DATE 12/02/2005

# Columbia County Building Permit

**This Permit Expires One Year From the Date of Issue**

**PERMIT**
**000023921**

APPLICANT MELANIE RODER PHONE 752.2281

ADDRESS 287 SW KEMP CT LAKE CITY FL 32024

OWNER AARON SIMQUE HOMES PHONE 755.0841

ADDRESS 169 SE CAROB GLEN LAKE CITY FL 32025

CONTRACTOR AARON SIMQUE PHONE 755.0841

LOCATION OF PROPERTY 90-E TO SR 100,TR TO C-245,TR TO PLANT,TR TO GOLDIE WAY,TL TO CAROB GLEN,TR AND IT'S THE 3RD LOT ON R.

TYPE DEVELOPMENT SFD/UTILITY ESTIMATED COST OF CONSTRUCTION 77250.00

HEATED FLOOR AREA 1545.00 TOTAL AREA 2279.00 HEIGHT 21.10 STORIES 1

FOUNDATION CONC WALLS FRAMED ROOF PITCH 8'12 FLOOR CONC

LAND USE & ZONING RSF-2 MAX. HEIGHT 35

Minimum Set Back Requirments: STREET-FRONT 25.00 REAR 15.00 SIDE 10.00

NO. EX.D.U. 0 FLOOD ZONE XPS DEVELOPMENT PERMIT NO.

PARCEL ID 03-4S-17-07570-024 SUBDIVISION SUZANNE

LOT 24 BLOCK PHASE UNIT 1 TOTAL ACRES .68

| 000000906 | | RB29003130 | Melanie Roder | |
|---|---|---|---|---|
| Culvert Permit No. | Culvert Waiver | Contractor's License Number | Applicant/Owner/Contractor | |
| 18"X32'MITERED | 05-1039-N | BLK | JTH | N |
| Driveway Connection | Septic Tank Number | LU & Zoning checked by | Approved for Issuance | New Resident |

COMMENTS: NOC ON FILE. 1 FOOT ABOVE ROAD

Check # or Cash 51333

## FOR BUILDING & ZONING DEPARTMENT ONLY

(footer/Slab)

Temporary Power _____ date/app. by Foundation _____ date/app. by Monolithic _____ date/app. by

Under slab rough-in plumbing _____ date/app. by Slab _____ date/app. by Sheathing/Nailing _____ date/app. by

Framing _____ date/app. by Rough-in plumbing above slab and below wood floor _____ date/app. by

Electrical rough-in _____ date/app. by Heat & Air Duct _____ date/app. by Peri. beam (Lintel) _____ date/app. by

Permanent power _____ date/app. by C.O. Final _____ date/app. by Culvert _____ date/app. by

M/H tie downs, blocking, electricity and plumbing _____ date/app. by Pool _____ date/app. by

Reconnection _____ date/app. by Pump pole _____ date/app. by Utility Pole _____ date/app. by

M/H Pole _____ date/app. by Travel Trailer _____ date/app. by Re-roof _____ date/app. by

BUILDING PERMIT FEE $ 390.00 CERTIFICATION FEE $ 11.40 SURCHARGE FEE $ 11.40

MISC. FEES $ .00 ZONING CERT. FEE $ 50.00 FIRE FEE $ .00 WASTE FEE $

FLOOD DEVELOPMENT FEE $ FLOOD ZONE FEE $ 25.00 CULVERT FEE $ 25.00 **TOTAL FEE** 512.80

INSPECTORS OFFICE CH CLERKS OFFICE CH

NOTICE: IN ADDITION TO THE REQUIREMENTS OF THIS PERMIT, THERE MAY BE ADDITIONAL RESTRICTIONS APPLICABLE TO THIS PROPERTY THAT MAY BE FOUND IN THE PUBLIC RECORDS OF THIS COUNTY. AND THERE MAY BE ADDITIONAL PERMITS REQUIRED FROM OTHER GOVERNMENTAL ENTITIES SUCH AS WATER MANAGEMENT DISTRICTS, STATE AGENCIES, OR FEDERAL AGENCIES.

**"WARNING TO OWNER: YOUR FAILURE TO RECORD A NOTICE OF COMMENCEMENT MAY RESULT IN YOUR PAYING TWICE FOR IMPROVEMENTS TO YOUR PROPERTY. IF YOU INTEND TO OBTAIN FINANCING, CONSULT WITH YOUR LENDER OR AN ATTORNEY BEFORE RECORDING YOUR NOTICE OF COMMENCEMENT."**

## This Permit Must Be Prominently Posted on Premises During Construction

PLEASE NOTIFY THE COLUMBIA COUNTY BUILDING DEPARTMENT AT LEAST 24 HOURS IN ADVANCE OF EACH INSPECTION, IN ORDER THAT IT MAY BE MADE WITHOUT DELAY OR INCONVIENCE, PHONE 758-1008. THIS PERMIT IS NOT VALID UNLESS THE WORK AUTHORIZED BY IT IS COMMENCED WITHIN 6 MONTHS AFTER ISSUANCE.

The Issuance of this Permit Does Not Waive Compliance by Permittee with Deed Restrictions.

# CERTIFICATE OF

# OCCUPANCY

## COLUMBIA COUNTY, FLORIDA

## Department of Building and Zoning Inspection

***This Certificate of Occupancy is issued to the below named permit holder for the building and premises at the below named location, and certifies that the work has been completed in accordance with the Columbia County Building Code.***

**Parcel Number** 03-4S-17-07570-024

**Building permit No.** 000023921

**Use Classification** SFD/UTILITY

**Fire:** 17.76

**Permit Holder** AARON SIMQUE

**Waste:** 36.75

**Owner of Building** AARON SIMQUE HOMES

**Total:** 54.51

**Location:** 169 SE CAROB GLEN(SUZANNE, LOT 24)

**Date:** 07/26/2006

**Building Inspector**

**POST IN A CONSPICUOUS PLACE**
***(Business Places Only)***

MiTek

RE: 8596-1 - SIMQUE HOMES (LOT 24)

**MiTek Industries, Inc.**
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO 63017-5746
Telephone 314/434-1200
Fax 314/434-5343

**Site Information:**
Project Customer: simque homes Project Name: lot 24
Lot/Block: Subdivision:
Address:
City: LAKE CITY State: FL

**Name Address and License # of Structural Engineer of Record, If there is one, for the building.**
Name: License #:
Address:
City: State:

**General Truss Engineering Criteria & Design Loads (Individual Truss Design Drawings Show Special Loading Conditions):**
Design Code: FBC2001/ANSI9 Design Program: MiTek 20/20 6.2
Wind Code: ASCE 7-98 Wind Speed: 110 mph Design Method: Main Wind Force Resisting System ASCE 7-98
Roof Load: 40.0 psf Floor Load: N/A psf

This package includes 37 individual, dated Truss Design Drawings and 0 Additional Drawings.
With my seal affixed to this sheet, I hereby certify that I am the Truss Design Engineer and this index sheet conforms to 61G15-31.003, section 5 of the Florida Board of Professional Engineers Rules.

| No. | Seal# | Job ID# | Truss Name | Date | No. | Seal# | Job ID# | Truss Name | Date |
|---|---|---|---|---|---|---|---|---|---|
| 1 | I9261002 | 8596-1 | CJ7 | 10/20/05 | 18 | I9261019 | 8596-1 | H3 | 10/20/05 |
| 2 | I9261003 | 8596-1 | CJ9 | 10/20/05 | 19 | I9261020 | 8596-1 | H4 | 10/20/05 |
| 3 | I9261004 | 8596-1 | CJ9A | 10/20/05 | 20 | I9261021 | 8596-1 | H5 | 10/20/05 |
| 4 | I9261005 | 8596-1 | G1 | 10/20/05 | 21 | I9261022 | 8596-1 | H6 | 10/20/05 |
| 5 | I9261006 | 8596-1 | G2 | 10/20/05 | 22 | I9261023 | 8596-1 | H7 | 10/20/05 |
| 6 | I9261007 | 8596-1 | H1 | 10/20/05 | 23 | I9261024 | 8596-1 | H8 | 10/20/05 |
| 7 | I9261008 | 8596-1 | H10 | 10/20/05 | 24 | I9261025 | 8596-1 | H9 | 10/20/05 |
| 8 | I9261009 | 8596-1 | H11 | 10/20/05 | 25 | I9261026 | 8596-1 | J1 | 10/20/05 |
| 9 | I9261010 | 8596-1 | H12 | 10/20/05 | 26 | I9261027 | 8596-1 | J3 | 10/20/05 |
| 10 | I9261011 | 8596-1 | H13 | 10/20/05 | 27 | I9261028 | 8596-1 | J3A | 10/20/05 |
| 11 | I9261012 | 8596-1 | H14 | 10/20/05 | 28 | I9261029 | 8596-1 | J4 | 10/20/05 |
| 12 | I9261013 | 8596-1 | H15 | 10/20/05 | 29 | I9261030 | 8596-1 | J5 | 10/20/05 |
| 13 | I9261014 | 8596-1 | H16 | 10/20/05 | 30 | I9261031 | 8596-1 | J5A | 10/20/05 |
| 14 | I9261015 | 8596-1 | H17 | 10/20/05 | 31 | I9261032 | 8596-1 | J7 | 10/20/05 |
| 15 | I9261016 | 8596-1 | H18 | 10/20/05 | 32 | I9261033 | 8596-1 | J7A | 10/20/05 |
| 16 | I9261017 | 8596-1 | H19 | 10/20/05 | 33 | I9261034 | 8596-1 | T1 | 10/20/05 |
| 17 | I9261018 | 8596-1 | H2 | 10/20/05 | 34 | I9261035 | 8596-1 | T2 | 10/20/05 |

The truss drawing(s) referenced above have been prepared by MiTek Industries, Inc. under my direct supervision based on the parameters provided by Reese Building Components, Inc.

Truss Design Engineer's Name: Miller, Scott
My license renewal date for the state of Florida is February 28, 2007.

**NOTE:** The seal on these drawings indicate acceptance of professional engineering responsibility solely for the truss components shown. The suitability and use of this component for any particular building is the responsibility of the building designer, per ANSI/TPI-1 Chapter 2.

Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

October 20,2005

Miller, Scott

MiTek

**MiTek Industries, Inc.**
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO 63017-5746
Telephone 314/434-1200
Fax 314/434-5343

RE: 8596-1 - SIMQUE HOMES (LOT 24)

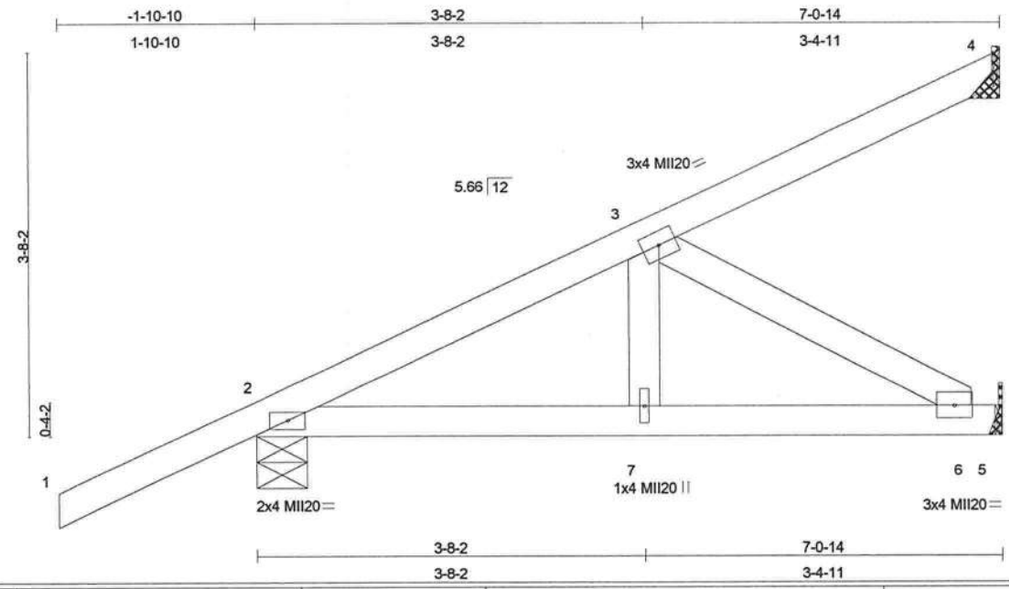
**Site Information:**

Project Customer: simque homes Project Name: lot 24
Lot/Block: Subdivision:
Address:
City: LAKE CITY State: FL

| No. | Seal# | Job ID# | Truss Name | Date |
|---|---|---|---|---|
| 35 | I9261036 | 8596-1 | T3 | 10/20/05 |
| 36 | I9261037 | 8596-1 | T4 | 10/20/05 |
| 37 | I9261038 | 8596-1 | T5 | 10/20/05 |

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | CJ7 | ROOF TRUSS | 2 | 1 | I9261002<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:39 2005 Page 1




| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.38 | Vert(LL) | 0.02 | 6-7 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.30 | Vert(TL) | -0.03 | 6-7 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.10 | Horz(TL) | 0.00 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 33 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 4=14/Mechanical, 2=307/0-5-11, 5=285/Mechanical
Max Horz 2=-104(load case 2)
Max Uplift2=-236(load case 4), 5=-117(load case 4)
Max Grav4=55(load case 2), 2=307(load case 1), 5=285(load case 1)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/48, 2-3=-272/100, 3-4=0/24
BOT CHORD 2-7=-29/220, 6-7=-29/220, 5-6=0/0
WEBS 3-7=-180/305, 3-6=-253/33

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 236 lb uplift at joint 2 and 117 lb uplift at joint 5.
4) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Regular: Lumber Increase=1.25, Plate Increase=1.25
Uniform Loads (plf)
Vert: 1-2=-60
Trapezoidal Loads (plf)
Vert: 2=-0(F=10, B=10)-to-5=-141(F=-61, B=-61)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Suite 300
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FL Cert.#6634

October 20,2005

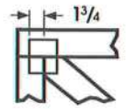



14515 N. Outer Forty,
Suite #300
Chesterfield, MO 63017

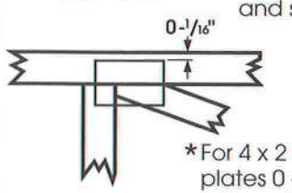

MiTek®

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

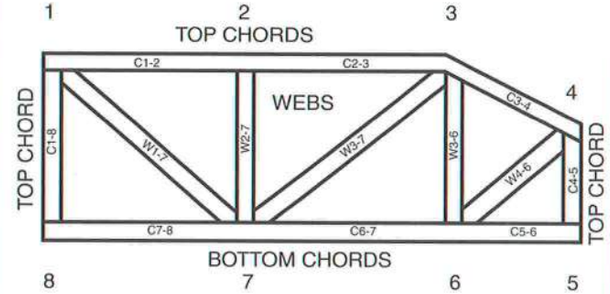
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | CJ9 | ROOF TRUSS | 2 | 1 | I9261003<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:40 2005 Page 1

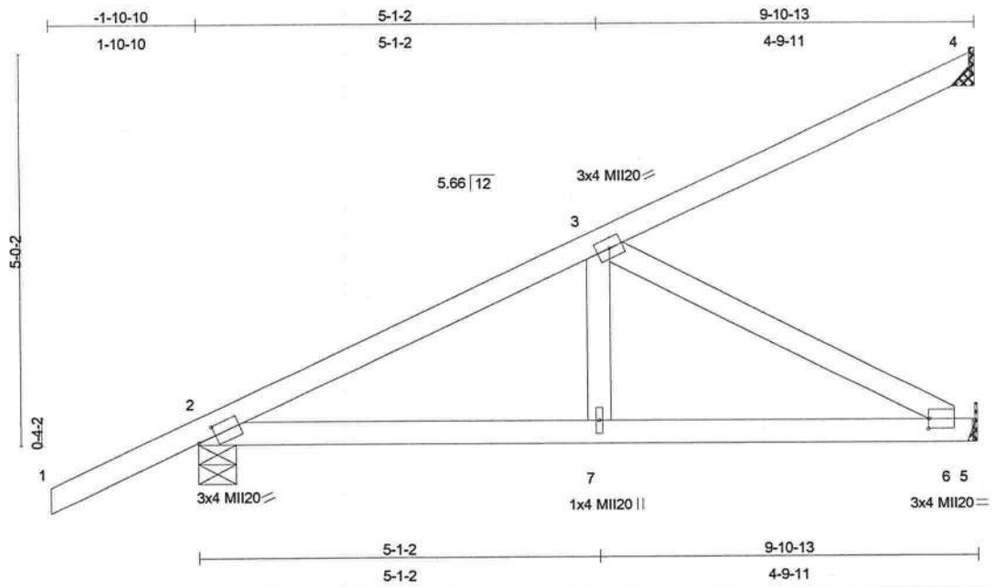



Plate Offsets (X,Y): [2:0-2-13,0-1-8], [6:0-0-2,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.36 | Vert(LL) | 0.14 | 6-7 | >847 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.83 | Vert(TL) | -0.16 | 6-7 | >716 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.30 | Horz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | FBC2001/ANSI95 | (Matrix) | | | | | | | Weight: 45 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 4=8/Mechanical, 2=458/0-5-11, 5=612/Mechanical
Max Horz 2=-163(load case 2)
Max Uplift2=-310(load case 4), 5=-311(load case 4)
Max Grav4=91(load case 2), 2=458(load case 1), 5=612(load case 1)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/48, 2-3=-607/286, 3-4=0/39
BOT CHORD 2-7=-201/534, 6-7=-201/534, 5-6=0/0
WEBS 3-7=-339/585, 3-6=-607/228

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 310 lb uplift at joint 2 and 311 lb uplift at joint 5.
4) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Regular: Lumber Increase=1.25, Plate Increase=1.25
Uniform Loads (plf)
Vert: 1-2=-60
Trapezoidal Loads (plf)
Vert: 2=-0(F=10, B=10)-to-5=-198(F=-89, B=-89)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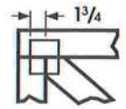
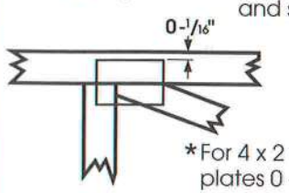
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

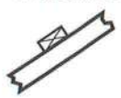
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

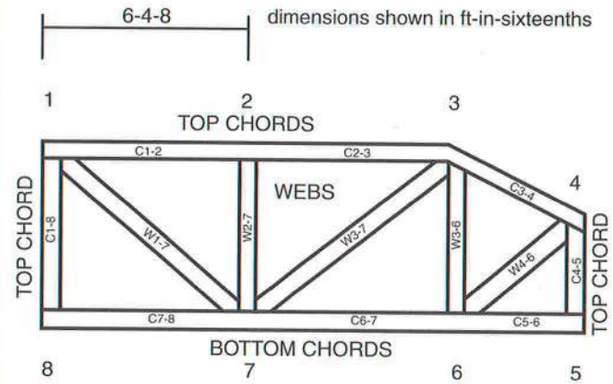
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

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**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

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8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
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12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | CJ9A | ROOF TRUSS | 1 | 1 | I9261004<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:40 2005 Page 1

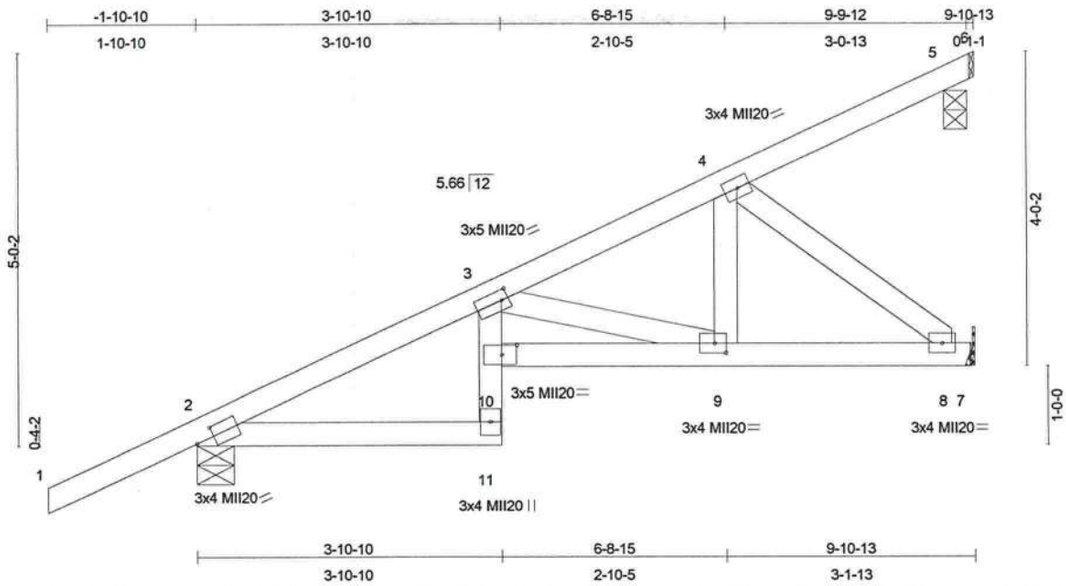


Plate Offsets (X,Y): [2:0-2-13,0-1-8], [3:0-1-0,0-1-8], [9:0-1-12,0-1-8], [10:0-2-4,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.36 | Vert(LL) | 0.06 | 9-10 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.78 | Vert(TL) | -0.08 | 9-10 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.22 | Horz(TL) | 0.04 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 49 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 9-9-4 oc bracing.

**REACTIONS** (lb/size) 2=458/0-5-11, 7=617/Mechanical, 5=-7/0-3-8
Max Horz 2=118(load case 4)
Max Uplift2=-300(load case 4), 7=-318(load case 4), 5=-7(load case 1)
Max Grav 2=458(load case 1), 7=617(load case 1), 5=75(load case 2)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/48, 2-3=-562/197, 3-4=-618/317, 4-5=0/32, 5-6=0/4
BOT CHORD 2-11=-215/472, 10-11=-44/106, 3-10=-101/160, 9-10=-393/966, 8-9=-260/561, 7-8=0/0
WEBS 3-9=-419/137, 4-9=-372/695, 4-8=-710/329

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 300 lb uplift at joint 2, 318 lb uplift at joint 7 and 7 lb uplift at joint 5.
4) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 5.
5) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Regular: Lumber Increase=1.25, Plate Increase=1.25
Uniform Loads (plf)
Vert: 1-2=-60, 5-6=40(F=60)
Trapezoidal Loads (plf)
Vert: 2=-0(F=10, B=10)-to-11=-72(F=-26, B=-26), 10=-72(F=-26, B=-26)-to-7=-198(F=-89, B=-89)


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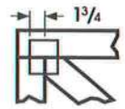
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

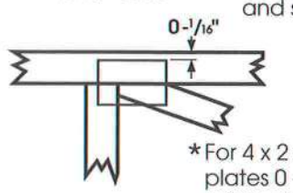
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

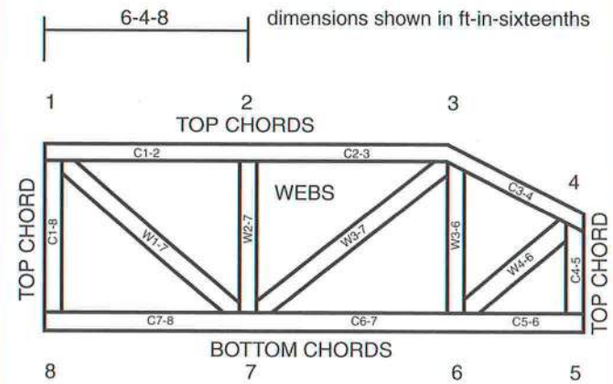
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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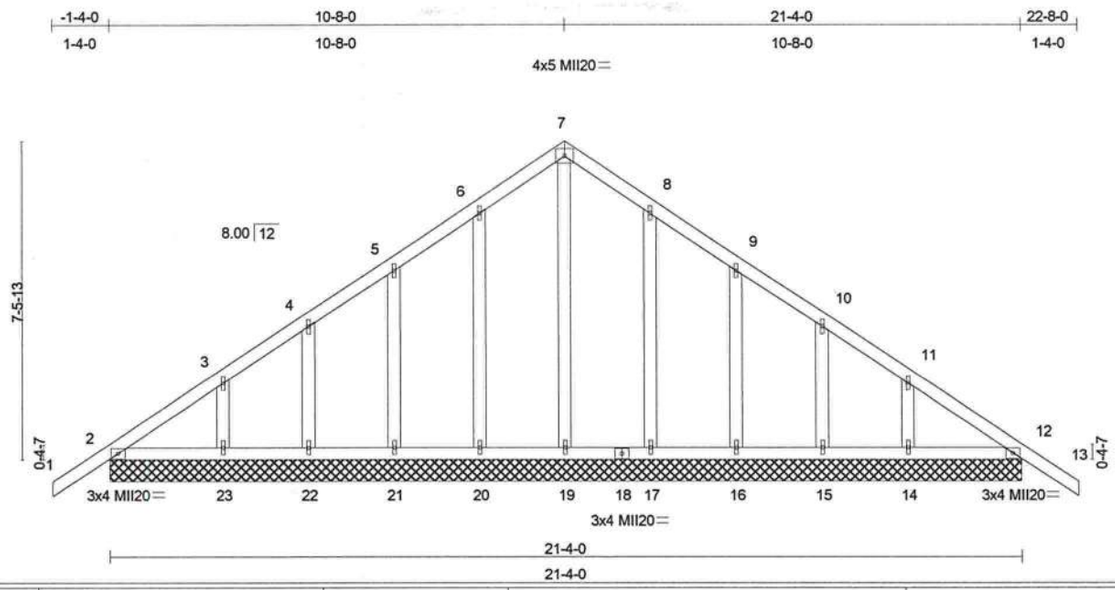
# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | G1 | ROOF TRUSS | 1 | 1 | I9261005<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:41 2005 Page 1




| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.17 | Vert(LL) | -0.00 | 13 | n/r | 120 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.08 | Vert(TL) | -0.01 | 13 | n/r | 90 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.16 | Horz(TL) | 0.01 | 12 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 128 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
OTHERS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=205/21-4-0, 19=137/21-4-0, 20=159/21-4-0, 21=162/21-4-0, 22=152/21-4-0, 23=187/21-4-0, 17=159/21-4-0, 16=162/21-4-0, 15=152/21-4-0, 14=187/21-4-0, 12=205/21-4-0
Max Horz 2=-307(load case 2)
Max Uplift 2=-101(load case 2), 20=-113(load case 4), 21=-124(load case 4), 22=-125(load case 4), 23=-115(load case 4), 17=-108(load case 5), 16=-126(load case 5), 15=-125(load case 5), 14=-114(load case 5), 12=-88(load case 5)
Max Grav 2=205(load case 1), 19=203(load case 5), 20=163(load case 6), 21=162(load case 1), 22=152(load case 6), 23=187(load case 6), 17=163(load case 7), 16=162(load case 1), 15=152(load case 7), 14=187(load case 7), 12=205(load case 1)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/43, 2-3=-252/193, 3-4=-178/175, 4-5=-120/169, 5-6=-60/214, 6-7=-54/254, 7-8=-54/238, 8-9=-55/157, 9-10=-54/82, 10-11=-68/65, 11-12=-142/83, 12-13=0/43
BOT CHORD 2-23=-45/231, 22-23=-45/231, 21-22=-45/231, 20-21=-45/231, 19-20=-45/231, 18-19=-45/231, 17-18=-45/231, 16-17=-45/231, 15-16=-45/231, 14-15=-45/231, 12-14=-45/231
WEBS 7-19=-183/0, 6-20=-123/132, 5-21=-122/146, 4-22=-114/138, 3-23=-140/155, 8-17=-123/127, 9-16=-122/148, 10-15=-114/138, 11-14=-140/154

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see MiTek "Standard Gable End Detail"
4) All plates are 1x4 MII20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) Gable studs spaced at 2-0-0 oc.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 101 lb uplift at joint 2, 113 lb uplift at joint 20, 124 lb uplift at joint 21, 125 lb uplift at joint 22, 115 lb uplift at joint 23, 108 lb uplift at joint 17, 126 lb uplift at joint 16, 125 lb uplift at joint 15 , 114 lb uplift at joint 14 and 88 lb uplift at joint 12.

**LOAD CASE(S)** Standard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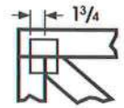
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

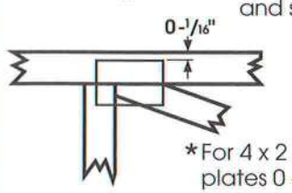

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

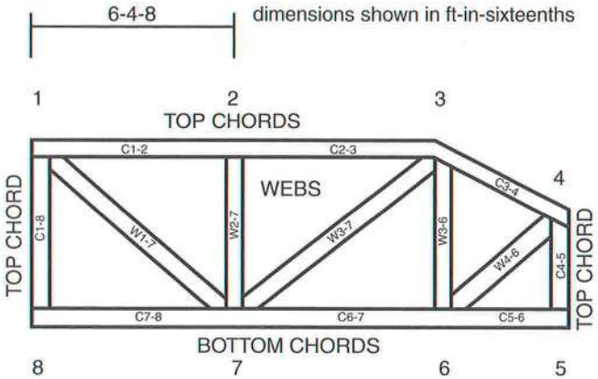
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | G2 | ROOF TRUSS | 1 | 1 | I9261006<br>Job Reference (optional) |

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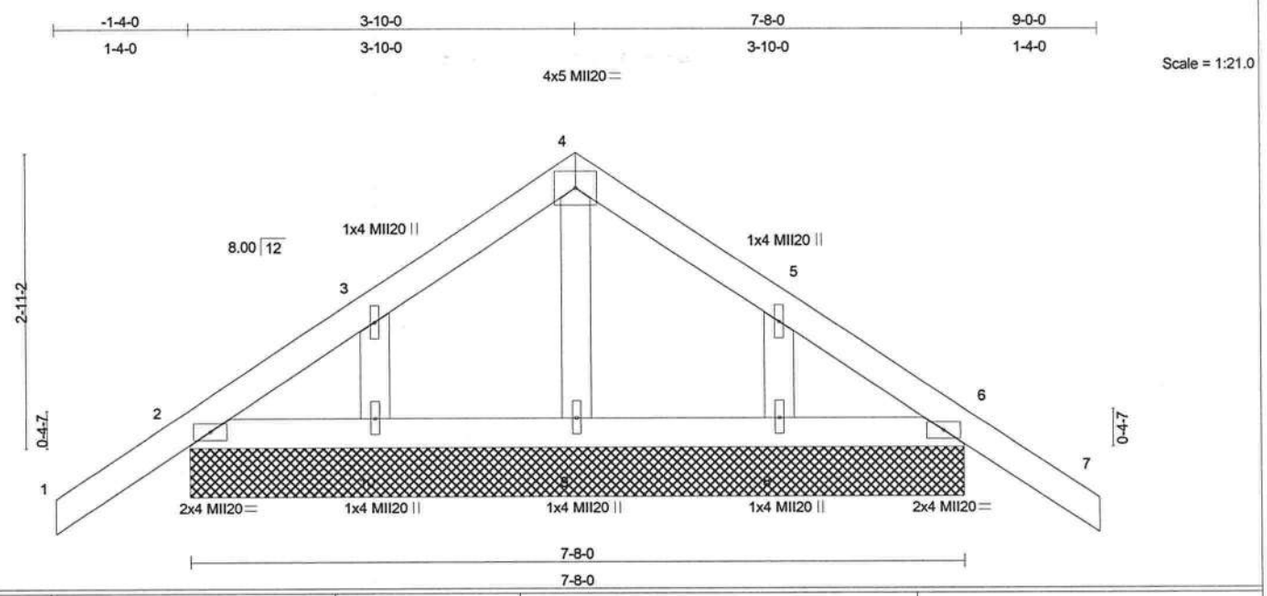


| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.17 | Vert(LL) | -0.01 | 7 | n/r | 120 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.03 | Vert(TL) | -0.01 | 7 | n/r | 90 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.03 | Horz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 37 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
OTHERS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=179/7-8-0, 6=179/7-8-0, 9=127/7-8-0, 10=144/7-8-0, 8=144/7-8-0
Max Horz 2=-115(load case 2)
Max Uplift2=-140(load case 4), 6=-162(load case 5), 10=-79(load case 4), 8=-78(load case 5)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/43, 2-3=-73/85, 3-4=-53/104, 4-5=-53/84, 5-6=-59/44, 6-7=0/43
BOT CHORD 2-10=-9/110, 9-10=-9/110, 8-9=-9/110, 6-8=-9/110
WEBS 4-9=-88/6, 3-10=-101/101, 5-8=-101/100

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see MiTek "Standard Gable End Detail"
4) Gable requires continuous bottom chord bearing.
5) Gable studs spaced at 2-0-0 oc.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 140 lb uplift at joint 2, 162 lb uplift at joint 6, 79 lb uplift at joint 10 and 78 lb uplift at joint 8.

**LOAD CASE(S)** Standard


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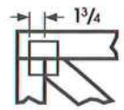
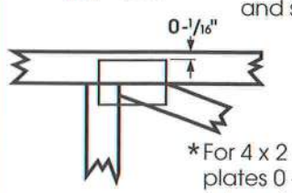
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

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*** Plate location details available in MiTek 20/20 software or upon request.**

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4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

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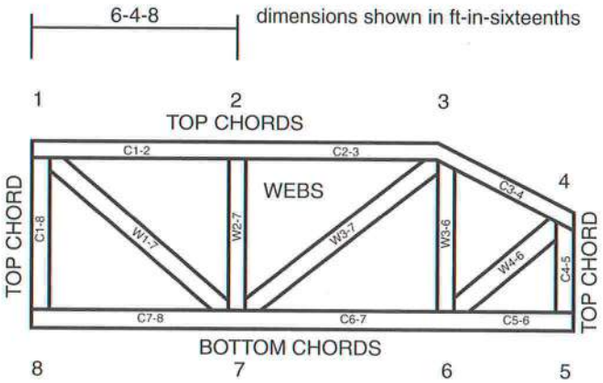
# Numbering System

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**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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TEE-LOK®

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7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H1 | ROOF TRUSS | 1 | 2 | I9261007<br>Job Reference (optional) |

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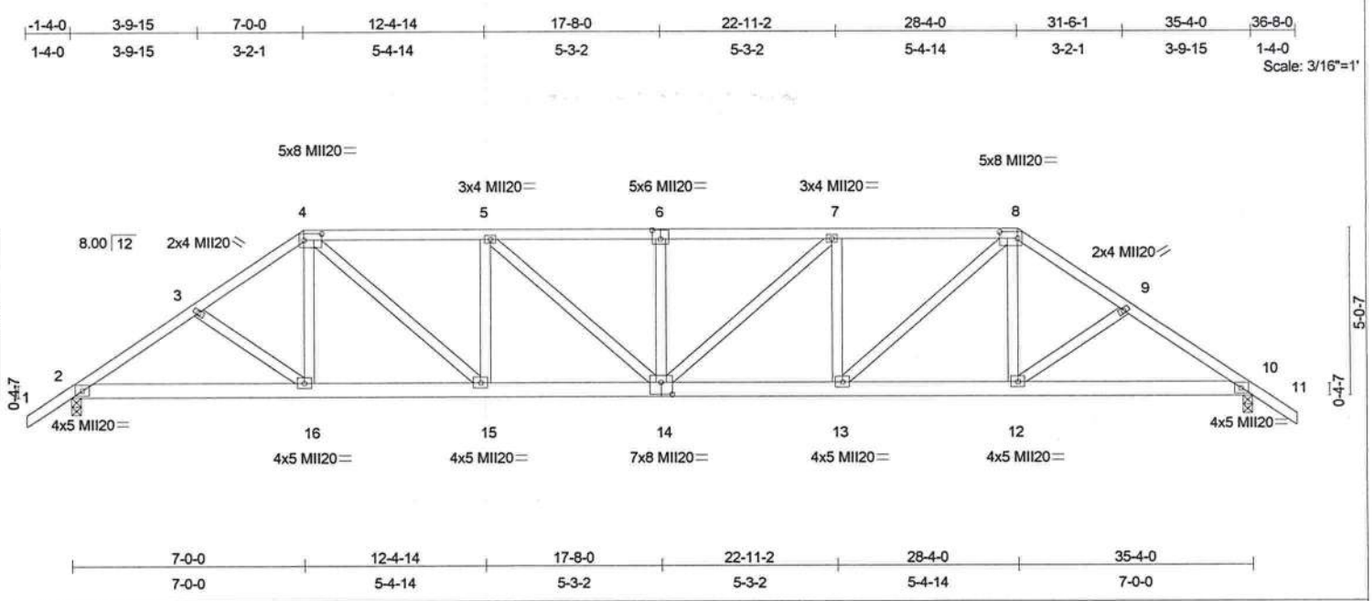


Plate Offsets (X,Y): [4:0-6-4,0-2-4], [6:0-3-0,0-3-0], [8:0-6-4,0-2-4], [14:0-4-0,0-4-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.67 | Vert(LL) | 0.28 | 14 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.44 | Vert(TL) | -0.28 | 14 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.34 | Horz(TL) | 0.07 | 10 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 454 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 6 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 5-4-3 oc purlins.
BOT CHORD Rigid ceiling directly applied or 8-4-1 oc bracing.

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=3041/0-3-8, 10=3041/0-3-8
Max Horz 2=-201(load case 2)
Max Uplift2=-1998(load case 3), 10=-1998(load case 2)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/47, 2-3=-4830/3478, 3-4=-4682/3508, 4-5=-5486/4206, 5-6=-5982/4528, 6-7=-5982/4528, 7-8=-5486/4206, 8-9=-4682/3509, 9-10=-4830/3479, 10-11=0/47
BOT CHORD 2-16=-2971/3925, 15-16=-2988/3897, 14-15=-4207/5485, 13-14=-4116/5485, 12-13=-2795/3897, 10-12=-2771/3925
WEBS 3-16=-226/86, 4-16=0/330, 4-15=-1742/2138, 5-15=-1179/1229, 5-14=-549/701, 6-14=-665/789, 7-14=-550/701, 7-13=-1179/1229, 8-13=-1743/2138, 8-12=0/330, 9-12=-227/86

**NOTES**
1) 2-ply truss to be connected together with 10d Common(.148"x3") Nails as follows:
Top chords connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
Bottom chords connected as follows: 2 X 6 - 2 rows at 0-9-0 oc.
Webs connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Unbalanced roof live loads have been considered for this design.
4) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
5) Provide adequate drainage to prevent water ponding.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 1998 lb uplift at joint 2 and 1998 lb uplift at joint 10.
7) Girder carries hip end with 7-0-0 end setback.
8) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 385 lb down and 545 lb up at 28-4-0 and 385 lb down and 545 lb up at 7-0-0 on top chord. The design/selection of such connection device(s) is the responsibility of others.

