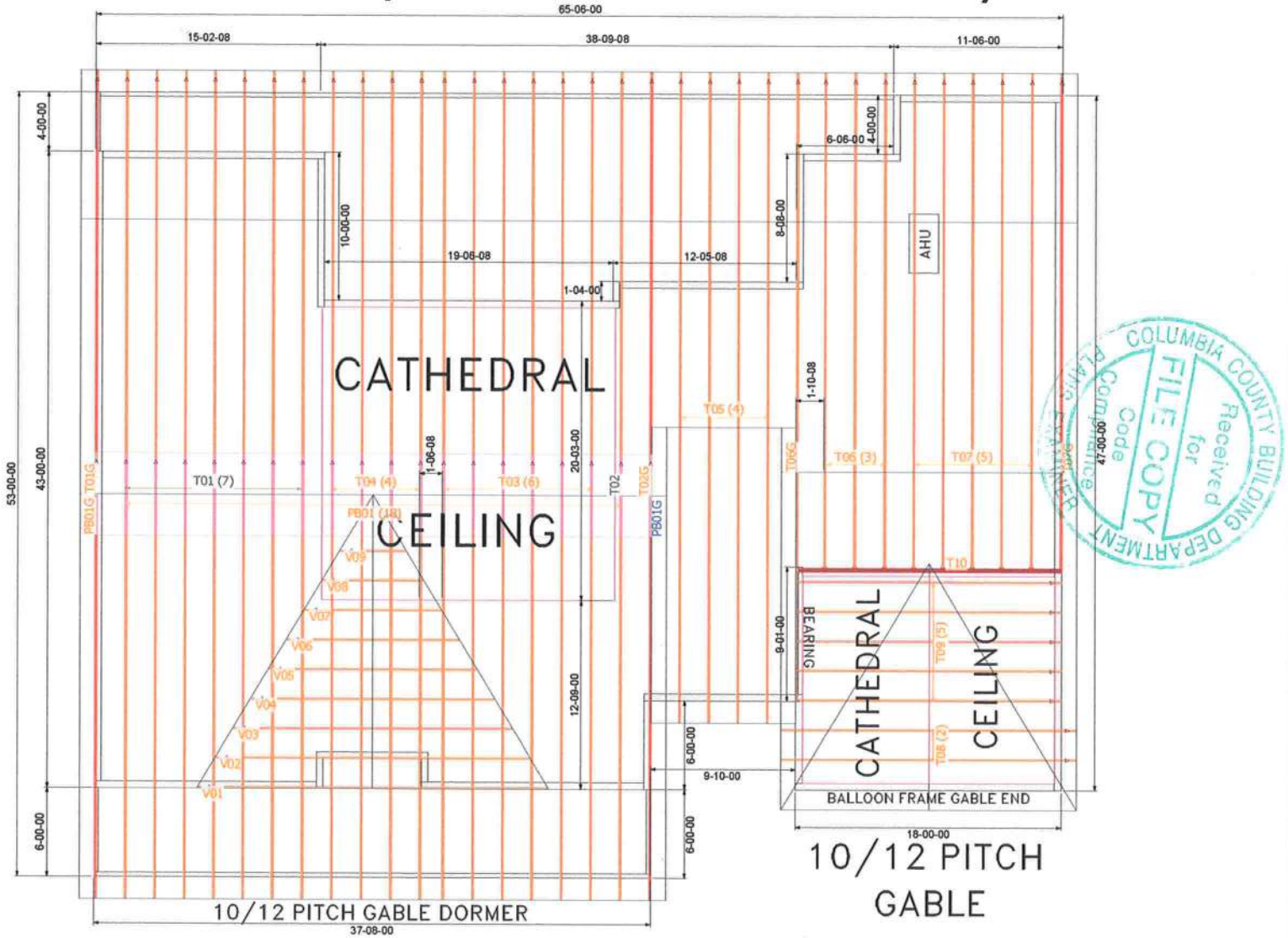
6/12 – 3/12 PITCH – 18" O/H



MITEK PLATE APPROVAL #'S 2197.2–2197.4, BOISE EWP PRODUCT #'S LVL FL1644–R2, BCI JOISTS FL1392–R2

THE ARROW HEAD AT THE END OF THE TRUSS ON THE TRUSS PLACEMENT PLAN (LAYOUT) CORRESPONDS WITH THE LEFT SIDE OF THE INDIVIDUAL TRUSS DRAWING. USE THIS AS AN ORIENTATION GUIDE WHEN SETTING THE TRUSSES ON THE STRUCTURE.

General Notes:

- Per ANSI/TPI 1-2002 all " Truss to Wall" connections are the responsibility of the Building Designer, not the Truss Manufacturer.
- Use Manufacturer's specifications for all hanger connections unless noted otherwise.
- Trusses are to be 24" o.c. U.N.O.
- All hangers are to be Simpson or equivalent U.N.O.- Use 10d x 1 1/2" Nails in hanger connections to single ply girder trusses.
- Trusses are not designed to support brick U.N.O.
- Dimensions are Feet-Inches- Sixteenths

Notes:

No back charges will be accepted by Builders FirstSource unless approved in writing first. 850-935-4541

ACQ lumber is corrosive to truss plates. Any ACQ lumber that comes in contact with truss plates (i.e. scabbed on tails) must have an approved barrier applied first.

Refer to BCSI-B1 Summary Sheet-Guide for handling, Installing and Bracing of Metal Plate Connected Wood Truss prior to and during truss installation.

It is the responsibility of the Contractor to ensure of the proper orientation of the truss placement plans as to the construction documents and field conditions of the structure orientation. If a reversed or flipped layout is required, it will be supplied at no extra cost by Builders FirstSource.

It is the responsibility of the Contractor to make sure the placement of trusses are adjusted for plumbing drops, can lights, ect.., so the trusses do not interfere with these type of items.

All common framed roof or floor systems must be designed as to NOT impose any loads on the floor trusses below. The floor trusses have not been designed to carry any additional loads from above.

This truss placement plan was not created by an engineer, but rather by the Builders FirstSource staff and is solely to be used as an installation guide and does not require a seal. Complete truss engineering and analysis can be found on the truss design drawings which may be sealed by the truss design engineer.

Gable end trusses require continuous bottom chord bearing. Refer to local codes for wall framing requirements.

Although all attempts have been made to do so, trusses may not be designed symmetrically. Please refer to the individual truss drawings and truss placement plans for proper orientation and placement.

COLUMBIA COUNTY BUILDING DEPARTMENT
PLANS EXAMINER
FILE COPY
Received for Compliance to Code

Builders FirstSource

Lake City
PHONE: 386-755-6894
FAX: 386-755-7973

Jacksonville
PHONE: 904-772-6100
FAX: 904-772-1973

Tallahassee
PHONE: 850-576-5177

Builder:	MATTHEW CLARK CONST
Legal Address:	McAlhany Res.
Model:	Custom

Date:	Drawn By:	Original Ref #:
6-11-24	KLH	4011229
Floor 1 Job#	Floor 2 Job#	Roof Job #
N/A	N/A	4011229

MiTek

Lumber design values are in accordance with ANSI/TPI 1 section 6.3
These truss designs rely on lumber values established by others.

RE: 4011229 - CLARK - MCALHANY RES.

MiTek, Inc.
16023 Swingley Ridge Rd.
Chesterfield, MO 63017
314.434.1200

Site Information:

Customer Info: MATTHEW CLARK CONST. Project Name: McAlhany Res. Model: Custom
Lot/Block: 13 Subdivision: River Rise
Address: TBD SW Marynik Drive, N/A
City: Columbia Cty 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: FBC2023/TPI2014 Design Program: MiTek 20/20 8.7
Wind Code: ASCE 7-22 Wind Speed: 130 mph
Roof Load: 37.0 psf Floor Load: N/A psf

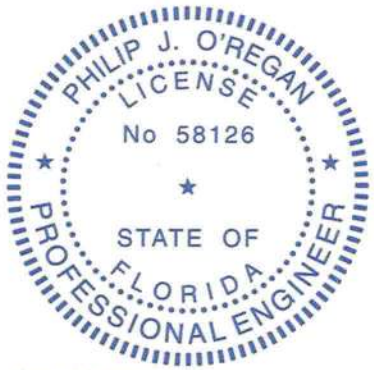
This package includes 2 individual, Truss Design Drawings and 0 Additional Drawings.
With my seal affixed to this sheet, I hereby certify that I am the Truss Design Engineer and this index sheet conforms to 61G15-31.003, section 5 of the Florida Board of Professional Engineers Rules.

No.	Seal#	Truss Name	Date
1	T34138772	T01	6/12/24
2	T34138773	T01G	6/12/24

This item has been digitally signed and sealed by ORegan, Philip, PE on the date adjacent to the seal.
Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies

The truss drawing(s) referenced above have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Builders FirstSource-Lake City, FL.

Truss Design Engineer's Name: ORegan, Philip
My license renewal date for the state of Florida is February 28, 2025.



IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek or TRENCO. Any project specific information included is for MiTek's or TRENCO's customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek or TRENCO has not independently verified the applicability of the design parameters or the designs for any particular building. Before use, the building designer should verify applicability of design parameters and properly incorporate these designs into the overall building design per ANSI/TPI 1, Chapter 2.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

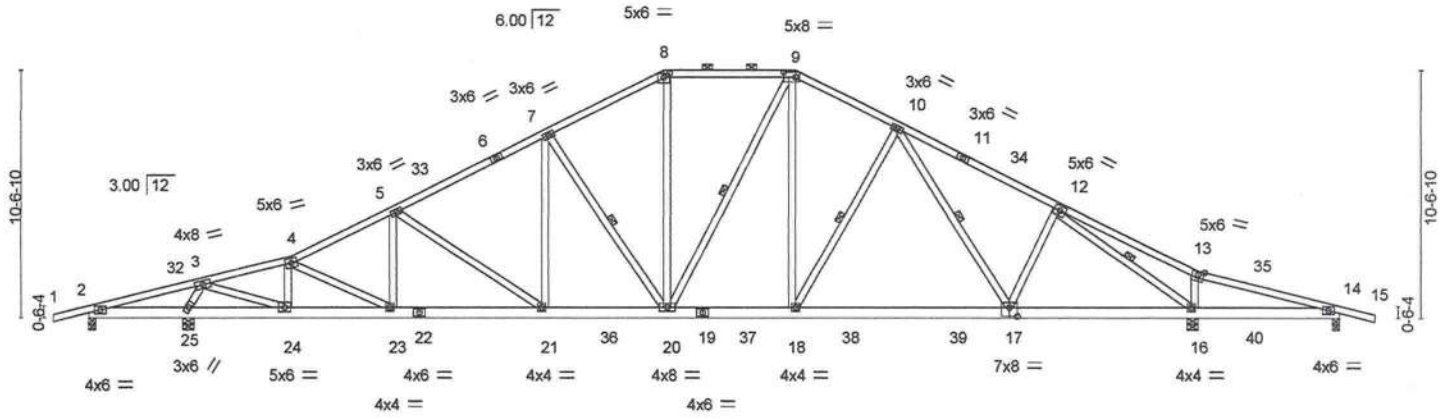
June 12,2024

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T34138772
4011229	T01	Piggyback Base	7	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 11 08:25:45 2024 Page 1
ID:2oQfIg4xNCqI7jjUsLHaTJzKIBw-8EAFmzokE_QBoskln0kptYUyO42DWKJ1nNybhPz7Pia

1-6-0	4-10-0	8-7-0	12-10-12	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	47-0-0	53-0-0	54-6-0
1-6-0	4-10-0	3-9-0	4-3-12	6-5-4	5-0-4	5-7-0	4-3-12	6-9-0	6-0-0	6-0-0	1-6-0

Scale = 1:98.1



4-2-12	8-7-0	12-10-12	19-4-0	24-4-4	29-11-4	39-0-0	47-0-0	53-0-0
4-2-12	4-4-4	4-3-12	6-5-4	5-0-4	5-7-0	9-0-12	8-0-0	6-0-0

Plate Offsets (X,Y)-- [8:0-3-0,0-2-0], [9:0-6-0,0-2-8], [17:0-4-0,0-4-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.60	Vert(LL)	-0.19	17-18	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.56	Vert(CT)	-0.32	17-18	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.76	Horz(CT)	0.07	16	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 363 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x6 SP No.2
WEBS	2x4 SP No.3 *Except* 3-24: 2x4 SP No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 3-4-9 oc purlins, except 2-0-0 oc purlins (3-11-3 max.): 8-9.
BOT CHORD	Rigid ceiling directly applied or 5-1-11 oc bracing.
WEBS	1 Row at midpt 7-20, 9-20, 10-18, 10-17, 12-16

REACTIONS. All bearings 0-3-8 except (jt=length) 25=0-5-8, 16=0-5-8.
(lb) - Max Horz 2=224(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) except 2=-446(LC 19), 25=-916(LC 12), 16=-698(LC 13), 14=-261(LC 9)
Max Grav All reactions 250 lb or less at joint(s) 2 except 25=2541(LC 2), 16=2057(LC 2), 14=266(LC 26)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD	2-3=-717/1814, 3-4=-2104/874, 4-5=-2681/1163, 5-7=-2405/1138, 7-8=-2000/1098, 8-9=-1746/1022, 9-10=-1973/1100, 10-12=-2211/1056
BOT CHORD	2-25=-1734/739, 24-25=-556/268, 23-24=-788/2076, 21-23=-849/2382, 20-21=-706/2095, 18-20=-556/1725, 17-18=-699/1861, 16-17=-695/1813
WEBS	3-25=-2429/1037, 3-24=-986/2745, 4-24=-961/446, 4-23=-133/361, 5-21=-372/275, 7-21=-115/451, 7-20=-651/410, 8-20=-221/652, 9-18=-266/655, 10-18=-352/354, 12-17=0/336, 12-16=-2457/1020, 13-16=-264/233

NOTES-

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 3-9-10, Zone1 3-9-10 to 24-4-4, Zone3 24-4-4 to 29-11-4, Zone2 29-11-4 to 37-5-3, Zone1 37-5-3 to 54-6-0 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Provide adequate drainage to prevent water ponding.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 446 lb uplift at joint 2, 916 lb uplift at joint 25, 698 lb uplift at joint 16 and 261 lb uplift at joint 14.
8) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

June 12,2024

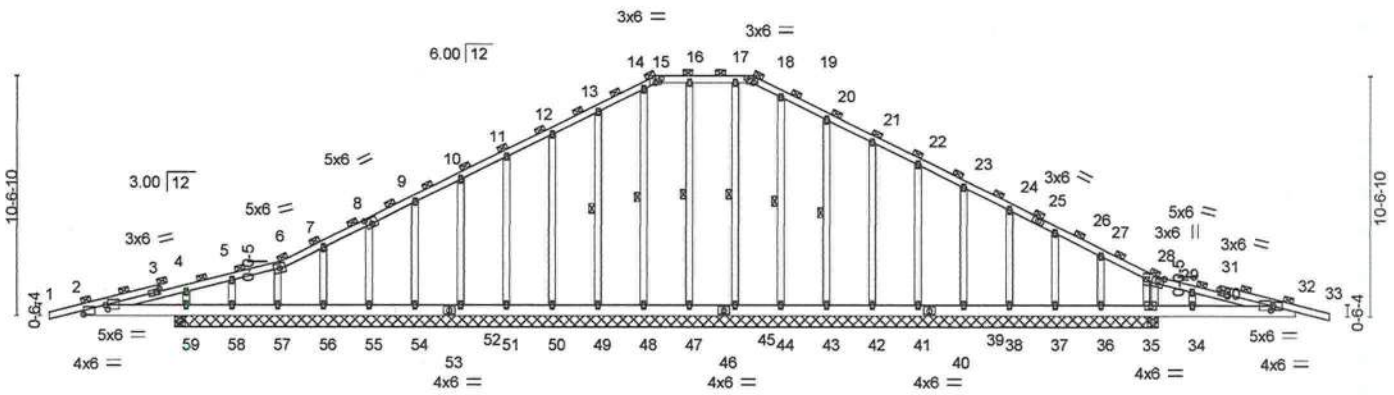
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T34138773
4011229	T01G	Piggyback Base Supported Gable	1	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Tue Jun 11 08:25:47 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-4cH?Bfp?mbgv2Au8uRmHyzZEKtgR_KwKEhRimHz7PiY

