



DEPARTMENT OF REGULATORY AND ECONOMIC RESOURCES (RER)  
 BOARD AND CODE ADMINISTRATION DIVISION  
**NOTICE OF ACCEPTANCE (NOA)**

MIAMI-DADE COUNTY  
 PRODUCT CONTROL SECTION  
 11805 SW 26 Street, Room 208  
 Miami, Florida 33175-2474  
 T (786) 315-2590 F (786) 315-2599  
[www.miamidade.gov/economy](http://www.miamidade.gov/economy)

**Mulia, Inc.**  
 16320 Bloomfield Avenue  
 Cerritos, CA 90703

**SCOPE:**

This NOA is being issued under the applicable rules and regulations governing the use of construction materials. The documentation submitted has been reviewed and accepted by Miami-Dade County RER-Product Control Section 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 Section (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. RER reserves the right to revoke this acceptance, if it is determined by Miami-Dade County Product Control Section 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: Glass Block Window – N.I.**

**APPROVAL DOCUMENT:** Drawing No. **04-03**, titled “Glass Block Panel Details”, sheets 1 and 2 of 2, dated 01/23/2004, with revision F dated 11/23/2015, prepared by Al-Farooq Corporation, signed and sealed by Javad Ahmad, P.E., bearing the Miami-Dade County Product Control revision stamp with the Notice of Acceptance number and expiration date by the Miami-Dade County Product Control Section.

**MISSILE IMPACT RATING: None**

**LABELING:** Each glass block shall be permanently labeled with the manufacturer's name (MULIA) and (M) standing for Miami-Dade County.

**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 **renews and revises NOA # 12-0501.11** and consists of this page 1 and evidence page E-1, as well as approval document mentioned above.

The submitted documentation was reviewed by **Carlos M. Utrera, P.E.**



*Utrera*  
 03/02/2016

NOA No. 15-0916.12  
 Expiration Date: October 23, 2020  
 Approval Date: March 10, 2016  
 Page 1

**NOTICE OF ACCEPTANCE: EVIDENCE SUBMITTED**

**A. DRAWINGS**

1. Drawing **04-03**, titled "Glass Block Panel Details", sheets 1 and 2 of 2, dated 01/23/2004, with revision F dated 11/23/2015, prepared by Al-Farooq Corporation, signed and sealed by Javad Ahmad, P.E.

**B. TESTS *"Submitted under NOA # 07-0417.02"***

1. Test Report on Uniform Static Air Pressure Test per TAS 202 of "Hollow Glass Block Wall/Window", prepared by Hurricane Engineering & Testing Inc., Test Report No. **HETI 05-1452**, dated 05/16/2005 signed and sealed by Ivonne Ghia, P.E.
2. Test Report on Uniform Static Air Pressure Test per TAS 202 of Hollow Glass Block Wall/Window, prepared by Hurricane Engineering & Testing Inc., Test Report No. **HETI 03-1790**, dated 02/28/2003 signed and sealed by R. Droz-Seda, P.E.

**C. CALCULATIONS**

1. Anchor calculations prepared by Al-Farooq Corporation, dated 09/18/2015, signed and sealed by Javad Ahmad, P.E.  
  
*"Submitted under NOA # 10-0819.03"*
2. Anchor calculations prepared by Al-Farooq Corporation, dated 08/05/2010, signed and sealed by Javad Ahmad, P.E.

**D. QUALITY ASSURANCE**

1. Miami-Dade Department of Regulatory and Economic Resources (RER)

**E. MATERIAL CERTIFICATIONS**

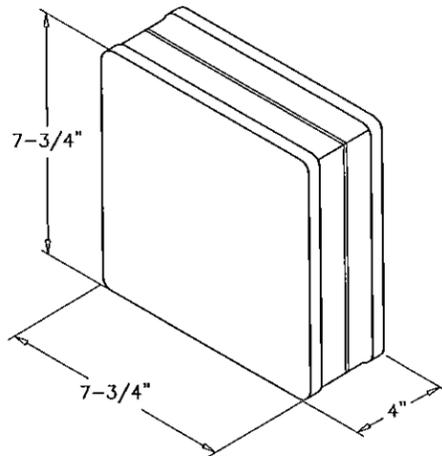
1. None.