**LOAD CASE(S)** Standard
1) Regular: Lumber Increase=1.25, Plate Increase=1.25


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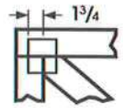
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


Continued on page 2

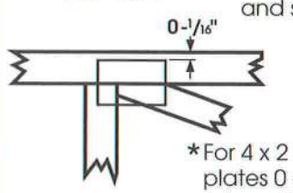
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

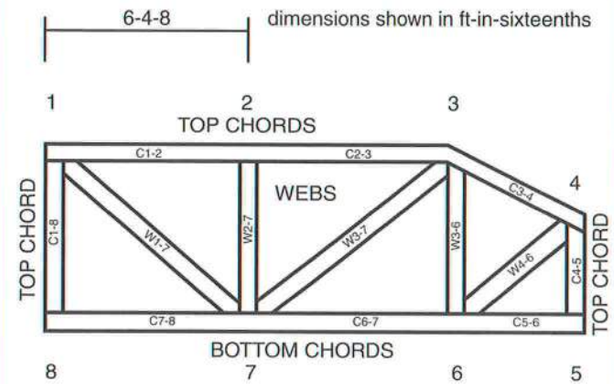
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

**LOAD CASE(S)** Standard

Uniform Loads (plf)

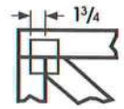
Vert: 1-4=-60, 4-8=-131(F=-71), 8-11=-60, 2-10=-44(F=-24)

Concentrated Loads (lb)

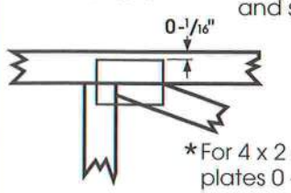
Vert: 4=-385(F) 8=-385(F)

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

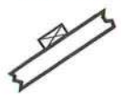
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

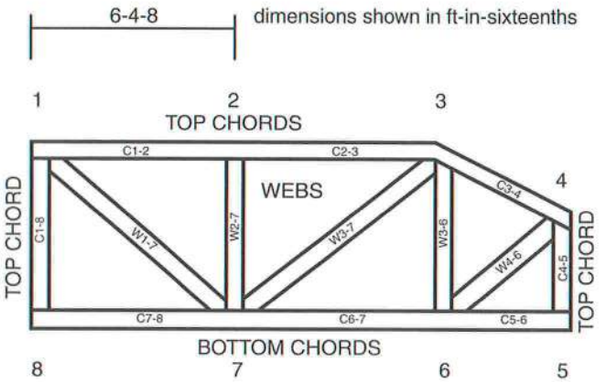
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H10 | ROOF TRUSS | 1 | 1 | I9261008<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:42 2005 Page 1

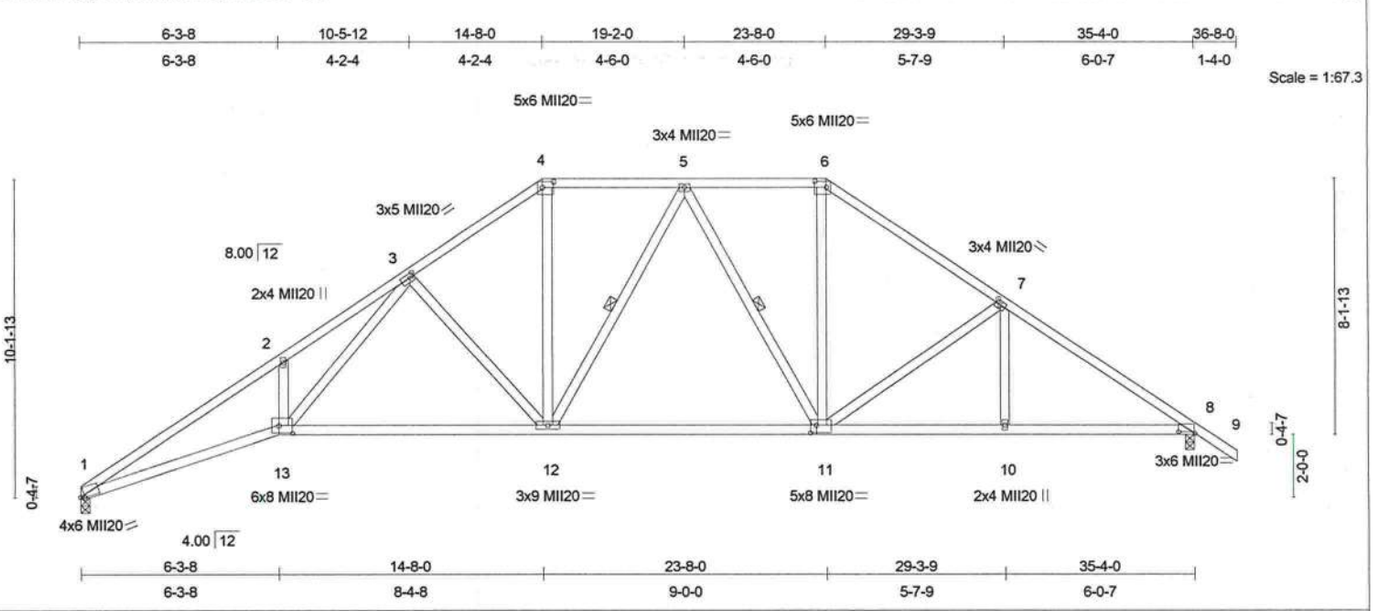


Plate Offsets (X,Y): [1:0-1-7,0-0-11], [3:0-1-8,0-1-8], [4:0-4-4,0-2-4], [6:0-4-4,0-2-4], [7:0-1-12,0-1-8], [8:0-6-3,0-0-10], [11:0-2-4,0-3-0], [13:0-5-4,0-3-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.66 | Vert(LL) | 0.25 | 13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.86 | Vert(TL) | -0.46 | 12-13 | >914 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.72 | Horz(TL) | 0.23 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 202 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-7-11 oc purlins.
BOT CHORD Rigid ceiling directly applied or 5-0-13 oc bracing.
WEBS 1 Row at midpt 5-12, 5-11

**REACTIONS** (lb/size) 1=1400/0-3-8, 8=1492/0-3-8
Max Horz 1=388(load case 3)
Max Uplift1=-449(load case 4), 8=-508(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-4044/1389, 2-3=-3972/1644, 3-4=-1915/666, 4-5=-1551/626, 5-6=-1412/508, 6-7=-1782/530, 7-8=-2194/572, 8-9=0/44
BOT CHORD 1-13=-1372/3432, 12-13=-772/2023, 11-12=-525/1547, 10-11=-335/1728, 8-10=-335/1728
WEBS 2-13=-241/378, 3-13=-980/1911, 3-12=-746/508, 4-12=-202/749, 5-12=-145/331, 5-11=-386/362, 6-11=-165/621, 7-11=-406/340, 7-10=0/124

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 449 lb uplift at joint 1 and 508 lb uplift at joint 8.

**LOAD CASE(S)** Standard


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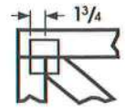
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

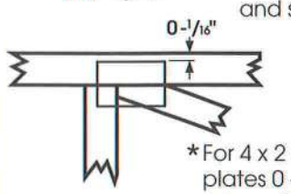

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

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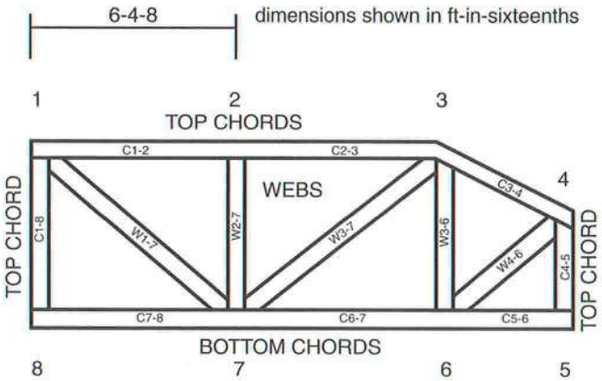
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

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2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H11 | ROOF TRUSS | 1 | 1 | I9261009<br>Job Reference (optional) |

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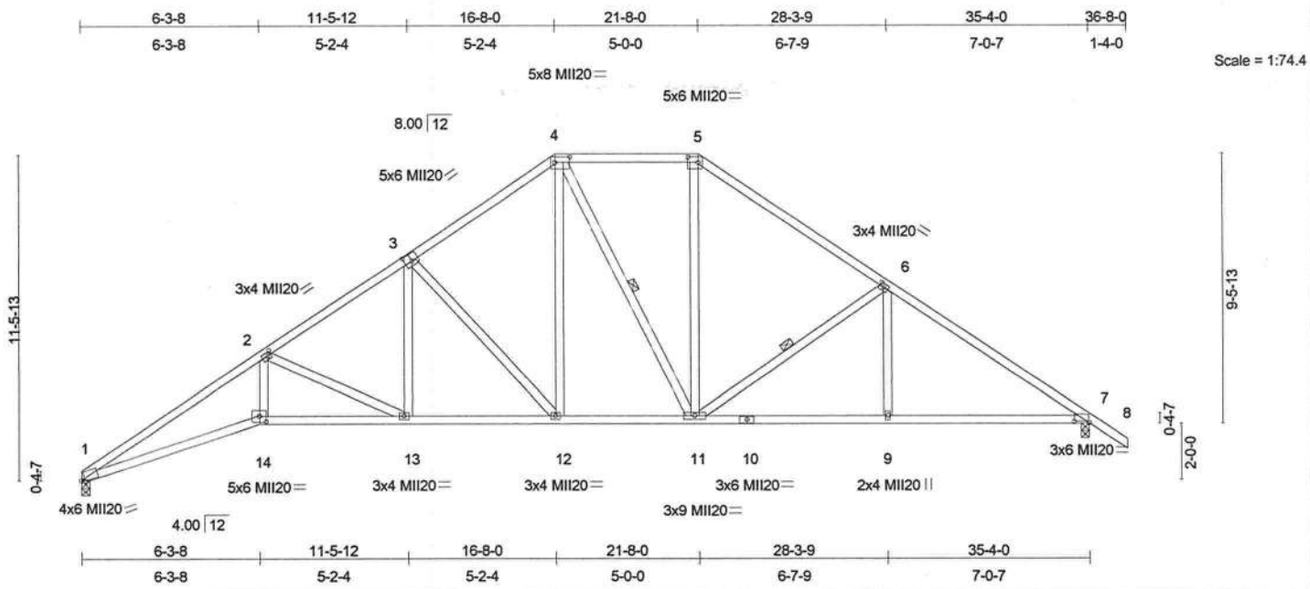



Plate Offsets (X,Y): [1:0-1-7,0-0-11], [2:0-1-8,0-1-8], [3:0-3-0,0-3-0], [4:0-6-4,0-2-4], [5:0-4-4,0-2-4], [6:0-1-12,0-1-8], [7:0-6-3,0-0-10], [14:0-2-12,0-2-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.64 | Vert(LL) | 0.23 | 13-14 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.86 | Vert(TL) | -0.37 | 13-14 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.89 | Horz(TL) | 0.23 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 208 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-8-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 4-10-2 oc bracing.
WEBS 1 Row at midpt 4-11, 6-11

**REACTIONS** (lb/size) 1=1400/0-3-8, 7=1492/0-3-8
Max Horz 1=444(load case 3)
Max Uplift1=-466(load case 4), 7=-529(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-4041/1505, 2-3=-2381/861, 3-4=-1694/653, 4-5=-1292/541, 5-6=-1661/588, 6-7=-2170/596, 7-8=0/44
BOT CHORD 1-14=-1510/3427, 13-14=-1390/3158, 12-13=-673/1900, 11-12=-372/1348, 10-11=-368/1700, 9-10=-368/1700, 7-9=-368/1700
WEBS 2-14=-439/1204, 2-13=-1378/787, 3-13=-275/690, 3-12=-834/536, 4-12=-349/709, 4-11=-259/271, 5-11=-201/510, 6-11=-513/405, 6-9=0/168

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 466 lb uplift at joint 1 and 529 lb uplift at joint 7.

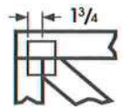
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

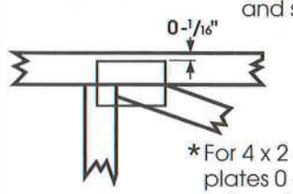
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

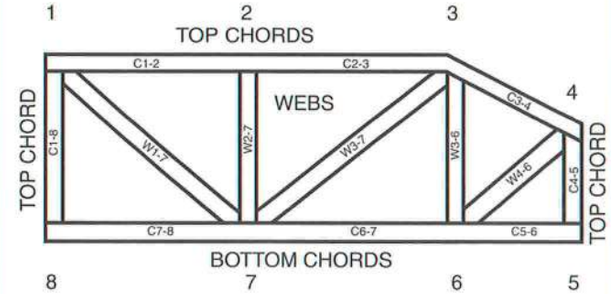
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H12 | ROOF TRUSS | 1 | 1 | I9261010<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:43 2005 Page 1

Scale = 1:83.7

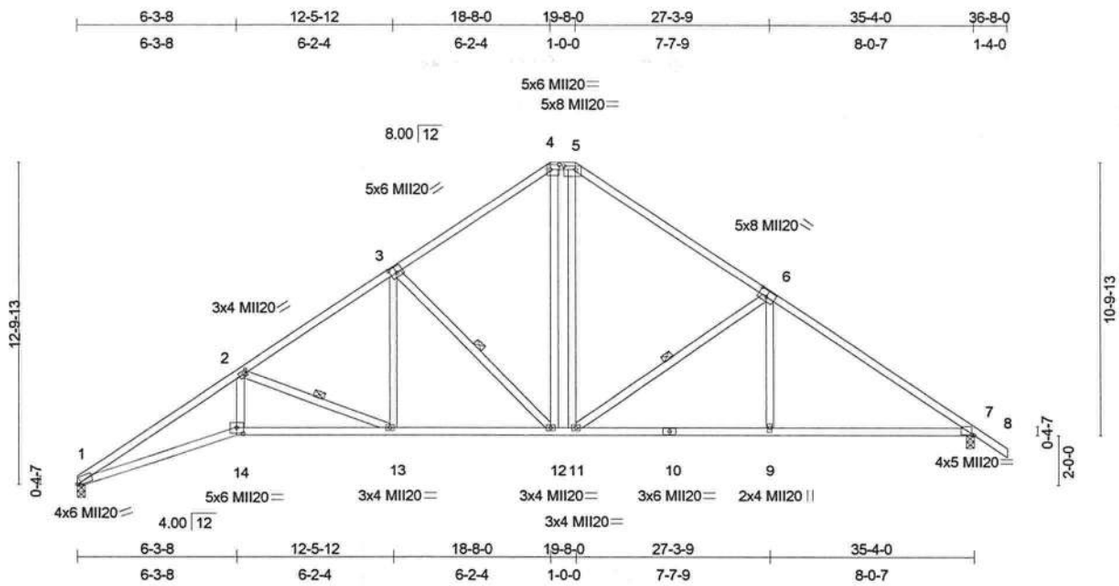



Plate Offsets (X,Y): [1:0-1-7,0-0-11], [2:0-1-8,0-1-8], [3:0-3-0,0-3-0], [4:0-4-4,0-2-4], [5:0-5-8,0-1-12], [6:0-4-0,0-3-0], [7:0-0-15,0-0-2], [14:0-3-0,0-2-12]

| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.63 | Vert(LL) | 0.26 | 12-13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.86 | Vert(TL) | -0.39 | 13-14 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.65 | Horz(TL) | 0.24 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 205 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-8-3 oc purlins.
BOT CHORD Rigid ceiling directly applied or 4-8-6 oc bracing.
WEBS 1 Row at midpt 2-13, 3-12, 6-11

**REACTIONS** (lb/size) 1=1400/0-3-8, 7=1492/0-3-8
Max Horz 1=500(load case 3)
Max Uplift1=-479(load case 4), 7=-546(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-4052/1586, 2-3=-2256/846, 3-4=-1514/618, 4-5=-1179/610, 5-6=-1546/656, 6-7=-2137/633, 7-8=0/44
BOT CHORD 1-14=-1615/3443, 13-14=-1490/3168, 12-13=-677/1788, 11-12=-257/1179, 10-11=-401/1660, 9-10=-401/1660, 7-9=-400/1663
WEBS 2-14=-459/1215, 2-13=-1473/868, 3-13=-267/667, 3-12=-883/606, 4-12=-329/649, 5-11=-233/503, 6-11=-620/481, 6-9=0/208

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 479 lb uplift at joint 1 and 546 lb uplift at joint 7.

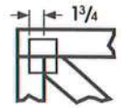
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

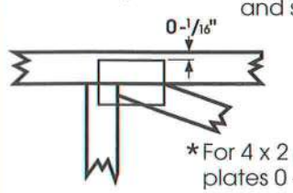

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

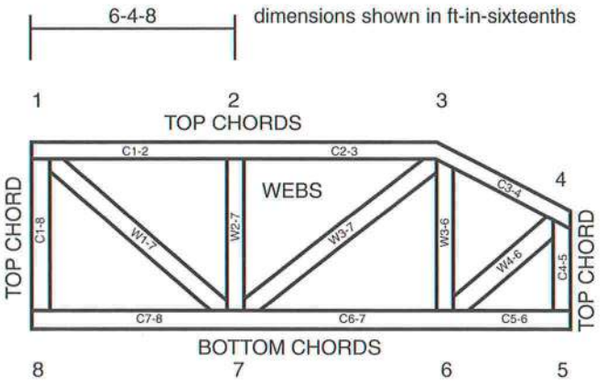
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

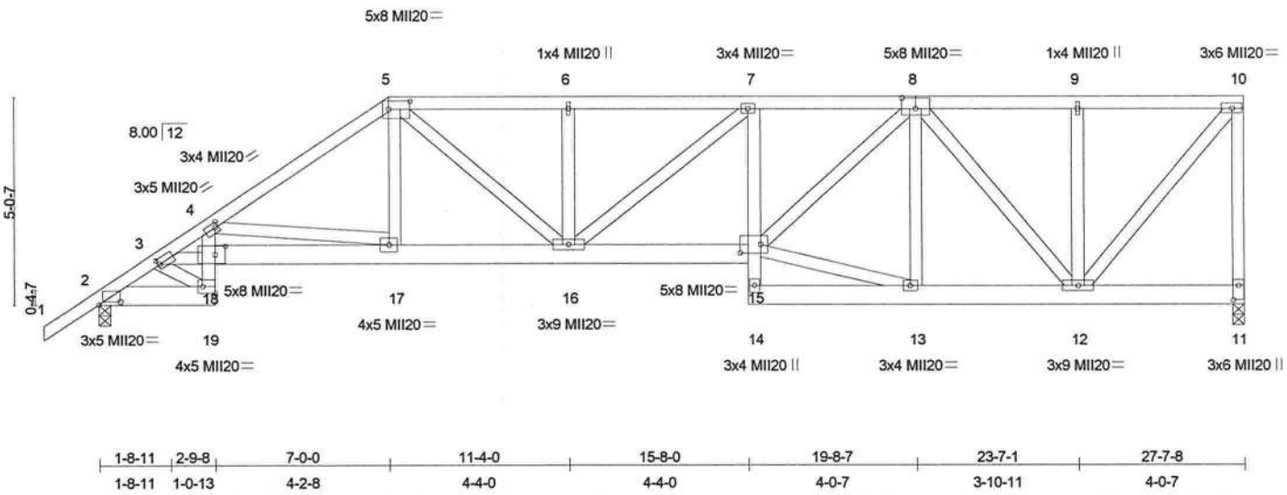
1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H13 | ROOF TRUSS | 1 | 2 | I9261011<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:43 2005 Page 1

| -1-4-0 | 2-9-8 | 7-0-0 | 11-4-0 | 15-8-0 | 19-8-7 | 23-7-1 | 27-7-8 |
|---|---|---|---|---|---|---|---|
| 1-4-0 | 2-9-8 | 4-2-8 | 4-4-0 | 4-4-0 | 4-0-7 | 3-10-11 | 4-0-7 |

Scale = 1:51.2




| 1-8-11 | 2-9-8 | 7-0-0 | 11-4-0 | 15-8-0 | 19-8-7 | 23-7-1 | 27-7-8 |
|---|---|---|---|---|---|---|---|
| 1-8-11 | 1-0-13 | 4-2-8 | 4-4-0 | 4-4-0 | 4-0-7 | 3-10-11 | 4-0-7 |

Plate Offsets (X,Y): [2:0-6-3,0-0-14], [3:0-0-8,0-1-8], [4:0-1-0,0-1-8], [5:0-6-4,0-2-4], [8:0-4-0,0-3-0], [11:0-4-4,0-1-8], [15:0-6-0,0-2-8], [18:0-3-0,0-2-8], [19:Edge,0-2-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.54 | Vert(LL) | 0.22 | 15-16 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.99 | Vert(TL) | -0.23 | 15-16 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.69 | Horz(TL) | 0.13 | 11 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 405 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 6 SYP No.2 *Except*
4-19 2 X 4 SYP No.2D, 7-14 2 X 4 SYP No.3
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 4-10-10 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
7-11-9 oc bracing: 17-18
9-2-3 oc bracing: 15-16.

**REACTIONS** (lb/size) 11=2414/0-3-8, 2=2337/0-3-8
Max Horz 2=278(load case 3)
Max Uplift11=-1805(load case 2), 2=-1414(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/47, 2-3=-3751/2358, 3-4=-6764/4552, 4-5=-4397/3163, 5-6=-4482/3286, 6-7=-4481/3287, 7-8=-4558/3408, 8-9=-1757/1388, 9-10=-1757/1388, 10-11=-2295/1818
BOT CHORD 2-19=-2075/2918, 18-19=-992/1467, 4-18=-999/1622, 17-18=-4105/5866, 16-17=-2817/3676, 15-16=-3452/4609, 14-15=-7/135, 7-15=-440/549, 13-14=-316/415, 12-13=-2188/2933, 11-12=-96/46
WEBS 4-17=-2254/1317, 5-17=-323/862, 5-16=-974/1052, 6-16=-549/713, 7-16=-161/197, 13-15=-1946/2620, 8-15=-1665/2201, 8-13=-591/654, 8-12=-1836/1348, 9-12=-519/614, 10-12=-1986/2673, 3-18=-3093/4327, 3-19=-2062/1480

**NOTES**
1) 2-ply truss to be connected together with 10d Common(.148"x3") Nails as follows:
Top chords connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
Bottom chords connected as follows: 2 X 6 - 2 rows at 0-9-0 oc, 2 X 4 - 1 row at 0-9-0 oc.
Webs connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
4) Provide adequate drainage to prevent water ponding.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 1805 lb uplift at joint 11 and 1414 lb uplift at joint 2.
6) Girder carries hip end with 0-0-0 right side setback, 7-0-0 left side setback, and 7-0-0 end setback.
7) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 385 lb down and 545 lb up at 7-[illegible] on top chord. The design/selection of such connection device(s) is the responsibility of others.

**LOAD CASE(S)** Standard

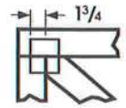

Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


Continued on page 2

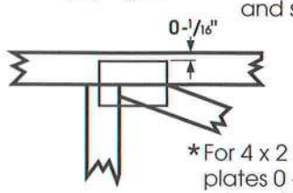
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.



*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

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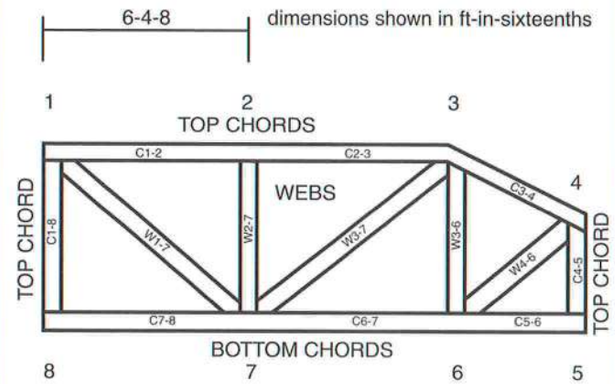
# Numbering System

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**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
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3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
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7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

**LOAD CASE(S)** Standard

1) Regular: Lumber Increase=1.25, Plate Increase=1.25

Uniform Loads (plf)

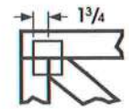
Vert: 1-5=-60, 5-10=-131(F=-71), 2-19=-44(F=-24), 15-18=-44(F=-24), 11-14=-44(F=-24)

Concentrated Loads (lb)

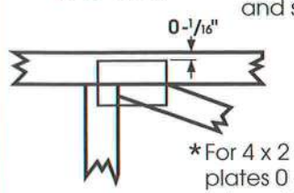
Vert: 5=-385(F)

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.

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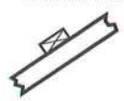
4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



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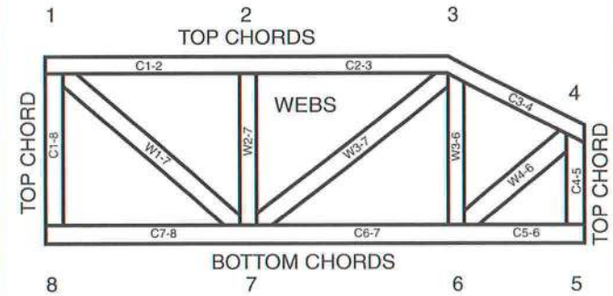
# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H14 | ROOF TRUSS | 1 | 1 | I9261012<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:43 2005 Page 1

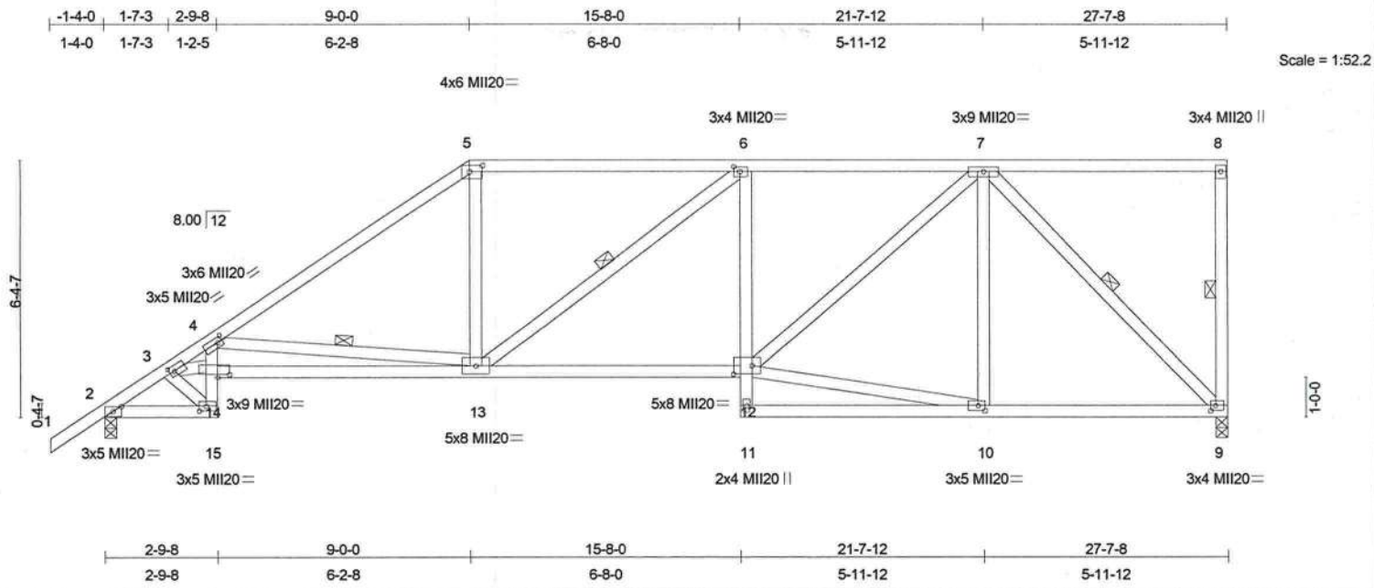



Plate Offsets (X,Y): [2:0-2-9,0-1-8], [3:0-1-8,0-1-8], [4:0-1-8,0-1-8], [5:0-3-12,0-2-0], [6:0-1-12,0-1-8], [9:0-1-8,0-1-8], [10:0-2-0,0-1-8], [12:0-5-8,0-2-8], [14:0-3-8,0-1-0], [15:0-2-0 ,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.40 | Vert(LL) | 0.18 | 13-14 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.77 | Vert(TL) | -0.27 | 13-14 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.71 | Horz(TL) | 0.15 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 178 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
6-11 2 X 4 SYP No.3
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-5-9 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-2-13 oc bracing.
WEBS 1 Row at midpt 8-9, 4-13, 6-13, 7-9

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 9=1091/0-3-8, 2=1184/0-3-8
Max Horz 2=352(load case 3)
Max Uplift9=-497(load case 2), 2=-426(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-1639/422, 3-4=-3077/1142, 4-5=-1714/595, 5-6=-1365/560, 6-7=-1465/642, 7-8=-58/120, 8-9=-159/162
BOT CHORD 2-15=-617/1218, 14-15=-397/836, 4-14=-314/790, 13-14=-1372/2930, 12-13=-756/1482, 11-12=0/62, 6-12=-273/239, 10-11=-68/99, 9-10=-457/862
WEBS 3-15=-1165/583, 3-14=-1062/2204, 4-13=-1591/835, 5-13=-103/465, 6-13=-148/363, 10-12=-395/775, 7-12=-384/798, 7-10=-22/157, 7-9=-1209/543

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Provide adequate drainage to prevent water ponding.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 497 lb uplift at joint 9 and 426 lb uplift at joint 2.

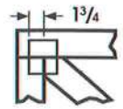
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

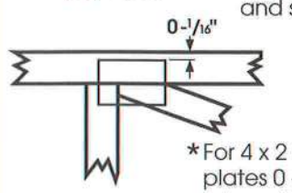

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

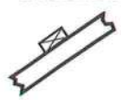
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

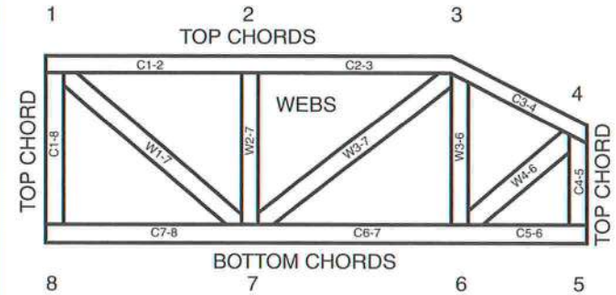
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H15 | ROOF TRUSS | 1 | 1 | Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 15:50:11 2005 Page 1

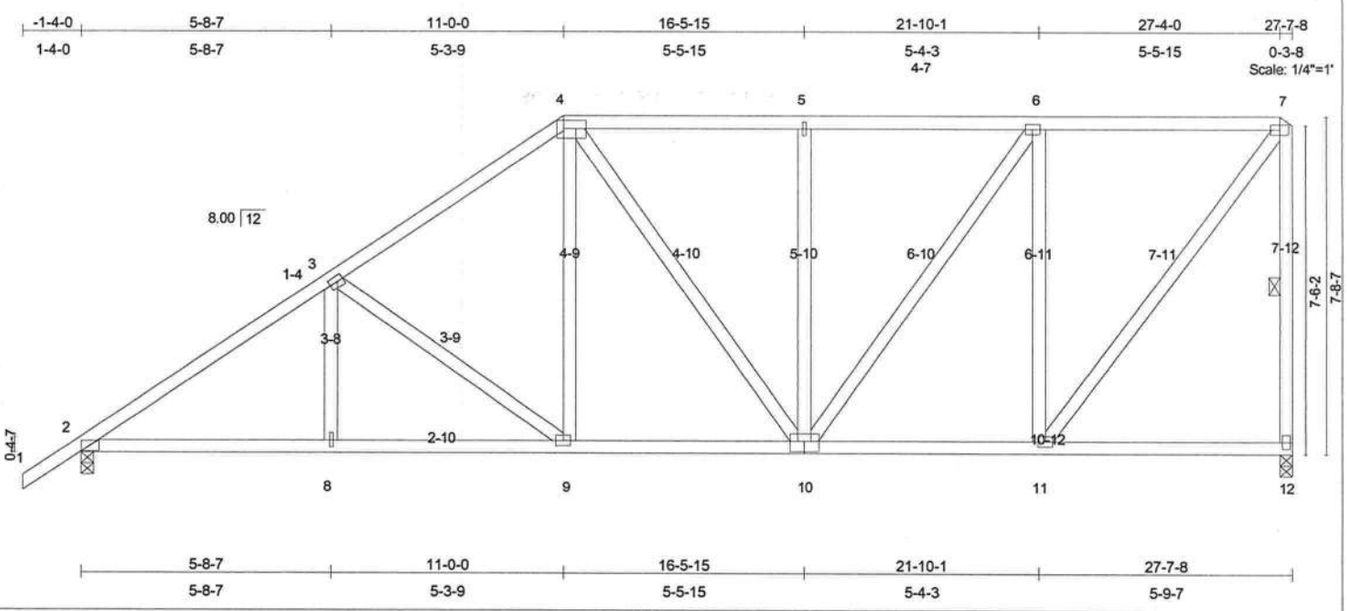



Plate Offsets (X,Y): [2:0-2-9,0-1-8], [3:0-1-12,0-1-8], [4:0-6-4,0-2-4], [10:0-4-0,0-3-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.47 | Vert(LL) | 0.06 | 9-10 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.36 | Vert(TL) | -0.10 | 9-10 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.75 | Horz(TL) | 0.03 | 12 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 184 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 4-8-9 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 7-9-13 oc bracing.
WEBS 1 Row at midpt 7-12

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=1184/0-3-8, 12=1091/0-3-8
Max Horz 2=479(load case 4)
Max Uplift2=-419(load case 4), 12=-469(load case 3)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-1666/417, 3-4=-1271/422, 4-5=-990/415, 5-6=-989/415, 6-7=-687/293, 7-12=-1033/489
BOT CHORD 2-8=-638/1296, 8-9=-638/1296, 9-10=-397/989, 10-11=-293/687, 11-12=-10/19
WEBS 3-8=0/127, 3-9=-385/313, 4-9=-125/328, 4-10=-220/146, 5-10=-315/318, 6-10=-208/517, 6-11=-769/440, 7-11=-470/1104

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Provide adequate drainage to prevent water ponding.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 419 lb uplift at joint 2 and 469 lb uplift at joint 12.

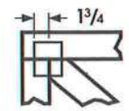
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

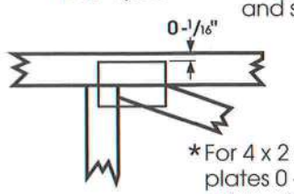

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

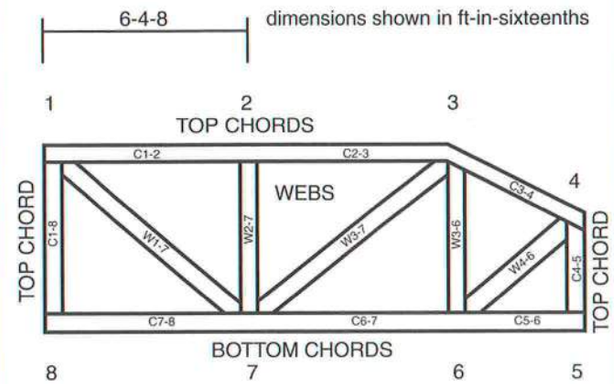
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H16 | ROOF TRUSS | 1 | 1 | I9261014<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:44 2005 Page 1

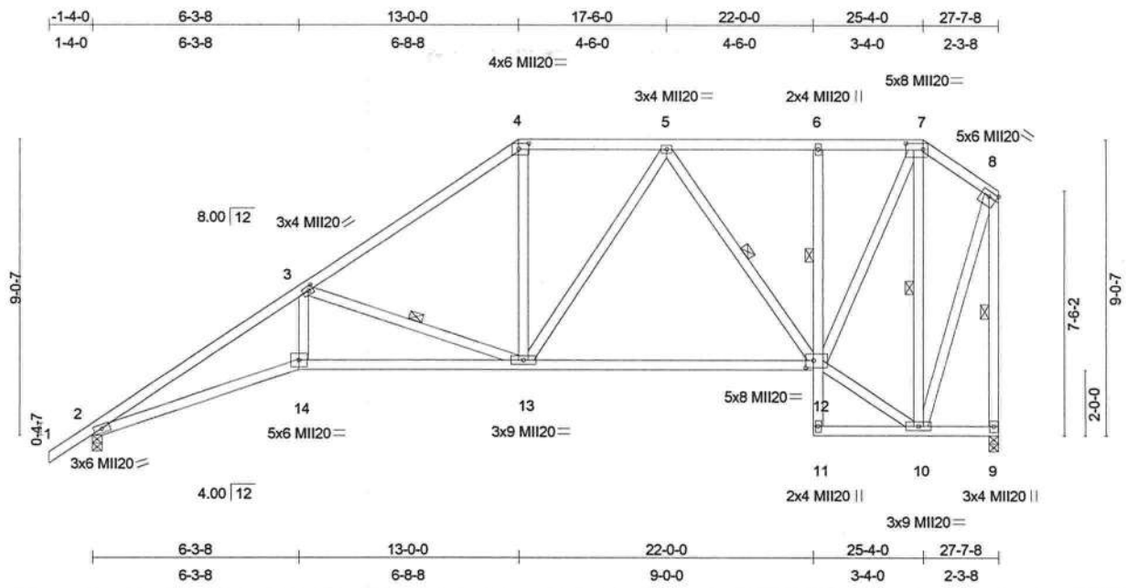



Plate Offsets (X,Y): [3:0-1-12,0-1-8], [4:0-3-12,0-2-0], [7:0-6-4,0-2-4], [8:Edge,0-1-12], [12:0-2-12,0-2-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.50 | Vert(LL) | 0.19 | 13-14 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.64 | Vert(TL) | -0.27 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.64 | Horz(TL) | 0.19 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 198 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
6-11 2 X 4 SYP No.3
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-4-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-0-0 oc bracing. Except:
1 Row at midpt 6-12
WEBS 1 Row at midpt 3-13, 5-12, 7-10, 8-9

**REACTIONS** (lb/size) 2=1184/0-3-8, 9=1091/0-3-8
Max Horz 2=552(load case 3)
Max Uplift2=-466(load case 4), 9=-474(load case 3)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/42, 2-3=-3017/1237, 3-4=-1477/597, 4-5=-1145/565, 5-6=-725/323, 6-7=-712/320, 7-8=-357/280, 8-9=-1058/419
BOT CHORD 2-14=-1541/2546, 13-14=-1425/2337, 12-13=-730/1022, 11-12=-4/29, 6-12=-257/232, 10-11=-47/0, 9-10=-102/125
WEBS 3-14=-424/925, 3-13=-1272/741, 4-13=-94/403, 5-13=-166/303, 5-12=-527/362, 10-12=-222/325, 7-12=-675/1085, 7-10=-943/690, 8-10=-477/848

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 466 lb uplift at joint 2 and 474 lb uplift at joint 9.