1-6-0	8-7-0	25-0-2	29-3-6	47-0-0	53-0-0	54-6-0
1-6-0	8-7-0	16-5-2	4-3-4	17-8-10	6-0-0	1-6-0

Scale = 1:101.2



4-0-0	47-0-0	53-0-0
4-0-0	43-0-0	6-0-0

Plate Offsets (X,Y)-- [2:0-1-4,0-2-2], [2:Edge,0-4-14], [8:0-3-0,0-3-0], [15:0-3-0,0-2-0], [18:0-3-8,0-2-4], [29:0-3-0,0-1-10], [32:0-1-4,0-2-2], [32:0-1-4,0-2-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.90	Vert(LL)	0.01	35-36	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.77	Vert(CT)	-0.56	32	>140	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.37	Horz(CT)	0.03	35	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 401 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x6 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (4-9-5 max.).
BOT CHORD	Rigid ceiling directly applied or 5-0-8 oc bracing.
WEBS	1 Row at midpt 16-47, 14-48, 13-49, 17-45, 19-44, 20-43

REACTIONS. All bearings 43-0-0.
(lb) - Max Horz 59=224(LC 16)
Max Uplift All uplift 100 lb or less at joint(s) 47, 50, 51, 52, 54, 55, 56, 44, 43, 42, 41, 38 except 48=-154(LC 9), 49=-102(LC 12), 57=-117(LC 26), 58=-434(LC 25), 59=-567(LC 8), 45=-140(LC 9), 39=-101(LC 13), 37=-183(LC 13), 36=-793(LC 26), 35=-608(LC 9)
Max Grav All reactions 250 lb or less at joint(s) 47, 49, 50, 51, 52, 54, 55, 56, 57, 43, 42, 41, 39, 38 except 48=466(LC 1), 58=348(LC 8), 59=850(LC 25), 59=579(LC 1), 45=403(LC 1), 44=316(LC 1), 37=392(LC 26), 36=601(LC 9), 35=1080(LC 26), 35=883(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD 2-4=-956/786, 4-5=-891/758, 5-6=-860/776, 6-7=-872/848, 7-8=-787/855, 8-9=-696/850, 9-10=-609/852, 10-11=-521/851, 11-12=-433/852, 12-13=-344/850, 13-14=-295/867, 14-15=-210/681, 15-16=-232/740, 16-17=-232/740, 17-18=-232/740, 18-19=-245/772, 19-20=-291/867, 20-21=-375/849, 21-22=-464/852, 22-23=-552/851, 23-24=-641/852, 24-26=-725/848, 26-27=-832/869, 27-28=-838/780, 28-29=-1188/1069, 29-30=-1167/1032, 30-32=-1240/1068

BOT CHORD 2-59=-739/985, 58-59=-739/992, 57-58=-739/992, 56-57=-742/993, 55-56=-742/993, 54-55=-740/991, 52-54=-740/991, 51-52=-740/991, 50-51=-740/991, 49-50=-740/991, 48-49=-740/991, 47-48=-740/991, 45-47=-740/991, 44-45=-740/991, 43-44=-740/991, 42-43=-740/991, 41-42=-740/991, 39-41=-740/991, 38-39=-740/991, 37-38=-740/991, 36-37=-740/991, 35-36=-740/991, 34-35=-1014/1269, 32-34=-1014/1269

WEBS 14-48=-426/241, 4-59=-290/290, 17-45=-363/207, 19-44=-276/216, 28-35=-1036/817, 30-34=-276/292, 29-35=-784/970

NOTES-

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) Provide adequate drainage to prevent water ponding.

Continued on page 2

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

June 12,2024

MiTek®
16023 Swingley Ridge Rd.

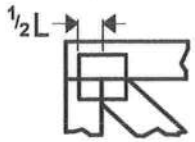
Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T34138773
4011229	T01G	Piggyback Base Supported Gable	1	1	Job Reference (optional)

NOTES-

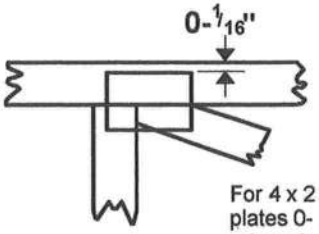
6) All plates are 2x4 MT20 unless otherwise indicated.
7) Gable studs spaced at 2-0-0 oc.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 47, 50, 51, 52, 54, 55, 56, 44, 43, 42, 41, 38 except (jt=lb) 48=154, 49=102, 57=117, 58=434, 59=567, 45=140, 39=101, 37=183, 36=793, 35=608.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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 fully embed teeth.



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 software or upon request.

PLATE SIZE

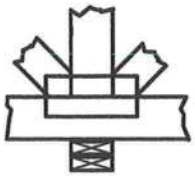
4 x 4

The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION

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

BEARING

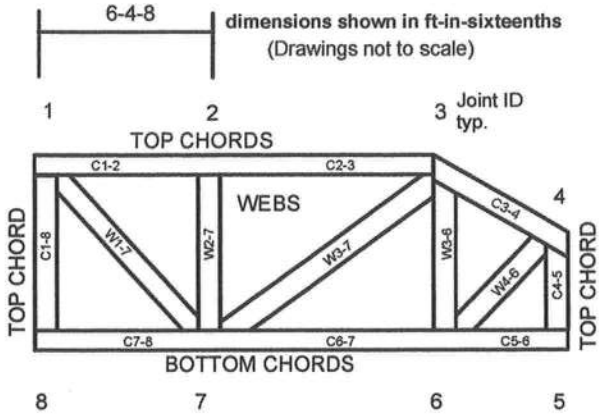


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number/letter where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-22: Design Standard for Bracing.
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing, Restraining & 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.

Product Code Approvals

ICC-ES Reports:

ESR-1988, ESR-2362, ESR-2685, ESR-3282
ESR-4722, ESL-1388

Design General Notes

Trusses are designed for wind loads in the plane of the truss unless otherwise shown.

Lumber design values are in accordance with ANSI/TPI 1 section 6.3 These truss designs rely on lumber values established by others.

MiTek®

MiTek Engineering Reference Sheet: MII-7473 rev. 1/2/2023

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 BCSI.
2. Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
3. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
4. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
5. Cut members to bear tightly against each other.
6. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
8. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
9. Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.
10. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
11. Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
12. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
13. Top chords must be sheathed or purlins provided at spacing indicated on design.
14. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
15. Connections not shown are the responsibility of others.
16. Do not cut or alter truss member or plate without prior approval of an engineer.
17. Install and load vertically unless indicated otherwise.
18. Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
19. Review all portions of this design (front, back, words and pictures) before use. Reviewing pictures alone is not sufficient.
20. Design assumes manufacture in accordance with ANSI/TPI 1 Quality Criteria.
21. The design does not take into account any dynamic or other loads other than those expressly stated.

MiTek

Lumber design values are in accordance with ANSI/TPI 1 section 6.3
These truss designs rely on lumber values established by others.

RE: 4011229 - CLARK - MCALHANY RES.

MiTek, Inc.
16023 Swingley Ridge Rd.
Chesterfield, MO 63017
314.434.1200

Site Information:

Customer Info: MATTHEW CLARK CONST. Project Name: McAlhany Res. Model: Custom
Lot/Block: 13 Subdivision: River Rise
Address: TBD SW Marynik Drive, N/A
City: Columbia Cty 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: FBC2023/TPI2014 Design Program: MiTek 20/20 8.7
Wind Code: ASCE 7-22 Wind Speed: 130 mph
Roof Load: 37.0 psf Floor Load: N/A psf

This package includes 26 individual, 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#	Truss Name	Date	No.	Seal#	Truss Name	Date
1	T33851212	PB01	5/14/24	15	T33851226	T09	5/14/24
2	T33851213	PB01G	5/14/24	16	T33851227	T10	5/14/24
3	T33851214	T01	5/14/24	17	T33851228	T11G	5/14/24
4	T33851215	T01G	5/14/24	18	T33851229	V01	5/14/24
5	T33851216	T02	5/14/24	19	T33851230	V02	5/14/24
6	T33851217	T02G	5/14/24	20	T33851231	V03	5/14/24
7	T33851218	T03	5/14/24	21	T33851232	V04	5/14/24
8	T33851219	T04	5/14/24	22	T33851233	V05	5/14/24
9	T33851220	T05	5/14/24	23	T33851234	V06	5/14/24
10	T33851221	T06	5/14/24	24	T33851235	V07	5/14/24
11	T33851222	T06G	5/14/24	25	T33851236	V08	5/14/24
12	T33851223	T07	5/14/24	26	T33851237	V09	5/14/24
13	T33851224	T07G	5/14/24				
14	T33851225	T08	5/14/24				

This item has been digitally signed and sealed by ORegan, Philip, PE on the date adjacent to the seal.
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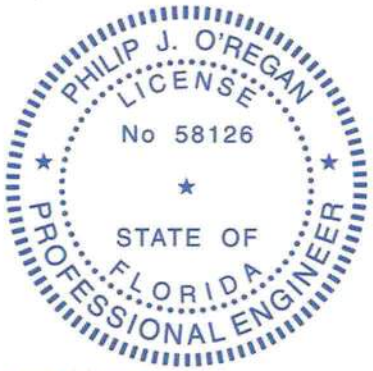
The truss drawing(s) referenced above have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Builders FirstSource-Lake City, FL.

Truss Design Engineer's Name: ORegan, Philip
My license renewal date for the state of Florida is February 28, 2025.

IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek or TRENCO. Any project specific information included is for MiTek's or TRENCO's customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek or TRENCO has not independently verified the applicability of the design parameters or the designs for any particular building. Before use, the building designer should verify applicability of design parameters and properly incorporate these designs into the overall building design per ANSI/TPI 1, Chapter 2.

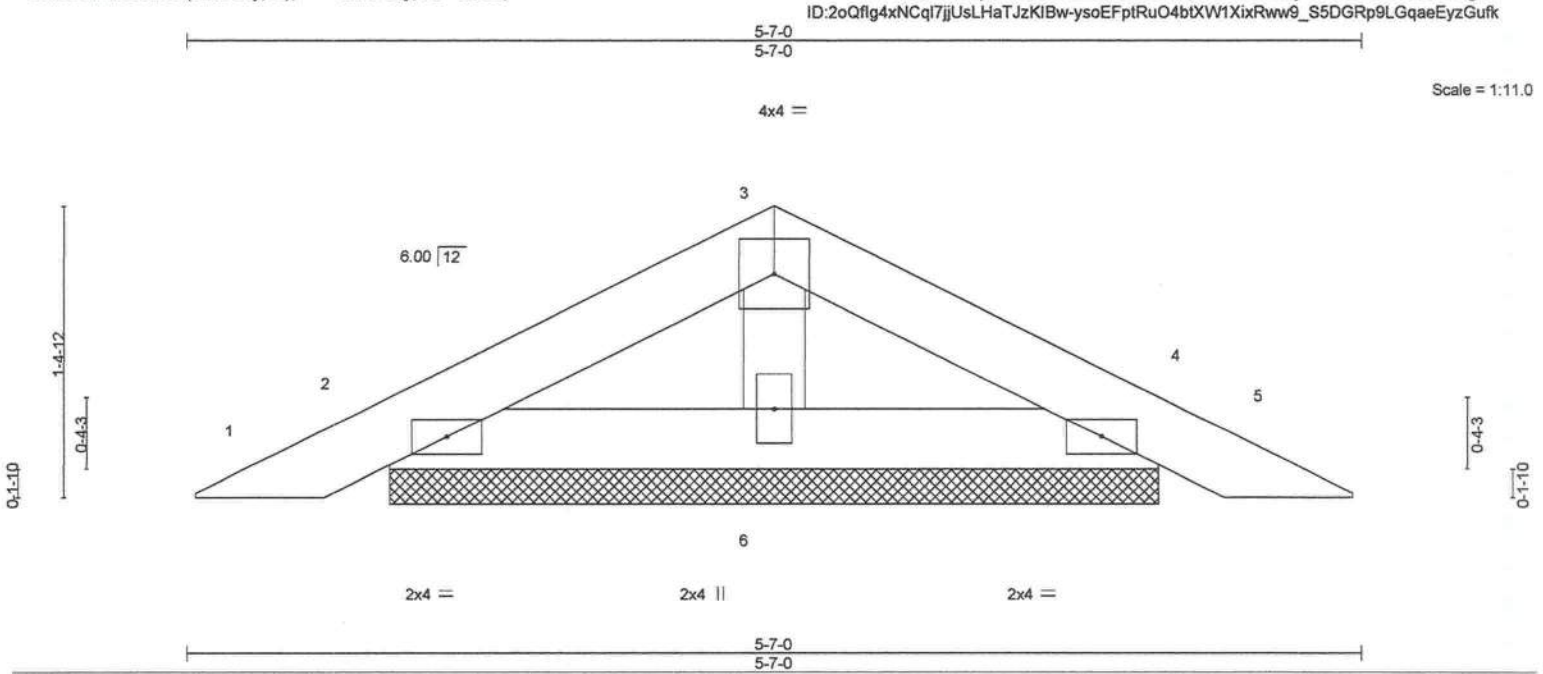


Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851212
4011229	PB01	Piggyback	18	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:50:55 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-ysoEFptRuO4btXW1XixRww9_S5DGRp9LGqaeEyzGufk



LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.09	Vert(LL)	0.00	4	n/r	120	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.03	Vert(CT)	0.00	4	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.04	Horz(CT)	0.00	4	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-P							Weight: 16 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-7-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 2=3-7-14, 4=3-7-14, 6=3-7-14
Max Horz 2=26(LC 12)
Max Uplift 2=-62(LC 12), 4=-67(LC 13), 6=-26(LC 12)
Max Grav 2=106(LC 1), 4=106(LC 1), 6=125(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 4, 6.
8) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.
4011229	PB01G	PIGGYBACK	2	1	T33851213

Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:50:56 2024 Page 1
ID:2oQfIg4xNCqI7jjUsLHaTJzKIBw-Q2MdS9u4fhDSUg4E5QTgS8i9aUZ2AG0UVUKBmOzGufj

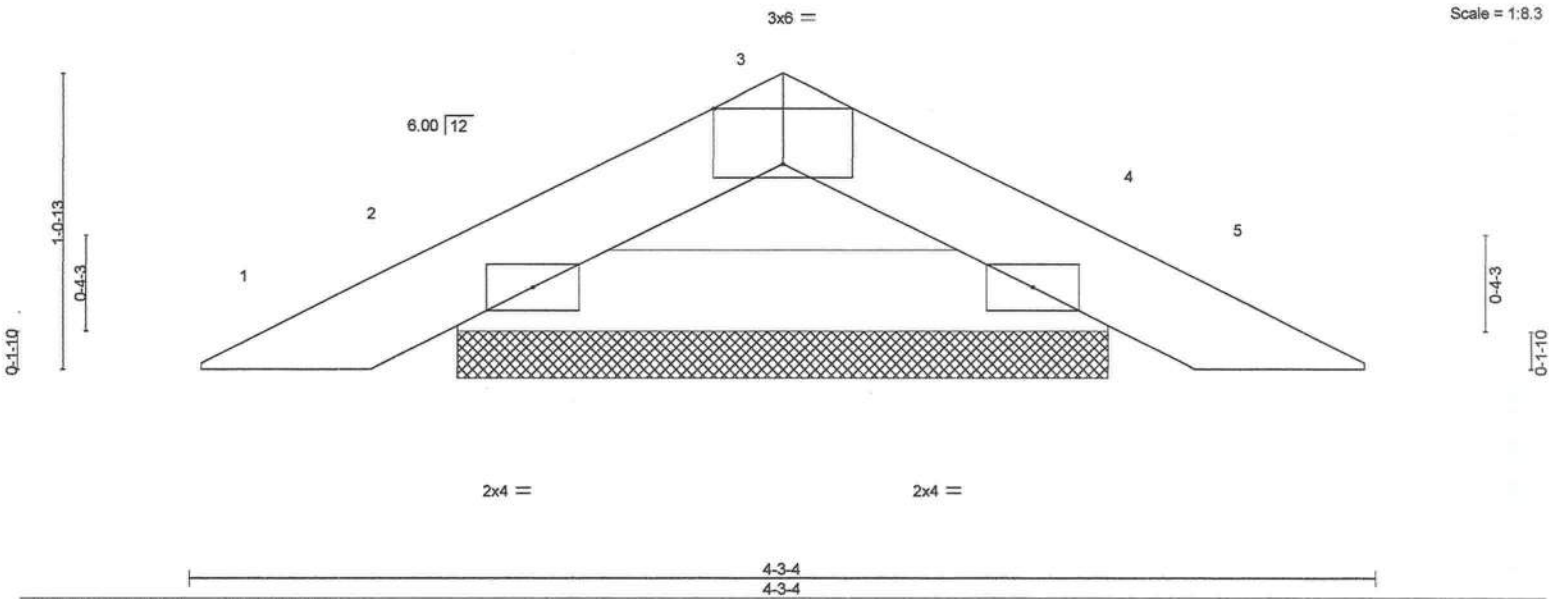


Plate Offsets (X,Y)-- [3:0-3-0,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.07	Vert(LL)	-0.00	4	n/r	120	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.06	Vert(CT)	-0.00	4	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.00	Horz(CT)	0.00	4	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-P							Weight: 10 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-3-4 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 2=2-4-2, 4=2-4-2
Max Horz 2=19(LC 16)
Max Uplift 2=-57(LC 12), 4=-57(LC 13)
Max Grav 2=120(LC 1), 4=120(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 4.
8) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.

