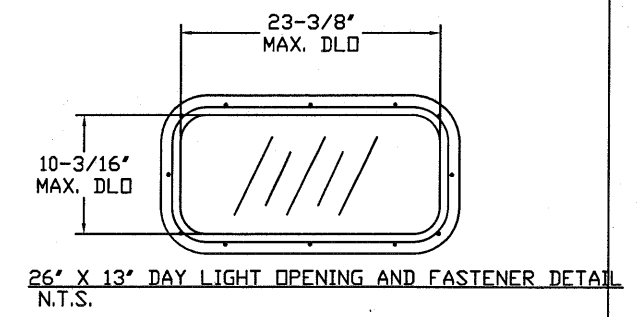
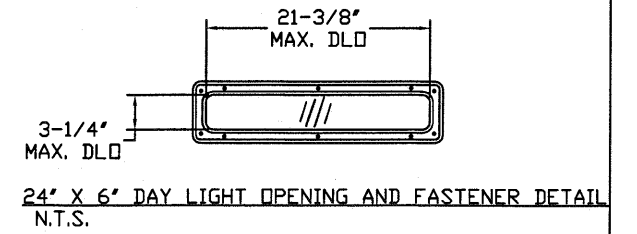
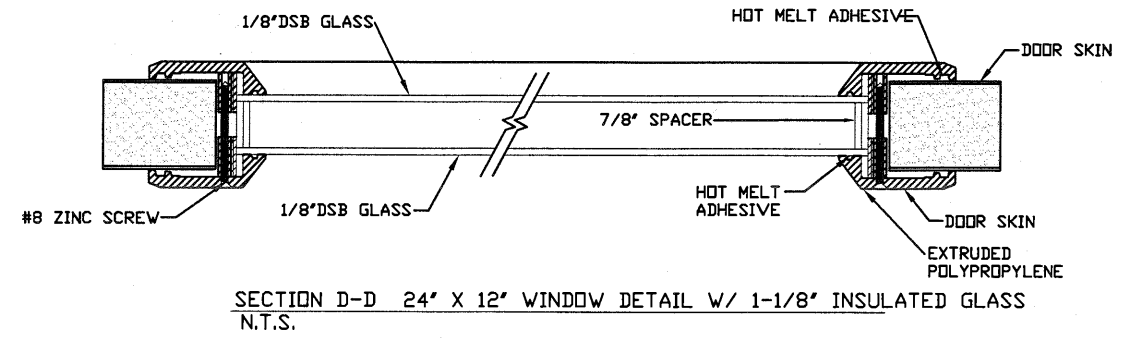
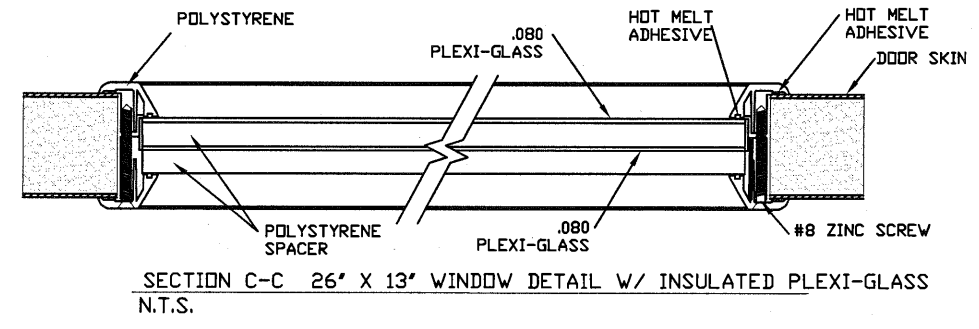
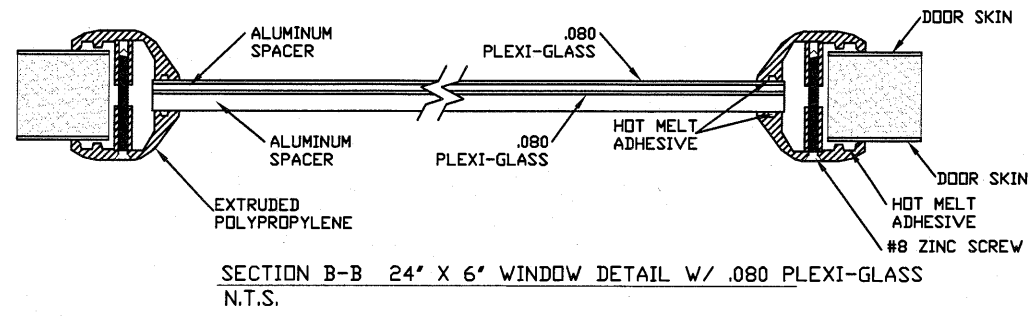
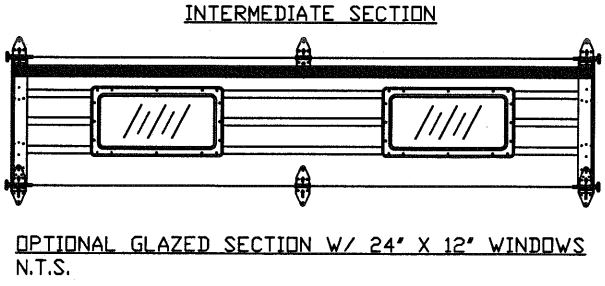
