



BUILDING CODE COMPLIANCE OFFICE (BCCO)
PRODUCT CONTROL DIVISION

MIAMI-DADE COUNTY, FLORIDA
METRO-DADE FLAGLER BUILDING
140 WEST FLAGLER STREET, SUITE 1603
MIAMI, FLORIDA 33130-1563
(305) 375-2901 FAX (305) 375-2908

NOTICE OF ACCEPTANCE (NOA)

Benchmark HMF
2501 Northcase Parkway, S.E.
Wilmington, NC 28405

SCOPE:

This NOA is being issued under the applicable rules and regulations governing the use of construction materials. The documentation submitted has been reviewed by Miami-Dade County Product Control Division and accepted by the Board of Rules and Appeals (BORA) to be used in Miami Dade County and other areas where allowed by the Authority Having Jurisdiction (AHJ).

This NOA shall not be valid after the expiration date stated below. The Miami-Dade County Product Control Division (In Miami Dade County) and/or the AHJ (in areas other than Miami Dade County) reserve the right to have this product or material tested for quality assurance purposes. If this product or material fails to perform in the accepted manner, the manufacturer will incur the expense of such testing and the AHJ may immediately revoke, modify, or suspend the use of such product or material within their jurisdiction. BORA reserves the right to revoke this acceptance, if it is determined by Miami-Dade County Product Control Division that this product or material fails to meet the requirements of the applicable building code.

This product is approved as described herein, and has been designed to comply with the Florida Building Code, including the High Velocity Hurricane Zone.

DESCRIPTION: 16 & 18 ga. Opaque Flush Outswing Steel Commercial Door

APPROVAL DOCUMENT: Drawing No "S-2345", titled "Outswing Double Door 6'0 X 7'2 Commercial Steel Door in A H.M.F.", sheets 1 through 12 of 12 prepared by RW Building Consultants, Inc., dated 08/12/03 with revision "2" on 07/21/04, signed and sealed by Wendell W. Haney, P. E., bearing the Miami-Dade County Product Control Approval stamp with the Notice of Acceptance number and approval date by the Miami-Dade County Product Control Division.

MISSILE IMPACT RATING: Large and Small Missile Impact

LABELING: Each unit shall bear a permanent label with the manufacturer's name or logo, city, state and following statement: "Miami-Dade County Product Control Approved", unless otherwise noted herein.

RENEWAL of this NOA shall be considered after a renewal application has been filed and there has been no change in the applicable building code negatively affecting the performance of this product.

TERMINATION of this NOA will occur after the expiration date or if there has been a revision or change in the materials, use, and/or manufacture of the product or process. Misuse of this NOA as an endorsement of any product, for sales, advertising or any other purposes shall automatically terminate this NOA. Failure to comply with any section of this NOA shall be cause for termination and removal of NOA.

ADVERTISEMENT: The NOA number preceded by the words Miami-Dade County, Florida, and followed by the expiration date may be displayed in advertising literature. If any portion of the NOA is displayed, then it shall be done in its entirety.

INSPECTION: A copy of this entire NOA shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at the request of the Building Official.

This NOA consists of this page 1 and evidence page E-1 and E-2, as well as approval document mentioned above. The submitted documentation was reviewed by **Herminio F. Gonzalez, P.E., Director, BCCO**

NOA No 03-0916.01
Expiration Date: August 26, 2009
Approval Date: August 26, 2004
Page 1

BENCHMARQUE
 Commercial Door Systems
 2601 Naphthaleen Parkway S.E. Wilmington NC, 28405, Phone: (260) 888-9811
OUTSWING FLUSH OPAQUE COMMERCIAL STEEL DOOR IN A 16ga. H.M.F.

- GENERAL NOTES**
1. THIS PRODUCT IS DESIGNED TO COMPLY WITH THE FLORIDA BUILDING CODE.
 2. PRODUCT ANCHORS SHALL BE AS LISTED AND SPACED AS SHOWN ON DETAILS. ANCHOR EMBEDMENT TO BASE MATERIAL SHALL BE BEYOND WALL DRESSING OR STUCCO.
 3. DESIGNED PRESSURE RATING SEE TABLE PAGE 1.
 4. THIS PRODUCT DOES NOT MEET THE WATER REQUIREMENTS.
 5. THIS SYSTEM MEETS WINDBORNE DEBRIS EXTERNAL REQUIREMENTS AS PRESCRIBED IN SECTIONS 1606 & 1626 "HVHZ" OF THE FLORIDA BUILDING CODE.

DESIGN PRESSURE RATING	HARDWARE TYPE	WHERE WATER INFILTRATION REQUIREMENT IS NEEDED	WHERE WATER INFILTRATION REQUIREMENT IS NOT NEEDED OR PROTECTED BY OVERHANG*
	CORBIN/RUSSWIN 260 HEAVY DUTY LOCKSET	NOT APPROVED	+ 80.0 PSF - 80.0 PSF
	CORBIN/RUSSWIN DL2000 SERIES CYLN. DEAD LOCK	NOT APPROVED	+ 80.0 PSF - 80.0 PSF
	CORBIN/RUSSWIN CL2000 SERIES MORRISE W/LEVER	NOT APPROVED	+ 80.0 PSF - 80.0 PSF
	DORMA 9300 SERIES RIM DEVICE W/PUSH BAR	NOT APPROVED	+ 80.0 PSF - 80.0 PSF
	DORMA 9400 SERIES VERTICAL RODS W/PUSH BAR	NOT APPROVED	+ 80.0 PSF - 80.0 PSF

* UNIT SHALL BE INSTALLED AT LOCATION PROTECTED BY OVERHANG SUCH THAT OVERHANG RATIO (OH) = OH LENGTH/OH HEIGHT GREATER THAN 1.

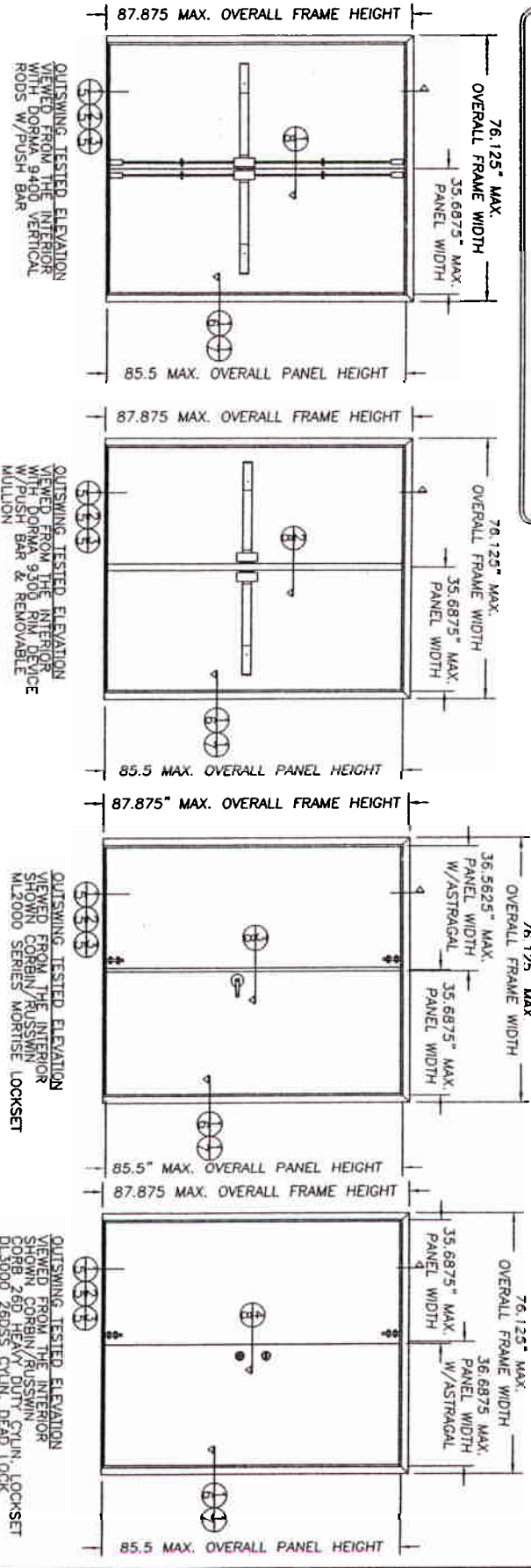


TABLE OF CONTENTS

SHT #	DESCRIPTION	SHT #	DESCRIPTION
1	GENERAL NOTES AND TYPICAL ELEVATION	7	HORIZONTAL CROSS SECTIONS
2	FRAME CONSTRUCTION & BILL OF MATERIALS	8	HORIZONTAL CROSS SECTIONS
3	DOOR PANEL CONSTRUCTION NC & VA 1899 DOOR SLABS	9	ANCHORING LOCATIONS
4	DOOR PANEL CONSTRUCTION NC 1699 DOOR SLAB	10	ANCHORING LOCATIONS
5	VERTICAL CROSS SECTIONS	11	UNIT COMPONENTS
6	HORIZONTAL CROSS SECTIONS	12	UNIT COMPONENTS