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Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

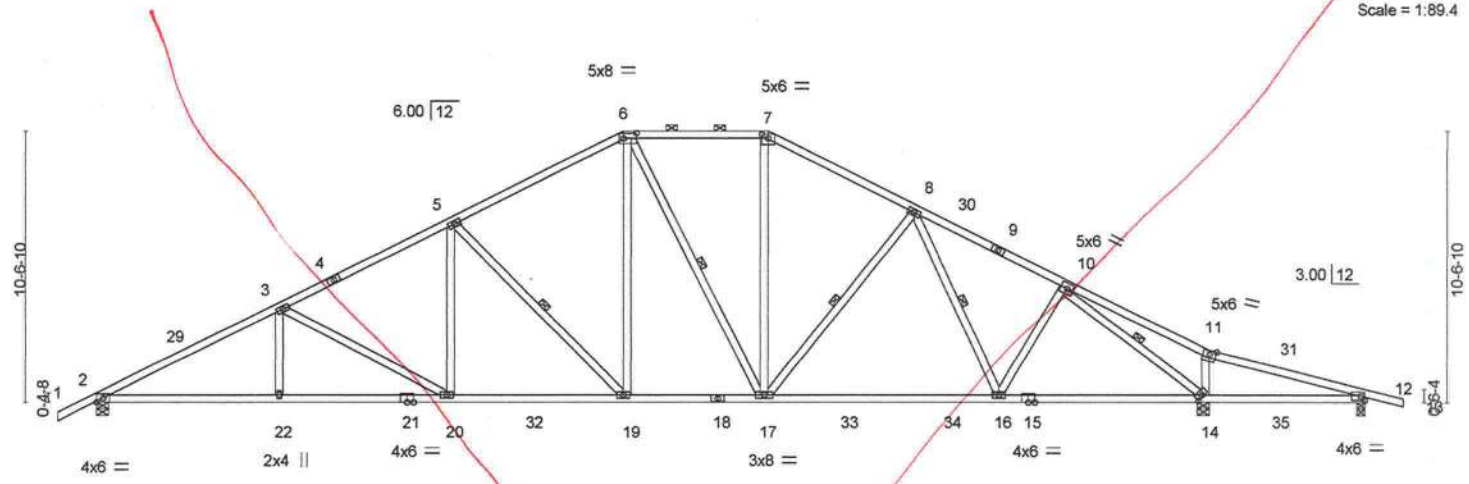
May 14,2024

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851214
4011229	T01	Piggyback Base	7	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Nov 16 2023 MiTek Industries, Inc. Tue May 14 10:50:32 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-bLdi3aXo6nxWO49k1hnOIKdsdSCqwlLyLY1P6qzGmlr

1-6-0	7-0-11	13-8-3	20-4-4	25-11-4	31-7-0	37-4-6	43-0-0	49-0-0	50-6-0
1-6-0	7-0-11	6-7-7	6-8-1	5-7-0	5-7-12	5-9-6	5-7-10	6-0-0	1-6-0

Scale = 1:89.4



7-0-11	13-8-3	20-4-4	25-11-4	34-10-6	42-9-4	43-0-0	49-0-0
7-0-11	6-7-7	6-8-1	5-7-0	8-11-1	7-10-14	0-2-12	6-0-0

Plate Offsets (X,Y)-- [6:0-6-0,0-2-8], [7:0-3-0,0-2-0], [14:0-3-1,0-0-13]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.61	Vert(LL)	-0.34	16-17	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	1.00	Vert(CT)	-0.58	16-17	>885	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.75	Horz(CT)	0.16	14	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 288 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-6-11 oc purlins, except
2-0-0 oc purlins (3-11-11 max.): 6-7.
BOT CHORD Rigid ceiling directly applied or 1-4-12 oc bracing.
WEBS 1 Row at midpt 5-19, 6-17, 8-17, 8-16, 10-14

REACTIONS. (lb/size) 2=1657/0-5-8, 14=1893/0-5-8, 12=238/0-3-8
Max Horz 2=248(LC 12)
Max Uplift 2=-653(LC 12), 14=-684(LC 13), 12=-295(LC 9)
Max Grav 2=1818(LC 2), 14=2123(LC 2), 12=268(LC 26)

FORCES. (lb) - Maximum Compression/Maximum Tension
TOP CHORD 1-2=0/36, 2-29=-3361/1400, 3-29=-3302/1414, 3-4=-2792/1252, 4-5=-2675/1275, 5-6=-2154/1147, 6-7=-1801/1079, 7-8=-2066/1127, 8-30=-2154/1084, 9-30=-2202/1073, 9-10=-2258/1072, 10-11=-48/372, 11-31=-84/296, 12-31=-90/255, 12-13=0/20
BOT CHORD 2-22=-1117/2953, 21-22=-1117/2953, 20-21=-1117/2953, 20-32=-850/2441, 19-32=-850/2441, 18-19=-606/1872, 17-18=-606/1872, 17-33=-766/1958, 33-34=-766/1958, 16-34=-766/1958, 15-16=-720/1787, 14-15=-720/1787, 14-35=-221/111, 12-35=-221/111
WEBS 3-22=0/272, 3-20=-588/368, 5-20=-130/565, 5-19=-826/486, 6-19=-314/812, 6-17=-304/190, 7-17=-236/668, 8-17=-329/341, 8-16=-95/110, 10-16=-15/416, 10-14=-2551/953, 11-14=-285/274

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C 43-0-0 to 50-6-0 zone; porch right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Provide adequate drainage to prevent water ponding.
5) All plates are 3x6 MT20 unless otherwise indicated.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 653 lb uplift at joint 2, 684 lb uplift at joint 14 and 295 lb uplift at joint 12.
9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

LOAD CASE(S) Standard

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Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

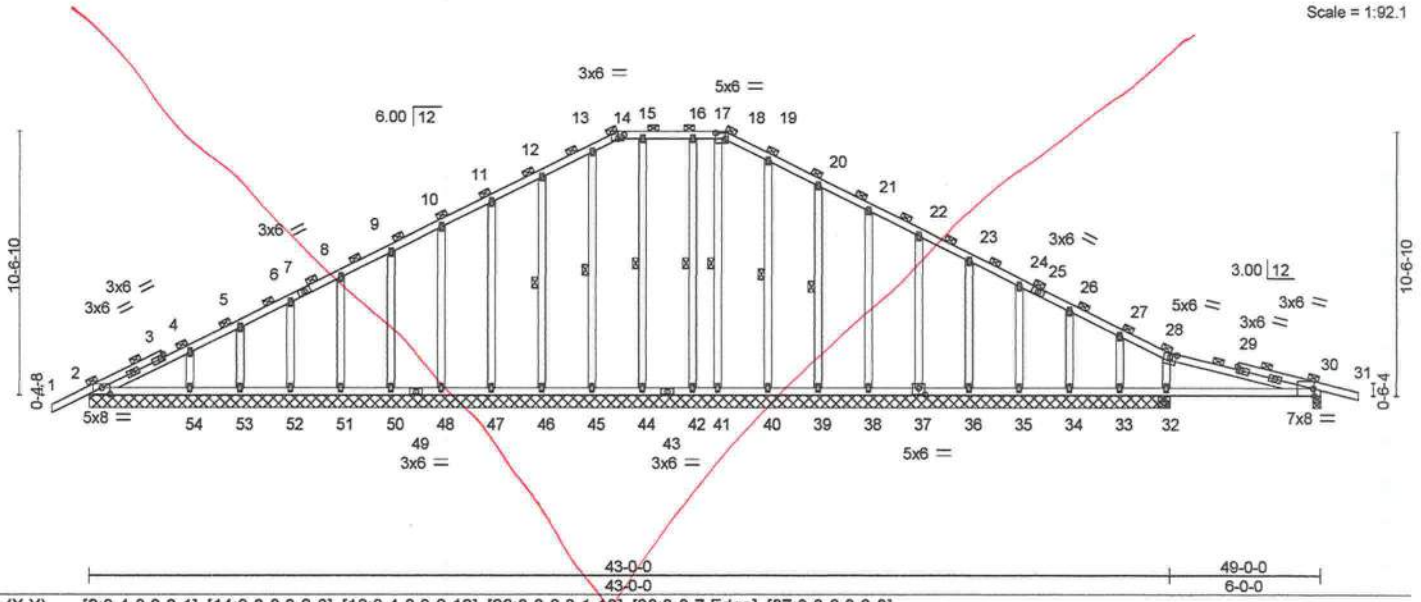
MiTek
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851215
4011229	T01G	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:50:58 2024 Page 1
ID:2oQfIg4xNCqI7jjUsLHaTJzKIBw-MRTNtqvKAJTAk_EcCrV8YZnPgIBPe9ZnyopIrHzGufh

1-6-0 | 21-0-2 | 25-3-6 | 43-0-0 | 49-0-0 | 50-6-0
1-6-0 | 21-0-2 | 4-3-4 | 17-8-10 | 6-0-0 | 1-8-0

Scale = 1:92.1



43-0-0 | 49-0-0
43-0-0 | 6-0-0

Plate Offsets (X,Y)-- [2:0-4-0,0-3-1], [14:0-3-0,0-2-0], [18:0-4-8,0-2-12], [28:0-3-0,0-1-10], [30:0-0-7,Edge], [37:0-3-0,0-3-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.48	Vert(LL)	0.05	30-32	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.26	Vert(CT)	-0.06	30-32	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.12	Horz(CT)	0.02	30	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 354 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x4 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (6-0-0 max.).
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	1 Row at midpt 20-39, 19-40, 17-41, 12-46, 13-45, 15-44, 16-42

REACTIONS. All bearings 43-0-0 except (jt=length) 30=0-3-8.
(lb) - Max Horz 2=247(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 2, 33, 35, 36, 37, 38, 40, 53, 52, 51, 50, 48, 47, 45, 44, 42 except 30=-262(LC 9), 34=-101(LC 13), 39=-104(LC 13), 54=-123(LC 12), 46=-110(LC 12), 32=-261(LC 9)
Max Grav All reactions 250 lb or less at joint(s) 2, 33, 34, 35, 36, 37, 38, 39, 40, 41, 54, 53, 52, 51, 50, 48, 47, 46, 45, 44, 42 except 30=303(LC 1), 32=371(LC 1), 32=371(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-284/110, 10-11=-85/328, 11-12=-106/414, 12-13=-131/517, 13-14=-135/530, 14-15=-128/528, 15-16=-128/528, 16-17=-128/528, 17-18=-128/528, 18-19=-139/549, 19-20=-122/478, 20-21=-99/384, 21-22=-78/297
BOT CHORD 2-54=-70/296, 53-54=-70/296, 52-53=-70/296, 51-52=-70/296, 50-51=-70/296, 48-50=-70/296, 47-48=-70/296, 46-47=-70/296, 45-46=-70/296, 44-45=-70/296, 42-44=-70/296, 41-42=-70/296, 40-41=-70/296, 39-40=-70/296, 38-39=-70/296, 37-38=-70/296, 36-37=-70/296, 35-36=-70/296, 34-35=-70/296, 33-34=-70/296, 32-33=-70/296, 30-32=-55/265
WEBS 4-54=-172/256, 28-32=-236/303

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone; porch right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) Provide adequate drainage to prevent water ponding.
6) All plates are 2x4 MT20 unless otherwise indicated.
7) Gable studs spaced at 2-0-0 oc.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 33, 35, 36, 37, 38, 40, 53, 52, 51, 50, 48, 47, 45, 44, 42 except (jt=lb) 30=262, 34=101, 39=104, 54=123, 46=110, 32=261.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

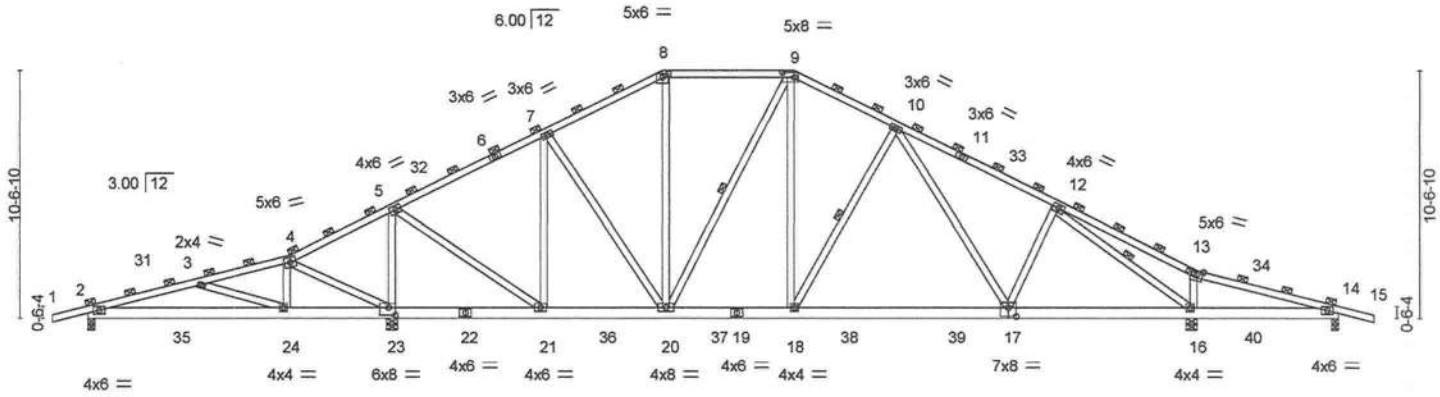
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851216
4011229	T02	Piggyback Base	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:50:59 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-qd1I5Awyxcb1L8ppmY0N4mKajiTMNRfwBSYrNjzGufg