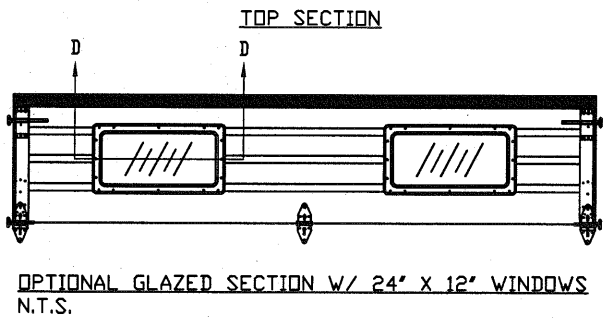
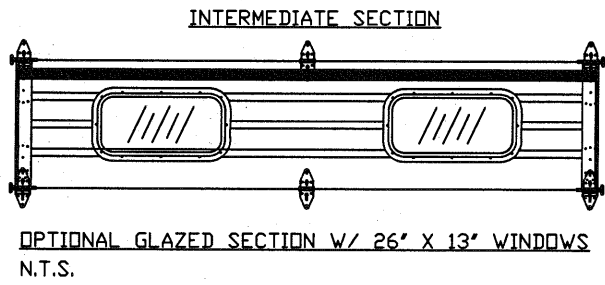
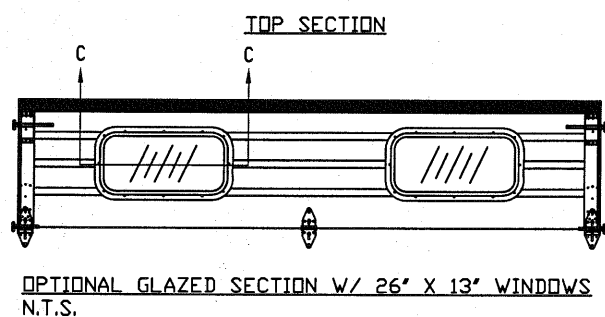
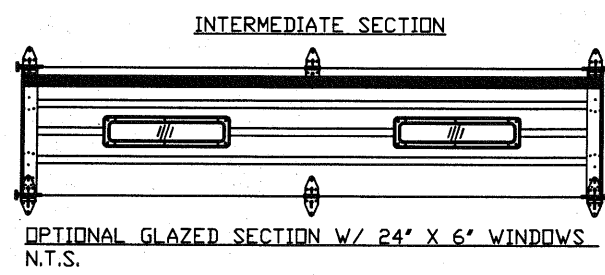
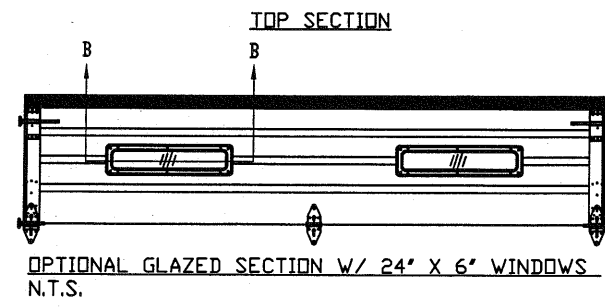
FOR LAG SCREWS & BRACKET SPACING SEE TRACK CONFIGURATION DETAIL



