

From: The Columbia County Building & Zoning Department
Plan Review
135 NE Hernando Av.
P.O. Box 1529
Lake City Florida 32056-1529

Reference to a building permit application Number: **0605-56**

Contractor: Compass Builders Owners Joey & Lydia Nickelson parcel number
01-5s-16-03390-016

On the date of May 18, 2006 application 0605-56 and plans for construction of a single family dwelling were reviewed and the following information or alteration to the plans will be required to continue processing this application. If you should have any question please contact the above address, or contact phone number (386) 758-1163 or fax any information to (386) 754-7088.

Please include application number 0605-56 when making reference to this application.

- ✓ 1. Please make application for a 911 address by contacting the Emergency Management -911 Addressing Mr. Ronnie McCardel @ (386) 758-1125.
- ✓ 2. Please provide a copy of a signed released site plan from the Columbia County Environmental Health Department which confirms approval of the waste water disposal system.

3. Please submit the documentation as required by Florida statute Chapter 489 to perform any acts which constitute contracting as licensed certified building contractor.
- ✓ 4. Please submit a letter from the potable water well contractor which will describe the equipment to be used to supply potable water to this dwelling. Include the size of pump motor, size of pressure tank and cycle stop valve if used.
- ✓ 5. Please show compliance with the FRC-2004 Sections R311.5.3 Stair treads and risers. R311.5.3.1 Riser height. The maximum riser height shall be $7\frac{3}{4}$ inches (196 mm). The riser shall be measured vertically between leading edges of the adjacent treads. The greatest riser height within any flight of stairs shall not exceed the smallest by more than $\frac{3}{8}$ inch (9.5 mm). R311.5.3.2 Tread depth. The minimum tread depth, exclusive of nosing, shall be not less than 9 inches (229 mm). Treads and risers of stairs shall be permitted to be so proportioned that the sum of two risers and a tread, exclusive of projection of nosing, is not less than 24 inches (610 mm) nor more than 25 inches (635 mm). The tread depth shall be measured horizontally between the vertical planes of the foremost projection of adjacent treads and at a right angle to the tread's leading edge. The greatest tread depth within any flight of stairs shall not exceed the smallest by more than $\frac{3}{8}$ inch (9.5 mm). Winder treads shall have a minimum tread depth of 10 inches (254 mm) measured as above at a point 12 inches (305) mm from the side where the treads are narrower. Winder treads shall have a minimum tread depth of 6 inches (152 mm) at any point. Within any flight of stairs, the greatest winder tread depth at the

12 inch (305 mm) walk line shall not exceed the smallest by more than 3/8 inch (9.5 mm).

6. The plans indicate that an air handler unit will be located on the second floor of the dwelling near the bonus room area. Please indicate on the plans that compliance with the FRM-2004 section M1305.1.3 Appliances in attics. Attics containing appliances requiring access shall be provided with an opening and unobstructed passageway large enough to allow removal of the largest appliance. The passageway shall not be less than 30 inches (762 mm) high and 22 inches (559 mm) wide and not more than 6 feet (1829 mm) in length measured along the centerline of the passageway from the attic access opening to the appliance's service panel. The passageway shall have continuous solid flooring not less than 24 inches (610 mm) wide. A level service space not less than 30 inches (762 mm) deep and 30 inches (762 mm) wide shall be present at the front or service side of the appliance. The clear access opening dimensions shall be a minimum of 20 inches by 30 inches (508 mm by 762 mm), where such dimensions are large enough to allow removal of the largest appliance. Exception: The passageway and level service space are not required where the appliance is capable of being serviced and removed through the required opening. M1305.1.3.1 Electrical requirements. A lighting fixture with receptacle outlet, controlled by a switch located at the passageway opening, shall be provided so as to light the passageway and service area and installed in accordance with Chapter 33 of this code. M1305.1.3.2 Air-handling units. Air-handling units shall be allowed in attics if the following conditions are met:

1. The service panel of the equipment is located within 6 feet (1829 mm) of an attic access.
2. A device is installed to alert the owner or shut the unit down when the condensation drain is not working properly.
3. The attic access opening is of sufficient size to replace the air handler.
4. A notice is posted on the electric service panel indicating to the homeowner that the air handler is located in the attic. Said notice shall be in all capitals, in 16 point type, with the title and first paragraph in bold: NOTICE TO HOMEOWNER
A PART OF YOUR AIR CONDITIONING SYSTEM, THE AIR HANDLER, IS
LOCATED IN THE ATTIC. FOR PROPER, EFFICIENT, AND ECONOMIC
OPERATION OF THE AIR CONDITIONING SYSTEM, YOU MUST ENSURE THAT
REGULAR MAINTENANCE IS PERFORMED. YOUR AIR CONDITIONING
SYSTEM IS EQUIPPED WITH ONE OR BOTH OF THE FOLLOWING:
A DEVICE THAT WILL ALERT YOU WHEN THE CONDENSATION DRAIN IS NOT
WORKING PROPERLY OR A DEVICE THAT WILL SHUT THE SYSTEM DOWN
WHEN THE CONDENSATION DRAIN IS NOT WORKING. TO LIMIT POTENTIAL
DAMAGE TO YOUR HOME, AND TO AVOID DISRUPTION OF SERVICE, IT IS
RECOMMENDED THAT YOU ENSURE PROPER WORKING ORDER OF THESE
DEVICES BEFORE EACH SEASON OF PEAK OPERATION.
7. The electrical plan shows the location of the electrical service, Please indicate on the electrical plan that an overcurrent protection device will be installed on the exterior of structures to serve as a disconnecting means. Conductors used from

the exterior disconnecting means to a panel or sub panel shall have four-wire conductors, of which one conductor shall be used as an equipment ground.

8. The front elevation drawing indicates that the second story bonus room area will have an egress door which opens onto to a balcony. Please show on the plans the construction design and supporting attachments of this balcony onto the structure along with the guard rail design and attachment method. Show that the supporting system will be so designed to provide for a live load floor rating of 60 pound per square foot for exterior balconies.

9. Line 6, conditioned area square footage on form 600A-2004 of the Florida Energy Efficiency Code for Building Construction doesn't include the bonus room area (324 square feet) concur that this area will not be conditioned floor space.

10. The front elevation drawing indicates that a field framed roof system will be employed to cover the window seat area in bedroom # 2. Please submit a detail which will show the roof framing system along with the structural design and the required windload information.

Thank you,



Joe Haltiwanger
Plan Examiner
Columbia County Building Department

From: The Columbia County Building & Zoning Department
Plan Review
135 NE Hernando Av.
P.O. Box 1529
Lake City Florida 32056-1529



Phone Number 386-758-1163
Fax Number 386-754-7088

FAX TRANSMITTAL FORM

To:
Name: Linda Roder
CC: Building permit application 0605-56
Phone: 752-2281
Fax: 752-2282

From:
Date Sent: 05/18/06

Number of Pages: Six

Message: Reference to a building permit application Number: 0605-56

Contractor: Compass Builders Owners Joey & Lydia Nickelson parcel number 01-5s-16-03390-016

The review of the party to whom it is addressed. It may contain proprietary and/or privileged information protected by law. If you are not the intended recipient, you may not use, copy or distribute this facsimile message or its attachments. If you have received this transmission in error, please immediately telephone the sender above to arrange for its return.



01 JUNE 2006

JOE HALTIWANGER, PLANS REVIEW
COLUMBIA COUNTY, BUILDING DEPT.
COLUMBIA COUNTY COURTHOUSE ANNEX
LAKE CITY, FLORIDA 32055

RE: NICHOLSON RESIDENCE

PLAN REVIEW Nr.: 0605-56

DEAR SIR:

PLEASE BE ADVISED OF THE FOLLOWING CLARIFICATIONS FOR THE ABOVE REFERENCED PROJECT AS THEY RELATE TO YOUR REVIEW COMMENTS:

1. BY OTHERS

2. BY OTHERS

3. BY OTHERS

4. BY OTHERS

5. PLEASE REVIEW THE ATTACHED DRAWING FOR STAIR TREAD/RISE COMPLIANCE WITH FRC-2004 SECTIONS R311.5.3 & R311.5.3.1

6. THE AHU IS ACTUALLY LOCATED IN A SMALL ROOM, WHICH IS PART OF THE ATTIC. IT IS ACCESSED VIA A STANDARD 2868 DOOR WHICH IS SUFFICIENT TO ALLOW PASSAGE OF THE LARGEST PORTION OF THE EQUIPMENT. THE FLOOR AREA IS GREATER THAN 60" X 96" AND PROVIDES SUFFICIENT WORK AREA TO SERVICE THE EQUIPMENT. AN ELECTRICAL DISCONNECT SWITCH SHALL BE LOCATED WITHIN SIX FEET OF THE ACCESS DOOR, ALONG WITH A 120V SERVICE RECEPTACLE AND 60W INC. KEYLESS PORCELAIN LIGHT FIXTURE. FURTHER, A SIGN AS REQUIRED BY SECTION M1305.1.3.2 SHALL BE POSTED ON THE INSIDE SURFACE OF THE ACCESS DOOR. THE AHU SHALL BE EQUIPPED WITH A 4" DEEP DRAIN PAN, WITH A 3/4" PVC DRAIN ARRANGED TO DRIP OVER THE NEAREST PLUMBING FIXTURE, THEREBY NOTIFYING THE HOMEOWNER TO SERVICE THE EQUIPMENT.

PAGE 2

7. REFER TO NOTES ON PAGE A3


8. THE ELEVATION INDICATES A RAILING, HOWEVER THE PLAN VIEW DOES NOT INDICATE A "BALCONY". THE RAILING IS INTENDED TO PROTECT THE OPENING AND SHALL BE ATTACHED TO THE STUD FRAMING WITH A MINIMUM OF 4 - 3/8" ϕ X 5" LAG SCREWS (ONE EACH CORNER).

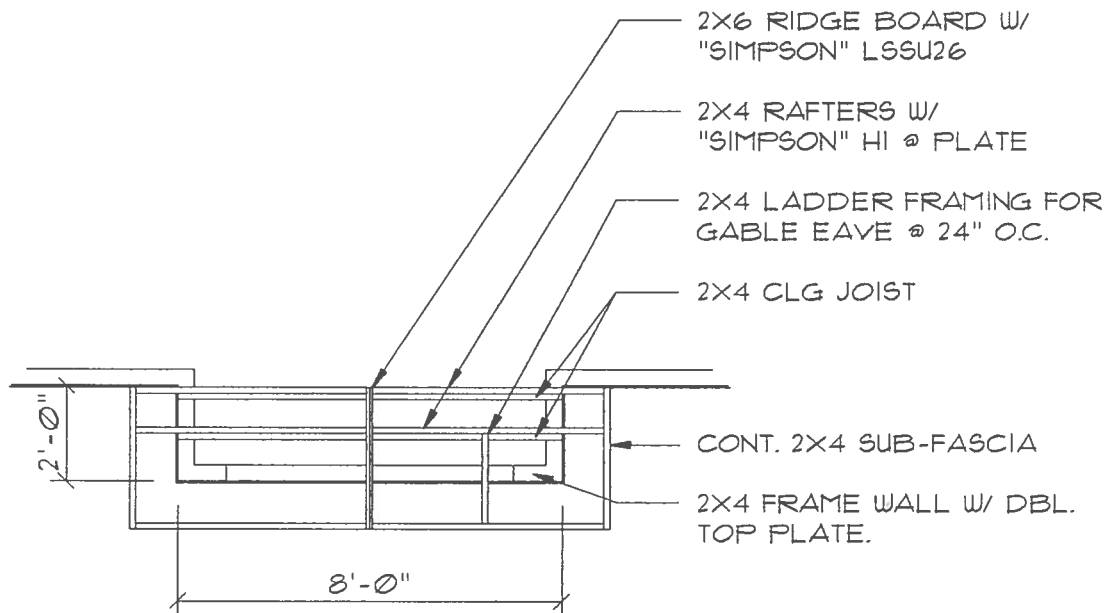
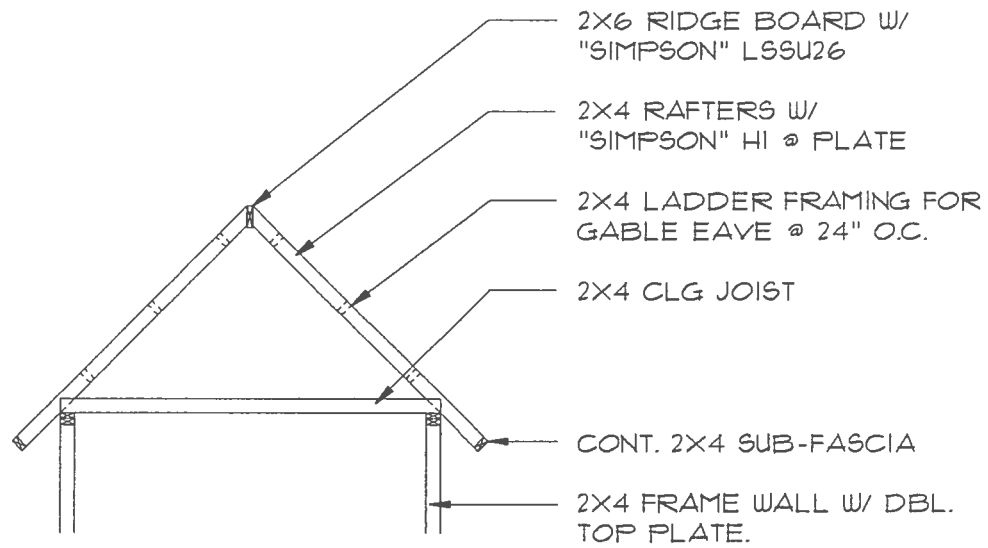
9. THE BONUS ROOM IS NOT INTENDED TO BE CONDITIONED AREA.

10. PLEASE REFER TO THE ATTACHED DRAWING FOR THE ROOF STRUCTURE OVER THE BREAKOUT SEATING AREA.

SHOULD YOU HAVE ANY FURTHER QUESTIONS WITH THIS, PLEASE CALL FOR ASSISTANCE.