1-6-0	4-10-0	8-7-0	12-10-12	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	47-0-0	53-0-0	54-6-0
1-6-0	4-10-0	3-9-0	4-3-12	6-5-4	5-0-4	5-7-0	4-3-12	6-9-0	6-0-0	6-0-0	1-6-0

Scale = 1:98.1



8-7-0	12-10-12	19-4-0	24-4-4	29-11-4	39-0-0	47-0-0	53-0-0
8-7-0	4-3-12	6-5-4	5-0-4	5-7-0	9-0-12	8-0-0	6-0-0

Plate Offsets (X,Y)-- [8:0-3-0,0-2-0], [9:0-6-0,0-2-8], [17:0-4-0,0-4-8], [23:0-3-8,0-4-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.46	Vert(LL)	-0.13	17-18	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.47	Vert(CT)	-0.22	17-18	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.77	Horz(CT)	0.03	16	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 362 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x6 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD 2-0-0 oc purlins (4-1-7 max.), except sheathed or 5-6-0 oc purlins: 8-9.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 23-24,21-23.
WEBS 1 Row at midpt 9-20, 10-18, 12-16

REACTIONS. All bearings 0-3-8 except (jt=length) 23=0-5-8, 16=0-5-8.
(lb) - Max Horz 2=224(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) except 2=-364(LC 8), 23=-788(LC 12), 16=-598(LC 13), 14=-271(LC 9)
Max Grav All reactions 250 lb or less at joint(s) except 2=408(LC 25), 23=2179(LC 2), 16=1613(LC 2), 14=300(LC 26)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-526/497, 4-5=-341/588, 5-7=-907/437, 7-8=-1096/675, 8-9=-933/642, 9-10=-1292/781, 10-12=-1685/806
BOT CHORD 2-24=-382/498, 21-23=-478/500, 20-21=-133/826, 18-20=-271/1118, 17-18=-434/1299, 16-17=-502/1408
WEBS 3-24=-453/401, 4-24=-352/363, 4-23=-562/542, 5-23=-1728/913, 5-21=-682/1495, 7-21=-637/436, 7-20=-179/339, 8-20=-108/285, 9-20=-438/229, 9-18=-283/721, 10-18=-412/375, 10-17=-149/316, 12-16=-1713/685, 13-16=-288/242

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 3-9-10, Zone1 3-9-10 to 24-4-4, Zone3 24-4-4 to 29-11-4, Zone2 29-11-4 to 37-5-3, Zone1 37-5-3 to 54-6-0 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Provide adequate drainage to prevent water ponding.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 364 lb uplift at joint 2, 788 lb uplift at joint 23, 598 lb uplift at joint 16 and 271 lb uplift at joint 14.
8) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

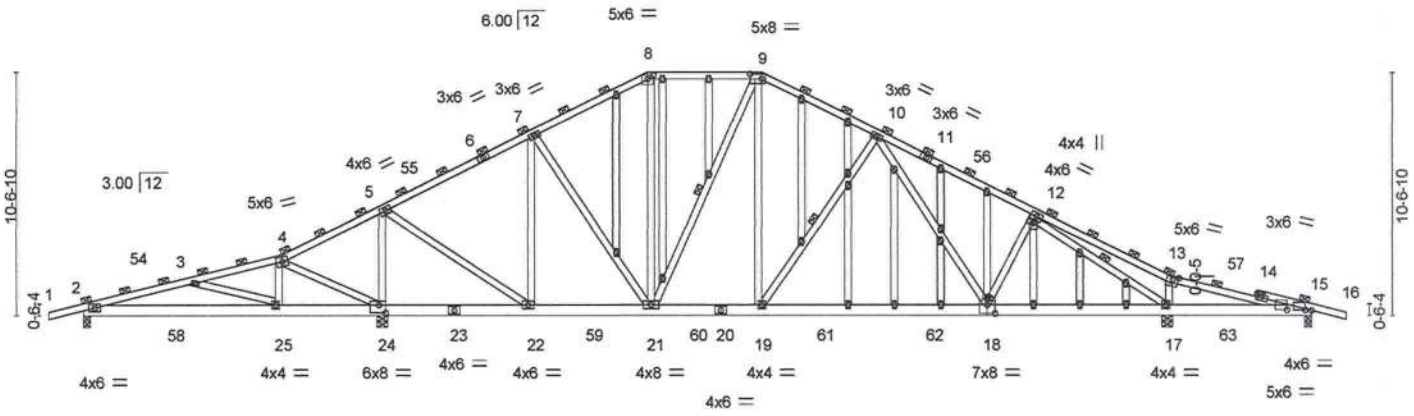
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851217
4011229	T02G	GABLE I Gable I Gable COMMON I I Gable I	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:00 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-lqb7lWxaiwjuzlO?KGXcd_tlW6om6v14P6IPv9zGuff

1-6-0	4-10-0	8-7-0	12-10-12	19-4-0	24-4-4	29-3-6	34-3-0	41-0-0	47-0-0	53-0-0	54-6-0
1-6-0	4-10-0	3-9-0	4-3-12	6-5-4	5-0-4	4-11-2	4-11-10	6-9-0	6-0-0	6-0-0	1-6-0

Scale = 1:99.8



8-7-0	12-10-12	19-4-0	24-4-4	29-3-6	39-0-0	47-0-0	53-0-0
8-7-0	4-3-12	6-5-4	5-0-4	4-11-2	9-8-10	8-0-0	6-0-0

Plate Offsets (X,Y)-- [8:0-3-0,0-2-0], [9:0-6-0,0-2-8], [12:0-0-11,0-2-0], [13:0-3-0,0-1-10], [15:1-0-12,0-0-6], [15:0-3-4,0-0-4], [18:0-2-0,0-0-1], [18:0-4-0,0-4-8], [24:0-3-8,0-4-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.46	Vert(LL)	-0.15	18-19	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.52	Vert(CT)	-0.26	18-19	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.77	Horz(CT)	0.04	17	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 449 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x6 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (4-0-3 max.), except sheathed or 5-9-3 oc purlins: 8-9.
BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS	1 Row at midpt 9-21, 10-19, 12-17

REACTIONS. All bearings 0-3-8 except (jt=length) 24=0-5-8, 17=0-5-8.
(lb) - Max Horz 2=-224(LC 17)
Max Uplift All uplift 100 lb or less at joint(s) except 15=-258(LC 9), 2=-362(LC 8), 24=-790(LC 12), 17=-603(LC 13)
Max Grav All reactions 250 lb or less at joint(s) except 15=295(LC 26), 2=405(LC 25), 24=2186(LC 2), 17=1606(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD	2-3=-517/489, 4-5=-350/611, 5-7=-895/422, 7-8=-1084/657, 8-9=-921/624, 9-10=-1284/743, 10-12=-1778/797
BOT CHORD	2-25=-376/490, 24-25=-129/253, 22-24=-499/508, 21-22=-131/821, 19-21=-245/1106, 18-19=-442/1341, 17-18=-516/1510
WEBS	3-25=-456/404, 4-25=-351/364, 4-24=-558/540, 5-24=-1739/905, 5-22=-676/1507, 7-22=-642/434, 7-21=-172/337, 8-21=-120/295, 9-21=-478/234, 9-19=-279/760, 10-19=-463/393, 10-18=-152/393, 12-17=-1798/732, 13-17=-270/221

NOTES-

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 3-9-10, Zone1 3-9-10 to 24-4-4, Zone3 24-4-4 to 29-3-6, Zone2 29-3-6 to 36-9-5, Zone1 36-9-5 to 54-6-0 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) Provide adequate drainage to prevent water ponding.
6) All plates are 2x4 MT20 unless otherwise indicated.
7) Gable studs spaced at 2-0-0 oc.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 258 lb uplift at joint 15, 362 lb uplift at joint 2, 790 lb uplift at joint 24 and 603 lb uplift at joint 17.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

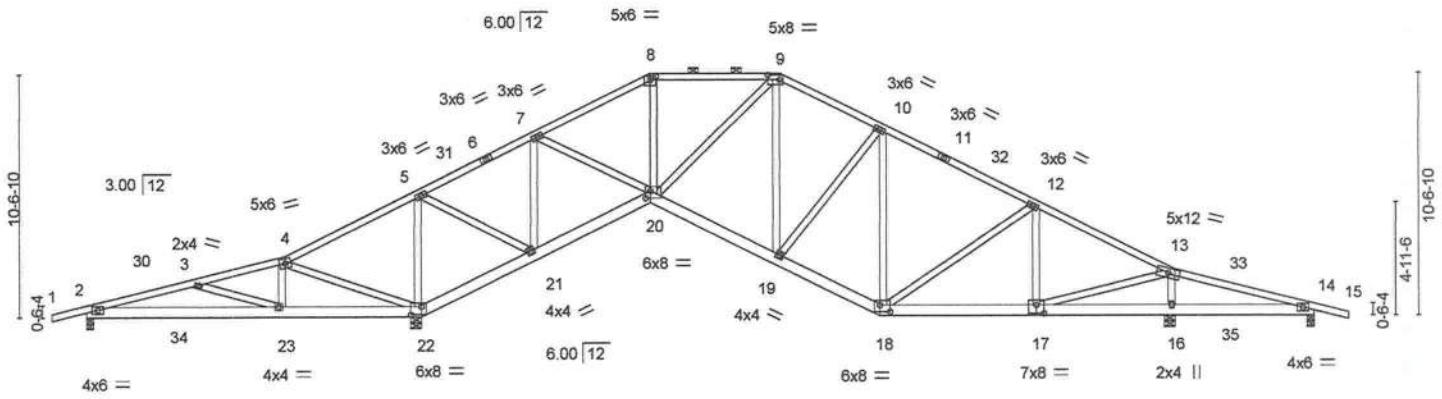
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851218
4011229	T03	Piggyback Base	6	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:01 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-n09WWsyCTErlbSzBtz2r9BPvuVC8rMrDem1yRczGufe

1-6-0	4-10-0	8-7-0	14-5-8	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	47-0-0	53-0-0	54-6-0
1-6-0	4-10-0	3-9-0	5-10-8	4-10-8	5-0-4	5-7-0	4-3-12	6-9-0	6-0-0	6-0-0	1-6-0

Scale = 1:99.9



8-7-0	14-2-12	14-5-8	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	47-0-0	53-0-0
8-7-0	5-7-12	0-2-12	4-10-8	5-0-4	5-7-0	4-3-12	6-9-0	6-0-0	6-0-0

Plate Offsets (X,Y)-- [8:0-3-0,0-2-0], [9:0-6-0,0-2-8], [17:0-4-0,0-4-8], [18:0-5-4,0-3-8], [20:0-2-8,0-3-12], [22:0-5-8,0-4-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.54	Vert(LL)	-0.06	19	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.26	Vert(CT)	-0.11	19-20	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.73	Horz(CT)	0.06	16	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 348 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x6 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-11-10 oc purlins, except
2-0-0 oc purlins (5-5-0 max.): 8-9.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 0-3-8 except (jt=length) 22=0-5-8, 16=0-5-8.
(lb) - Max Horz 2=224(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) except 2=-371(LC 8), 22=-852(LC 12), 16=-565(LC 13), 14=-278(LC 9)
Max Grav All reactions 250 lb or less at joint(s) except 2=319(LC 25), 22=2225(LC 1), 16=1332(LC 1), 14=264(LC 26)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-204/492, 3-4=-173/513, 4-5=-574/1114, 5-7=-294/150, 7-8=-1074/483, 8-9=-903/474, 9-10=-1037/685, 10-12=-1096/657, 12-13=-1209/581
BOT CHORD 2-23=-350/187, 22-23=-455/257, 21-22=-1109/845, 20-21=0/428, 19-20=-219/993, 18-19=-357/1030, 17-18=-389/1025
WEBS 3-23=-450/387, 4-23=-364/395, 4-22=-582/633, 5-22=-1447/685, 5-21=-498/1262, 7-20=-340/859, 8-20=-9/262, 9-20=-19/305, 9-19=-298/238, 10-19=-101/308, 10-18=-258/130, 13-17=-472/1218, 13-16=-1128/550, 7-21=-1050/500

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 3-9-10, Zone1 3-9-10 to 24-4-4, Zone3 24-4-4 to 29-11-4, Zone2 29-11-4 to 37-5-3, Zone1 37-5-3 to 54-6-0 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Provide adequate drainage to prevent water ponding.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 371 lb uplift at joint 2, 852 lb uplift at joint 22, 565 lb uplift at joint 16 and 278 lb uplift at joint 14.
8) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

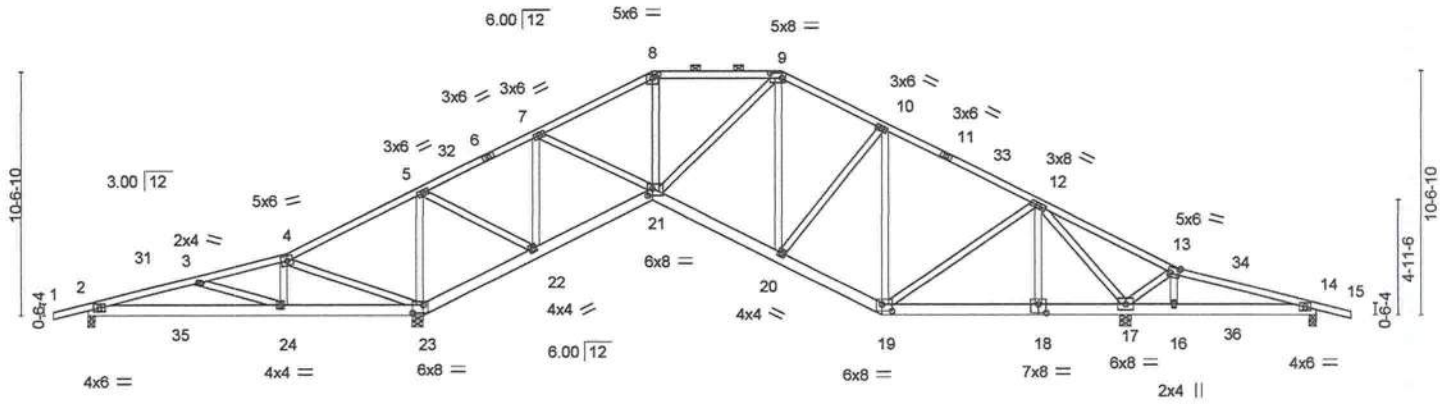
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851219
4011229	T04	Piggyback Base	4	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:02 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-FCjujCyqEXzcCbYORha4iOy4zvZ3anWNtQnW_2zGufd

1-6-0	4-10-0	8-7-0	14-5-8	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	47-0-0	53-0-0	54-6-0
1-6-0	4-10-0	3-9-0	5-10-8	4-10-8	5-0-4	5-7-0	4-3-12	6-9-0	6-0-0	6-0-0	1-6-0

Scale = 1:99.9



8-7-0	14-2-12	14-5-8	19-4-0	24-4-4	29-11-4	34-3-0	41-0-0	44-9-4	47-0-0	53-0-0
8-7-0	5-7-12	0-2-12	4-10-8	5-0-4	5-7-0	4-3-12	6-9-0	3-9-4	2-2-12	6-0-0

Plate Offsets (X,Y)— [8:0-3-0,0-2-0], [9:0-6-0,0-2-8], [13:0-4-12,0-2-12], [18:0-4-0,0-4-8], [19:0-5-4,0-3-8], [21:0-2-8,0-3-12], [23:0-5-8,0-4-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.52	Vert(LL)	0.05	24-27	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.22	Vert(CT)	-0.09	20-21	>999	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.90	Horz(CT)	0.06	17	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 351 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x6 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 5-8-7 oc purlins, except 2-0-0 oc purlins (5-8-9 max.): 8-9.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

REACTIONS. All bearings 0-3-8 except (jt=length) 23=0-5-8, 17=0-5-8.
(lb) - Max Horz 2=224(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) except 2=-378(LC 8), 23=-823(LC 12), 17=-585(LC 13), 14=-299(LC 9)
Max Grav All reactions 250 lb or less at joint(s) except 2=338(LC 25), 23=2097(LC 1), 17=1379(LC 1), 14=312(LC 26)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-272/516, 3-4=-143/424, 4-5=-524/1011, 5-7=-300/151, 7-8=-976/429, 8-9=-815/426, 9-10=-901/613, 10-12=-901/553, 12-13=-157/376
BOT CHORD 2-24=-373/253, 23-24=-340/207, 22-23=-1003/793, 21-22=0/433, 20-21=-146/856, 19-20=-253/833, 18-19=-166/594, 17-18=-166/594
WEBS 3-24=-444/383, 4-24=-361/391, 4-23=-600/648, 5-23=-1354/638, 5-22=-445/1159, 7-22=-956/451, 7-21=-286/756, 9-21=0/285, 9-20=-258/169, 10-20=-44/271, 10-19=-350/178, 12-17=-1354/660, 13-17=-445/535

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 3-9-10, Zone1 3-9-10 to 24-4-4, Zone3 24-4-4 to 29-11-4, Zone2 29-11-4 to 37-5-3, Zone1 37-5-3 to 54-6-0 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Provide adequate drainage to prevent water ponding.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 378 lb uplift at joint 2, 823 lb uplift at joint 23, 585 lb uplift at joint 17 and 299 lb uplift at joint 14.
8) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

This item has been digitally signed and sealed by ORegan, Philip, PE on the date indicated here. Printed copies of this document are not considered signed and sealed and the signature must be verified on any electronic copies.

Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

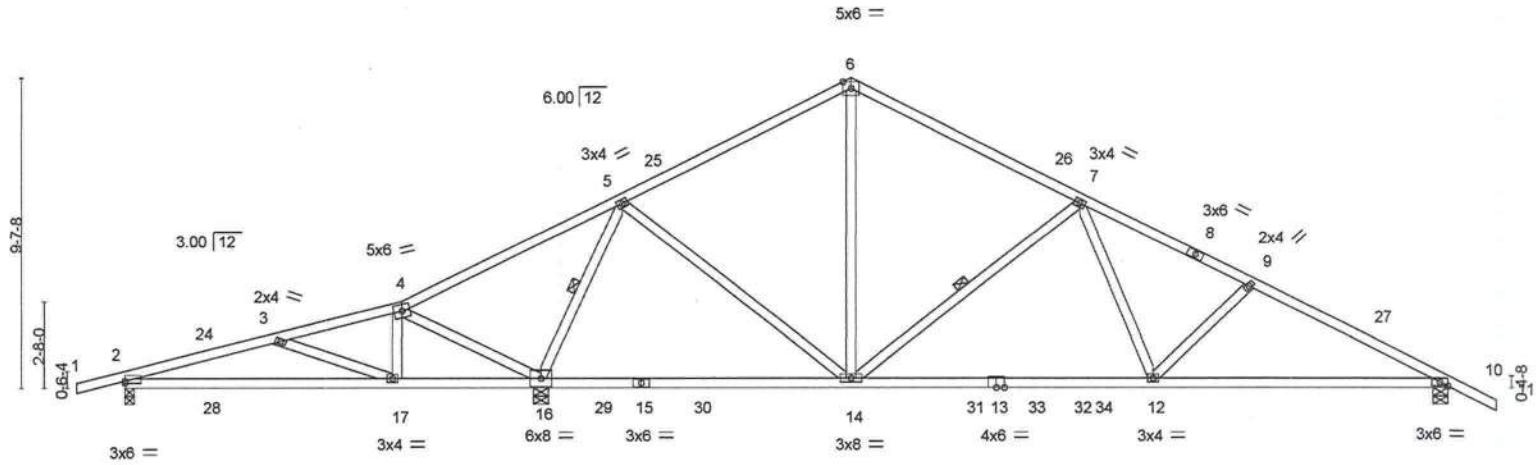
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851220
4011229	T05	Roof Special	4	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:03 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-jOHGwYzT?r5Sql7a?O5JFcVCBJkoJLLW64W3WUzGufc

1-6-0	4-10-0	8-7-0	15-4-15	22-6-0	29-7-0	34-10-0	41-0-0	42-6-0
1-6-0	4-10-0	3-9-0	6-9-15	7-1-1	7-1-0	5-3-0	6-2-0	1-6-0

Scale = 1:71.7



8-7-0	12-10-12	22-6-0	31-10-4	41-0-0
8-7-0	4-3-12	9-7-4	9-4-5	9-1-12

Plate Offsets (X,Y)-- [2:0-0-0,0-0-13], [10:0-2-15,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.68	Vert(LL)	-0.24	14-16	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.95	Vert(CT)	-0.41	14-16	>828	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.41	Horz(CT)	0.04	10	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 213 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 3-9-5 oc purlins.
BOT CHORD Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS 1 Row at midpt 5-16, 7-14

REACTIONS. (size) 2=0-3-8, 16=0-5-8, 10=0-5-8
Max Horz 2=-228(LC 13)
Max Uplift 2=-362(LC 8), 16=-742(LC 12), 10=-464(LC 13)
Max Grav 2=392(LC 27), 16=1990(LC 2), 10=1109(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-459/451, 4-5=-357/762, 5-6=-782/406, 6-7=-778/393, 7-9=-1606/649, 9-10=-1783/712
BOT CHORD 2-17=-368/436, 16-17=-244/292, 14-16=-12/298, 12-14=-279/1180, 10-12=-515/1568
WEBS 3-17=-443/367, 4-17=-332/335, 4-16=-576/594, 5-16=-1563/759, 5-14=-228/759, 6-14=-136/395, 7-14=-716/474, 7-12=-149/580, 9-12=-285/263

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 2-7-3, Zone1 2-7-3 to 22-6-0, Zone2 22-6-0 to 28-3-9, Zone1 28-3-9 to 42-6-0 zone; porch left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 362 lb uplift at joint 2, 742 lb uplift at joint 16 and 464 lb uplift at joint 10.

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Philip J. O'Regan PE No.58126
MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851221
4011229	T06	Roof Special	3	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:03 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-jOHGwYzT?r5Sql7a?O5JFcVEbJkAJIBW64W3WUzGufc

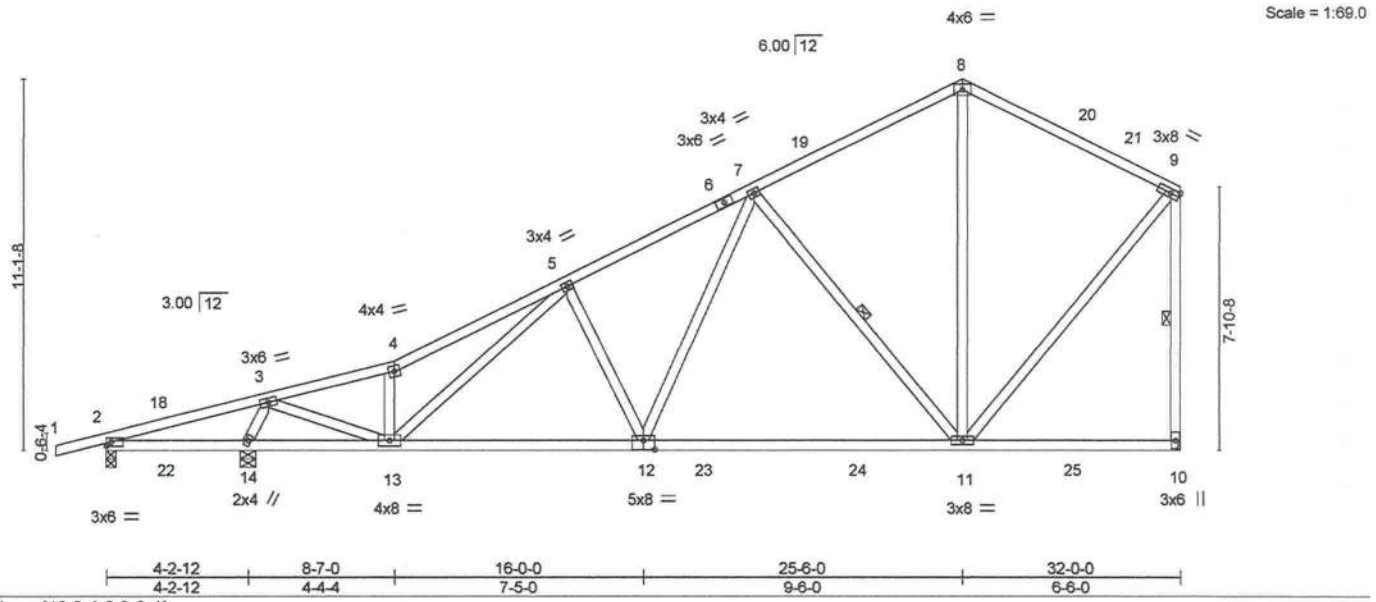

Plate Offsets (X,Y)-- [12:0-4-0,0-3-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.53	Vert(LL)	-0.30	11-12	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.93	Vert(CT)	-0.48	11-12	>691	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.61	Horz(CT)	0.03	10	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 198 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-4-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS 1 Row at midpt 7-11, 9-10

REACTIONS. (size) 2=0-3-8, 14=0-5-8, 10=Mechanical
Max Horz 2=453(LC 12)
Max Uplift 2=-188(LC 8), 14=-644(LC 12), 10=-421(LC 12)
Max Grav 2=33(LC 25), 14=1567(LC 2), 10=1141(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-480/743, 3-4=-1479/412, 4-5=-1641/558, 5-7=-1428/519, 7-8=-664/341, 8-9=-660/348, 9-10=-1034/555
BOT CHORD 2-14=-694/77, 12-13=-712/1340, 11-12=-502/969
WEBS 3-14=-1496/685, 3-13=-542/1565, 4-13=-522/300, 5-12=-315/288, 7-12=-228/666, 7-11=-698/463, 8-11=-55/318, 9-11=-325/823

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 1-8-6, Zone1 1-8-6 to 25-6-0, Zone2 25-6-0 to 30-0-5, Zone1 30-0-5 to 31-10-4 zone; porch left exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 188 lb uplift at joint 2, 644 lb uplift at joint 14 and 421 lb uplift at joint 10.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.
4011229	T06G	GABLE	1	1	T33851222
					Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:04 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-Bbre8u_5m9DJSvimZ5cYnp1M6j3a2kWfKkGc2xzGufb

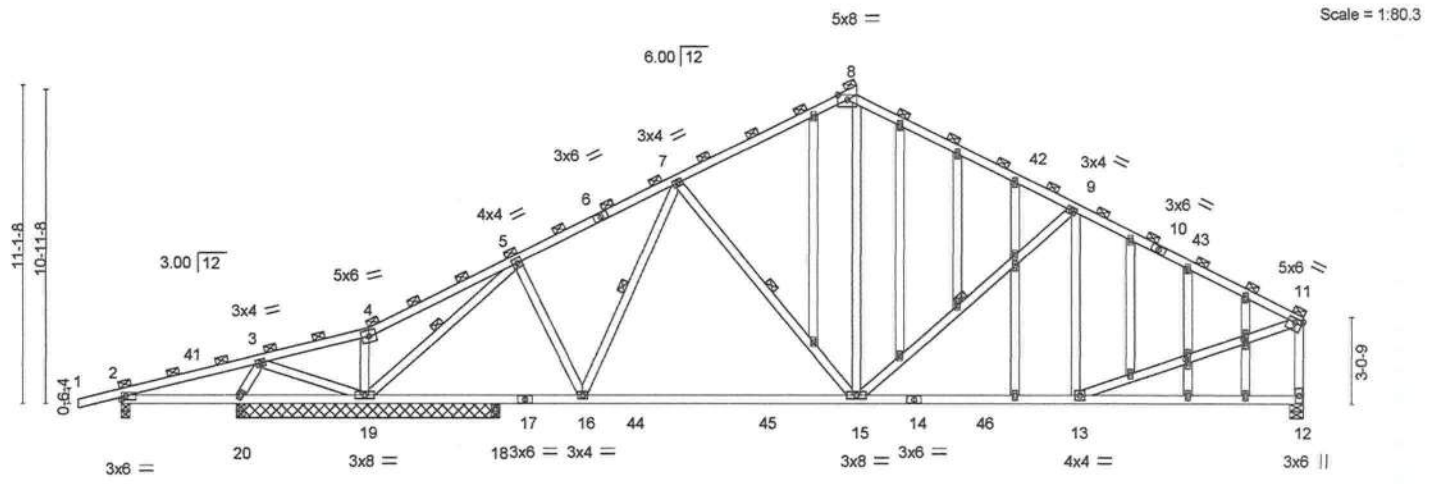

Plate Offsets (X,Y)-- [11:Edge,0-1-12], [25:0-1-11,0-1-0], [28:0-1-11,0-1-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.74	Vert(LL)	-0.32	15-16	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.98	Vert(CT)	-0.54	15-16	>625	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.67	Horz(CT)	0.05	12	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 303 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x4 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (3-10-11 max.), except end verticals.
BOT CHORD	Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS	1 Row at midpt 5-19, 7-16, 7-15, 9-15

REACTIONS. All bearings 9-1-8 except (jt=length) 2=0-3-8, 12=0-5-8, 18=0-3-8.
(lb) - Max Horz 2=315(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 18 except 2=-177(LC 8), 19=-633(LC 12), 12=-440(LC 13), 20=-100(LC 8)
Max Grav All reactions 250 lb or less at joint(s) 20, 20, 18 except 2=252(LC 25), 19=1599(LC 2), 12=1312(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

TOP CHORD	4-5=-134/292, 5-7=-1410/583, 7-8=-1194/606, 8-9=-1245/639, 9-11=-1445/616, 11-12=-1189/619
BOT CHORD	18-19=-491/1112, 16-18=-491/1112, 15-16=-452/1191, 13-15=-411/1234
WEBS	3-19=-298/221, 5-19=-1761/657, 5-16=-1/314, 7-15=-340/313, 8-15=-316/765, 9-15=-334/320, 11-13=-410/1247

NOTES-

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 2-7-3, Zone1 2-7-3 to 25-4-1, Zone2 25-4-1 to 31-1-10, Zone1 31-1-10 to 40-10-4 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) All plates are 2x4 MT20 unless otherwise indicated.
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18 except (jt=lb) 2=177, 19=633, 12=440, 20=100.
10) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851223
4011229	T07	Roof Special	5	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:05 2024 Page 1
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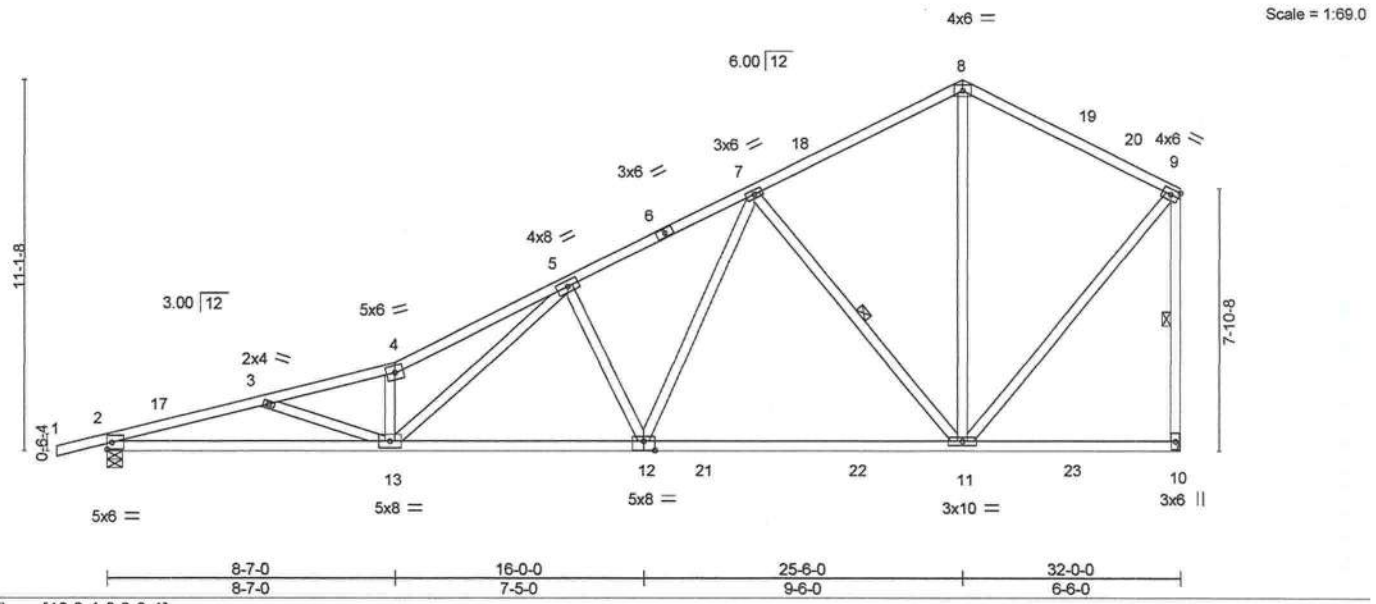

