



MIAMI-DADE COUNTY
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)

www.miamidade.gov

Kane Manufacturing Corporation
515 North Fraley street
Kane, PA 16735

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 High Velocity Hurricane Zone of the Florida Building Code.

DESCRIPTION: 0.0785" (min.) Galvannealed Perforated Steel Hurricane Barrier

APPROVAL DOCUMENT: Drawing No. 10-033, titled "Aluminum Van Guard II Hurricane Barrier", sheets 1 through 5 of 5, prepared by EngCo, Inc., dated February 16, 2010, signed and sealed by Pedro De Figueiredo, P.E., on June 01, 2010 bearing the Miami-Dade County Product Control Revision stamp with the Notice of Acceptance number and the expiration date by the Miami-Dade County Product Control Division.

MISSILE IMPACT RATING: Large and Small Missile Impact Resistant

LABELING: Each unit shall bear a permanent label with the manufacturer's name or logo, city, state and the 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 **revises NOA # 07-0514.04** and consists of this page 1, evidence submitted pages E-1 & E-2 as well as approval document mentioned above.

The submitted documentation was reviewed by **Helmy A. Makar, P.E., M.S.**



Helmy A. Makar
 06/30/2010

NOA No. 10-0223.01
Expiration Date: 09/12/2012
Approval Date: 06/30/2010
Page 1

Kane Manufacturing Corporation

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

1. EVIDENCE SUBMITTED UNDER PREVIOUS APPROVAL # 02-0501.07

A. DRAWINGS

1. *Manufacturer's die drawings and sections.*
2. *Drawing No 02-839R1, titled "Aluminum Van Guard II Hurricane Barrier", sheets 1 through 5, prepared by EngCo, Inc., dated 6/20/02, signed and sealed by Pedro De Figueiredo, P.E.*

B. TESTS

1. *Test reports on 1)Uniform Static Air Pressure Test, Loading per SFBC PA 202-94
2) Cyclic Wind Pressure Loading per SFBC, PA 203-94
3) Large Missile Impact Test per SFBC, PA 201-94
4) Forced Entry Test, per SFBC 3603.2 (b) and PA 202-94
along with marked-up drawings and installation diagram of a aluminum reveal and surface mount hurricane screen, prepared by National Certified Testing Laboratories, Test Report No. NCTL 210-2758-1,2,3,4, dated 1/29/02, signed and sealed by Barry D. Portnoy, P.E.*

C. CALCULATIONS

1. *Anchor Calculations and structural analysis, prepared by EngCo, Inc., dated 7/1/02 and revised calculation of the perimeter reaction per anchor on sheet 3 of 6, dated 8/19/02, signed and sealed by Pedro De Figueiredo, P.E.*

D. MATERIAL CERTIFICATIONS

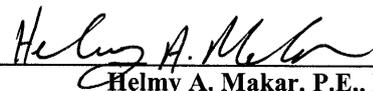
1. *None.*

E. STATEMENTS

1. *Statement letter of conformance, dated 7/2/02, signed and sealed by Pedro De Figueiredo, P.E.*
2. *Laboratory compliance letter for Test Report no. NCTL 210-2758-1,2,3,4, issued by National Certified Testing Laboratories, dated 4/23/02, signed and sealed by Barry D. Portnoy, P.E.*

F. OTHER

1. *Letter from Maurice Gray Associates, Inc.*



Helmy A. Makar, P.E., M.S.
Senior Product Control Examiner
NOA No. 10-0223.01
Expiration Date: 09/12/2012
Approval Date: 06/30/2010

Kane Manufacturing Corporation

NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED

2. EVIDENCE SUBMITTED UNDER PREVIOUS APPROVAL #07-0514.04

A. DRAWINGS

1. *Drawing No. 07-111, titled "Aluminum Van Guard II Hurricane Barrier", sheets 1 through 5 of 5, prepared by EngCo, Inc., dated April 20, 2007, signed and sealed by Pedro De Figueiredo, P.E., on May 07, 2007.*

B. TESTS

1. *None.*

C. CALCULATIONS

1. *Anchor calculations dated May 07, 2007, 15 pages, prepared by EngCo, Inc., signed and sealed by Pedro De Figueiredo, P.E., on May 07, 2007.*

D. QUALITY ASSURANCE

1. *By Miami-Dade County Building Code Compliance Office.*

E. MATERIAL CERTIFICATIONS

1. *None.*

3. NEW EVIDENCE SUBMITTED

A. DRAWINGS

1. *Drawing No. 10-033, titled "Aluminum Van Guard II Hurricane Barrier", sheets 1 through 5 of 5, prepared by EngCo, Inc., dated February 16, 2010, signed and sealed by Pedro De Figueiredo, P.E., on June 01, 2010.*

B. TESTS

1. *None.*

C. CALCULATIONS

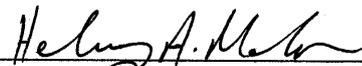
1. *Anchor calculations dated February 16, 2010, 23 pages, prepared by EngCo, Inc., signed and sealed by Pedro De Figueiredo, P.E., on Feb. 16, 2010.*

D. QUALITY ASSURANCE

1. *By Miami-Dade County Building Code Compliance Office.*

E. MATERIAL CERTIFICATIONS

1. *None.*



Helmy A. Makar, P.E., M.S.
Senior Product Control Examiner

NOA No. 10-0223.01

Expiration Date: 09/12/2012

Approval Date: 06/30/2010

GENERAL NOTES:

1- CODE: THIS PRODUCT HAS BEEN TESTED AND DESIGNED IN ACCORDANCE WITH THE FLORIDA BUILDING CODE 2007 INCLUDING THE HIGH VELOCITY HURRICANE ZONE (HVHZ).

2- DEFINITION: THIS PRODUCT IS A HURRICANE SHUTTER, TESTED AND DESIGNED TO PROTECT A GLAZING OPENING, PROVIDING PROTECTION FROM LARGE AND SMALL MISSILE FLYING DEBRIS WITHIN THE ALLOWABLE DESIGNED PRESSURES AND SIZES STATED IN THIS APPROVAL.

3- POSTING: A PERMANENT LEGIBLE DECAL SHALL BE PLACED AT A VISIBLE LOCATION STATING THE FOLLOWING:

"ALUMINUM VANGUARD II HURRICANE BARRIER
KANE SCREENS - KANE - PENNSYLVANIA
MIAMI-DADE COUNTY PRODUCT CONTROL APPROVED"

4- DESIGN LOADS: THE DESIGNED LOADS MUST BE CALCULATED BY A PROFESSIONAL ARCHITECT OR ENGINEER FOR EACH SPECIFIC PROJECT. THE CALCULATED DESIGNED PRESSURE MUST NOT EXCEED THE ALLOWABLE APPROVED PRESSURE.

5- MATERIAL: ALL ALUMINUM PARTS TO BE 6063-T6 ALLOY OR AS NOTED AND SCREEN TO BE 14GA (MINIMUM 0.0785") GALVANNEALED PERFORATED STEEL AS SPECIFIED ON THIS APPROVAL.