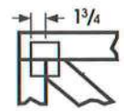
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

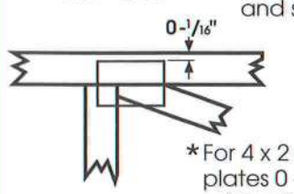
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




* Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




* For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

* This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

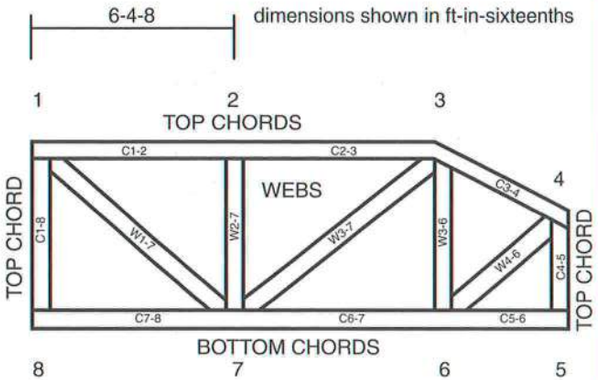
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H17 | ROOF TRUSS | 1 | 1 | I9261015<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:44 2005 Page 1

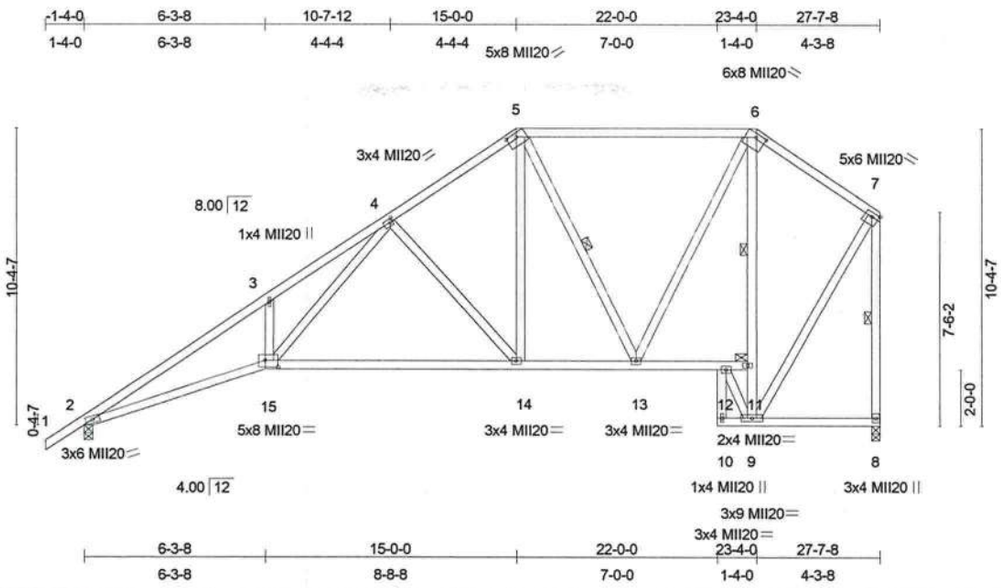



Plate Offsets (X,Y): [4:0-1-0,0-1-8], [5:0-4-0,0-1-9], [6:0-4-0,0-1-9], [7:Edge,0-1-12], [15:0-5-8,0-2-12]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.54 | Vert(LL) | 0.23 | 14-15 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.81 | Vert(TL) | -0.41 | 14-15 | >810 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.65 | Horz(TL) | 0.33 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 195 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-3-7 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-1-11 oc bracing.
WEBS 1 Row at midpt 6-11, 7-8, 5-13
JOINTS 1 Brace at Jt(s): 11

**REACTIONS** (lb/size) 2=1184/0-3-8, 8=1091/0-3-8
Max Horz 2=608(load case 3)
Max Uplift2=-479(load case 4), 8=-340(load case 3)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/42, 2-3=-3021/1068, 3-4=-2974/1327, 4-5=-1187/479, 5-6=-769/366, 6-7=-547/296, 7-8=-1100/370
BOT CHORD 2-15=-1446/2546, 14-15=-848/1352, 13-14=-642/963, 12-13=-323/437, 11-12=-39/55, 9-10=0/0, 8-9=-85/131
WEBS 3-15=-278/383, 4-15=-845/1632, 4-14=-608/463, 5-14=-277/573, 9-11=-1170/884, 6-11=-782/584, 7-9=-471/864, 10-12=-192/89, 5-13=-446/264, 6-13=-431/725, 9-12=-614/826

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 479 lb uplift at joint 2 and 340 lb uplift at joint 8.

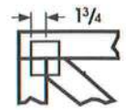
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

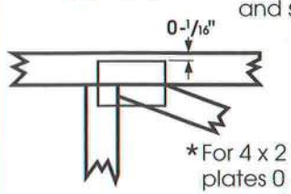

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

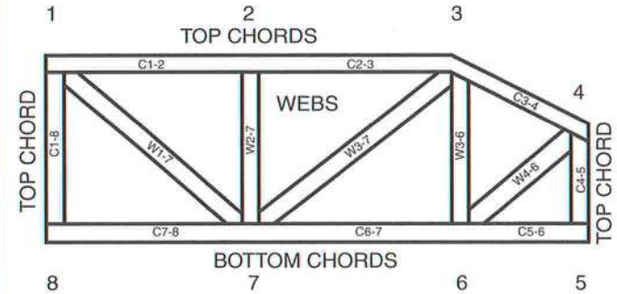
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H18 | ROOF TRUSS | 1 | 1 | I9261016<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:45 2005 Page 1

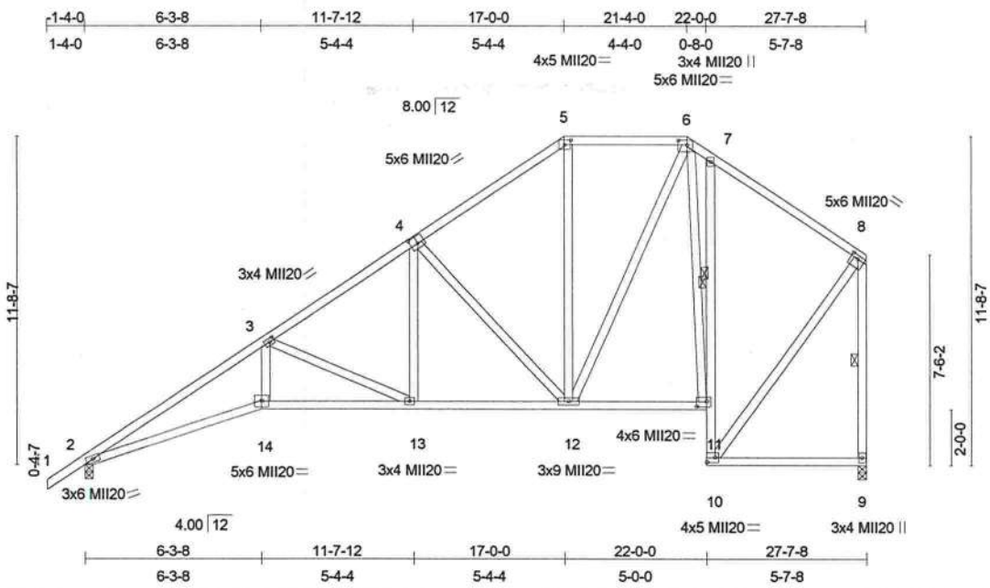



Plate Offsets (X,Y): [3:0-1-12,0-1-8], [4:0-3-0,0-3-0], [5:0-2-12,0-2-0], [6:0-3-12,0-2-0], [8:0-3-0,0-1-8], [10:Edge,0-2-0], [11:0-4-4,0-2-4]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.49 | Vert(LL) | 0.24 | 11-12 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.90 | Vert(TL) | -0.32 | 11-12 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.82 | Horz(TL) | 0.47 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 205 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
7-10 2 X 4 SYP No.2D
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-3-11 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-3-6 oc bracing. Except:
1 Row at midpt 7-11
WEBS 1 Row at midpt 6-11, 8-9

**REACTIONS** (lb/size) 2=1184/0-3-8, 9=1091/0-3-8
Max Horz 2=665(load case 3)
Max Uplift2=-486(load case 4), 9=-342(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/42, 2-3=-3003/1155, 3-4=-1618/630, 4-5=-1013/450, 5-6=-772/458, 6-7=-713/436, 7-8=-659/345, 8-9=-1113/386
BOT CHORD 2-14=-1370/2531, 13-14=-1264/2321, 12-13=-720/1265, 11-12=-342/528, 10-11=-507/267, 7-11=-355/274, 9-10=-87/116
WEBS 3-14=-382/926, 3-13=-1152/685, 4-13=-227/555, 4-12=-731/508, 5-12=-68/207, 6-11=-320/365, 8-10=-333/788, 6-12=-360/615

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 486 lb uplift at joint 2 and 342 lb uplift at joint 9.

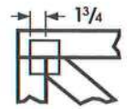
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

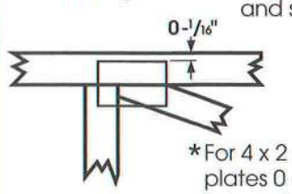

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

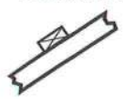
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

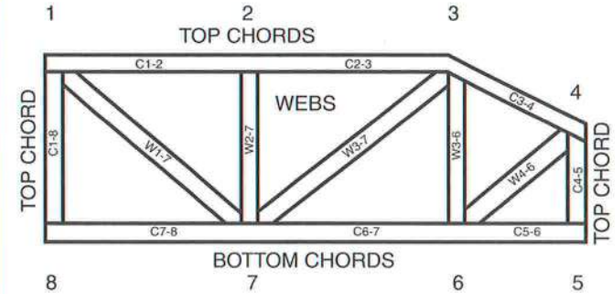
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H19 | ROOF TRUSS | 1 | 1 | I9261017<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:45 2005 Page 1

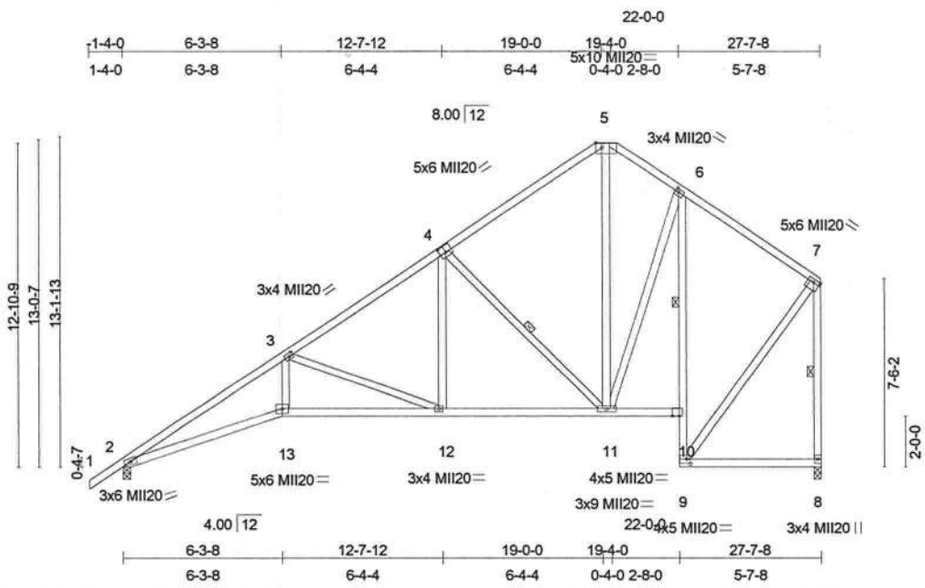



Plate Offsets (X,Y): [3:0-1-12,0-1-8], [4:0-3-0,0-3-0], [5:0-3-0,Edge], [6:0-1-4,0-1-8], [7:0-3-0,0-1-8], [9:0-1-12,0-2-0], [10:0-3-4,Edge]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.51 | Vert(LL) | 0.19 | 12-13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.94 | Vert(TL) | -0.31 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.95 | Horz(TL) | 0.43 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 197 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
6-9 2 X 4 SYP No.2D
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-3-13 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-5-7 oc bracing. Except:
1 Row at midpt 6-10
WEBS 1 Row at midpt 4-11, 7-8

**REACTIONS** (lb/size) 2=1184/0-3-8, 8=1091/0-3-8
Max Horz 2=722(load case 3)
Max Uplift2=-489(load case 4), 8=-390(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/42, 2-3=-3014/1207, 3-4=-1517/596, 4-5=-845/410, 5-6=-763/463, 6-7=-655/375, 7-8=-1105/438
BOT CHORD 2-13=-1258/2542, 12-13=-1161/2331, 11-12=-581/1173, 10-11=-226/492, 9-10=-506/179, 6-10=-657/267, 8-9=-90/116
WEBS 3-13=-340/934, 3-12=-1232/762, 4-12=-203/555, 4-11=-803/563, 6-11=-315/424, 7-9=-207/776, 5-11=-263/501

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 489 lb uplift at joint 2 and 390 lb uplift at joint 8.

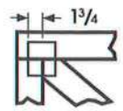
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

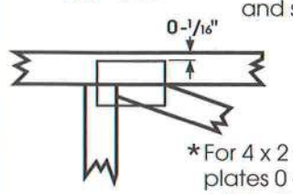

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.



*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

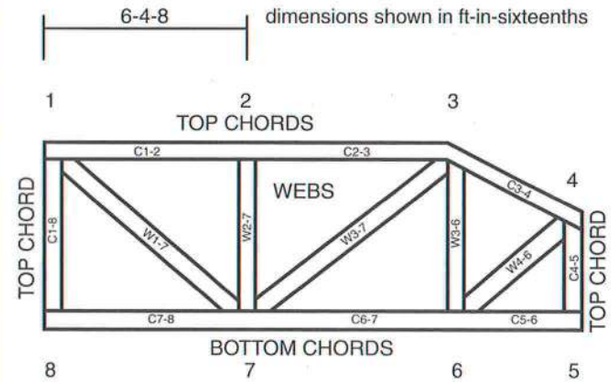
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H2 | ROOF TRUSS | 1 | 1 | I9261018<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:45 2005 Page 1

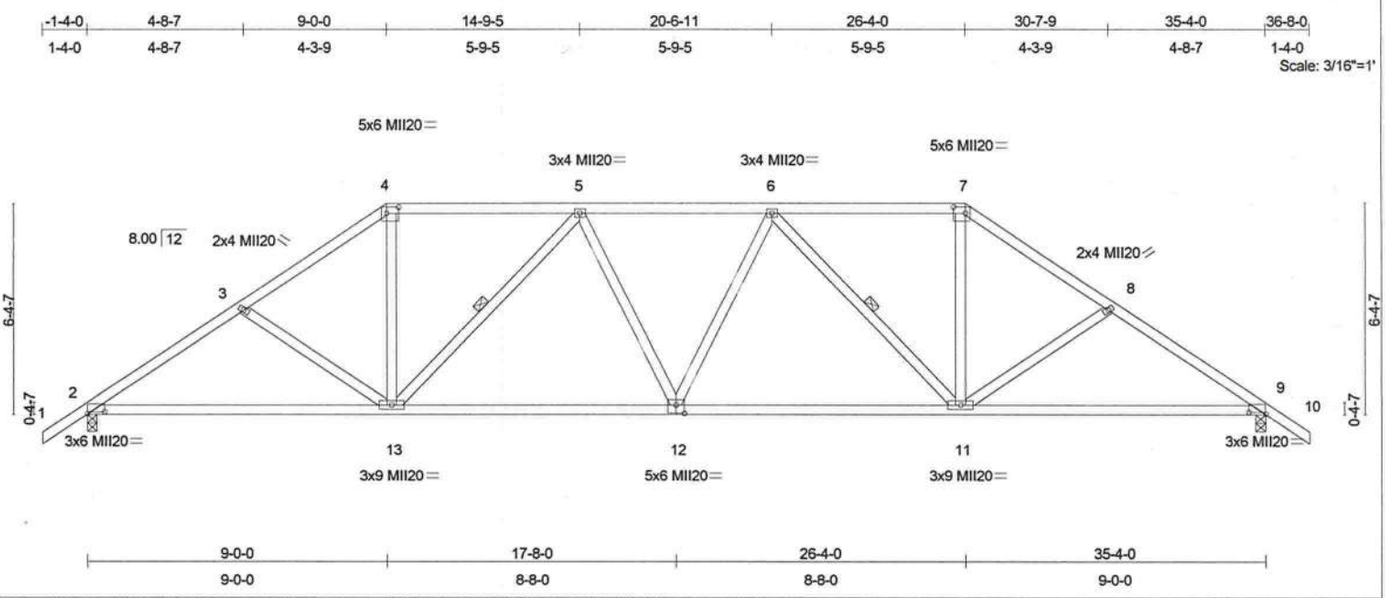



Plate Offsets (X,Y): [2:0-6-3,0-0-10], [4:0-4-4,0-2-4], [7:0-4-4,0-2-4], [9:0-6-3,0-0-10], [12:0-3-0,0-3-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.36 | Vert(LL) | 0.13 | 12 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.55 | Vert(TL) | -0.24 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.33 | Horz(TL) | 0.09 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 192 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 4-1-14 oc purlins.
BOT CHORD Rigid ceiling directly applied or 6-6-12 oc bracing.
WEBS 1 Row at midpt 5-13, 6-11

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=1490/0-3-8, 9=1490/0-3-8
Max Horz 2=-260(load case 2)
Max Uplift2=-507(load case 3), 9=-507(load case 2)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-2155/811, 3-4=-1945/787, 4-5=-1577/712, 5-6=-2011/861, 6-7=-1577/712, 7-8=-1945/787, 8-9=-2155/811, 9-10=0/44
BOT CHORD 2-13=-828/1725, 12-13=-922/1973, 11-12=-858/1973, 9-11=-568/1725
WEBS 3-13=-202/266, 4-13=-201/729, 5-13=-653/498, 5-12=-28/135, 6-12=-28/135, 6-11=-653/498, 7-11=-202/729, 8-11=-202/267

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 507 lb uplift at joint 2 and 507 lb uplift at joint 9.

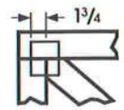
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

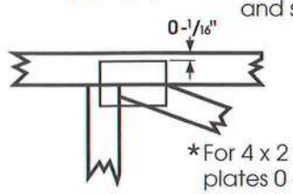

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

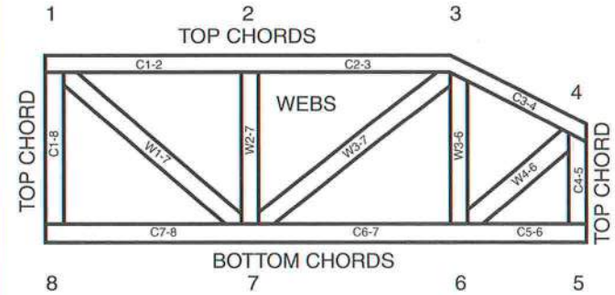
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

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# ⚠General Safety Notes

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1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H3 | ROOF TRUSS | 1 | 1 | I9261019<br>Job Reference (optional) |

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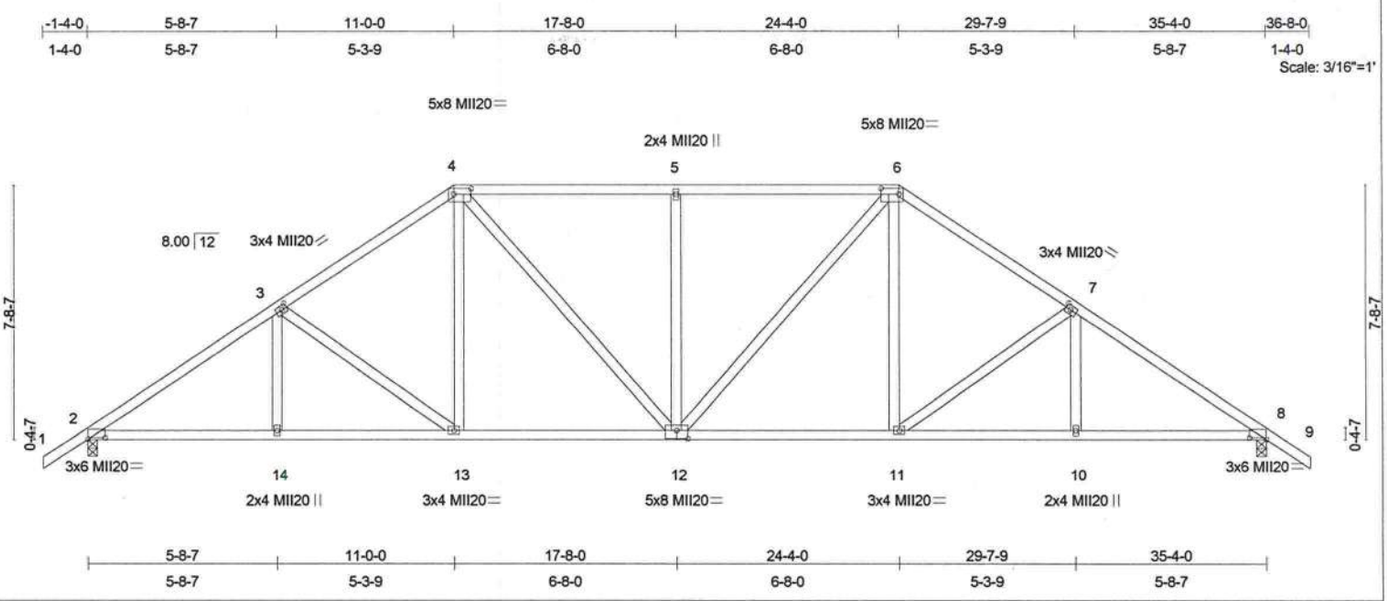



Plate Offsets (X,Y): [2:0-6-3,0-0-10], [3:0-1-12,0-1-8], [4:0-6-4,0-2-4], [6:0-6-4,0-2-4], [7:0-1-12,0-1-8], [8:0-6-3,0-0-10], [12:0-4-0,0-3-0]

| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.41 | Vert(LL) | 0.10 | 12-13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.45 | Vert(TL) | -0.19 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.63 | Horz(TL) | 0.08 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 206 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 4-0-13 oc purlins.
BOT CHORD Rigid ceiling directly applied or 7-3-11 oc bracing.

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=1490/0-3-8, 8=1490/0-3-8
Max Horz 2=-317(load case 2)
Max Uplift2=-511(load case 4), 8=-511(load case 5)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-2198/630, 3-4=-1814/631, 4-5=-1689/639, 5-6=-1689/639, 6-7=-1814/631, 7-8=-2198/631, 8-9=0/44
BOT CHORD 2-14=-727/1732, 13-14=-727/1732, 12-13=-600/1444, 11-12=-407/1444, 10-11=-411/1732, 8-10=-411/1732
WEBS 3-14=0/122, 3-13=-365/309, 4-13=-118/330, 4-12=-371/466, 5-12=-420/407, 6-12=-372/466, 6-11=-119/330, 7-11=-365/310, 7-10=0/122

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 511 lb uplift at joint 2 and 511 lb uplift at joint 8.

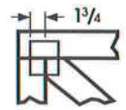
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

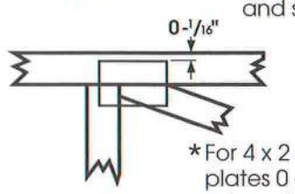

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

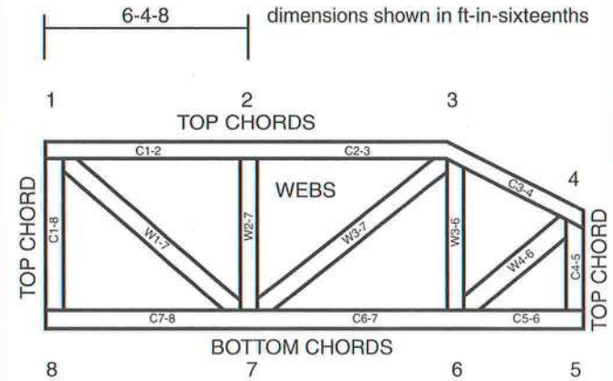
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H4 | ROOF TRUSS | 1 | 2 | I9261020<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga.

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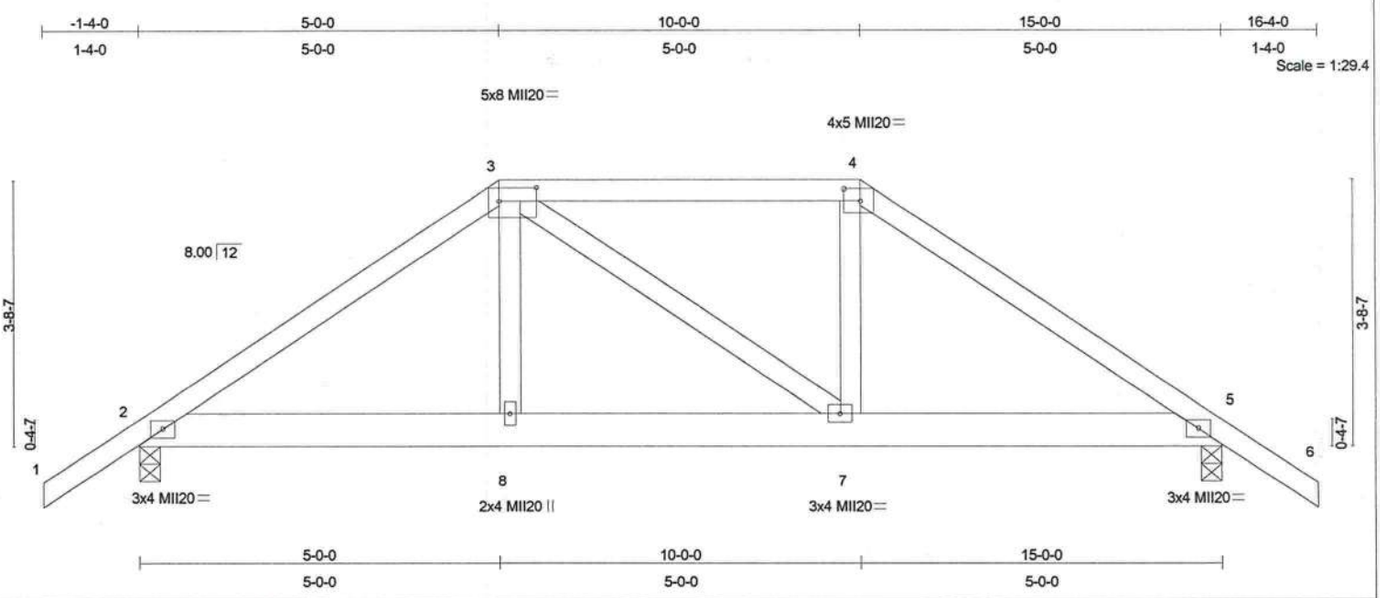


Plate Offsets (X,Y): [3:0-6-4,0-2-4], [4:0-2-12,0-2-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.26 | Vert(LL) | 0.02 | 7-8 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.12 | Vert(TL) | -0.02 | 7-8 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | NO | WB | 0.03 | Horz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 165 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 6 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=1053/0-3-8, 5=1053/0-3-8
Max Horz 2=-145(load case 2)
Max Uplift2=-623(load case 4), 5=-623(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/47, 2-3=-1429/863, 3-4=-1128/769, 4-5=-1427/861, 5-6=0/47
BOT CHORD 2-8=-774/1122, 7-8=-770/1130, 5-7=-667/1121
WEBS 3-8=0/174, 3-7=-123/129, 4-7=0/201

**NOTES**
1) 2-ply truss to be connected together with 10d Common(.148"x3") Nails as follows:
Top chords connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
Bottom chords connected as follows: 2 X 6 - 2 rows at 0-9-0 oc.
Webs connected as follows: 2 X 4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Unbalanced roof live loads have been considered for this design.
4) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
5) Provide adequate drainage to prevent water ponding.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 623 lb uplift at joint 2 and 623 lb uplift at joint 5.
7) Girder carries hip end with 5-0-0 end setback.
8) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 175 lb down and 248 lb up at 10-0-0, and 175 lb down and 248 lb up at 5-0-0 on top chord. The design/selection of such connection device(s) is the responsibility of others.

**LOAD CASE(S)** Standard
1) Regular: Lumber Increase=1.25, Plate Increase=1.25
Uniform Loads (plf)
Vert: 1-3=-60, 3-4=-101(F=-41), 4-6=-60, 2-5=-34(F=-14)


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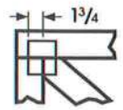
Continued on page 2

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**

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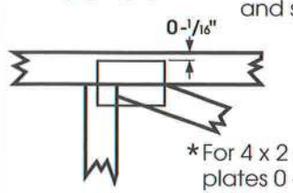


*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

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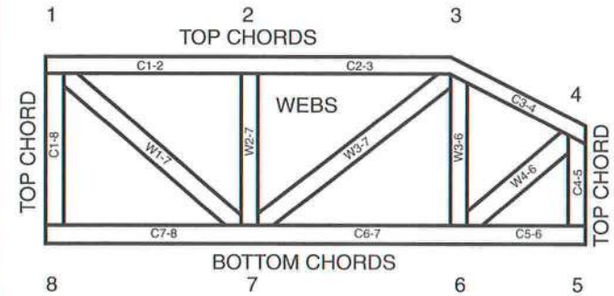
# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths

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**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
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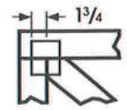
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

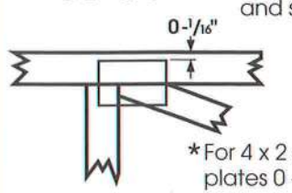
**LOAD CASE(S)** Standard
Concentrated Loads (lb)
Vert: 3=-175(F) 4=-175(F)

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

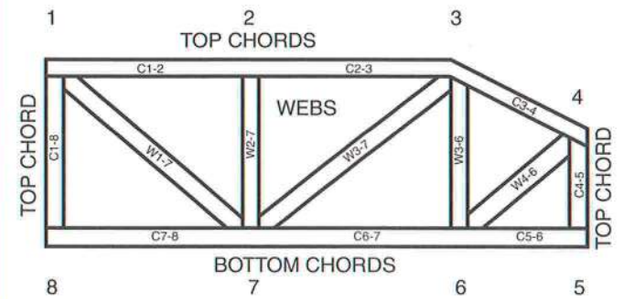
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H5 | ROOF TRUSS | 1 | 1 | I9261021<br>Job Reference (optional) |

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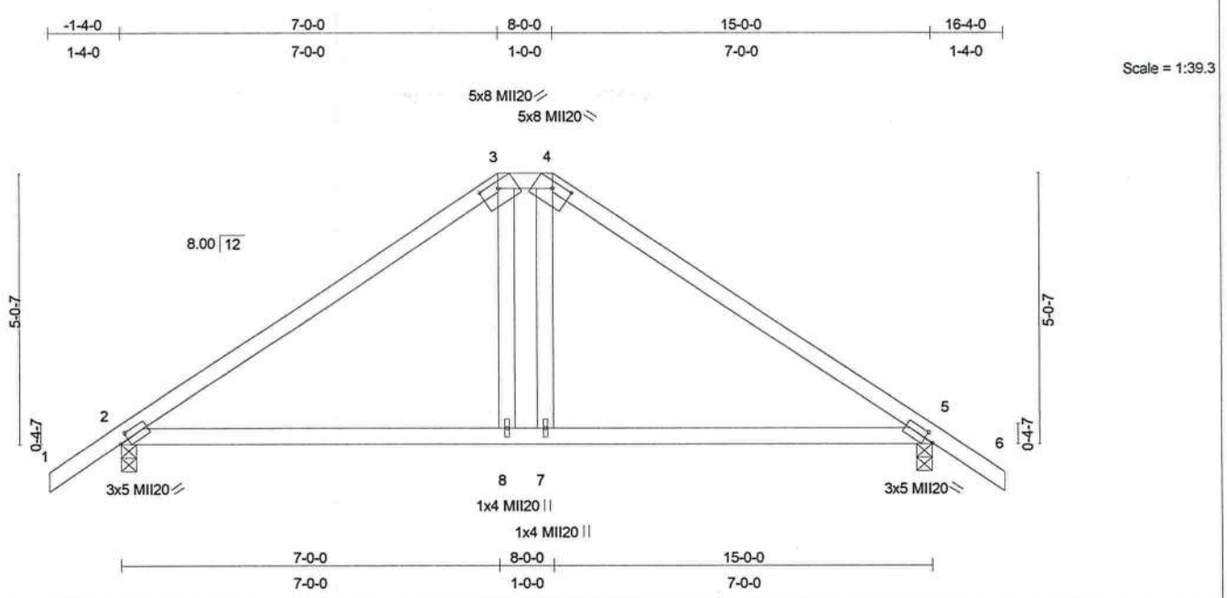



Plate Offsets (X,Y): [2:0-1-15,0-1-8], [3:0-4-0,0-1-9], [4:0-4-0,0-1-9], [5:0-1-15,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.45 | Vert(LL) | 0.11 | 2-8 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.38 | Vert(TL) | -0.14 | 2-8 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.08 | Horz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 67 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=677/0-3-8, 5=677/0-3-8
Max Horz 2=-204(load case 2)
Max Uplift2=-301(load case 4), 5=-301(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-735/234, 3-4=-519/258, 4-5=-735/234, 5-6=0/44
BOT CHORD 2-8=-92/516, 7-8=-87/519, 5-7=-84/516
WEBS 3-8=-203/279, 4-7=-203/279

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 301 lb uplift at joint 2 and 301 lb uplift at joint 5.

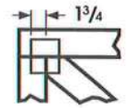
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

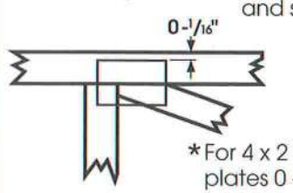

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

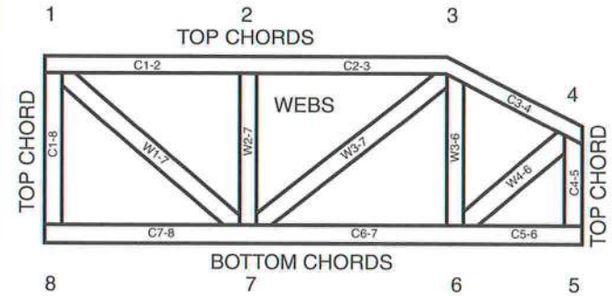
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H6 | ROOF TRUSS | 1 | 1 | I9261022<br>Job Reference (optional) |

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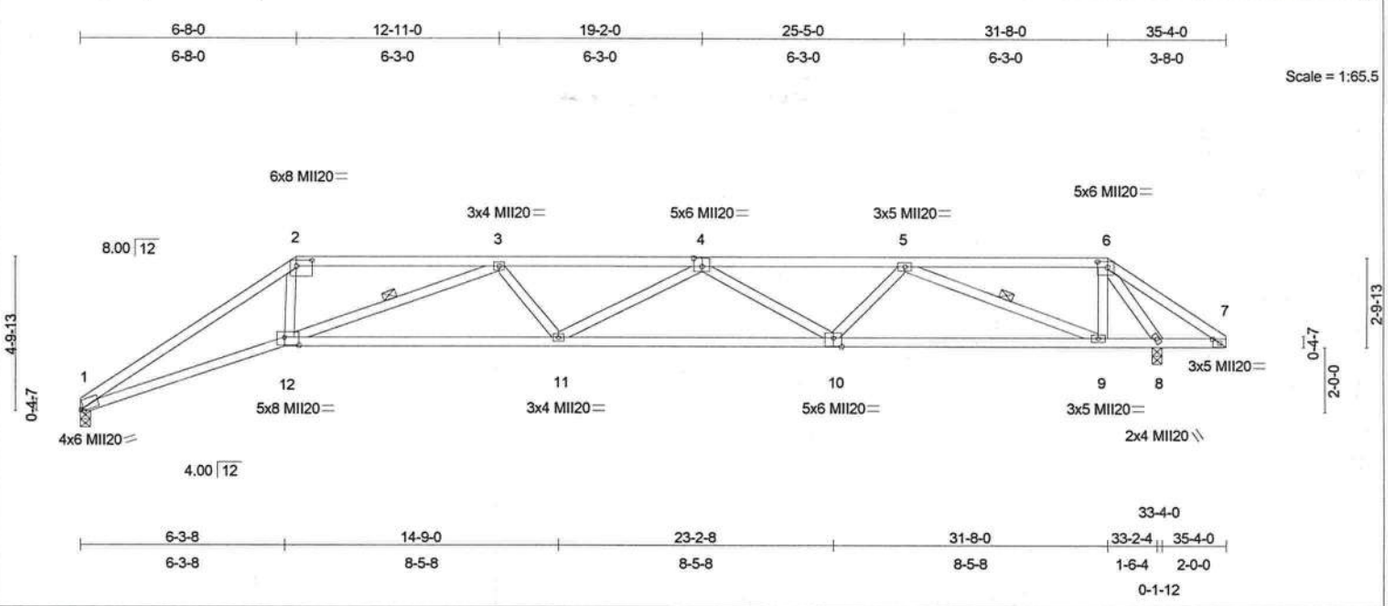



Plate Offsets (X,Y): [1:0-1-2,Edge], [2:0-5-12,0-2-0], [4:0-3-0,0-3-0], [6:0-3-12,0-2-0], [7:0-2-9,0-1-8], [10:0-3-0,0-3-4], [12:0-5-4,0-3-0]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.61 | Vert(LL) | 0.60 | 10-11 | >657 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.91 | Vert(TL) | -0.78 | 10-11 | >508 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.83 | Horz(TL) | 0.33 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 163 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-9-5 oc purlins.
BOT CHORD Rigid ceiling directly applied or 3-11-3 oc bracing.
WEBS 1 Row at midpt 3-12, 5-9

**REACTIONS** (lb/size) 1=1321/0-3-8, 8=1494/0-3-8
Max Horz 1=182(load case 3)
Max Uplift1=-575(load case 3), 8=-694(load case 2)
Max Grav 1=1322(load case 6), 8=1494(load case 1)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-3815/1906, 2-3=-2792/1520, 3-4=-4270/2332, 4-5=-3646/1988, 5-6=-919/514, 6-7=-99/181
BOT CHORD 1-12=-1752/3239, 11-12=-2361/4151, 10-11=-2453/4261, 9-10=-1828/3164, 8-9=-454/857, 7-8=-80/140
WEBS 2-12=-811/1725, 3-12=-1587/1132, 3-11=-28/230, 4-11=-29/215, 4-10=-728/535, 5-10=-260/736, 5-9=-2429/1457, 6-9=-472/1066, 6-8=-1717/768

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 575 lb uplift at joint 1 and 694 lb uplift at joint 8.

