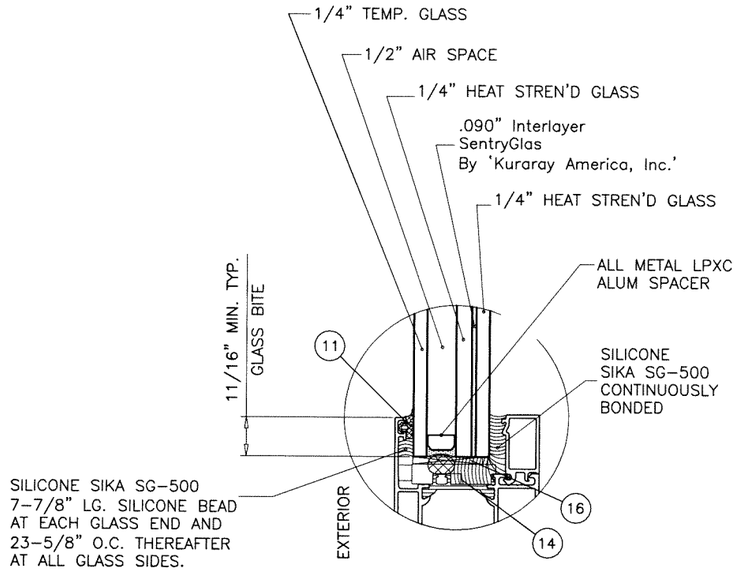


GLASS TYPE 'A'

1-5/16" OVERALL INSUL. LAM. GLASS

GLASS DESIGN LOAD CAPACITY - PSF		
WINDOW DIMS.		GLASS TYPE '1'
D.L.O. WIDTH	D.L.O. HEIGHT	EXT.(+) INT.(-)
37-7/8"	103-1/4"	65.0
43-7/8"		65.0
49-7/8"		65.0
55-7/8"		65.0
61-7/8"		59.1
67-7/8"		54.2
37-7/8"	115-1/4"	65.0
43-7/8"		65.0
49-7/8"		65.0
55-7/8"		65.0
61-7/8"		59.1
67-7/8"		54.2
31-7/8"	127-1/4"	65.0
37-7/8"		65.0
43-7/8"		65.0
49-7/8"		65.0
55-7/8"		65.0
31-7/8"	139-1/4"	65.0
37-7/8"		65.0
43-7/8"		65.0
49-7/8"		65.0
55-7/8"		65.0

STOREFRONT IS RATED FOR LARGE & SMALL MISSILE IMPACT.
SHUTTERS ARE NOT REQUIRED.

AWS65/70/75/90 STOREFRONT SYSTEM (L.M.I.)

DESIGN LOAD RATING FOR STOREFRONT TO BE THE MINIMUM OF GLASS CAPACITY ON THIS SHEET OR CHARTS ON SHEET 4.

THIS PRODUCT HAS BEEN DESIGNED AND TESTED TO COMPLY WITH THE REQUIREMENTS OF THE 2023 (8TH EDITION) FLORIDA BUILDING CODE INCLUDING HIGH VELOCITY HURRICANE ZONE (HVHZ).

1BY OR 2BY WOOD BUCKS & BUCK FASTENERS BY OTHERS, MUST BE DESIGNED AND INSTALLED ADEQUATELY TO TRANSFER APPLIED PRODUCT LOADS TO THE BUILDING STRUCTURE.

ANCHORS SHALL BE CORROSION RESISTANT, SPACED AS SHOWN ON DETAILS AND INSTALLED PER MANUF'S INSTRUCTIONS. SPECIFIED EMBEDMENT TO BASE MATERIAL SHALL BE BEYOND WALL DRESSING OR STUCCO.

A LOAD DURATION INCREASE IS USED IN DESIGN OF ANCHORS INTO WOOD ONLY.

ALL SHIMS TO BE HIGH IMPACT, NON-METALLIC AND NON-COMPRESSIBLE.

MATERIALS INCLUDING BUT NOT LIMITED TO STEEL/METAL SCREWS, THAT COME INTO CONTACT WITH OTHER DISSIMILAR MATERIALS SHALL MEET THE REQUIREMENTS OF THE 2023 FLORIDA BLDG. CODE & ADOPTED STANDARDS.

THIS PRODUCT APPROVAL IS GENERIC AND DOES NOT PROVIDE INFORMATION FOR A SITE SPECIFIC PROJECT, i.e. LIFE SAFETY OF THIS PRODUCT, ADEQUACY OF STRUCTURE RECEIVING THIS PRODUCT AND SEALING AROUND OPENING FOR WATER INFILTRATION RESISTANCE ETC.
CONDITIONS NOT SHOWN IN THIS DRAWING ARE TO BE ANALYZED SEPARATELY, AND TO BE REVIEWED BY BUILDING OFFICIAL.

MANUFACTURER'S LABEL SHALL BE LOCATED ON A READILY VISIBLE LOCATION IN ACCORDANCE WITH SECTION 1709.9.3 OF FLORIDA BUILDING CODE. LABELING TO COMPLY WITH SECTION 1709.9.2.

DESIGN LOADS SHOWN ARE BASED ON 'ALLOWABLE STRESS DESIGN (ASD)'.

NOTE:
GLASS CAPACITIES ON THIS SHEET ARE BASED ON ASTM E1300-09 (3 SEC. GUSTS).

A- CONTRACTOR TO BE RESPONSIBLE FOR THE SELECTION, PURCHASE AND INSTALLATION OF THIS PRODUCT BASED ON THIS PRODUCT EVALUATION PROVIDED HE/SHE DOES NOT DEVIATE FROM THE CONDITIONS DETAILED ON THIS DOCUMENT.

B- THIS PRODUCT EVALUATION DOCUMENT WILL BE CONSIDERED INVALID IF ALTERED BY ANY MEANS.

C- SITE SPECIFIC PROJECTS SHALL BE PREPARED BY A FLORIDA REGISTERED ENGINEER OR ARCHITECT WHICH WILL BECOME THE ENGINEER OF RECORD (E.O.R.) FOR THE PROJECT AND WHO WILL BE RESPONSIBLE FOR THE PROPER USE OF THE P.E.D. ENGINEER OF RECORD, ACTING AS A DELEGATED ENGINEER TO THE P.E.D. ENGINEER SHALL SUBMIT TO THIS LATTER THE SITE SPECIFIC DRAWINGS FOR REVIEW.

D- THIS P.E.D. SHALL BEAR THE DATE AND ORIGINAL SEAL AND SIGNATURE OF THE PROFESSIONAL ENGINEER OF RECORD THAT PREPARED IT.

Sealed: 2/12/2026

FL #48040

JALAL FAROOQ LICENSE No. 81223 STATE OF FLORIDA PROFESSIONAL ENGINEER

AL-FAROOQ CORPORATION
ENGINEERS & PRODUCT DEVELOPMENT
9360 SUNSET DRIVE, SUITE 220
MIAMI, FLORIDA 33173 (C.A.N. 3538)
TEL. (305) 264-8100 FAX. (305) 262-6978

STORE\25-91F-SCH

AWS 65/70/75/90 STOREFRONT SYSTEM (L.M.I.)

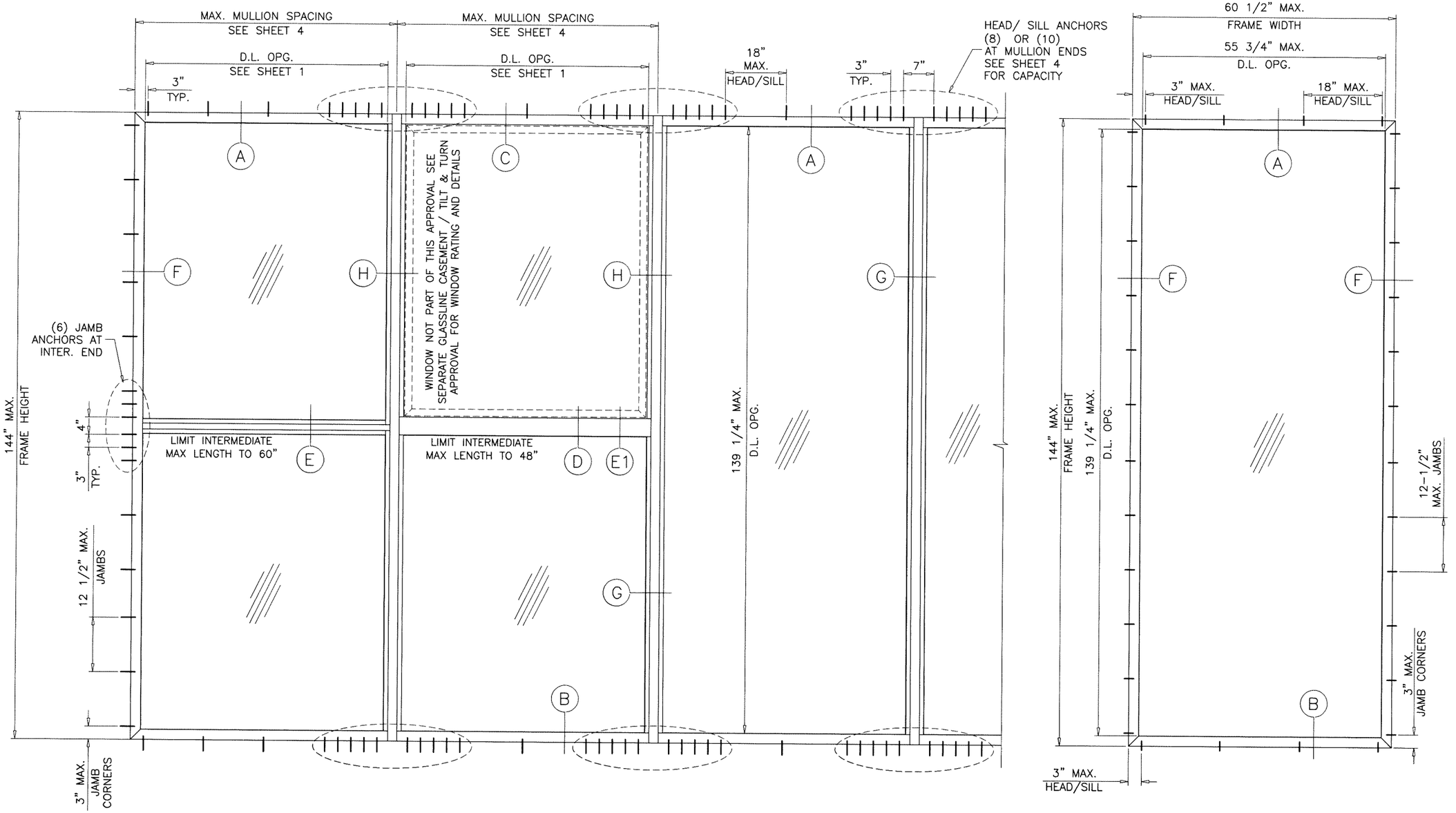
Glassline Metal Factory, LLC.
D40 D53 Logistics Park Kizad
KHI A9 Plot 6 Building 3
Abu Dhabi, UAE Fax. (-)
Tel. +971 2 5501787

revisions:			
no	date	by	description

date: 12-23-25
scale: 1/2"=1'-0"
dr. by: MLS
chk. by:

drawing no. 25-91F

sheet 1 of 17



TYPICAL ELEVATION

MULLION M1

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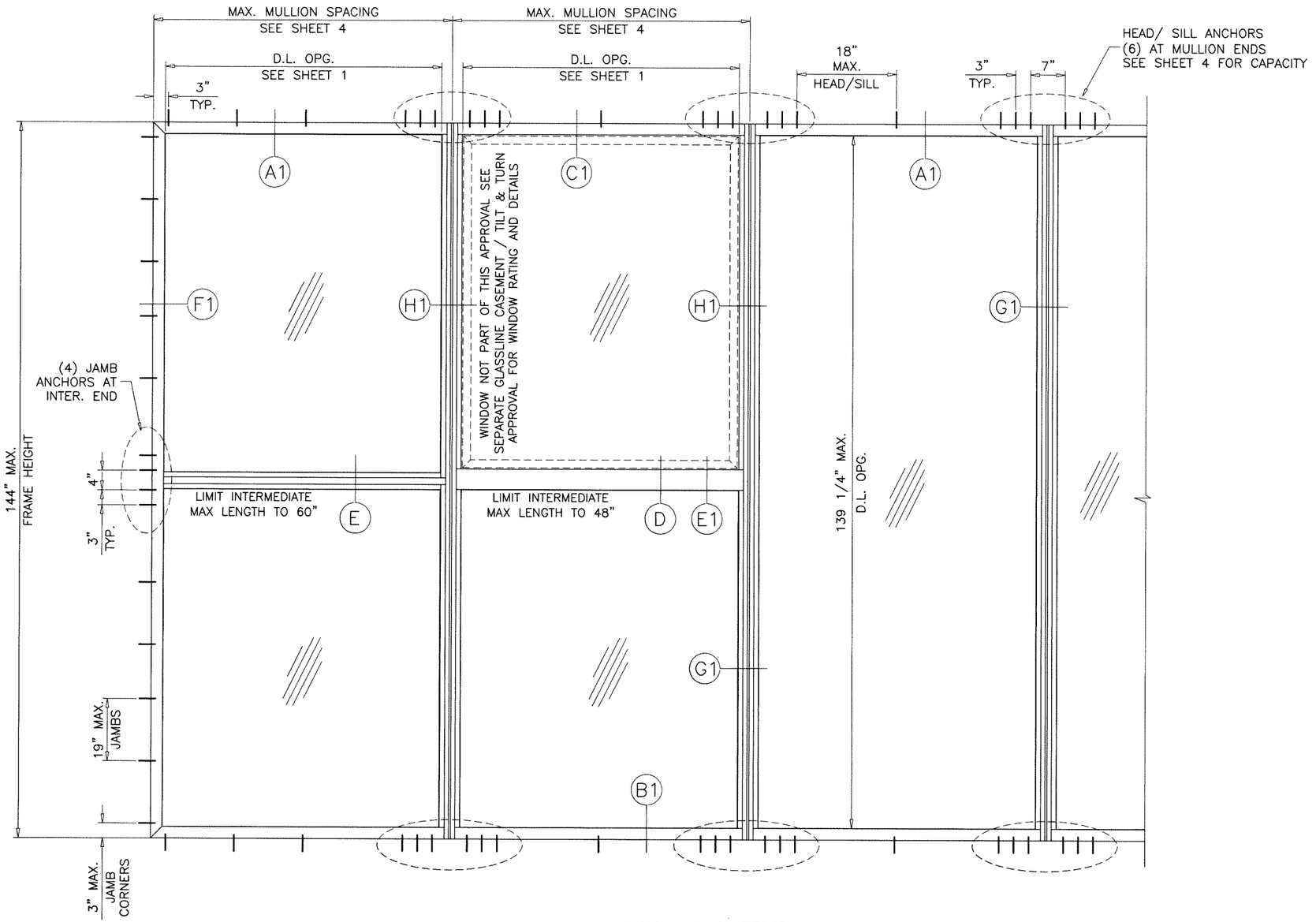
drawing no. 25-91F

sheet 2 of 17



TYPICAL ELEVATION

MULLION M2

Sealed: 2/12/2026

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drawing no.
25-91F

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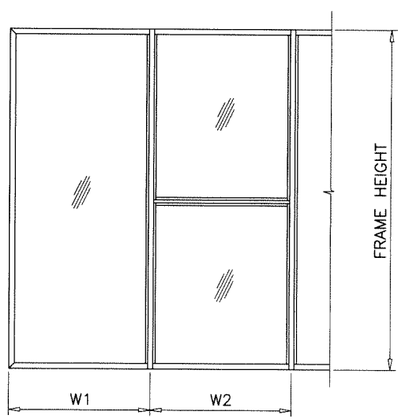
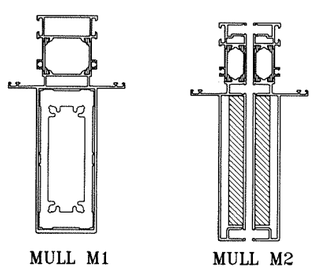
MULLION DESIGN LOAD CAPACITY – PSF					
NOMINAL DIMS.		MULLION M1		MULLION M2	
WIDTH (W) INCHES	HEIGHT INCHES	EXT.(+)	INT.(–)	EXT.(+)	INT.(–)
36	108	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0
54		65.0	65.0	65.0	65.0
60		65.0	65.0	65.0	65.0
66		65.0	65.0	65.0	65.0
72		65.0	65.0	65.0	65.0
36	120	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0
54		65.0	65.0	65.0	65.0
60		65.0	65.0	65.0	65.0
66		–	–	65.0	65.0
72		–	–	65.0	65.0
36	132	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0
54		65.0	65.0	65.0	65.0
60		–	–	65.0	65.0
36	144	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0
54		65.0	65.0	65.0	65.0
60		–	–	65.0	65.0

HEAD / SILL ANCHOR DESIGN LOAD CAPACITY – PSF												
NOMINAL DIMS.		THROUGH FRAME (W/O STRAPS)								THROUGH STRAPS		THROUGH ANGLE
		1/4" SHIM				3/8" SHIM				1/4 OR 3/8" SHIM		1/4 OR 3/8" SHIM
		ANCHOR TYPES 'A' & 'B'		ANCHOR TYPE 'C'		ANCHOR TYPES 'A' & 'B'		ANCHOR TYPE 'C'		ANCHOR TYPES 'A', 'B' & 'C'		ANCHOR TYPES 'A', 'B' & 'C'
PANEL WIDTH NOMINAL INCHES	DOOR HEIGHT INCHES	8 ANCHORS AT MTG. STILES	10 ANCHORS AT MTG. STILES	8 ANCHORS AT MTG. STILES	10 ANCHORS AT MTG. STILES	8 ANCHORS AT MTG. STILES	10 ANCHORS AT MTG. STILES	8 ANCHORS AT MTG. STILES	10 ANCHORS AT MTG. STILES	8 ANCHORS AT MTG. STILES	10 ANCHORS AT MTG. STILES	6 ANCHORS AT MTG. STILES
		EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)	EXT. (+) INT. (–)
36	108	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
54		65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
60		65.0	65.0	65.0	65.0	62.3	65.0	64.4	65.0	63.0	65.0	65.0
66		65.0	65.0	65.0	65.0	58.9	65.0	60.9	65.0	59.6	65.0	65.0
72		65.0	65.0	65.0	65.0	56.3	65.0	58.2	65.0	56.9	65.0	65.0
36	120	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
48		65.0	65.0	65.0	65.0	63.3	65.0	65.0	65.0	64.0	65.0	65.0
54		65.0	65.0	65.0	65.0	58.1	65.0	60.1	65.0	58.7	65.0	65.0
60		65.0	65.0	65.0	65.0	54.0	65.0	55.9	65.0	54.6	65.0	65.0
66		63.3	65.0	64.8	65.0	50.8	63.5	52.5	65.0	51.4	64.2	65.0
72		60.1	65.0	61.5	65.0	48.2	60.3	49.9	62.3	48.8	61.0	65.0
36	132	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0	62.6	65.0	64.7	65.0	63.3	65.0	65.0
48		65.0	65.0	65.0	65.0	56.3	65.0	58.2	65.0	56.9	65.0	65.0
54		64.1	65.0	65.0	65.0	51.4	64.3	53.2	65.0	52.0	65.0	65.0
60		59.4	65.0	60.8	65.0	47.7	59.6	49.3	61.6	48.2	60.2	65.0
36	144	65.0	65.0	65.0	65.0	64.3	65.0	65.0	65.0	65.0	65.0	65.0
42		65.0	65.0	65.0	65.0	56.5	65.0	58.4	65.0	57.1	65.0	65.0
48		63.1	65.0	64.6	65.0	50.6	63.3	52.4	65.0	51.2	64.0	65.0
54		57.5	65.0	58.9	65.0	46.2	57.7	47.7	59.7	46.7	58.3	65.0
60		53.2	65.0	54.4	65.0	42.6	53.3	44.1	55.1	43.1	53.9	65.0



$$\text{WIDTH (W)} = \frac{W1 + W2}{2}$$



LOWER VALUE FROM ANCHOR CAPACITY CHART OR MULLION CAPACITY CHARTS WILL APPLY.

FL #48040

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STORE\25-91F-SCH

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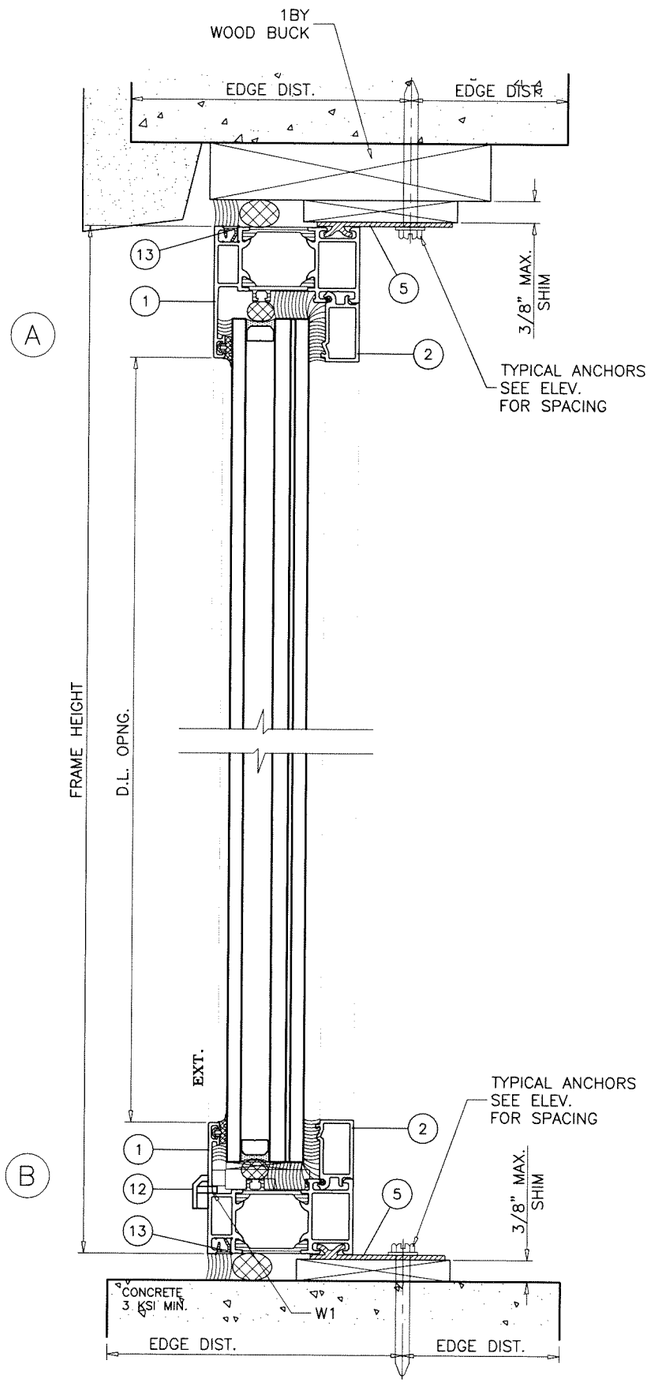