6- FASTENERS: ASSEMBLY SCREWS AND ANCHORS SHALL BE AS SPECIFIED IN THE CURRENT SET OF DRAWINGS. INSTALLATION AND LOADS AS PER THIS APPROVAL. ANCHOR QUANTITY & SPACING MUST NOT EXCEED THE MAXIMUM LIMITS SPECIFIED BY THIS APPROVAL.

7- USE: IT SHALL BE THE RESPONSIBILITY OF THE CONTRACTOR, ARCHITECT OR ENGINEER OF RECORD TO VERIFY THE FOLLOWING:

7.1- THE STABILITY OF THE STRUCTURE WHERE THE PRODUCT IS TO BE ATTACHED INSURING PROPER ANCHORAGE.

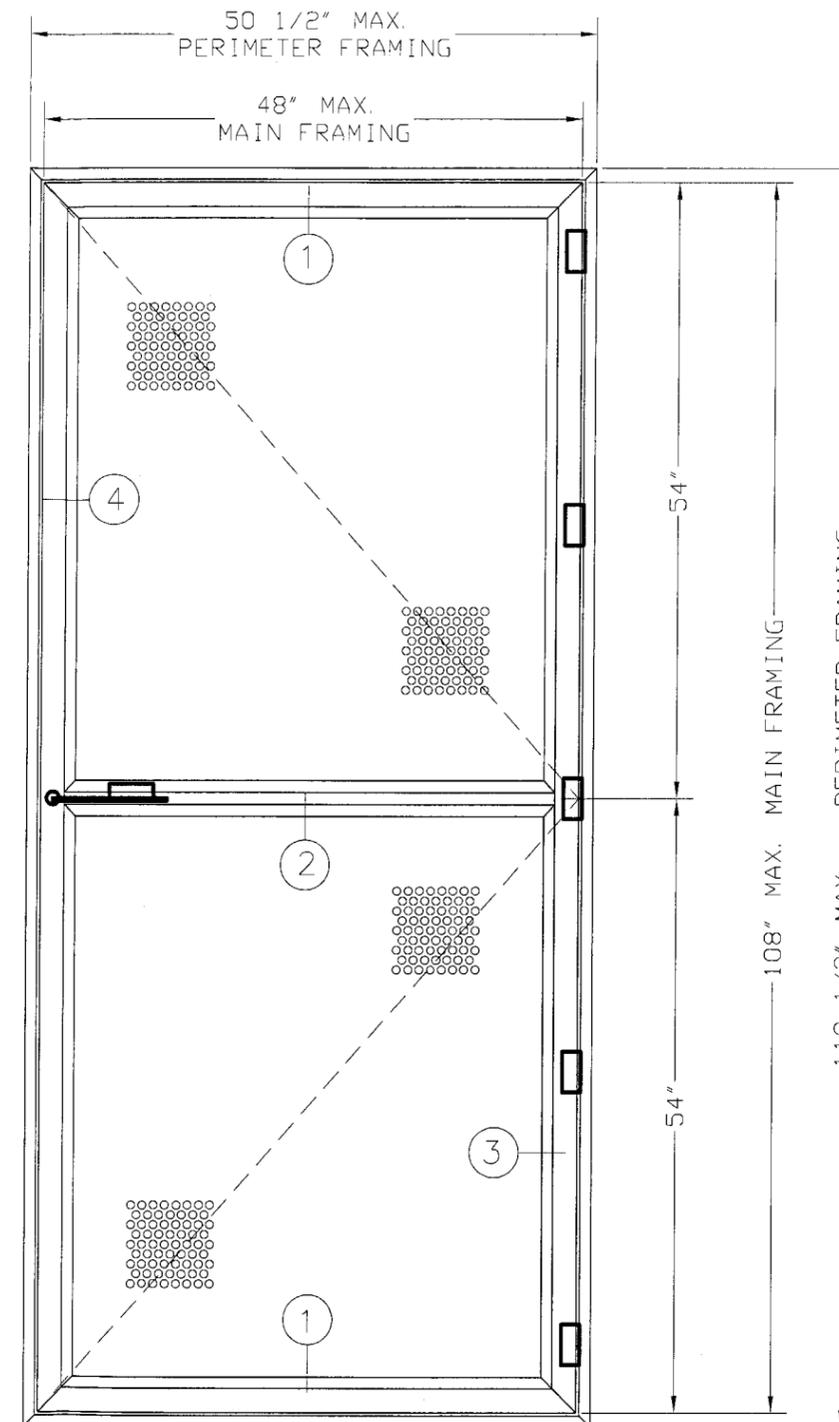
7.2- THE SITE SPECIFIC PROJECT CRITERIA, SUCH AS BUT NOT LIMITED TO, LOCAL CODE REQUIREMENTS, DESIGNED PRESSURES ETC.

7.3- THAT THIS APPROVAL IS ADEQUATE TO THE SPECIFIC PROJECT.

8- 33 1/3% INCREASE IN ALLOWABLE LOADS HAVE NOT BEEN USED IN THE DESIGN OF THE ANCHORS FOR THIS PRODUCT APPROVAL, HOWEVER, WOOD SCREWS WITH 1.6 INCREASE FOR WIND LOAD DURATION HAVE BEEN USED.

9- DISSIMILAR MATERIALS: MATERIALS, INCLUDING BUT NOT LIMITED TO STEEL, THAT COME IN CONTACT WITH OTHER DISSIMILAR MATERIALS SHALL MEET THE REQUIREMENTS OF 2007 FLORIDA BUILDING CODE SECTION 2003.8.4.

10- INFORMATION SHOWN ON THIS DRAWINGS IS PROPRIETARY AND THE SOLE PROPERTY OF KANE MANUFACTURING CORPORATION, AND IS NOT TO BE REPRODUCED, DISCLOSED OR TRANSMITTED TO OTHERS FOR ANY PURPOSE NOT AUTHORIZED BY KANE SCREENS.