5/16" x 1 5/8" LAG SCREW (1) PER JAMB BRACKET (1-1/2" EMBEDMENT MINIMUM) (TYP.)

2x6 WOOD JAMB SYP OR SPF (NO.2) OR BETTER (TYP.)

| REV                                                                              | DESCRIPTION OF REVISIONS | DATE         | BY              |
|----------------------------------------------------------------------------------|--------------------------|--------------|-----------------|
| MAX SIZE                                                                         | 9'2" x 24'               |              |                 |
| DESIGN LOADS                                                                     | +32.6 PSF<br>-38.2 PSF   |              |                 |
| TEST LOADS                                                                       | +48.9 PSF<br>-57.3 PSF   |              |                 |
|                                                                                  |                          |              |                 |
| <p><b>Amarr</b></p> <p><b>ENTREMATIC</b></p>                                     |                          |              |                 |
| <p>MODEL 1350 AMARR 2741<br/>MODEL 2700 AMARR 2742<br/>MODEL 2720 AMARR 2042</p> |                          |              |                 |
| SIZE                                                                             | DRAWN BY DRD             | DATE 4/19/18 | DRAWING NUMBER  |
| B                                                                                | CHECKED BY DLJ           | DATE 7/19/18 | IBC-1309-150-15 |
| ENTREMATIC<br>165 CARRIAGE COURT WINSTON-SALEM, N.C. 27105                       |                          |              | SHEET 2 OF 4    |



| REV | DESCRIPTION OF REVISIONS | DATE | BY |
|-----|--------------------------|------|----|
|     |                          |      |    |

MAX SIZE  
9'2 x 24'