YOURS TRULY,
NICHOLAS PAUL GEISLER, ARCHITECT AR0007005

A handwritten signature in black ink, consisting of a stylized 'N' followed by a long horizontal stroke that curves slightly upwards at the end.

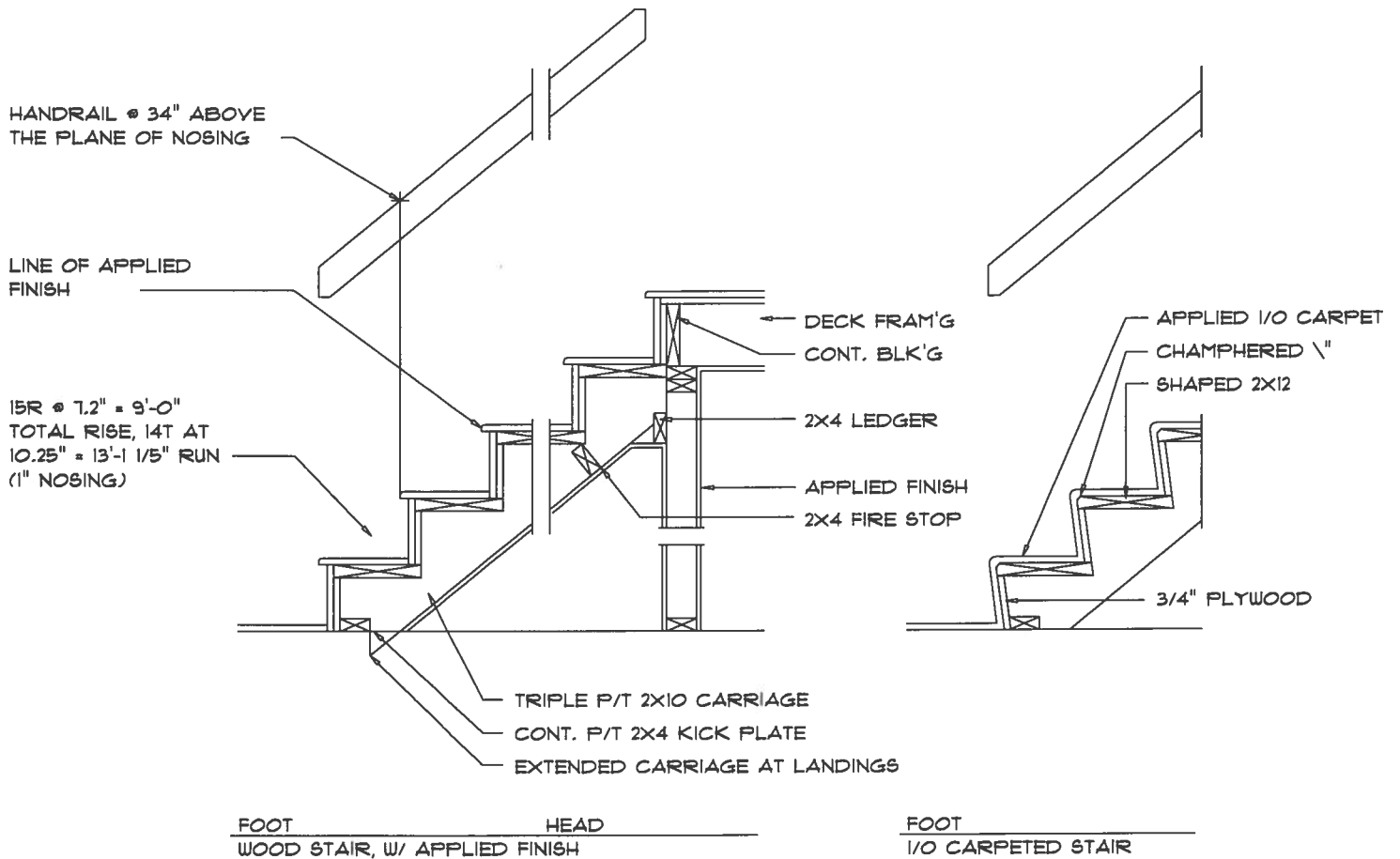


10. ROOF STRUCTURE OVER
THE BREAKOUT SEATING AREA.

[Handwritten Signature]

01 JUN 2006

REVISION TO: 0605-56



Typical Stair DETAIL

SCALE: 3/4" = 1'-0"

[Signature]
23 May 2006
AK7005

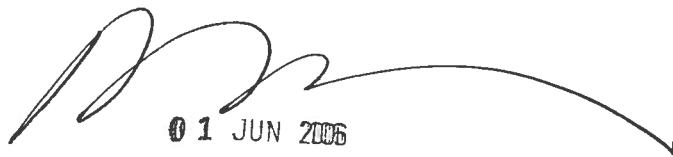
NOTICE TO HOMEOWNER

A PART OF YOUR AIR CONDITIONING SYSTEM, THE AIR HANDLER, IS LOCATED IN THE ATTIC. FOR PROPER, EFFICIENT, AND ECONOMIC OPERATION OF THE AIR CONDITIONING SYSTEM, YOU MUST ENSURE THAT REGULAR MAINTENANCE IS PERFORMED. YOUR AIR CONDITIONING SYSTEM IS EQUIPPED WITH ONE OR BOTH OF THE FOLLOWING:

☒ 1) A DEVICE THAT WILL ALERT YOU WHEN THE CONDENSATION DRAIN IS NOT WORKING PROPERLY OR

☐ 2) A DEVICE THAT WILL SHUT THE SYSTEM DOWN WHEN THE CONDENSATION DRAIN IS NOT WORKING. TO LIMIT POTENTIAL DAMAGE TO YOUR HOME, AND TO AVOID DISRUPTION OF SERVICE, IT IS RECOMMENDED THAT YOU ENSURE PROPER WORKING ORDER OF THESE DEVICES BEFORE EACH SEASON OF PEAK OPERATION.

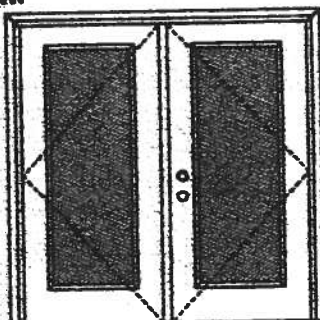
2004 FRC SECTION M1305.1.3.2



01 JUN 2006

WOOD-EDGE STEEL DOORS

APPROVED ARRANGEMENT:



Note:
Units of other sizes are covered by this report as long as the panels used do not exceed 3'0" x 6'8".

Double Door
Maximum unit size = 8'0" x 6'8"

Design Pressure
+40.5/-40.5
Limited water unless special threshold design is used.

Large Missile Impact Resistance
Hurricane protective system (shutters) is REQUIRED.

Actual design pressure and impact resistant requirements for a specific building design and geographic location is determined by ASCE 7-national, state or local building codes specify the edition required.

MINIMUM ASSEMBLY DETAIL:

Compliance requires that minimum assembly details have been followed – see MAD-WL-MA0012-02 and MAD-WL-MA0041-02.

MINIMUM INSTALLATION DETAIL:

Compliance requires that minimum installation details have been followed – see MID-WL-MA0002-02.

APPROVED DOOR STYLES:

1/4 GLASS:



100 Series



133, 136 Series



136 Series



688 Series



822 Series

1/2 GLASS:



106 Series*



106, 100 Series*



129 Series*



200 Series*



12 RA, 23 RA, 34 RA Series*



107 Series*



108 Series



304 Series

*This glass kit may also be used in the following door styles: 5-panel; 5-panel with scroll; Eyebrow 5-panel; Eyebrow 5-panel with scroll.

Johnson
EntrySystems

March 20, 2002
Our continuing program of product improvement makes specifications, design and product detail subject to change without notice.

PREMIUM
Premium Quality Doors

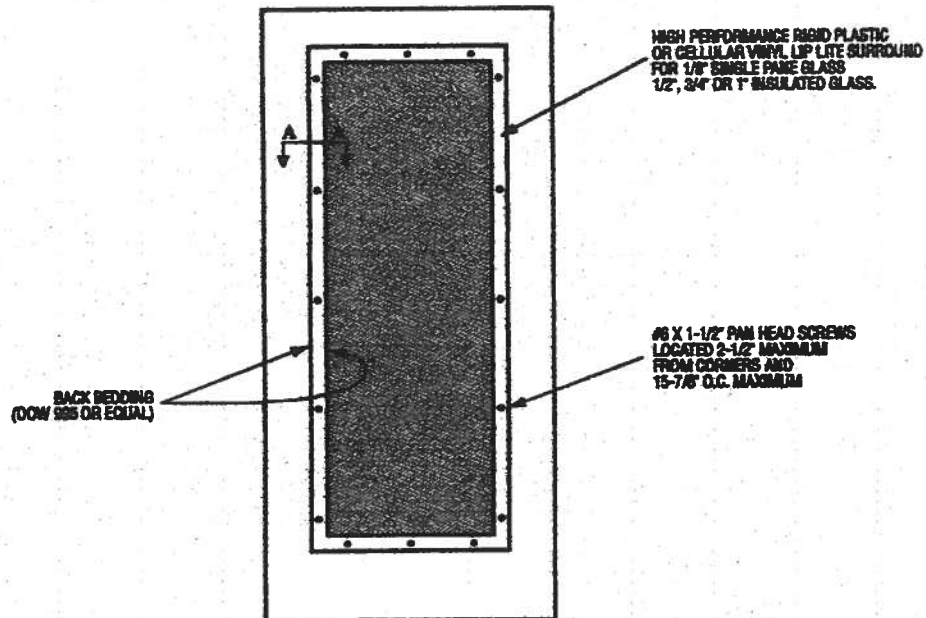


Exclusively from

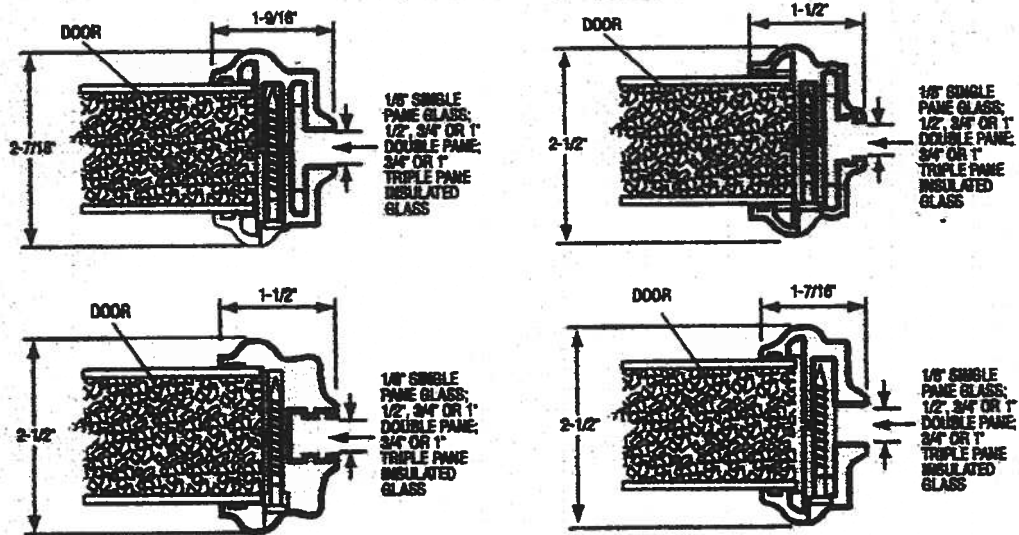
Masonite
Masonite International Corporation

MAD-WL-000041-02

GLASS INSERT IN DOOR OR SIDELITE PANEL



SECTION A-A TYPICAL RIGID PLASTIC LIP LITE SURROUND



March 29, 2002
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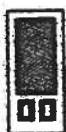
Exclusively from

Masonite International Corporation

WOOD-EDGE STEEL DOORS

APPROVED DOOR STYLES:

3/4 GLASS:



404 Series



416 Series



450 Series

FULL GLASS:



100 Series



114, 120, 122
Series



162 Series



149 Series



300 Series

CERTIFIED TEST REPORTS:

NCTL 210-1897-7, 8, 9, 10, 11, 12; NCTL 210-1884-5, 6, 7, 8; NCTL 210-2178-1, 2, 3

Certifying Engineer and License Number: Barry D. Portney, P.E. / 16258.

Unit Tested in Accordance with Miami-Dade BCCO PA202.

Evaluation report NCTL-210-2794-1

Door panels constructed from 26-gauge 0.017" thick steel skins. Both stiles constructed from wood. Top end rails constructed of 0.041" steel. Bottom end rails constructed of 0.021" steel. Interior cavity of slab filled with rigid polyurethane foam core. Slab glazed with insulated glass mounted in a rigid plastic lip lite surround.

Frame constructed of wood with an extruded aluminum bumper threshold.

PRODUCT COMPLIANCE LABELING:

TESTED IN
ACCORDANCE WITH
MIAMI-DADE BCCO PA202

COMPANY NAME
CITY, STATE

To the best of my knowledge and ability the above side-hinged exterior door unit conforms to the requirements of the 2001 Florida Building Code, Chapter 17 (Structural Tests and Inspections).

State of Florida, Professional Engineer
Kurt Balthazor, P.E. - License Number 56533

Johnson
EntrySystems

March 20, 2002

Our continuing program of product improvement retains specifications, design and product detail subject to change without notice.