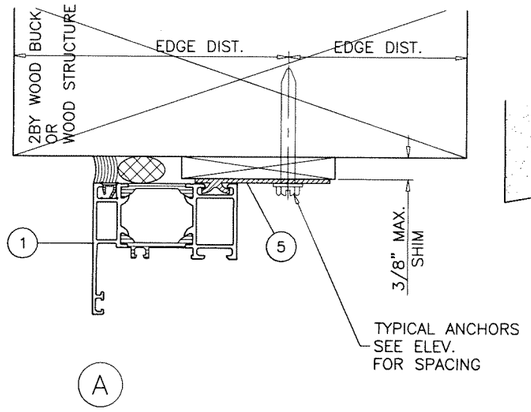

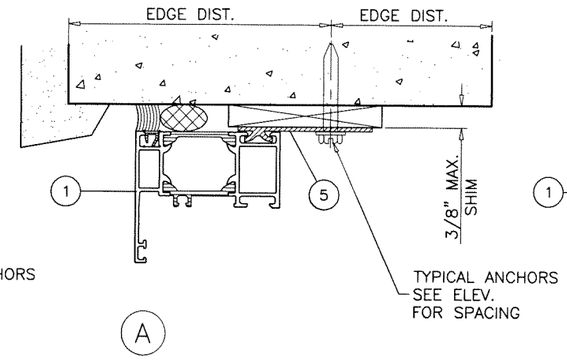

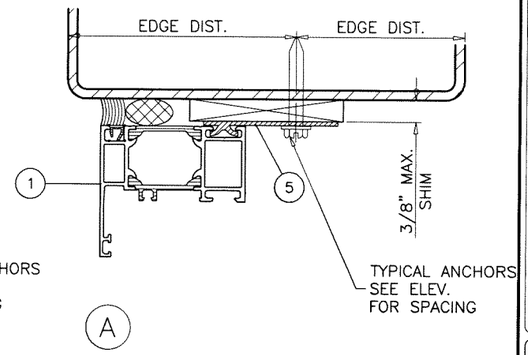

1BY OR 2BY WOOD BUCKS AND METAL STRUCTURE NOT BY 'GLASSLINE' MUST SUSTAIN LOADS IMPOSED BY GLAZING SYSTEM AND TRANSFER THEM TO THE BUILDING STRUCTURE.

TYPICAL ANCHORS: SEE ELEV. FOR SPACING

TYPE 'A'– 1/4" DIA. ULTRACON+ BY 'DEWALT' (Fu=164 KSI, Fy=148 KSI)
INTO WOOD STRUCTURES
1–3/4" MIN. PENETRATION INTO WOOD (HEAD/JAMBS)

THRU 1BY OR 2BY BUCKS INTO CONC. OR BLOCKS
1–1/4" MIN. EMBED INTO CONCRETE (HEAD/JAMBS)
1–1/4" MIN. EMBED INTO BLOCKS (JAMBS)

TYPE 'B'– 1/4" DIA. ULTRACON+ BY 'DEWALT' (Fu=164 KSI, Fy=148 KSI)
DIRECTLY INTO CONCRETE OR FILLED BLOCKS
1–3/4" MIN. EMBED INTO CONCRETE (HEAD/SILL/JAMBS)
1–3/4" MIN. EMBED INTO FILLED BLOCKS (JAMBS)

TYPE 'C'– 1/4" DIA. TEKS OR SELF–DRILLING SCREWS (GRADE 5 CRS)
INTO F.B.C. APPROVED MULLIONS
OR
INTO METAL STRUCTURES (HEAD/JAMBS)
(3) THREADS MIN. TO EXTEND BEYOND METAL THICKNESS
ALUMINUM: 1/8" THK. MIN. (6063–T5 MIN.)
STEEL: 1/8" THK. MIN. (Fy = 36 KSI MIN.)
(STEEL IN CONTACT WITH ALUMINUM TO BE PLATED OR PAINTED)

CRITICAL EDGE DISTANCE
INTO CONCRETE AND BLOCKS = 2–1/2" MIN.
INTO WOOD STRUCTURE = 1" MIN.
INTO METAL STRUCTURE = 3/4" MIN.

WOOD AT HEAD OR JAMBS SG = 0.55 MIN.
CONCRETE AT HEAD, SILL OR JAMBS f'c = 3000 PSI MIN.
C–90 HOLLOW/FILLED BLOCK AT JAMBS f'm = 2000 PSI MIN.

WEEPHOLES:

W1 = 3/8" X 1" WEEP NOTCH AT 3" FROM MULLION/JAMB INTERNAL EDGE AND ONE AT CENTER OF PANEL.

STRAP ANCHOR INSTALLATION

INSTALLATION METHOD APPLIES TO SHEET 2 ONLY

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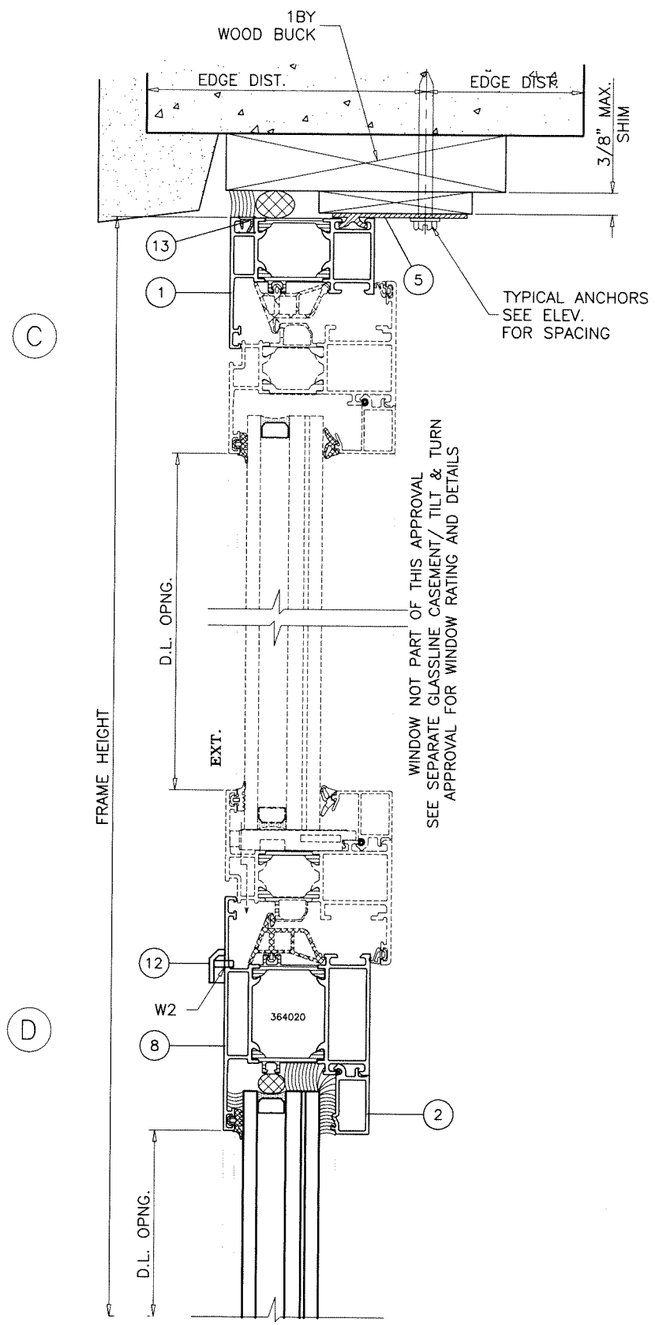
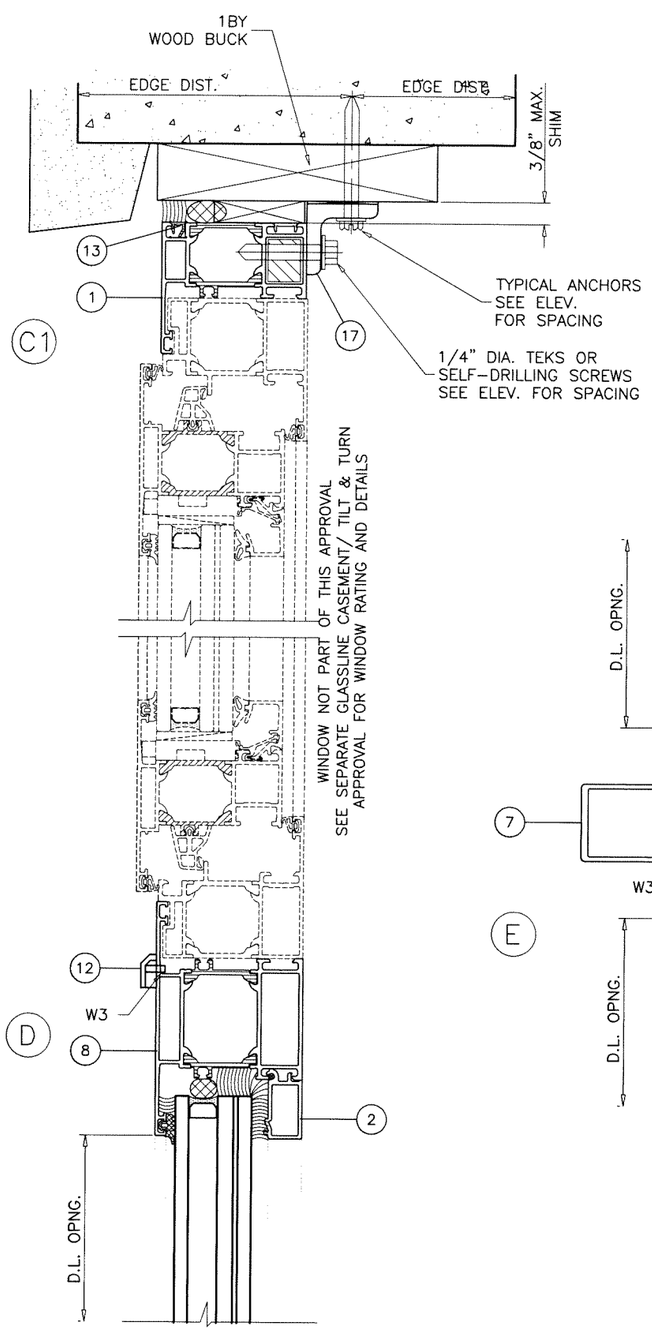
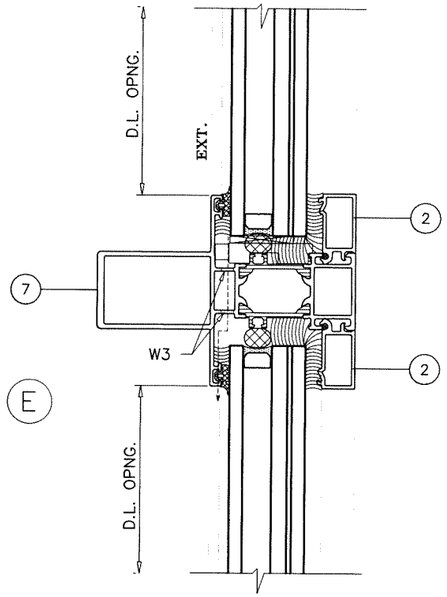
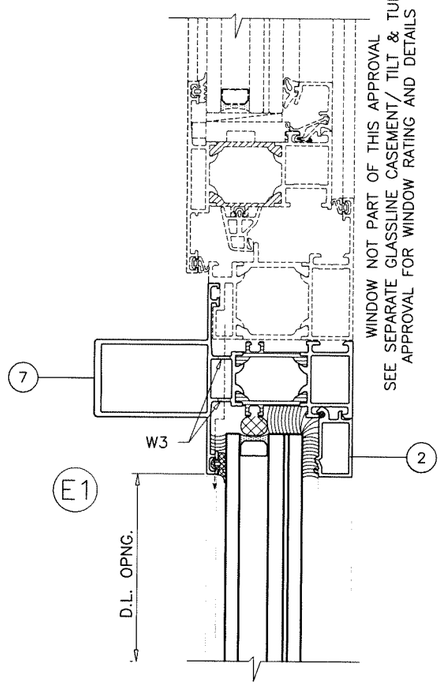
sheet 5 of 17









WEEPHOLES:

W2 & W3 = 3/8" X 1" WEEP NOTCH AT 3" FROM MULLION/JAMB INTERNAL EDGE AND ONE AT CENTER OF PANEL.