**F. STATEMENTS**

1. Statement letter of code conformance to the 5<sup>th</sup> edition (2014) FBC and no financial interest issued by Al-Farooq Corporation, dated 09/18/2015, signed and sealed by Javad Ahmad, P.E.  
  
*"Submitted under NOA # 12-0501.11"*
2. Statement letter of code conformance to 2010 FBC and no financial interest, issued by Al-Farooq Corporation, dated 04/20/2012, signed and sealed by Javad Ahmad, P.E.  
  
*"Submitted under NOA # 10-0819.03"*
3. Distributor agreement dated 10/10/2010.

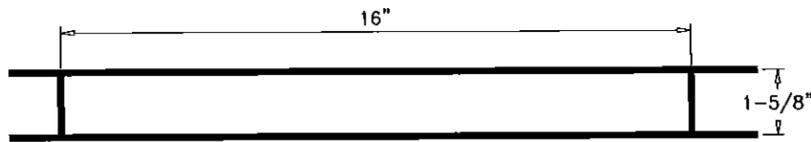
  
03/02/2016

Carlos M. Utrera, P.E.  
Product Control Examiner  
NOA No. 15-0916.12  
Expiration Date: October 23, 2020  
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**GLASS BLOCK**

PARTIALLY EVACUATED HOLLOW UNITS FORMED AND PERMANENTLY SEALED BY HEAT FUSING TWO HALVES OF PRESSED GLASS TOGETHER  
 MANF. BY 'MULIAGLASS'  
 WALL THICKNESS VARIES DEPENDING ON GLASS PATTERN  
 MIN. THK. = .394 IN.



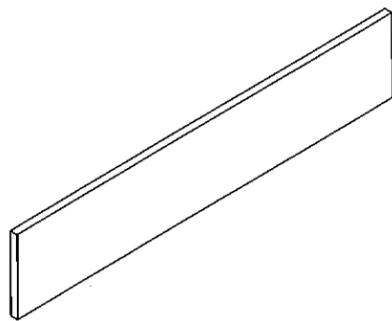
**HORIZONTAL LADDER REINFORCING**

1-5/8" W X 10' L  
 9 GAUGE GALVANIZED STEEL SIDE RODS & CROSS RODS, CROSS RODS @ 16" O.C.



**WALL TIES/ANCHOR STRAP**

20 GA. GALVANIZED STEEL  
 12" LONG, 1-3/4" WIDE



**EXPANSION STRIP**  
 POLYETHYLENE PLASTIC  
 1/4" THICK X 3-1/2" WIDE

MAXIMUM DESIGN LOAD RATING = + 90.0 PSF  
 (FOR SIZE SHOWN ON SHEET 2 OR SMALLER) - 90.0 PSF

**GLASS BLOCK PANELS**

GLASS BLOCK PANELS NOT RATED FOR IMPACT.

INSTALLATION OF THIS PRODUCT IN THE HVHZ AREA REQUIRES THE USE OF APPROVED SHUTTERS OR EXTERNAL PROTECTION DEVICES COMPLYING WITH HVHZ REQUIREMENTS.

INSTALLATION OF THIS SYSTEM OUTSIDE THE HVHZ AREA SHALL MEET THE APPLICABLE REQUIREMENTS FOR WIND BORNE DEBRIS PROTECTION.

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

ANCHORS SHALL BE AS LISTED, SPACED AS SHOWN ON DETAILS, ANCHORS EMBEDMENT TO BASE MATERIAL SHALL BE BEYOND WALL DRESSING OR STUCCO.

ANCHORING OR LOADING CONDITIONS NOT SHOWN IN THESE DETAILS ARE NOT PART OF THIS APPROVAL.

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

THE STRUCTURE AROUND GLASS MASONRY PANEL SHALL BE DESIGNED TO SUSTAIN LOADS IMPOSED BY THE GLASS BLOCKS.

GLASS BLOCK STRUCTURES ARE NON-LOAD BEARING. ADEQUATE PROVISION MUST BE MADE FOR SUPPORT OF CONSTRUCTION ABOVE GLASS BLOCK PANELS.

PROVISION FOR EXPANSION AND MOVEMENT MUST BE MADE AT JAMBS AND HEADS OF ALL PANELS. MORTAR MUST NOT BRIDGE EXPANSION SPACES. EXPANSION STRIPS SHALL BE POLYETHYLENE AS SHOWN HERewith.