Plate Offsets (X,Y)-- [12:0-4-0,0-3-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.88	Vert(LL)	-0.36	11-12	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	1.00	Vert(CT)	-0.61	11-12	>629	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.80	Horz(CT)	0.08	10	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 196 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.1
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS 1 Row at midpt 7-11, 9-10

REACTIONS. (size) 2=0-5-8, 10=Mechanical
Max Horz 2=453(LC 12)
Max Uplift 2=-537(LC 12), 10=-505(LC 12)
Max Grav 2=1354(LC 2), 10=1345(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-3671/1394, 3-4=-3565/1251, 4-5=-3972/1495, 5-7=-2026/766, 7-8=-798/384, 8-9=-794/391, 9-10=-1238/620
BOT CHORD 2-13=-1741/3513, 12-13=-1020/2091, 11-12=-640/1302
WEBS 3-13=-136/271, 4-13=-1108/554, 5-13=-798/1950, 5-12=-781/494, 7-12=-442/1180, 7-11=-1031/604, 8-11=-104/435, 9-11=-402/1011

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-6-0 to 1-8-6, Zone1 1-8-6 to 25-6-0, Zone2 25-6-0 to 30-0-5, Zone1 30-0-5 to 31-10-4 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=537, 10=505.

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MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851224
4011229	T07G	GABLE	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:06 2024 Page 1
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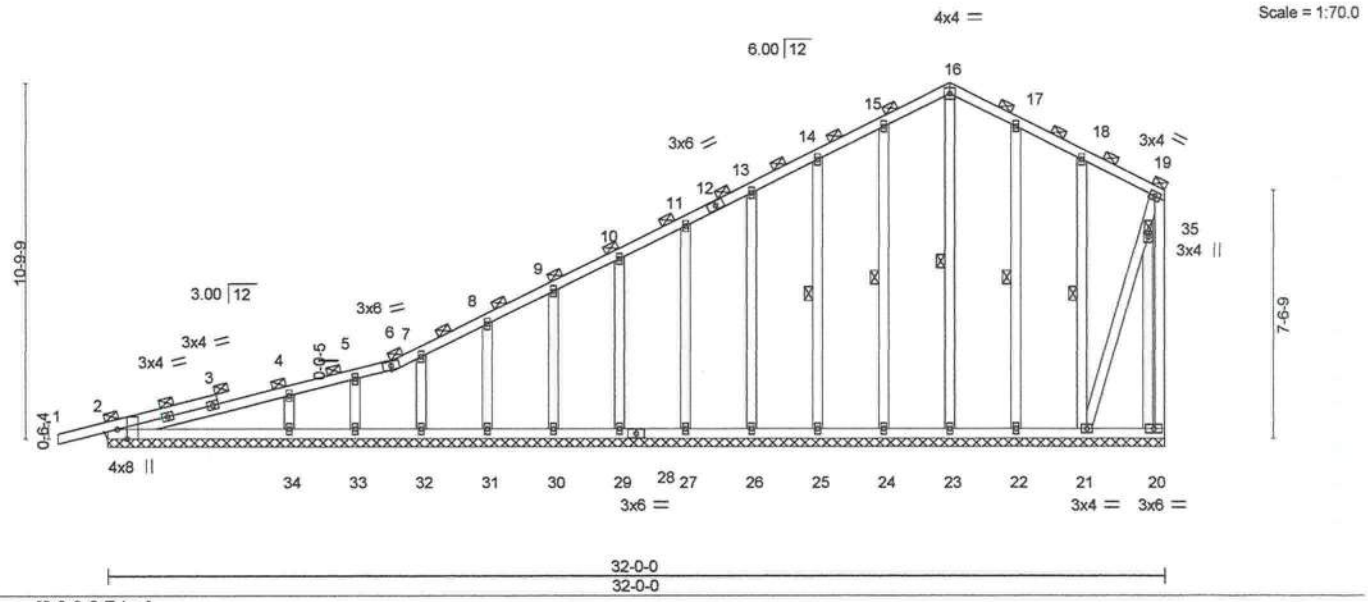

Plate Offsets (X,Y)-- [2:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.28	Vert(LL)	-0.00	1	n/r	120	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.21	Vert(CT)	0.01	1	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.12	Horz(CT)	-0.00	21	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 251 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x4 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (6-0-0 max.), except end verticals.
BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing, Except: 10-0-0 oc bracing: 20-21.
WEBS	1 Row at midpt 16-23, 15-24, 14-25, 17-22, 18-21
JOINTS	1 Brace at Jt(s): 6, 16, 35, 19

REACTIONS. All bearings 32-0-0.
(lb) - Max Horz 2=439(LC 12)
Max Uplift All uplift 100 lb or less at joint(s) 20, 24, 25, 26, 27, 29, 30, 32, 33, 22 except 2=-159(LC 8), 31=-103(LC 12), 34=-183(LC 12), 21=-157(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 20, 23, 24, 25, 26, 27, 29, 30, 31, 32, 33, 22, 21 except 2=267(LC 25), 34=378(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-543/145, 4-5=-448/108, 5-6=-438/108, 6-7=-440/116, 7-8=-382/99, 8-9=-291/77
WEBS 4-34=-263/353

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) All plates are 2x4 MT20 unless otherwise indicated.
6) Gable requires continuous bottom chord bearing.
7) Gable studs spaced at 2-0-0 oc.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 20, 24, 25, 26, 27, 29, 30, 32, 33, 22 except (jt=lb) 2=159, 31=103, 34=183, 21=157.
11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851225
4011229	T08	Scissor	2	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:07 2024 Page 1
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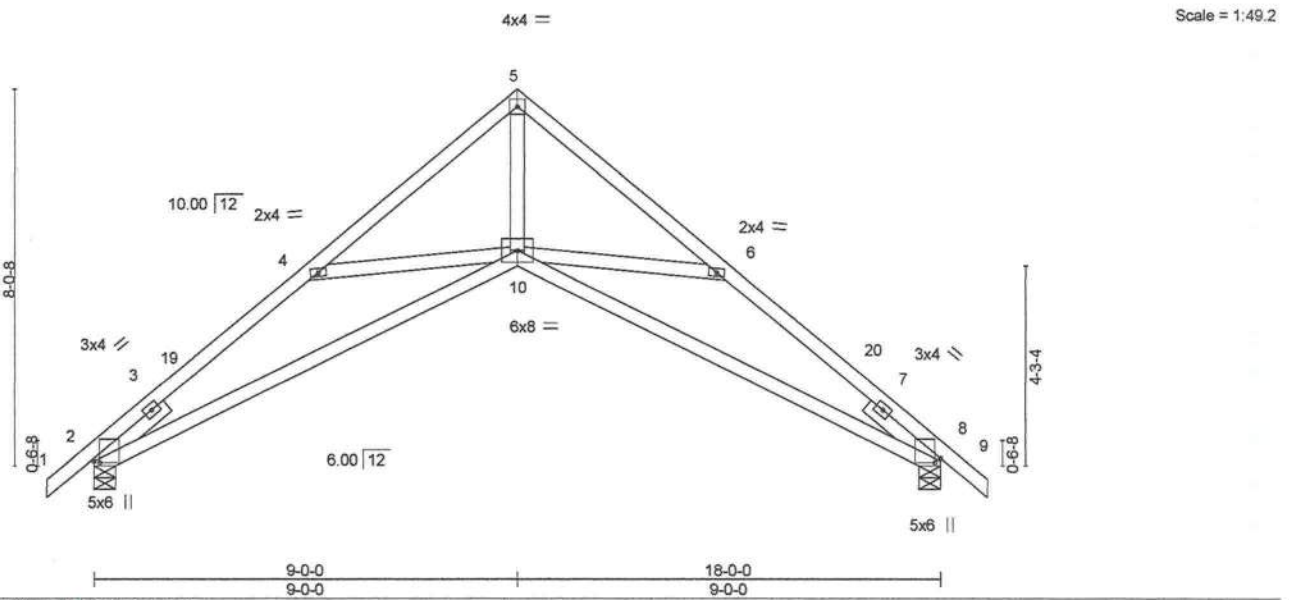

Plate Offsets (X,Y)— [2:0-0-5,0-1-7], [8:0-1-2,0-1-7]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.28	Vert(LL)	-0.13	10-13	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.64	Vert(CT)	-0.28	10-13	>767	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.47	Horz(CT)	0.19	8	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 93 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3
SLIDER Left 2x4 SP No.3 1-11-8, Right 2x4 SP No.3 1-11-8

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-5-4 oc purlins.
BOT CHORD Rigid ceiling directly applied or 7-5-13 oc bracing.

REACTIONS. (size) 2=0-5-8, 8=0-5-8
Max Horz 2=266(LC 11)
Max Uplift 2=-268(LC 12), 8=-268(LC 13)
Max Grav 2=720(LC 1), 8=720(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-1607/677, 4-5=-1245/358, 5-6=-1278/400, 6-8=-1553/567
BOT CHORD 2-10=-622/1547, 8-10=-364/1307
WEBS 5-10=-334/1328, 6-10=-373/458, 4-10=-371/423

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 -1-0-0 to 2-0-0, Zone1 2-0-0 to 9-0-0, Zone2 9-0-0 to 13-5-14, Zone1 13-5-14 to 19-0-0 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
6) Bearing at joint(s) 2, 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=268, 8=268.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851226
4011229	T09	Scissor	5	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:07 2024 Page 1
ID:2oQflg4xNCqI7jjUsLHaTJzKIBw-bAWnmv0z34buJNQLEE9FPSf_4w9VF8R60iUHfFzGufY

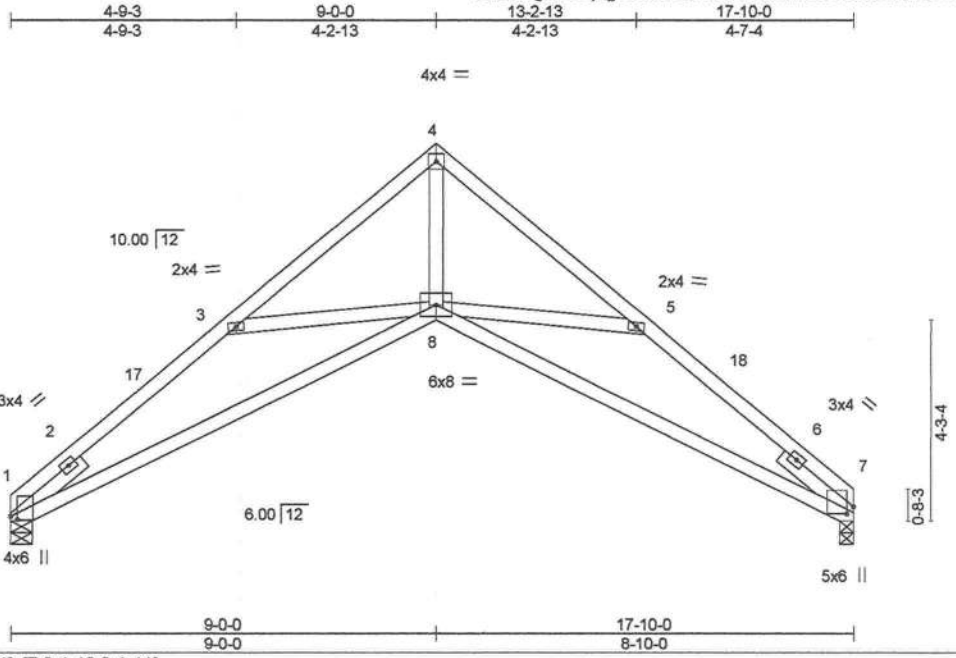

Plate Offsets (X,Y)-- [1:0-0-13,0-1-11], [7:0-1-12,0-1-11]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.31	Vert(LL)	-0.13	8-11	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.65	Vert(CT)	-0.28	8-11	>752	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.47	Horz(CT)	0.19	7	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-MS							Weight: 88 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3
SLIDER Left 2x4 SP No.3 1-11-8, Right 2x4 SP No.3 1-11-8

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-4-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 7-2-4 oc bracing.

REACTIONS. (size) 1=0-5-8, 7=0-3-8
Max Horz 1=238(LC 9)
Max Uplift 1=-231(LC 12), 7=-229(LC 13)
Max Grav 1=660(LC 1), 7=660(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-3=-1582/712, 3-4=-1233/392, 4-5=-1241/433, 5-7=-1516/647
BOT CHORD 1-8=-676/1513, 7-8=-443/1270
WEBS 3-8=-370/424, 4-8=-375/1282, 5-8=-349/442

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-0-0 to 3-0-0, Zone1 3-0-0 to 9-0-0, Zone2 9-0-0 to 13-5-14, Zone1 13-5-14 to 17-10-0 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
6) Bearing at joint(s) 1, 7 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 1=231, 7=229.