WINDOW INSERTS CAN BE USED ABOVE AND/OR BELOW INTERMEDIATE HORIZONTAL

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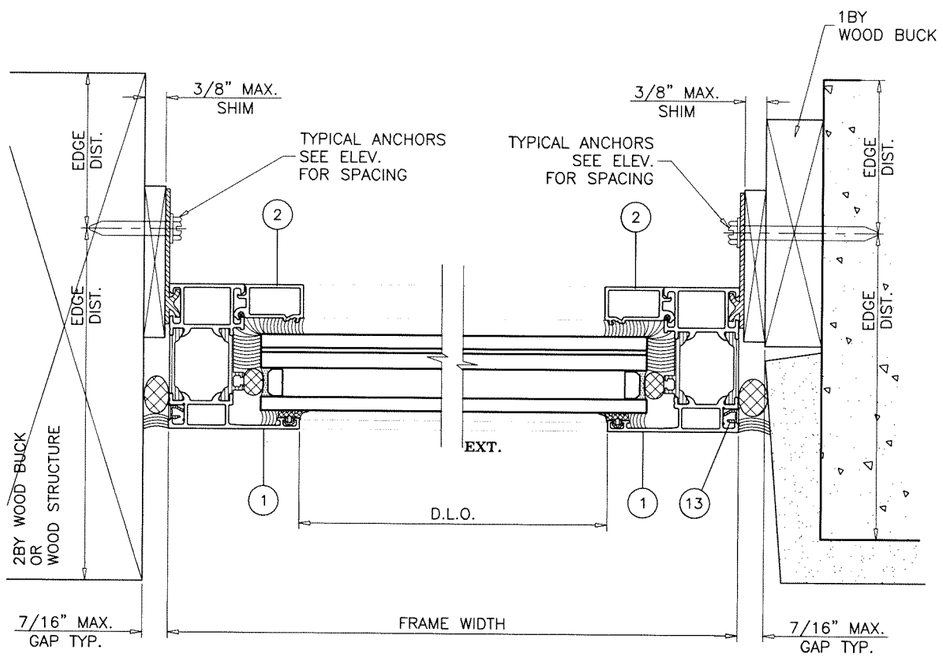
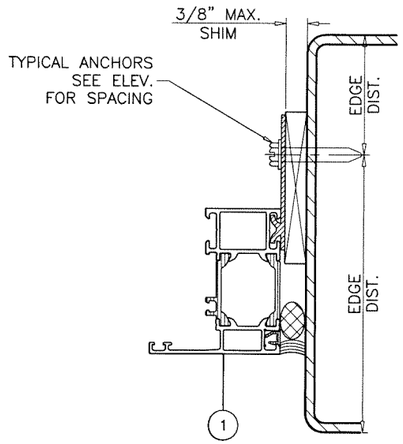
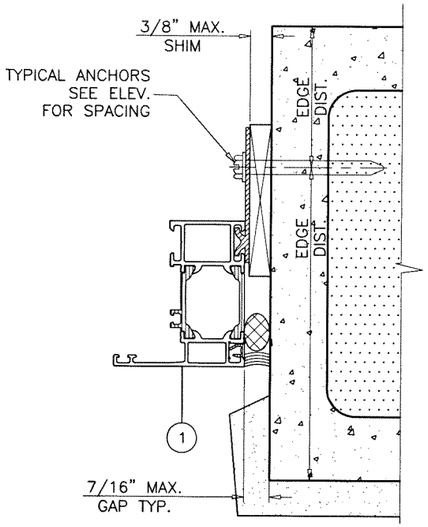
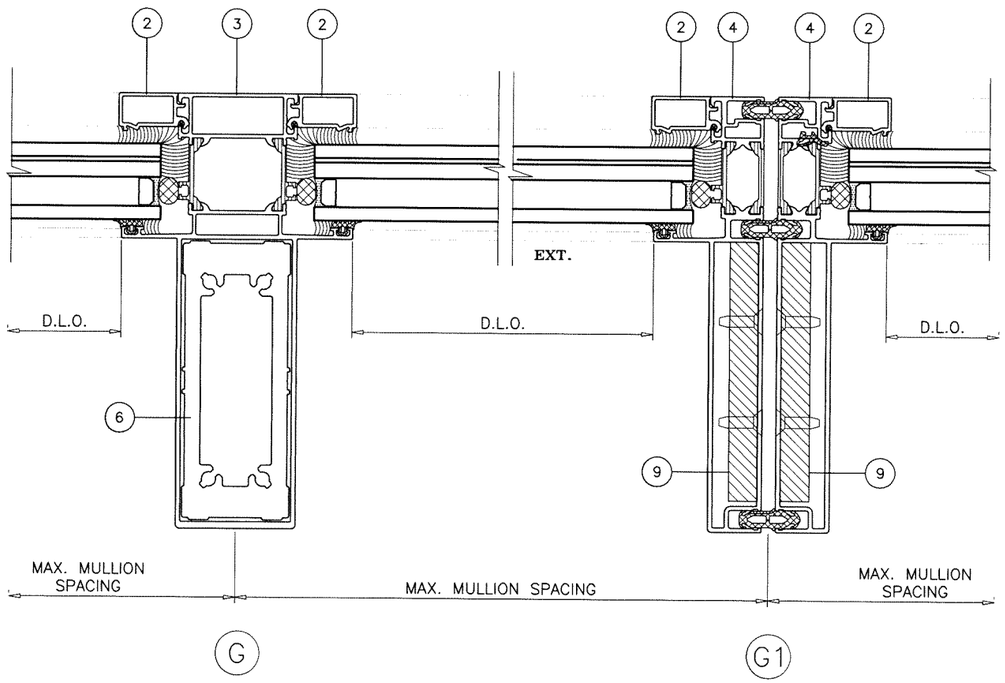
sheet 6 of 17









Sealed: 2/12/2026

FL #48040

JALAL FAROOQ
LICENSE
No. 81223
STATE OF FLORIDA
PROFESSIONAL ENGINEER

AL-FAROOQ CORPORATION
ENGINEERS & PRODUCT DEVELOPMENT
9360 SUNSET DRIVE, SUITE 220
MIAMI, FLORIDA 33173 (C.A.N. 3538)
TEL. (305) 264-8100 FAX. (305) 262-6978

STORE\25-91F-SCH

AWS 65/70/75/90 STOREFRONT SYSTEM (L.M.I.)

Glassline Metal Factory, LLC.
D40 D53 Logistics Park Kizad
KHI A9 Plot 6 Building 3
Abu Dhabi, UAE
Tel. +971 2 5501787

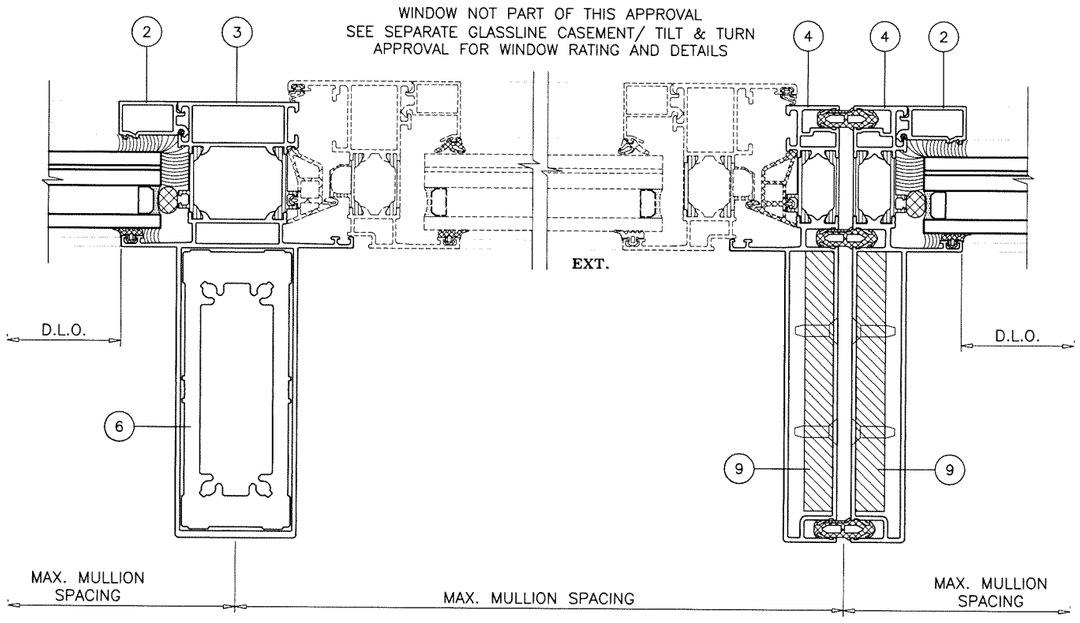
revisions:

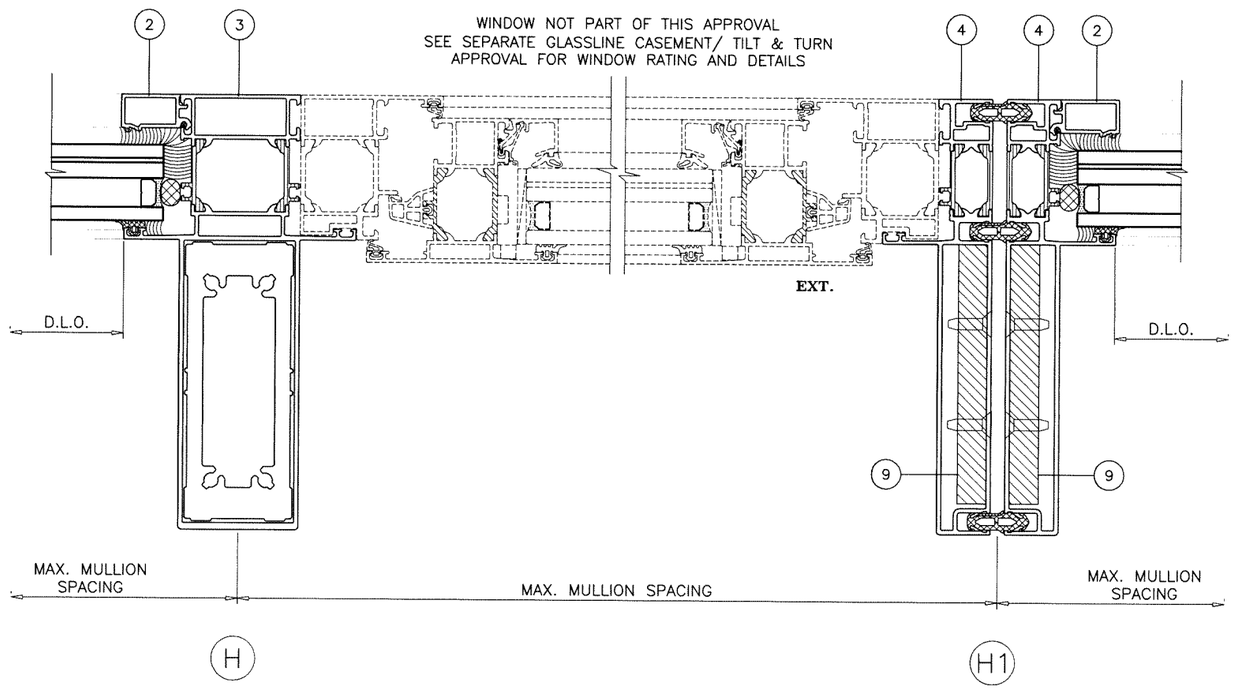
no	date	by	description

date: 12-23-25
scale: 1/2"=1'-0"
dr. by: MLS
chk. by:

drawing no.
25-91F

sheet 7 of 17





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FL #48040

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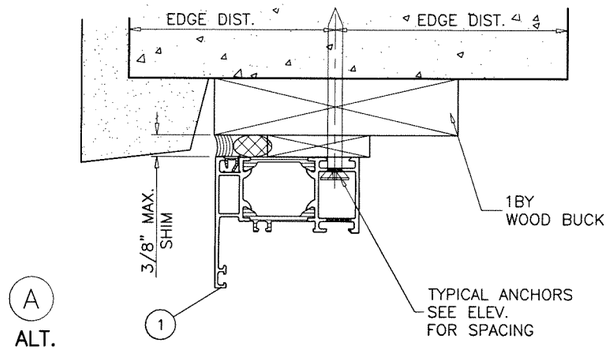
drawing no. 25-91F

sheet 8 of 17



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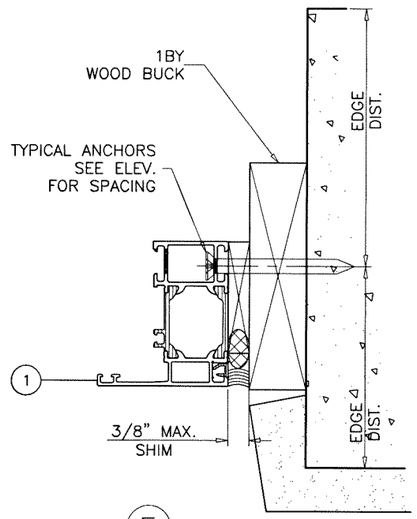

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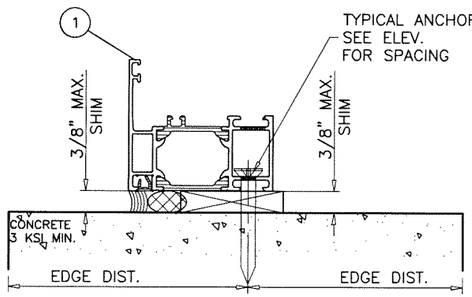

B
ALT.

INSTALLATION METHOD APPLIES TO SHEET 2 ONLY

THROUGH FRAME ANCHOR INSTALLATION

TYPICAL THROUGH FRAME INSTALLATION DETAILS APPLY TO ALL OTHER SHOWN SUBSTRATES.

Sealed: 2/12/2026

JALAL FAROOQ
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revisions:			
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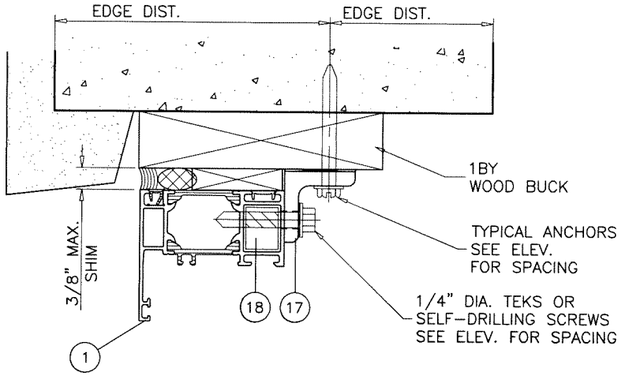
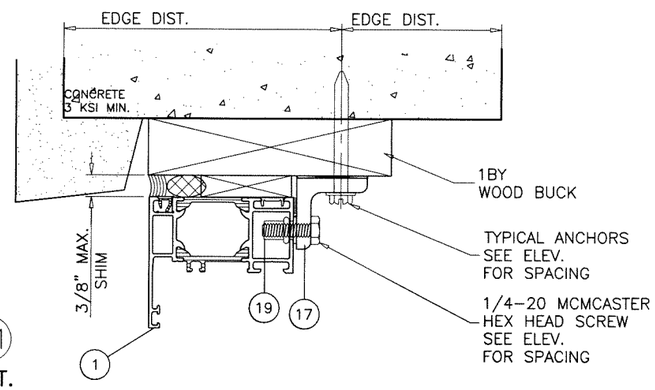
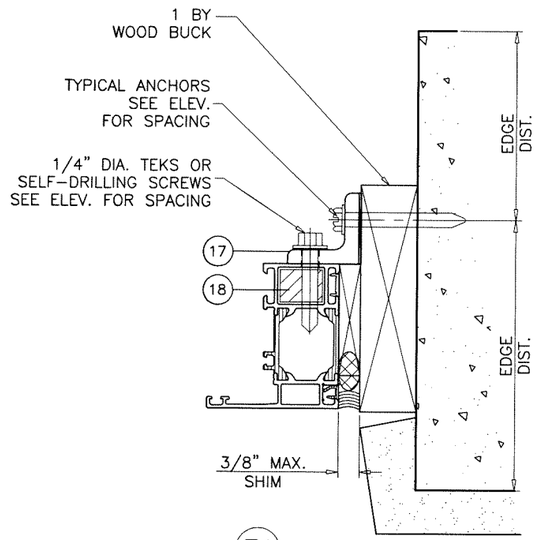
25-91F



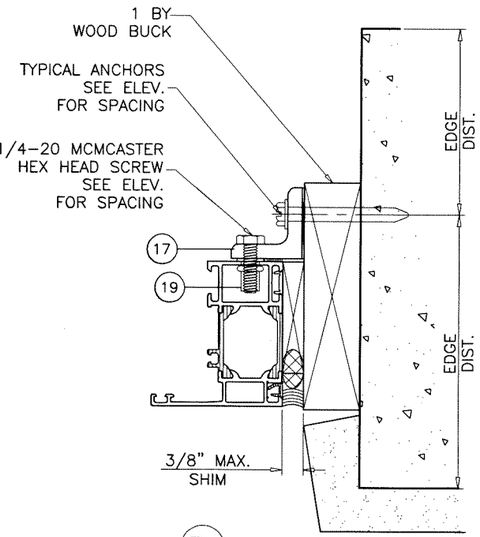
A1



A1
ALT.



F1



F1
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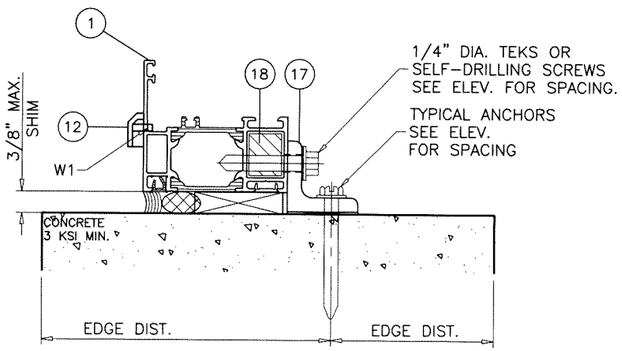
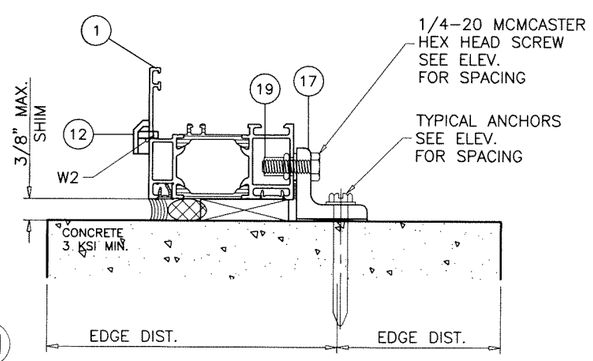


B1



B1
ALT.

WEEPHOLES:

W1 = 3/8" X 1" WEEP NOTCH AT 3" FROM MULLION/JAMB INTERNAL EDGE AND ONE AT CENTER OF PANEL.

INSTALLATION METHOD APPLIES TO SHEET 3 ONLY

THROUGH ALUM ANGLE ANCHOR INSTALLATION

TYPICAL THROUGH ALUM ANGLE INSTALLATION DETAILS APPLY TO ALL OTHER SHOWN SUBSTRATES.

Sealed: 2/12/2026

JALAL FAROOQ
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FL #48040

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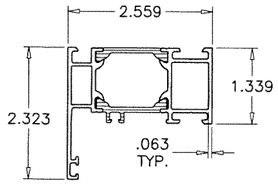
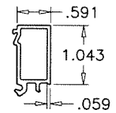
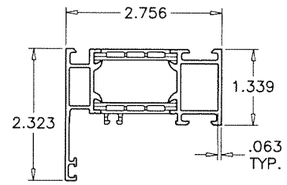
sheet 10 of 17



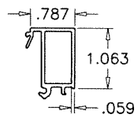
(1) OUTER FRAME AWS 65



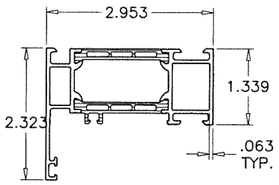
(2) GLAZING BEAD AWS 65



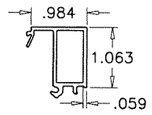
(1A) OUTER FRAME AWS 70.HI



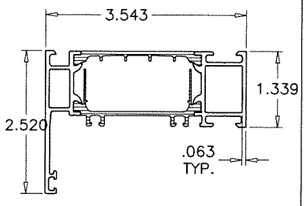
(2A) GLAZING BEAD AWS 70.HI



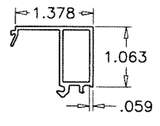
(1B) OUTER FRAME AWS 75.SI+



(2B) GLAZING BEAD AWS 75.SI+



(1C) OUTER FRAME AWS 90.SI+



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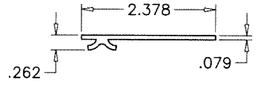
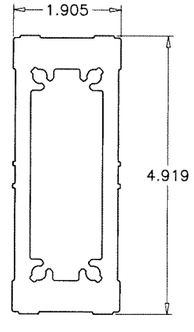
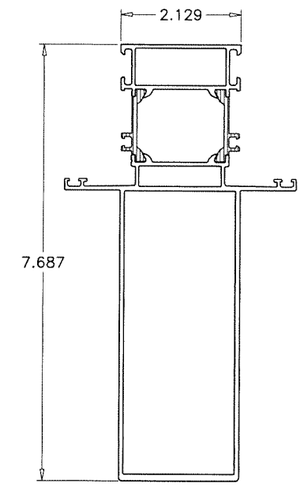