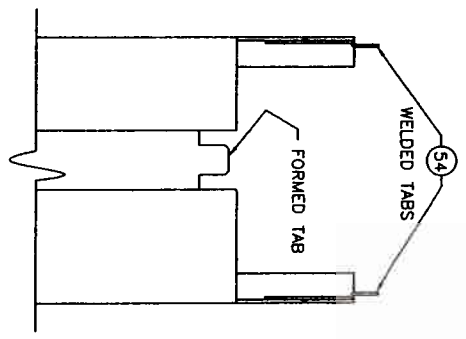
DATE	BY	REVISIONS
7/21/04	EW	REV. ANCHORS, SHT 9, PER DADE
10/7/03	TJH	PER DADE LETTER

DATE: 8/12/03
 SCALE: N.T.S.
 DWG. BY: HOF
 CHK. BY: TJH
 DRAWING NO.: S-2345
 SHEET: 1 OF 12

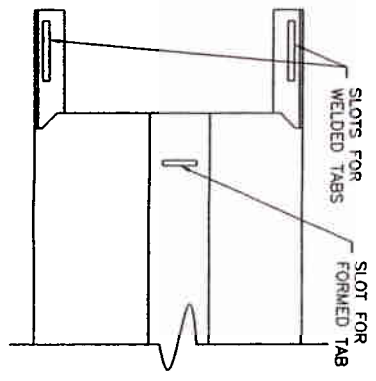
PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F.
 PART OR ASSEMBLY: GENERAL NOTES & TYPICAL ELEVATIONS

Product Approval Documents Prepared By:
RW BUILDING CONSULTANTS, INC.
 P.O. Box 230 Volrico FL 33595
 Phone No: 813.659.9107
 Florida Board of Professional Engineers
 Certificate of Registration No. 9813
 7/22/04
 Wendell W. Honey, P.E. No. 54148

Item	DESCRIPTION	Material
1	18ga. (0.043" MIN.) VA DOOR SLAB	STEEL
2	18ga. (0.043" MIN.) NC DOOR SLAB	STEEL
3	16ga. (0.053" MIN.) STRENGTH NC DOOR SLAB	STEEL
4	1/2" HAZARD TAGS (0.053" MIN.) C.S.S.	STEEL
5	1/2" HAZARD TAGS (0.053" MIN.) C.S.S.	STEEL
6	PUNCH THRESHOLD NATIONAL GUARD PROD. .125" ALUM. WALL	ALUM.
7	THRESHOLD WEATHERSTRIP (EXTRUDED VINYL)	VINYL
8	ADA PASS OVER THRESHOLD #4155 BY HAGER 140" ALUM. WALL	ALUM.
9	DORMA #1300 PER MULLION 21" x 3" x .116" THK. STEEL	STEEL
10	4 1/2" FLAT-HEAD HINGE BY HAGER 130" THK. STEEL	STEEL
11	CONTINUOUS STEEL HINGE 3.282" WIDE BOTTOM HINGE BY HAGER	STEEL
12	SURFACE MOUNTED FRAME WEATHERSTRIP (NATIONAL GUARD PROD. #1300A)	-
13	SURFACE MOUNTED FRAME WEATHERSTRIP (NATIONAL GUARD PROD. #1300A)	-
14	SURFACE MOUNTED DOOR BOTTOM SWEET (NATIONAL GUARD PROD. #1300A)	-
15	SURFACE MOUNTED DOOR WEATHER STRIP SEAL (NATIONAL GUARD PROD. #1325M)	-
16	SURFACE MOUNTED DOOR BOTTOM SWEET (FRAMO #321019)	-
17	ASTORIA FINE WEATHERSTRIP ASSEMBLY BY H-D BUILDING PRODUCTS	CELLULAR RUBBER
18	ASTORIA FINE WEATHERSTRIP #2024 BY H-D BUILDING PRODUCTS	FOAM
19	2PART STEEL DOOR HINGE REEL 16ga./7ga. BY BENCHMANNING	STEEL
20	7ga. (0.171" MIN.) H.A.S. FRAME HINGE REEL BY BENCHMANNING	STEEL
21	2PART WOODS LOCK BOX STEEL BY BENCHMANNING #L-8-SI-P-1184	STEEL
22	2PART 161 LOCK REEL STEEL BY BENCHMANNING	STEEL
23	DORMA HAZARD TAGS 16ga. HORIZONTAL ROSS W/PLST BAR	-
24	DORMA HAZARD TAGS 16ga. HORIZONTAL ROSS W/PLST BAR	-
25	DORMA/HASSMAN 0288 OR 4251 ORG. 280 HEAVY DUTY COLUMBIAN LOCKSET	-
26	DORMA/HASSMAN 0288 OR 4251 ORG. 280 HEAVY DUTY COLUMBIAN LOCKSET	-
27	CONCRETE ANCHORS 5/8" DIA. X 5" LONG CONCRETE ANCHORS	-
28	CONCRETE ANCHORS 5/8" DIA. X 5" LONG CONCRETE ANCHORS	-
29	1/4" DIA. TOP & BOTTOM CHANNEL BY BENCHMANNING	STEEL
30	FOAM STOPPER BY BENCHMANNING	FOAM
31	CONCRETE 2-ASTORIA LOCK LAM STEEL BY BENCHMANNING	STEEL
32	CONCRETE 2-ASTORIA LOCK LAM STEEL BY BENCHMANNING	STEEL
33	1/2" x 1/2" PHN SELF TAPPING SHEET METAL SCREW (WEATHERSTRIP TO FRAME)	STEEL
34	1/2" x 1/2" PHN SELF TAPPING SHEET METAL SCREW (SHEET TO DOOR)	STEEL
35	3/8" x 1/4" HINGING BY REDHEAD (MULLION ANCHOR REDHEAD TO FRAME & SI)	STEEL
36	1/2" x 1/2" x 3/8" LC MACHINE SCREW (FOR DEVICE STRIKE TO MULLION)	STEEL
37	1/2" x 1/2" x 3/8" LC MACHINE SCREW (FOR FRAME & DOOR)	STEEL
38	1/2" x 1/2" PHN WOOD SCREW (SURFACE BOLT STRIKE TO BACK AT SILL)	STEEL
39	3/8" x 1 1/2" PHN SCREW W/ 3/8" HEX BOLT (SURFACE BOLT ATTACHMENT)	STEEL
40	WASHER THE ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
41	WASHER THE ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
42	EM WELDED ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
43	EM WELDED ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
44	WOOD/META STUD ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
45	WOOD/META STUD ANCHOR 0.053" MIN. STEEL BY BENCHMANNING	STEEL
46	3/8" x 5" HINGING BY REDHEAD (USED W/EM WELDED & EM BUTTERFLY ANCHORS)	STEEL
47	CONCRETE FASTENERS (CS) FLOW CORE (USED IN THE NC 18ga. DOOR)	FOAM
48	CONCRETE FASTENERS (CS) FLOW CORE (USED IN THE VA 18ga. DOOR)	FOAM
49	OVERLAP INSULATION CORE (USED IN THE NC 18ga. DOOR)	F-GLOSS
50	STEEL STIFFENERS 27ga. FORMED STEEL (USED IN THE NC 18ga. DOOR)	STEEL
51	3/16" x 3/4" ELO TAPCON ANCHOR	STEEL
52	64 x 20 COMMON BRUSH NAIL	STEEL
53	3/8" x 50" SCOTTED FLAT HEAD LAG SCREW	STEEL
54	WELDED FRAME TAB BY BENCHMANNING	STEEL
55	1/2" x 1/2" PHN HEAD SELF DRILL & TAPPING SCREW	STEEL
56	1/4"-20 X3" BOLT	STEEL



DETAIL A
JAMB DETAIL W/
FORMED & WELDED
TABS



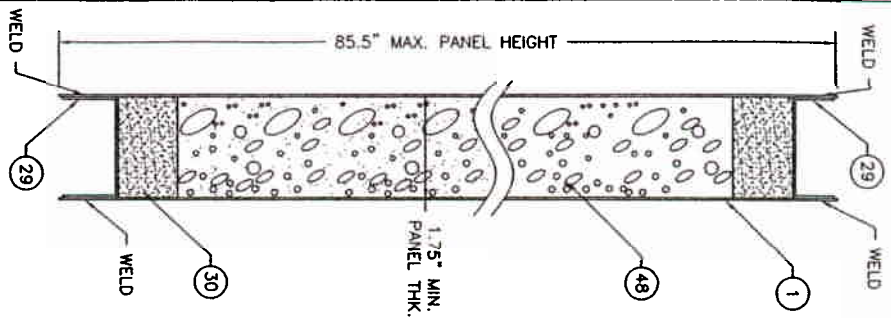
DETAIL B
HEADER DETAIL W/
PUNCHED
SLOTS FOR JAMB TABS

FRAME CONSTRUCTION NOTE:

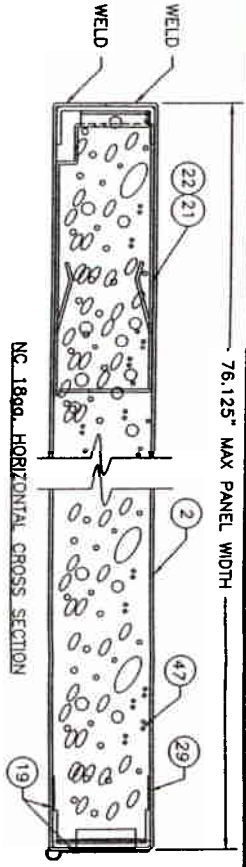
- K.O.D. AND WELDED FRAME - THE HEADER, ITEM #4 AND THE SIDE JAMBS, ITEM #5 ARE A ONE-PIECE BRAKE PRESS FORMED STEEL FRAME FROM 16GA. (0.053" MIN.) COLD ROLLED STEEL. THE CORNERS OF BOTH THE HEADER AND SIDE JAMBS ARE MITERED AND BUTTED. THE HEADER HAS SLOTS PUNCHED IN BOTH RETURN LEGS (SEE DETAIL B SHEET 2) FOR THE 18GA. (0.048" MIN.) FRAME TABS, ITEM #54. THAT ARE WELDED TO SIDE JAMBS. THE TABS ARE BENT 90° OVER THE HEADER AFTER BEING SLIPPED THROUGH THE SLOTS TO CREATE A MECHANICAL JOINT. THE HEADER ALSO HAS A PUNCHED SLOT IN THE HAT SECTION, SEE DETAIL B SHEET 2. THE SIDE JAMBS HAVE ONE FORMED TAB IN THE HAT SECTION, SEE DETAIL A SHEET 2. THE FORMED TABS ON THE SIDE JAMBS ARE SLID INTO THE PUNCHED SLOTS IN THE HEADER AND BENT OVER 90° TO CREATE A MECHANICAL LOCK. WELDED FRAME ONLY AT THE HEADER AND SIDE JAMBS ARE ASSEMBLED THEY ARE SEAM WELDED ON THE FRAME FACE AND CONTINUOUS WELDED ON THE INTERIOR SURFACES.

- EACH HINGE LOCATION ON BOTH THE WELDED FRAME AND THE K.O.D. FRAME HAVE A 7ga. (0.179") HOT ROLLED STEEL HINGE REINFORCEMENT, ITEM #20, WELDED TO THE FRAME. EACH SIDE JAMB HAS A 16ga. (0.053") STEEL L-SHAPED FLOOR ANCHOR PLATE WELDED TO THE INSIDE BOTTOM OF THE FRAME. THE SYSTEM CAN BE FITTED WITH AN EXTRUDED ALUMINUM OUT-SWING ADA BUMP FACE THRESHOLD MANUFACTURED BY NATIONAL GUARD PRODUCTS #898N, ITEM #6, OR AN EXTRUDED ALUMINUM ADA PASS OVER THRESHOLD #4155 BY HAGER, ITEM #8. THE FRAME SYSTEM CAN UTILIZE A SOLID STEEL REMOVABLE MULLION BY DORMA #F1300, ITEM #9. COLD ROLLED STEEL. THE MULLION IS HELD INTO THE FRAME WITH A SOLID STEEL TOP AND BOTTOM MULLION FITTING. THE FITTING AT THE TOP IS SECURED TO THE FRAME HEADER WITH (4) 3/8" x 5.0" LONG FASTNAL CONCRETE ANCHORS BY REDHEAD, ITEM #46. THE FITTING AT THE BOTTOM IS SECURED TO THE CONCRETE FLOOR WITH (2) 3/8" x 5.0" LONG FASTNAL CONCRETE ANCHORS BY REDHEAD, ITEM #46.

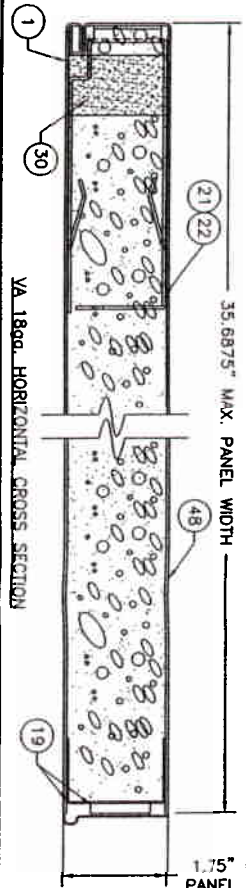
Product Approval Documents Prepared By: RW BUILDING CONSULTANTS, INC. P.O. Box 230 Volrico FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9813 <i>Wendell W. Hanley</i> 7/24/04 Wendell W. Hanley, P.E. No. 54140	
PRODUCT: OUTSWING DOUBL 6'0" x 7'2" COMMERCIAL STEEL DOOR IN A H.M.F.	PART OR ASSEMBLY: FRAME CONSTRUCTION
DATE: 8/12/03 SCALE: N.T.S. DWG. BY: ROF CHK. BY: TJH DRAWING NO.: S-2345 SHEET: 2 of 12	REVISIONS 2 7/21/04 REV. ANCHORS, SHT 9, PER DADE EW 1 10/7/03 PER DADE LETTER TJH NO. DATE BY



VA 18ga. VERTICAL CROSS SECTION



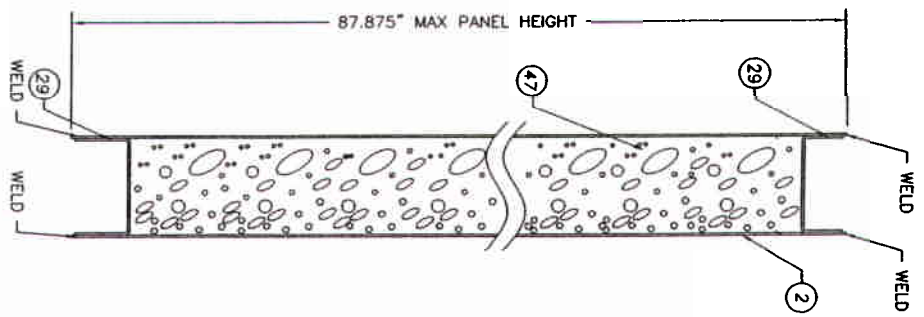
NC 18ga. HORIZONTAL CROSS SECTION



VA 18ga. HORIZONTAL CROSS SECTION

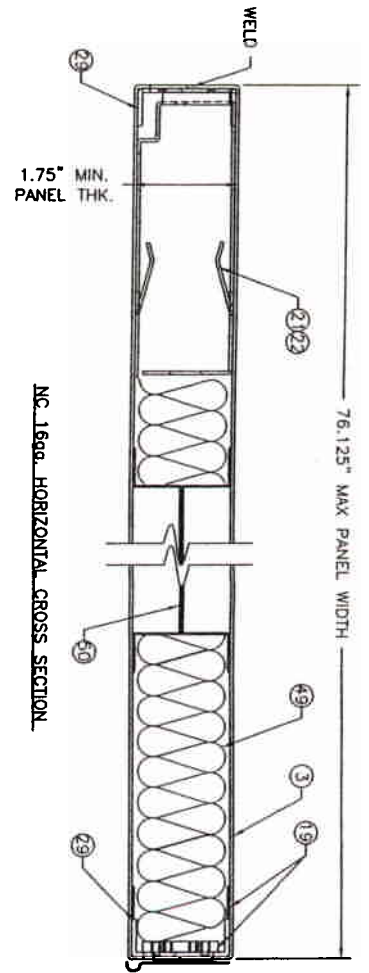
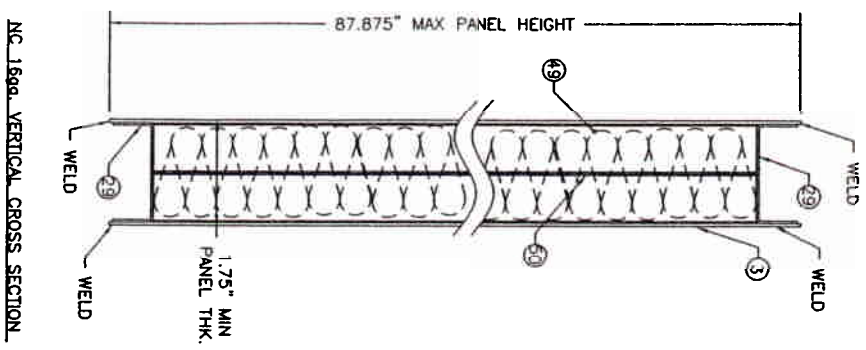
DOOR PANEL CONSTRUCTION
 - THE NC 18ga. PANELS ARE CONSTRUCTED FROM (2) 18ga. (0.048" MIN.) COLD ROLLED STEEL FACE SHEETS. ITEM #2. THE VERTICAL EDGES OF THE FACE SHEETS ARE BENT 90° X 0.860" IN TOWARD THE CENTER. THE HORIZONTAL EDGES ARE CUT UP STRAIGHT. THE OUTSIDE PERIMETER OF THE PANEL, ON THE INTERIOR, IS REINFORCED WITH A 14ga. (0.074" MIN.) STEEL "U" CHANNEL, ITEM #29. THE "U" CHANNEL IS PLACED IN THE PANEL ON THE SIDES WITH THE OPEN END FACING INWARD AGAINST THE 90° X 0.860" BEND IN THE FACE SHEETS. EACH FACE SHEET IS SPOT WELDED TO THE "U" CHANNEL 0.430" IN FROM THE EDGE AND 2.0" UP FROM THE BOTTOM AND 4.0" MAXIMUM ON CENTER. THE TOP & BOTTOM "U" CHANNELS ARE PLACED IN THE PANEL WITH THE OPEN EDGE FACING OUTWARD. THE "U" CHANNEL IS 0.125" BELOW THE HORIZONTAL EDGES OF THE PANEL AND IS SPOT/PROJECTION WELDED IN (5) PLACES ON EACH SIDE OF THE PANEL. THE INTERIOR CAVITY OF EACH PANEL IS FILLED WITH EXPANDED POLYSTYRENE, (EPS) 1.0lbs DENSITY, ITEM #47. THERE ARE THREE HINGE REINFORCEMENTS, ITEM #19, WELDED TO THE FACE SHEETS BEFORE BOTH FACE SHEETS ARE ASSEMBLED. THE REINFORCEMENT IS CONSTRUCTED FROM A 7ga. (0.179") HOT ROLLED STEEL MEASURING 1.25" X 8.5". THE REINFORCEMENTS ARE LOCATED AT 7.125", 39.375" AND 71.625" FROM THE TOP OF THE DOOR TO THE CENTER OF THE REINFORCEMENTS.