DESIGNED PRESSURES:
Pd= +83, -83 PSF

1- PRODUCT CAN BE INSTALLED ROTATED.
2- 14GA PERFORATED PLATE - 51 %POROSITY

MANUFACTURER:
KANE
MANUFACTURING CORPORATION
515 NORTH FRALEY St.
KANE, PA 16735
TEL.: (814) 837-6464
FAX.: (814) 837-6230

PRODUCT:
Aluminum Van Guard II
HURRICANE BARRIER

Engineering:
EngCo Inc.
CA 8116
6971 W. Sunrise Blvd. 104
Plantation, Fl. 33313
ENGCO@AOL.COM



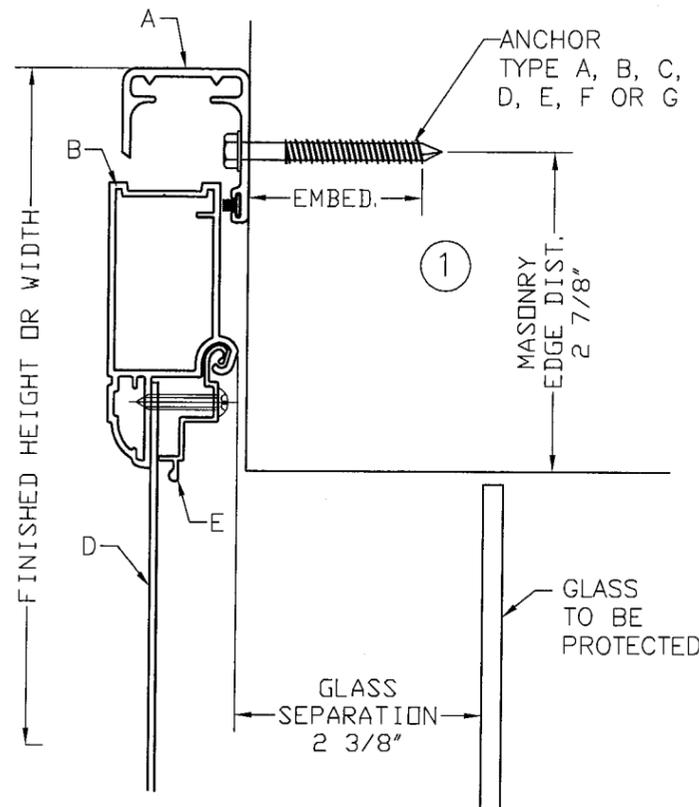
DRAFTING:
PK DRAFTING & MORE

MIAMI-DADE BCCO:
PRODUCT REVISED
as complying with the Florida
Building Code
Acceptance No 10-0223.01
Expiration Date 09/12/2012
By *[Signature]*
Miami Dade Product Control
Division

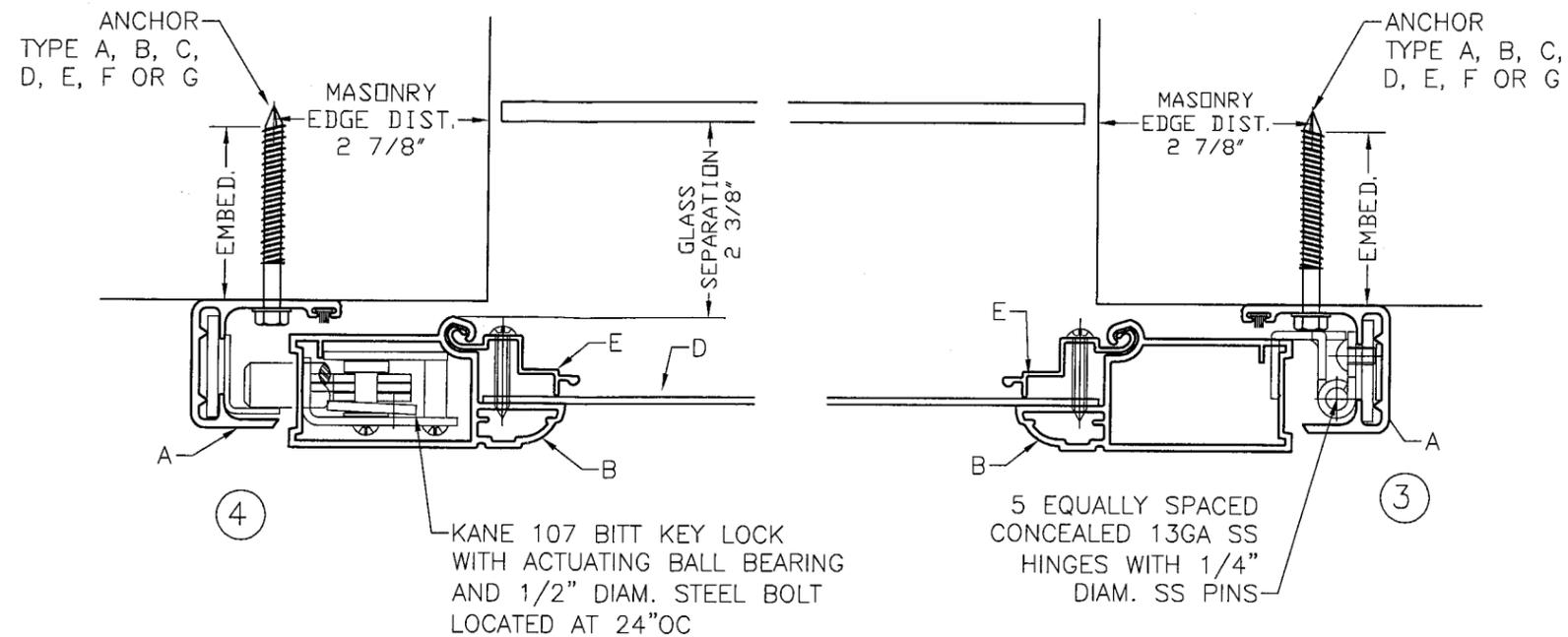
DATE: 02/16/2010
SCALE: NA
DESIGN BY: PPMF