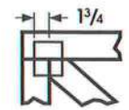
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

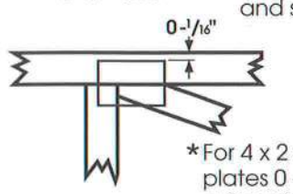

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.

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*** Plate location details available in MiTek 20/20 software or upon request.**

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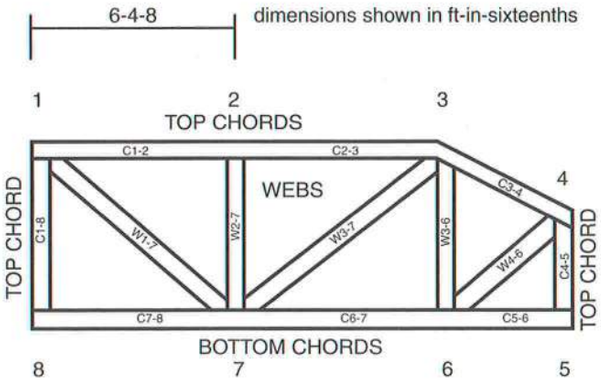
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

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| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H7 | ROOF TRUSS | 1 | 1 | I9261023 |
| | | | | | Job Reference (optional) |

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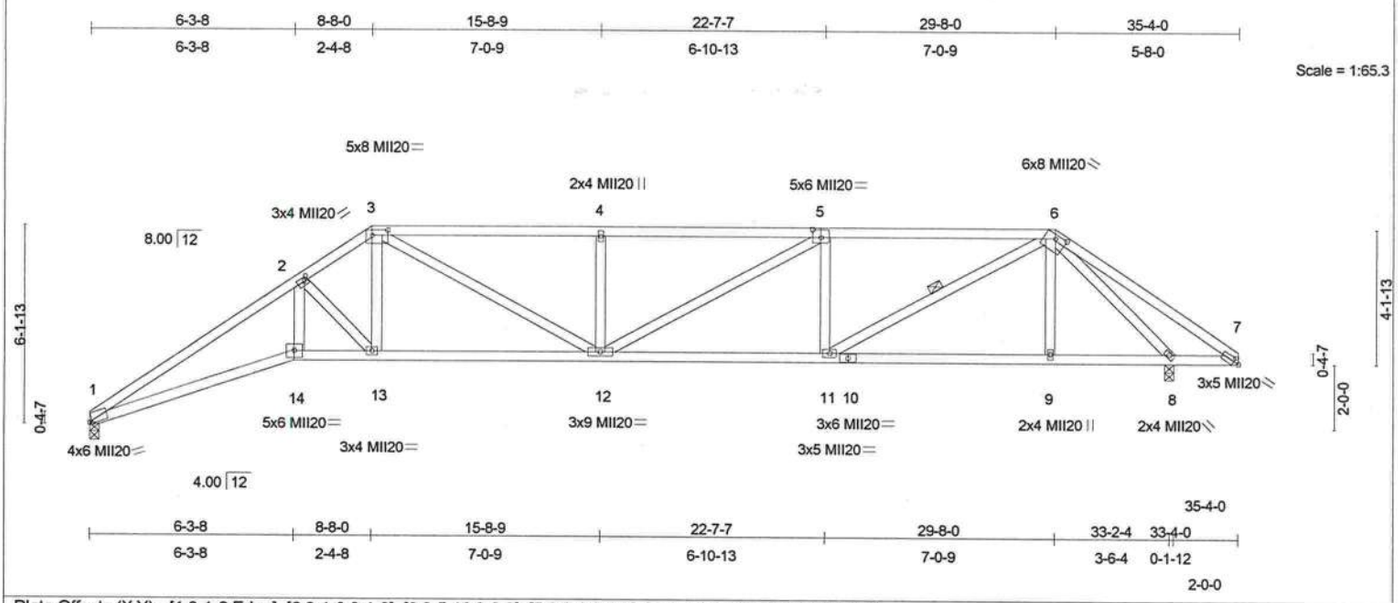



Plate Offsets (X,Y): [1:0-1-2,Edge], [2:0-1-8,0-1-8], [3:0-5-12,0-2-0], [5:0-3-0,0-3-0], [6:0-4-0,0-1-9], [7:0-1-15,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.61 | Vert(LL) | 0.33 | 12 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.83 | Vert(TL) | -0.45 | 12-13 | >892 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.91 | Horz(TL) | 0.22 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 180 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-9-5 oc purlins.
BOT CHORD Rigid ceiling directly applied or 4-8-8 oc bracing.
WEBS 1 Row at midpt 6-11

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 1=1323/0-3-8, 8=1492/0-3-8
Max Horz 1=238(load case 3)
Max Uplift1=-511(load case 3), 8=-600(load case 2)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-3766/1749, 2-3=-2685/1364, 3-4=-2903/1557, 4-5=-2903/1557, 5-6=-2540/1349, 6-7=-95/231
BOT CHORD 1-14=-1673/3186, 13-14=-1543/2936, 12-13=-1202/2242, 11-12=-1387/2563, 10-11=-549/1164, 9-10=-549/1164, 8-9=-552/1160, 7-8=-103/174
WEBS 2-14=-495/1092, 2-13=-1018/548, 3-13=-324/821, 3-12=-619/840, 4-12=-416/386, 5-12=-216/398, 5-11=-624/517, 6-11=-931/1597, 6-9=0/105, 6-8=-1828/773

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 511 lb uplift at joint 1 and 600 lb uplift at joint 8.

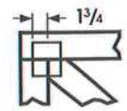
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

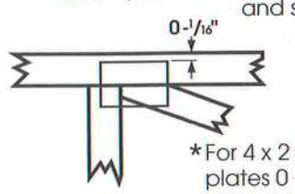

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

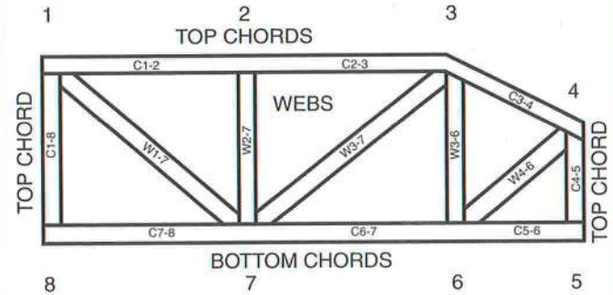
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H8 | ROOF TRUSS | 1 | 1 | I9261024 |
| | | | | | Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:47 2005 Page 1

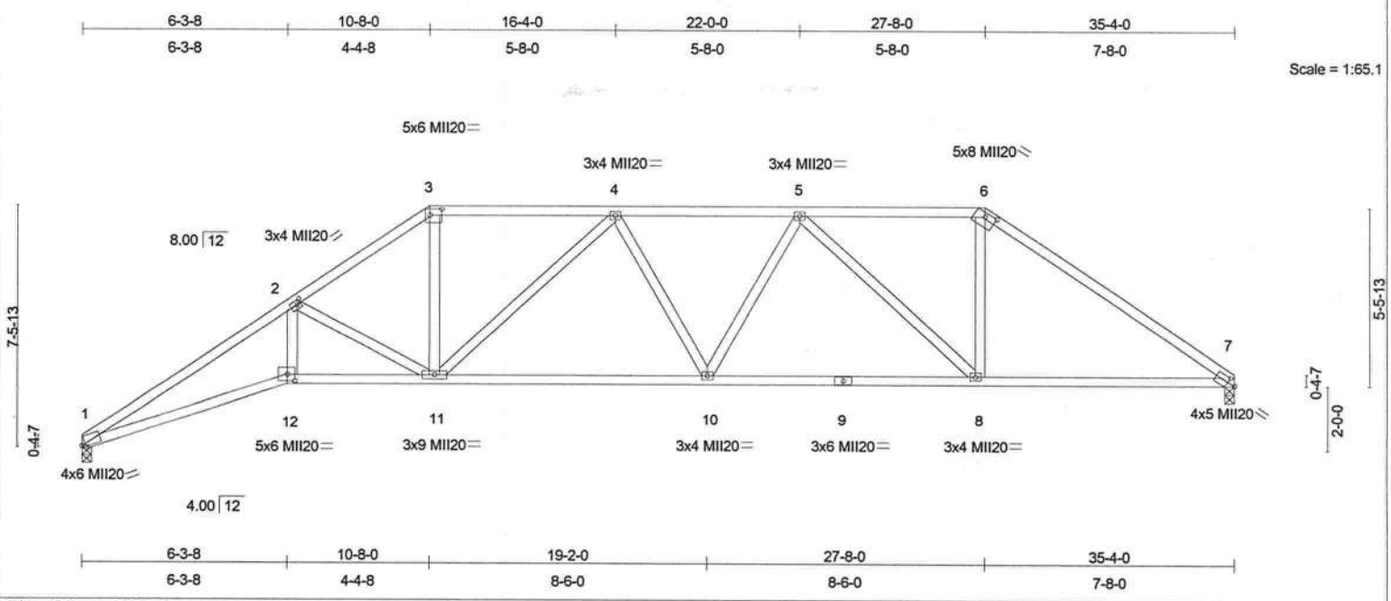



Plate Offsets (X,Y): [1:0-1-7,0-0-11], [2:0-1-8,0-1-8], [3:0-4-4,0-2-4], [6:0-4-0,0-1-9], [7:0-2-15,0-1-12], [12:0-2-12,0-2-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.66 | Vert(LL) | 0.26 | 11 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.87 | Vert(TL) | -0.45 | 10-11 | >931 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.85 | Horz(TL) | 0.25 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 175 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-7-12 oc purlins.
BOT CHORD Rigid ceiling directly applied or 4-9-2 oc bracing.

**REACTIONS** (lb/size) 1=1402/0-3-8, 7=1402/0-3-8
Max Horz 1=294(load case 3)
Max Uplift1=-460(load case 3), 7=-470(load case 2)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-4030/1644, 2-3=-2497/1091, 3-4=-2045/962, 4-5=-2349/1056, 5-6=-1702/725, 6-7=-2156/774
BOT CHORD 1-12=-1642/3415, 11-12=-1515/3149, 10-11=-1161/2373, 9-10=-1045/2235, 8-9=-1045/2235, 7-8=-588/1681
WEBS 2-12=-478/1179, 2-11=-1286/680, 3-11=-388/1059, 4-11=-549/486, 4-10=-76/170, 5-10=-74/269, 5-8=-835/614, 6-8=-322/749

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 460 lb uplift at joint 1 and 470 lb uplift at joint 7.

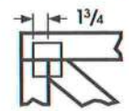
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

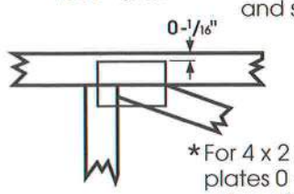

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.



*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

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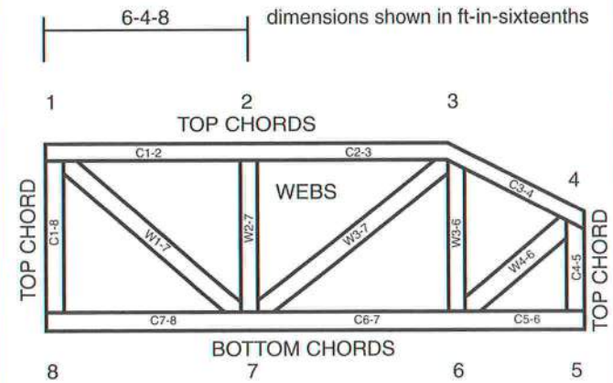
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | H9 | ROOF TRUSS | 1 | 1 | I9261025<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:47 2005 Page 1

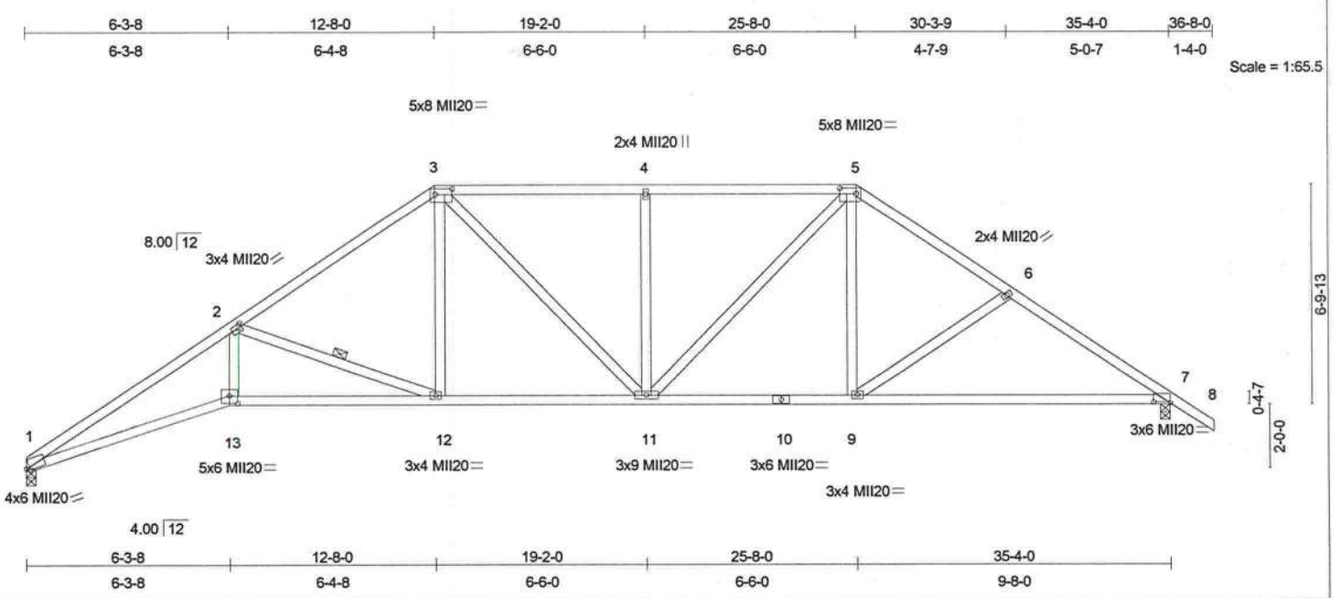



Plate Offsets (X,Y): [1:0-1-7,0-0-11], [2:0-1-4,0-1-8], [3:0-6-4,0-2-4], [5:0-6-4,0-2-4], [7:0-6-3,0-0-10], [13:0-3-0,0-2-12]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.63 | Vert(LL) | 0.24 | 12-13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.85 | Vert(TL) | -0.39 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.64 | Horz(TL) | 0.24 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 190 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-8-3 oc purlins.
BOT CHORD Rigid ceiling directly applied or 5-0-9 oc bracing.
WEBS 1 Row at midpt 2-12

**REACTIONS** (lb/size) 1=1400/0-3-8, 7=1492/0-3-8
Max Horz 1=332(load case 3)
Max Uplift1=-427(load case 4), 7=-482(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-4054/1411, 2-3=-2219/813, 3-4=-1902/764, 4-5=-1902/764, 5-6=-1912/588, 6-7=-2142/618, 7-8=0/44
BOT CHORD 1-13=-1483/3444, 12-13=-1370/3169, 11-12=-758/1775, 10-11=-463/1534, 9-10=-463/1534, 7-9=-405/1716
WEBS 2-13=-409/1218, 2-12=-1501/817, 3-12=-214/660, 3-11=-381/325, 4-11=-408/402, 5-11=-443/602, 5-9=-76/313, 6-9=-233/290

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 427 lb uplift at joint 1 and 482 lb uplift at joint 7.

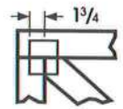
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

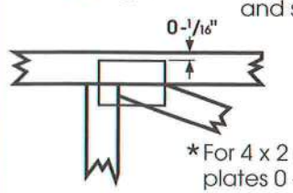

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.

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*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

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4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

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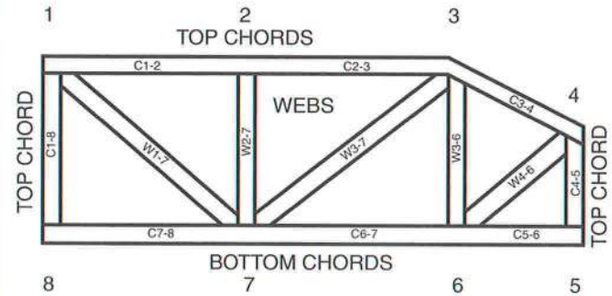
ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

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**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

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2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
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7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J1 | ROOF TRUSS | 10 | 1 | I9261026<br>Job Reference (optional) |

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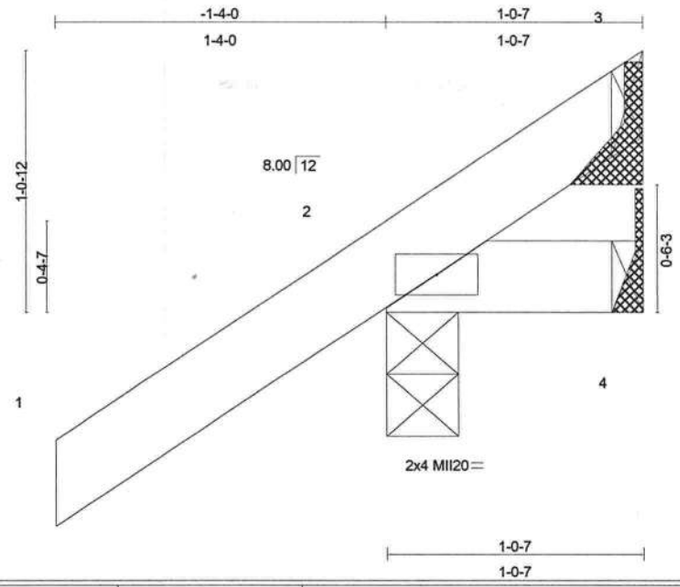



| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.16 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.00 | Vert(TL) | -0.00 | 2 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 6 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 1-0-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**REACTIONS** (lb/size) 2=178/0-3-8, 4=10/Mechanical, 3=-28/Mechanical
Max Horz 2=106(load case 4)
Max Uplift2=-188(load case 4), 3=-28(load case 1)
Max Grav 2=178(load case 1), 4=10(load case 1), 3=56(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/43, 2-3=-51/32
BOT CHORD 2-4=0/0

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 188 lb uplift at joint 2 and 28 lb uplift at joint 3.

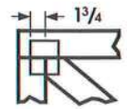
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**

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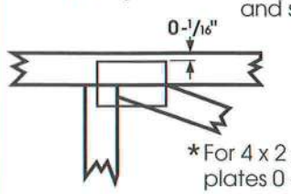


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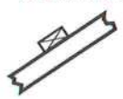
**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



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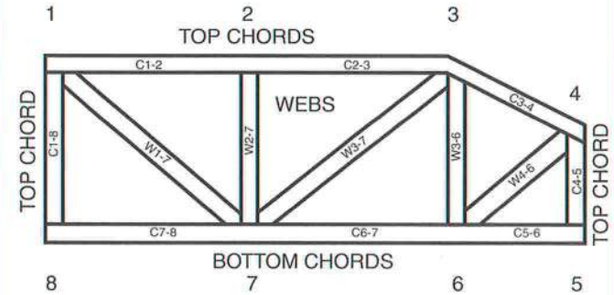
# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths

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| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J3 | ROOF TRUSS | 8 | 1 | I9261027<br>Job Reference (optional) |

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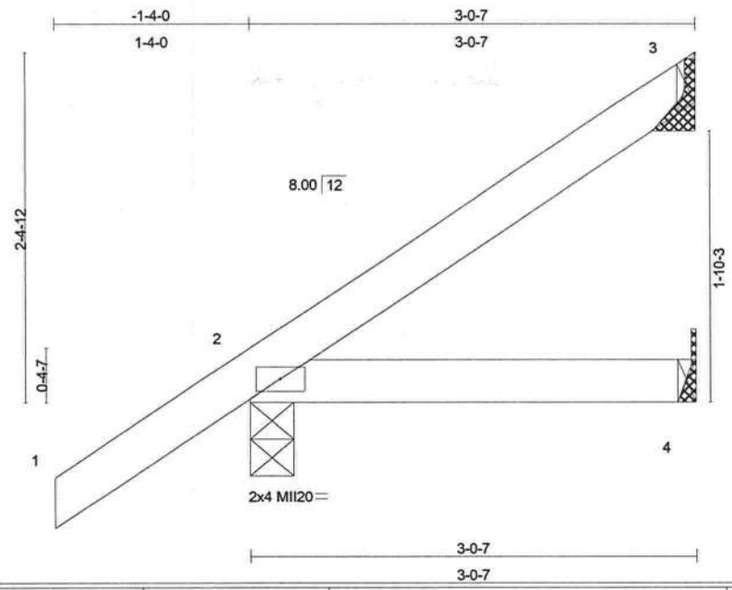



| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.18 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.04 | Vert(TL) | -0.00 | 2-4 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | -0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 13 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 3-0-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 3=58/Mechanical, 2=223/0-3-8, 4=28/Mechanical
Max Horz 2=176(load case 4)
Max Uplift3=-66(load case 4), 2=-147(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-62/25
BOT CHORD 2-4=0/0

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 66 lb uplift at joint 3 and 147 lb uplift at joint 2.

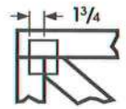
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

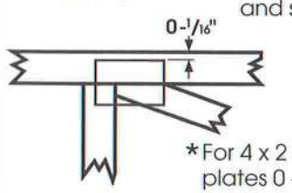
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

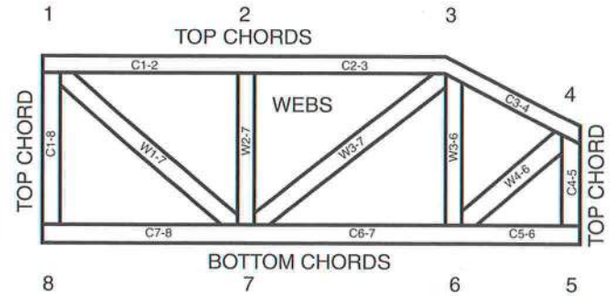
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J3A | ROOF TRUSS | 2 | 1 | I9261028<br>Job Reference (optional) |

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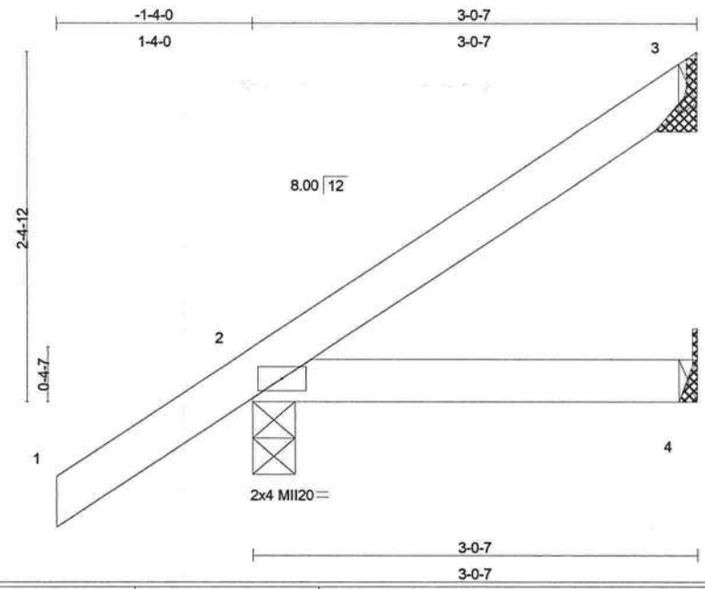


| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.18 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.04 | Vert(TL) | -0.00 | 2-4 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | -0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 13 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 3-0-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 3=58/Mechanical, 2=223/0-3-8, 4=28/Mechanical
Max Horz 2=176(load case 4)
Max Uplift3=-66(load case 4), 2=-147(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-62/25
BOT CHORD 2-4=0/0

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**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
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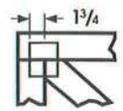
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

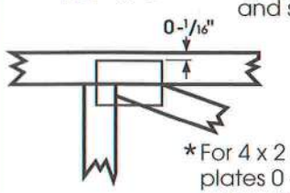

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

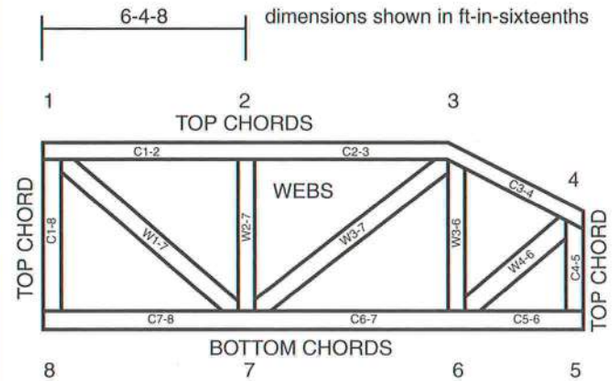
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

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**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J4 | ROOF TRUSS | 4 | 1 | I9261029<br>Job Reference (optional) |

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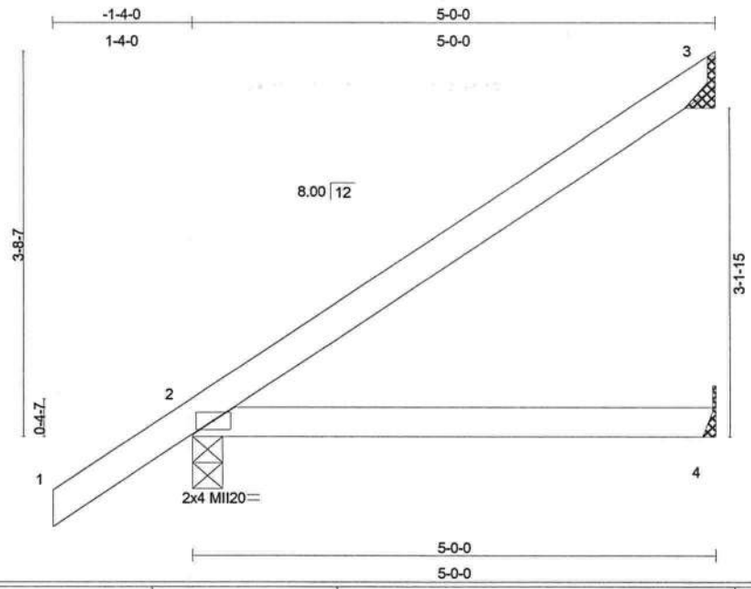


| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.27 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.10 | Vert(TL) | -0.03 | 2-4 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | -0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 19 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 5-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 3=127/Mechanical, 2=292/0-3-8, 4=48/Mechanical
Max Horz 2=249(load case 4)
Max Uplift3=-150(load case 4), 2=-143(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-113/57
BOT CHORD 2-4=0/0

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**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 150 lb uplift at joint 3 and 143 lb uplift at joint 2.

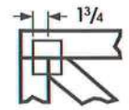
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

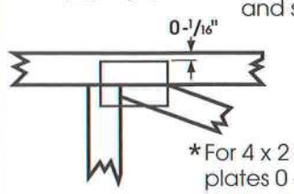

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

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BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

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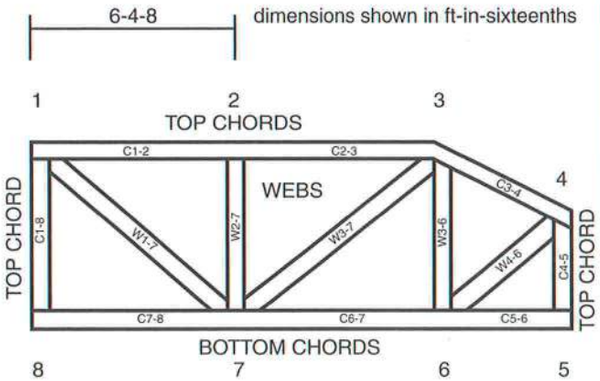


**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

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14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J5 | ROOF TRUSS | 4 | 1 | I9261030<br>Job Reference (optional) |

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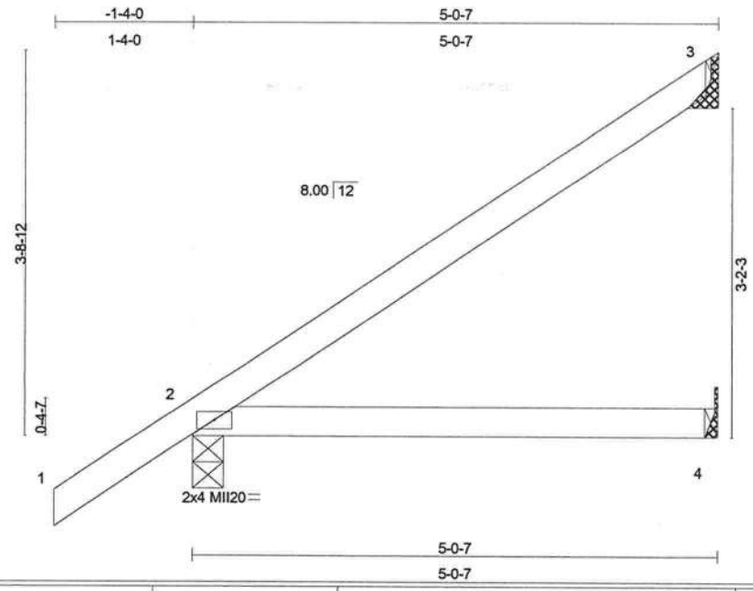


| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.27 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.11 | Vert(TL) | -0.03 | 2-4 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | -0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 19 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 5-0-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 3=129/Mechanical, 2=293/0-3-8, 4=48/Mechanical
Max Horz 2=251(load case 4)
Max Uplift3=-152(load case 4), 2=-143(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-114/57
BOT CHORD 2-4=0/0

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 152 lb uplift at joint 3 and 143 lb uplift at joint 2.

**LOAD CASE(S)** Standard


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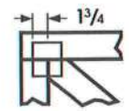
FL Cert.#6634

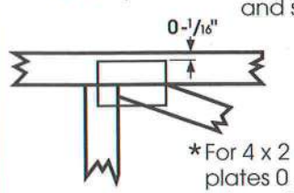

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

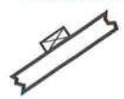
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

**BEARING**

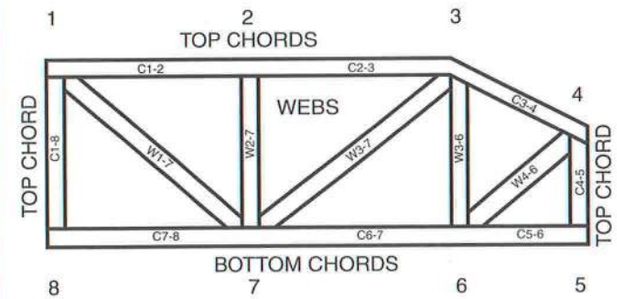
Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

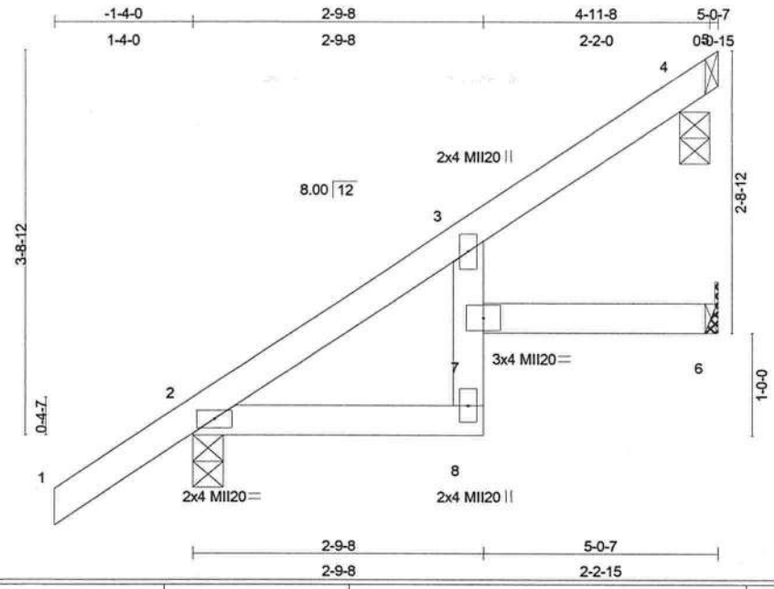
# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J5A | ROOF TRUSS | 2 | 1 | I9261031<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:49 2005 Page 1




| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.18 | Vert(LL) | 0.03 | 6-7 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.29 | Vert(TL) | -0.03 | 6-7 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 22 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
3-8 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 5-0-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=292/0-3-8, 6=74/Mechanical, 4=104/0-3-8
Max Horz 2=255(load case 4)
Max Uplift2=-139(load case 4), 6=-29(load case 4), 4=-108(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-202/0, 3-4=-72/48, 4-5=-2/0
BOT CHORD 2-8=-76/115, 7-8=0/33, 3-7=0/69, 6-7=0/0

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 139 lb uplift at joint 2, 29 lb uplift at joint 6 and 108 lb uplift at joint 4.
4) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 4.

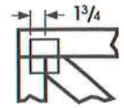
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

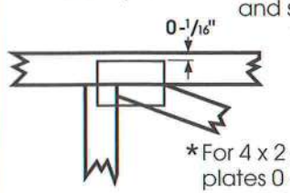

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

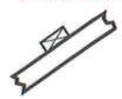
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



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**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

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DSB-89: Design Standard for Bracing.
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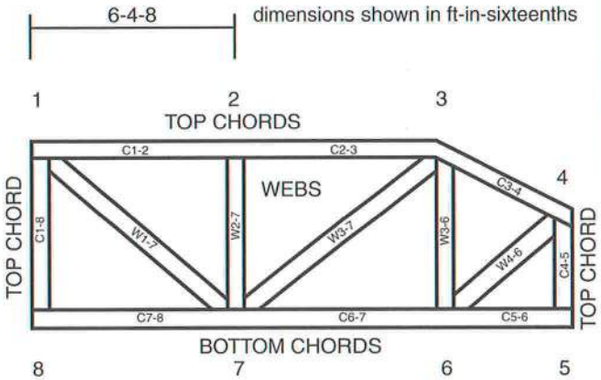
# Numbering System

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**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
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3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J7 | ROOF TRUSS | 18 | 1 | I9261032<br>Job Reference (optional) |

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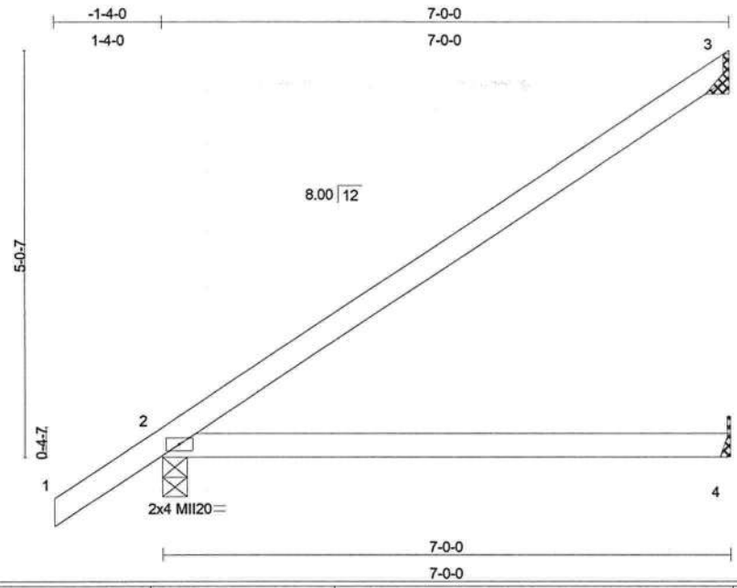



| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.63 | Vert(LL) | 0.00 | 2 | **** | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.21 | Vert(TL) | -0.11 | 2-4 | >730 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | -0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 26 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 3=191/Mechanical, 2=368/0-3-8, 4=68/Mechanical
Max Horz 2=324(load case 4)
Max Uplift3=-228(load case 4), 2=-147(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-167/86
BOT CHORD 2-4=0/0

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 228 lb uplift at joint 3 and 147 lb uplift at joint 2.