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MiTek Inc. DBA MiTek USA FL Cert 6634
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.
4011229	T10	Flat Girder	1	2	T33851227

Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:08 2024 Page 1
ID:2oQfIg4xNCql7jjUsLHaTJzKIBw-3M49_F1bqNjlwW?XoxgUxfC4RKcq_ZCFFMEqBizGufX

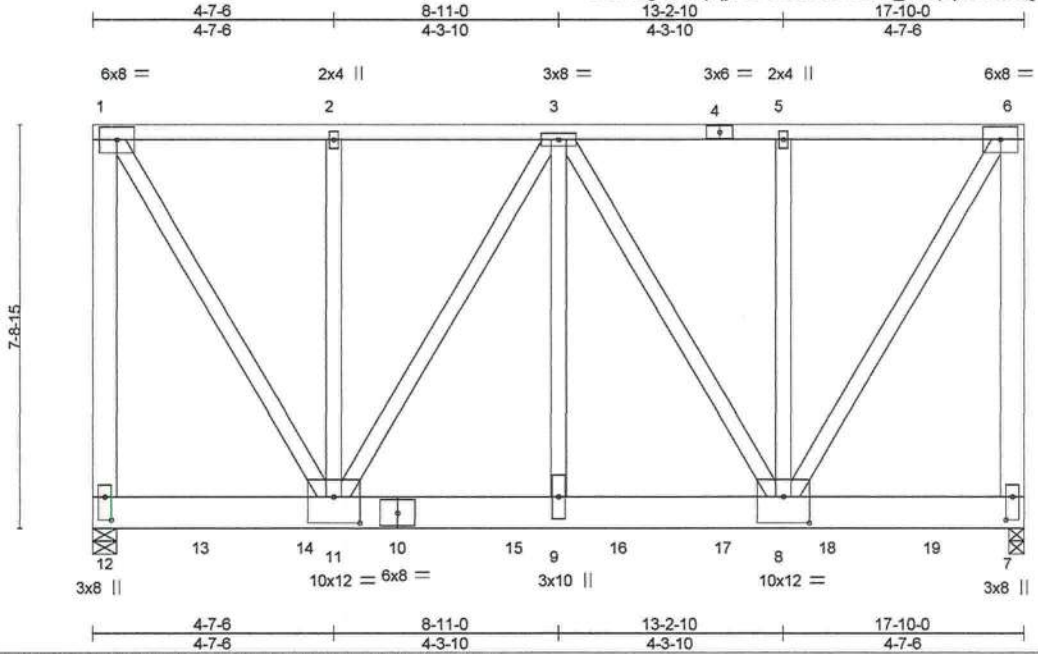

Plate Offsets (X,Y)-- [7:0-5-4,0-1-8], [8:0-6-0,0-6-0], [11:0-6-0,0-6-0], [12:0-5-4,0-1-8]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.59	Vert(LL)	-0.06	9	>999	240	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.19	Vert(CT)	-0.11	9	>999	180		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.63	Horz(CT)	0.01	7	n/a	n/a		
BCDL	10.0	Code	FBC2023/TPI2014	Matrix-MS							Weight: 382 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x8 SP 2400F 2.0E
WEBS 2x4 SP No.2 *Except*
1-12,6-7: 2x6 SP No.2, 2-11,3-9,5-8: 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 12=0-5-8, 7=0-3-8
Max Horz 12=-253(LC 6)
Max Uplift 12=-2303(LC 4), 7=-2218(LC 5)
Max Grav 12=5659(LC 2), 7=5439(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-12=-4864/1999, 1-2=-2899/1231, 2-3=-2899/1231, 3-5=-2761/1125, 5-6=-2761/1125, 6-7=-4636/1931
BOT CHORD 9-11=-1509/3648, 8-9=-1509/3648
WEBS 1-11=-2236/5552, 3-11=-1474/636, 3-9=-951/2574, 3-8=-1746/756, 6-8=-2151/5288

NOTES-
1) 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc, 2x4 - 1 row at 0-9-0 oc.
Bottom chords connected as follows: 2x8 - 2 rows staggered at 0-7-0 oc.
Webs connected as follows: 2x4 - 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 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone; end vertical left exposed; Lumber DOL=1.60 plate grip DOL=1.60
4) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
5) Provide adequate drainage to prevent water ponding.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 12=2303, 7=2218.
9) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1325 lb down and 525 lb up at 2-0-12, 1325 lb down and 525 lb up at 4-0-12, 1325 lb down and 525 lb up at 6-0-12, 1325 lb down and 525 lb up at 8-0-12, 1325 lb down and 525 lb up at 10-0-12, 1121 lb down and 441 lb up at 12-0-12, and 1121 lb down and 441 lb up at 14-0-12, and 1121 lb down and 441 lb up at 16-0-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

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Date:

May 14,2024

Continued on page 2

MiTek®
16023 Swingley Ridge Rd.

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25
   Uniform Loads (plf)
   Vert: 1-6=-54, 7-12=-20
   Concentrated Loads (lb)
   Vert: 10=-1157(F) 13=-1157(F) 14=-1157(F) 15=-1157(F) 16=-1157(F) 17=-971(F) 18=-971(F) 19=-971(F)

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.
4011229	T11G	Monopitch Supported Gable	1	1	T33851228

Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:09 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-YYeXBb2DbhrcYgakLfCjUtkK?kz3j8UPU0zNk8zGufW

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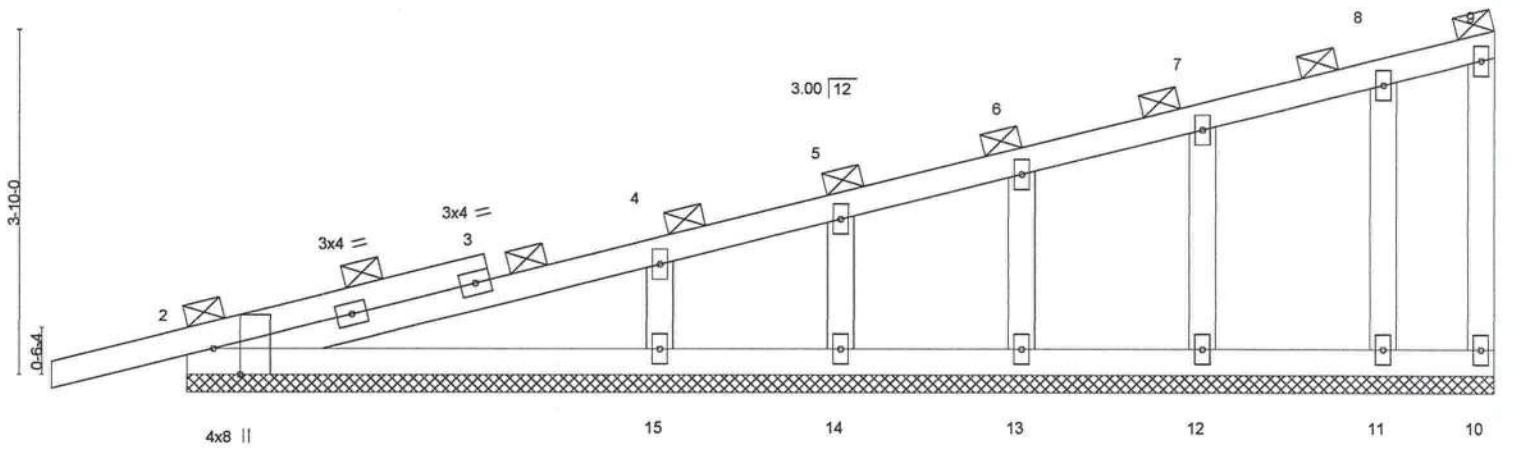
Scale = 1:25.6



14-5-8 / 14-5-8

Plate Offsets (X,Y)-- [2:0-3-8,Edge]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.28	Vert(LL)	0.00	1	n/r	120	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.19	Vert(CT)	0.00	1	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.11	Horz(CT)	-0.00	10	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 70 lb	FT = 20%

LUMBER-

TOP CHORD	2x4 SP No.2
BOT CHORD	2x4 SP No.2
WEBS	2x4 SP No.3
OTHERS	2x4 SP No.3

BRACING-

TOP CHORD	2-0-0 oc purlins (6-0-0 max.), except end verticals.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 14-5-8.
(lb) - Max Horz 2=184(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 10, 14, 13, 12, 11 except 2=-148(LC 8), 15=-168(LC 12)
Max Grav All reactions 250 lb or less at joint(s) 10, 14, 13, 12, 11 except 2=260(LC 1), 15=352(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-4=-273/82
WEBS 4-15=-245/377

NOTES-

1) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone; porch left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) All plates are 2x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10, 14, 13, 12, 11 except (jt=lb) 2=148, 15=168.
10) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851229
4011229	V01	GABLE	1	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:09 2024 Page 1
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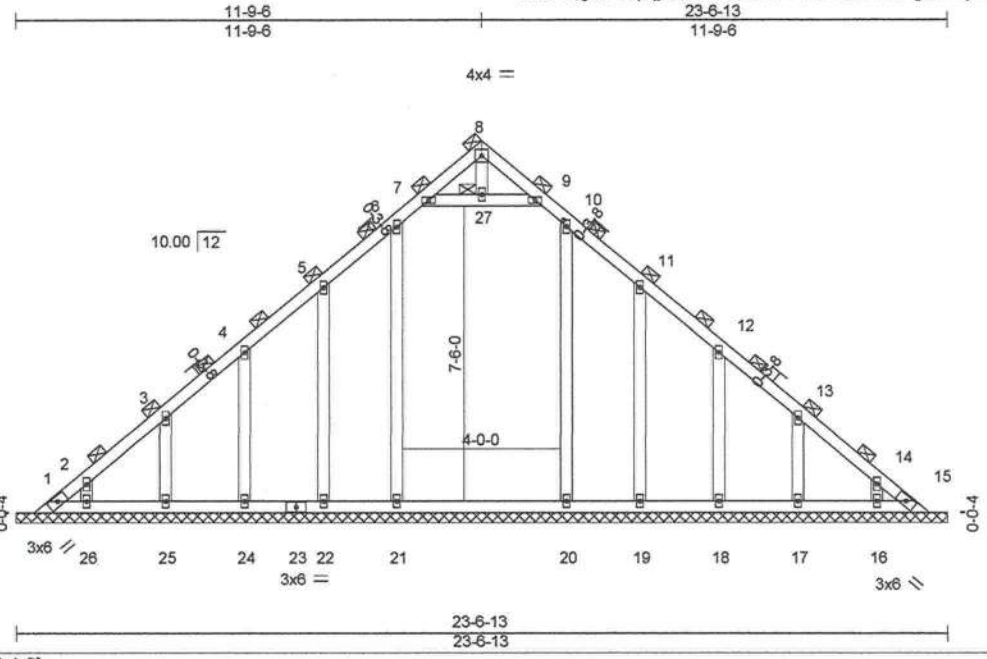

Plate Offsets (X,Y)-- [10:0-1-15,0-1-0]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.09	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.16	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.17	Horz(CT)	0.01	15	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 139 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.3
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD 2-0-0 oc purlins (6-0-0 max.).
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
JOINTS 1 Brace at Jt(s): 8, 27

REACTIONS. All bearings 23-6-13.
(lb) - Max Horz 1=-290(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 15, 21 except 1=-128(LC 10), 22=-151(LC 12), 24=-138(LC 12), 25=-144(LC 12), 26=-118(LC 12), 19=-157(LC 13), 18=-137(LC 13), 17=-145(LC 13), 16=-118(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 15, 22, 24, 25, 26, 19, 18, 17, 16 except 21=345(LC 19), 20=302(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-334/220, 14-15=-283/144

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-10-5 to 3-9-6, Zone1 3-9-6 to 11-9-6, Zone2 11-9-6 to 15-9-6, Zone1 15-9-6 to 22-8-8 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) All plates are 2x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 15, 21 except (jt=lb) 1=128, 22=151, 24=138, 25=144, 26=118, 19=157, 18=137, 17=145, 16=118.
9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851230
4011229	V02	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:10 2024 Page 1
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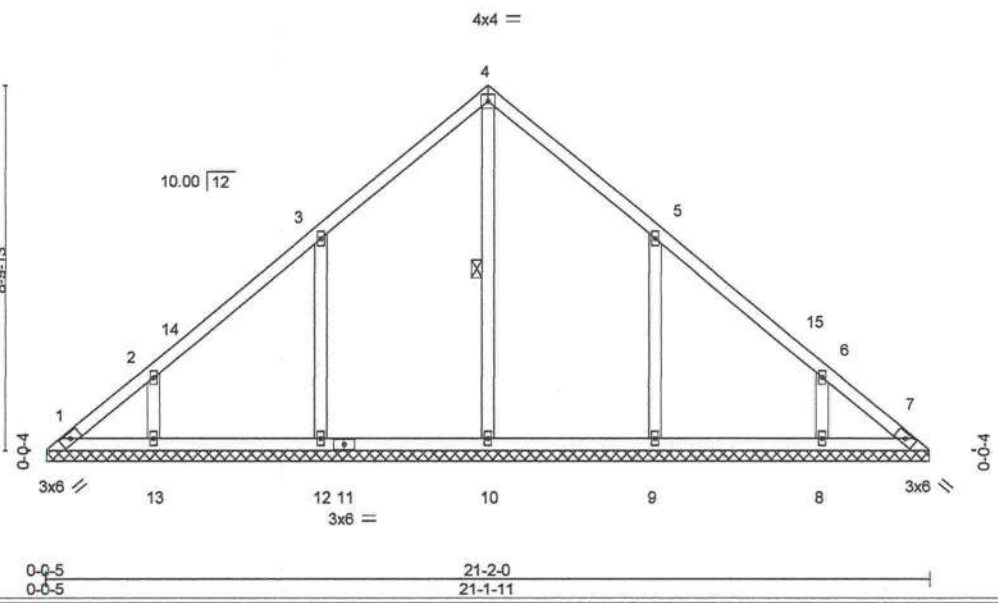

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.21	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.17	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.15	Horz(CT)	0.01	7	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 102 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 4-10

REACTIONS. All bearings 21-1-7.
(lb) - Max Horz 1=-270(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 1, 7 except 12=-310(LC 12), 13=-237(LC 12), 9=-309(LC 13), 8=-237(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 7 except 10=386(LC 22), 12=470(LC 19), 13=343(LC 19), 9=470(LC 20), 8=343(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-293/214
WEBS 3-12=-297/335, 2-13=-225/256, 5-9=-296/334, 6-8=-225/256

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 10-7-0, Zone2 10-7-0 to 14-7-0, Zone1 14-7-0 to 20-9-3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) All plates are 2x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 7 except (jt=lb) 12=310, 13=237, 9=309, 8=237.

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Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851231
4011229	V03	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:11 2024 Page 1
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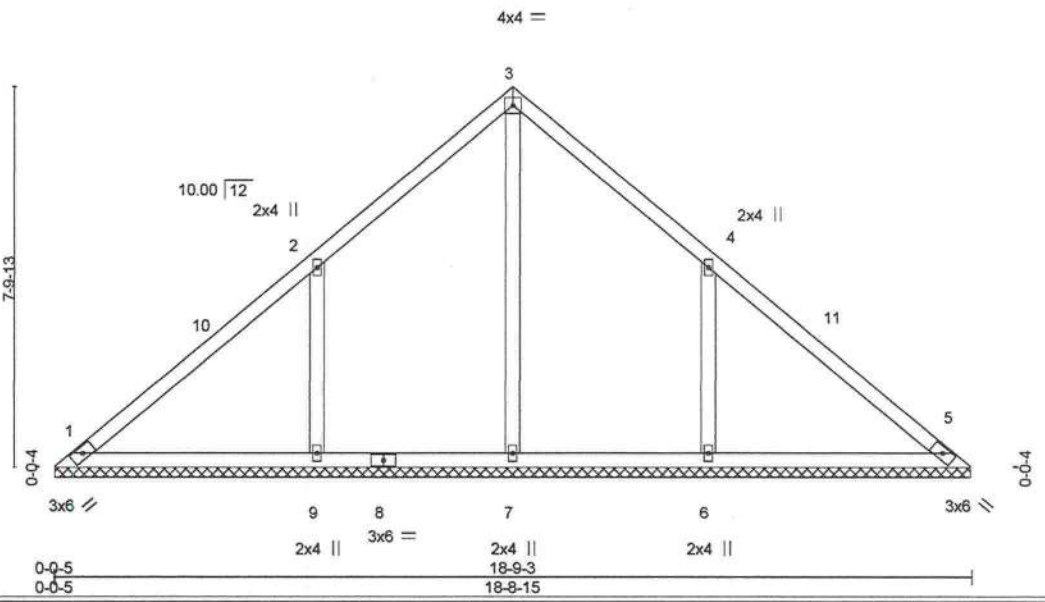

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.28	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.21	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.17	Horz(CT)	0.01	5	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 85 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 18-8-10.
(lb) - Max Horz 1=-238(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 9=-389(LC 12), 6=-389(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=339(LC 22), 9=587(LC 19), 6=587(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-9=-362/402, 4-6=-362/401

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 9-4-10, Zone2 9-4-10 to 13-4-10, Zone1 13-4-10 to 18-4-6 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (jt=lb) 9=389, 6=389.