Drawing Number
10-033

SHEET
1 of 5



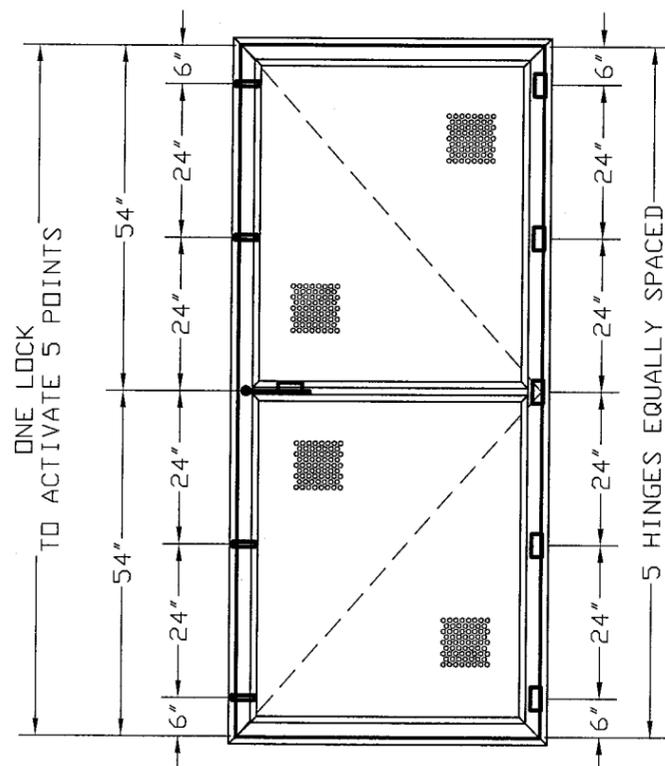
SURFACE MOUNT



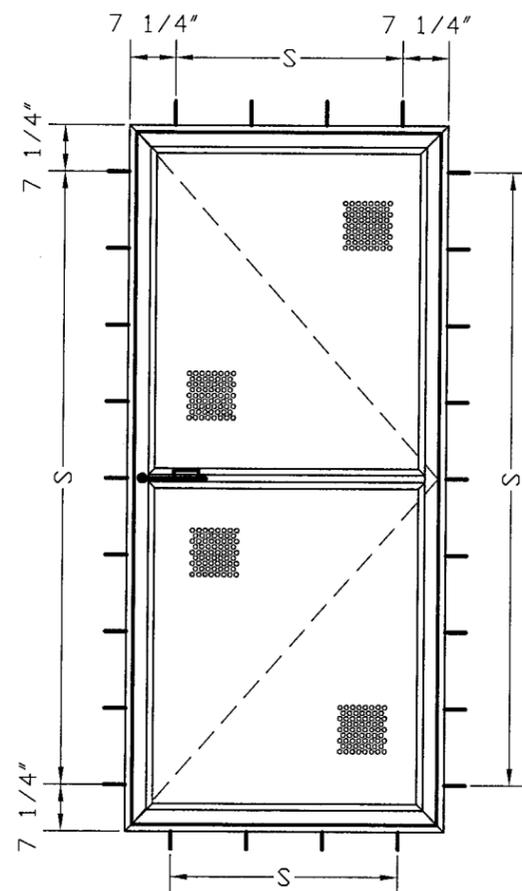
ANCHOR NOTES:

TYPE	DESCRIPTION
A	#14 SCREWS W/ #10-14 SCRU-LEAD W/ 1 1/2" EMBEDMENT INTO 2000 PSI CONCRETE
B	#14 SCREWS W/ #10-14 SCRU-LEAD W/ 1" EMBEDMENT INTO C90-HOLLOW BLOCK
C	#12 SCREWS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_q \ge .55$)
D	1/4" TAPCONS W/ 1 1/4" EMBEDMENT INTO 3000 PSI CONCRETE
E	1/4" TAPCONS W/ 1 1/4" EMBEDMENT INTO C90-HOLLOW BLOCK
F	1/4" TAPCONS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_q \ge .55$)
G	#14 SCREWS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_q \ge .55$)

HARDWARE LAYOUT

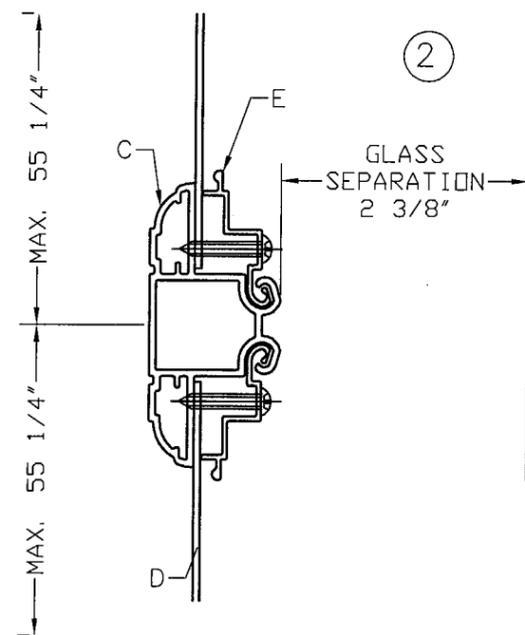


ANCHOR LAYOUT



PERIMETER ANCHORS SPACING:

ANCHOR TYPE	SPACING (S)
A, C, D, E, F, G	12" OC
B	9" OC



MANUFACTURER:

KANE

MANUFACTURING CORPORATION
515 NORTH FRALEY St.
KANE, PA 16735
TEL.: (814) 837-6464
FAX.: (814) 837-6230

PRODUCT:

Aluminum Van Guard II
HURRICANE BARRIER

Engineering:

EngCo Inc.

CA 8116
6971 W. Sunrise Blvd. 104
Plantation, FL 33313
ENGCO@AOL.COM



DRAFTING:

PK DRAFTING & MORE

MIAMI-DADE BCCO:

PRODUCT REVISED
as complying with the Florida
Building Code
Acceptance No 10-0223.01
Expiration Date 09/12/2012