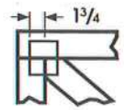
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

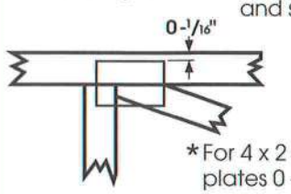
October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

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Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

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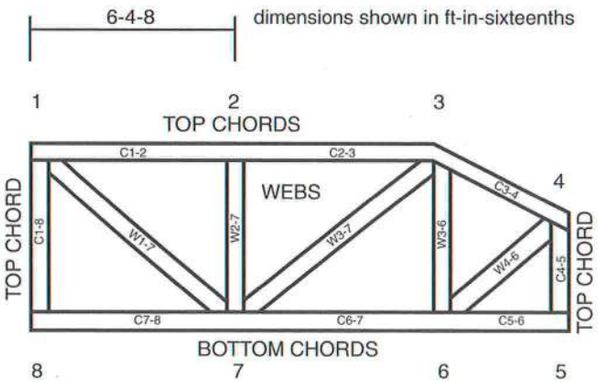
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

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2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
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7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
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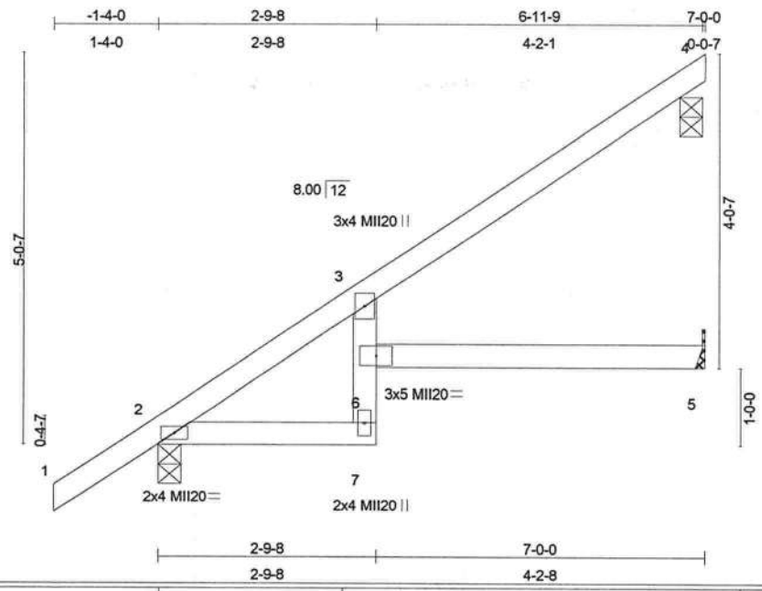
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | J7A | ROOF TRUSS | 5 | 1 | I9261033<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:49 2005 Page 1




| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.37 | Vert(LL) | 0.17 | 5-6 | >472 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.57 | Vert(TL) | -0.18 | 5-6 | >455 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.00 | Horz(TL) | 0.06 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 28 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
3-7 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 4=156/0-3-8, 2=368/0-3-8, 5=103/Mechanical
Max Horz 2=324(load case 4)
Max Uplift4=-159(load case 4), 2=-148(load case 4), 5=-34(load case 4)

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-340/0, 3-4=-109/72
BOT CHORD 2-7=-166/221, 6-7=0/45, 3-6=0/87, 5-6=0/0

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**NOTES**
1) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
2) Refer to girder(s) for truss to truss connections.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 159 lb uplift at joint 4, 148 lb uplift at joint 2 and 34 lb uplift at joint 5.
4) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 4.

**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


October 20,2005

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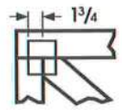


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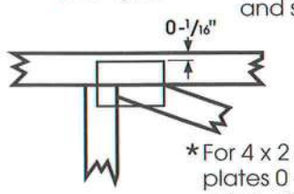


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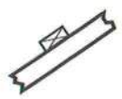
4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



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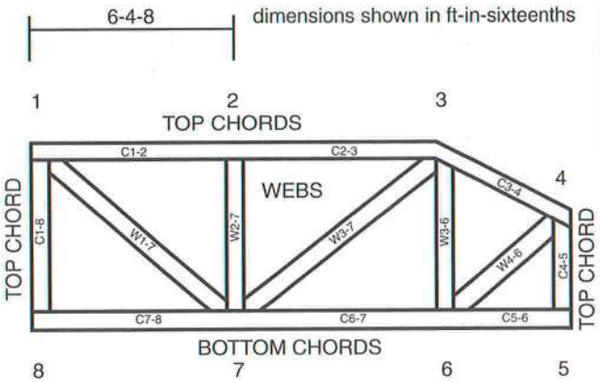


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| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | T1 | ROOF TRUSS | 12 | 1 | I9261034<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:50 2005 Page 1

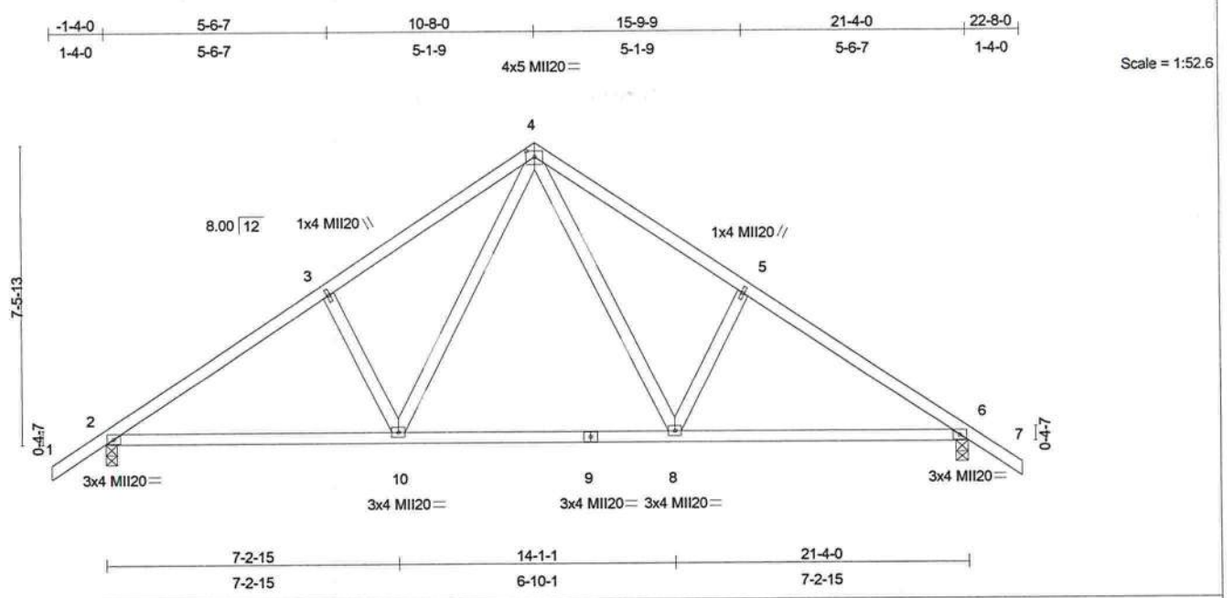



Plate Offsets (X,Y): [4:0-2-8,0-1-12]

| LOADING (psf) | | SPACING 2-0-0 | | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.29 | Vert(LL) | 0.04 | 2-10 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.29 | Vert(TL) | -0.10 | 2-10 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.27 | Horz(TL) | 0.02 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 109 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 5-6-12 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=930/0-3-8, 6=930/0-3-8
Max Horz 2=-307(load case 2)
Max Uplift2=-389(load case 4), 6=-389(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-1203/376, 3-4=-1060/452, 4-5=-1060/453, 5-6=-1203/376, 6-7=0/44
BOT CHORD 2-10=-347/921, 9-10=-104/623, 8-9=-104/623, 6-8=-197/921
WEBS 3-10=-277/319, 4-10=-244/444, 4-8=-244/444, 5-8=-277/320

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 389 lb uplift at joint 2 and 389 lb uplift at joint 6.

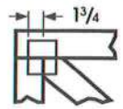
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

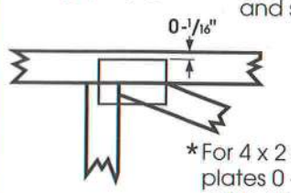

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

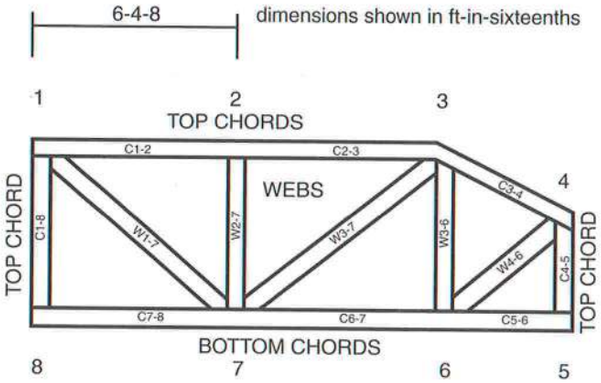
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | T2 | ROOF TRUSS | 2 | 1 | I9261035<br>Job Reference (optional) |

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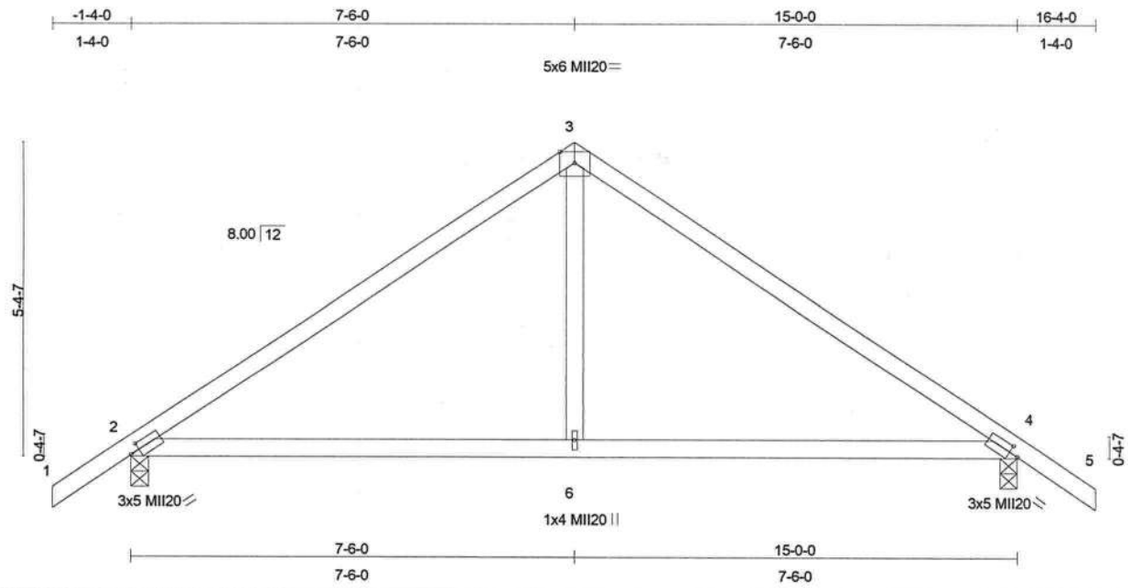



Plate Offsets (X,Y): [2:0-1-15,0-1-8], [4:0-1-15,0-1-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.51 | Vert(LL) | 0.10 | 2-6 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.39 | Vert(TL) | -0.13 | 2-6 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.07 | Horz(TL) | 0.01 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 61 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=677/0-3-8, 4=677/0-3-8
Max Horz 2=-218(load case 2)
Max Uplift2=-305(load case 4), 4=-305(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-733/248, 3-4=-733/248, 4-5=0/44
BOT CHORD 2-6=-98/514, 4-6=-98/514
WEBS 3-6=0/211

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 305 lb uplift at joint 2 and 305 lb uplift at joint 4.

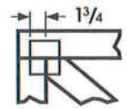
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

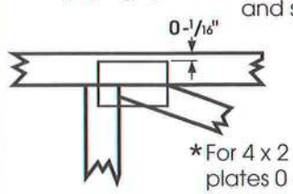

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

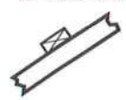
*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**



Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

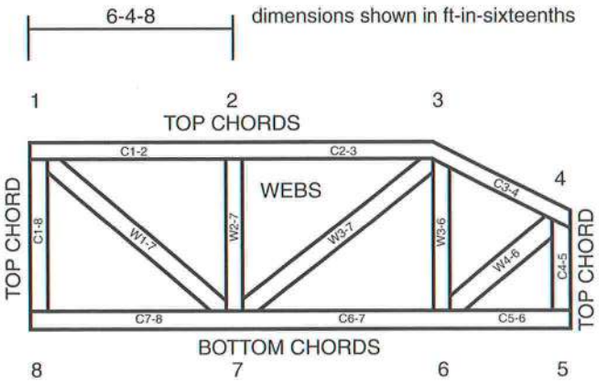
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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# ⚠General Safety Notes

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2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
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6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | T3 | ROOF TRUSS | 2 | 1 | I9261036<br>Job Reference (optional) |

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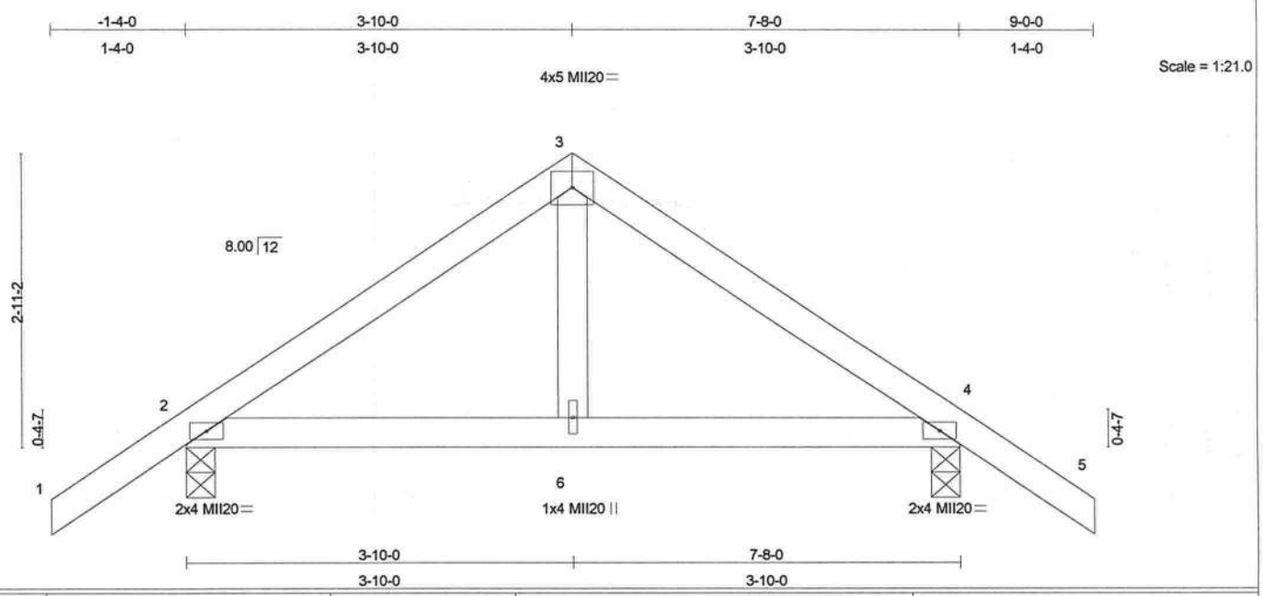



| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.18 | Vert(LL) | -0.00 | 6 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.09 | Vert(TL) | -0.01 | 2-6 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.03 | Horz(TL) | 0.00 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 34 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (lb/size) 2=384/0-3-8, 4=384/0-3-8
Max Horz 2=-115(load case 2)
Max Uplift2=-211(load case 4), 4=-211(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/44, 2-3=-312/70, 3-4=-312/70, 4-5=0/44
BOT CHORD 2-6=0/195, 4-6=0/195
WEBS 3-6=0/90

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 211 lb uplift at joint 2 and 211 lb uplift at joint 4.

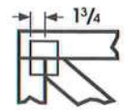
**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634

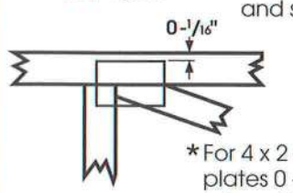

October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**




*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

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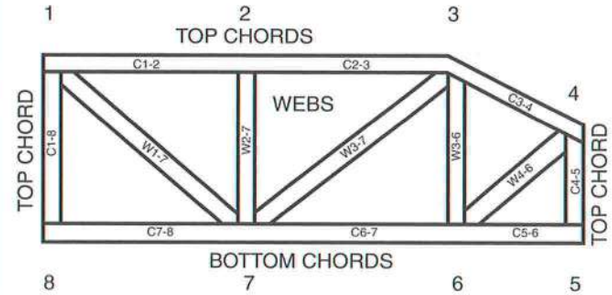
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System

6-4-8 — dimensions shown in ft-in-sixteenths




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

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2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | T4 | ROOF TRUSS | 1 | 1 | I9261037<br>Job Reference (optional) |

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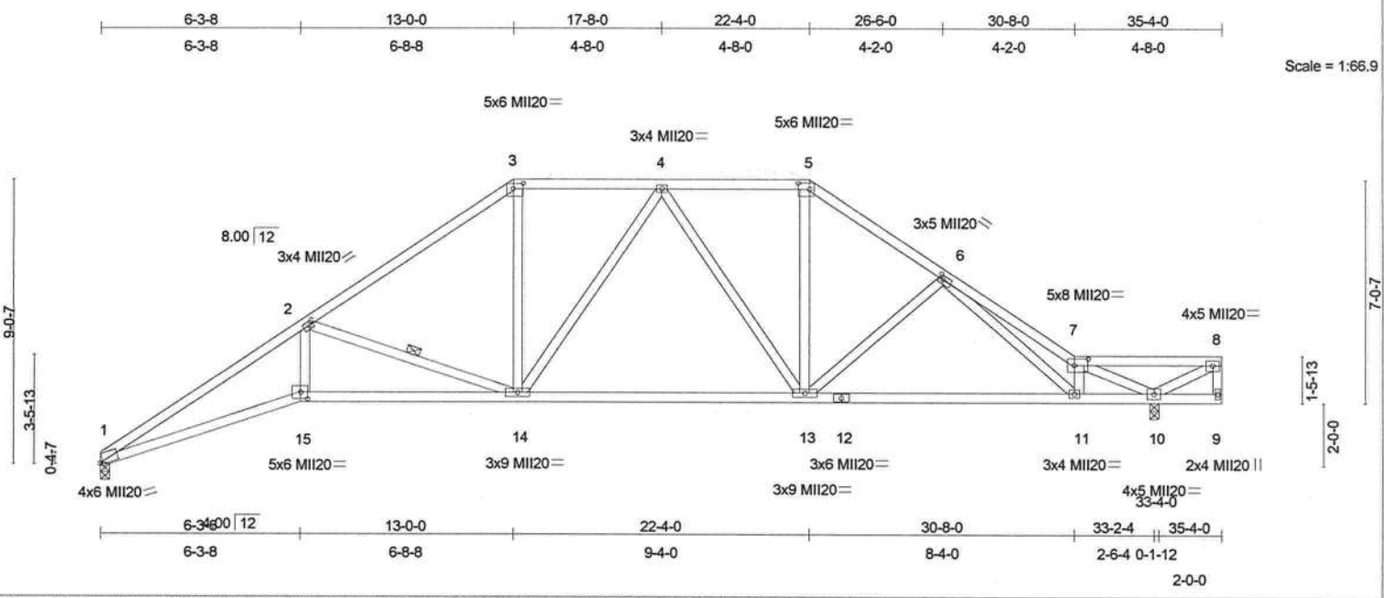



Plate Offsets (X,Y): [1:0-1-2,Edge], [2:0-1-8,0-1-8], [3:0-3-12,0-2-0], [5:0-4-4,0-2-4], [6:0-1-8,0-1-8], [7:0-5-4,0-2-8], [15:0-2-12,0-2-8]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.57 | Vert(LL) | 0.22 | 14-15 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.80 | Vert(TL) | -0.38 | 13-14 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.57 | Horz(TL) | 0.23 | 10 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 194 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 2-10-2 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-3-3 oc bracing.
WEBS 1 Row at midpt 2-14

**REACTIONS** (lb/size) 1=1317/0-3-8, 10=1487/0-3-8
Max Horz 1=387(load case 3)
Max Uplift1=-413(load case 4), 10=-527(load case 5)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=-3787/1311, 2-3=-1993/620, 3-4=-1580/618, 4-5=-1462/489, 5-6=-1810/509, 6-7=-3121/908, 7-8=-188/152, 8-9=-18/24
BOT CHORD 1-15=-1350/3216, 14-15=-1247/2957, 13-14=-616/1601, 12-13=-385/1756, 11-12=-385/1756, 10-11=-600/2483, 9-10=-112/123
WEBS 2-15=-369/1145, 2-14=-1475/848, 3-14=-103/682, 4-14=-190/338, 4-13=-346/351, 5-13=-167/694, 6-13=-420/331, 6-11=-347/1098, 7-11=-682/341, 7-10=-2904/814, 8-10=-317/311

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Provide adequate drainage to prevent water ponding.
4) Bearing at joint(s) 1 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 413 lb uplift at joint 1 and 527 lb uplift at joint 10.

**LOAD CASE(S)** Standard

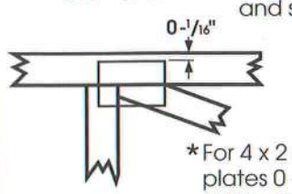

Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


October 20,2005

# Symbols

**PLATE LOCATION AND ORIENTATION**


*Center plate on joint unless x,y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and securely seat.




*For 4 x 2 orientation, locate plates 0 - 1/16" from outside edge of truss.

*This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

**PLATE SIZE**

4 x 4 — The first dimension is the width perpendicular to slots. Second dimension is the length parallel to slots.

**LATERAL BRACING**

Indicated by symbol shown and/or by text in the bracing section of the output. Use T, I or Eliminator bracing if indicated.

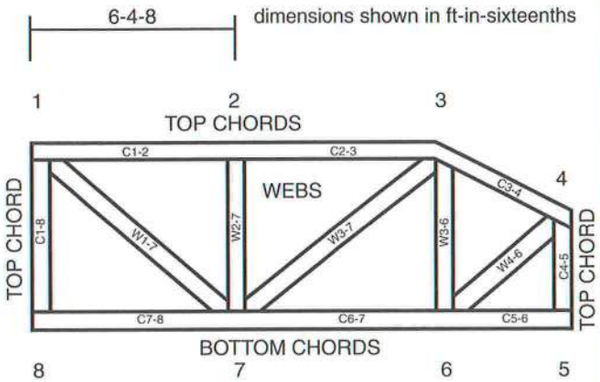
**BEARING**

Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur.

**Industry Standards:**

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI1: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System




**JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.**

**CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.**

**CONNECTOR PLATE CODE APPROVALS**

| | |
|---|---|
| BOCA | 96-31, 95-43, 96-20-1, 96-67, 84-32 |
| ICBO | 4922, 5243, 5363, 3907 |
| SBCCI | 9667, 9730, 9604B, 9511, 9432A |

MiTek®

TEE-LOK®

# ⚠General Safety Notes

## Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI1.
2. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
3. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
4. Cut members to bear tightly against each other.
5. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI1.
6. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI1.
7. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
8. Unless expressly noted, this design is not applicable for use with fire retardant or preservative treated lumber.
9. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
10. Plate type, size, orientation and location dimensions shown indicate minimum plating requirements.
11. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
12. Top chords must be sheathed or purlins provided at spacing shown on design.
13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

| Job | Truss | Truss Type | Qty | Ply | SIMQUE HOMES (LOT 24) |
|---|---|---|---|---|---|
| 8596-1 | T5 | ROOF TRUSS | 1 | 1 | I9261038<br>Job Reference (optional) |

Reese Building Components, INC., Sylvester Ga. 6.200 s Oct 18 2005 MiTek Industries, Inc. Thu Oct 20 12:00:51 2005 Page 1

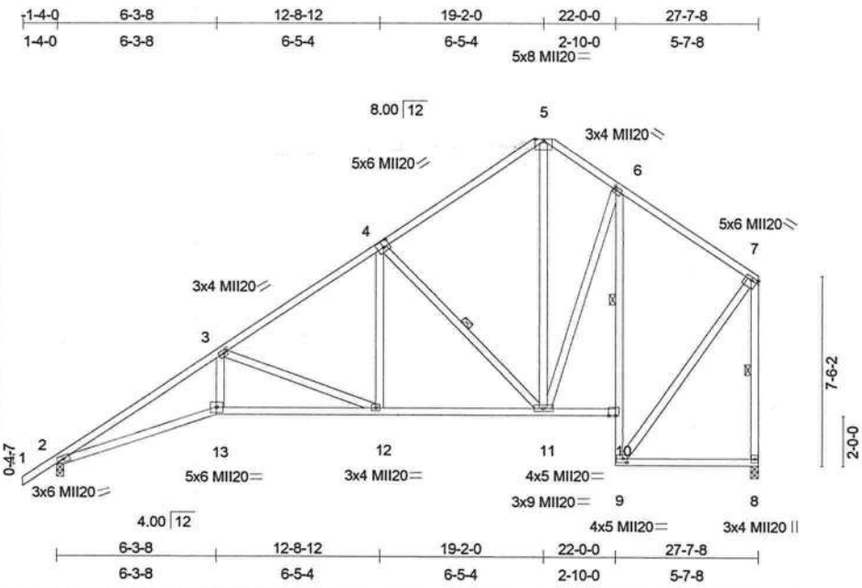



Plate Offsets (X,Y): [3:0-1-12,0-1-8], [4:0-3-0,0-3-0], [6:0-1-4,0-1-8], [7:0-3-0,0-1-8], [9:0-1-12,0-2-0], [10:0-3-4,Edge]

| LOADING (psf) | | SPACING | 2-0-0 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL | 20.0 | Plates Increase | 1.25 | TC | 0.51 | Vert(LL) | 0.19 | 12-13 | >999 | 360 | MII20 | 249/190 |
| TCDL | 10.0 | Lumber Increase | 1.25 | BC | 0.94 | Vert(TL) | -0.31 | 12-13 | >999 | 240 | | |
| BCLL | 0.0 | Rep Stress Incr | YES | WB | 0.98 | Horz(TL) | 0.43 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code FBC2001/ANSI95 | | (Matrix) | | | | | | | Weight: 197 lb | |

**LUMBER**
TOP CHORD 2 X 4 SYP No.2
BOT CHORD 2 X 4 SYP No.2 *Except*
6-9 2 X 4 SYP No.2D
WEBS 2 X 4 SYP No.3

**BRACING**
TOP CHORD Sheathed or 3-3-14 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 5-5-7 oc bracing. Except:
1 Row at midpt 6-10
WEBS 1 Row at midpt 4-11, 7-8

**REACTIONS** (lb/size) 2=1184/0-3-8, 8=1091/0-3-8
Max Horz 2=724(load case 3)
Max Uplift2=-489(load case 4), 8=-392(load case 4)

This truss design is based upon the building code shown. This code has been specified by the project engineer/architect, or building designer. The applicability of this code in any particular jurisdiction should be confirmed with the building official prior to truss fabrication. This determination is not the responsibility of the component/truss designer.

**FORCES** (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/42, 2-3=-3015/1209, 3-4=-1509/592, 4-5=-841/412, 5-6=-768/468, 6-7=-655/377, 7-8=-1105/440
BOT CHORD 2-13=-1262/2544, 12-13=-1165/2333, 11-12=-581/1165, 10-11=-228/492, 9-10=-506/182, 6-10=-658/271, 8-9=-90/115
WEBS 3-13=-340/935, 3-12=-1241/769, 4-12=-202/553, 4-11=-803/565, 5-11=-276/521, 6-11=-315/426, 7-9=-211/776

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-98; 110mph (3-second gust); h=15ft; TCDL=5.0psf; BCDL=5.0psf; Category II; Exp C; enclosed; MWFRS gable end zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.33 plate grip DOL=1.33.
3) Bearing at joint(s) 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 489 lb uplift at joint 2 and 392 lb uplift at joint 8.

**LOAD CASE(S)** Standard


Scott W. Miller, FL Lic #58316
MiTek Industries, Inc.
14515 North Outer Forty Drive
Suite 300
Chesterfield, MO, 63017
FL Cert.#6634


October 20,2005

# Symbols

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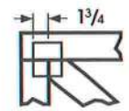


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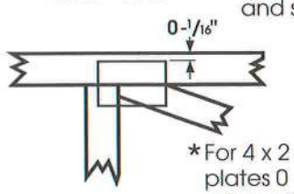


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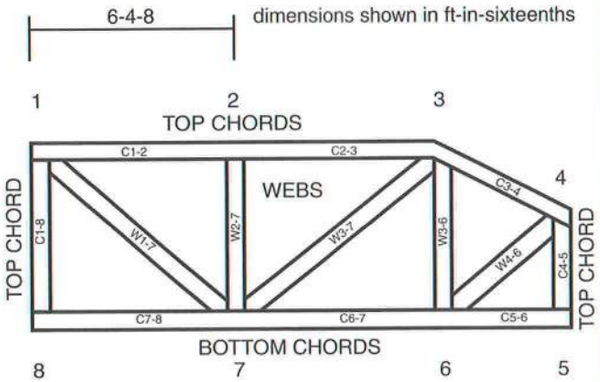


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MiTek®

TEE-LOK®

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13. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
14. Connections not shown are the responsibility of others.
15. Do not cut or alter truss member or plate without prior approval of a professional engineer.
16. Install and load vertically unless indicated otherwise.

Att: Wages

# Columbia County Building Department
# Culvert Waiver

**Culvert Waiver No.**
**000000906**

DATE: 04/03/2006 BUILDING PERMIT NO. 23921

APPLICANT MELANIE RODER PHONE 386.752.2281

ADDRESS 387 SW KEMP CT LAKE CITY FL 32025

OWNER AARON SIMQUE HOMES PHONE 386.755.0841

ADDRESS 169 SE CAROB GLEN LAKE CITY FL 32025

CONTRACTOR AARON SIMQUE PHONE 386.755.0841

LOCATION OF PROPERTY 90-E TO SR 100,TR TO C-245,TR TO PLANT ST,TL TO GOLDIE WAY,TL TO CAROB GLEN,TR AND IT'S THE 3RD LOT ON R.

SUBDIVISION/LOT/BLOCK/PHASE/UNIT SUZANNE 24 ___ ___ 1

PARCEL ID # 03-4S-17-07570-024

**I HEREBY CERTIFY THAT I UNDERSTAND AND WILL FULLY COMPLY WITH THE DECISION OF THE COLUMBIA COUNTY PUBLIC WORKS DEPARTMENT IN CONNECTION WITH THE HEREIN PROPOSED APPLICATION.**

**SIGNATURE:** _____

**A SEPARATE CHECK IS REQUIRED**
**MAKE CHECKS PAYABLE TO BCC**

**Amount Paid 50.00**

---

**PUBLIC WORKS DEPARTMENT USE ONLY**

**I HEREBY CERTIFY THAT I HAVE EXAMINED THIS APPLICATION AND DETERMINED THAT THE CULVERT WAIVER IS:**

_____ APPROVED ✓ NOT APPROVED - NEEDS A CULVERT PERMIT

RECEIVED
APR 04 2006
BY:

COMMENTS: Needs Culvert so Ditches Does not Restrict water Flow

SIGNED: Ken Hunt DATE: 04-05-06

**ANY QUESTIONS PLEASE CONTACT THE PUBLIC WORKS DEPARTMENT AT 386-752-5955.**

135 NE Hernando Ave., Suite B-21
Lake City, FL 32055
Phone: 386-758-1008 Fax: 386-758-2160

COLUMBIA COUNTY · GATEWAY TO FLORIDA

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

Reference to: Build permit application Number: 0511-13

Simque Homes Owner Simque Homes 169 SE Carob Glen Lot 24 Suzanne Subdivision Unit 1

On the date of November 8, 2005 application 0511-13 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 0511-13 when making reference to this application.**

1. Application 0511-13 which was filed with the building department on the date of November 2, 2005 will be reviewed under the Florida Building Code 2004. The Wind Load design by Mr. Mark Disosway was design under the Florida Building Code 2001. The wind Load design should reflect the code sections of the Florida Building Code 2004 that relate to wind Load design code requirements.

2. Please submit a letter from your well contractor providing information for the potable water well to include the following equipment, size of pump motor, size of pressure tank and cycle stop valve if used.

3. Show compliance with the FRC-2004 section R309: Garages and Carports: R309.1: Opening protection. Openings from a private garage directly into a room used for sleeping purposes shall not be permitted. Other openings between the garage and

residence shall be equipped with solid wood doors not less than 13/8 inches (35 mm) in thickness, solid or honeycomb core steel doors not less than 13/8 inches (35 mm) thick, or 20-minute fire-rated doors. R309.1.1 Duct penetration: Ducts in the garage and ducts penetrating the walls or ceilings separating the dwelling from the garage shall be constructed of a minimum No. 26 gage (0.48 mm) sheet steel or other approved material and shall have no openings into the garage. R309.2 Separation required: The garage shall be separated from the residence and its attic area by not less than ½-inch (12.7 mm) gypsum board applied to the garage side. Garages beneath habitable rooms shall be separated from all habitable rooms above by not less than 5/8-inch (15.9 mm) Type X gypsum board or equivalent. Where the separation is a floor-ceiling assembly, the structure supporting the separation shall also be protected by not less than ½-inch (12.7 mm) gypsum board or equivalent.

Thank you,

Joe Haltiwanger
Plan Examiner
Columbia County Building Department

residence shall be equipped with solid wood doors not less than 1 3/8 inches (35 mm) in thick ness, solid or honeycomb core steel doors not less than 1 3/8 inches (35 mm) thick, or 20-minute fire-rated doors. R302.7 Heat protection. Doors to the garage and doors p ortending into sleeping rooms or bathrooms separating the dwelling from the garage shall be constructed of a minimum of 20 gage (0.10 mm) sheet steel or other approved material and shall have no openings into the garage. R302.8 Separation required. The garage shall be separated from the residence and its attic area by not less than ½-inch (12.7 mm) gypsum board applied to the garage side. Garages beneath habitable rooms shall be separated from all habitable rooms above by not less than 5/8-inch (15.9 mm) Type X gypsum board or equivalent. Where the separation is a floor-ceiling assembly, the structure supporting the separation shall also be protected by not less than ½-inch (12.7 mm) gypsum board or equivalent.

Thank you,

Joe Hallin, Manager
Plan Examiner
Columbia County Building Department

# Columbia County Building Department
# Culvert Permit

**Culvert Permit No.**
**000000906**

DATE 12/02/2005 PARCEL ID # 03-4S-17-07570-024

APPLICANT MELANIE RODER PHONE 386.752.2281

ADDRESS 387 SW KEMP CT LAKE CITY FL 32025

OWNER AARON SIMQUE HOMES PHONE 386.755.0841

ADDRESS 169 SE CAROB GLEN LAKE CITY FL 32025

CONTRACTOR AARON SIMQUE PHONE 386.755.0841

LOCATION OF PROPERTY 90-E TO SR 100,TR TO C-245,TR TO PLANT ST,TL TO GOLDIE WAY,TL TO CAROB GLEN,TR AND IT'S THE 3RD LOT ON R.

SUBDIVISION/LOT/BLOCK/PHASE/UNIT SUZANNE 24 1

SIGNATURE Melanie Roder

**INSTALLATION REQUIREMENTS**

[X] Culvert size will be 18 inches in diameter with a total lenght of 32 feet, leaving 24 feet of driving surface. Both ends will be mitered 4 foot with a 4 : 1 slope and poured with a 4 inch thick reinforced concrete slab.

INSTALLATION NOTE: Turnouts will be required as follows:
a) a majority of the current and existing driveway turnouts are paved, or;
b) the driveway to be served will be paved or formed with concrete.
Turnouts shall be concrete or paved a minimum of 12 feet wide or the width of the concrete or paved driveway, whichever is greater. The width shall conform to the current and existing paved or concreted turnouts.

[ ] Culvert installation shall conform to the approved site plan standards.

[ ] Department of Transportation Permit installation approved standards.

[ ] Other _____

**ALL PROPER SAFETY REQUIREMENTS SHOULD BE FOLLOWED DURING THE INSTALATION OF THE CULVERT.**

135 NE Hernando Ave., Suite B-21
Lake City, FL 32055
Phone: 386-758-1008 Fax: 386-758-2160

**Amount Paid 25.00**

Aaron Simque Homes Lot 24 Suzanne - Unit I

# Columbia County Building Permit Application

Revised 9-23-04

For Office Use Only Application # 0511-13 Date Received 10/2 By JW Permit # 906/23921
Application Approved by - Zoning Official BLK Date 08.11.05 Plans Examiner OK JTH Date 12-02-05
Flood Zone X SURVEY Development Permit N/A Zoning RSF-2 Land Use Plan Map Category RES. LW DEN.
Comments Per ~~PLAT~~ SEE SITE PLAN wrong
S/333

Applicants Name Melanie Roder Phone 752-2281
Address 387 SW Kemp ct Lake City, FL 32024
Owners Name Aaron Simque Homes, inc Phone 755-0841
911 Address 169 SE Carob gln Lake City, FL 32025
Contractors Name Aaron Simque Homes Phone 755-0841
Address P.O. Box 2183 Lake City, FL 32056
Fee Simple Owner Name & Address NA
Bonding Co. Name & Address NA
Architect/Engineer Name & Address Will Myers / Mark Disosway 32055
Mortgage Lenders Name & Address Columbia County Bank / 173 NW Hillsboro Ave Lake City, FL
Circle the correct power company - FL Power & Light - Clay Elec. - Suwannee Valley Elec. - Progressive Energy
Property ID Number 03-4S-17-01570-024 Estimated Cost of Construction 70,000
Subdivision Name Suzanne Subdivision Lot 24 Block ___ Unit I Phase ___
Driving Directions 90 E, TR on 100, TR on CR 245, TR on Plant st TL on Goldie Way, TR on Carob gln. 3rd lot on R.

Type of Construction SFD Number of Existing Dwellings on Property 0
Total Acreage .68 Lot Size ___ Do you need a - Culvert Permit or Culvert Waiver or Have an Existing Drive
Actual Distance of Structure from Property Lines - Front 50' Side 15'11" Side 17'6" Rear 88'7"
Total Building Height 21'10" Number of Stories 1 Heated Floor Area 1545 Roof Pitch 8-12
Porches 212 GARAGE 522 TOTAL 2279

**Application is hereby made to obtain a permit to do work and installations as indicated. I certify that no work or installation has commenced prior to the issuance of a permit and that all work be performed to meet the standards of all laws regulating construction in this jurisdiction.**

**OWNERS AFFIDAVIT: I hereby certify that all the foregoing information is accurate and all work will be done in compliance with all applicable laws and regulating construction and zoning.**

**WARNING TO OWNER: YOUR FAILURE TO RECORD A NOTICE OF COMMENCMENT MAY RESULT IN YOU PAYING TWICE FOR IMPROVEMENTS TO YOUR PROPERTY. IF YOU INTEND TO OBTAIN FINANCING, CONSULT WITH YOUR LENDER OR ATTORNEY BEFORE RECORDING YOUR NOTICE OF COMMENCEMENT.**

Owner Builder or Agent (Including Contractor)

NOTARY PUBLIC STATE OF FLORIDA
Linda R. Roder
Commission #DD303275
Expires: Mar 24, 2008
Bonded Thru
Atlantic Bonding Co., Inc.