PREMDORE Collection
Premium Quality Doors



Exclusively from

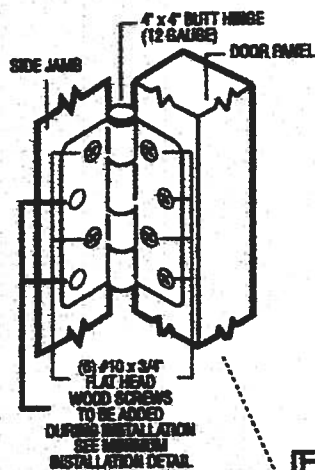
Masonite
Masonite International Corporation

XX
Unit

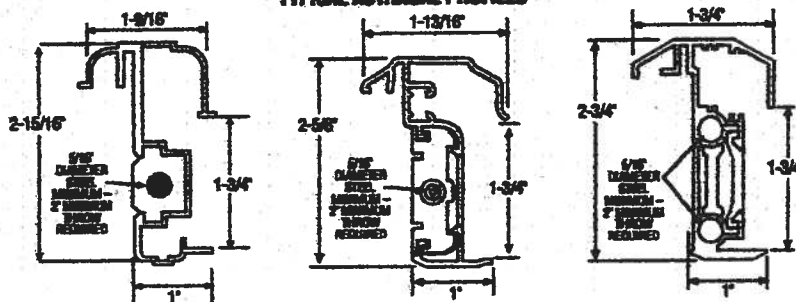
MAD-WL-MAD012-02

OUTSWING UNITS WITH DOUBLE DOOR

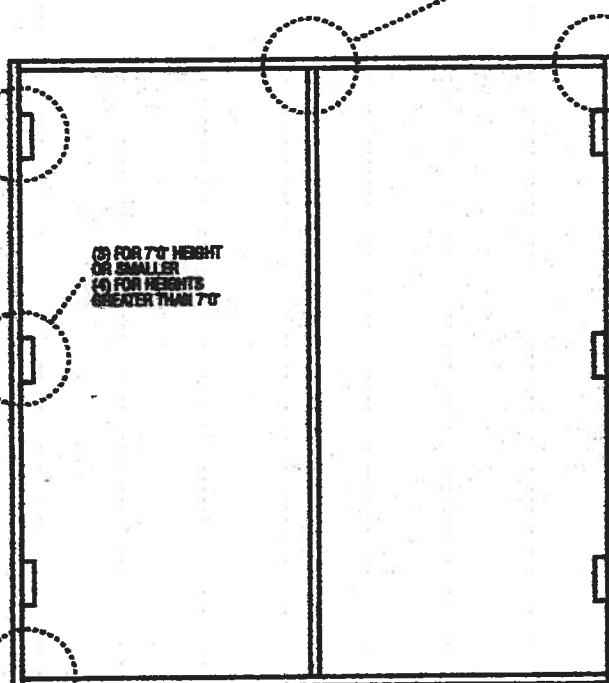
TYPICAL HINGE ATTACHMENT



TYPICAL ASTRAL PROFILES

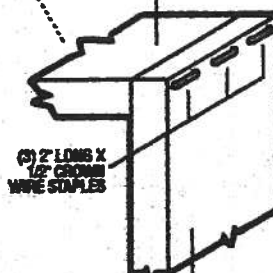


ALUMINUM EXTRUDED ASTRAL (0.08\"/>



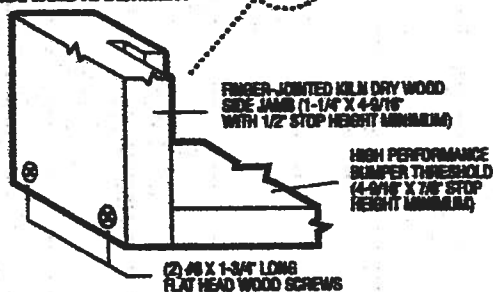
TYPICAL HEADER & SIDE JAMB ATTACHMENT

FINGER-JOINTED KILN DRY WOOD
FRAME HEADER (1-1/4\"/>



FINGER-JOINTED
KILN DRY WOOD
SIDE JAMB
(1-1/4\"/>

TYPICAL THRESHOLD & SIDE JAMB ATTACHMENT



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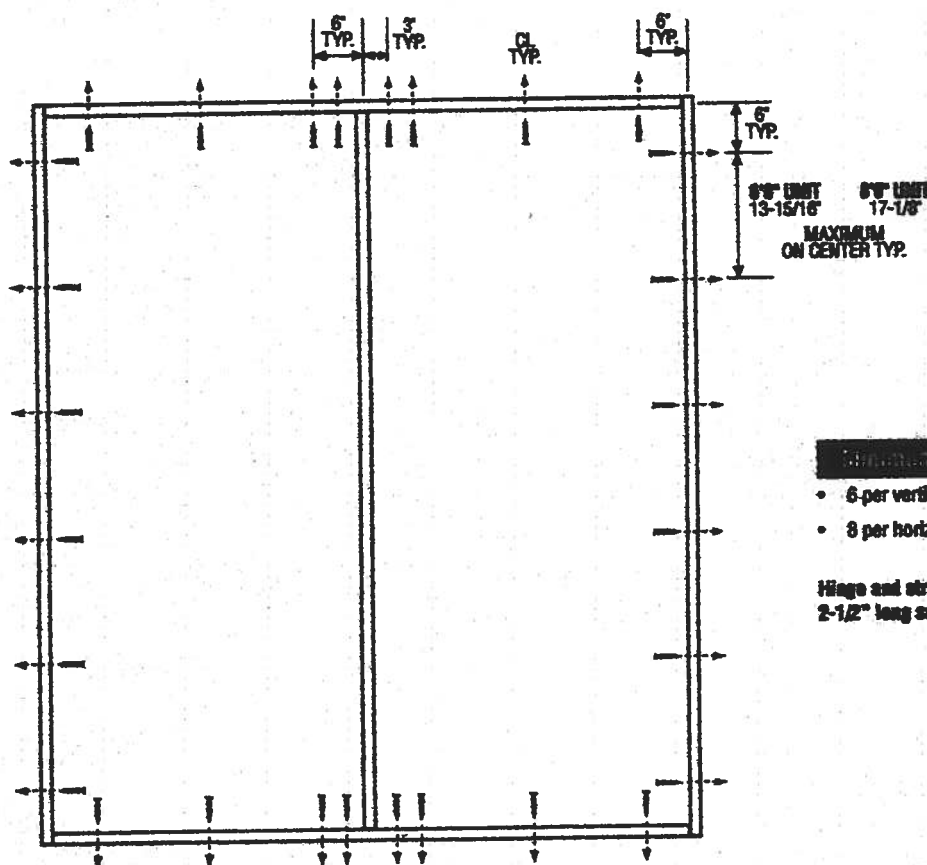
Exclusively from

Masonite
Masonite International Corporation

XX
Unit

IND-VL-MAGU02-02

DOUBLE DOOR



Minimum Fastener Count

- 6 per vertical framing member
- 8 per horizontal framing member

Hinge and strike plates require two 2-1/2" long screws per location.

Latching Hardware:

- Compliance requires that GRADE 2 or better (ANSI/BHMA A156.2) cylindrical and deadlock hardware be installed.

Notes:

1. Anchor calculations have been carried out with the lowest (least) fastener rating from the different fasteners being considered for use. Fasteners analyzed for this unit include #6 and #10 wood screws or 3/16" Tapcons.
2. The wood screw single shear design values come from Table 11.3A of ANSI/AF & PA NDS for southern pine lumber with a side member thickness of 1-1/4" and achievement of minimum embedment. The 3/16" Tapcon single shear design values come from the ITW and ELCO Dade County approvals respectively, each with minimum 1-1/4" embedment.
3. Wood bucks by others, must be anchored properly to transfer loads to the structure.

March 29, 2002

Our continuing program of product improvement makes specifications, design and product detail subject to change without notice.

PREMIER Collection
Premium Quality Doors



Exclusively from

Masonite®
Masonite International Corporation



FEB - 4 REC'D

January 31, 2002

TO: OUR FLORIDA CUSTOMERS:

Effective February 1, 2002, the following TAMKO shingles, as manufactured at TAMKO's Tuscaloosa, Alabama, facility, comply with ASTM D-3161, Type I modified to 110 mph. Testing was conducted using four nails per shingle. These shingles also comply with Florida Building Code TAS 100 for wind driven rain.

- Glass-Seal AR
- Elite Glass-Seal AR
- ASTM Heritage 30 AR (formerly ASTM Heritage 25 AR)
- Heritage 40 AR (formerly Heritage 30 AR)
- Heritage 50 AR (formerly Heritage 40 AR)

All testing was performed by Florida State certified independent labs.

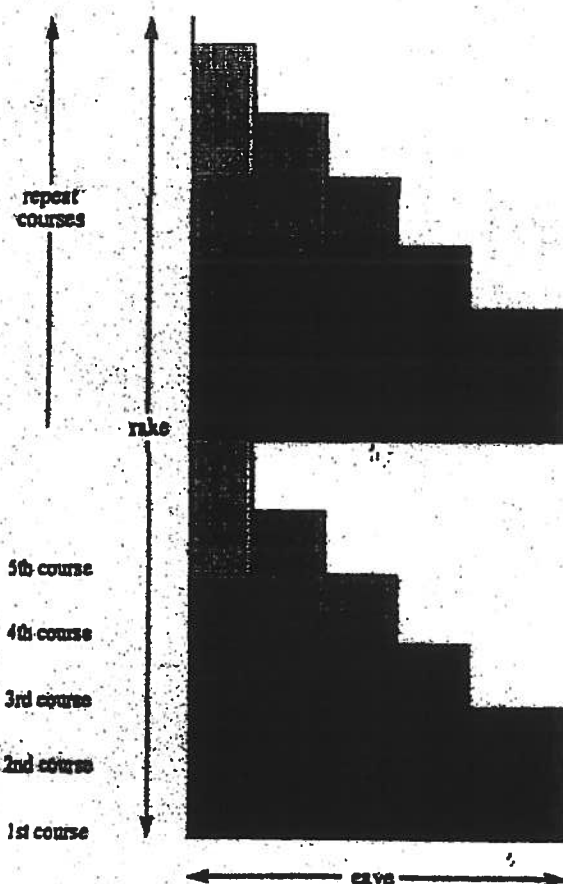
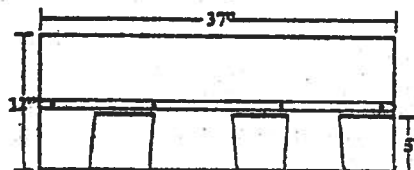
Please direct all questions to TAMKO's Technical Services Department at 1-800-641-4691.

TAMKO Roofing Products, Inc.

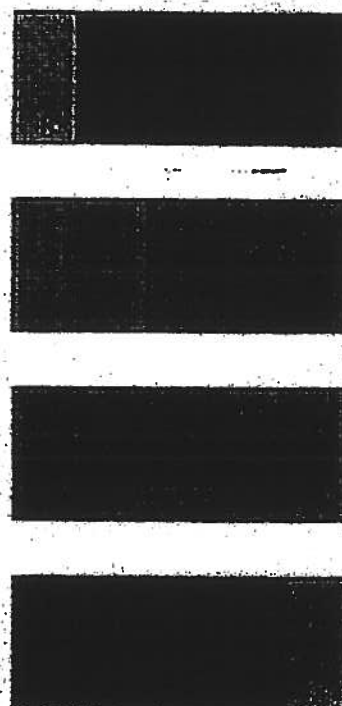


Application Instructions For Heritage® 25 Series Shingles

SPECIFICATIONS (APPROX.)	
Length	37"
Width	12"
Bundles per Sq.	3
Shingles per Sq.	78
Shingles per Bundle	26
Coverage per Sq. (Sq. Ft.)	100
Exposure	5"



The 4 cuts in the first 10 courses:



In the first 10 courses, there are 4 cuts and no waste.

When you reach the other side of the roof, whatever has to be trimmed off can be used in the field of roofing.

For additional application information consult the application instructions printed on the product package.

NOTE: These application instructions apply only to Heritage 25 and Heritage 25 AR shingles.



Application Instructions for

- Glass-Seal
 - Glass-Seal AR
 - Elite Glass-Seal®
 - Elite Glass-Seal® AR
- THREE-TAB ASPHALT SHINGLES**

THESE ARE THE MANUFACTURER'S APPLICATION INSTRUCTIONS FOR THE ROOFING CONDITIONS DESCRIBED. TAMKO ROOFING PRODUCTS, INC. ASSUMES NO RESPONSIBILITY FOR LEAKS OR OTHER ROOFING DEFECTS RESULTING FROM FAILURE TO FOLLOW THE MANUFACTURER'S INSTRUCTIONS.

THIS PRODUCT IS COVERED BY A LIMITED WARRANTY, THE TERMS OF WHICH ARE PRINTED ON THE WRAPPER. IN COLD WEATHER (BELOW 40°F), CARE MUST BE TAKEN TO AVOID DAMAGE TO THE EDGES AND CORNERS OF THE SHINGLES.

IMPORTANT: It is not necessary to remove the plastic strip from the back of the shingles.

1. ROOF DECK

These shingles are for application to roof decks capable of receiving and retaining fasteners, and to inclines of not less than 2 in. per foot. For roofs having pitches 2 in. per foot to less than 4 in. per foot, refer to special instructions titled "Low Slope Application". Shingles must be applied properly. TAMKO assumes no responsibility for leaks or defects resulting from improper application, or failure to properly prepare the surface to be roofed over.

NEW ROOF DECK CONSTRUCTION: Roof deck must be smooth, dry and free from warped surfaces. It is recommended that metal drip edges be installed at eaves and rakes.

PLYWOOD: All plywood shall be exterior grade as defined by the American Plywood Association. Plywood shall be a minimum of 3/8 in. thick, and applied in accordance with the recommendations of the American Plywood Association.

SHEATHING BOARDS: Boards shall be well-seasoned tongue-and-groove boards and not over 6 in. nominal width. Boards shall be a 1 in. nominal minimum thickness. Boards shall be properly spaced and nailed.

2. VENTILATION

Inadequate ventilation of attic spaces can cause accumulation of moisture in winter months and a build up of heat in the summer. These conditions can lead to:

1. Vapor Condensation
2. Buckling of shingles due to deck movement
3. Rotting of wood members
4. Premature failure of roof.

To insure adequate ventilation and circulation of air, place louvers of sufficient size high in the gable ends and/or install continuous ridge and soffit vents.

FHA minimum property standards require one square foot of net free ventilation area to each 150 square feet of space to be vented, or one square foot per 300 square feet if a vapor barrier is installed on the warm side of the ceiling or if at least one half of the ventilation is provided near the ridge. If the ventilation openings are screened, the total area should be doubled.