PANEL REINFORCING SHALL BE OF GALVANIZED STEEL DOUBLE-WIRE FORMED OF TWO PARALLEL 9-GAUGE WIRES 1-5/8" O.C. WITH ELECTRICALLY WELDED CROSS WIRES AT REGULAR INTERVALS.

PANEL ANCHOR/WALL TIES SHALL BE 20-GAUGE PERFORATED STEEL STRIPS 12" LONG BY 1-3/4" WIDE GALVANIZED AFTER PERFORATING.

GLASS BLOCK SHALL BE LAID IN ONLY TYPE 'M' OR 'S' MORTAR OR EQUIVALENT APPROVED MATERIAL. BOTH VERTICAL AND HORIZONTAL MORTAR JOINTS SHALL BE AT LEAST ONE-EIGHTH AND NOT MORE THAN THREE-EIGHTHS INCH THICK AND SHALL BE COMPLETELY FILLED.

Engr: JAVAD AHMAD  
 CIVIL  
 FLA. PE # 70592  
 C.A.N. 3538

*[Signature]*  
 DEC 02 2015

**PRODUCT REVISED**  
 as complying with the Florida Building Code  
 Acceptance No 15-0916.12  
 Expiration Date 10/23/2020

By *[Signature]*  
 Miami Trade Product Control

**af c**  
**AL-FAROOQ CORPORATION**  
 ENGINEERS & PRODUCT DEVELOPMENT  
 1235 S.W. 87 AVE  
 MIAMI, FLORIDA 33174  
 TEL. (305) 264-8100 FAX. (305) 262-6978  
 BLOCKS\04-03MI

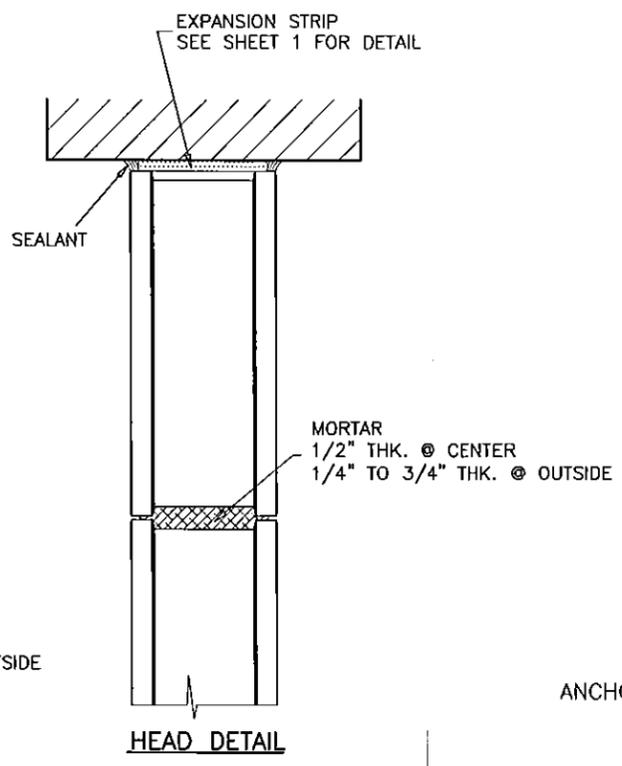
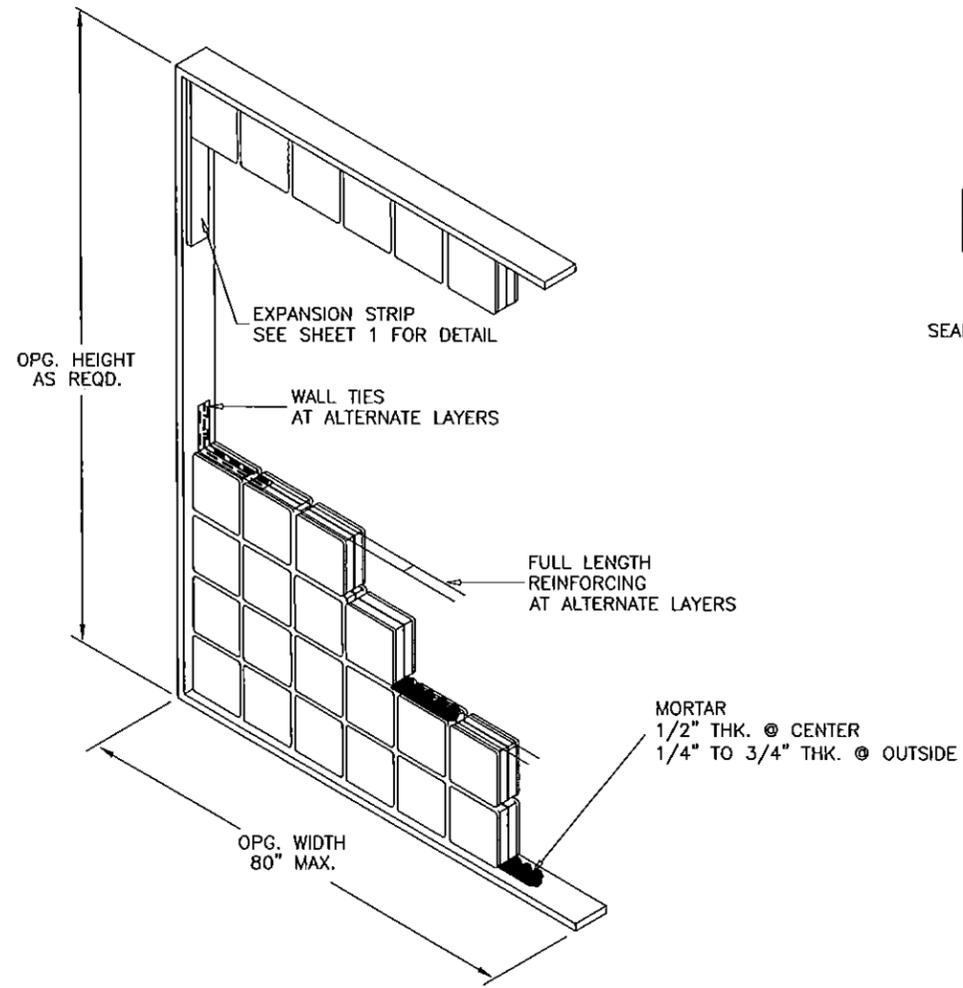
**MULIA INC.**  
 16320 BLOOMFIELD AVE.  
 CERRITOS, CA. 90703  
 TEL. (562) 345-2777 FAX (562) 345-2776