X
Contractor Signature
Contractors License Number RR 29003130
Competency Card Number
NOTARY STAMP/SEAL

STATE OF FLORIDA
COUNTY OF COLUMBIA

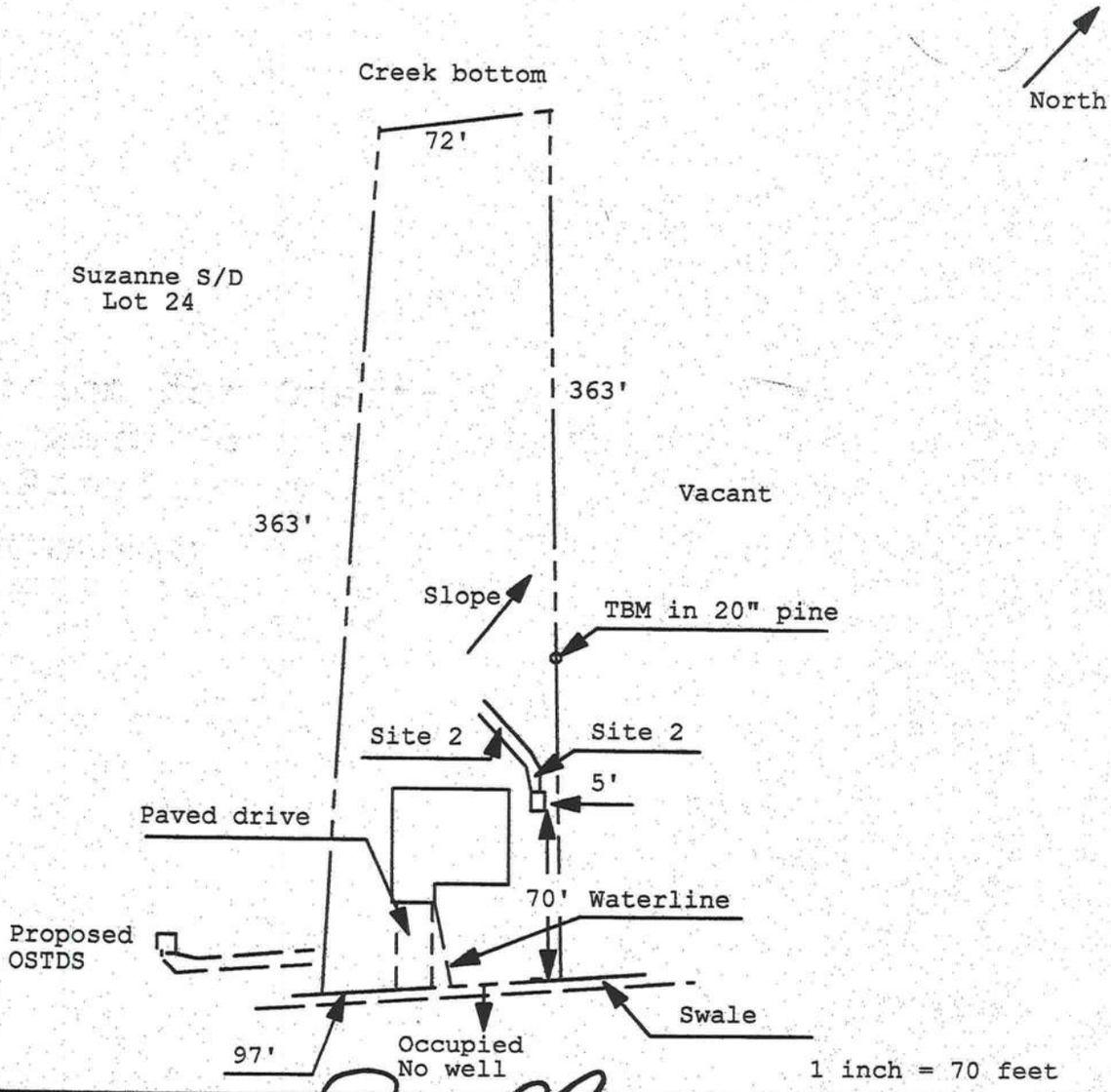
Sworn to (or affirmed) and subscribed before me
this 31st day of October 20 05.
sonally known ✓ or Produced Identification ___

Linda Roder
Notary Signature JW called 12.02.05 LINDA.

**Application for Onsite Sewage Disposal System Construction Permit. Part II Site Plan**
**Permit Application Number:** 05-103922

**ALL CHANGES MUST BE APPROVED BY THE COUNTY HEALTH UNIT**

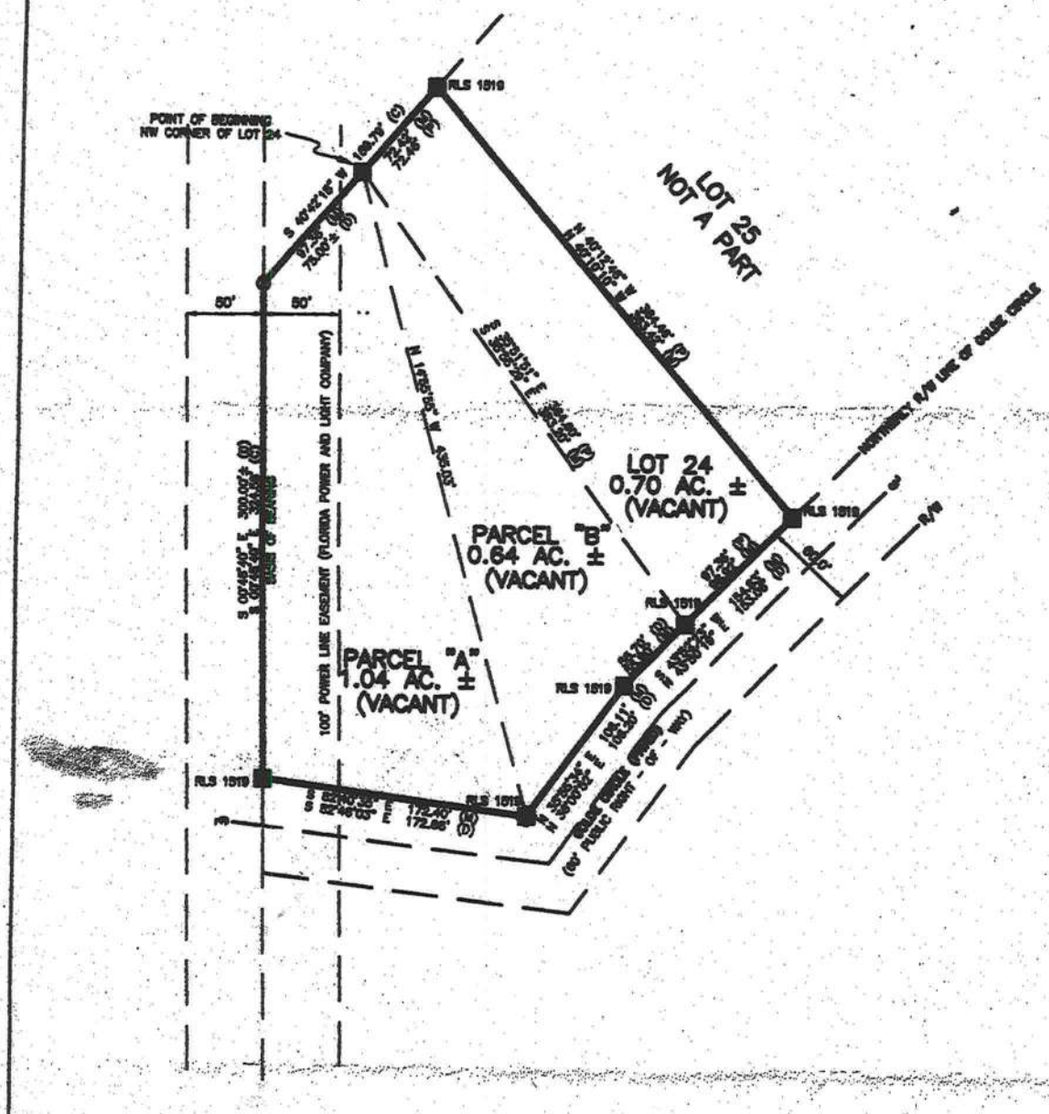
SIMQUE/CR 05-3127




**Site Plan Submitted By** [signature] **Date** 10/3/05
**Plan Approved** ✓ **Not Approved** ____ **Date** 10/14/05

**By** [signature] Columbia **CPHU**

**Notes:**




PARCEL "A"

BEGIN AT THE NOR
SUZANNE SUBDIVISI
4 PAGE 91, COLUM
S 40°43'02" W, 97.
OF OF THE NORTHE
RUN S 00°48'40" E
NORTH RIGHT-OF-
82°40'35" E ALONG
THENCE N 14°55'55
BEGINNING. SUBJEC
WEST 50 FEET THE

PARCEL "B"

BEGIN AT THE NOR
SUZANNE SUBDIVISI
BOOK 4, PAGE 91,
RUN THENCE S 14°
RIGHT-OF-WAY OF
E, ALONG SAID RIG
THENCE CONTINUE
43°50'19" E, 55.70
LINE OF SAID LOT
SAID WESTERLY LIN
BEGINNING.

NOTES:

1. BEARINGS ARE BASED ON THE WEST LINE OF SAID PROPERTY, BEING S 00°48'40" E.
2. SUBJECT PROPERTY LIES IN ZONE "X", AN AREA OUTSIDE OF THE 500-YEAR FLOOD PLAIN PER FLOOD INSURANCE RATE MAP COMMUNITY PANEL NO. 120070 0175 B. LAST REVISION DATE JANUARY 6, 1988. FLOOD ZONE LINES, IF ANY, ARE SCALED FROM FLOOD INSURANCE RATE MAPS, PROVIDED BY FEMA.
3. ONLY THOSE VISIBLE INTERIOR IMPROVEMENTS AND IMPROVEMENTS PERTINENT TO THE SUBJECT PROPERTY HAVE BEEN LOCATED AS SHOWN HEREON. EXCEPTION IS MADE HEREON TO UNDERGROUND FACILITIES AND OTHER IMPROVEMENTS NOT VISIBLE OR KNOWN AT DATE OF SURVEY.
4. THIS SURVEY WAS PREPARED WITHOUT THE BENEFIT OF AN ABSTRACT OR TITLE POLICY. THEREFORE, EXCEPTION IS MADE HEREIN REGARDING EASEMENTS, RESERVATIONS AND RESTRICTIONS OF RECORD NOT PROVIDED BY THE CLIENT.
5. CLOSURE EXCEEDS 1 : 10,000.
6. SCALE AND GRAPHIC LOCATION OF FENCES AND UTILITY POLES, IF ANY, MAY BE EXAGGERATED FOR CLARITY.

THIS INSTRUMENT PREPARED BY
& RETURN TO:
Columbia County Bank
Linda Evans
173 NW Hillsboro Street
Lake City, FL 32055
REC: $

Inst:2005022347 Date:09/13/2005 Time:12:28
DC,P.DeWitt Cason,Columbia County B:1058 P:287

## NOTICE OF COMMENCEMENT

THE UNDERSIGNED hereby gives notice that improvement will be made to certain real property, and in accordance with Chapter 713, Florida Statutes, the following information is provided in this Notice of Commencement:

1. Description of Property: Lot #24 Suzanne Subdivision

2. General Description of Improvements: Approx. 1,500 square foot single family residence

3. Owner Information: Aaron Simque Homes, Inc.
P.O. Box 2183
Lake City, FL 32056

Owner's Interest in Property: Fee Simple

4. Contractor: Aaron Simque Homes, Inc.
P.O.Box 2183
Lake City, FL 32056

5. Lender: Columbia County Bank
173 NW Hillsboro Street
Lake City, FL 32055

6. Additional persons within the State of Florida designated by Owner upon whom notices or other documents may be served as provided by Section 713.13(1)(a)7., Florida Statutes:

7. Expiration date of Notice of Commencement is one (1) year from the date of recording.

Aaron Simque Homes, Inc.

Aaron Simque, President

STATE OF FLORIDA}
COUNTY OF Columbia}

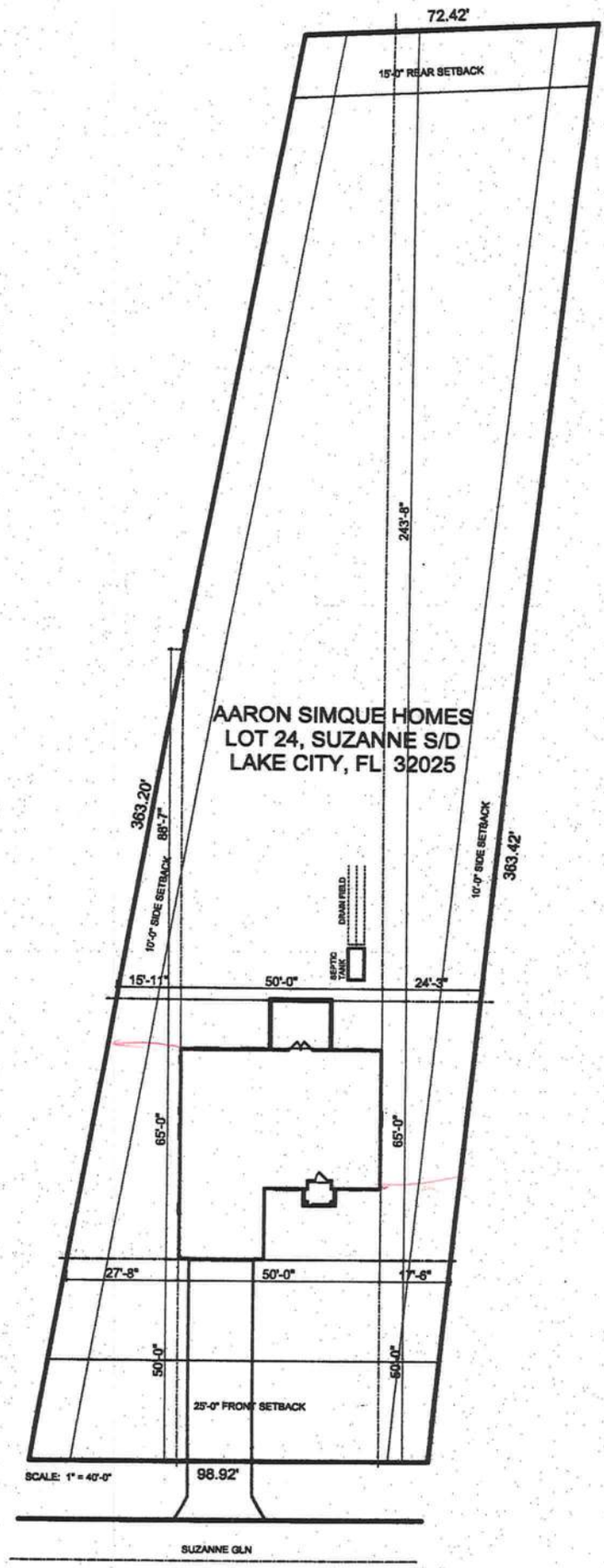
The foregoing instrument was acknowledged before me this 13 day of ~~August~~ September, 2005 by Aaron Simque as President of Aaron Simque Homes, Inc.

F. VONDILE DOW
MY COMMISSION # DD 154929
EXPIRES: October 3, 2006
Bonded Thru Notary Public Underwriters

NOTARY PUBLIC

Name:
State of Florida at Large (SEAL)
Personally Known: ✓
Produced Identification:
Type:
My Commission Expires:

(NOC)


72.42'
15'-0" REAR SETBACK
243'-8"
AARON SIMQUE HOMES
LOT 24, SUZANNE S/D
LAKE CITY, FL 32025
363.20'
88'-7"
10'-0" SIDE SETBACK
DRAIN FIELD
SEPTIC TANK
10'-0" SIDE SETBACK
363.42'
15'-11"
50'-0"
24'-3"
65'-0"
65'-0"
27'-8"
50'-0"
17'-6"
50'-0"
50'-0"
25'-0" FRONT SETBACK
SCALE: 1" = 40'-0"
98.92'
SUZANNE GLN

Inst:2005022386 Date:09/13/2005 Time:16:17
Doc Stamp-Deed : 420.00
DC,P.DeWitt Cason,Columbia County B:1058 P:432

# Corporate Warranty Deed

**This Indenture,** made, September 12, 2005 A.D.
**Between**
Venture Capital Elite, Inc. whose post office address is: 3731 NW 60th Street, Parkland, Fl. 33067 a corporation existing under the laws of the State of Florida, Grantor

and Aaron Sinque Homes, Inc. whose post office address is: Post Office Box 2183, Lake City, Fl. 32056, Grantee,

**Witnesseth,** that the said Grantor, for and in consideration of the sum of Ten and No/100 Dollars ($10.00 ), to it in hand paid by the said Grantee, the receipt whereof is hereby acknowledged, has granted, bargained and sold to the said Grantee forever, the following described land, situate, lying and being in the County of Columbia, State of Florida, to wit:

**See Exhibit "A" Attached Hereto And By This Reference Made A Part Hereof**

Subject to taxes for the current year, covenants, restrictions and easements of record, if any.

Parcel Identification Number: R07570-024

**And** the said Grantor does hereby fully warrant the title to said land, and will defend the same against the lawful claims of all persons whomsoever.

**In Witness Whereof,** the said Grantor has caused this instrument to be executed in its name by its duly authorized officer and caused its corporate seal to be affixed the day and year first above written.

Venture Capital Elite, Inc.

*Signed and Sealed in Our Presence:*

By: _____
William Wilson
Its: President

Witness Print Name: MARLON EDWARDS

(Corporate Seal)

Witness Print Name: Anthony Malcolm

State of FLORIDA
County of BROWARD

The foregoing instrument was acknowledged before me this 9th day of September, 2005, by William Wilson, the President of Venture Capital Elite, Inc. A corporation existing under the laws of the State of Florida, on behalf of the corporation.
He/She is personally known to me or has produced _____ as identification.

_____ (Seal)
Notary Public
Notary Printed Name: Shelleon King

My Commission Expires: 1/11/2009

Notary Public State of Florida
Shelleon King
My Commission DD385327
Expires 01/11/2009

Prepared by:
Lyndi Skinner/Elaine R. Davis, an employee of
American Title Services of Lake City, Inc.,
330 SW Main Boulevard
Lake City, Florida 32025
File Number: 05-643

COLUMBIA COUNTY, FLORIDA CLERK CIRCUIT COURT

STATE OF FLORIDA, COUNTY OF COLUMBIA
I HEREBY CERTIFY, that the above and foregoing is a true copy of the original filed in this office
P. DeWITT CASON, CLERK OF COURTS
By _____ Deputy Clerk
Date 9/29/05

Closer's Choice Florida Corporate Deed/Letter

EXHIBIT "A"

Parcel 1:

LOT 24 IN SUZANNE SUBDIVISION UNIT 1, AS RECORDED IN PLAT BOOK 4, PAGE 91, COLUMBIA COUNTY, FLORIDA.

AND

Parcel 2:

TOWNSHIP 4 SOUTH-RANGE 17 EAST

SECTION 3: Begin at the Northwest Corner of Lot 24 of Suzanne Subdivision Unit 1, as recorded in Plat Book 4, Page 91, Columbia County, Florida and run thence S 40°43'02" W, 97.36 feet to the West boundary line of the Northeast 1/4 of said Section 3; thence run S 00°45'40" E, 300.00 feet more or less to the North right of way line of Golde Circle; thence S 82°40'35" E, along said right of way line 175.66 feet; N 14°55'55" W, 435.03 feet to the Point of Beginning.

AND

Parcel 3:

TOWNSHIP 4 SOUTH-RANDE 17 EAST

SECTION 3: Being at the Northwest Corner of Lot 24 of Suzanne Subdivision Unit 1, as recorded in Plat Book 4, Page 91, Columbia County, Florida and run thence S 14°55'55" E, 435.03 feet to the North right of way of Golde Circle; thence N 36°00'52" E, along said right of way line 106.20 feet; thence continue along said right of way N 43°50'19" E, 55.70 feet to the Westerly boundary line of said Lot 24: thence N 35°51'51" W, along said Westerly line 364.60 feet to the Point of Beginning.

Inst:2005022386 Date:09/13/2005 Time:16:17
Doc Stamp-Deed : 420.00
_____DC,P.DeWitt Cason,Columbia County B:1058 P:433

FORM 600A-2001

# FLORIDA ENERGY EFFICIENCY CODE FOR BUILDING CONSTRUCTION

Florida Department of Community Affairs

Residential Whole Building Performance Method A

| | | | |
|---|---|---|---|
| Project Name: | **Aaron Simque Homes - Lot 24 Spec** | Builder: | **Aaron Simque Homes** |
| Address: | **Lot: , Sub: Suzanne, Plat:** | Permitting Office: | |
| City, State: | **Lake City, FL 32025-** | Permit Number: | 2392/ |
| Owner: | **Spec House** | Jurisdiction Number: | 221008 |
| Climate Zone: | **North** | | |

| | | |
|---|---|---|
| 1. New construction or existing | New | — |
| 2. Single family or multi-family | Single family | — |
| 3. Number of units, if multi-family | 1 | — |
| 4. Number of Bedrooms | 3 | — |
| 5. Is this a worst case? | No | — |
| 6. Conditioned floor area (ft²) | 1545 ft² | |
| 7. Glass area & type | | — |
| a. Clear - single pane | 0.0 ft² | — |
| b. Clear - double pane | 192.0 ft² | — |
| c. Tint/other SHGC - single pane | 0.0 ft² | — |
| d. Tint/other SHGC - double pane | 0.0 ft² | |
| 8. Floor types | | — |
| a. Slab-On-Grade Edge Insulation | R=0.0, 171.0(p) ft | — |
| b. N/A | | — |
| c. N/A | | |
| 9. Wall types | | — |
| a. Frame, Wood, Exterior | R=13.0, 1135.0 ft² | — |
| b. Frame, Wood, Adjacent | R=13.0, 196.0 ft² | — |
| c. N/A | | — |
| d. N/A | | — |
| e. N/A | | |
| 10. Ceiling types | | — |
| a. Under Attic | R=30.0, 1889.0 ft² | — |
| b. N/A | | — |
| c. N/A | | |
| 11. Ducts | | — |
| a. Sup: Unc. Ret: Unc. AH: Garage | Sup. R=6.0, 40.0 ft | — |
| b. N/A | | |

| | | |
|---|---|---|
| 12. Cooling systems | | |
| a. Central Unit | Cap: 31.0 kBtu/hr | — |
| | SEER: 11.00 | — |
| b. N/A | | — |
| | | — |
| c. N/A | | — |
| | | — |
| 13. Heating systems | | |
| a. Electric Heat Pump | Cap: 31.0 kBtu/hr | — |
| | HSPF: 6.80 | — |
| b. N/A | | — |
| | | — |
| c. N/A | | — |
| | | — |
| 14. Hot water systems | | |
| a. Electric Resistance | Cap: 40.0 gallons | — |
| | EF: 0.90 | — |
| b. N/A | | — |
| | | — |
| c. Conservation credits (HR-Heat recovery, Solar DHP-Dedicated heat pump) | | — |
| 15. HVAC credits (CF-Ceiling fan, CV-Cross ventilation, HF-Whole house fan, PT-Programmable Thermostat, MZ-C-Multizone cooling, MZ-H-Multizone heating) | | — |

Glass/Floor Area: 0.12

Total as-built points: 23792

Total base points: 24693

**PASS**

I hereby certify that the plans and specifications covered by this calculation are in compliance with the Florida Energy Code.

**PREPARED BY:** Will Myers

**DATE:** 08/06/05

I hereby certify that this building, as designed, is in compliance with the Florida Energy Code.

**OWNER/AGENT:** _____

**DATE:** _____

Review of the plans and specifications covered by this calculation indicates compliance with the Florida Energy Code. Before construction is completed this building will be inspected for compliance with Section 553.908 Florida Statutes.

GREAT SEAL OF THE STATE OF FLORIDA — IN GOD WE TRUST

**BUILDING OFFICIAL:** _____

**DATE:** _____

FORM 600A-2001

# SUMMER CALCULATIONS

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

| BASE | | | | AS-BUILT | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| **GLASS TYPES** .18 X Conditioned Floor Area | X BSPM | = Points | | Type/SC | Overhang Ornt | Len | Hgt | Area X | SPM X | SOF | = Points |
| .18 | 1545.0 | 20.04 | 5573.1 | Double, Clear | W | 1.5 | 6.0 | 75.0 | 36.99 | 0.91 | 2533.6 |
| | | | | Double, Clear | W | 13.8 | 7.7 | 40.0 | 36.99 | 0.42 | 619.0 |
| | | | | Double, Clear | N | 1.5 | 2.0 | 4.0 | 19.22 | 0.76 | 58.2 |
| | | | | Double, Clear | E | 1.5 | 6.0 | 15.0 | 40.22 | 0.91 | 550.7 |
| | | | | Double, Clear | E | 1.5 | 8.0 | 30.0 | 40.22 | 0.96 | 1155.5 |
| | | | | Double, Clear | S | 1.5 | 2.0 | 4.0 | 34.50 | 0.57 | 78.0 |
| | | | | Double, Clear | S | 1.5 | 6.0 | 20.0 | 34.50 | 0.86 | 590.7 |
| | | | | Double, Clear | S | 1.5 | 2.0 | 4.0 | 34.50 | 0.57 | 78.0 |
| | | | | **As-Built Total:** | | | | **192.0** | | | **5663.8** |

| **WALL TYPES** | Area X | BSPM = | Points | Type | R-Value | Area X | SPM = | Points |
|---|---|---|---|---|---|---|---|---|
| Adjacent | 196.0 | 0.70 | 137.2 | Frame, Wood, Exterior | 13.0 | 1135.0 | 1.50 | 1702.5 |
| Exterior | 1135.0 | 1.70 | 1929.5 | Frame, Wood, Adjacent | 13.0 | 196.0 | 0.60 | 117.6 |
| **Base Total:** | **1331.0** | | **2066.7** | **As-Built Total:** | | **1331.0** | | **1820.1** |

| **DOOR TYPES** | Area X | BSPM = | Points | Type | Area X | SPM = | Points |
|---|---|---|---|---|---|---|---|
| Adjacent | 18.0 | 2.40 | 43.2 | Exterior Insulated | 20.0 | 4.10 | 82.0 |
| Exterior | 20.0 | 6.10 | 122.0 | Adjacent Insulated | 18.0 | 1.60 | 28.8 |
| **Base Total:** | **38.0** | | **165.2** | **As-Built Total:** | **38.0** | | **110.8** |

| **CEILING TYPES** | Area X | BSPM = | Points | Type | R-Value | Area X | SPM X SCM = | Points |
|---|---|---|---|---|---|---|---|---|
| Under Attic | 1545.0 | 1.73 | 2672.9 | Under Attic | 30.0 | 1889.0 | 1.73 X 1.00 | 3268.0 |
| **Base Total:** | **1545.0** | | **2672.9** | **As-Built Total:** | | **1889.0** | | **3268.0** |

| **FLOOR TYPES** | Area X | BSPM = | Points | Type | R-Value | Area X | SPM = | Points |
|---|---|---|---|---|---|---|---|---|
| Slab | 171.0(p) | -37.0 | -6327.0 | Slab-On-Grade Edge Insulation | 0.0 | 171.0(p | -41.20 | -7045.2 |
| Raised | 0.0 | 0.00 | 0.0 | | | | | |
| **Base Total:** | | | **-6327.0** | **As-Built Total:** | | **171.0** | | **-7045.2** |

| **INFILTRATION** | Area X | BSPM = | Points | Area X | SPM = | Points |
|---|---|---|---|---|---|---|
| | 1545.0 | 10.21 | 15774.5 | 1545.0 | 10.21 | 15774.5 |

FORM 600A-2001

# SUMMER CALCULATIONS

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

| BASE | | | | AS-BUILT | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| **Summer Base Points:** | | | **19925.3** | **Summer As-Built Points:** | | | | | | | **19591.9** |
| Total Summer Points | X System Multiplier | = Cooling Points | | Total Component | X Cap Ratio | X Duct Multiplier (DM x DSM x AHU) | X System Multiplier | X Credit Multiplier | = Cooling Points | | |
| **19925.3** | **0.4266** | **8500.1** | | 19591.9<br>**19591.9** | 1.000<br>**1.00** | (1.090 x 1.147 x 1.00)<br>**1.250** | 0.310<br>**0.310** | 1.000<br>**1.000** | 7599.9<br>**7599.9** | | |

FORM 600A-2001

# WINTER CALCULATIONS

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

| BASE | | | | AS-BUILT | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|
| **GLASS TYPES** .18 X Conditioned Floor Area | X BWPM | = Points | | Type/SC | Overhang Ornt | Len | Hgt | Area X | WPM X | WOF | = Points |
| .18 | 1545.0 | 12.74 | 3543.0 | Double, Clear | W | 1.5 | 6.0 | 75.0 | 10.77 | 1.02 | 826.4 |
| | | | | Double, Clear | W | 13.8 | 7.7 | 40.0 | 10.77 | 1.22 | 524.6 |
| | | | | Double, Clear | N | 1.5 | 2.0 | 4.0 | 14.30 | 1.01 | 58.1 |
| | | | | Double, Clear | E | 1.5 | 6.0 | 15.0 | 9.09 | 1.04 | 141.2 |
| | | | | Double, Clear | E | 1.5 | 8.0 | 30.0 | 9.09 | 1.02 | 278.1 |
| | | | | Double, Clear | S | 1.5 | 2.0 | 4.0 | 4.03 | 2.27 | 36.5 |
| | | | | Double, Clear | S | 1.5 | 6.0 | 20.0 | 4.03 | 1.12 | 90.1 |
| | | | | Double, Clear | S | 1.5 | 2.0 | 4.0 | 4.03 | 2.27 | 36.5 |
| | | | | **As-Built Total:** | | | | **192.0** | | | **1991.5** |

| **WALL TYPES** | Area X | BWPM = | Points | Type | R-Value | Area X | WPM = | Points |
|---|---|---|---|---|---|---|---|---|
| Adjacent | 196.0 | 3.60 | 705.6 | Frame, Wood, Exterior | 13.0 | 1135.0 | 3.40 | 3859.0 |
| Exterior | 1135.0 | 3.70 | 4199.5 | Frame, Wood, Adjacent | 13.0 | 196.0 | 3.30 | 646.8 |
| **Base Total:** | **1331.0** | | **4905.1** | **As-Built Total:** | | **1331.0** | | **4505.8** |

| **DOOR TYPES** | Area X | BWPM = | Points | Type | Area X | WPM = | Points |
|---|---|---|---|---|---|---|---|
| Adjacent | 18.0 | 11.50 | 207.0 | Exterior Insulated | 20.0 | 8.40 | 168.0 |
| Exterior | 20.0 | 12.30 | 246.0 | Adjacent Insulated | 18.0 | 8.00 | 144.0 |
| **Base Total:** | **38.0** | | **453.0** | **As-Built Total:** | **38.0** | | **312.0** |

| **CEILING TYPES** | Area X | BWPM = | Points | Type | R-Value | Area X | WPM X WCM = | Points |
|---|---|---|---|---|---|---|---|---|
| Under Attic | 1545.0 | 2.05 | 3167.3 | Under Attic | 30.0 | 1889.0 | 2.05 X 1.00 | 3872.4 |
| **Base Total:** | **1545.0** | | **3167.3** | **As-Built Total:** | | **1889.0** | | **3872.4** |

| **FLOOR TYPES** | Area X | BWPM = | Points | Type | R-Value | Area X | WPM = | Points |
|---|---|---|---|---|---|---|---|---|
| Slab | 171.0(p) | 8.9 | 1521.9 | Slab-On-Grade Edge Insulation | 0.0 | 171.0(p | 18.80 | 3214.8 |
| Raised | 0.0 | 0.00 | 0.0 | | | | | |
| **Base Total:** | | | **1521.9** | **As-Built Total:** | | **171.0** | | **3214.8** |

| **INFILTRATION** | Area X | BWPM = | Points | Area X | WPM = | Points |
|---|---|---|---|---|---|---|
| | 1545.0 | -0.59 | -911.5 | 1545.0 | -0.59 | -911.5 |

FORM 600A-2001

# WINTER CALCULATIONS

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

| BASE | | | AS-BUILT | | | | | | |
|---|---|---|---|---|---|---|---|---|---|
| **Winter Base Points:** | | **12678.7** | **Winter As-Built Points:** | | | | | | **12985.0** |
| Total Winter Points | X System Multiplier | = Heating Points | Total Component | X Cap Ratio | X Duct Multiplier (DM x DSM x AHU) | X System Multiplier | X Credit Multiplier | = Heating Points | |
| **12678.7** | **0.6274** | **7954.6** | 12985.0<br>**12985.0** | 1.000<br>**1.00** | (1.069 x 1.169 x 1.00)<br>**1.250** | 0.501<br>**0.501** | 1.000<br>**1.000** | 8137.3<br>**8137.3** | |

FORM 600A-2001

# WATER HEATING & CODE COMPLIANCE STATUS

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

| BASE | | | | | AS-BUILT | | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| **WATER HEATING** | | | | | | | | | | | | |
| Number of Bedrooms | X | Multiplier | = | Total | Tank Volume | EF | Number of Bedrooms | X | Tank Ratio | X Multiplier | X Credit Multiplier | = Total |
| 3 | | 2746.00 | | 8238.0 | 40.0 | 0.90 | 3 | | 1.00 | 2684.98 | 1.00 | 8054.9 |
| | | | | | **As-Built Total:** | | | | | | | **8054.9** |

## CODE COMPLIANCE STATUS

| BASE | | | | | | | AS-BUILT | | | | | | |
|---|---|---|---|---|---|---|---|---|---|---|---|---|---|
| Cooling Points | + | Heating Points | + | Hot Water Points | = | Total Points | Cooling Points | + | Heating Points | + | Hot Water Points | = | Total Points |
| **8500** | | **7955** | | **8238** | | **24693** | **7600** | | **8137** | | **8055** | | **23792** |

# PASS

FORM 600A-2001

# Code Compliance Checklist

## Residential Whole Building Performance Method A - Details

ADDRESS: **Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-** PERMIT #:

### 6A-21 INFILTRATION REDUCTION COMPLIANCE CHECKLIST

| COMPONENTS | SECTION | REQUIREMENTS FOR EACH PRACTICE | CHECK |
|---|---|---|---|
| Exterior Windows & Doors | 606.1.ABC.1.1 | Maximum:.3 cfm/sq.ft. window area; .5 cfm/sq.ft. door area. | |
| Exterior & Adjacent Walls | 606.1.ABC.1.2.1 | Caulk, gasket, weatherstrip or seal between: windows/doors & frames, surrounding wall; foundation & wall sole or sill plate; joints between exterior wall panels at corners; utility penetrations; between wall panels & top/bottom plates; between walls and floor. EXCEPTION: Frame walls where a continuous infiltration barrier is installed that extends from, and is sealed to, the foundation to the top plate. | |
| Floors | 606.1.ABC.1.2.2 | Penetrations/openings >1/8" sealed unless backed by truss or joint members. EXCEPTION: Frame floors where a continuous infiltration barrier is installed that is sealed to the perimeter, penetrations and seams. | |
| Ceilings | 606.1.ABC.1.2.3 | Between walls & ceilings; penetrations of ceiling plane of top floor; around shafts, chases, soffits, chimneys, cabinets sealed to continuous air barrier; gaps in gyp board & top plate; attic access. EXCEPTION: Frame ceilings where a continuous infiltration barrier is installed that is sealed at the perimeter, at penetrations and seams. | |
| Recessed Lighting Fixtures | 606.1.ABC.1.2.4 | Type IC rated with no penetrations, sealed; or Type IC or non-IC rated, installed inside a sealed box with 1/2" clearance & 3" from insulation; or Type IC rated with < 2.0 cfm from conditioned space, tested. | |
| Multi-story Houses | 606.1.ABC.1.2.5 | Air barrier on perimeter of floor cavity between floors. | |
| Additional Infiltration reqts | 606.1.ABC.1.3 | Exhaust fans vented to outdoors, dampers; combustion space heaters comply with NFPA, have combustion air. | |

### 6A-22 OTHER PRESCRIPTIVE MEASURES (must be met or exceeded by all residences.)

| COMPONENTS | SECTION | REQUIREMENTS | CHECK |
|---|---|---|---|
| Water Heaters | 612.1 | Comply with efficiency requirements in Table 6-12. Switch or clearly marked circuit breaker (electric) or cutoff (gas) must be provided. External or built-in heat trap required. | |
| Swimming Pools & Spas | 612.1 | Spas & heated pools must have covers (except solar heated). Non-commercial pools must have a pump timer. Gas spa & pool heaters must have a minimum thermal efficiency of 78%. | |
| Shower heads | 612.1 | Water flow must be restricted to no more than 2.5 gallons per minute at 80 PSIG. | |
| Air Distribution Systems | 610.1 | All ducts, fittings, mechanical equipment and plenum chambers shall be mechanically attached, sealed, insulated, and installed in accordance with the criteria of Section 610. Ducts in unconditioned attics: R-6 min. insulation. | |
| HVAC Controls | 607.1 | Separate readily accessible manual or automatic thermostat for each system. | |
| Insulation | 604.1, 602.1 | Ceilings-Min. R-19. Common walls-Frame R-11 or CBS R-3 both sides. Common ceiling & floors R-11. | |

# ENERGY PERFORMANCE LEVEL (EPL) DISPLAY CARD

**ESTIMATED ENERGY PERFORMANCE SCORE* = 83.4**

**The higher the score, the more efficient the home.**

Spec House, Lot: , Sub: Suzanne, Plat: , Lake City, FL, 32025-

| | | |
|---|---|---|
| 1. New construction or existing | New | |
| 2. Single family or multi-family | Single family | |
| 3. Number of units, if multi-family | 1 | |
| 4. Number of Bedrooms | 3 | |
| 5. Is this a worst case? | No | |
| 6. Conditioned floor area (ft²) | 1545 ft² | |
| 7. Glass area & type | | |
| a. Clear - single pane | 0.0 ft² | |
| b. Clear - double pane | 192.0 ft² | |
| c. Tint/other SHGC - single pane | 0.0 ft² | |
| d. Tint/other SHGC - double pane | 0.0 ft² | |
| 8. Floor types | | |
| a. Slab-On-Grade Edge Insulation | R=0.0, 171.0(p) ft | |
| b. N/A | | |
| c. N/A | | |
| 9. Wall types | | |
| a. Frame, Wood, Exterior | R=13.0, 1135.0 ft² | |
| b. Frame, Wood, Adjacent | R=13.0, 196.0 ft² | |
| c. N/A | | |
| d. N/A | | |
| e. N/A | | |
| 10. Ceiling types | | |
| a. Under Attic | R=30.0, 1889.0 ft² | |
| b. N/A | | |
| c. N/A | | |
| 11. Ducts | | |
| a. Sup: Unc. Ret: Unc. AH: Garage | Sup. R=6.0, 40.0 ft | |
| b. N/A | | |
| 12. Cooling systems | | |
| a. Central Unit | Cap: 31.0 kBtu/hr | |
| | SEER: 11.00 | |
| b. N/A | | |
| c. N/A | | |
| 13. Heating systems | | |
| a. Electric Heat Pump | Cap: 31.0 kBtu/hr | |
| | HSPF: 6.80 | |
| b. N/A | | |
| c. N/A | | |
| 14. Hot water systems | | |
| a. Electric Resistance | Cap: 40.0 gallons | |
| | EF: 0.90 | |
| b. N/A | | |
| c. Conservation credits (HR-Heat recovery, Solar DHP-Dedicated heat pump) | | |
| 15. HVAC credits (CF-Ceiling fan, CV-Cross ventilation, HF-Whole house fan, PT-Programmable Thermostat, MZ-C-Multizone cooling, MZ-H-Multizone heating) | | |

I certify that this home has complied with the Florida Energy Efficiency Code For Building Construction through the above energy saving features which will be installed (or exceeded) in this home before final inspection. Otherwise, a new EPL Display Card will be completed based on installed Code compliant features.