IT IS PARTICULARLY IMPORTANT TO PROVIDE ADEQUATE VENTILATION.

3. FASTENING

NAILS: TAMKO recommends the use of nails as the preferred method of application.

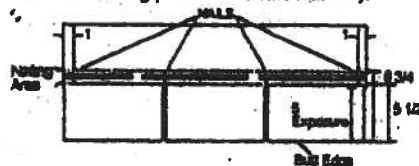
WIND CAUTION: Extreme wind velocities can damage these shingles after application when proper sealing of the shingles does not occur. This can especially be a problem if the shingles are applied in cooler months or in areas on the roof that do not receive direct sunlight. These

conditions may impede the sealing of the adhesive strips on the shingles. The inability to seal down may be compounded by prolonged cold weather conditions and/or blowing dust. In these situations, hand sealing of the shingles is recommended. Shingles must also be fastened according to the fastening instructions described below.

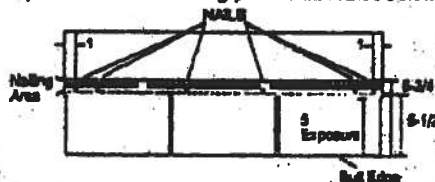
Correct placement of the fasteners is critical to the performance of the shingle. If the fasteners are not placed as shown in the diagram and described below, TAMKO will not be responsible for any shingles blown off or displaced. TAMKO will not be responsible for damage to shingles caused by winds or gusts exceeding gale force. Gale force shall be the standard as defined by the U.S. Weather Bureau.

FASTENING PATTERNS: Fasteners must be placed above or below the factory applied sealant in an area between 5-1/2" and 6-3/4" from the butt edge of the shingle. Fasteners should be located horizontally according to the diagram below. Do not nail into the sealant. TAMKO recommends nailing below the sealant whenever possible for greater wind resistance.

- 1) Standard Fastening Pattern. (For use on decks with slopes 2 in. per foot to 21 in. per foot.) One fastener 1 in. back from each end and one 12 in. back from each end of the shingle for a total of 4 fasteners. (See standard fastening pattern illustrated below.)



- 2) Mansard or High Wind Fastening Pattern. (For use on decks with slopes greater than 21 in. per foot.) One fastener 1 in. back from each end and one fastener 10-1/2 in. back from each end and one fastener 13-1/2 in. back from each end for a total of 5 fasteners per shingle. (See Mansard fastening pattern illustrated below.)



NAILS: TAMKO recommends the use of nails as the preferred method of application. Standard type roofing nails should be used. Nail shanks should be made of minimum 12-gauge wire, and a minimum head diameter of 3/8 in. Nails should be long enough to penetrate 3/4 in.

(Continued)

Visit Our Web Site at
www.tamko.com

Central District	220 West 4th St., Joplin, MO 64801	800-841-4691
Northeast District	4500 Tamko Dr., Frederick, MD 21701	800-368-2068
Southeast District	2300 35th St., Tuscaloosa, AL 35401	800-228-2858
Southwest District	7910 S. Central Exp., Dallas, TX 75218	800-443-1834
Western District	5300 East 43rd Ave., Denver, CO 80216	800-530-8858

07/01

TAMKO

ROOFING PRODUCTS

(CONTINUED from Pg. 2)

Glass-Seal Glass-Seal AR

Elite Glass-Seal® Elite Glass-Seal® AR

THREE-TAB ASPHALT SHINGLES

with quick setting asphalt adhesive cement immediately upon installation. Spots of cement must be equivalent in size to a 3.25 piece and applied to shingles with a 5 in. exposure, use 6 fasteners per shingle. See Section 3 for the Mansard Fastening Pattern.

5. RE-ROOFING

Before re-roofing, be certain to inspect the roof decks. All plywood shall meet the requirements listed in Section 1.

Nail down or remove curled or broken shingles from the existing roof. Replace all missing shingles with new ones to provide a smooth base. Shingles that are buckled usually indicate warped decking or protruding nails. Hammer down all protruding nails or remove them and reseat in a new location. Remove all drip edge metal and replace with new.

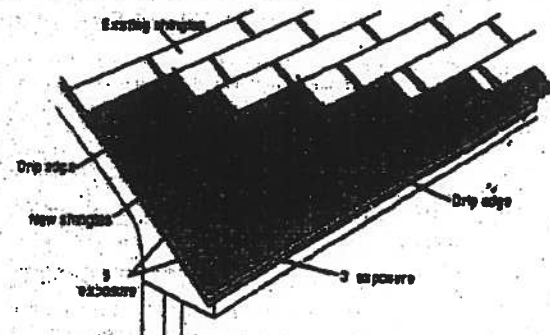
If re-roofing over an existing roof where new flashing is required to protect against ice dams (freezer/thaw cycle of water and/or the backup of water in frozen or clogged gutters), remove the old roofing to a point at least 24 in. beyond the interior wall line and apply TAMKO's Moisture Guard Plus® waterproofing underlayment. Contact TAMKO's Technical Services Department for more information.

The nailing procedure described below is the preferred method for re-roofing over square tab strip shingles with a 5 in. exposure.

Starter Course: Begin by using TAMKO Shingle Starter or by cutting shingles into 5 x 36 inch strips. This is done by removing the 5 in. tabs from the bottom and approximately 2 in. from the top of the shingles so that the remaining portion is the same width as the exposure of the old shingles. Apply the starter piece so that the self-sealing adhesive lies along the eaves and is even with the existing roof. The starter strip should be wide enough to overhang the eaves and carry water into the gutter. Remove 3 in. from the length of the first starter shingle to ensure that the joints from the old roof do not align with the new.

First Course: Cut off approximately 2 in. from the bottom edge of the shingles so that the shingles fit beneath the existing third course and align with the edge of the starter strip. Start the first course with a full 36 in. long shingle and fasten according to the instructions printed in Section 3.

Second and Subsequent Courses: According to the off-set application method you choose to use, remove the appropriate length from the



rake end of the first shingle in each succeeding course. Place the top edge of the new shingle against the butt edge of the old shingles in the courses above. The full width shingles used on the second course will reduce the exposure of the first course to 3 in. The remaining courses will automatically have a 5 in. exposure.

6. VALLEY APPLICATION

Over the shingle underlayment, center a 36 in. wide sheet of TAMKO Nail-Fast® or a minimum 50 lb. re-roofing in the valley. Nail the felt only where necessary to hold it in place and then only nail the outside edges.

IMPORTANT: PRIOR TO INSTALLATION WARM SHINGLES TO PREVENT DAMAGE WHICH CAN OCCUR WHILE BENDING SHINGLES TO FORM VALLEY.

• Apply the first course of shingles along the eaves of one of the intersecting roof planes and across the valley.

Note: For proper flow of water over the trimmed shingle, always start applying the shingles on the roof plane that has the lower slope or less height.

- Extend the end shingle at least 12 in. onto the adjoining roof. Apply succeeding courses in the same manner, extending them across the valley and onto the adjoining roof.
- Do not trim if the shingle length exceeds 12 in. Lengths should vary.
- Press the shingles tightly into the valley.
- Use normal shingle fastening methods.

Note: No fastener should be within 6 in. of the valley centerline, and two fasteners should be placed at the end of each shingle crossing the valley.

• To the adjoining roof plane, apply one row of shingles extending it over previously applied shingles and trim a minimum of 2 in. back from the centerline of the valley.

Note: For a neater installation, snap a chalkline over the shingles for guidance.

• Clip the upper corner of each shingle at a 45-degree angle and embed the end of the shingle in a 3 in. wide strip of asphalt plastic cement. This will prevent water from penetrating between the courses by directing it into the valley.

CAUTION:

Adhesive must be applied in smooth, thin, even layers.

Excessive use of adhesive will cause blistering in this product.

TAMKO assumes no responsibility for blistering.



(Continued)

Visit Our Web Site at
www.tamko.com

Central District	220 West 4th St., Joplin, MO 64801	800-841-4691
Northeast District	4500 Tamko Dr., Frederick, MD 21701	800-368-2055
Southeast District	2300 35th St., Tuscaloosa, AL 35401	800-228-2655
Southwest District	7910 S. Central Exp., Dallas, TX 75216	800-443-1834
Western District	5300 East 43rd Ave., Denver, CO 80216	800-830-8855

07/01



(CONTINUED from Pg. 3)

• Glass-Seal
• Glass-Seal AR

• Elite Glass-Seal®
• Elite Glass-Seal® AR

THREE-TAB ASPHALT SHINGLES

FOR ALTERNATE VALLEY APPLICATION METHODS, PLEASE CONTACT TAMKO'S TECHNICAL SERVICES DEPARTMENT.

18. HIP AND RIDGE FASTENING DETAIL

Apply the shingles with a 5 in. exposure beginning at the bottom of the hip or from the end of the ridge opposite the direction of the prevailing winds. Secure each shingle with one fastener 5-1/2 in. back from the exposed end and 1 in. up from the edge. Do not nail directly into the sealant.

TAMKO recommends the use of TAMKO Hip & Ridge shingle products. Where matching colors are available, it is acceptable to use TAMKO's Glass-Seal or Elite Glass-Seal shingles cut down to 12 in. pieces.

NOTE: AR type shingle products should be used as Hip & Ridge on Glass-Seal AR and Elite Glass-Seal AR shingles.

Fasteners should be 1/4 in. longer than the one used for shingles.

IMPORTANT: PRIOR TO INSTALLATION, CARE NEEDS TO BE TAKEN TO PREVENT DAMAGE WHICH CAN OCCUR WHEN BENDING SHINGLES IN COOL WEATHER.

THESE ARE THE MANUFACTURER'S APPLICATION INSTRUCTIONS FOR THE ROOFING CONDITIONS DESCRIBED. TAMKO ROOFING PRODUCTS, INC. ASSUMES NO RESPONSIBILITY FOR LEAKS OR OTHER ROOFING DEFECTS RESULTING FROM FAILURE TO FOLLOW THE MANUFACTURER'S INSTRUCTIONS.



THIS PRODUCT IS COVERED BY A LIMITED WARRANTY. THE TERMS OF WHICH ARE PRINTED ON THE WRAPPER.

IMPORTANT - READ CAREFULLY BEFORE OPENING BUNDLE

In this paragraph "You" and "Your" refer to the installer of the shingles and the owner of the building on which these shingles will be installed. This is a legally binding agreement between You and TAMKO Roofing Products, Inc. ("TAMKO"). By opening this bundle You agree: (a) to install the shingles strictly in accordance with the instructions printed on this wrapper, or (b) that shingles which are not installed strictly in accordance with the instructions printed on this wrapper are sold "AS IS" and are not covered by the limited warranty that is also printed on this wrapper, or any other warranty, including, but not limited to (except where prohibited by law) implied warranties of MERCHANTABILITY and FITNESS FOR USE.

Visit Our Web Site at
www.tamko.com

Central District	220 West 4th St., Joplin, MO 64801
Northeast District	4500 Tamko Dr., Frederick, MD 21701
Southeast District	2300 35th St., Tuscaloosa, AL 35401
Southwest District	7910 S. Central Exp., Dallas, TX 75216
Western District	5300 East 43rd Ave., Denver, CO 80216

800-841-4691
800-368-2066
800-228-2856
800-443-1834
800-530-8868

07/01

I

**AAMA/NWDA 101/1.5.2-97
TEST REPORT SUMMARY**

Rendered to:

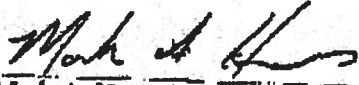
MI HOME PRODUCTS, INC.

**SERIES/MODEL: 650 Fin
TYPE: Aluminum Single Hung Window**

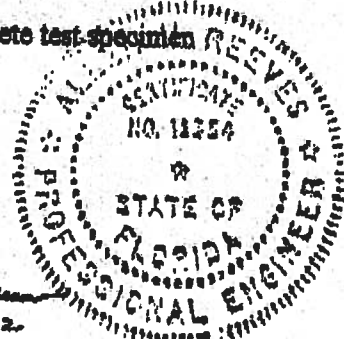
Title of Test	Results
Rating	H-R40 52 x 72
Overall Design Pressure	+45.0 psf -47.2 psf
Operating Force	11 lb max.
Air Infiltration	0.13 cfm/ft ²
Water Resistance	6.00 psf
Structural Test Pressure	+67.5 psf -70.8 psf
Deglazing	Passed
Forced Entry Resistance	Grade 10

Reference should be made to Report No. 01-41134.01 dated 03/26/02 for complete test specimen description and data.

For ARCHITECTURAL TESTING, INC.


Mark A. Hess, Technician

MAH:nib


Allen P. Reeves
1 APRIL 2002

II

Architectural Testing

AAMA/NWDA 101/LS-2-97 TEST REPORT

Rendered to

MI HOME PRODUCTS, INC.
650 West Market Street
P.O. Box 370
Gratz, Pennsylvania 17030-0370

Report No: 01-41134.01
Test Date: 03/07/02
Report Date: 03/26/02
Expiration Date: 03/07/06

Project Summary: Architectural Testing, Inc. (ATI) was contracted by MI Home Products, Inc. to perform tests on Series/Model 650 Fin, aluminum single hung window at their facility located in Elizabethville, Pennsylvania. The samples tested successfully met the performance requirements for a H-R40 52 x 72 rating.

Test Specification: The test specimen was evaluated in accordance with AAMA/NWDA 101/LS-2-97, *Voluntary Specifications for Aluminum, Vinyl (PVC) and Wood Windows and Glass Doors*.

Test Specimen Description:

Series/Model: 650 Fin

Type: Aluminum Single Hung Window

Overall Size: 4' 4-1/4" wide by 6' 0-3/8" high

Active Sash Size: 4' 1-3/4" wide by 3' 0-5/8" high

Daylight Opening Size: 3' 11-3/8" wide by 2' 9-1/2" high

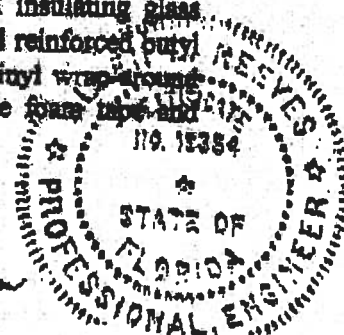
Screen Size: 4' 0-1/4" wide by 2' 11-1/8" high

Finish: All aluminum was white.