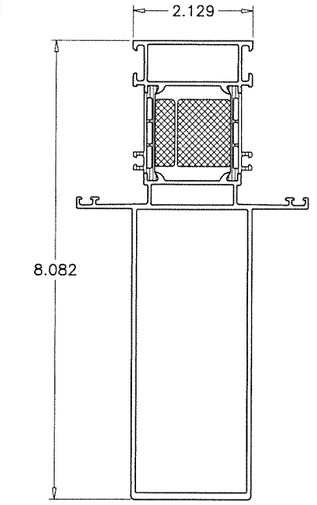
(5) STRAP ANCHOR



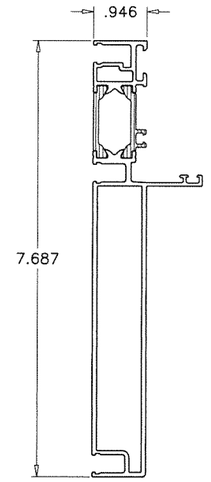
(6) ALUM REINFORCEMENT



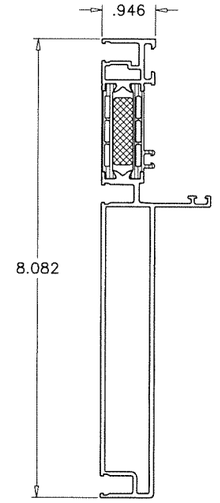
(3) MULLION M1 AWS 65



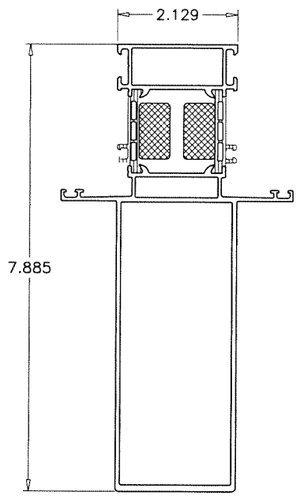
(3B) MULLION M1 AWS 75.SI+



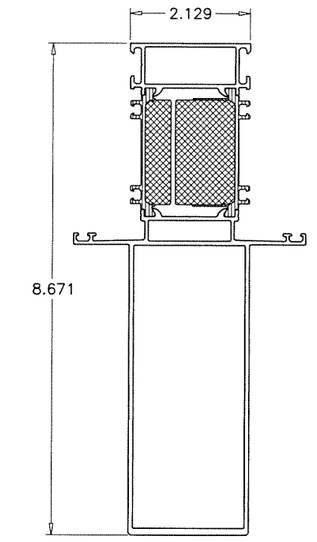
(4) MULLION M2 AWS 65



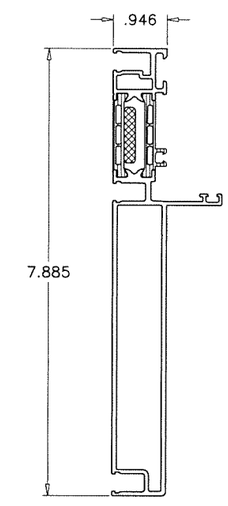
(4B) MULLION M2 AWS 75.SI+



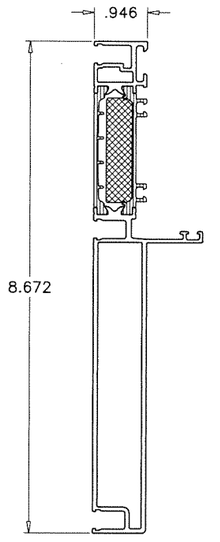
(3A) MULLION M1 AWS 70.HI



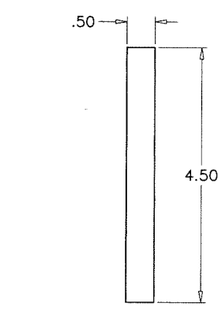
(3C) MULLION M1 AWS 90.SI+



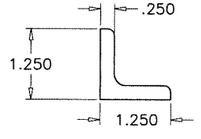
(4A) MULLION M2 AWS 70.HI



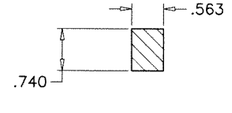
(4C) MULLION M2 AWS 90.SI+



(9) STEEL REINFORCEMENT



(17) ALUM ANGLE



(18) ALUM BAR

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FL #48040

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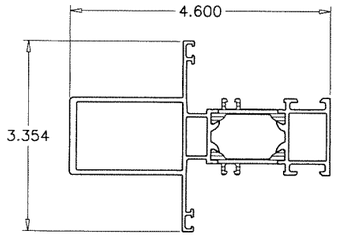
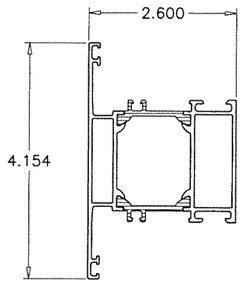
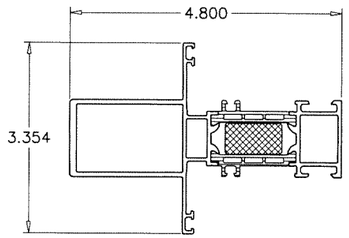
sheet 11 of 17



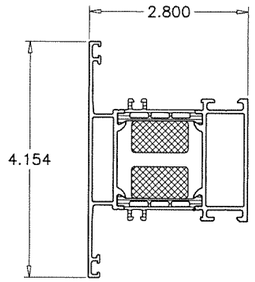
(7) INTERMEDIATE H1 AWS 65



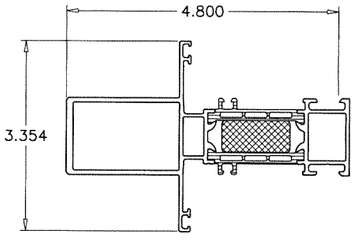
(8) INTERMEDIATE H2 AWS 65



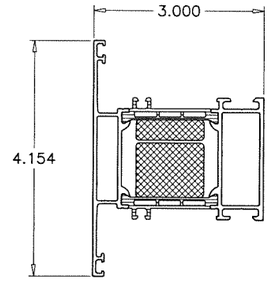
(7A) INTERMEDIATE H1 AWS 70.HI



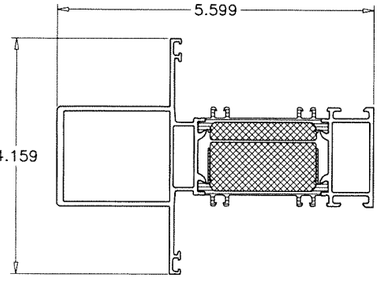
(8A) INTERMEDIATE H2 AWS 70.HI



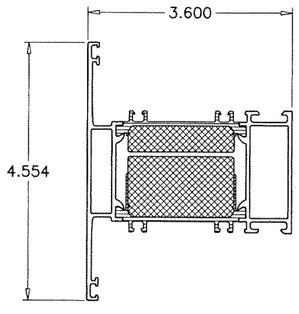
(7B) INTERMEDIATE H1 AWS 75.SI+



(8B) INTERMEDIATE H2 AWS 75.SI+



(7C) INTERMEDIATE H1 AWS 90.SI+

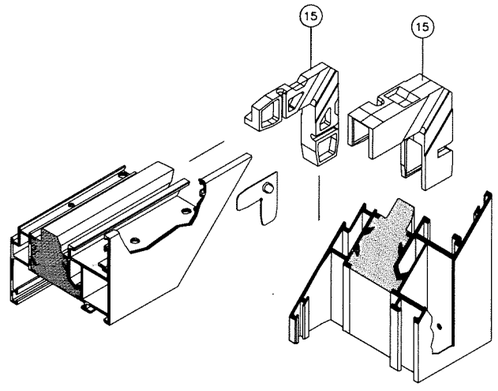


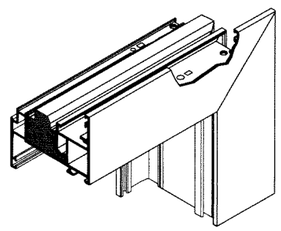
(8C) INTERMEDIATE H2 AWS 90.SI+

INSULBARS

MATERIAL = POLYAMIDE
TENSILE STRENGTH = 13031 PSI
RATE OF BURN = .752 IN./MIN.
SELF IGNITION TEMP. = 793° F
FLASH IGNITION TEMP. – 781°C
SMOKE DENSITY = 1.63

ITEM #	PART #	REQD.	DESCRIPTION	MATERIAL
1	363900	4	FRAME AWS 65	6063–T6
1A	358150	AS REQD.	FRAME AWS 70.HI	6063–T6
1B	382130	AS REQD.	FRAME AWS 75.SI+	6063–T6
1C	465070	AS REQD.	FRAME AWS 90.SI+	6063–T6
2	489760	4	GLAZING BEAD EHL 22 (AWS 65)	6063–T6
2A	467700	AS REQD.	FIXED GLAZING BEAD AWS 70.HI	6063–T6
2B	467780	AS REQD.	FIXED GLAZING BEAD AWS 75.SI+	6063–T6
2C	467800	AS REQD.	FIXED GLAZING BEAD AWS 90.SI+	6063–T6
3	9629332	AS REQD.	MULLION M1 AWS 65	6063–T6
3A	––	AS REQD.	MULLION M1 AWS 70.HI	6063–T6
3B	––	AS REQD.	MULLION M1 AWS 75.SI+	6063–T6
3C	––	AS REQD.	MULLION M1 AWS 90.SI+	6063–T6
4	9629334	AS REQD.	MULLION M2 AWS 65	6063–T6
4A	––	AS REQD.	MULLION M2 AWS 70.HI	6063–T6
4B	––	AS REQD.	MULLION M2 AWS 75.SI+	6063–T6
4C	––	AS REQD.	MULLION M2 AWS 90.SI+	6063–T6
5	207628	AS REQD.	STRAP ANCHOR	50961–Fe/Zn 8 C
6	9631982	AS REQD.	ALUMINUM REINFOECEMENT	6063–T6
7	364810	AS REQD.	INTERMEDIATE H1 AWS 65	6063–T6
7A	358760	AS REQD.	INTERMEDIATE H1 AWS 70.HI	6063–T6
7B	368660	AS REQD.	INTERMEDIATE H1 AWS 75.SI+	6063–T6
7C	441510	AS REQD.	INTERMEDIATE H1 AWS 90.SI+	6063–T6
8	364020	AS REQD.	INTERMEDIATE H2 AWS 65	6063–T6
8A	358270	AS REQD.	INTERMEDIATE H2 AWS 70.HI	6063–T6
8B	382300	AS REQD.	INTERMEDIATE H2 AWS 75.SI+	6063–T6
8C	441190	AS REQD.	INTERMEDIATE H2 AWS 90.SI+	6063–T6
9	––	1	1/2" X 4 1/2" STEEL PLATE	STEEL
11	224063	AS REQD.	CONT. O.–IN GASKET AWS 70.HI	
12	208694	3	DRAIN COVER CAP BLK.	
13	244516	AS REQD.	PVC–U FILLER PROF SW	
14	288167	2/ LITE	GLAZING SUPPORT	POLYAMIDE, DUROMETER 80±5 SHORE A
15	236198/236218	4/EA.	CORNER KEY	6063–T6
16	––	2/ LITE	SETTING BLOCK	EPDM, DUROMETER 80±5 SHORE A
17	––	AS REQD.	1–1/4" X 1–1/4" X 1/4 ANGLE	ALUMINUM
18	––	AS REQD.	9/16" X 3/4" BAR	ALUMINUM
19	––	AS REQD.	BOLLHOFF S25–80 RIVNUT	





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FL #48040

JALAL FAROOQ LICENSE No. 81223 STATE OF FLORIDA PROFESSIONAL ENGINEER

AL-FAROOQ CORPORATION
ENGINEERS & PRODUCT DEVELOPMENT
9360 SUNSET DRIVE, SUITE 220
MIAMI, FLORIDA 33173 (C.A.N. 3538)
TEL. (305) 264-8100 FAX. (305) 262-6978

STORE\25-91F-SCH

AWS 65/70/75/90 STOREFRONT SYSTEM (L.M.I.)