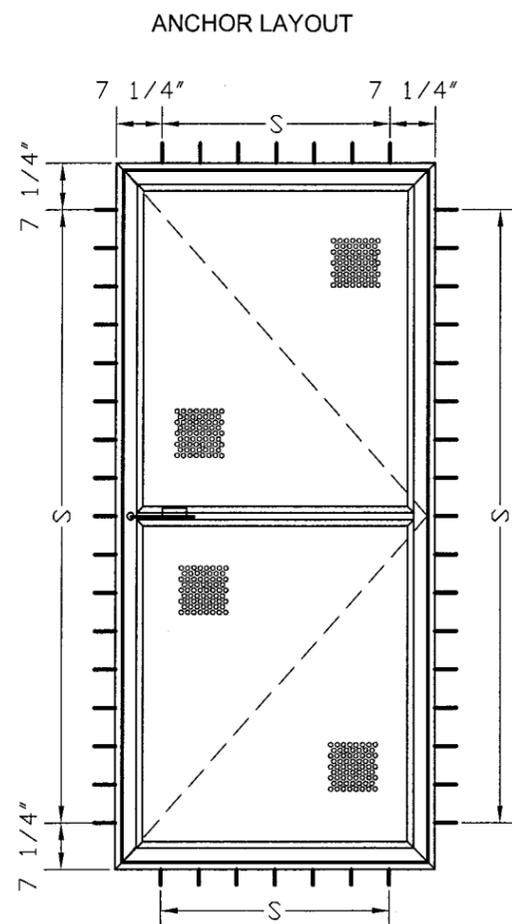
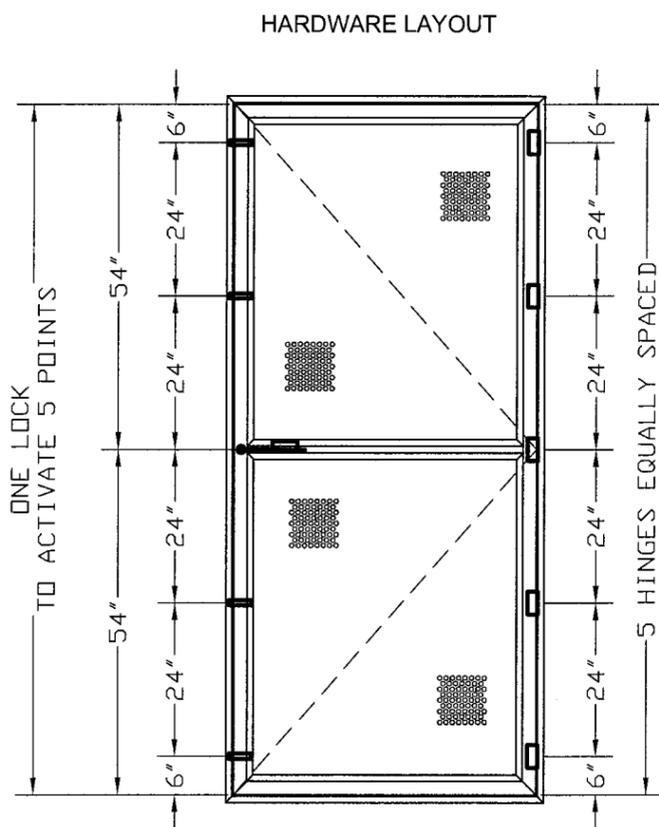
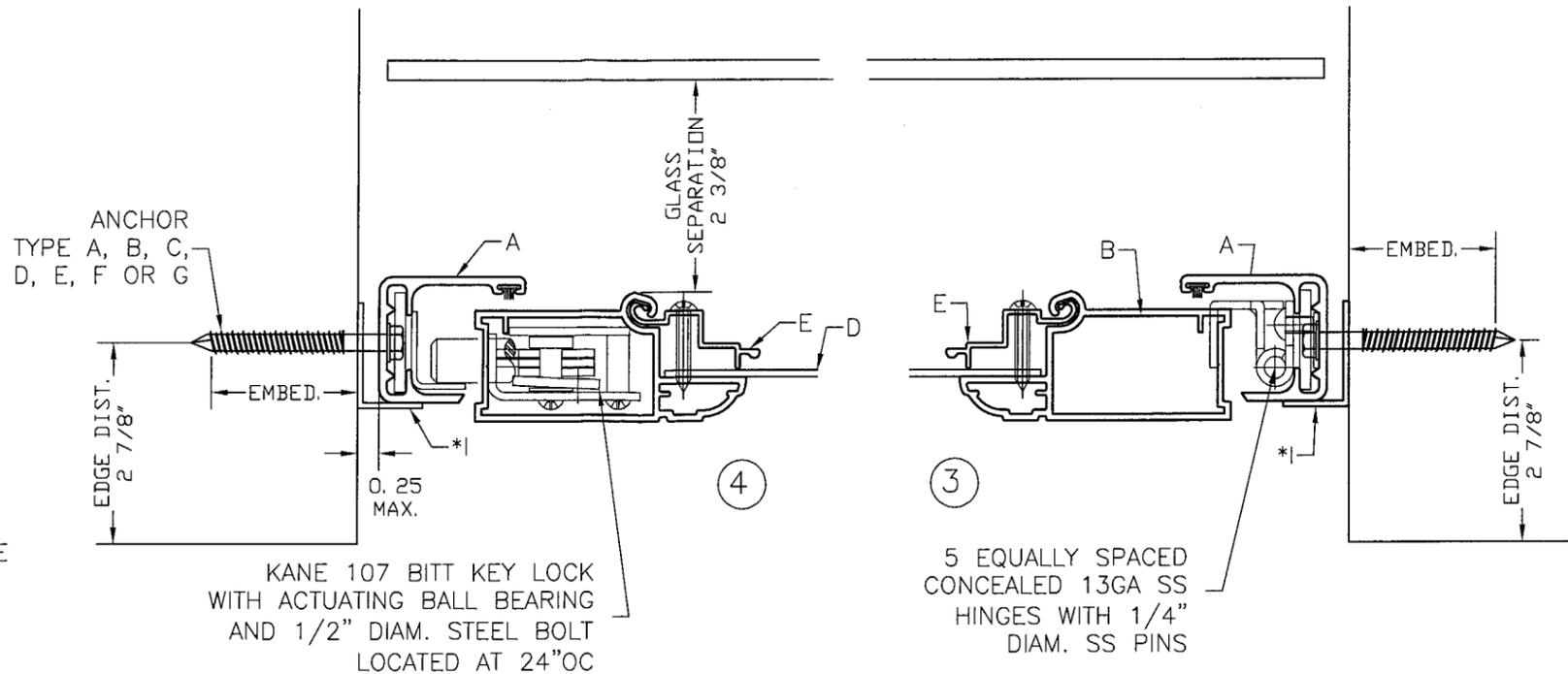
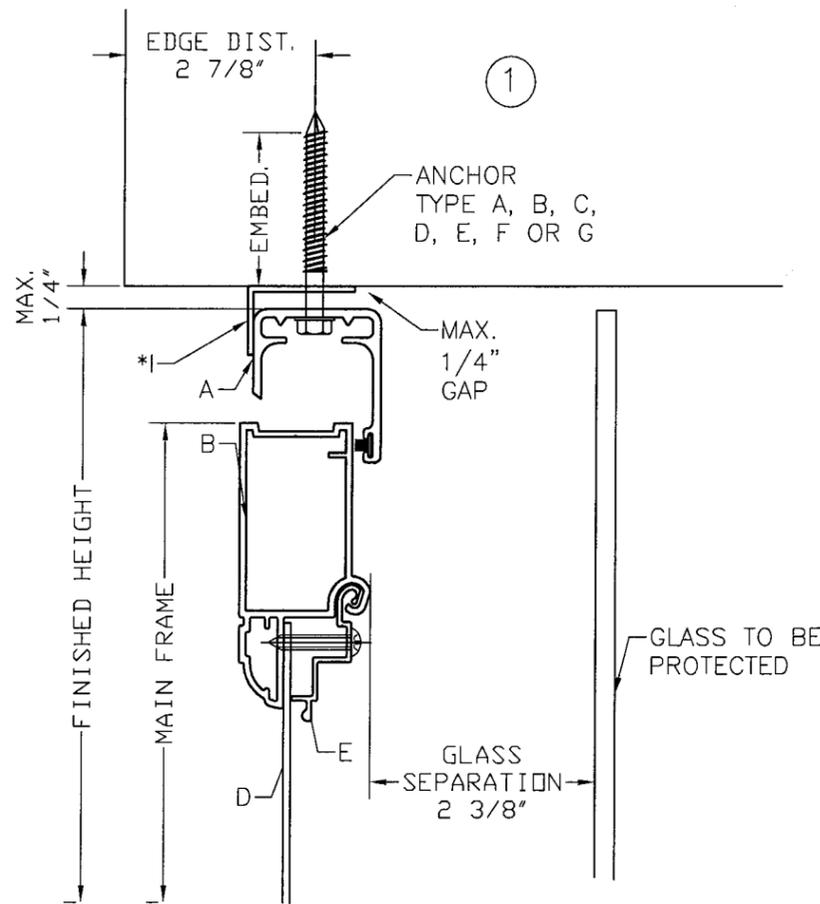
By *Heather A. Miller*
Miami Dade Product Control
Division