Glazing Details: The active and fixed lites utilized 5/8" thick, sealed insulating glass constructed from two sheets of 1/8" thick, clear annealed glass and a metal reinforced butyl spacer system. The active sash was channel glazed utilizing a flexible vinyl wrap around gasket. The fixed lite was interior glazed against double-sided adhesive foam tape and secured with PVC snap-in glazing beads.

130 Derry Court
York, PA 17402-9405
phone: 717.764.7700
fax: 717.764.4129
www.archtest.com

Allen G. Raman
1 APRIL 2002



III

Test Specimen Description: (Continued)

Weatherstripping:

<u>Description</u>	<u>Quantity</u>	<u>Location</u>
0.230" high by 0.270" backed polypile with center fin	1 Row	Fixed meeting rail
0.250" high by 0.187" backed polypile with center fin	2 Rows	Active sash stiles
1/2" x 1/2" dust plug	4 Pieces	Active sash, top and bottom of stiles
1/4" foam-filled vinyl bulb seal	1 Row	Active sash, bottom rail

Frame Construction: The frame was constructed of extruded aluminum with coped, butted, and sealed corners fastened with two #8 x 1" screws through the head and sill into each jamb screw boss. End caps were utilized on the ends of the fixed meeting rail and secured with two 1-1/4" screws per cap. Meeting rail was secured to the frame utilizing two 1-1/4" screws.

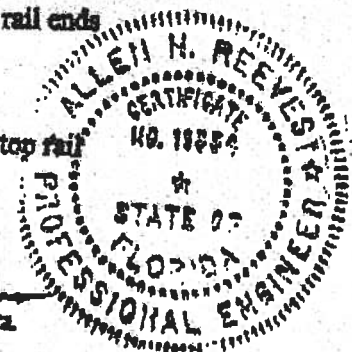
Sash Construction: The sash was constructed of extruded aluminum with coped, butted, and sealed corners fastened with two #8 x 1-1/2" screws through the rails into each jamb screw boss.

Screen Construction: The screen was constructed from roll-formed aluminum with keyed corners. The fiberglass mesh was secured with a flexible spline.

Hardware:

<u>Description</u>	<u>Quantity</u>	<u>Location</u>
Metal cam lock with keeper		Midspan, active meeting rail with keeper adjacent on fixed meeting rail
Plastic tilt latch	2	Active sash, meeting rail ends
Metal tilt pin	2	Active sash, bottom rail ends
Balance assembly	2	One in each jamb
Screen plunger	2	4" from rail ends on top rail

Allen H. Reeves
1 APRIL 2002



IV

Test Specimen Description: (Continued)

Drainage: Sloped sill

Reinforcement: No reinforcement was utilized.

Installation: The test specimen was installed into a 2 x 8 #2 Spruce-Pine-Fir wood test buck with #8 x 1-5/8" drywall screws every 8" on center around the nail fin. Polyurethane was used as a sealant under the nail fin and around the exterior perimeter.

Test Results:

The results are tabulated as follows:

<u>Paragraph</u>	<u>Title of Test - Test Method</u>	<u>Results</u>	<u>Allowed</u>
2.2.1.6.1	Operating Force	11 lbs	30 lbs max
	Air Infiltration (ASTM E 283-91) @ 1.57 psf (25 mph)	0.13 cfm/ft ²	0.3 cfm/ft ² max

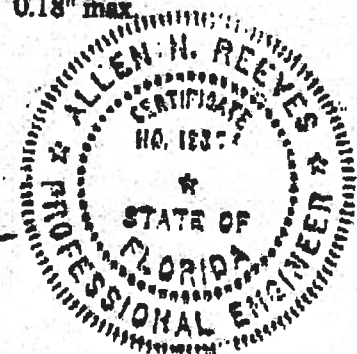
Note #1: The tested specimen meets the performance levels specified in AAMA/NWDA 101/LS. 2-97 for air infiltration.

	Water Resistance (ASTM E 547-00) (with and without screen) WTP = 2.86 psf	No leakage	No leakage
2.1.4.1	Uniform Load Deflection (ASTM E 330-97) (Measurements reported were taken on the meeting rail) (Loads were held for 33 seconds) @ 25.9 psf (positive) @ 34.7 psf (negative)	0.42"* 0.43"*	0.26" max. 0.26" max.

**Exceeds L/175 for deflection, but passes all other test requirements.*

2.1.4.2	Uniform Load Structural (ASTM E 330-97) (Measurements reported were taken on the meeting rail) (Loads were held for 10 seconds) @ 38.9 psf (positive) @ 52.1 psf (negative)	0.02" 0.02"	0.18" max. 0.18" max.
---------	---	----------------	--------------------------

Allen H. Reeves
1 APRIL 2002



Test Specimen Description: (Continued)

Paragraph	Title of Test - Test Method	Results	Allowed
2.2.1.6.2	Deglazing Test (ASTM E 987) In operating direction at 70 lbs		
	Meeting rail	0.12"/25%	0.50"/100%
	Bottom rail	0.12"/25%	0.50"/100%
	In remaining direction at 50 lbs		
	Left stile	0.06"/12%	0.50"/100%
	Right stile	0.06"/12%	0.50"/100%
	Forced Entry Resistance (ASTM F 588-97)		
	Type: A		
	Grade: 10		
	Lock Manipulation Test	No entry	No entry
	Tests A1 through A5	No entry	No entry
	Test A7	No entry	No entry
	Lock Manipulation Test	No entry	No entry

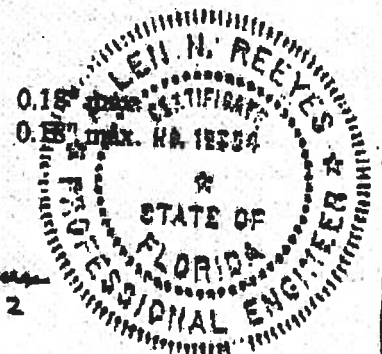
Optional Performance

4.3	Water Resistance (ASTM E 547-00) (with and without screen) WTP = 6.00 psf	No leakage	No leakage
	Uniform Load Deflection (ASTM E 330-97) (Measurements reported were taken on the meeting rail) (Loads were held for 33 seconds)		
	@ 45.0 psf (positive)	0.47"	0.26" max.
	@ 47.2 psf (negative)	0.46"	0.26" max.

**Exceeds L/175 for deflection, but passes all other test requirements.*

Uniform Load Structural (ASTM E 330-97) (Measurements reported were taken on the meeting rail) (Loads were held for 10 seconds)		
@ 67.5 psf (positive)	0.05"	
@ 70.8 psf (negative)	0.05"	

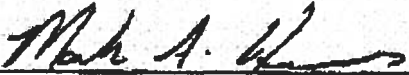
Allen H. Reeves
1 APRIL 2002



VI

Detailed drawings, representative samples of the test specimen, and a copy of this report will be retained by ATI for a period of four years. The above results were secured by using the designated test methods and they indicate compliance with the performance requirements of the above referenced specification. This report does not constitute certification of this product, which may only be granted by the certification program administrator.

For ARCHITECTURAL TESTING, INC:

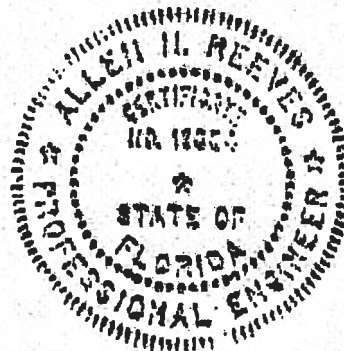


Mark A. Hess
Technician

MAH:nlb
01-41134.01



Allen N. Reeves, P.E.
Director - Engineering Services
1 APRIL 2002





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FLORIDA BUILDING CODE

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[User Authentication](#)
[Organization Search](#)
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Select the organization type, status, or name to find an organization

Organization Type: Product Manufacturer

Approval Status: (All)

Organization Name: General American Door - Product Manufacturer

Cancel

Search

Result List for Organizations

Displaying 1-1 of 1

Name	City	Contact	Phone	Type	Expiry	Status
General American Door	Montgomery	James Campbell	6308593000	Product Manufacturer	01/01/2009	Approved
Org Code PDM System ID: 3585				Site Link: www.gadec.com		

Displaying 1-1 of 1

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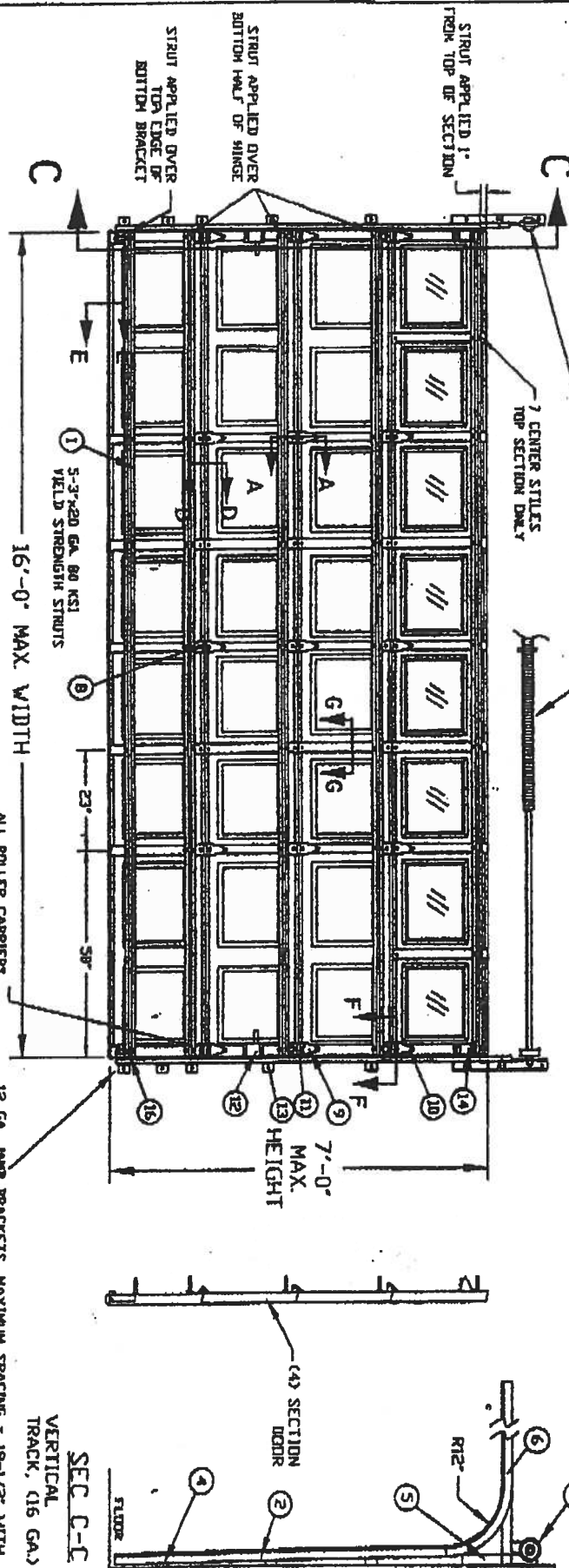
http://www.floridabuilding.org/Common/c_org_reg_SRCH.asp

6/21/2004

NOTES:

1. TESTED TO POSITIVE AND NEGATIVE 20 PSF DESIGN AND POSITIVE AND NEGATIVE 30 PSF TEST PRESSURES PER ASTM E-330
2. MAXIMUM SECTION HEIGHT: 21'-
3. SECTION HEIGHTS OF 21'0" AND 19'5" ARE AVAILABLE AND MAY BE USED IN ANY COMBINATION TO ACHIEVE VARIOUS DOOR HEIGHTS.
4. VARIOUS MAY BE INSTALLED IN THE TOP SECTION. TESTED WITH 1/2" RIB GLASS OR EQUIVALENT. IN THE SECTION IMMEDIATELY BELOW THE TOP SECTION.
5. MAXIMUM LENGTH OF RIBLOR STRIP IS 54" OR AS TESTED.
6. THE STRUT PLACEMENT ON DOOR MUST BE CONSISTENT WITH THE DOOR SHOW.
7. STRUTS SECURED AT ALL LOCATIONS WITH TIE SCREWS.
8. QUANTITY OF TIE SCREWS CAN BE Q.L. OR AS TESTED.
9. DROP IN TYPE OF INSULATION IS OPTIONAL.

NOT PART OF WIND LOAD SYSTEM
EXTENSION SPRING COUNTERBALANCE
TORSION SPRING COUNTERBALANCE



INSIDE ELEVATION

16'-0" MAX WIDTH

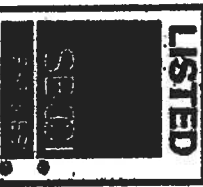
TEST REPORTS ON FILE VIDEO 10/19/00 0002933

DESIGN LOAD +20.0 PSF & -20.0 PSF
TEST LOAD +30.0 PSF & -30.0 PSF

The seal on this drawing only represents the product(s) illustrated and described herein and is not to be used for any other purpose(s) or installation(s) of the door as tested.