DOOR PANEL CONSTRUCTION
 - THE VA 18ga. PANELS ARE CONSTRUCTED FROM (2) 18ga. (0.048" MIN.) COLD ROLLED STEEL FACE SHEETS. ITEM #1. THE VERTICAL EDGES OF BOTH FACE SHEETS HAVE ROLL FORMED EDGES AND ARE PLACED TOGETHER AT PANEL CONSTRUCTION TO FORM A MECHANICAL INTER-LOCK. THE HORIZONTAL EDGES ARE CUT STRAIGHT AND ARE CLOSED WITH A 14ga. (0.074") STEEL TOP & BOTTOM "U" CHANNEL CLOSER, ITEM #29. THE "U" CHANNEL IS 0.125" BELOW THE HORIZONTAL EDGES OF THE PANEL AND SPOT/PROJECTION WELDED IN (9) PLACES ON EACH SIDE OF THE PANEL. EACH HORIZONTAL CORNER OF THE PANEL HAS A 1.6875" WIDE X 1.0" DEEP X 10.0" LONG FOAM STOPPER, ITEM #29, ATTACHED TO THE "U" CHANNEL USING HOT MELT GLUE. THE INTERIOR CAVITY OF EACH DOOR IS FILLED WITH POLYURETHANE 2.0lbs DENSITY, ITEM #48. EACH PANEL HAS THREE 2 PART STEEL HINGE REINFORCEMENTS, ITEM #19, WELDED TO ONE OF THE FACE SHEETS BEFORE BOTH FACE SHEETS ARE ASSEMBLED. THE 2 PART REINFORCEMENT IS CONSTRUCTED FROM A 7ga. (0.179" MIN.) HOT ROLLED REINFORCEMENT AND A 18ga. (0.054" MIN.) COLD ROLLED STEEL "U" REINFORCEMENT. THE 18ga. "U" IS PLACED TO THE BACK SIDE OF THE 7ga. REINFORCEMENT AND SPOT WELDED IN TWO PLACES. THE ASSEMBLED REINFORCEMENTS ARE LOCATED AT 7.125", 39.375" AND 71.625" FROM THE TOP OF THE DOOR TO THE CENTER OF THE REINFORCEMENTS.



NC 18ga. VERTICAL CROSS SECTION

SHEET 3 OF 12 DRAWING NO.: S-2345 CHK. BY: T/JH DATE: 8/12/03 SCALE: N.T.S. DESK. BY: ROF DATE: 10/7/03	2 7/21/04 REV. ANCHORS, SHT 9, PER DADE EW 1 10/7/03 PER DADE LETTER T/JH NO DATE BY	REVISIONS	PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F. PART OR ASSEMBLY: DOOR PANEL CONSTRUCTION NC & VA 18ga. DOOR SLAB	Product Approval Documents Prepared By: BUILDING CONSULTANTS, INC. P.O. Box 230 Valrico FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate Of Authorization No. 9813 Wendell W. Maney, P.E. No. 54148 7/22/04
---	--	-----------	---	--



DOOR PANEL CONSTRUCTION

- THE NC 169a STEEL STIFFEND PANELS, ARE CONSTRUCTED FROM (2) 16ga. (0.053" MIN.) COLD ROLLED STEEL FACE SHEETS ITEM #3. THE VERTICAL EDGES OF THE FACE SHEETS ARE BENT 90° X 0.860" IN TOWARD THE CENTER. THE HORIZONTAL EDGES ARE CUT STRAIGHT. THE OUTSIDE PERIMETER OF THE PANEL, ON THE INTERIOR, IS REINFORCED WITH A 14ga. (0.074" MIN.) STEEL "U" CHANNEL ITEM #29. THE "U" CHANNEL IS PLACED IN THE PANEL ON THE SIDES WITH THE OPEN END FACING INWARD AGAINST THE 90° X 0.860" BEND IN THE FACE SHEETS. EACH FACE SHEET IS SPOT WELDED TO THE "U" CHANNEL 0.430" IN FROM THE EDGE AND 2.0" UP FROM THE BOTTOM AND 4.0" MAXIMUM OF CENTER. THE TOP & BOTTOM "U" CHANNELS ARE PLACED IN THE PANEL WITH THE OPEN EDGE FACING OUTWARD. THE "U" CHANNEL IS 0.125" BELOW THE HORIZONTAL EDGES OF THE PANEL AND IS SPOT/PROJECTION WELDED IN (5) PLACES ON EACH SIDE OF THE PANEL. THE PANEL IS REINFORCED ON THE INTERIOR WITH (3) 22ga. (0.025" MIN.) STEEL STIFFENERS, ITEM #50, RUNNING VERTICAL FROM TOP TO BOTTOM. THE TWO OUTBOARD STIFFENERS ARE LOCATED 6.5" MAXIMUM IN FROM THE EDGE OF THE PANEL. THE MIDDLE STIFFENER IS LOCATED IN THE CENTER OF THE PANEL. THE THREE STIFFENERS CAN ONLY BE A MAXIMUM 6.0" APART. THE STIFFENERS ARE WELDED AT EACH SIDE OF THE STIFFENER UP 3.0" FROM THE BOTTOM AND A MAXIMUM OF 6.0" ON CENTER. THE SPACES BETWEEN THE THREE STIFFENERS AND THE EDGES OF THE PANEL ARE FILLED WITH FIBERGLASS INSULATION, ITEM #49. EACH PANEL HAS THREE STEEL HINGE REINFORCEMENTS, ITEM #19, WELDED TO ONE OF THE FACE SHEETS BEFORE BOTH FACE SHEETS ARE ASSEMBLED. THE REINFORCEMENT IS CONSTRUCTED FROM A 7ga. (0.171" MIN.) HOT ROLLED STEEL. THE REINFORCEMENTS ARE LOCATED 7.125", 39.375" AND 71.625" FROM THE TOP OF THE DOOR TO THE CENTER OF THE REINFORCEMENTS.

NC 169a VERTICAL CROSS SECTION

NC 169a HORIZONTAL CROSS SECTION

DATE	8/12/03
SCALE	N.T.S.
DRG. BR.	ROF
CHK. BR.	TJH
DRAWING NO.	S-2345
SHEET	4 OF 12

NO.	DATE	REVISIONS	BY
2	7/21/04	REV. ANCHORS, SHT 9, PER DADE	EW
1	10/7/03	PER DADE LETTER	TJH

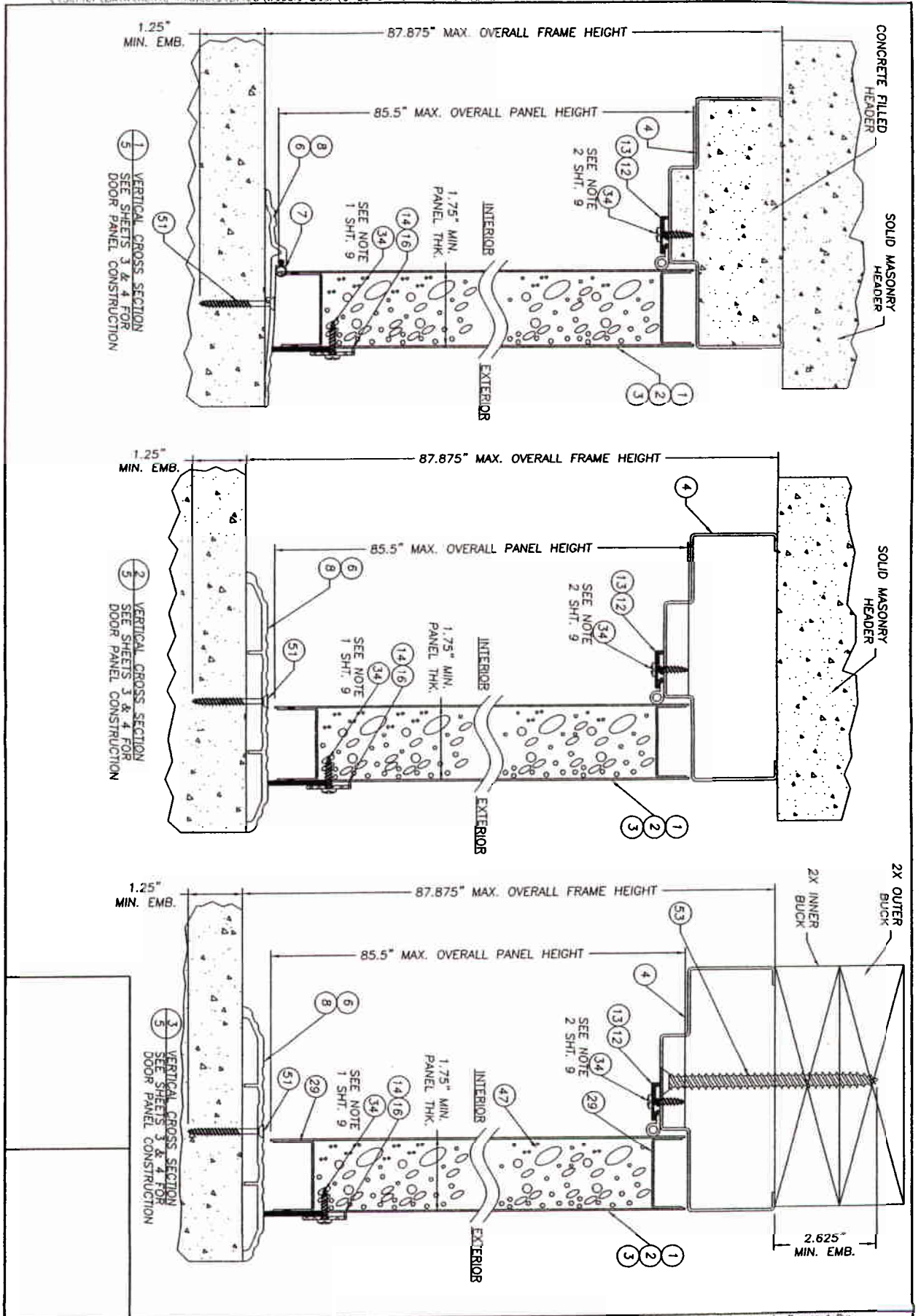
PRODUCT:	OUTSWING DOUBL 6'0" x 7'2" COMMERCIAL STEEL DOOR IN A H.M.F.
PART OR ASSEMBLY:	DOOR PANEL CONSTRUCTION NC 169a DOOR SLAB