Builder Signature: _____ Date: _____

Address of New Home: _____ City/FL Zip: _____

**NOTE: The home's estimated energy performance score is only available through the FLA/RES computer program. This is not a Building Energy Rating. If your score is 80 or greater (or 86 for a US EPA/DOE EnergyStar™ designation), your home may qualify for energy efficiency mortgage (EEM) incentives if you obtain a Florida Energy Gauge Rating. Contact the Energy Gauge Hotline at 321/638-1492 or see the Energy Gauge web site at www.fsec.ucf.edu for information and a list of certified Raters. For information about Florida's Energy Efficiency Code For Building Construction, contact the Department of Community Affairs at 850/488-1824.*

EnergyGauge® (Version: FLR1PB v3.22)

# HALL'S PUMP & WELL SERVICE, INC.

SPECIALIZING IN 4"-6" WELLS

DONALD AND MARY HALL
OWNERS

PHONE (386) 752-1884
FAX (386) 758-7022
904 NW MAIN BLVD.
LAKE CITY, FLORIDA 32055

July 12, 2005

NOTICE TO BUILDING DEPT

For _____

Please be advised that due to the new building codes we will use a large capacity diaphragm tank on all new wells. This will insure a minimum of one (1) minute draw down or one (1) minute refill. If a smaller diaphragm tank is used then we will install a cycle stop valve which will produce the same results. All wells will have a submersible pump and diaphragm tank combination that will be sufficient for each situation.

If you have any questions please feel free to call our office anytime.

Thank you,

Donald D. Hall
DDH/rb

**Mark Disosway, P.E.**
POB 868, Lake City, FL 32056, Ph (386) 754-5419, Fax (386) 269-4871

December 2, 2005

Building Department

Re: Permit #0511-13 , Simque Aaron, Spec House, Lot 24, SE Carob Gln. Suzanne S/D Lake City, Florida 32025,

Dear Building Official:

Please accept this letter as addendum to the plans for the above referenced house to change all references to FBC 2001 to FBC 2004.

- The plan was drawn prior to the effective date for FBC 2004, 01 October 2005.
- Since the wind load requirements of FBC 2004 remain basically unchanged from FBC 2001 there are no structural changes required to this plan.

Mark Disosway, PE
Florida Registered Professional Engineer

Cc Simque Aaron

Mark Disosway
2 Dec 05

Aaron Simque Homes lot 24 Suzanne S/D

# 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 | |
|---|---|---|
| ☑ | ☐ | 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. |
| ☑ | ☐ | Designers name and signature on document (FBC 104.2.1). If licensed architect or engineer, official seal shall be affixed. |
| ☑ | ☐ | **Site Plan including:**<br>a) Dimensions of lot<br>b) Dimensions of building set backs<br>c) Location of all other buildings on lot, well and septic tank if applicable, and all utility easements.<br>d) Provide a full legal description of property. |
| ☑ | ☐ | **Wind-load Engineering Summary, calculations and any details required**<br>a) Plans or specifications must state compliance with FBC Section 1606<br>b) The following information must be shown as per section 1606.1.7 FBC<br>a. Basic wind speed (MPH)<br>b. Wind importance factor (I) and building category<br>c. Wind exposure – if more than one wind exposure is used, the wind exposure and applicable wind direction shall be indicated<br>d. The applicable internal pressure coefficient<br>e. Components and Cladding. The design wind pressure in terms of psf (kN/m²), to be used for the design of exterior component and cladding materials not specifally designed by the registered design professional |
| ☑ | ☐ | **Elevations including:** |
| ☑ | ☐ | 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 |
| ☑ | ☐ | e) Number of stories |

**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 (accesssable 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 (termiticide 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)

☑ ☐ 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 (termiticide 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)

☐ ☐ 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**

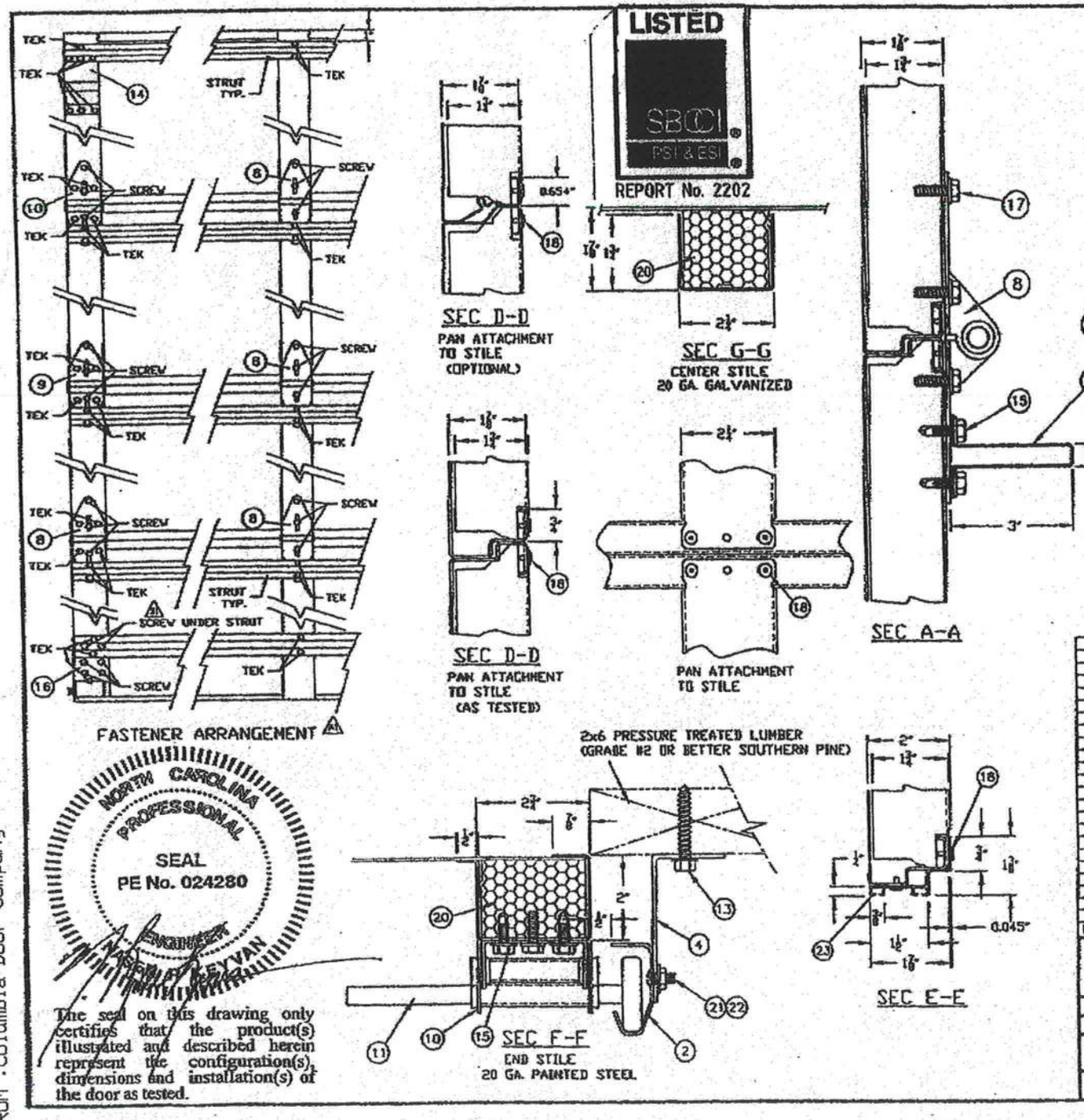
a) Size of pump motor

b) Size of pressure tank

c) Cycle stop valve if used

| REV. | DATE | BY | DESCRIPTION |
|---|---|---|---|
| A | 11-27-00 | DW | SEE ECN 834 |
| B | 12-1-00 | DW | SEE ECN 836 |

LISTED
SBCCI PSI & ESI
REPORT No. 2202




| ITEM | PART NO. | DESCRIPTION |
|---|---|---|
| 23 | 3495 | BOTTOM RAIL 6063 T6 ALUM EXT. |
| 22 | 1391 | 1/4"-20 X 5/8" RIBBED NECK SCREW |
| 21 | 4044 | 1/4"-20 SERRATED FLANGE NUT |
| 20 | | LLB DENSITY FILLER BLOCK EPS |
| 19 | | |
| 18 | 4385 | POP RIVET, 5/32" STEEL |
| 17 | 4229 | HEX WASHERHEAD SCREW 1/4"-20 X 3/4" |
| 16 | 1399ALR | BOTTOM ROLLER BRACKET |
| 15 | 0138 | HWH TEK SCREW 1/4-20 X 3/4 W/ REDUCED PT. |
| 14 | 3875 | TOP SUPPORT BRACKET |
| 13 | 4043 | 5/16" X 1-5/8" LAG SCREW |
| 12 | 4710 | SIDE LOCK |
| 11 | 4306 | LONG STEM ROLLER 2" |
| 10 | 4203 | ROLLER CARRIER HINGE #3 (14 GA) |
| 9 | 4202 | ROLLER CARRIER HINGE #2 (14 GA) |
| 8 | 4201 | ROLLER CARRIER HINGE #1 (14 GA) |
| 7 | | COUNTER BALANCE (TORSION BAR & SPRINGS) |
| 6 | | HORIZONTAL TRACK & ANGLE (16 GA) |
| 5 | | VERTICAL FLAG ANGLE |
| 4 | 4585-6 | TRACK BRACKET #6 (12 GA) |
| 3 | | |
| 2 | | VERTICAL TRACK (16 GA) |
| 1 | | 3" HEMMED STRUT(20 GA) MIN. YIELD STR. 80KSI |

GADCO
GENERAL AMERICAN DOOR COMPANY
5050 BASELINE ROAD
MONTGOMERY, IL 60538

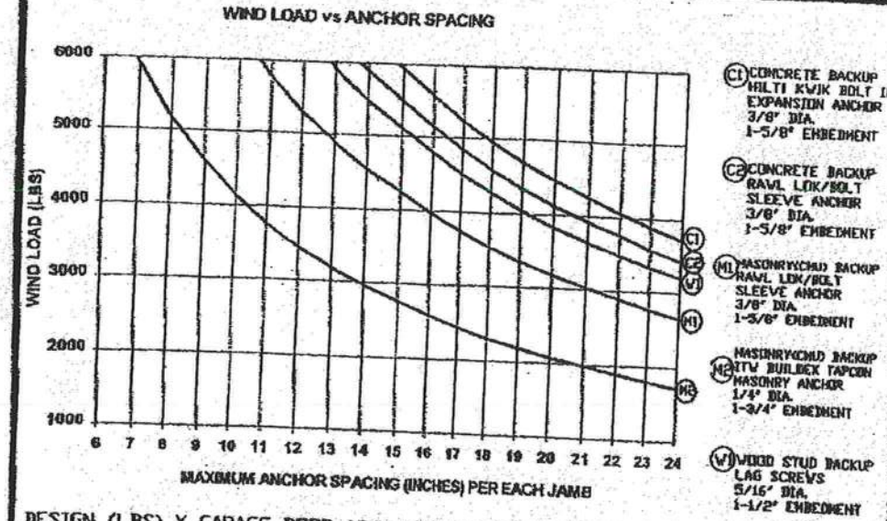
SCALE NONE | APPROVED BY | DRAWN BY D. VICHIAN
DATE 11-7-00 | REVISED (B) 12-1-00

DESCRIPTION
16' X 7' MAX. RAISED PANEL STEEL DOOR-WINDLOAD ±20 PSF

PAGE 2 OF 2 | DRAWING NUMBER W13228-2

NORTH CAROLINA PROFESSIONAL SEAL PE No. 024280 ENGINEER NICHOLAS KEYVAN

The seal on this drawing only certifies that the product(s) illustrated and described herein represent the configuration(s), dimensions and installation(s) of the door as tested.




C1 CONCRETE BACKUP HILTI KWIK BOLT II EXPANSION ANCHOR 3/8" DIA. 1-5/8" EMBEDMENT

C2 CONCRETE BACKUP RAWL LOK/BOLT SLEEVE ANCHOR 3/8" DIA. 1-5/8" EMBEDMENT

M1 MASONRY(CMU) BACKUP RAWL LOK/BOLT SLEEVE ANCHOR 3/8" DIA. 1-3/8" EMBEDMENT

M2 MASONRY(CMU) BACKUP ITW BUILDEX TAPCON MASONRY ANCHOR 1/4" DIA. 1-3/4" EMBEDMENT

W1 WOOD STUD BACKUP LAG SCREWS 5/16" DIA. 1-1/2" EMBEDMENT

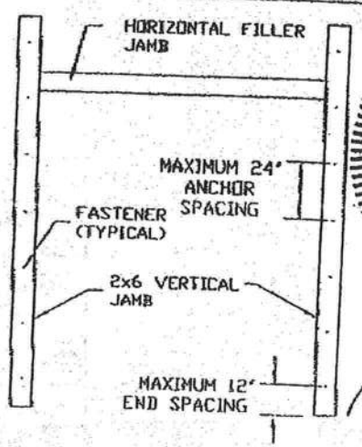
DESIGN LOAD $\frac{(LBS)}{FT^2}$ X GARAGE DOOR AREA(WIDTH-FT X HEIGHT-FT) = WIND LOAD(LBS)

**EXAMPLE**

$\frac{30\ LBS}{FT^2}$ X (16 FT WIDE X 8 FT HIGH) = 3840 LBS

C1 USE 22" SPACING
C2 USE 21" SPACING
W1 USE 19" SPACING
M1 USE 16" SPACING
M2 USE 10" SPACING

SEE NOTE 11 FOR ADDITIONAL REQUIRED 2X6 WOOD JAMB ANCHORS




NORTH CAROLINA PROFESSIONAL SEAL PE No. 024280 ENGINEER NASER R KEYVAN

NASER R KEYVAN LICENSE NO. 53774 STATE OF FLORIDA PROFESSIONAL ENGINEER

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 SBCCI "STANDARD FOR HURRICANE RESISTANT RESIDENTIAL CONSTRUCTION SSTD 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 (#2 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 2150 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, ADD AN ADDITIONAL 2X6 WOOD JAMB ANCHOR NEAR THAT STEEL BRACKET TO INSURE THAT THE LOAD FROM THE STEEL BRACKET IS EQUALLY TRANSFERRED TO TWO WOOD JAMB ANCHORS.

GADCO®
GENERAL AMERICAN DOOR COMPANY
5050 BASELINE ROAD
MONTGOMERY, IL 60538

| | | |
|---|---|---|
| SCALE NONE | APPROVED BY: | DRAWN BY DV |
| DATE 8-30-99 | | REVISED |
| DESCRIPTION JAMB TO STRUCTURE ATTACHMENT FOR WIND LOADED GARAGE DOORS | | |
| | MASTER DRAWING NUMBER A10560 | DRAWING NUMBER |

**Premdor Entry Systems**

**ACCEPTANCE No.:** 01-0314.18

**APPROVED** : JUN 05 2001

**EXPIRES** : April 02, 2006

## NOTICE OF ACCEPTANCE: STANDARD CONDITIONS

1. Renewal of this Acceptance (approval) shall be considered after a renewal application has been filed and the original submitted documentation, including test supporting data, engineering documents, are no older than eight (8) years.

2. Any and all approved products shall be permanently labeled with the manufacturer's name, city, state, and the following statement: "Miami-Dade County Product Control Approved", or as specifically stated in the specific conditions of this Acceptance.

3. Renewals of Acceptance will not be considered if:
   a. There has been a change in the South Florida Building Code affecting the evaluation of this product and the product is not in compliance with the code changes.
   b. The product is no longer the same product (identical) as the one originally approved.
   c. If the Acceptance holder has not complied with all the requirements of this acceptance, including the correct installation of the product.
   d. The engineer who originally prepared, signed and sealed the required documentation initially submitted, is no longer practicing the engineering profession.

4. Any revision or change in the materials, use, and/or manufacture of the product or process shall automatically be cause for termination of this Acceptance, unless prior written approval has been requested (through the filing of a revision application with appropriate fee) and granted by this office.

5. Any of the following shall also be grounds for removal of this Acceptance:
   a. Unsatisfactory performance of this product or process.
   b. Misuse of this Acceptance as an endorsement of any product, for sales, advertising or any other purposes.

6. The Notice of Acceptance 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 Notice of Acceptance is displayed, then it shall be done in its entirety.

7. A copy of this Acceptance as well as approved drawings and other documents, where it applies, shall be provided to the user by the manufacturer or its distributors and shall be available for inspection at the job site at all time. The engineer needs not reseal the copies.

8. Failure to comply with any section of this Acceptance shall be cause for termination and removal of Acceptance.

9. This Notice of Acceptance consists of pages 1, 2 and this last page 3.

**END OF THIS ACCEPTANCE**

Manuel Perez, P.E., Product Control Examiner
Product Control Division

Premdor Entry Systems

ACCEPTANCE No.: 01-0314.18

APPROVED : JUN 05 2001

EXPIRES : April 02, 2006

## NOTICE OF ACCEPTANCE: SPECIFIC CONDITIONS

1. **SCOPE**

1.1 This renews the Notice of Acceptance No. 00-0321.20 which was issued on April 28, 2000. It approves a residential insulated door, as described in Section 2 of this Notice of Acceptance, designed to comply with the South Florida Building Code (SFBC), 1994 Edition for Miami-Dade County, for the locations where the pressure requirements, as determined by SFBC Chapter 23, do not exceed the Design Pressure Rating values indicated in the approved drawings.

2. **PRODUCT DESCRIPTION**

2.1 The Series Entergy 6-8 S-W/E Inswing Opaque Single Residential Insulated Steel Door with Sidelites- Impact Resistant Door Slab Only and its components shall be constructed in strict compliance with the following documents: Drawing No 31-1020-EW-1, Sheets 1 through 6 of 6, titled "Premdor (Entergy Brand) Wood Edge Single Door in Wood Frames with a Bumper Threshold (Inswing)," prepared by manufacturer, dated 7/29/97 with revision C dated 01/15/01, bearing the Miami-Dade County Product Control approval stamp with the Notice of Acceptance number and approval date by the Miami-Dade County Product Control Division. These documents shall hereinafter be referred to as the approved drawings.

3. **LIMITATIONS**

3.1 This approval applies to single unit applications of single door only, as shown in approved drawings.

3.2 Unit shall be installed only at locations protected by a canopy or overhang such that the angle between the edge of canopy or overhang to sill is less than 45 degrees. Unless unit is installed in non-habitable areas where the unit and the area are designed to accept water infiltration.

4. **INSTALLATION**

4.1 The residential insulated steel door and its components shall be installed in strict compliance with the approved drawings.

4.2 Hurricane protection system (shutters):

4.2.1 Door: the installation of this unit will not require a hurricane protection system.

4.2.2 Sidelite: the installation of this unit will require a hurricane protection system.

5. **LABELING**

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

6. **BUILDING PERMIT REQUIREMENTS**

6.1 Application for building permit shall be accompanied by copies of the following:

6.1.1 This Notice of Acceptance

6.1.2 Duplicate copies of the approved drawings, as identified in Section 2 of this Notice of Acceptance, clearly marked to show the components selected for the proposed installation.

6.1.3 Any other documents required by the Building Official or the South Florida Building Code (SFBC) in order to properly evaluate the installation of this system.

Manuel Perez

Manuel Perez, P.E. Product Control Examiner
Product Control Division

I

**AAMA/NWWDA 101/I.S.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<br>-47.2 psf |
| Operating Force | 11 lb max. |
| Air Infiltration | 0.13 cfm/ft² |
| Water Resistance | 6.00 psf |
| Structural Test Pressure | +67.5 psf<br>-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:mb

Allen R. Reeves
1 APRIL 2002

ALLEN R. REEVES
CERTIFICATE
NO. 18254
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

II

Architectural Testing

# AAMA/NWWDA 101/I.S.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/NWWDA 101/I.S.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 vinyl spacer system. The active sash was channel glazed utilizing a flexible vinyl wraparound 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.architest.com

Allen R. Reeves
1 APRIL 2002

REEVES
No. 18384
STATE OF FLORIDA
PROFESSIONAL ENGINEER

III



**Test Specimen Description: (Continued)**

**Weatherstripping:**

| Description | Quantity | Location |
|---|---|---|
| 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:**

| Description | Quantity | Location |
|---|---|---|
| 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 ★ CERTIFICATE NO. 18554 ★ STATE OF FLORIDA PROFESSIONAL ENGINEER

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:

| Paragraph | Title of Test - Test Method | Results | Allowed |
|---|---|---|---|
| 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/NWWDA 101/I.S. 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) | 0.42"* | 0.26" max. |
| | @ 34.7 psf (negative) | 0.43"* | 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) | 0.02" | 0.18" max. |
| | @ 52.1 psf (negative) | 0.02" | 0.18" max. |

Allen H. Reeves
1 APRIL 2002

ALLEN H. REEVES
CERTIFICATE
NO. 18327
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

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" | 0.18" [illegible] |
| | @ 70.8 psf (negative) | 0.05" | 0.18" max. |

Allen N. Reeves
1 APRIL 2002

ALLEN N. REEVES
CERTIFICATE
No. 12554
STATE OF FLORIDA
PROFESSIONAL ENGINEER

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

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

MAH:nlb
01-41134.01

ALLEN N. REEVES
CERTIFICATE
NO. 17305
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

TAMKO
ROOFING PRODUCTS

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.

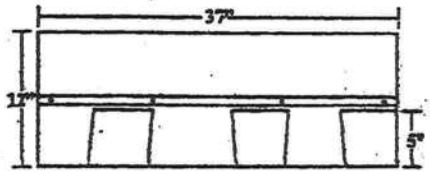
TAMKO Roofing Products, Inc.

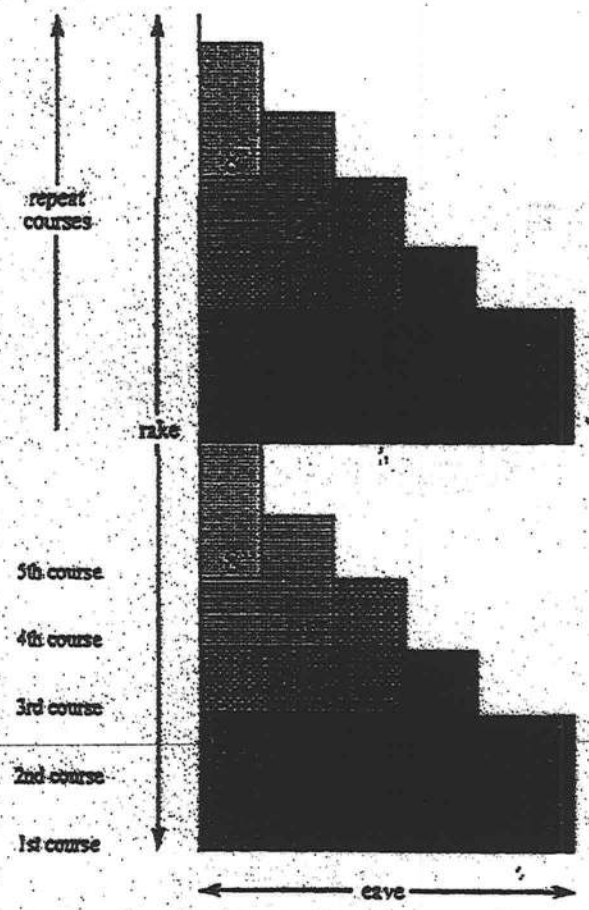
CORPORATE HEADQUARTERS
220 W. FOURTH STREET P.O. BOX 1404 JOPLIN, MO 64802-1404 800-641-4691 FAX 800-841-1925

TAMKO
ROOFING PRODUCTS

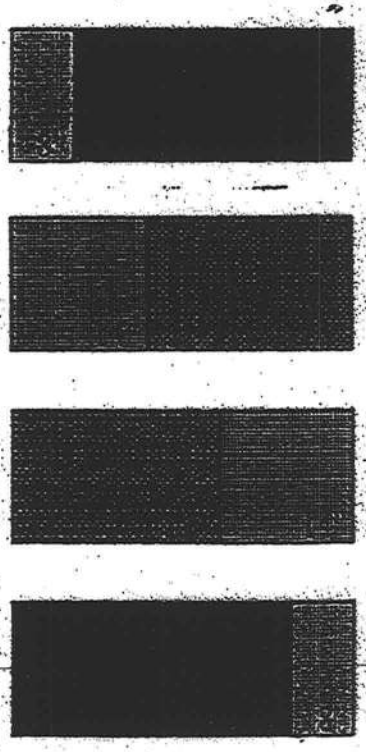
# Application Instructions For Heritage® 25 Series Shingles

| 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.

**TAMKO** ROOFING PRODUCTS

# 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. thickness 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.**

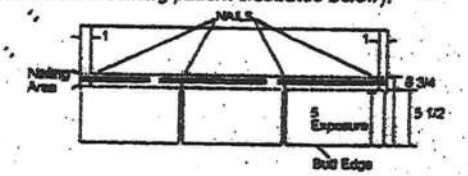
### 3. FASTENING

**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.

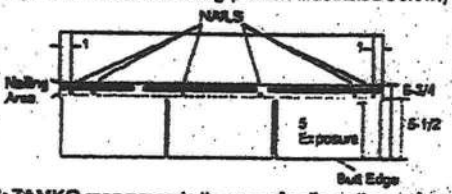
Correct placement of the fasteners is critical to the performance of the shingle. If the fasteners are not placed as shown in the diagram and described below, TAMKO will not be responsible for any shingles blown off or displaced. TAMKO will not be responsible for damage to shingles caused by winds or 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 6 fastener 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)

(CONTINUED from Pg. 2)



with quick setting asphalt adhesive cement immediately upon installation. Spots of cement must be equivalent in size to a $.25 piece and applied to shingles with a 5 in. exposure, use 5 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 refasten in a new location. Remove all drip edge metal and replace with new.

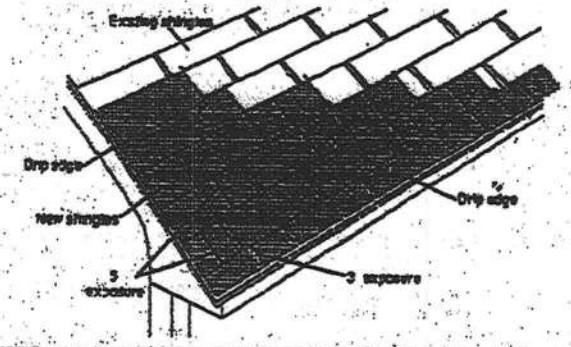
If re-roofing over an existing roof where new flashing is required to protect against ice dams (freeze/thaw cycle of water and/or the backup of water in frozen or clogged gutters), remove the old roofing to a point at least 24 in. beyond the interior wall line and apply TAMKO's Moisture Guard Plus® waterproofing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

The nesting 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 Succeeding 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 shingle 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. roll 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 to this product.

TAMKO assumes no responsibility for blistering.

(Continued)

(CONTINUED from Pg. 3)

**TAMKO®**
**ROOFING PRODUCTS**

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

## THREE-TAB ASPHALT SHINGLES

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

### 10. 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.

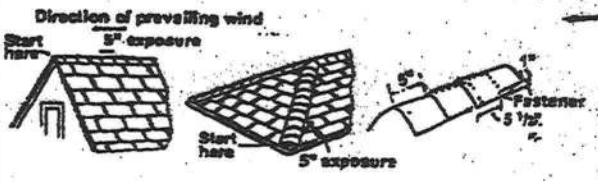
TAMKO recommends the use of TAMKO Hip & Ridge shingle products. Where matching colors are available, it is acceptable to use TAMKO's Glass-Seal or Elite Glass-Seal shingles cut down to 12 in. pieces.

*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 WHILE 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 | 800-641-4691 |
| Northeast District | 4500 Tamko Dr., Frederick, MD 21701 | 800-368-2055 |
| Southeast District | 2300 35th St., Tuscaloosa, AL 35401 | 800-228-2658 |
| Southwest District | 7910 S. Central Exp., Dallas, TX 75216 | 800-443-1834 |
| Western District | 5300 East 43rd Ave., Denver, CO 80216 | 800-530-8868 |

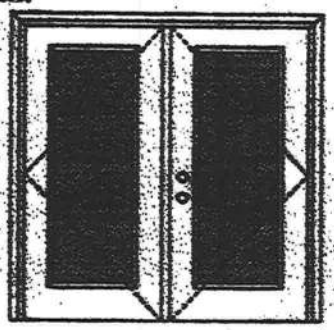

07/01

**XX**
Glazed Outswing Unit

[redacted]

# 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 - 6'0" x 6'8"

**Design Pressure**
+40.5/-40.5
Limited water outlet specific Simpson 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:**


**1/2 GLASS:**


*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 Entry Systems**

March 23, 2006
For updated product information, specifications, design and product data subject to change without notice.

**XX**
Glazed Outswing Unit

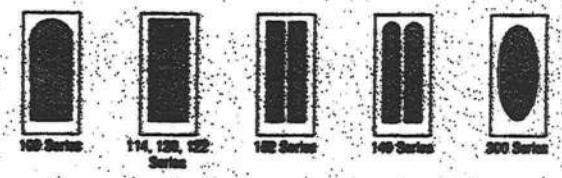
[redacted]

# WOOD-EDGE STEEL DOORS

**APPROVED DOOR STYLES:**

**3/4 GLASS:**


**FULL GLASS:**




**CERTIFIED TEST REPORTS:**

NCTL 210-1897-7, 8, 9, 10, 11, 12; NCTL 210-1864-5, 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 and rails constructed of 0.041" steel. Bottom and 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 tip 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).

Kurt L Balthazor

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

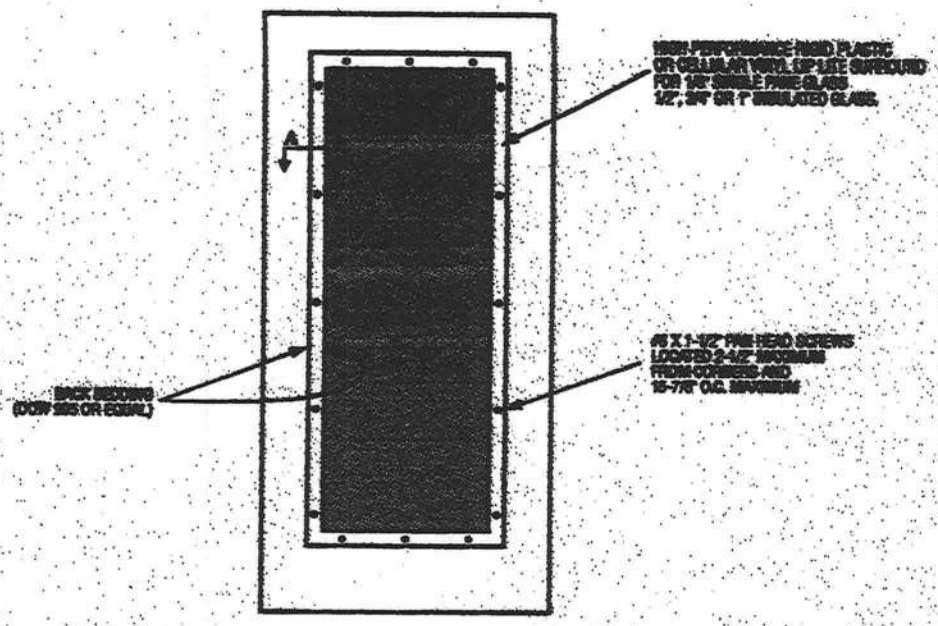
**Johnson**
Entry systems

March 29, 2002
Our continuing program of product improvement makes specifications, design and product data subject to change without notice.

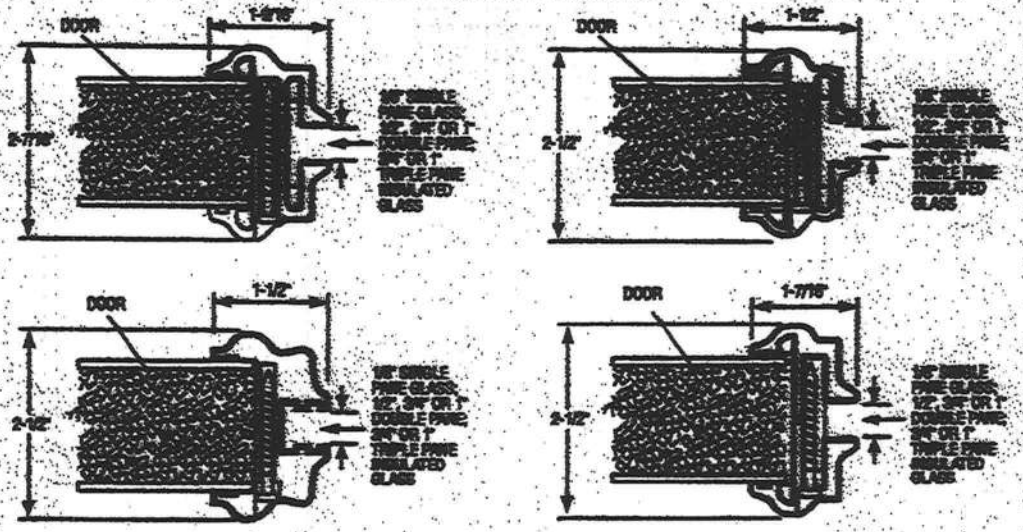
PRENDORE Premium Quality Doors

Exclusively from Masonite®
Masonite International Corporation

# GLASS INSERT IN DOOR OR SIDELITE PANEL




**SECTION A-A**
TYPICAL RIGID PLASTIC LIP LITE SURROUND




March 25, 2002

Masonite International Corporation

Florida Building Code Online

The Florida Department of Community Affairs
Building Code Information System

FLORIDA BUILDING CODE

Overview | User Registration | Organization Registration | User Authorization | Organization Search | Organization Accreditation

Select the organization type, status, or name to find an organization

Organization Type: Product Manufacturer

Manufact. Buildings

Approval Status: (ALL)

Organization Name: General American Door - Product Manufacturer

Cancel

Search

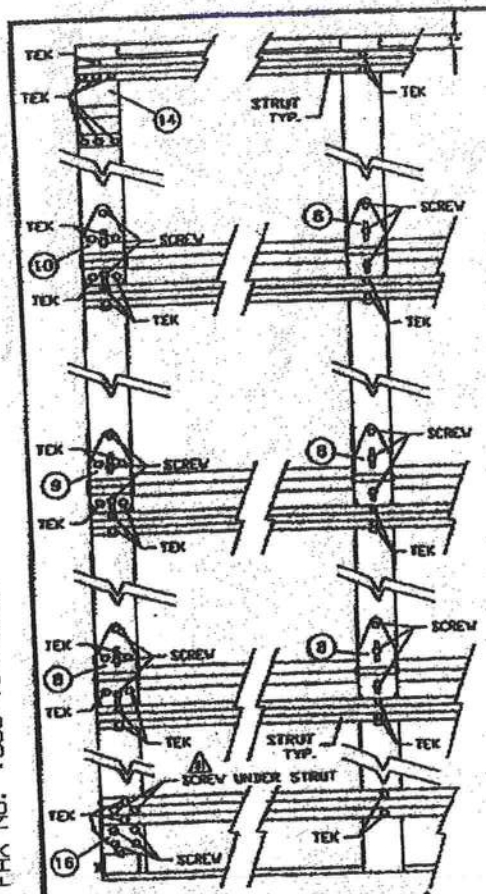
## Result List for Organizations

Displaying 1-1 of 1

| Name | City | Contact | Phone | Type | Expire | Status |
|---|---|---|---|---|---|---|
| General American Door | Montgomery | James Campbell | 6308593000 | Product Manufacturer | 01/01/2099 | Approved |
| Org Code: PDM System ID: 3585 | | | Site Link: www.gadco.com | | | |

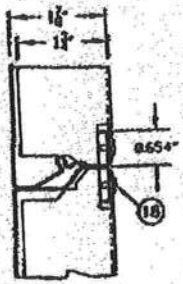
Displaying 1-1 of 1

| REV. | DATE | BY | DESCRIPTION |
|---|---|---|---|
| A | 11-27-00 | RW | SEE ECN 836 |
| B | 12-1-00 | LOW | SEE ECN 836 |

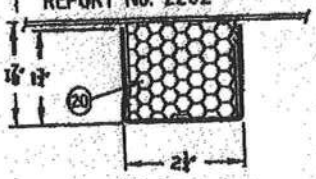



FASTENER ARRANGEMENT

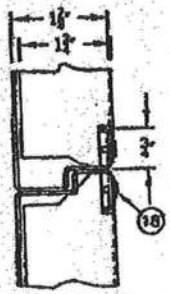
LISTED
SBCCI
PSI & ESI
REPORT No. 2202



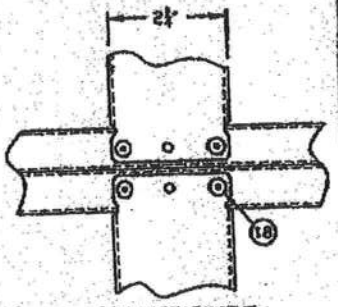

SEC D-D
PAN ATTACHMENT TO STILE (OPTIONAL)



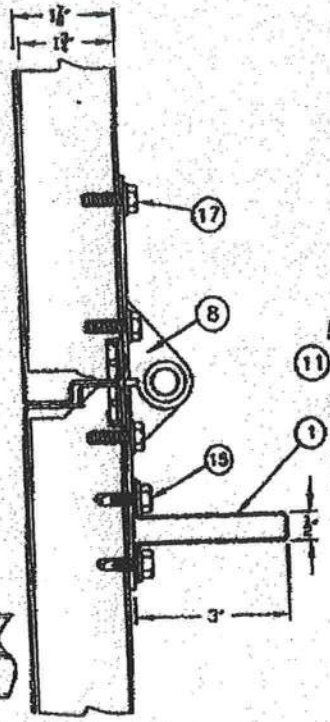
SEC G-G
CENTER STILE
20 GA. GALVANIZED



SEC D-D
PAN ATTACHMENT TO STILE (AS TESTED)

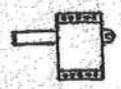


PAN ATTACHMENT TO STILE

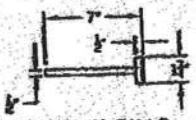


SEC A-A

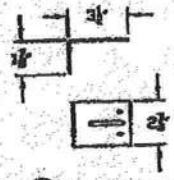
TRACK
16 GA. COSS MIN.