Glassline Metal Factory, LLC.
D40 D53 Logistics Park Kizad
KHI A9 Plot 6 Building 3
Abu Dhabi, UAE
Tel. +971 2 5501787 Fax. (–)

revisions:

no	date	by	description

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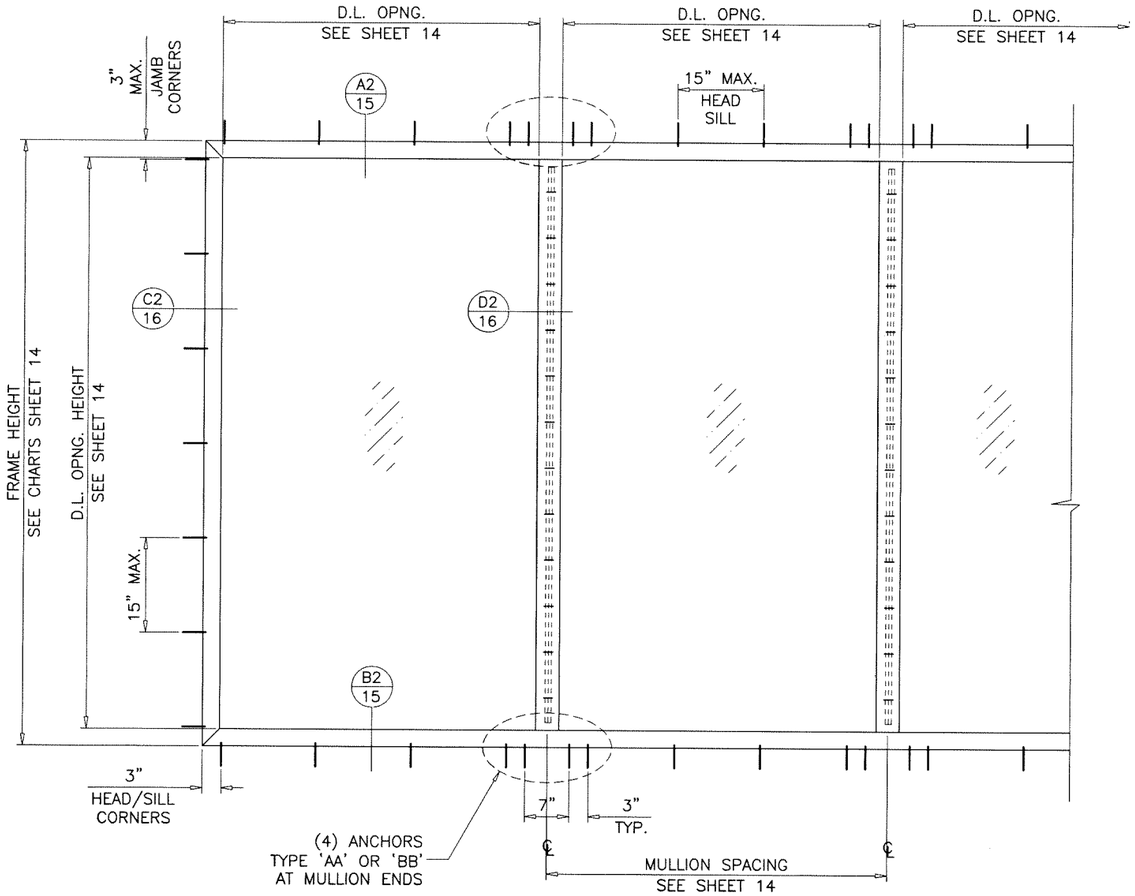
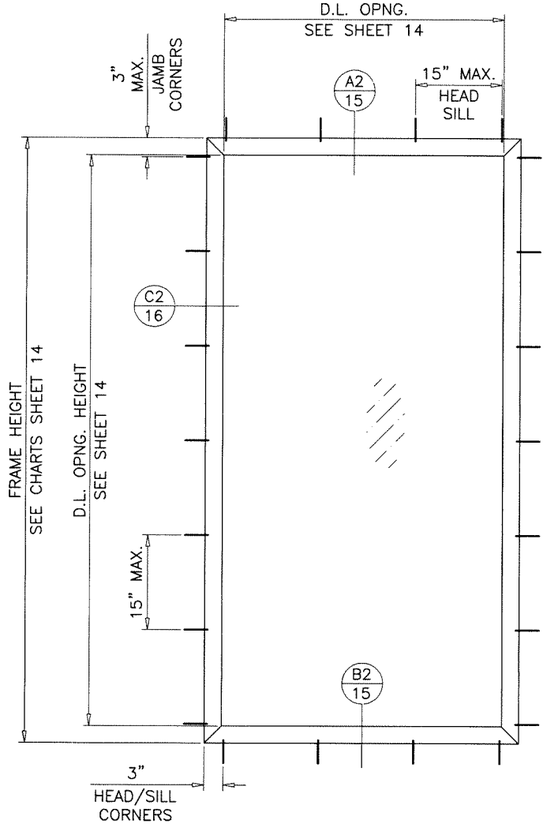
scale: 1/2"=1'-0"
dr. by: MLS
chk. by:

drawing no. 25–91F

sheet 12 of 17





TYPICAL ELEVATIONS

SINGLE 'O' PANEL:
FRAME WIDTH = D.L.O. WIDTH + 5.438"
FRAME HEIGHT = D.L.O. HEIGHT + 5.438"

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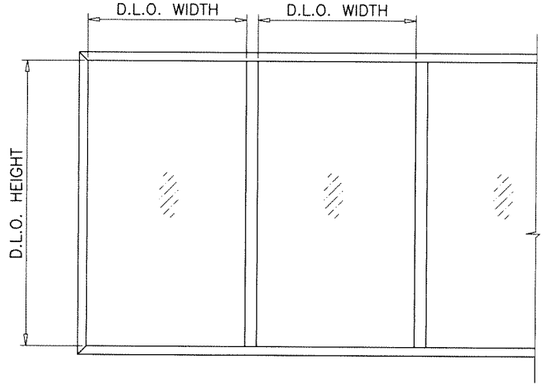
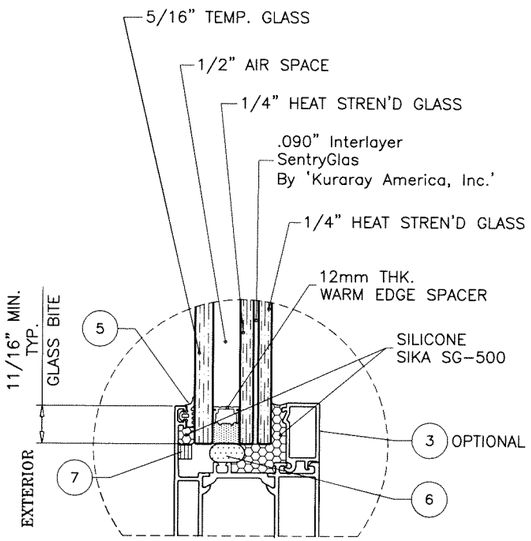
GLASS LOAD CAPACITY – PSF			
NOMINAL DIMS.		1-3/8" OVERALL INSUL. LAM. GLASS	
D.L.O. WIDTH	D.L.O. HEIGHT	EXT.(+)	INT.(–)
32-5/16"	66-9/16"	51.0	65.2
38-5/16"		51.0	65.2
44-5/16"		51.0	65.2
50-5/16"		51.0	65.2
56-5/16"		45.6	58.2
62-5/16"		41.2	52.6
68-5/16"		38.5	49.3
32-5/16"	78-9/16"	51.0	65.2
38-5/16"		51.0	65.2
44-5/16"		51.0	65.2
50-5/16"		51.0	65.2
56-5/16"		45.6	58.2
32-5/16"	86-9/16"	51.0	65.2
38-5/16"		51.0	65.2
44-5/16"		51.0	65.2
50-5/16"		51.0	65.2
32-5/16"	90-9/16"	51.0	65.2
38-5/16"		51.0	65.2
44-5/16"		51.0	65.2
50-5/16"		51.0	65.2

INTERPOLATION BETWEEN WIDTHS OR HEIGHTS ALLOWED.





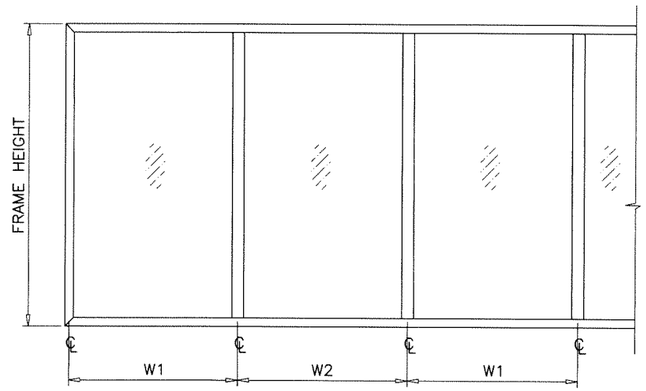
GLAZING DETAIL
1-3/8" OVERALL INSUL. LAM. GLASS

NOTE:
GLASS CAPACITIES ON THIS SHEET ARE
BASED ON ASTM E1300-09 (3 SEC. GUSTS).

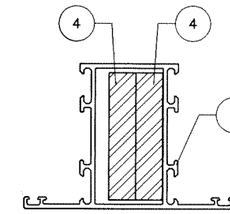
GLASS

MULLION LOAD CAPACITY – PSF			
NOMINAL DIMS.		MULL 'M1'	
WIDTH (W)	FRAME HEIGHT	EXT.(+)	INT.(–)
36"	72"	51.0	65.2
42"		51.0	65.2
48"		51.0	65.2
54"		51.0	65.2
60"		51.0	65.2
66"		51.0	65.2
72"		51.0	65.2
36"	84"	51.0	65.2
42"		51.0	65.2
48"		51.0	65.2
54"		51.0	65.2
60"		51.0	65.2
36"	92"	51.0	65.2
42"		51.0	65.2
48"		51.0	65.2
54"		51.0	60.4
36"	96"	51.0	65.2
42"		51.0	64.0
48"		51.0	57.4
54"		51.0	52.5

INTERPOLATION BETWEEN WIDTHS OR HEIGHTS ALLOWED.



WIDTH (W) = $\frac{W1 + W2}{2}$
AT FRAME MULLION



MULLION 'M1'

	Ix IN^4	Sx IN^3
ALUMINUM	.868	.571
STEEL	.890	.793
TOTAL Ix ALUM + Ix STL X 3.05	3.551	

MULLION

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25-91F

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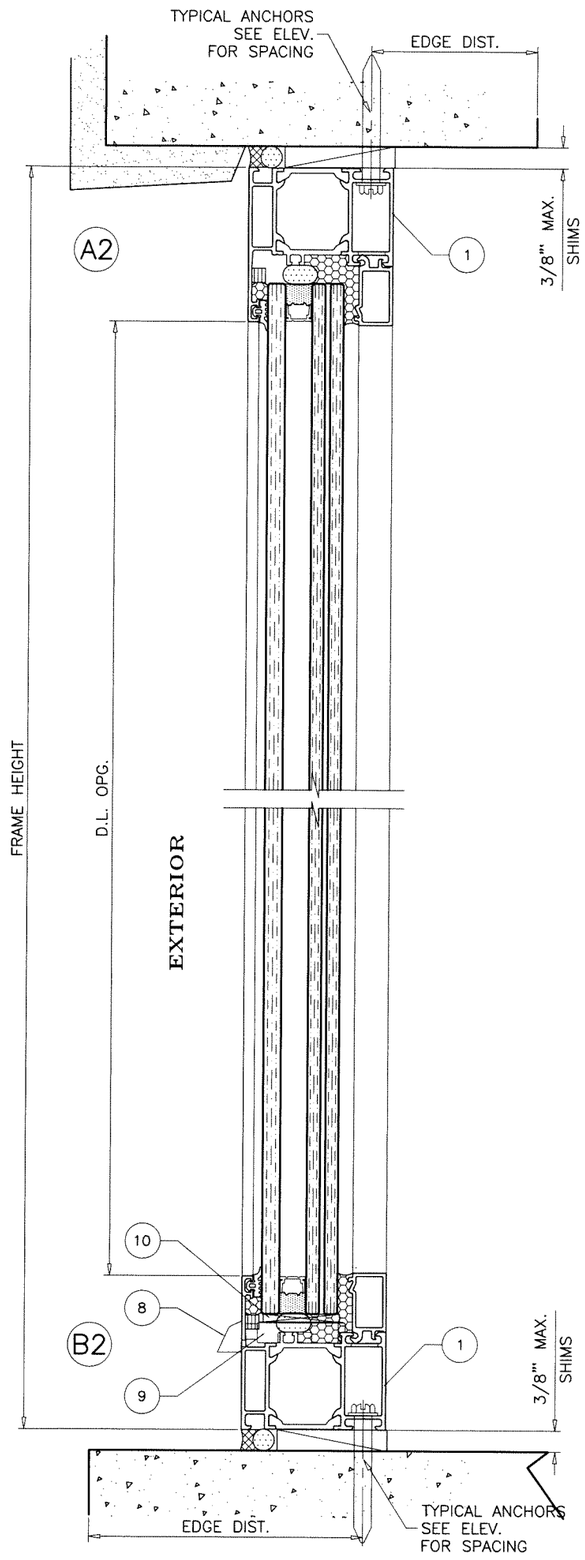