Product Approval Documents Prepared By:

RW BUILDING CONSULTANTS, INC.
 P.O. Box 230 Valrico FL 33595
 Phone No.: 813.659.9197

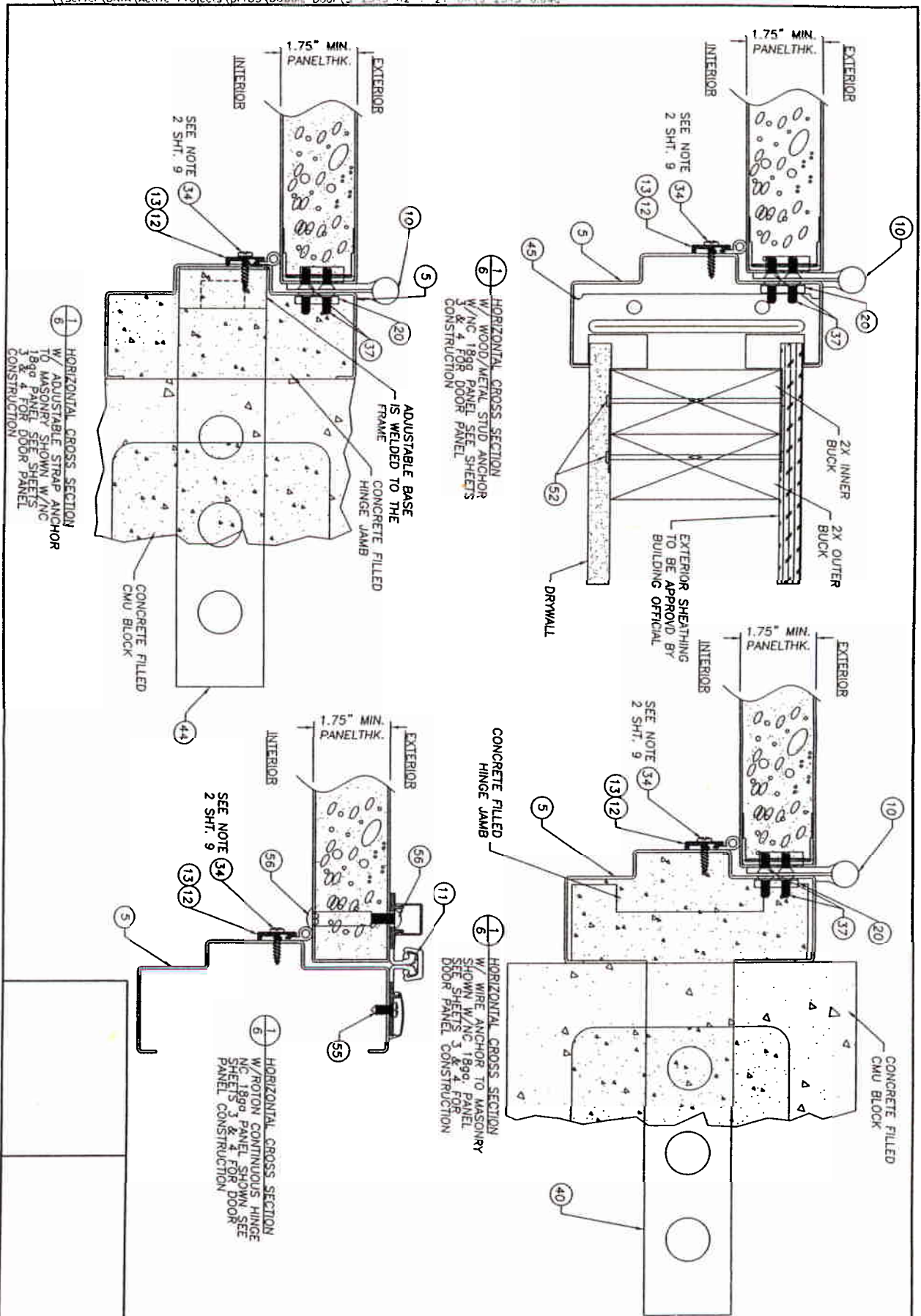
Florida Board of Professional Engineers
 Certificate of Authorization No. 9013

Wendell W. Haney 7/22/04
 Wendell W. Haney, P.E. No. 54148

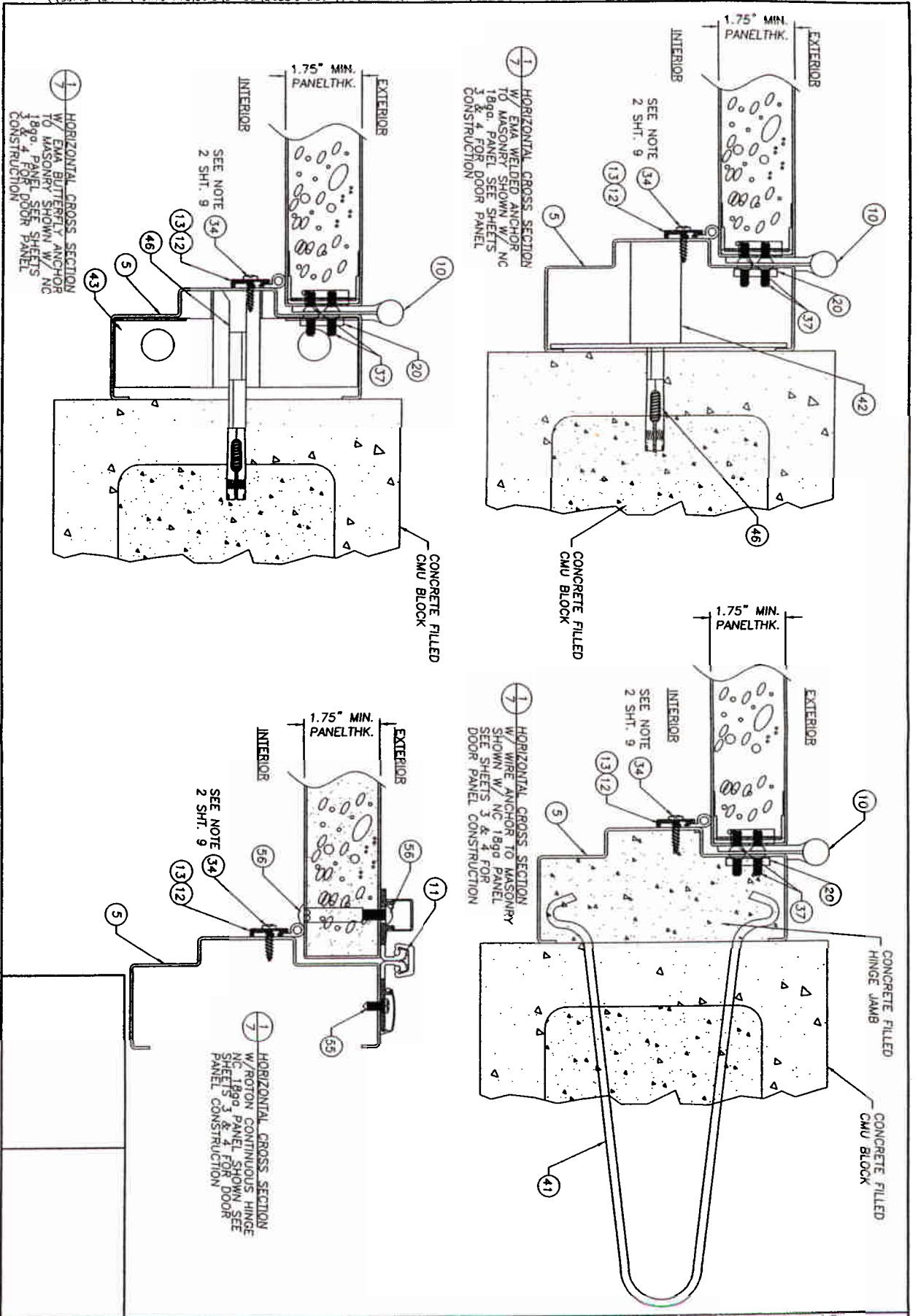


DATE: 8/12/03 SCALE: N.T.S. DWG. BY: ROF CHK. BY: TJH DRAWING NO.: S-2345	PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F.		Product Approval Documents Prepared By: RW BUILDING CONSULTANTS, INC. P.O. Box 230 Valrico FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9813 <i>Wendell W. Honey</i> 7/22/04 Wendell W. Honey, P.E. No. 54148
	PART OR ASSEMBLY: VERTICAL CROSS SECTIONS		
NO. DATE 2 7/21/04 1 10/7/03	REV. ANCHORS, SHI 9, PER DADE PER DADE LETTER	EW TJH BY	REVISIONS