DATE: 02/16/2010
SCALE: NA
DESIGN BY: PPMF

Drawing Number
10-033

SHEET
2 of 5

REVEAL MOUNT



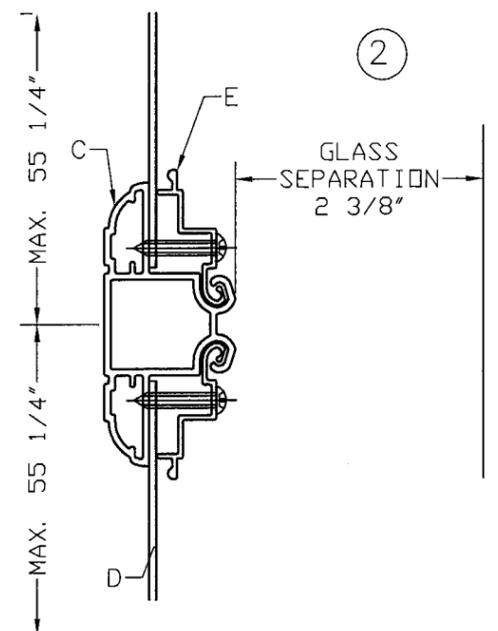
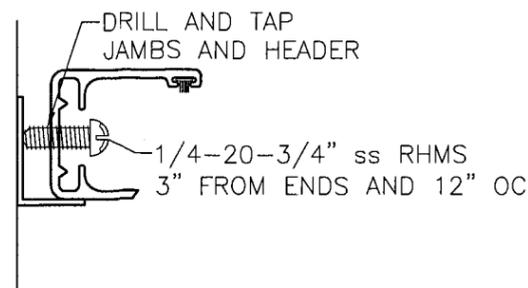
ANCHOR NOTES:

TYPE	DESCRIPTION
A	#14 SCREWS W/ #10-14 SCRU-LEAD W/ 1 1/2" EMBEDMENT INTO 2000 PSI CONCRETE
B	#14 SCREWS W/ #10-14 SCRU-LEAD W/ 1" EMBEDMENT INTO C90-HOLLOW BLOCK
C	#12 SCREWS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_g \ge .55$)
D	1/4" TAPCONS W/ 1 1/4" EMBEDMENT INTO 3000 PSI CONCRETE
E	1/4" TAPCONS W/ 1 1/4" EMBEDMENT INTO C90-HOLLOW BLOCK
F	1/4" TAPCONS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_g \ge .55$)
G	#14 SCREWS W/ 1 1/2" MIN. EMBEDMENT INTO WOOD ($s_g \ge .55$)

PERIMETER ANCHORS SPACING:

ANCHOR TYPE	SPACING (S)
D, E, F	12 OC
A, B, G	9 OC
C	6 OC

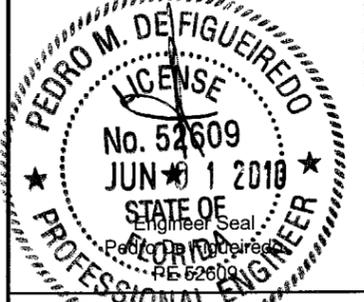
*** SCRIBE ANGLE NOTES:**
 1- SCRIBE ANGLE ARE USED ONLY AT HEADER AND JAMBS.
 2- 1/4-20-3/4" ss RHMS ARE TO BE USED WITH MAX. 12" OC SPACING AS SHOWN BELOW.
 3- MAXIMUM GAP BETWEEN MAIN FRAMING AND SCRIBE ANGLE MUST NOT EXCEED 1/4".



MANUFACTURER:
KANE
 MANUFACTURING CORPORATION
 515 NORTH FRALEY St.
 KANE, PA 16735
 TEL.: (814) 837-6464
 FAX.: (814) 837-6230

PRODUCT:
Aluminum Van Guard II
 HURRICANE BARRIER

Engineering:
EngCo Inc.
 CA 8116
 6971 W. Sunrise Blvd. 104
 Plantation, FL 33313
 ENGCO@AOL.COM



DRAFTING:
PK DRAFTING & MORE

MIAMI-DADE BCCO:

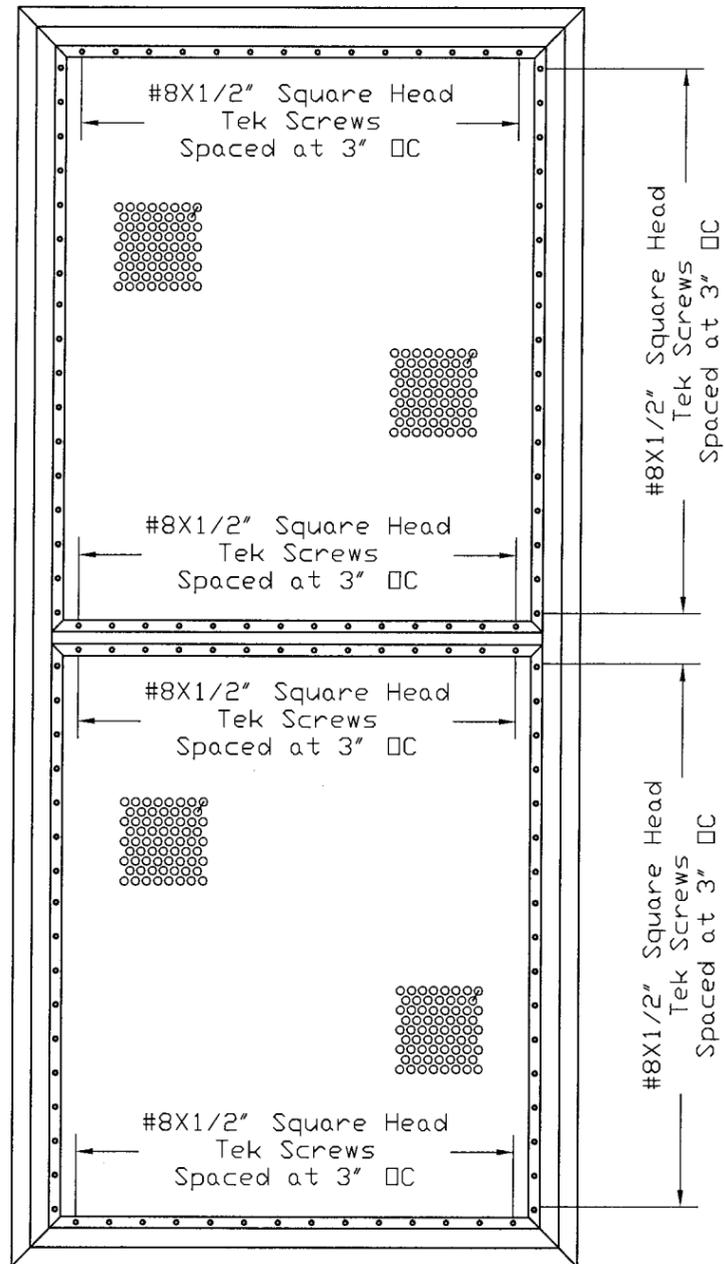
PRODUCT REVISED as complying with the Florida Building Code
 Acceptance No 10-0223.01
 Expiration Date 09/12/2012
 By *Heather A. Miller*
 Miami Dade Product Control Division