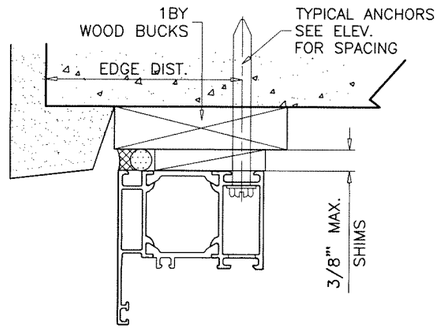

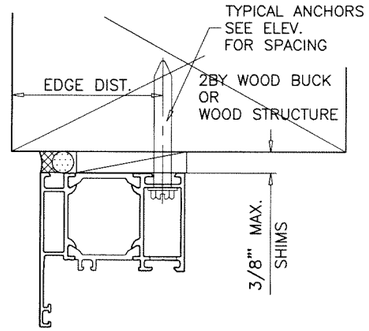

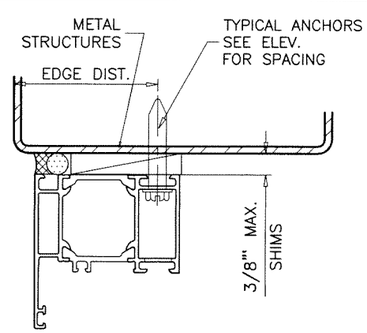

WOOD BUCKS AND METAL STRUCTURE NOT BY 'GLASSLINE' MUST SUSTAIN LOADS IMPOSED BY GLAZING SYSTEM AND TRANSFER THEM TO THE BUILDING STRUCTURE.

TYPICAL ANCHORS: SEE ELEV. FOR SPACING

ANCHOR TYPE 'AA'– 5/16" DIA. ULTRACON BY 'DEWALT' (Fu=177 KSI, Fy=155 KSI)

INTO WOOD STRUCTURES
1–7/8" MIN. PENETRATION INTO WOOD (HEAD/SILL/JAMBS)

THRU 1BY OR 2BY WOOD BUCKS INTO CONC. OR BLOCKS
1–1/4" MIN. EMBED INTO CONCRETE (HEAD/SILL/JAMBS)
1–1/4" MIN. EMBED INTO BLOCKS (JAMBS)

DIRECTLY INTO CONCRETE OR BLOCKS
2" MIN. EMBED INTO CONCRETE (HEAD/SILL/JAMBS)
1–1/4" MIN. EMBED INTO BLOCKS (JAMBS)

ANCHOR TYPE 'BB'– 5/16" DIA. TEKS OR SELF DRILLING SCREWS (GRADE 5 CRS)

INTO F.B.C. APPROVED MULLIONS
OR
INTO METAL STRUCTURES (HEAD/SILL/JAMBS)
(3) THREADS MIN. TO EXTEND BEYOND METAL THICKNESS
ALUMINUM: 1/8" THK. MIN. (6063–T5 MIN.)
STEEL: 1/8" THK. MIN. (Fy = 36 KSI MIN.)
(STEEL IN CONTACT WITH ALUMINUM TO BE PLATED OR PAINTED)

TYPICAL EDGE DISTANCE

INTO CONCRETE AND BLOCKS = 3–1/8" MIN.
INTO WOOD BUCKS OR WOOD STRUCTURE = 1–1/4" MIN.
INTO METAL STRUCTURE = 3/4" MIN.

WOOD AT HEAD, SILL OR JAMBS SG = 0.55 MIN.
CONCRETE AT HEAD, SILL OR JAMBS f'c = 3000 PSI MIN.
C–90 HOLLOW/GROUT FILLED BLOCK AT JAMBS f'm = 2000 PSI MIN.

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STORE\25-91F-SCH

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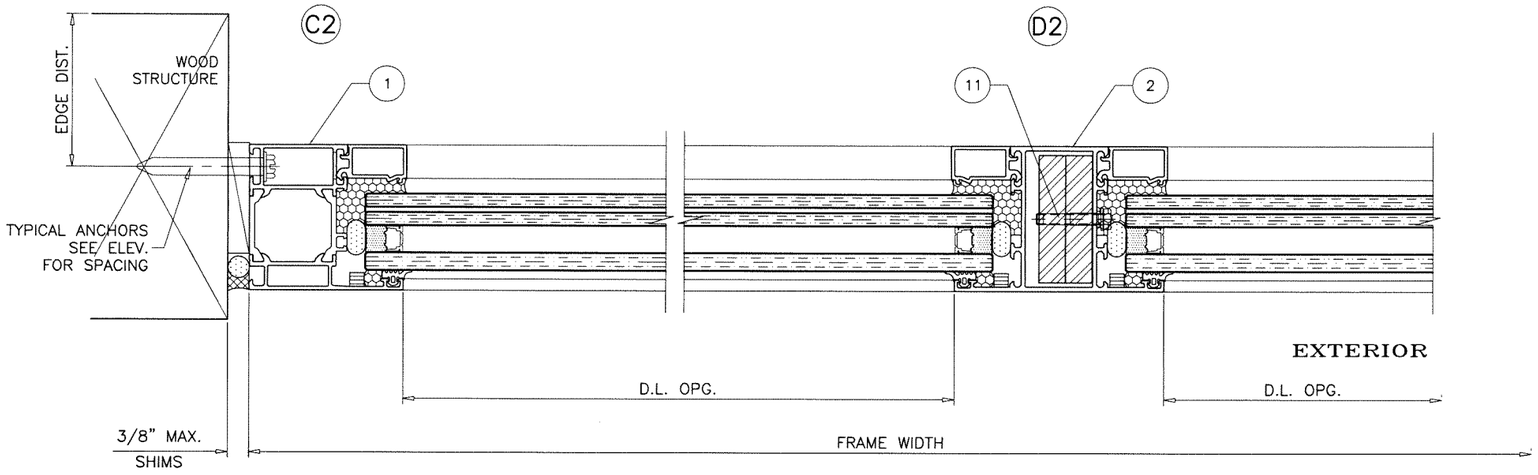

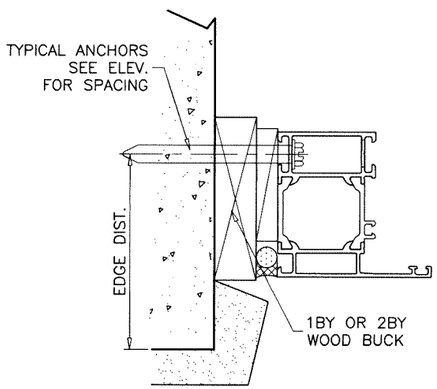

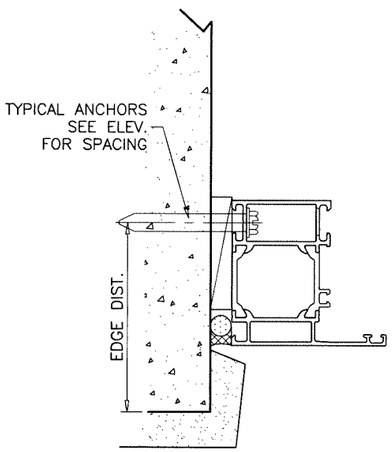

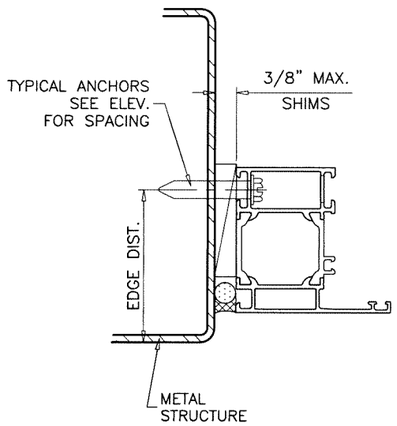

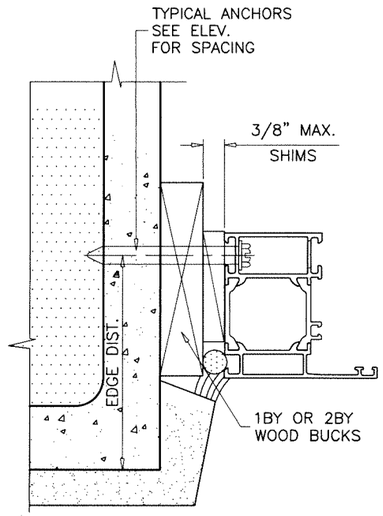

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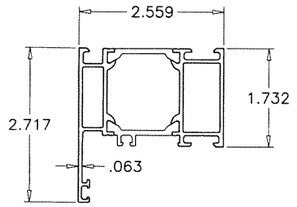
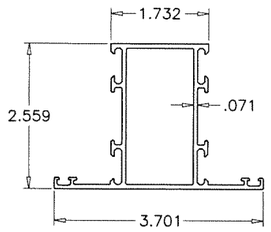
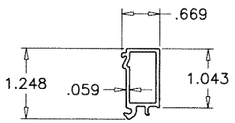


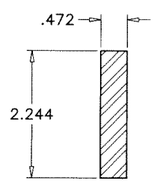
1 FRAME



2 MULLION



3 GLAZING BEAD



4 MULLION REINFORCING

ITEM #	PART #	REQD.	DESCRIPTION	MATERIAL
1	363920	4	FRAME	6063–T6
2	300260	AS REQD.	MULLION	6063–T6
3	489760	AS REQD.	GLAZING BEAD (OPTIONAL)	6063–T6
4	–	AS REQD.	MULLION REINFORCING (LENGTH = FRAME HT.–8")	HDG STEEL, GRADE S235 (Fy = 34 KSI MIN.)
5	SK240290–02	AS REQD.	EXTERIOR GLAZING GASKET	SILICONE, DUROMETER 70±5 SHORE A
6	–	AS REQD.	BACKER ROD	POLYETHYLENE
7	6X6.4mm	AS REQD.	EXTERIOR GLAZING TAPE (8" LONG) AT 14" O.C. MAX.	NORTON
8	208695	3/ LITE	DRAIN COVER CAP	–
9	288167	2/ LITE	GLAZING SUPPORT	POLYAMIDE, DUROMETER 80±5 SHORE A
10	298892	2/ LITE	SUPPORT BLOCK	POLYAMIDE, DUROMETER 80±5 SHORE A
11	933	AS REQD.	MULLION REINF. FASTENERS AT 7–1/4" O.C. MAX.	SS A2–70 M5X30mm BOLT & WASHER

INSULBARS

MATERIAL = POLYAMIDE
TENSILE STRENGTH = 13031 PSI
RATE OF BURN = .752 IN./MIN.
SELF IGNITION TEMP. = 793° F
FLASH IGNITION TEMP. – 781°C
SMOKE DENSITY = 1.63

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