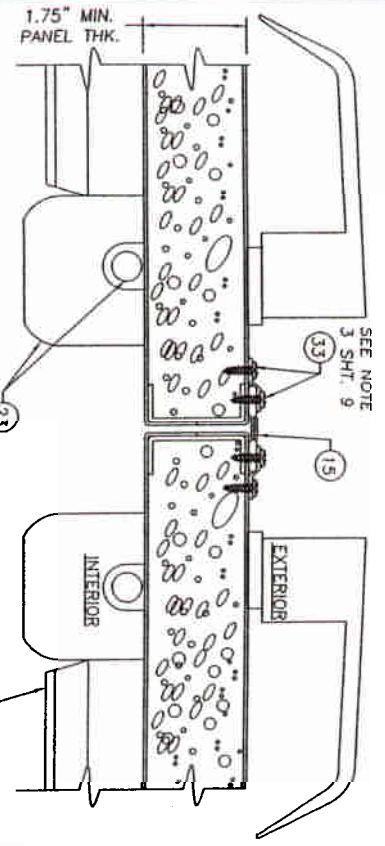
SHEET 5 OF 12



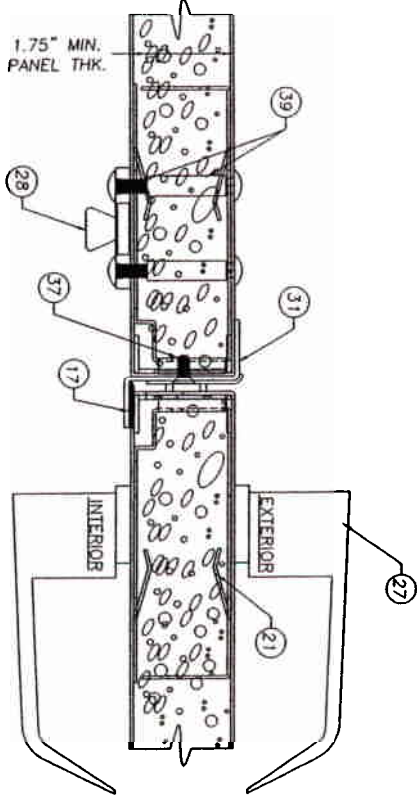
DATE: 8/12/03 SCALE: N.T.S. DWG. BY: ROF CHK. BY: TJH DRAWING NO.: S-2345 PART: 6 of 12		PRODUCT: OUTSWING DOUBL 6'0" x 7'2" COMMERCIAL STEEL DOOR IN A H.M.F.	Product Approval Documents Prepared By: RW BUILDING CONSULTANTS, INC. P.O. Box 230 Veroica FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate Of Authorization No. 9813 <i>Wendell W. Money</i> 7/22/04 Wendell W. Money, P.E. No. 54148
REVISIONS NO. DATE 2 7/21/04 REV. ANCHORS, SHY 9, PER DADE EW 1 10/7/03 PER DADE LETTER TJH NO. DATE		PART OR ASSEMBLY: HORIZONTAL CROSS SECTIONS	



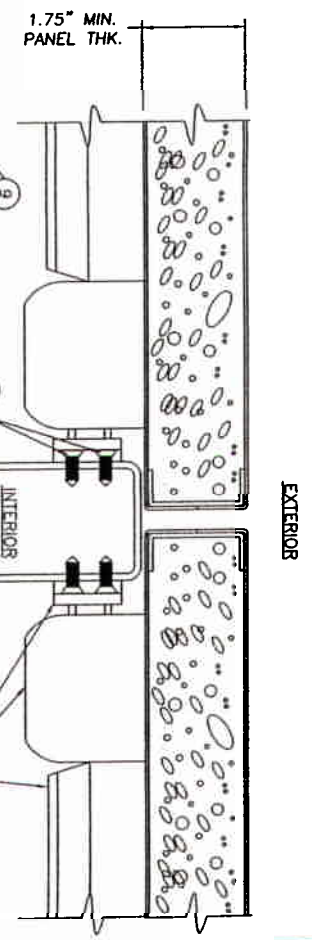
DATE: 8/12/03		SCALE: N.T.S.		DWG. BY: ROF		CHK. BY: TJH		DRAWING NO.: 5-2345		SHEET 7 OF 12	
2 7/21/04		REV. ANCHORS, SHT 9, PER DADE		EW						PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F.	
1 10/7/03		PER DADE LETTER		TJH						PART OR ASSEMBLY: HORIZONTAL CROSS SECTIONS	
NO.		DATE		BY						Product Approval Documents Prepared By: BUILDING CONSULTANTS, INC. P.O. Box 230 Valrico FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9813 <i>Wendell W. Honey</i> 7/22/04 Wendell W. Honey, P.E. No. 54148	



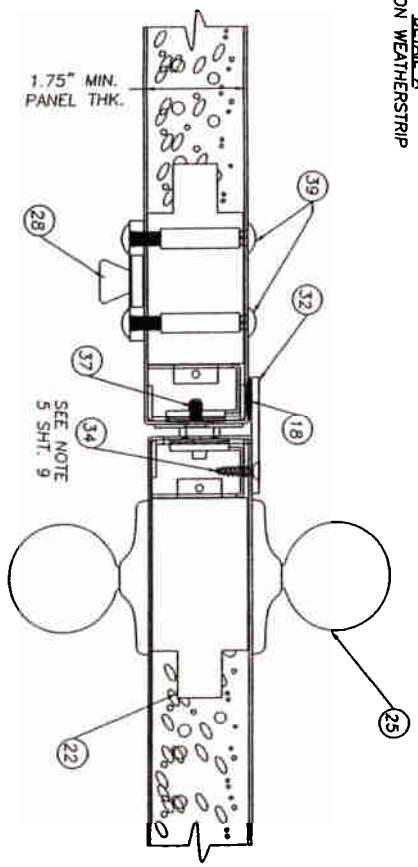
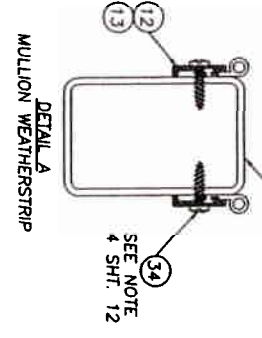
1 HORIZONTAL CROSS SECTION
W/ DORMA 9400 VERTICAL
RODS W/PUSH BAR SHOWN
W/NC 1890. PANEL SEE
SHEETS 3 & 4 FOR DOOR
PANEL CONSTRUCTION



3 HORIZONTAL CROSS SECTION
W/ CORBIN/RUSSWIN ML2000
SERIES MORTISE LOCKSET
SHOWN W/NC 1890. PANEL
SEE SHEETS 3 & 4 FOR
DOOR PANEL CONSTRUCTION