(12) SIDE LOCK

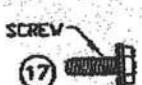


(11) ROLLER 10 BALLS.



(4) #6 JAMB BRACKET

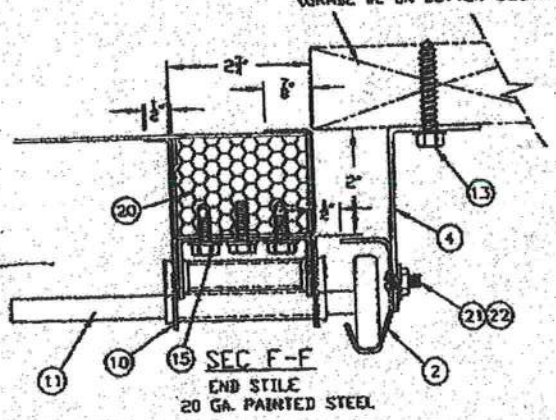
(1) 5-3"x20 GA. 80 KSI YIELD STRENGTH HEMMED STRUT APPLIED WITH 2 TEK SCREWS PER HINGE OR STILE LOCATION (4 PER STRUT, MINIMUM)



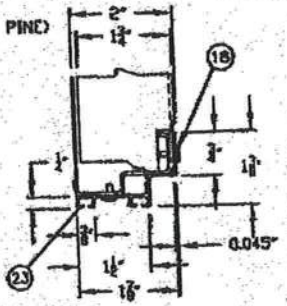

(17) 1-20 X 3/4" HEX WASHERHEAD SCREW


(15) 1-20 X 3/4" HVH TEK SCREW WITH #2 REDUCED POINT

2x6 PRESSURE TREATED LUMBER (GRADE #2 OR BETTER SOUTHERN PINE)



SEC F-F
END STILE
20 GA. PAINTED STEEL




SEC E-E

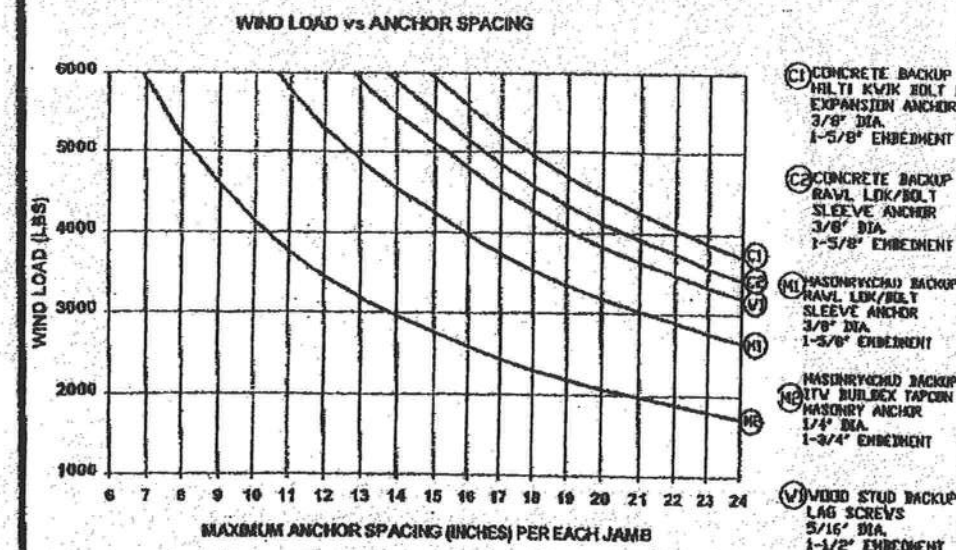
| ITEM | PART NO. | DESCRIPTION |
|---|---|---|
| 23 | 3485 | BOTTOM RAIL, 6063 T6 ALUM EXT. |
| 22 | 1391 | 1/4"-20 X 5/8" RIBBED NECK SCREW |
| 21 | 4844 | 1/4"-20 SERRATED FLANGE NUT |
| 20 | | LOW DENSITY FILLER BLOCK EPS |
| 19 | | |
| 18 | 4385 | POP RIVET, 3/32" STEEL |
| 17 | 4229 | HEX WASHERHEAD SCREW 1/4"-20 X 3/4" |
| 16 | 1399KLR | BOTTOM ROLLER BRACKET |
| 15 | 0138 | HVH TEK SCREW 1/4-20 X 3/4 W/ REDUCED PT. |
| 14 | 3075 | TOP SUPPORT BRACKET |
| 13 | 4048 | 5/16" X 1-5/8" LAG SCREW |
| 12 | 4718 | SIDE LOCK |
| 11 | 4306 | LONG STEM ROLLER 2" |
| 10 | 4203 | ROLLER CARRIER HINGE, #3 (14 GA) |
| 9 | 4202 | ROLLER CARRIER HINGE, #2 (14 GA) |
| 8 | 4201 | ROLLER CARRIER HINGE, #1 (14 GA) |
| 7 | | COUNTER BALANCE (TORSION BAR & SPRINGS) |
| 6 | | HORIZONTAL TRACK & ANGLE (16 GA) |
| 5 | | VERTICAL FLAG ANGLE |
| 4 | 4585-6 | TRACK BRACKET #6 (12 GA) |
| 3 | | |
| 2 | | VERTICAL TRACK (16 GA) |
| 1 | | 3" HEMMED STRUT (20 GA) MIN. YIELD STR. 80KSI |

GADCO®
GENERAL AMERICAN DOOR COMPANY
5050 BASELINE ROAD
MONTGOMERY, IL 60538

SCALE NONE
DATE 11-7-00
APPROVED BY:
DRAWN BY: B. VICKMAN
REVISED (B) 12-1-00
DESCRIPTION: 16' X 7' MAX. RAISED PANEL STEEL DOOR-WINDLOAD ±20 PSF
PAGE 2 OF 2
DRAWING NUMBER W13220-2

NORTH CAROLINA PROFESSIONAL SEAL PE No. 024280 ENGINEER

The seal on this drawing only certifies that the product(s) illustrated and described herein represent the configuration(s), dimensions and installation(s) of the door as tested.



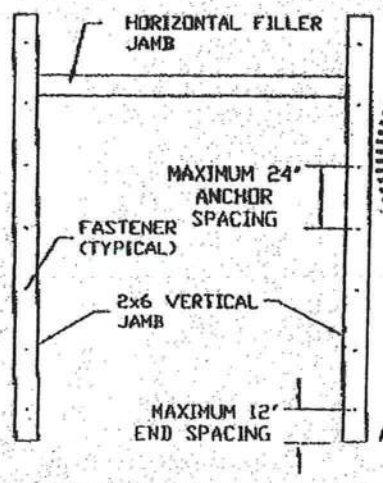

DESIGN LOAD $\frac{\text{(LBS)}}{\text{FT}^2}$ X GARAGE DOOR AREA(WIDTH-FT X HEIGHT-FT) = WIND LOAD(LBS)

**EXAMPLE**

$\frac{30 \text{ LBS}}{\text{FT}^2}$ X (16 FT WIDE X 8 FT HIGH) = 3840 LBS

- C1 USE 22" SPACING
- C2 USE 21" SPACING
- W1 USE 19" SPACING
- M1 USE 16" SPACING
- M2 USE 10" SPACING

SEE NOTE 11 FOR ADDITIONAL REQUIRED 2X6 WOOD JAMB ANCHORS




NORTH CAROLINA PROFESSIONAL SEAL PE No. 024280 ENGINEER NASER R KEYVAN

NASER R KEYVAN LICENSE NO. 53774 STATE OF FLORIDA PROFESSIONAL ENGINEER

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 SBCCI "STANDARD FOR HURRICANE RESISTANT RESIDENTIAL CONSTRUCTION" SSTD 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 (#2 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 2150 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, ADD AN ADDITIONAL 2X6 WOOD JAMB ANCHOR NEAR THAT STEEL BRACKET TO INSURE THAT THE LOAD FROM THE STEEL BRACKET IS EQUALLY TRANSFERRED TO TWO WOOD JAMB ANCHORS.

GADCO®
GENERAL AMERICAN DOOR COMPANY
5050 BASELINE ROAD
MONTGOMERY, IL 60538

| | | |
|---|---|---|
| SCALE NONE | APPROVED BY | DRAWN BY DV |
| DATE 8-30-99 | | REVISED |
| DESCRIPTION JAMB TO STRUCTURE ATTACHMENT FOR WIND LOADED GARAGE DOORS | | |
| | MASTER DRAWING NUMBER A10560 | DRAWING NUMBER |

MIAMI-DADE

DOOR DATA

MIAMI-DADE COUNTY, FLORIDA
METRO-DADE FLAGLER BUILDING

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

CONTRACTOR LICENSING SECTION
(305) 375-2527 FAX (305) 375-2558

CONTRACTOR ENFORCEMENT DIVISION
(305) 375-2966 FAX (305) 375-2908

PRODUCT CONTROL DIVISION
(305) 375-2902 FAX (305) 372-6339

# PRODUCT CONTROL NOTICE OF ACCEPTANCE

Premdor Entry Systems
911 E. Jeferson, P.O. Box 76
Pittsburgh ,KS 66762.

Your application for Notice of Acceptance (NOA) of:
**Entergy 6-8 S-W/E Inswing Opaque Double w/sidelites Residential Insulated Steel Door**
under Chapter 8 of the Code of Miami-Dade County governing the use of Alternate Materials and Types of Construction, and completely described herein, has been recommended for acceptance by the Miami-Dade County Building Code Compliance Office (BCCO) under the conditions specified herein.

This NOA shall not be valid after the expiration date stated below. BCCO reserves the right to secure this product or material at any time from a jobsite or manufacturer's plant for quality control testing. If this product or material fails to perform in the approved manner, BCCO may revoke, modify, or suspend the use of such product or material immediately. BCCO reserves the right to revoke this approval, if it is determined by BCCO that this product or material fails to meet the requirements of the South Florida Building Code.

The expense of such testing will be incurred by the manufacturer.

ACCEPTANCE NO.: 01-0314.24
EXPIRES: 04/02/2006

Raul Rodriguez
Chief Product Control Division

THIS IS THE COVERSHEET. SEE ADDITIONAL PAGES FOR SPECIFIC AND GENERAL CONDITIONS
BUILDING CODE & PRODUCT REVIEW COMMITTEE

This application for Product Approval has been reviewed by the BCCO and approved by the Building Code and Product Review Committee to be used in Miami-Dade County, Florida under the conditions set forth above.

Francisco J. Quintana, R.A.
Director
Miami-Dade County
Building Code Compliance Office

APPROVED: 06/05/2001

MIAMI-DADE COUNTY, FLORIDA
METRO-DADE FLAGLER BUILDING

BUILDING CODE COMPLIANCE OFFICE
METRO-DADE FLAGLER BUILDING
140 WEST FLAGLER STREET, SUITE 1603
MIAMI, FLORIDA 33130-1563
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The expense of such testing will be incurred by the manufacturer.

ACCEPTANCE NO.: 01-0314.18
EXPIRES: 04/02/2006

Raul Rodriguez
Chief Product Control Division

THIS IS THE COVERSHEET. SEE ADDITIONAL PAGES FOR SPECIFIC AND GENERAL CONDITIONS
BUILDING CODE & PRODUCT REVIEW COMMITTEE

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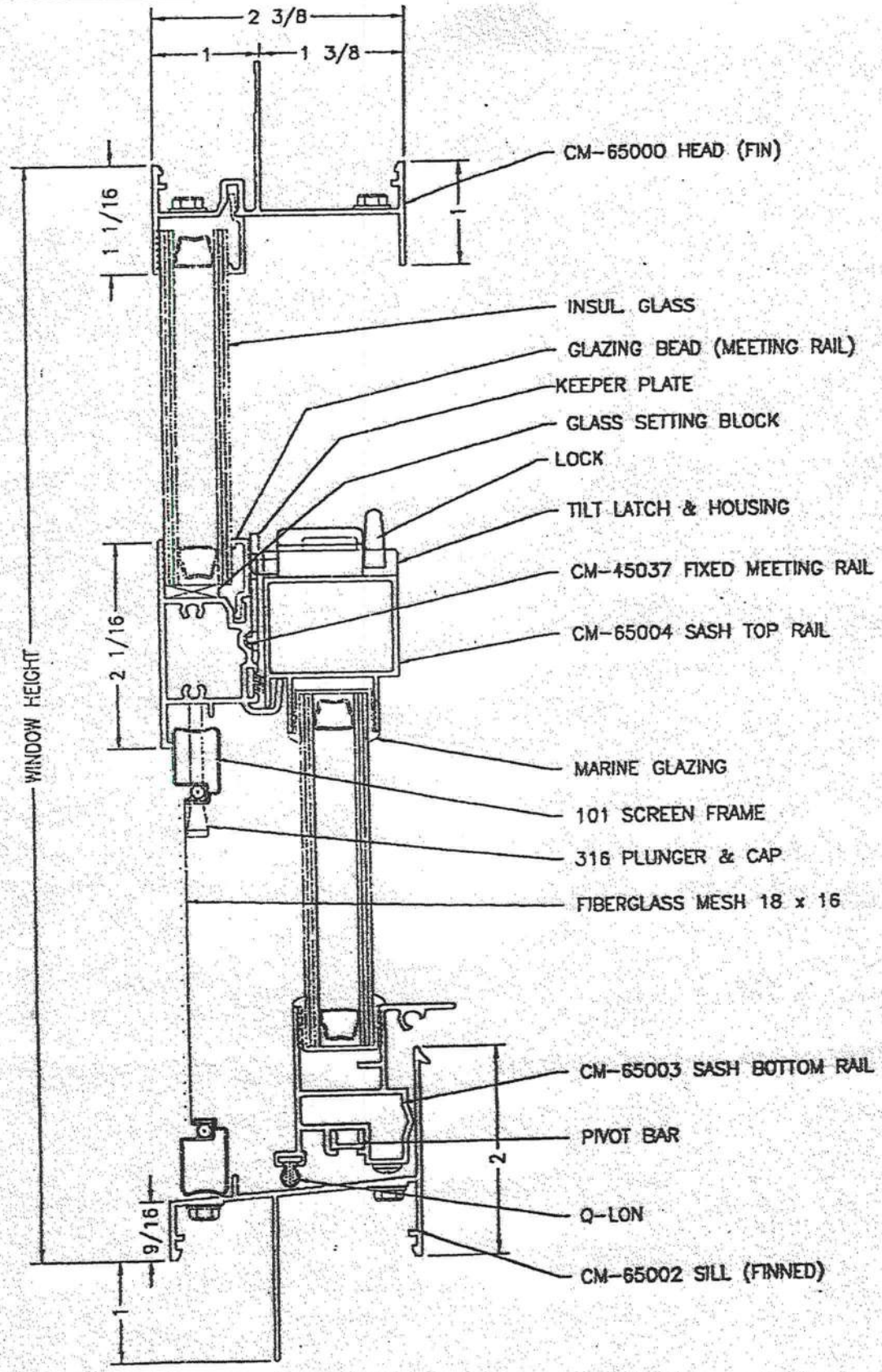
Francisco J. Quintana, R.A.
Director
Miami-Dade County
Building Code Compliance Office

APPROVED: 06/05/2001

650-AS1 A



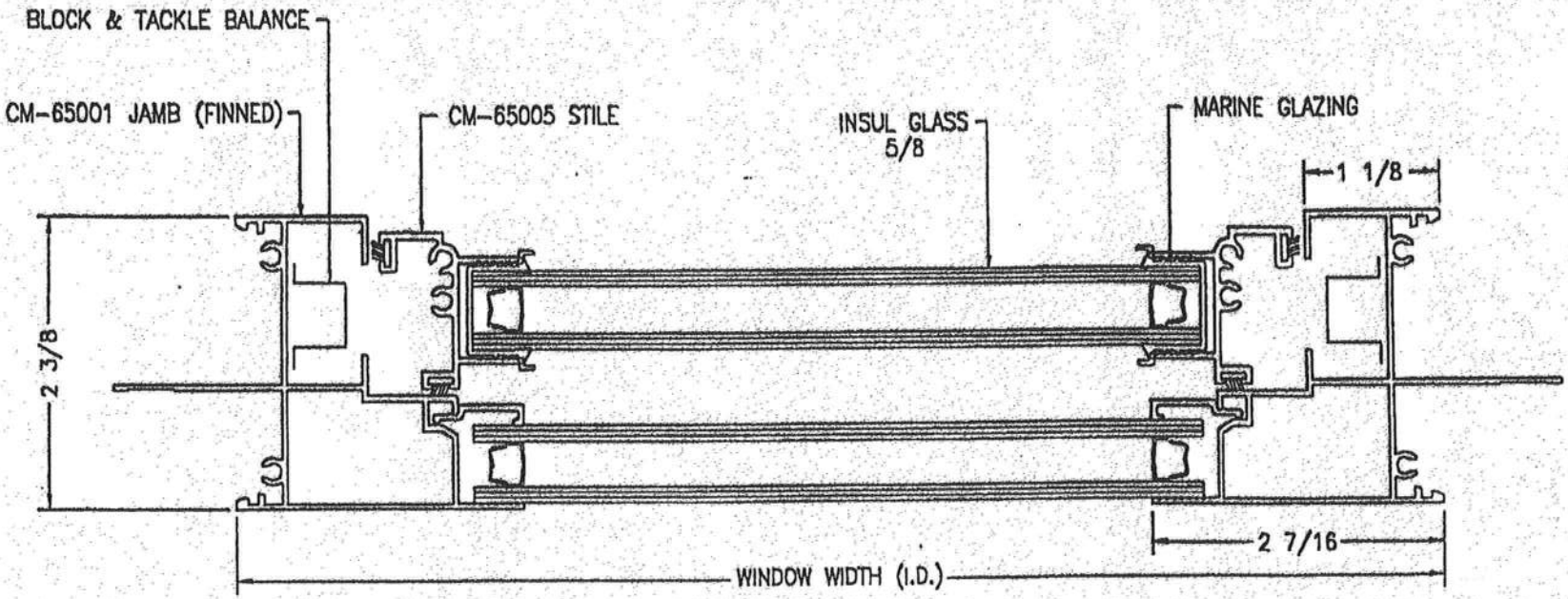

MI HOME PRODUCTS
650 WEST MARKET STREET • GRATZ, PA • 17030-0370

TITLE 650 SH FIN MAIN FRAME VERTICAL CROSS SECTION

| LTR | DESCRIPTION REVISIONS | BY | DATE |
|---|---|---|---|

| DRTN | DATE | SCALE | DWG. NO. | REV |
|---|---|---|---|---|
| Y.M.R. | 4-7-92 | FULL | 650-AS1 | A |

650-AS2 | B




| LTR. | DESCRIPTION REVISION | BY | DATE |
|---|---|---|---|
| | | | |

MI HOME PRODUCTS
650 WEST MARKET STREET • GRATZ, PA • 17030-0370

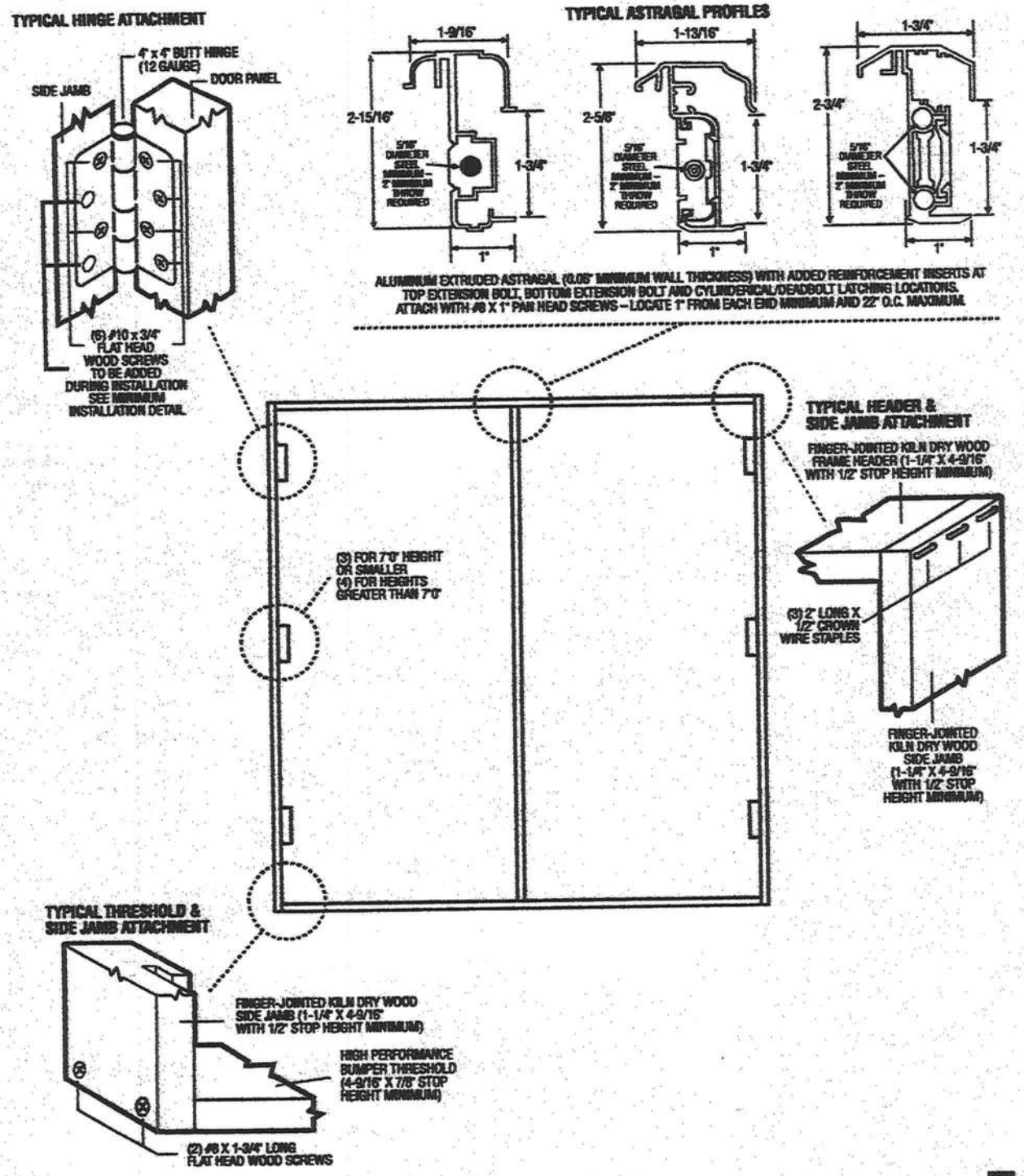
TITLE: 650 SH FIN MAIN FRAME INSULATED GLASS HORIZONTAL CROSS SECTION

| DRAWN | DATE | SCALE | DRAWING NO. | REV. |
|---|---|---|---|---|
| V.M.R. | 4-7-92 | FULL | 650-AS2 | B |

**XX**
Unit

MAD-WL-MA0012-02

# OUTSWING UNITS WITH DOUBLE DOOR




March 29, 2002
Our continuing program of product improvement makes specifications, design and product detail subject to change without notice.

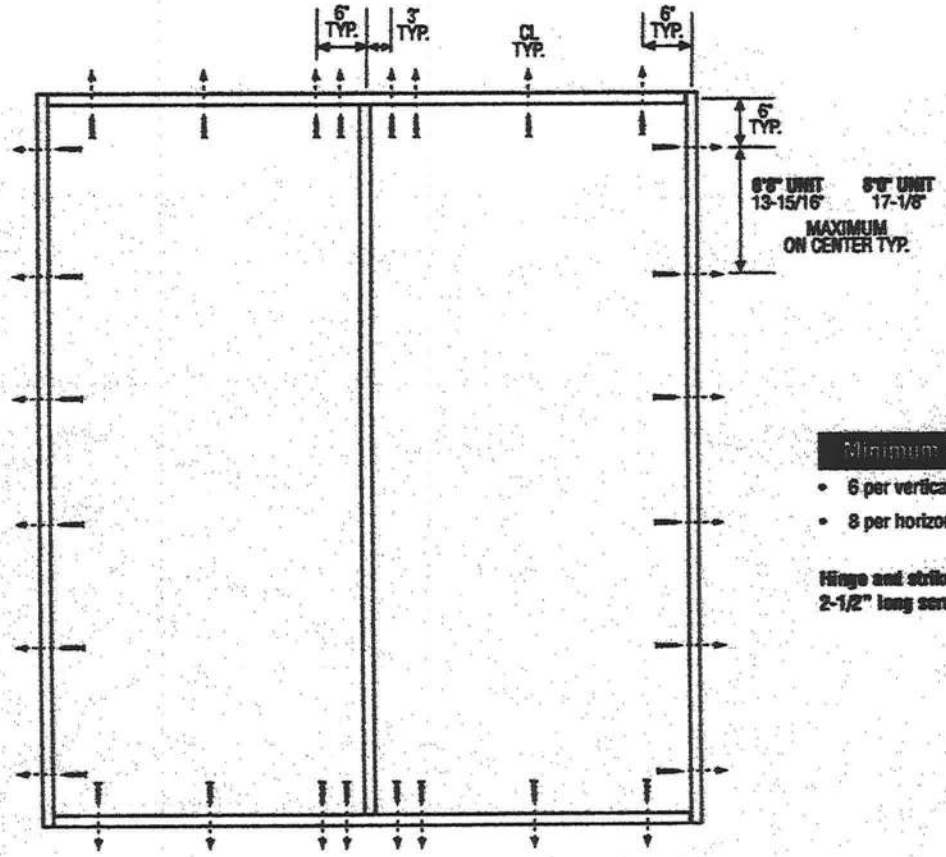
PREMDOR Collection Premium Quality Doors

Exclusively from Masonite®
Masonite International Corporation

**XX**
**Unit**

MID-WL-MA0002-02

# 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) cylinderical 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 #8 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 Country 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

# Residential System Sizing Calculation

## Summary

Spec House

Lake City, FL 32025-

Project Title:
Aaron Simque Homes - Lot 24 Spec

Class 3 Rating
Registration No. 0
Climate: North

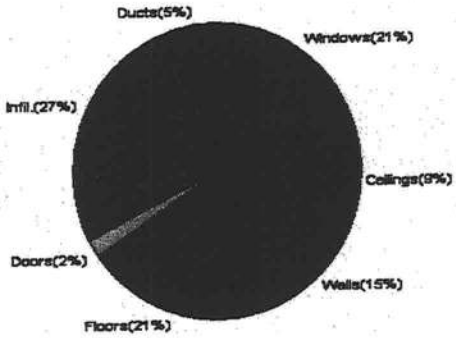
9/6/2005

| | | | |
|---|---|---|---|
| Location for weather data: Gainesville - User customized: Latitude(29) Temp Range(M) | | | |
| Humidity data: Interior RH (50%) Outdoor wet bulb (78F) Humidity difference(51gr.) | | | |
| Winter design temperature | 31 F | Summer design temperature | 99 F |
| Winter setpoint | 70 F | Summer setpoint | 75 F |
| Winter temperature difference | 39 F | Summer temperature difference | 24 F |
| **Total heating load calculation** | **25982 Btuh** | **Total cooling load calculation** | **31719 Btuh** |
| Submitted heating capacity | 31000 Btuh | Submitted cooling capacity | 31000 Btuh |
| Submitted as % of calculated | 119.3 % | Submitted as % of calculated | 97.7 % |

## WINTER CALCULATIONS

Winter Heating Load (for 1545 sqft)

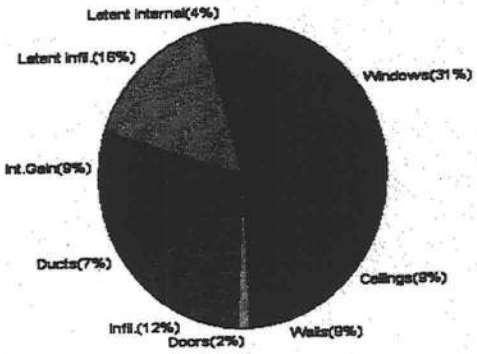
| Load component | | | Load | |
|---|---|---|---|---|
| Window total | 192 | sqft | 5434 | Btuh |
| Wall total | 1331 | sqft | 3832 | Btuh |
| Door total | 38 | sqft | 536 | Btuh |
| Ceiling total | 1889 | sqft | 2456 | Btuh |
| Floor total | 171 | ft | 5404 | Btuh |
| Infiltration | 165 | cfm | 7084 | Btuh |
| **Subtotal** | | | **24745** | **Btuh** |
| Duct loss | | | 1237 | Btuh |
| **TOTAL HEAT LOSS** | | | **25982** | **Btuh** |




## SUMMER CALCULATIONS

Summer Cooling Load (for 1545 sqft)

| Load component | | | Load | |
|---|---|---|---|---|
| Window total | 192 | sqft | 9917 | Btuh |
| Wall total | 1331 | sqft | 2818 | Btuh |
| Door total | 38 | sqft | 492 | Btuh |
| Ceiling total | 1889 | sqft | 2985 | Btuh |
| Floor total | | | 0 | Btuh |
| Infiltration | 144 | cfm | 3814 | Btuh |
| Internal gain | | | 3000 | Btuh |
| **Subtotal(sensible)** | | | **23026** | **Btuh** |
| Duct gain | | | 2303 | Btuh |
| **Total sensible gain** | | | **25328** | **Btuh** |
| Latent gain(infiltration) | | | 5011 | Btuh |
| Latent gain(internal) | | | 1380 | Btuh |
| **Total latent gain** | | | **6391** | **Btuh** |
| **TOTAL HEAT GAIN** | | | **31719** | **Btuh** |




EnergyGauge® System Sizing based on ACCA Manual J.

PREPARED BY: _____

DATE: _____

# System Sizing Calculations - Winter

## Residential Load - Component Details

Spec House

Lake City, FL 32025-

Project Title:
Aaron Simque Homes - Lot 24 Spec

Class 3 Rating
Registration No. 0
Climate: North

Reference City: Gainesville (User customized) Winter Temperature Difference: 39.0 F

9/6/2005

| Window | Panes/SHGC/Frame/U | Orientation | Area X | HTM= | Load |
|---|---|---|---|---|---|
| 1 | 2, Clear, Metal, DEF | W | 75.0 | 28.3 | 2122 Btuh |
| 2 | 2, Clear, Metal, DEF | W | 40.0 | 28.3 | 1132 Btuh |
| 3 | 2, Clear, Metal, DEF | N | 4.0 | 28.3 | 113 Btuh |
| 4 | 2, Clear, Metal, DEF | E | 15.0 | 28.3 | 424 Btuh |
| 5 | 2, Clear, Metal, DEF | E | 30.0 | 28.3 | 849 Btuh |
| 6 | 2, Clear, Metal, DEF | S | 4.0 | 28.3 | 113 Btuh |
| 7 | 2, Clear, Metal, DEF | S | 20.0 | 28.3 | 566 Btuh |
| 8 | 2, Clear, Metal, DEF | S | 4.0 | 28.3 | 113 Btuh |
| | Window Total | | 192 | | 5434 Btuh |
| **Walls** | Type | R-Value | Area X | HTM= | Load |
| 1 | Frame - Exterior | 13.0 | 1135 | 3.1 | 3518 Btuh |
| 2 | Frame - Adjacent | 13.0 | 196 | 1.6 | 314 Btuh |
| | Wall Total | | 1331 | | 3832 Btuh |
| **Doors** | Type | | Area X | HTM= | Load |
| 1 | Insulated - Exter | | 20 | 18.3 | 367 Btuh |
| 2 | Insulated - Adjac | | 18 | 9.4 | 169 Btuh |
| | Door Total | | 38 | | 536Btuh |
| **Ceilings** | Type | R-Value | Area X | HTM= | Load |
| 1 | Under Attic | 30.0 | 1889 | 1.3 | 2456 Btuh |
| | Ceiling Total | | 1889 | | 2456Btuh |
| **Floors** | Type | R-Value | Size X | HTM= | Load |
| 1 | Slab-On-Grade Edge Insul | 0 | 171.0 ft(p) | 31.6 | 5404 Btuh |
| | Floor Total | | 171 | | 5404 Btuh |
| **Infiltration** | Type | ACH X | Building Volume | CFM= | Load |
| | Natural | 0.80 | 12360(sqft) | 165 | 7084 Btuh |
| | Mechanical | | | 0 | 0 Btuh |
| | Infiltration Total | | | 165 | 7084 Btuh |

| | | |
|---|---|---|
| **Totals for Heating** | **Subtotal** | **24745 Btuh** |
| | **Duct Loss(using duct multiplier of 0.05)** | **1237 Btuh** |
| | **Total Btuh Loss** | **25982 Btuh** |

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 )

# System Sizing Calculations - Summer

## Residential Load - Component Details

Spec House

Lake City, FL 32025-

Project Title:
Aaron Simque Homes - Lot 24 Spec

Class 3 Rating
Registration No. 0
Climate: North

Reference City: Gainesville (User customized) Summer Temperature Difference: 24.0 F 9/6/2005

| Window | Type Panes/SHGC/U/InSh/ExSh | Ornt | Overhang Len | Overhang Hgt | Window Area(sqft) Gross | Shaded | Unshaded | HTM Shaded | HTM Unshaded | Load |
|---|---|---|---|---|---|---|---|---|---|---|
| 1 | 2, Clear, DEF, N, N | W | 1.5 | 6 | 75.0 | 15.6 | 59.4 | 25 | 74 | 4787 Btuh |
| 2 | 2, Clear, DEF, N, N | W | 13.8 | 7.66 | 40.0 | 40.0 | 0.0 | 25 | 74 | 1000 Btuh |
| 3 | 2, Clear, DEF, N, N | N | 1.5 | 2 | 4.0 | 0.0 | 4.0 | 25 | 25 | 100 Btuh |
| 4 | 2, Clear, DEF, N, N | E | 1.5 | 6 | 15.0 | 0.0 | 15.0 | 25 | 74 | 1110 Btuh |
| 5 | 2, Clear, DEF, N, N | E | 1.5 | 8 | 30.0 | 0.0 | 30.0 | 25 | 74 | 2220 Btuh |
| 6 | 2, Clear, DEF, N, N | S | 1.5 | 2 | 4.0 | 4.0 | 0.0 | 25 | 39 | 100 Btuh |
| 7 | 2, Clear, DEF, N, N | S | 1.5 | 6 | 20.0 | 20.0 | 0.0 | 25 | 39 | 500 Btuh |
| 8 | 2, Clear, DEF, N, N | S | 1.5 | 2 | 4.0 | 4.0 | 0.0 | 25 | 39 | 100 Btuh |
| | Window Total | | | | 192 | | | | | 9917 Btuh |

| Walls | Type | R-Value | Area | HTM | Load |
|---|---|---|---|---|---|
| 1 | Frame - Exterior | 13.0 | 1135.0 | 2.2 | 2520 Btuh |
| 2 | Frame - Adjacent | 13.0 | 196.0 | 1.5 | 298 Btuh |
| | Wall Total | | 1331.0 | | 2818 Btuh |

| Doors | Type | Area | HTM | Load |
|---|---|---|---|---|
| 1 | Insulated - Exter | 20.0 | 12.9 | 259 Btuh |
| 2 | Insulated - Adjac | 18.0 | 12.9 | 233 Btuh |
| | Door Total | 38.0 | | 492 Btuh |

| Ceilings | Type/Color | R-Value | Area | HTM | Load |
|---|---|---|---|---|---|
| 1 | Under Attic/Dark | 30.0 | 1889.0 | 1.6 | 2985 Btuh |
| | Ceiling Total | | 1889.0 | | 2985 Btuh |

| Floors | Type | R-Value | Size | HTM | Load |
|---|---|---|---|---|---|
| 1 | Slab-On-Grade Edge Insulation | 0.0 | 171.0 ft(p) | 0.0 | 0 Btuh |
| | Floor Total | | 171.0 | | 0 Btuh |

| Infiltration | Type | ACH | Volume | CFM= | Load |
|---|---|---|---|---|---|
| | Natural | 0.70 | 12360 | 144.5 | 3814 Btuh |
| | Mechanical | | | 0 | 0 Btuh |
| | Infiltration Total | | | 144 | 3814 Btuh |

| Internal gain | Occupants | Btuh/occupant | Appliance | Load |
|---|---|---|---|---|
| | 6 | X 300 + | 1200 | 3000 Btuh |

# Manual J Summer Calculations

## Residential Load - Component Details (continued)

Spec House

Lake City, FL 32025-

Project Title:
Aaron Simque Homes - Lot 24 Spec

Class 3 Rating
Registration No. 0
Climate: North

9/6/2005

| | | |
|---|---|---|
| **Totals for Cooling** | **Subtotal** | **23026 Btuh** |
| | **Duct gain(using duct multiplier of 0.10)** | **2303 Btuh** |
| | **Total sensible gain** | **25328 Btuh** |
| | **Latent infiltration gain (for 51 gr. humidity difference)** | **5011 Btuh** |
| | **Latent occupant gain (6 people @ 230 Btuh per person)** | **1380 Btuh** |
| | **Latent other gain** | **0 Btuh** |
| | **TOTAL GAIN** | **31719 Btuh** |

Key: Window types (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/Daperies(B) or Roller Shades(R))
(ExSh - Exterior shading device: none(N) or numerical value)
(Ornt - compass orientation)