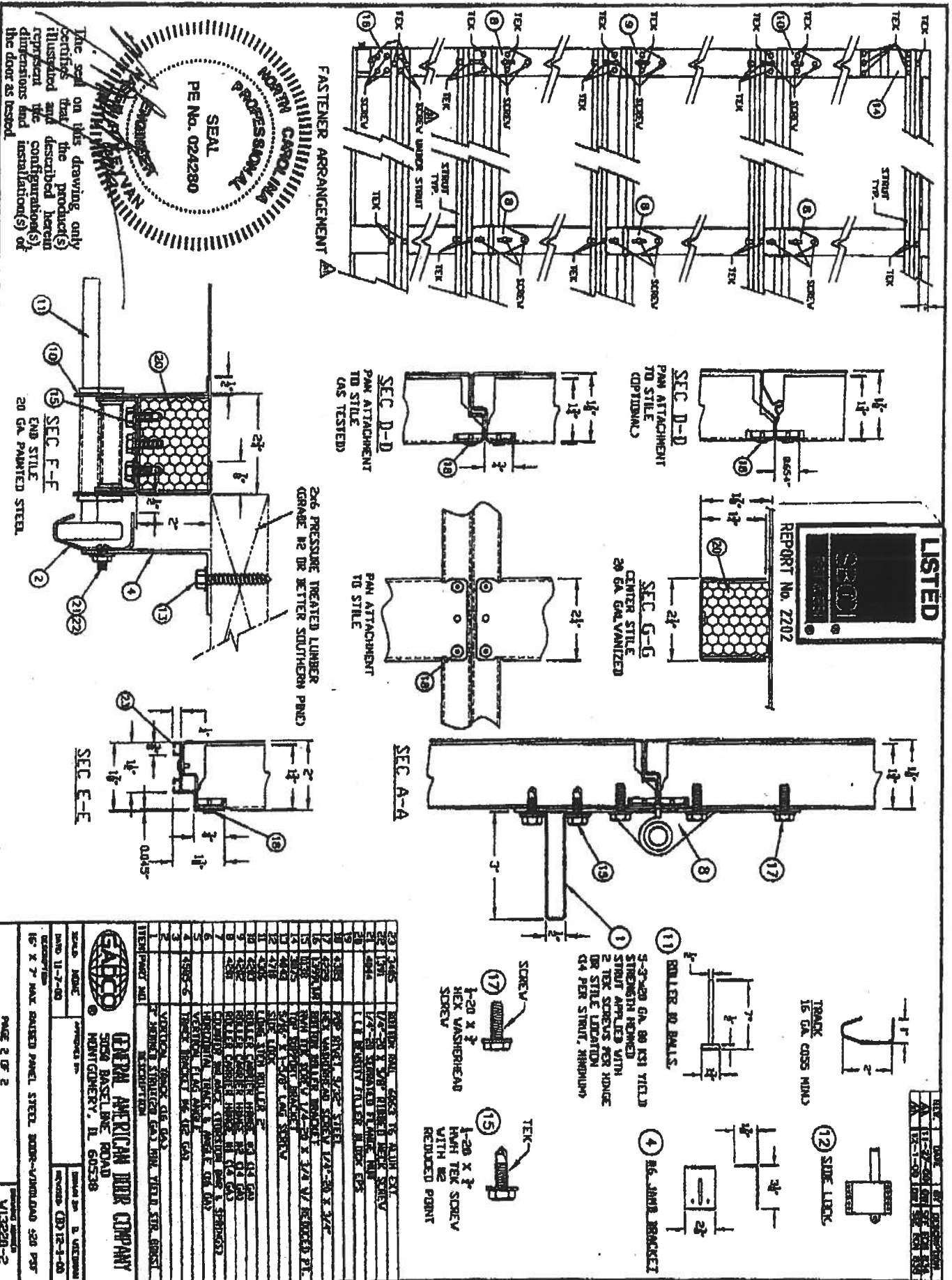


REPORT No. 2202

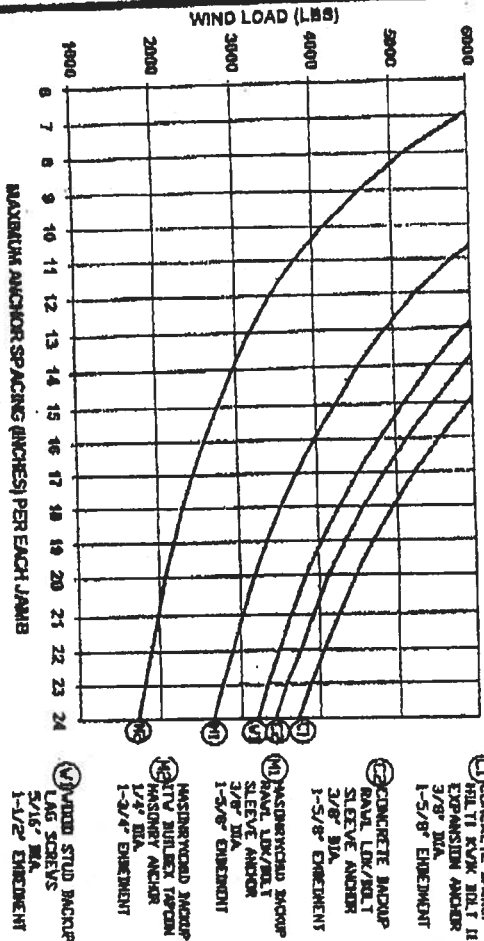


GABCO DOORS				
SERIES 7400, EXTERIOR STEEL = 017 MIN GASTESTED				
SERIES 7825, EXTERIOR STEEL = 019 MIN A				
SERIES 7524, EXTERIOR STEEL = 024 MIN A				
(TESTED WITH WINDOWS)				
MAXIMUM DOOR WIDTH	MAXIMUM DOOR HEIGHT	TYPICAL CTR. STYLE SPACING	STRUTS 80 KSI	VERTICAL TRACK
16'	7'	23"	3"	5
				2 IN.
SCALE: 1/8" = 1'-0"				
DESIGNED BY: GABCO				
5050 BASELINE ROAD				
MONTGOMERY, IL 60053B				
16' X 7' MAX. RAISED PANEL STEEL DOOR - WINDLOAD ±20 PSF				
PAGE 1 OF 2				
DRAWING NUMBER: V13220-1				

REV.	DATE	BY	DESCRIPTION
A	11-10-00	DM	SEE E.C.M. 811

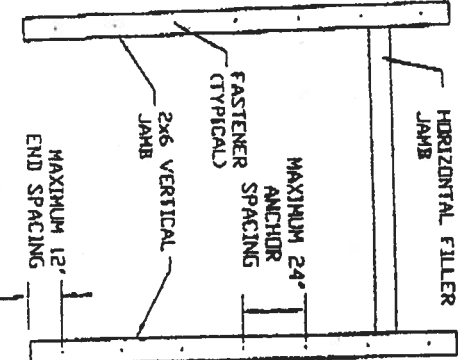


WIND LOAD VS ANCHOR SPACING



DESIGN (LBS) X GARAGE DOOR AREA (WIDTH-FT X HEIGHT-FT) = WIND LOAD (LBS)
 LOAD FT²

EXAMPLE
 30 LBS X 16 FT WIDE X 8 FT HIGH = 3840 LBS
 FT²
 ① USE 22" SPACING
 ② USE 21" SPACING
 ③ USE 19" SPACING
 SEE NOTE 11 FOR ADDITIONAL
 REQUIRED 2X6 WOOD JAMB ANCHORS



PE No. 024280
 SEAL
 NORTH CAROLINA PROFESSIONAL ENGINEER
 MURDER R. KEYVAN
 3/8/2002

2X6 JAMB TO SUPPORTING STRUCTURE ATTACHMENT

2X6 PRESSURE TREATED (GRADE #2 OR BETTER SOUTHERN PINE) WOOD JAMB SHALL BE ANCHORED TO BUILDING WOOD FRAME, GROUTED AND REINFORCED CONCRETE MASONRY UNIT (CMU) WALLS OR COLUMNS, OR REINFORCED CONCRETE COLUMNS.

NOTES:

- 1) ALL DOOR OPENING SURROUNDING STRUCTURE TO BE DESIGNED BY REGISTERED ENGINEER OR ARCHITECT WITH DUE CONSIDERATION GIVEN TO INSTALLATIONS USING CENTER "HURRICANE" POSTS.
- 2) ALL DOOR OPENING STRUCTURE AND FASTENERS TO COMPLY WITH ALL APPLICABLE CODES INCLUDING SICC STANDARD FOR HURRICANE RESISTANT RESIDENTIAL CONSTRUCTION SSTB 10, CURRENT EDITION.
- 3) ALL FASTENERS TO BE INSTALLED IN STRICT ACCORDANCE WITH MANUFACTURER'S SPECIFICATIONS, INSTRUCTIONS AND RECOMMENDATIONS.
- 4) WOOD FRAME BUILDINGS STUDS AT EACH SIDE OF DOOR OPENING SHALL BE PROPERLY DESIGNED, CONNECTED, ANCHORED AND SHALL CONSIST OF A MINIMUM OF THREE (3) LAMINATIONS OF 2X6 PRESSURE TREATED SOUTHERN PINE (S2P) GRADE OR BETTER WALL STUDS CONTINUOUS FROM FOOTING TO DOUBLE TOP PLATE.
- 5) REINFORCED CMU OR CONCRETE 2X6 WOOD JAMB SHALL BE ANCHORED TO SOLIDLY GROUTED AND REINFORCED CONCRETE MASONRY UNIT (CMU) WALLS OR COLUMNS, OR REINFORCED CONCRETE COLUMNS. ANCHOR SPACING AND EMBEDMENT IS BASED ON CONCRETE MASONRY UNITS COMPLYING WITH ASTM C90 WITH A MINIMUM NET AREA COMPRESSIVE STRENGTH OF 2500 PSI, GROUT WITH A MINIMUM COMPRESSIVE STRENGTH OF 2000 PSI REINFORCED CONCRETE COLUMNS WITH A MINIMUM COMPRESSIVE STRENGTH OF 2500 PSI.
- 6) EMBEDMENTS LISTED ARE THE MINIMUM ALLOWABLE EMBEDMENTS.
- 7) ANCHORS FOR CONCRETE AND CONCRETE MASONRY UNITS (CMU) SHALL HAVE A MINIMUM 3" EDGE DISTANCE FROM ALL EDGES OF CONCRETE OR CONCRETE MASONRY UNITS. ANCHORS FOR CONCRETE AND CMU SHALL HAVE A MINIMUM SPACING OF 3-3/4".
- 8) LAG SCREWS SHALL BE CENTERED IN ONE OF THE 1-1/2" DIMENSION FACES OF THE TRIPLE 2X6 WALL STUDS.
- 9) WASHERS ARE REQUIRED ON ALL FASTENERS.
- 10) THE WIND LOAD VS. ANCHOR SPACING CHART IS FOR A MAXIMUM DOOR SIZE OF 18' X 8' AT A MAXIMUM 42 PSF DESIGN WIND LOAD.
- 11) FOR THE UPPER THREE INDIVIDUAL STEEL JAMB BRACKETS, BRACKETS SHALL BE CENTERED BETWEEN THE TWO CLOSEST 2X6 WOOD JAMB ANCHORS. IF THE STEEL JAMB BRACKET IS NOT CENTERED BETWEEN THE TWO CLOSEST 2X6 WOOD JAMB ANCHORS, AND AN ADDITIONAL 2X6 WOOD JAMB ANCHOR NEARER THAN STEEL BRACKET TO INSURE THAT THE LOAD FROM THE STEEL BRACKET IS EQUALLY TRANSFERRED TO TWO WOOD JAMB ANCHORS.

GENERAL AMERICAN DOOR COMPANY	
5000 BASSETT ROAD	
MORTGAGHER, IL 60538	
SERIAL NUMBER JAMB TO STRUCTURE ATTACHMENT FOR WIND LOADED GARAGE DOORS	APPROVED BY DIV
DATE 10/5/00	DIV

Residential System Sizing Calculation

Summary

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

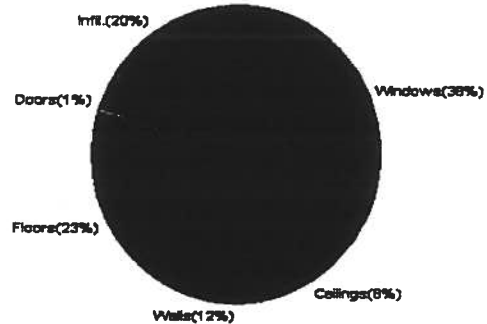
5/8/2006

Location for weather data: Gainesville - User customized: Latitude(30) Altitude(171 ft.) Temp Range(M)			
Humidity data: Interior RH (50%) Outdoor wet bulb (77F) Humidity difference(54gr.)			
Winter design temperature	33 F	Summer design temperature	92 F
Winter setpoint	70 F	Summer setpoint	75 F
Winter temperature difference	37 F	Summer temperature difference	17 F
Total heating load calculation	48212 Btuh	Total cooling load calculation	56048 Btuh
Submitted heating capacity	% of calc Btuh	Submitted cooling capacity	% of calc Btuh
Total (Electric Heat Pump)	118.2 57000	Sensible (SHR = 0.75)	90.2 42750
Heat Pump + Auxiliary(0.0kW)	118.2 57000	Latent	164.8 14250
		Total (Electric Heat Pump)	101.7 57000

WINTER CALCULATIONS

Winter Heating Load (for 2185 sqft)

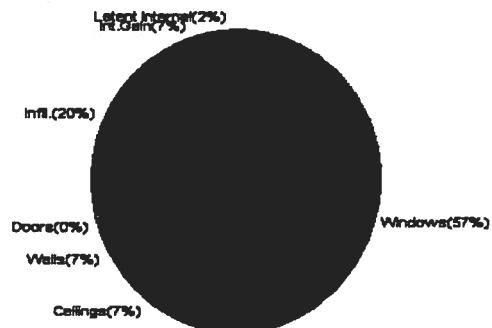
Load component		Load	
Window total	394 sqft	18528	Btuh
Wall total	1832 sqft	6015	Btuh
Door total	20 sqft	259	Btuh
Ceiling total	2300 sqft	2710	Btuh
Floor total	258 sqft	11264	Btuh
Infiltration	233 cfm	9435	Btuh
Duct loss		0	Btuh
Subtotal		48212	Btuh
Ventilation	0 cfm	0	Btuh
TOTAL HEAT LOSS		48212	Btuh



SUMMER CALCULATIONS

Summer Cooling Load (for 2185 sqft)