no	date	by	description
B	07.20.05	REV. PER BCCO COMMENTS	
C	08.05.10	UPDATED FOR 2007 FBC	
D	04.20.12	UPDATED TO 2010 FBC	
E	09.18.15	UPDATED TO 2014 FBC	
F	11.23.15	REV. PER PER COMMENTS	

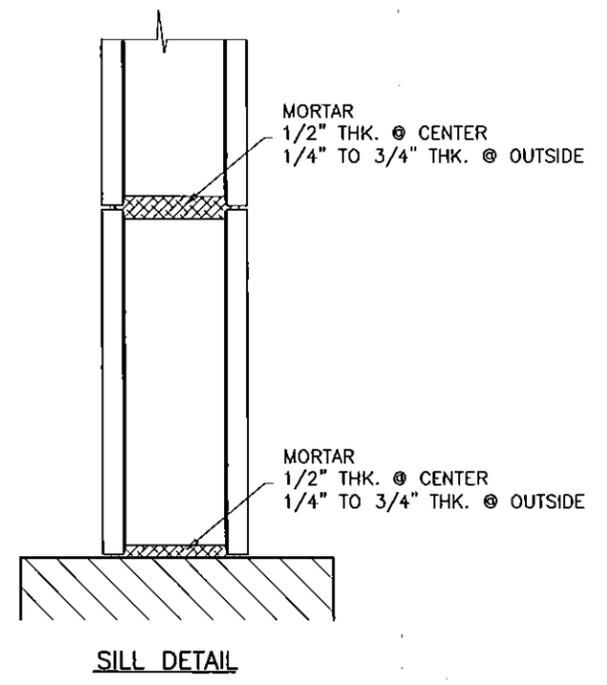
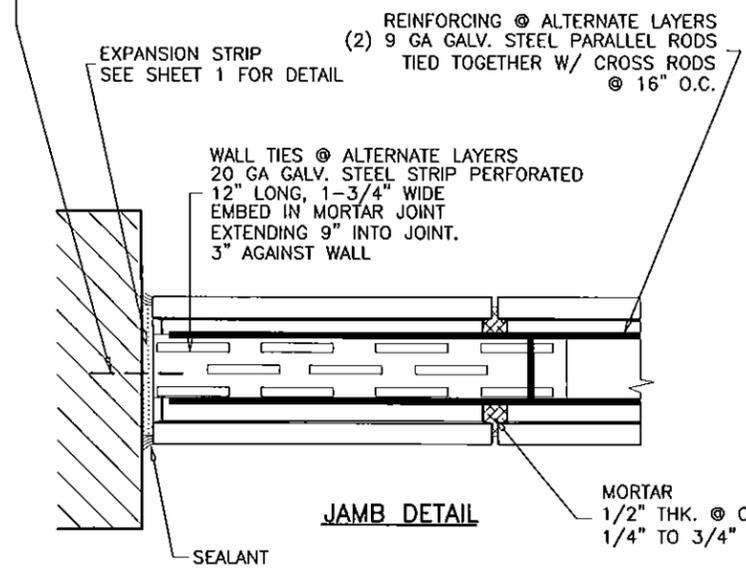
date: 01-23-04  
 scale: NONE  
 dr. by: HAMID  
 chk. by:

drawing no.  
**04-03**

sheet 1 of 2



ANCHOR TYPE	CONNECTION CAPACITY - PSF					
	ONE ANCHOR PER STRAP			TWO ANCHORS PER STRAP		
	CONC	BLK.	WOOD	CONC	BLK.	WOOD
A	88.0	34.0	-	90.0	68.0	-
B	-	-	43.0	-	-	86.0



**TYPICAL ANCHORS:**

- ANCHOR (A) = 1/4" DIA. HEX FLANGE HEAD ULTRACON BY 'ELCO' (Fu=177 KSI, Fy=155 KSI)  
 1-3/4" EMBEDMENT INTO CONCRETE  
 1-1/4" EMBEDMENT INTO MASONRY BLOCK
- ANCHOR (B) = #14 SMS (GRADE 2 CRS) WITH 3/4" MIN. STEEL WASHER  
 1-1/2" MIN PENETRATION INTO WOOD

**TYPICAL EDGE DISTANCE**

INTO CONCRETE AND MASONRY = 3" MIN.  
 INTO WOOD STRUCTURE = 1" MIN.

**TYPICAL C/C SPACING**

INTO CONCRETE AND MASONRY = 3" MIN.  
 INTO WOOD STRUCTURE = 1" MIN.

WOOD SG = 0.55 MIN.  
 CONCRETE f'c = 3000 PSI MIN.  
 C-90 HOLLOW/FILLED BLOCK f'm = 2000 PSI MIN.

NOTE:  
 ANCHORS EMBEDMENT SHOWN IS BEYOND WALL & FLOOR COVERINGS (STUCCO, TILES, ETC.)

Engr: JAVAD AHMAD  
 CIVIL  
 FLA. PE # 70592  
 C.A.N. 3538

DEC 02 2015

PRODUCT REVISED as complying with the Florida Building Code  
 Acceptance No 15-0916.12  
 Expiration Date 10/23/2020

By *[Signature]*  
 Minto Florida Product Control

**af c**

**AL-FAROOQ CORPORATION**  
 ENGINEERS & PRODUCT DEVELOPMENT  
 1235 S.W. 87 AVE  
 MIAMI, FLORIDA 33174  
 TEL. (305) 264-8100 FAX. (305) 262-6978

BLOCKS\04-03M

GLASS BLOCK PANEL DETAILS

**MULIA INC.**  
 16320 BLOOMFIELD AVE.  
 CERRITOS, CA. 90703  
 TEL. (562) 345-2777 FAX (562) 345-2776

no	date	by	description
B	07.20.05		REV. PER BCCO COMMENTS
C	08.05.10		UPDATED FOR 2007 FBC
D	04.20.12		NO CHANGE THIS SHEET
E	09.18.15		UPDATED TO 2014 FBC
F	11.23.15		REV. PER RER COMMENTS

date: 01-23-04  
 scale: NONE  
 dr. by: HAMID  
 chk. by:

drawing no. 04-03  
 sheet 2 of 2