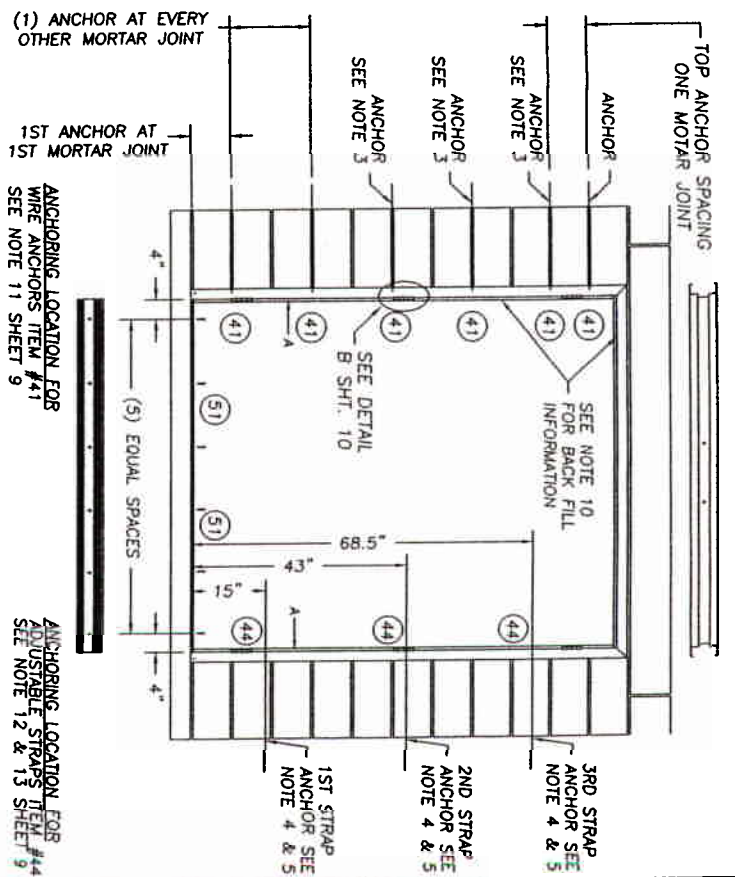
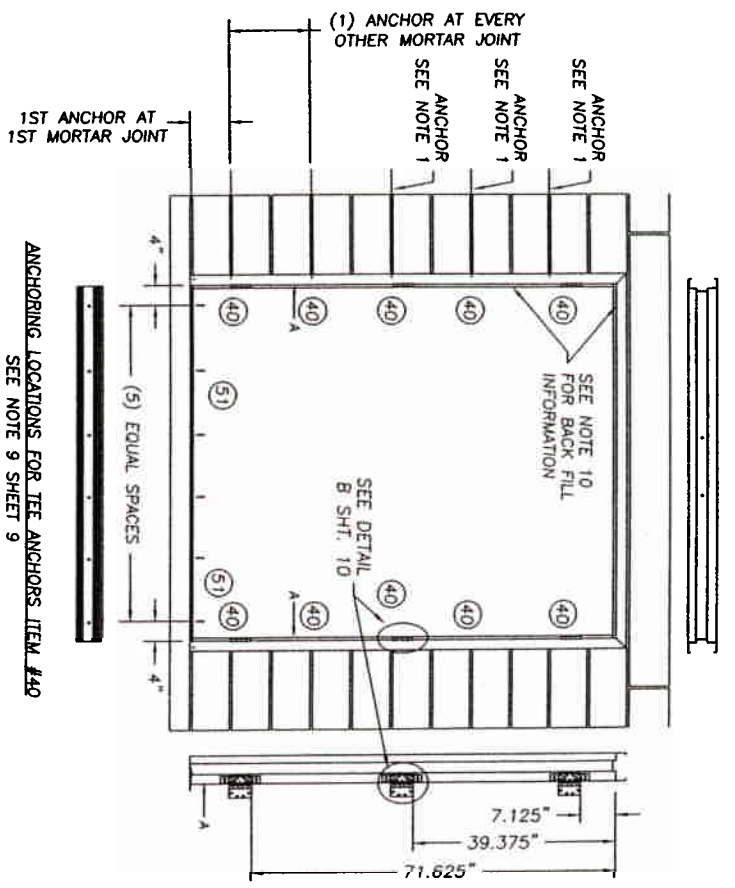


2 HORIZONTAL CROSS SECTION
W/ DORMA 9300 RIM DEVICE
W/PUSH BAR SHOWN W/NC
1890. PANEL SEE SHEETS
3 & 4 FOR DOOR PANEL
CONSTRUCTION



4 HORIZONTAL CROSS SECTION
W/ CORBIN/RUSSWIN CORR 26D
HEAVY DUTY CYLIN. LOCKSET
SHOWN W/NC 1890. DEAD LOCK
SEE SHEETS 3 & 4 FOR DOOR
PANEL CONSTRUCTION

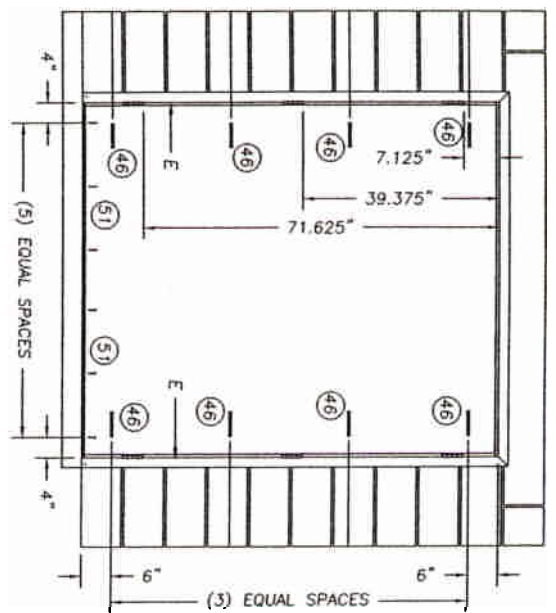
SHEET 8 OF 12 DRAWING NO.: S-2345 CHK. BY: TJH DWG. BY: ROF SCALE: N.T.S. DATE: 8/12/03		PRODUCT: OUTSWING DOUBL 6'0" x 7'2" COMMERCIAL STEEL DOOR IN A H.M.F.		Product Approval Documents Prepared By: RW BUILDING CONSULTANTS, INC. P.O. Box 230 Vero Beach FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9813 Wendell W. Haney, P.E. No. 54148	
REVISIONS NO. DATE 2 7/21/04 REV. ANCHORS, SHT. 9, PER DADE 1 11/07/03 PER DADE LETTER		PART OR ASSEMBLY: HORIZONTAL CROSS SECTIONS		BY: TJH EW	



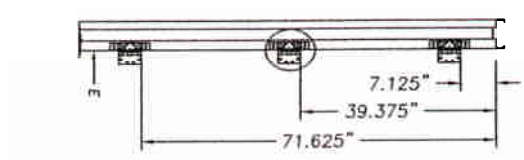
- NOTES:
- SPACING FOR ITEM #34 THE #10 x 3/4" SMS, ATTACHING THE DOOR BOTTOM SWEEPS TO THE DOORS IS AS FOLLOWS: 2.125" FROM BOTH ENDS AND A MAXIMUM OF 8.0" O.C.
 - SPACING FOR ITEM #34 THE #10 x 3/4" SMS, ATTACHING THE FRAME WEATHERSTRIP TO THE FRAME IS AS FOLLOWS: 3.0" FROM BOTH ENDS AND A MAXIMUM OF 8.0" O.C.
 - SPACING FOR ITEM #33 THE #8 x 1/2" SMS, ATTACHING THE DOOR FACE SEAL TO THE DOOR PANELS IS AS FOLLOWS: 3.6" FROM BOTH ENDS AND A MAXIMUM OF 8.0" O.C.
 - SPACING FOR ITEM #34 THE #10 x 3/4" SMS, ATTACHING THE WEATHERSTRIP TO THE MULLION IS AS FOLLOWS: 2.125" FROM BOTH ENDS AND A MAXIMUM OF 8.0" O.C.
 - SPACING FOR ITEM #34 THE #10 x 3/4" SMS, ATTACHING THE FLAT ASTRAGAL, ITEM #32 TO THE INACTIVE PANEL IS AS FOLLOWS: 2.0" FROM THE TOP DOWN WITH (7) MORE EQUALLY SPACED ALONG THE ASTRAGAL.
 - ALL ANCHORS ARE TO BE THE BENCHMARKHMF BUTTERFLY ANCHOR, ITEM #43.
 - ALL ANCHORS ARE SECURED THROUGH THE FRAME AND INTO THE BLOCK WITH 3/8" X 5" FASTNAIL BY REDHEAD.
 - ALL ANCHORS IN THE SIDE JAMBS ARE TO BE THE BENCHMARKHMF WOOD/METAL STUD ANCHOR, ITEM #45. EACH ANCHOR IS ATTACHED TO THE WOOD BUCK WITH (4) 6d COMMON BRIGHT NAILS, ITEM #52.

- NOTES:
- ALL ANCHORS ARE TO BE THE BENCHMARKHMF TEE ANCHOR, ITEM #40 SUPPLIED BY BENCHMARKHMF.
 - ALL BLOCK AND H.M.F. JAMBS AND HEADER ARE TO BE BACK FILLED WITH CONCRETE AS THE OPENING IS BUILT.
 - ALL ANCHORS ARE TO BE THE BENCHMARKHMF WIRE ANCHORS, ITEM #41 SUPPLIED BY BENCHMARKHMF.
 - THE STRAP ANCHOR BASE IS WELDED INTO THE FRAME AT THE LOCATIONS ABOVE. ADJUST THE STRAP TO FALL INTO A MORTAR JOINT AT INSTALLATION.
 - ALL ANCHORS ARE TO BE THE BENCHMARKHMF ADJUSTABLE STRAP ANCHOR, ITEM #44 SUPPLIED BY BENCHMARKHMF.
 - ALL ANCHORS ARE TO BE THE BENCHMARKHMF WELDED EMA ANCHORS, ITEM #42 SUPPLIED BY BENCHMARKHMF.