DESIGN LOADS  
+32.6 PSF  
-38.2 PSF

TEST LOADS  
+48.9 PSF  
-57.3 PSF

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**Amarr**  
ENTREMATIc

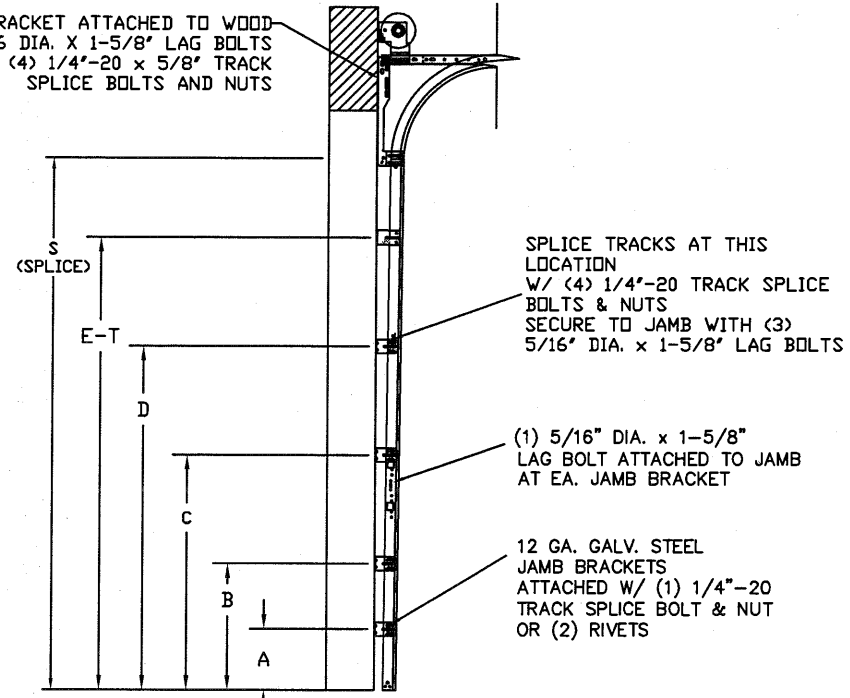
MODEL 1350 AMARR 2741  
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|      |                |              |                 |
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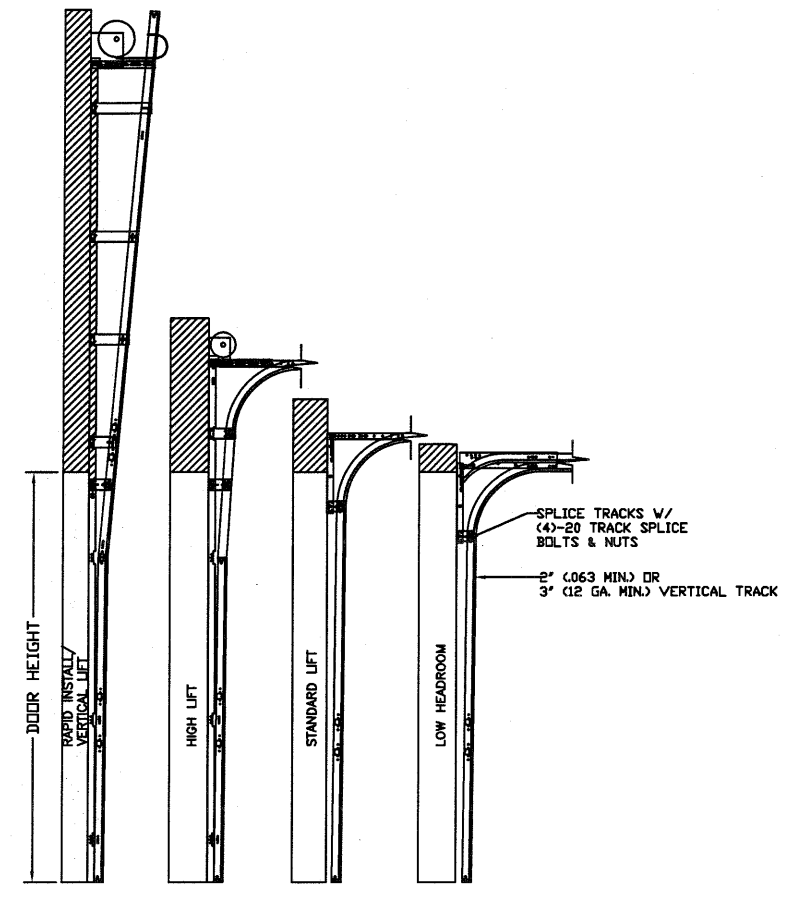
ENTREMATIc  
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SHEET 3 OF 4

14 GA. FLAG BRACKET ATTACHED TO WOOD JAMB W/ (3) 5/16 DIA. X 1-5/8" LAG BOLTS AND TO TRACK W/ (4) 1/4"-20 X 5/8" TRACK SPLICE BOLTS AND NUTS



TRACK CONFIGURATION FOR UP TO 24' TALL DOORS  
N.T.S.  
SEE TABLE 2 FOR TRACK ATTACHMENT SPACING



AVAILABLE TRACK CONFIGURATIONS  
N.T.S.