Load component		Load	
Window total	394 sqft	32091	Btuh
Wall total	1832 sqft	3731	Btuh
Door total	20 sqft	196	Btuh
Ceiling total	2300 sqft	3809	Btuh
Floor total		0	Btuh
Infiltration	204 cfm	3793	Btuh
Internal gain		3780	Btuh
Duct gain		0	Btuh
Sens. Ventilation	0 cfm	0	Btuh
Total sensible gain		47400	Btuh
Latent gain(ducts)		0	Btuh
Latent gain(infiltration)		7448	Btuh
Latent gain(ventilation)		0	Btuh
Latent gain(internal/occupants/other)		1200	Btuh
Total latent gain		8648	Btuh
TOTAL HEAT GAIN		56048	Btuh



For Florida residences only

EnergyGauge® System Sizing

PREPARED BY: Jon Morris

DATE: 5-8-06

System Sizing Calculations - Winter

Residential Load - Whole House Component Details

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

Reference City: Gainesville (User customized) Winter Temperature Difference: 37.0 F

5/8/2006

Window	Panes/SHGC/Frame/U	Orientation	Area(sqft) X	HTM=	Load
1	1, Clear, Metal, 1.27	W	30.0	47.0	1410 Btuh
2	1, Clear, Metal, 1.27	W	105.0	47.0	4934 Btuh
3	1, Clear, Metal, 1.27	N	40.0	47.0	1880 Btuh
4	1, Clear, Metal, 1.27	W	30.0	47.0	1410 Btuh
5	1, Clear, Metal, 1.27	N	15.0	47.0	705 Btuh
6	1, Clear, Metal, 1.27	N	2.7	47.0	127 Btuh
7	1, Clear, Metal, 1.27	E	30.0	47.0	1410 Btuh
8	1, Clear, Metal, 1.27	E	35.6	47.0	1673 Btuh
9	1, Clear, Metal, 1.27	E	37.5	47.0	1762 Btuh
10	1, Clear, Metal, 1.27	E	22.5	47.0	1057 Btuh
11	1, Clear, Metal, 1.27	S	16.0	47.0	752 Btuh
12	1, Clear, Metal, 1.27	S	30.0	47.0	1410 Btuh
Window Total			394(sqft)		18528 Btuh
Walls	Type	R-Value	Area X	HTM=	Load
1	Frame - Wood - Ext(0.09)	13.0	1676	3.3	5503 Btuh
2	Frame - Wood - Adj(0.09)	13.0	156	3.3	512 Btuh
Wall Total			1832		6015 Btuh
Doors	Type		Area X	HTM=	Load
1	Insulated - Adjacent		20	12.9	259 Btuh
Door Total			20		259Btuh
Ceilings	Type/Color/Surface	R-Value	Area X	HTM=	Load
1	Vented Attic/D/Shin)	30.0	2300	1.2	2710 Btuh
Ceiling Total			2300		2710Btuh
Floors	Type	R-Value	Size X	HTM=	Load
1	Slab On Grade	0	258.0 ft(p)	43.7	11264 Btuh
Floor Total			258		11264 Btuh
Zone Envelope Subtotal:					38777 Btuh
Infiltration	Type	ACH X	Zone Volume	CFM=	Load
	Natural	0.80	17480	233.1	9435 Btuh
Ductload	Proposed leak free, R6.0, Supply(Attic), Return(Attic) (DLM of 0.00)				0 Btuh
Zone #1	Sensible Zone Subtotal				48212 Btuh

Manual J Winter Calculations

Residential Load - Component Details (continued)

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

5/8/2006



	Subtotal Sensible Ventilation Sensible Total Btuh Loss	48212 Btuh 0 Btuh 48212 Btuh
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Key: Window types (SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)

(Frame types - metal, wood or insulated metal)

(U - Window U-Factor or 'DEF' for default)

(HTM - ManualJ Heat Transfer Multiplier)

Key: Floor size (perimeter(p) for slab-on-grade or area for all other floor types)



For Florida residences only

System Sizing Calculations - Winter

Residential Load - Room by Room Component Details

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

Reference City: Gainesville (User customized) Winter Temperature Difference: 37.0 F

5/8/2006

Window	Panes/SHGC/Frame/U	Orientation	Area(sqft)	X	HTM=	Load
1	1, Clear, Metal, 1.27	W	30.0		47.0	1410 Btuh
2	1, Clear, Metal, 1.27	W	105.0		47.0	4934 Btuh
3	1, Clear, Metal, 1.27	N	40.0		47.0	1880 Btuh
4	1, Clear, Metal, 1.27	W	30.0		47.0	1410 Btuh
5	1, Clear, Metal, 1.27	N	15.0		47.0	705 Btuh
6	1, Clear, Metal, 1.27	N	2.7		47.0	127 Btuh
7	1, Clear, Metal, 1.27	E	30.0		47.0	1410 Btuh
8	1, Clear, Metal, 1.27	E	35.6		47.0	1673 Btuh
9	1, Clear, Metal, 1.27	E	37.5		47.0	1762 Btuh
10	1, Clear, Metal, 1.27	E	22.5		47.0	1057 Btuh
11	1, Clear, Metal, 1.27	S	16.0		47.0	752 Btuh
12	1, Clear, Metal, 1.27	S	30.0		47.0	1410 Btuh
Window Total			394(sqft)			18528 Btuh
Walls	Type	R-Value	Area	X	HTM=	Load
1	Frame - Wood - Ext(0.09)	13.0	1676		3.3	5503 Btuh
2	Frame - Wood - Adj(0.09)	13.0	156		3.3	512 Btuh
Wall Total			1832			6015 Btuh
Doors	Type		Area	X	HTM=	Load
1	Insulated - Adjacent		20		12.9	259 Btuh
Door Total			20			259Btuh
Ceilings	Type/Color/Surface	R-Value	Area	X	HTM=	Load
1	Vented Attic/D/Shin)	30.0	2300		1.2	2710 Btuh
Ceiling Total			2300			2710Btuh
Floors	Type	R-Value	Size	X	HTM=	Load
1	Slab On Grade	0	258.0 ft(p)		43.7	11264 Btuh
Floor Total			258			11264 Btuh
Zone Envelope Subtotal:						38777 Btuh
Infiltration	Type	ACH	Zone Volume		CFM=	
	Natural	0.80	17480		233.1	9435 Btuh
Ductload	Proposed leak free, R6.0, Supply(Attic), Return(Attic) (DLM of 0.00)					0 Btuh
Zone #1	Sensible Zone Subtotal					48212 Btuh

Manual J Winter Calculations

Residential Load - Component Details (continued)

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

5/8/2006



	Subtotal Sensible Ventilation Sensible Total Btuh Loss	48212 Btuh 0 Btuh 48212 Btuh
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Key: Window types (SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)

(Frame types - metal, wood or insulated metal)

(U - Window U-Factor or 'DEF' for default)

(HTM - ManualJ Heat Transfer Multiplier)

Key: Floor size (perimeter(p) for slab-on-grade or area for all other floor types)



For Florida residences only

System Sizing Calculations - Summer

Residential Load - Whole House Component Details

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

Reference City: Gainesville (User customized) Summer Temperature Difference: 17.0 F 5/8/2006

Window	Type*	Omt	Overhang		Window Area(sqft)			HTM		Load
	Pn/SHGC/U/InSh/ExSh/IS		Len	Hgt	Gross	Shaded	Unshaded	Shaded	Unshaded	
1	1, Clear, 1.27, None,N,N	W	1.5ft	8ft.	30.0	0.0	30.0	37	94	2815 Btuh
2	1, Clear, 1.27, None,N,N	W	1.5ft	10ft.	105.0	0.0	105.0	37	94	9852 Btuh
3	1, Clear, 1.27, None,N,N	N	17.5f	10ft.	40.0	0.0	40.0	37	37	1493 Btuh
4	1, Clear, 1.27, None,N,N	W	9.5ft	10ft.	30.0	17.3	12.7	37	94	1837 Btuh
5	1, Clear, 1.27, None,N,N	N	1.5ft	8ft.	15.0	0.0	15.0	37	37	560 Btuh
6	1, Clear, 1.27, None,N,N	N	1.5ft	8ft.	2.7	0.0	2.7	37	37	101 Btuh
7	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	30.0	0.0	30.0	37	94	2815 Btuh
8	1, Clear, 1.27, None,N,N	E	9ft.	10ft.	35.6	22.1	13.5	37	94	2092 Btuh
9	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	37.5	0.0	37.5	37	94	3519 Btuh
10	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	22.5	0.0	22.5	37	94	2111 Btuh
11	1, Clear, 1.27, None,N,N	S	1.5ft	8ft.	16.0	16.0	0.0	37	43	597 Btuh
12	1, Clear, 1.27, None,N,N	S	1.5ft	8ft.	30.0	30.0	0.0	37	43	1120 Btuh
Excursion										3179 Btuh
Window Total					394 (sqft)					32091 Btuh
Walls	Type	R-Value/U-Value			Area(sqft)		HTM		Load	
1	Frame - Wood - Ext	13.0/0.09			1675.7		2.1		3495 Btuh	
2	Frame - Wood - Adj	13.0/0.09			156.0		1.5		235 Btuh	
Wall Total					1832 (sqft)				3731 Btuh	
Doors	Type				Area (sqft)		HTM		Load	
1	Insulated - Adjacent				20.0		9.8		196 Btuh	
Door Total					20 (sqft)				196 Btuh	
Ceilings	Type/Color/Surface	R-Value			Area(sqft)		HTM		Load	
1	Vented Attic/DarkShingle	30.0			2300.0		1.7		3809 Btuh	
Ceiling Total					2300 (sqft)				3809 Btuh	
Floors	Type	R-Value			Size		HTM		Load	
1	Slab On Grade	0.0			258 (ft(p))		0.0		0 Btuh	
Floor Total					258.0 (sqft)				0 Btuh	
Zone Envelope Subtotal:										39827 Btuh
Infiltration	Type	ACH			Volume(cuft)		CFM=		Load	
	SensibleNatural	0.70			17480		203.9		3793 Btuh	
Internal gain	Occupants			Btuh/occupant			Appliance		Load	
	6			X 230 +			2400		3780 Btuh	
Duct load	Proposed leak free, R6.0, Supply(Attic), Return(Attic)							DGM = 0.00		0.0 Btuh
Sensible Zone Load										47400 Btuh

Manual J Summer Calculations

Residential Load - Component Details (continued)

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

5/8/2006

Whole House Totals for Cooling	Sensible Envelope Load All Zones	47400 Btuh
	Sensible Duct Load	0 Btuh
	Total Sensible Zone Loads	47400 Btuh
	Sensible ventilation	0 Btuh
	Blower	0 Btuh
	Total sensible gain	47400 Btuh
	Latent infiltration gain (for 54 gr. humidity difference)	7448 Btuh
	Latent ventilation gain	0 Btuh
	Latent duct gain	0 Btuh
	Latent occupant gain (6 people @ 200 Btuh per person)	1200 Btuh
	Latent other gain	0 Btuh
	Latent total gain	8648 Btuh
	TOTAL GAIN	56048 Btuh

*Key: Window types (Pn - Number of panes of glass)

(SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)

(U - Window U-Factor or 'DEF' for default)

(InSh - Interior shading device: none(N), Blinds(B), Draperies(D) or Roller Shades(R))

(ExSh - Exterior shading device: none(N) or numerical value)

(BS - Insect screen: none(N), Full(F) or Half(H))

(Ornt - compass orientation)



For Florida residences only

System Sizing Calculations - Summer

Residential Load - Room by Room Component Details

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

Reference City: Gainesville (User customized) Summer Temperature Difference: 17.0 F 5/8/2006

Window	Type*	Ornt	Overhang		Window Area(sqft)			HTM		Load	
	Pn/SHGC/U/InSh/ExSh/IS		Len	Hgt	Gross	Shaded	Unshaded	Shaded	Unshaded		
1	1, Clear, 1.27, None,N,N	W	1.5ft	8ft.	30.0	0.0	30.0	37	94	2815	Btuh
2	1, Clear, 1.27, None,N,N	W	1.5ft	10ft.	105.0	0.0	105.0	37	94	9852	Btuh
3	1, Clear, 1.27, None,N,N	N	17.5f	10ft.	40.0	0.0	40.0	37	37	1493	Btuh
4	1, Clear, 1.27, None,N,N	W	9.5ft	10ft.	30.0	17.3	12.7	37	94	1837	Btuh
5	1, Clear, 1.27, None,N,N	N	1.5ft	8ft.	15.0	0.0	15.0	37	37	560	Btuh
6	1, Clear, 1.27, None,N,N	N	1.5ft	8ft.	2.7	0.0	2.7	37	37	101	Btuh
7	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	30.0	0.0	30.0	37	94	2815	Btuh
8	1, Clear, 1.27, None,N,N	E	9ft.	10ft.	35.6	22.1	13.5	37	94	2092	Btuh
9	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	37.5	0.0	37.5	37	94	3519	Btuh
10	1, Clear, 1.27, None,N,N	E	1.5ft	8ft.	22.5	0.0	22.5	37	94	2111	Btuh
11	1, Clear, 1.27, None,N,N	S	1.5ft	8ft.	16.0	16.0	0.0	37	43	597	Btuh
12	1, Clear, 1.27, None,N,N	S	1.5ft	8ft.	30.0	30.0	0.0	37	43	1120	Btuh
Excursion										3179	Btuh
Window Total					394 (sqft)					32091 Btuh	
Walls	Type		R-Value/U-Value		Area(sqft)		HTM		Load		
1	Frame - Wood - Ext		13.0/0.09		1675.7		2.1		3495 Btuh		
2	Frame - Wood - Adj		13.0/0.09		156.0		1.5		235 Btuh		
Wall Total					1832 (sqft)				3731 Btuh		
Doors	Type				Area (sqft)		HTM		Load		
1	Insulated - Adjacent				20.0		9.8		196 Btuh		
Door Total					20 (sqft)				196 Btuh		
Ceilings	Type/Color/Surface		R-Value		Area(sqft)		HTM		Load		
1	Vented Attic/DarkShingle		30.0		2300.0		1.7		3809 Btuh		
Ceiling Total					2300 (sqft)				3809 Btuh		
Floors	Type		R-Value		Size		HTM		Load		
1	Slab On Grade		0.0		258 (ft(p))		0.0		0 Btuh		
Floor Total					258.0 (sqft)				0 Btuh		
Zone Envelope Subtotal:										39827 Btuh	
Infiltration	Type		ACH		Volume(cuft)		CFM=		Load		
	SensibleNatural		0.70		17480		203.9		3793 Btuh		
Internal gain			Occupants		Btuh/occupant		Appliance		Load		
			6		X 230 +		2400		3780 Btuh		
Duct load	Proposed leak free, R6.0, Supply(Attic), Return(Attic)							DGM = 0.00		0.0 Btuh	
Sensible Zone Load										47400 Btuh	