DATE: 02/16/2010
 SCALE: NA
 DESIGN BY: PPMF

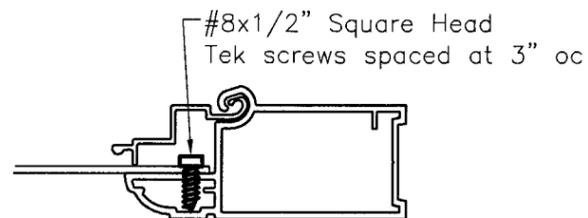
Drawing Number
10-033

SHEET
3 of 5

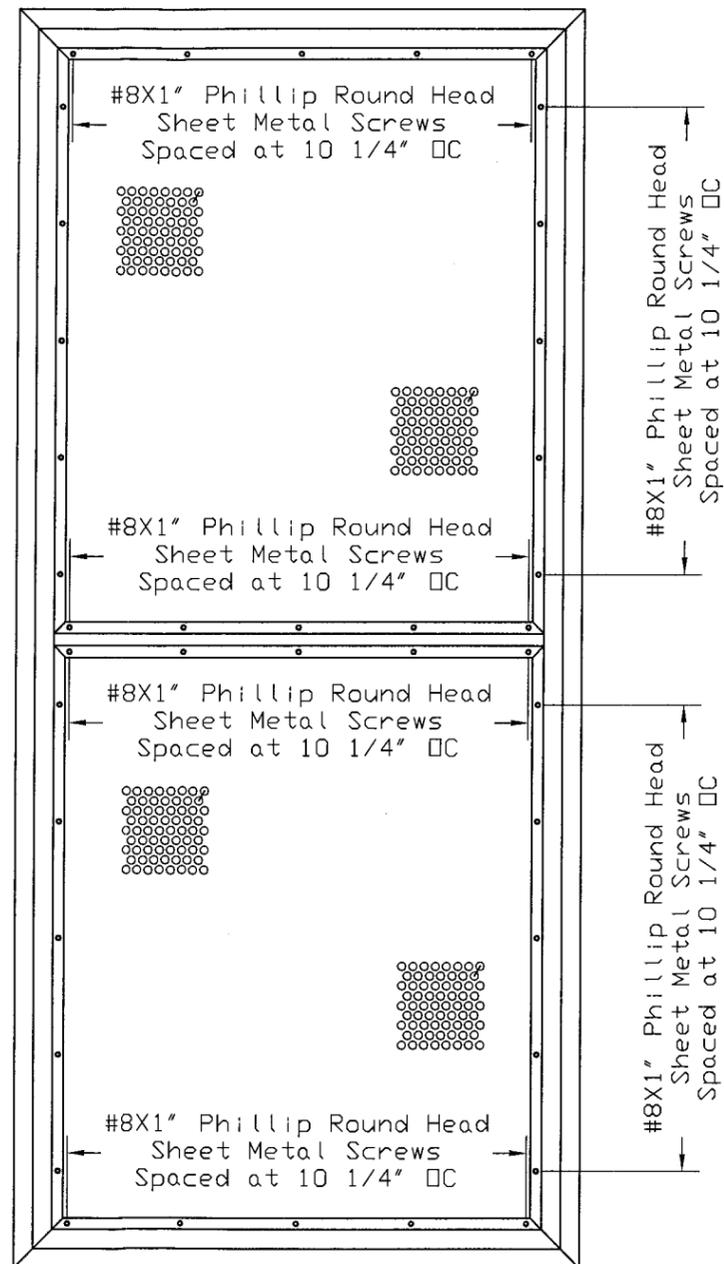
REAR SHUTTER ELEVATION
TYPICAL PERFORATED SCREEN
ASSEMBLY SCREWS LAY-OUT



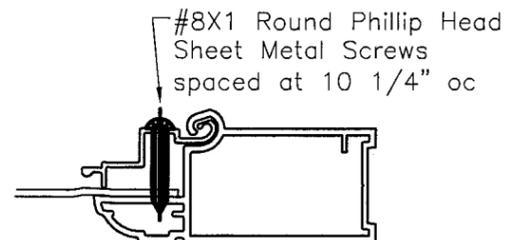
TYPICAL SECTION



REAR SHUTTER ELEVATION
TYPICAL MAIN FRAME COVER
ASSEMBLY SCREWS LAY-OUT



TYPICAL SECTION



MANUFACTURER:
KANE
MANUFACTURING
CORPORATION
515 NORTH FRALEY St.
KANE, PA 16735
TEL.: (814) 837-6464
FAX.: (814) 837-6230

PRODUCT:
**Aluminum
Van Guard II**
HURRICANE BARRIER

Engineering:
EngCo Inc.
CA 8116
6971 W. Sunrise Blvd. 104
Plantation, Fl. 33313
ENGCO@AOL.COM



DRAFTING
PK DRAFTING & MORE

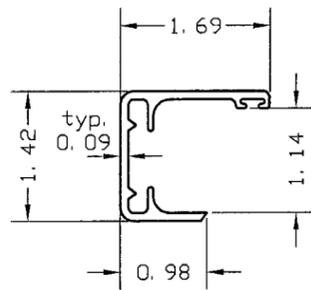
MIAMI-DADE BCCO:

PRODUCT REVISED
as complying with the Florida
Building Code
Acceptance No 10-0223.01
Expiration Date 09/12/2012
By *Helmy A. Mohr*
Miami Dade Product Control
Division

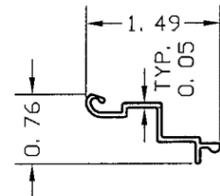
DATE: 02/16/2010
SCALE: NA
DESIGN BY: PPMF