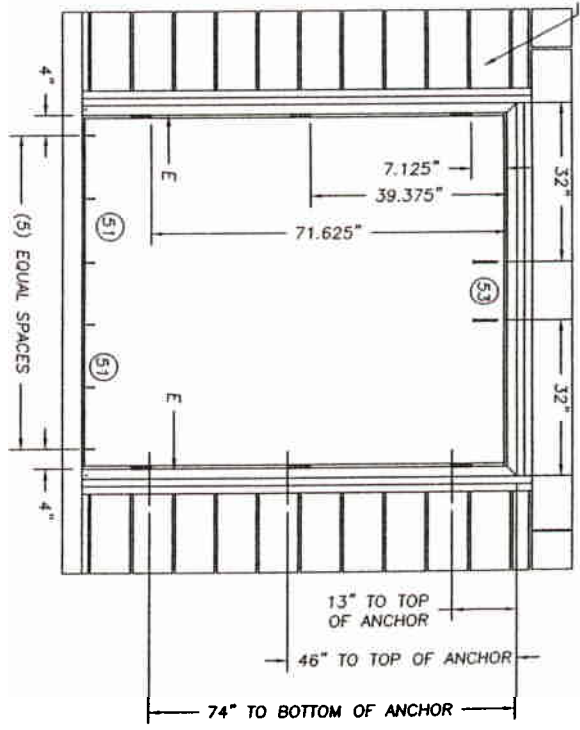
PRODUCT: OUTSWING DOUBL 6'0" x 7'2" COMMERCIAL STEEL DOOR IN A H.M.F.		Product Approval Documents Prepared By: BUILDING CONSULTANTS, INC. P.O. Box 230 VeroBe FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9813 7/22/04 Wendell W. Honey, P.E. No. 54148													
PART OR ASSEMBLY: ANCHORING LOCATIONS WIRE, STRAP, & TEE ANCHORS		REVISIONS <table border="1"> <tr> <th>NO.</th> <th>DATE</th> <th>DESCRIPTION</th> <th>BY</th> </tr> <tr> <td>2</td> <td>7/21/04</td> <td>REV. ANCHORS, SHT 9, PER DADE</td> <td>EW</td> </tr> <tr> <td>1</td> <td>10/7/03</td> <td>PER DADE LETTER</td> <td>TJH</td> </tr> </table>		NO.	DATE	DESCRIPTION	BY	2	7/21/04	REV. ANCHORS, SHT 9, PER DADE	EW	1	10/7/03	PER DADE LETTER	TJH
NO.	DATE	DESCRIPTION	BY												
2	7/21/04	REV. ANCHORS, SHT 9, PER DADE	EW												
1	10/7/03	PER DADE LETTER	TJH												
DATE:	8/12/03	SCALE:	N.T.S.												
DWG. BY:	ROF	CHEK. BY:	TJH												
DRAWING NO.:	S-2345														
SHEET:	9	OF	12												



SEE DETAIL D
SHEET 10



FOR ANCHORING
SEE NOTE 4



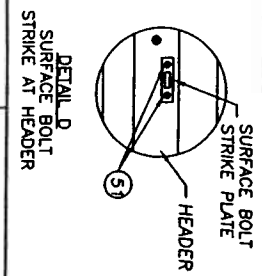
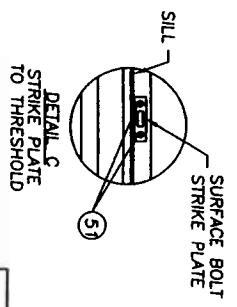
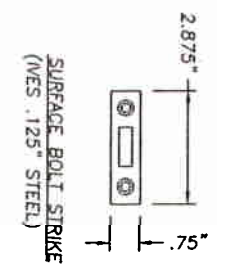
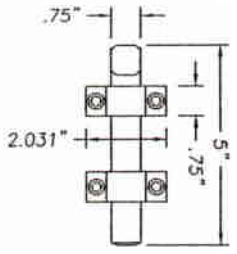
SEE DETAIL D
SHEET 10

13" TO TOP OF ANCHOR
46" TO TOP OF ANCHOR
74" TO BOTTOM OF ANCHOR

THIS SIDE WAS ANCHORED WITH WELDED EMA ANCHORS ITEM #42 SEE NOTE 7 & 14 SHEET 9

THIS SIDE WAS ANCHORED WITH BUTTERFLY ANCHORS ITEM #43 SEE NOTE 6 & 7 SHEET 9

ANCHORING LOCATIONS FOR WOOD/METAL STUD ANCHORS SEE NOTE 8 SHEET 9



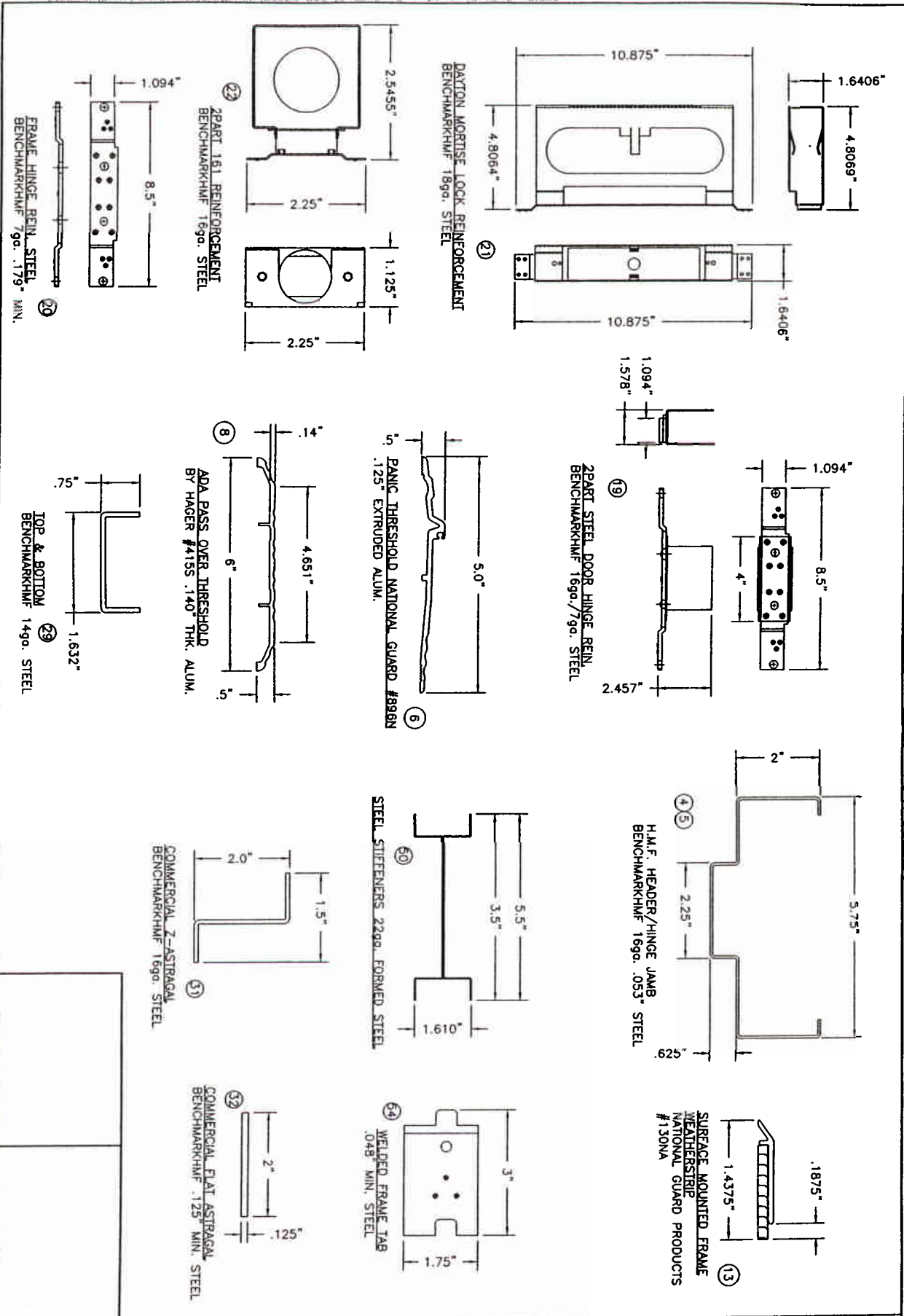
THE SURFACE BOLTS MUST BE USED WITH THE CORBIN/RUSSWIN M/L2000 SERIES MORRISSE LOCK & CORBIN/RUSSWIN CORB 260 HEAVY DUTY CYLINDRICAL LOCKSET & DL3000 260SS CYLINDRICAL DEAD LOCK

DATE: 8/12/03	SCALE: N.T.S.
DWG. BY: ROF	CHEK. BY: TJH
DRAWING NO.: S-2345	SHEET 10 OF 12

NO.	DATE	REVISIONS	BY
2	7/21/04	REV. ANCHORS, SHT 9, PER DADE	EW
1	10/7/03	PER DADE LETTER	TJH

PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F.
PART OR ASSEMBLY: ANCHORING LOCATIONS, EMA, BUTTERFLY, & STUD ANCHORS

Product Approval Documents Prepared By:
RW BUILDING CONSULTANTS, INC.
P.O. Box 230 Valrico FL 33595
Phone No.: 813.659.9197
Florida Board of Professional Engineers
Certificate of Authorization No. 9813
Wendell W. Hehey, P.E. No. 54146



DATE: 8/12/03	SCALE: N.T.S.	DRG. BR: ROF	CHEK. BR: TJH	DRAWING NO: S-2345	SHEET 12 OF 12
REVISIONS 2 7/21/04 REV. ANCHORS, SHT 9, PER DADE EW 1 10/7/03 PER DADE LETTER NJH NO. DATE BY					
PRODUCT: OUTSWING DOUBL 6'0 x 7'2 COMMERCIAL STEEL DOOR IN A H.M.F.			Product Approval Documents Prepared By: BUILDING CONSULTANTS, INC. P.O. Box 230 Valrico FL 33595 Phone No.: 813.659.9197 Florida Board of Professional Engineers Certificate of Authorization No. 9943 Wendell W. Haney, P.E. No. 54146		
PART OR ASSEMBLY: UNIT COMPONENTS			RW		