Manual J Summer Calculations

Residential Load - Component Details (continued)

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

Code Only
Professional Version
Climate: North

, FL 32024-

5/8/2006

Whole House Totals for Cooling	Sensible Envelope Load All Zones	47400 Btuh
	Sensible Duct Load	0 Btuh
	Total Sensible Zone Loads	47400 Btuh
	Sensible ventilation	0 Btuh
	Blower	0 Btuh
	Total sensible gain	47400 Btuh
	Latent infiltration gain (for 54 gr. humidity difference)	7448 Btuh
	Latent ventilation gain	0 Btuh
	Latent duct gain	0 Btuh
	Latent occupant gain (6 people @ 200 Btuh per person)	1200 Btuh
	Latent other gain	0 Btuh
	Latent total gain	8648 Btuh
	TOTAL GAIN	56048 Btuh

*Key: Window types (Pn - Number of panes of glass)
(SHGC - Shading coefficient of glass as SHGC numerical value or as clear or tint)
(U - Window U-Factor or 'DEF' for default)
(InSh - Interior shading device: none(N), Blinds(B), Draperies(D) or Roller Shades(R))
(ExSh - Exterior shading device: none(N) or numerical value)
(BS - Insect screen: none(N), Full(F) or Half(H))
(Omt - compass orientation)



For Florida residences only

Residential Window Diversity

MidSummer

Nickelson Residence

Project Title:
Joey & Lydia Nickelson

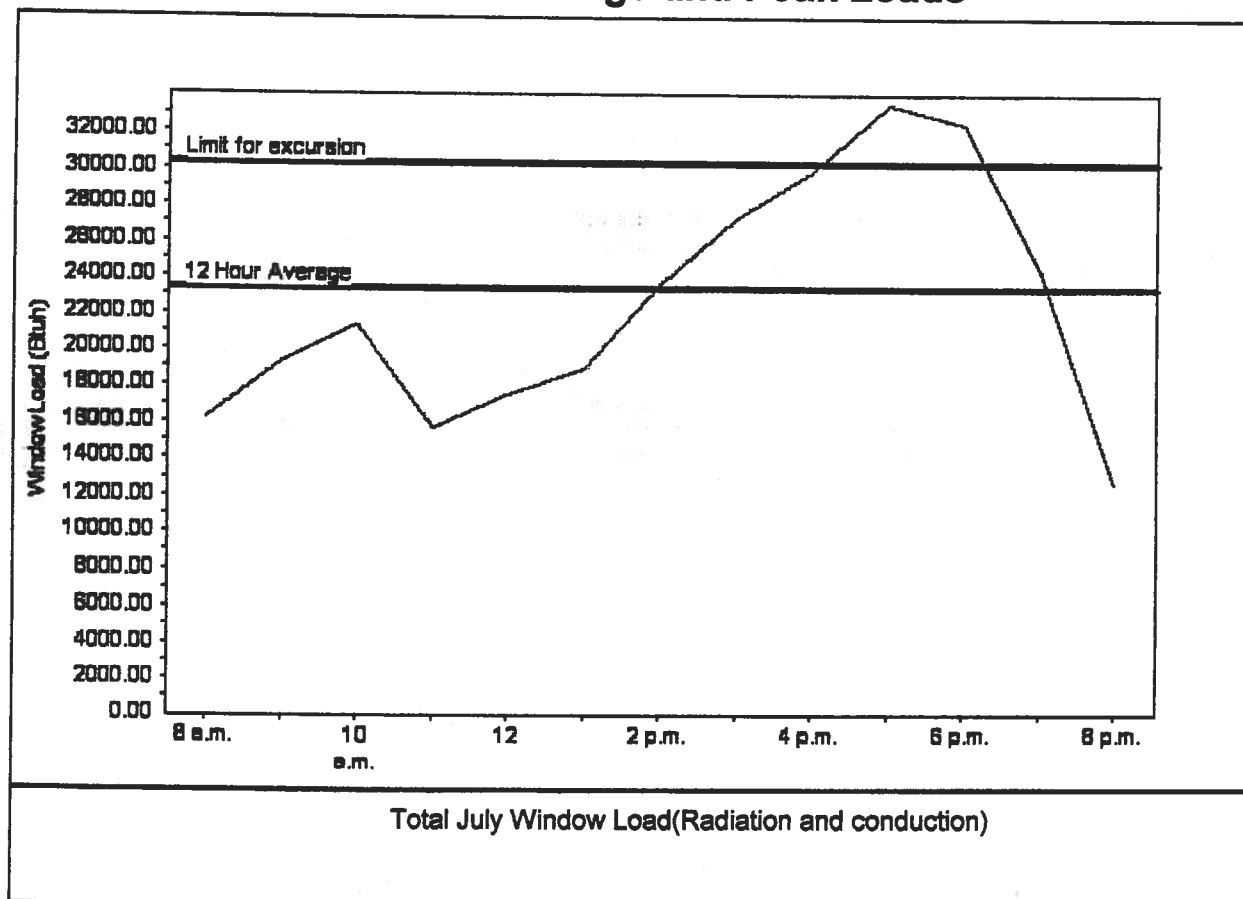
Code Only
Professional Version
Climate: North

, FL 32024-

5/8/2006

Summer design temperature	92 F	Average window load for July	23344 Btu
Summer setpoint	75 F	Peak window load for July	33527 Btu
Summer temperature difference	17 F	Excursion limit(130% of Ave.)	30348 Btu
Latitude	30 North	Window excursion (July)	3179 Btuh

WINDOW Average and Peak Loads



Warning: This application has glass areas that produce relatively large heat gains for part of the day. Variable air volume devices may be required to overcome spikes in solar gain for one or more rooms. A zoned system may be required or some rooms may require zone control.

EnergyGauge® System Sizing for Florida residences only

PREPARED BY: _____

DATE: _____

EnergyGauge® FLRCPB v4.1



COLUMBIA COUNTY BUILDING DEPARTMENT

RESIDENTIAL MINIMUM PLAN REQUIREMENTS AND CHECKLIST FOR FLORIDA BUILDING CODE 2001

ONE (1) AND TWO (2) FAMILY DWELLINGS

ALL REQUIREMENTS ARE SUBJECT TO CHANGE

EFFECTIVE MARCH 1, 2002

ALL BUILDING PLANS MUST INDICATE THE FOLLOWING ITEMS AND INDICATE COMPLIANCE WITH CHAPTER 1606 OF THE FLORIDA BUILDING CODE 2001 BY PROVIDING CALCULATIONS AND DETAILS THAT HAVE THE SEAL AND SIGNATURE OF A CERTIFIED ARCHITECT OR ENGINEER REGISTERED IN THE STATE OF FLORIDA, OR ALTERNATE METHODOLOGIES, APPROVED BY THE STATE OF FLORIDA BUILDING COMMISSION FOR ONE-AND-TWO FAMILY DWELLINGS. FOR DESIGN PURPOSES THE FOLLOWING BASIC WIND SPEED AS PER FIGURE 1606 SHALL BE USED.

WIND SPEED LINE SHALL BE DEFINED AS FOLLOWS: THE CENTERLINE OF INTERSTATE 75.

1. ALL BUILDINGS CONSTRUCTED EAST OF SAID LINE SHALL BE ----- 100 MPH
2. ALL BUILDINGS CONSTRUCTED WEST OF SAID LINE SHALL BE ----- 110 MPH
3. NO AREA IN COLUMBIA COUNTY IS IN A WIND BORNE DEBRIS REGION

APPLICANT - PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL

GENERAL REQUIREMENTS: Two (2) complete sets of plans containing the following:

Applicant Plans Examiner

- | | | |
|-------------------------------------|--------------------------|--|
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | All drawings must be clear, concise and drawn to scale ("Optional " details that are not used shall be marked void or crossed off). Square footage of different areas shall be shown on plans. |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | Designers name and signature on document (FBC 104.2.1). If licensed architect or engineer, official seal shall be affixed. |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <u>Site Plan including:</u>
a) Dimensions of lot
b) Dimensions of building set backs
c) Location of all other buildings on lot, well and septic tank if applicable, and all utility easements.
d) Provide a full legal description of property. |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <u>Wind-load Engineering Summary, calculations and any details required</u>
a) Plans or specifications must state compliance with FBC Section 1606
b) The following information must be shown as per section 1606.1.7 FBC
a. Basic wind speed (MPH)
b. Wind importance factor (I) and building category
c. Wind exposure - if more than one wind exposure is used, the wind exposure and applicable wind direction shall be indicated
d. The applicable internal pressure coefficient
e. Components and Cladding. The design wind pressure in terms of psf (kN/m ²), to be used for the design of exterior component and cladding materials not specifically designed by the registered design professional |
| <input checked="" type="checkbox"/> | <input type="checkbox"/> | <u>Elevations including:</u>
a) All sides
b) Roof pitch
c) Overhang dimensions and detail with attic ventilation
d) Location, size and height above roof of chimneys
e) Location and size of skylights
f) Building height
g) Number of stories |

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Floor Plan including:

- a) Rooms labeled and dimensioned
- b) Shear walls
- c) Windows and doors (including garage doors) showing size, mfg., approval listing and attachment specs. (FBC 1707) and safety glazing where needed (egress windows in bedrooms to be shown)
- d) Fireplaces (gas appliance) (vented or non-vented) or wood burning with hearth
- e) Stairs with dimensions (width, tread and riser) and details of guardrails and handrails
- f) Must show and identify accessibility requirements (accessable bathroom)

Foundation Plan including:

- a) Location of all load-bearing wall with required footings indicated as standard Or monolithic and dimensions and reinforcing
- b) All posts and/or column footing including size and reinforcing
- c) Any special support required by soil analysis such as piling
- d) Location of any vertical steel

Roof System:

- a) Truss package including:
 - 1. Truss layout and truss details signed and sealed by Fl. Pro. Eng.
 - 2. Roof assembly (FBC 104.2.1 Roofing system, materials, manufacturer, fastening requirements and product evaluation with wind resistance rating)
- b) Conventional Framing Layout including:
 - 1. Rafter size, species and spacing
 - 2. Attachment to wall and uplift
 - 3. Ridge beam sized and valley framing and support details
 - 4. Roof assembly (FBC 104.2.1 Roofing systems, materials, manufacturer, fastening requirements and product evaluation with wind resistance rating)

Wall Sections including:

- a) Masonry wall
 - 1. All materials making up wall
 - 2. Block size and mortar type with size and spacing of reinforcement
 - 3. Lintel, tie-beam sizes and reinforcement
 - 4. Gable ends with rake beams showing reinforcement or gable truss and wall bracing details
 - 5. All required connectors with uplift rating and required number and size of fasteners for continuous tie from roof to foundation
 - 6. Roof assembly shown here or on roof system detail (FBC 104.2.1 Roofing system, materials, manufacturer, fastening requirements and product evaluation with resistance rating)
 - 7. Fire resistant construction (if required)
 - 8. Fireproofing requirements
 - 9. Shoe type of termite treatment (termicide or alternative method)
 - 10. Slab on grade
 - a. Vapor retarder (6mil. Polyethylene with joints lapped 6 inches and sealed)
 - b. Must show control joints, synthetic fiber reinforcement or Welded fire fabric reinforcement and supports
 - 11. Indicate where pressure treated wood will be placed
 - 12. Provide insulation R value for the following:
 - a. Attic space
 - b. Exterior wall cavity
 - c. Crawl space (if applicable)

1

□

b) Wood frame wall

1. All materials making up wall
2. Size and species of studs
3. Sheathing size, type and nailing schedule
4. Headers sized
5. Gable end showing balloon framing detail or gable truss and wall hinge bracing detail
6. All required fasteners for continuous tie from roof to foundation (truss anchors, straps, anchor bolts and washers)
7. Roof assembly shown here or on roof system detail (FBC104.2.1 Roofing system, materials, manufacturer, fastening requirements and product evaluation with wind resistance rating)
8. Fire resistant construction (if applicable)
9. Fireproofing requirements
10. Show type of termite treatment (termiteicide or alternative method)
11. Slab on grade
 - a. Vapor retarder (6Mil. Polyethylene with joints lapped 6 inches and sealed)
 - b. Must show control joints, synthetic fiber reinforcement or welded wire fabric reinforcement and supports
12. Indicate where pressure treated wood will be placed
13. Provide insulation R value for the following:
 - a. Attic space
 - b. Exterior wall cavity
 - c. Crawl space (if applicable)

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c) Metal frame wall and roof (designed, signed and sealed by Florida Prof. Engineer or Architect)

Floor Framing System:

- a) Floor truss package including layout and details, signed and sealed by Florida Registered Professional Engineer
- b) Floor joist size and spacing
- c) Girder size and spacing
- d) Attachment of joist to girder
- e) Wind load requirements where applicable

Plumbing Fixture layout

Electrical layout including:

- a) Switches, outlets/receptacles, lighting and all required GFCI outlets identified
- b) Ceiling fans
- c) Smoke detectors
- d) Service panel and sub-panel size and location(s)
- e) Meter location with type of service entrance (overhead or underground)
- f) Appliances and HVAC equipment

HVAC information

- a) Manual J sizing equipment or equivalent computation
- b) Exhaust fans in bathroom

Energy Calculations (dimensions shall match plans)

Gas System Type (LP or Natural) Location and BTU demand of equipment

Disclosure Statement for Owner Builders

Notice Of Commencement

Private Potable Water

- a) Size of pump motor
- b) Size of pressure tank
- c) Cycle stop valve if used

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