Drawing Number
10-033

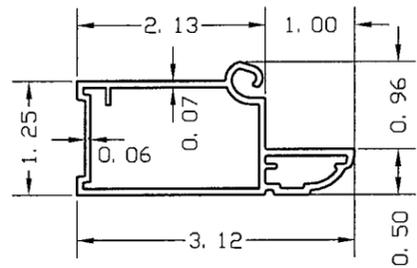
SHEET
4 of 5



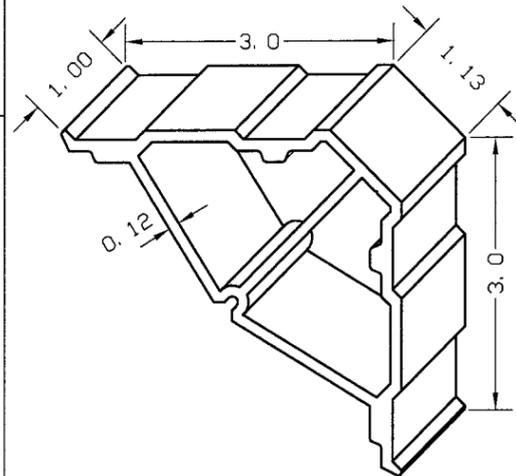
A- SUB FRAME
6063-T6



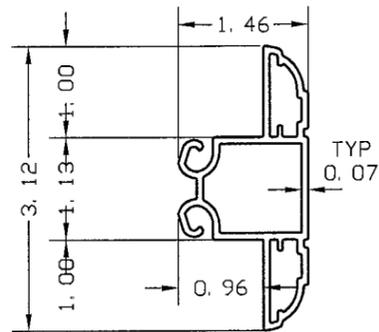
E- MAINFRAME COVER
6063-T6



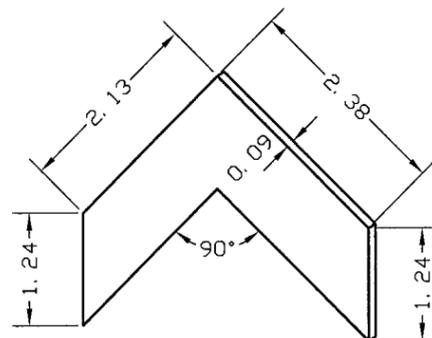
B- MAIN FRAME
6063-T6



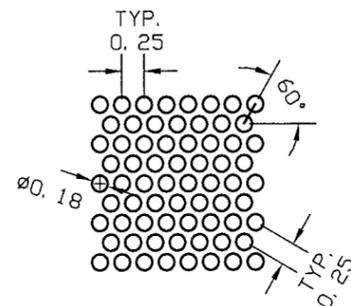
F- MAIN FRAME CORNER KEY
6063-T6



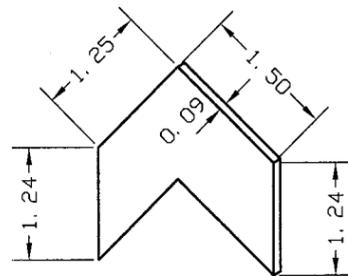
C- HORIZONTAL BRACE
6063-T6



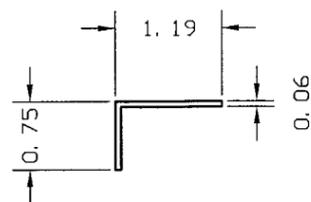
G- MAIN FRAME
SECONDARY CORNER KEY
6063-T6



D- 14GA (.0785")
GALVANNEALED PERFORATED
STEEL

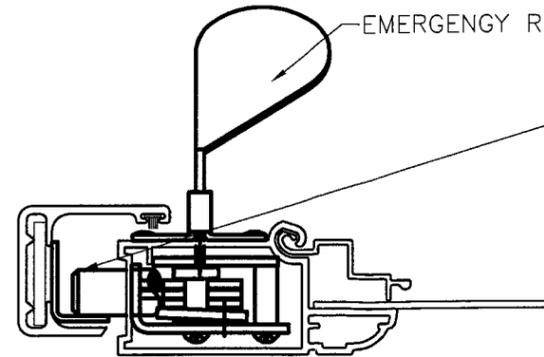


H- HORIZONTAL BRACE
CORNER KEY
6063-T6

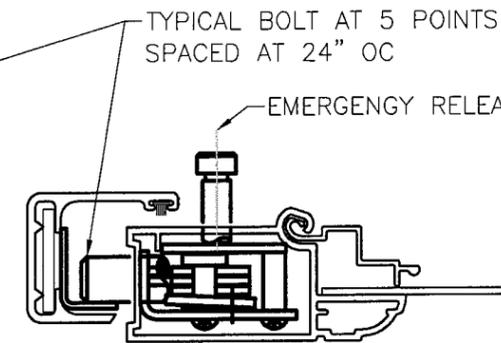


I- SCRIBE ANGLE
6063-T6

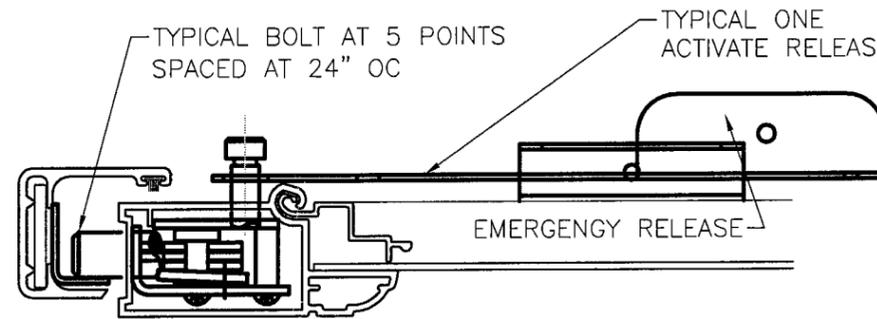
EMERGENCY LOCK RELEASE OPTIONS



PUSH QUICK RELEASE



LIFT QUICK RELEASE

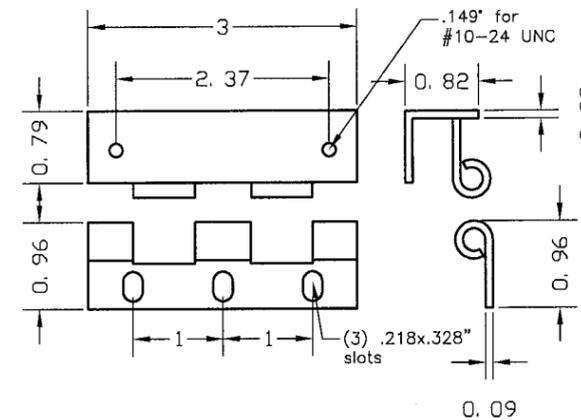


DOWN QUICK RELEASE

TYPICAL BOLT AT 5 POINTS
SPACED AT 24" OC

TYPICAL ONE
ACTIVATE RELEASE

KANE 107 BITT KEY LOCK
WITH ACTUATING BALL BEARING
AND (5) 1/2" DIAM. STEEL BOLT
LOCATED AT 24" OC



TYPICAL HINGE
13 GA SS WITH 1/4" DIAM SS PIN

MANUFACTURER:
KANE

MANUFACTURING
CORPORATION
515 NORTH FRALEY St.
KANE, PA 16735
TEL.: (814) 837-6464
FAX.: (814) 837-6230

PRODUCT:
**Aluminum
Van Guard II**
HURRICANE BARRIER

Engineering:
EngCo Inc.
CA 8116
6971 W. Sunrise Blvd. 104
Plantation, Fl. 33313
ENGCO@AOL.COM



DRAFTING:
PK DRAFTING & MORE

MIAMI-DADE BCCO:

PRODUCT REVISED
as complying with the Florida
Building Code
Acceptance No 10-0223.01
Expiration Date 09/12/2012
By *Heather A. Miller*
Miami Dade Product Control
Division

DATE: 02/16/2010
SCALE: NA
DESIGN BY: PPMF

Drawing Number
10-033

SHEET
5 of 5