TABLE 1

| Section Width (ft) | Center Stile (in) | Max Design Loads Allowed |                |
|--------------------|-------------------|--------------------------|----------------|
|                    |                   | Positive (PSF)           | Negative (PSF) |
| 6' 0               | 36"               | 49.6                     | 58.2           |
| 6' 2               | 37"               | 48.2                     | 56.6           |
| 6' 4               | 38"               | 46.9                     | 55.1           |
| 6' 6               | 39"               | 45.7                     | 53.7           |
| 6' 8               | 40"               | 44.6                     | 52.3           |
| 6' 10              | 41"               | 43.5                     | 51.0           |
| 7' 0               | 42"               | 42.4                     | 49.8           |
| 7' 2               | 43"               | 41.4                     | 48.7           |
| 7' 4               | 44"               | 40.5                     | 47.6           |
| 7' 6               | 45"               | 39.6                     | 46.6           |
| 7' 8               | 46"               | 38.7                     | 45.5           |
| 7' 10              | 47"               | 37.9                     | 44.6           |
| 8' 0               | 48"               | 37.1                     | 43.6           |
| 8' 2               | 49"               | 36.3                     | 42.7           |
| 8' 4               | 50"               | 35.6                     | 41.9           |
| 8' 6               | 51"               | 34.9                     | 41.1           |
| 8' 8               | 52"               | 34.2                     | 40.3           |
| 8' 10              | 53"               | 33.6                     | 39.5           |
| 9' 0               | 54"               | 33.0                     | 38.8           |
| 9' 2               | 55"               | 32.6                     | 38.3           |

TABLE 2

| DOOR HEIGHT | A   | B   | C   | D   | E   | F    | G    | H    | I    | J    | K    | L    | M    | N    | O    | P    | Q    | R    | S    | T    | SPLICE S |      |
|-------------|-----|-----|-----|-----|-----|------|------|------|------|------|------|------|------|------|------|------|------|------|------|------|----------|------|
| 7'          | 10" | 34" | 58" | 70" |     |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          | 76"  |
| 8'          | 10" | 34" | 58" | 82" |     |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          | 88"  |
| 9'          | 10" | 34" | 58" | 82" | 94" |      |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          | 100" |
| 10'         | 10" | 34" | 58" | 82" | 94" | 106" |      |      |      |      |      |      |      |      |      |      |      |      |      |      |          | 112" |
| 11'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" |      |      |      |      |      |      |      |      |      |      |      |      |      |          | 124" |
| 12'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" |      |      |      |      |      |      |      |      |      |      |      |      |          | 136" |
| 13'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" |      |      |      |      |      |      |      |      |      |      |      |          | 148" |
| 14'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" |      |      |      |      |      |      |      |      |      |      |          | 160" |
| 15'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" |      |      |      |      |      |      |      |      |      |          | 172" |
| 16'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" |      |      |      |      |      |      |      |      |          | 184" |
| 17'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" |      |      |      |      |      |      |      |          | 196" |
| 18'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" |      |      |      |      |      |      |          | 208" |
| 19'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" |      |      |      |      |      |          | 220" |
| 20'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" | 226" |      |      |      |      |          | 232" |
| 21'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" | 226" | 238" |      |      |      |          | 244" |
| 22'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" | 226" | 238" | 250" |      |      |          | 256" |
| 23'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" | 226" | 238" | 250" | 262" |      |          | 268" |
| 24'         | 10" | 34" | 58" | 82" | 94" | 106" | 118" | 130" | 142" | 154" | 166" | 178" | 190" | 202" | 214" | 226" | 238" | 250" | 262" | 274" |          | 280" |

ALL TRACK ATTACHMENT SPACING +/-2' ALLOWED WITH SPF OR SYP NO. 2 OR BETTER ONLY  
AMARR MODEL 1350 ONLY AVAILABLE UP TO 14'

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|-----|--------------------------|------|----|
|     |                          |      |    |

MAX SIZE  
9'2" x 24'

DESIGN LOADS  
+32.6 PSF  
-38.2 PSF

TEST LOADS  
+48.9 PSF  
-57.3 PSF

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