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Philip J. O'Regan PE No.58126
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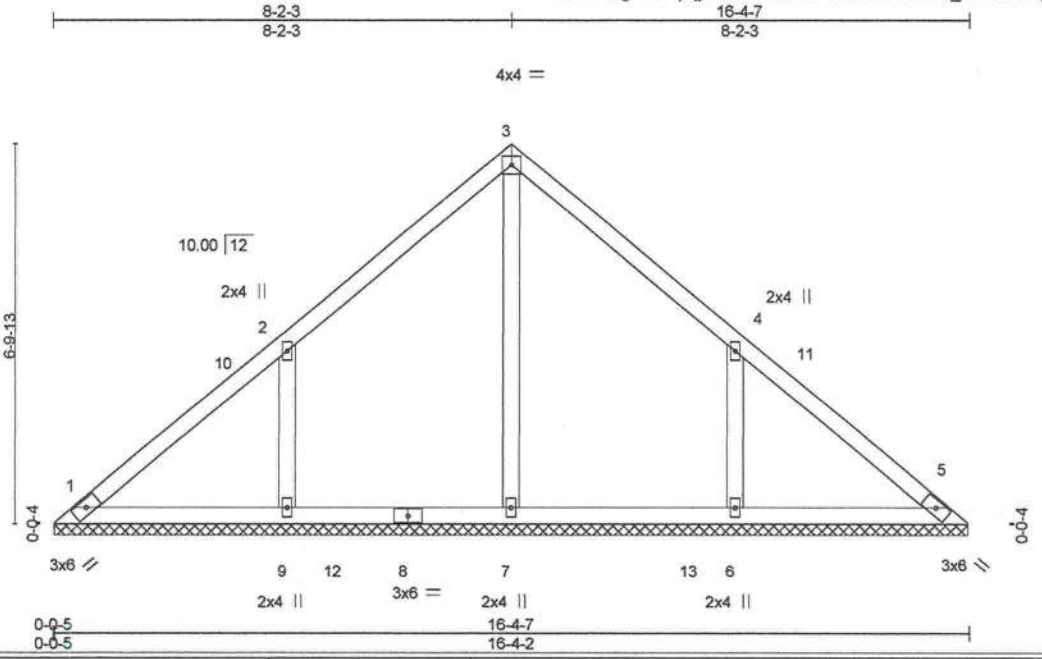
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851232
4011229	V04	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:11 2024 Page 1
ID:2oQfIg4xNCqI7jjUsLHaTJzKIBw-UxmIcH3U6I5Kn_k6T4EBZIqhaXf_B2xhxKSUo1zGufU



LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.21	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.16	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.11	Horz(CT)	0.00	5	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 72 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 16-3-13.
(lb) - Max Horz 1=-207(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 9=-328(LC 12), 6=-328(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=344(LC 22), 9=484(LC 19), 6=484(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-9=-308/343, 4-6=-307/343

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 8-2-3, Zone2 8-2-3 to 12-2-3, Zone1 12-2-3 to 15-11-9 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (jt=lb) 9=328, 6=328.

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Date:

May 14,2024

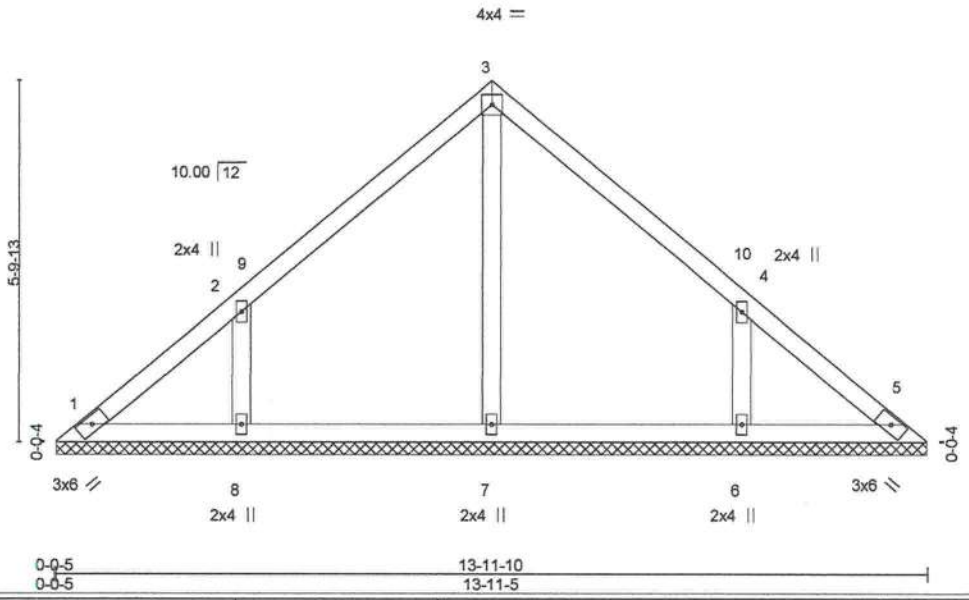
MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851233
4011229	V05	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:12 2024 Page 1
ID:2oQflg4xNCql7jjUsLHaTJzKIBw-y7Kgpd46tcEBP8JJ1nIQ6VMsGx?wwUNrAzC1KTzGufT

6-11-13 / 6-11-13 — 13-11-10 / 6-11-13

Scale = 1:37.0



0-0-5 / 0-0-5 — 13-11-10 / 13-11-5

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.21	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.12	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.10	Horz(CT)	0.00	5	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 60 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 13-11-0.
(lb) - Max Horz 1=-175(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 8=-282(LC 12), 6=-282(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 7 except 8=342(LC 19), 6=342(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-8=-273/343, 4-6=-273/343

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 6-11-13, Zone2 6-11-13 to 10-11-13, Zone1 10-11-13 to 13-6-12 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (jt=lb) 8=282, 6=282.

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Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851234
4011229	V06	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:12 2024 Page 1
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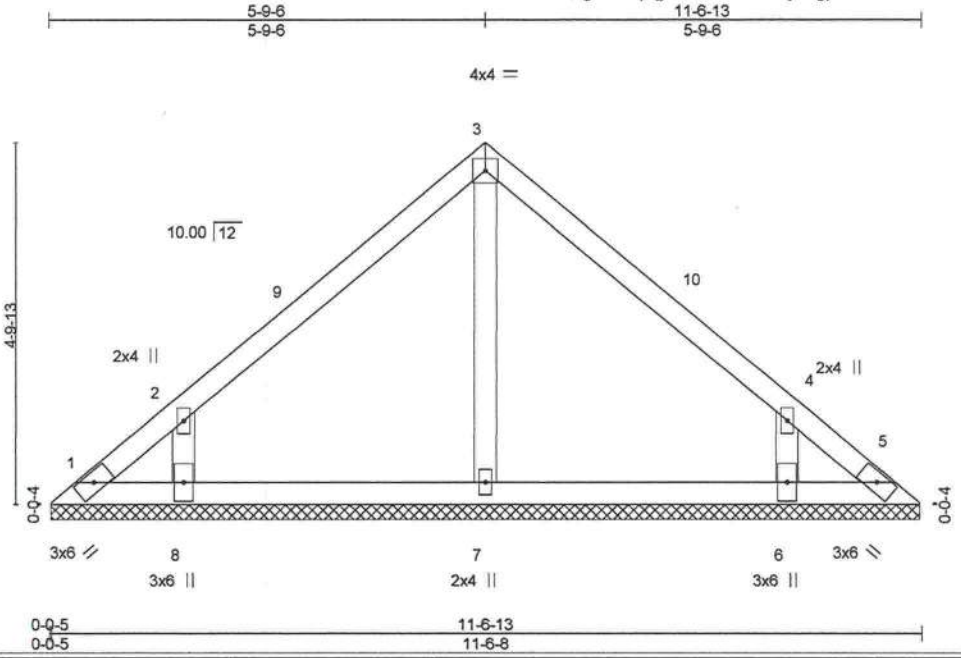

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.23	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.12	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.12	Horz(CT)	0.00	5	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 47 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. All bearings 11-6-3.
(lb) - Max Horz 1=-143(LC 8)
Max Uplift All uplift 100 lb or less at joint(s) 1, 5, 7 except 8=-270(LC 12), 6=-269(LC 13)
Max Grav All reactions 250 lb or less at joint(s) 1, 5, 7 except 8=323(LC 19), 6=323(LC 20)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-8=-278/409, 4-6=-278/409

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 5-9-6, Zone2 5-9-6 to 9-9-6, Zone1 9-9-6 to 11-2-0 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5, 7 except (jt=lb) 8=270, 6=269.

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Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES. T33851235
4011229	V07	Valley	1	1	Job Reference (optional)

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:13 2024 Page 1
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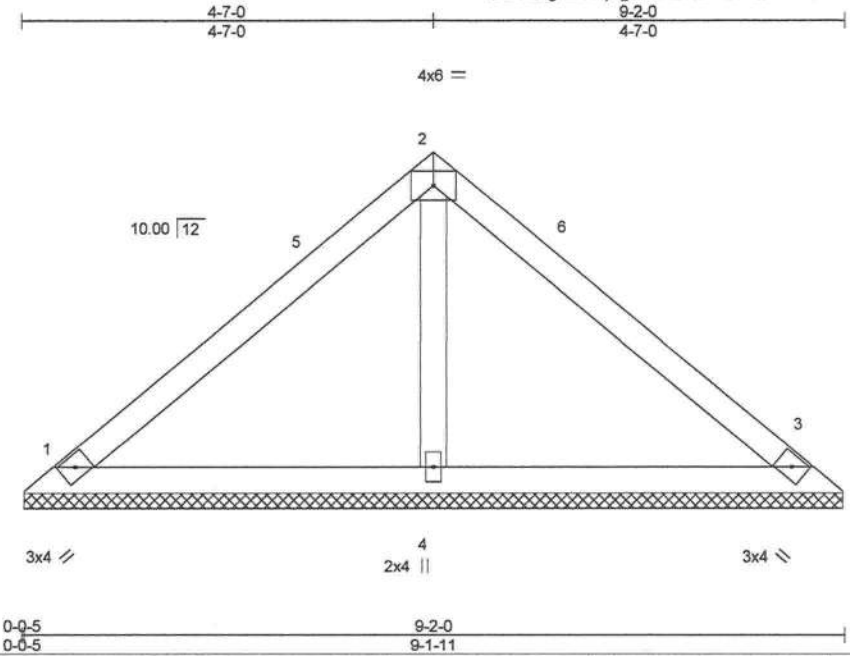

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.38	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.17	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.05	Horz(CT)	0.00	3	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-S							Weight: 35 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=9-1-7, 3=9-1-7, 4=9-1-7
Max Horz 1=-111(LC 8)
Max Uplift 1=-70(LC 13), 3=-83(LC 13), 4=-81(LC 12)
Max Grav 1=163(LC 1), 3=163(LC 1), 4=294(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 0-4-13 to 3-4-13, Zone1 3-4-13 to 4-7-0, Zone3 4-7-0 to 8-9-3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3, 4.

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May 14,2024

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.
4011229	V08	Valley	1	1	T33851236

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:14 2024 Page 1
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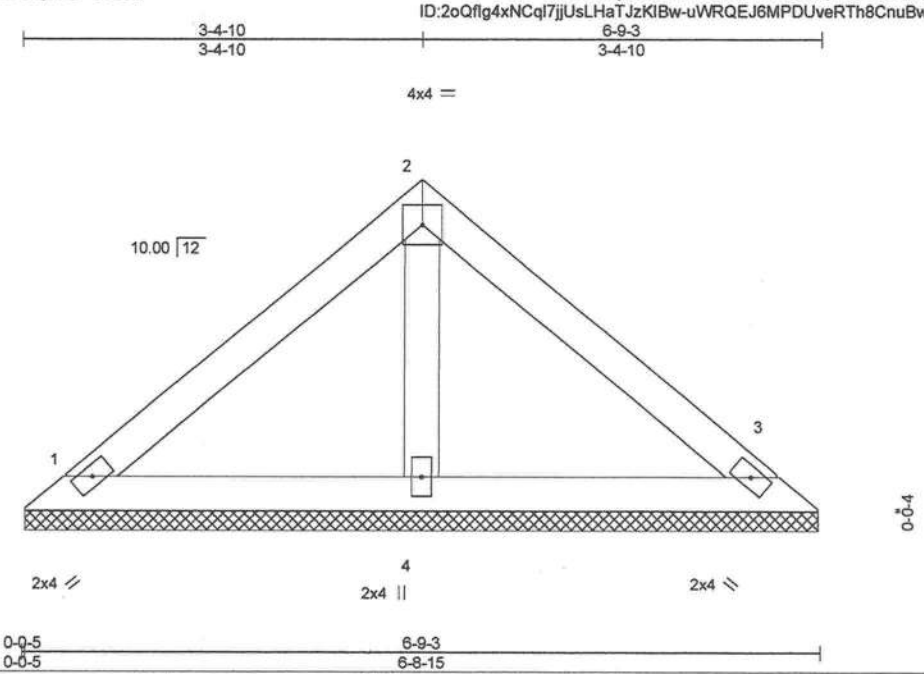

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.33	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.09	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.04	Horz(CT)	0.00	3	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-P							Weight: 25 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=6-8-10, 3=6-8-10, 4=6-8-10
Max Horz 1=-79(LC 8)
Max Uplift 1=-61(LC 13), 3=-71(LC 13), 4=-35(LC 12)
Max Grav 1=125(LC 1), 3=125(LC 1), 4=190(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3, 4.

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16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

MiTek®
16023 Swingley Ridge Rd.

Job	Truss	Truss Type	Qty	Ply	CLARK - MCALHANY RES.	T33851237
4011229	V09	Valley	1	1	Job Reference (optional)	

Builders FirstSource (Lake City,FL), Lake City, FL - 32055, 8.730 s Apr 25 2024 MiTek Industries, Inc. Mon May 13 13:51:14 2024 Page 1
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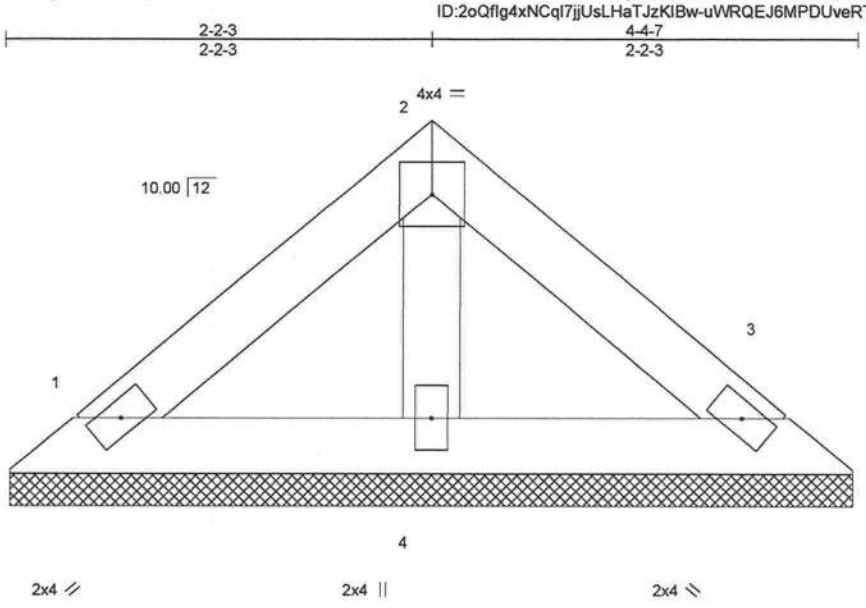

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.12	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	7.0	Lumber DOL	1.25	BC	0.03	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.03	Horz(CT)	0.00	3	n/a	n/a		
BCDL	10.0	Code FBC2023/TPI2014		Matrix-P							Weight: 15 lb	FT = 20%

LUMBER-
TOP CHORD 2x4 SP No.2
BOT CHORD 2x4 SP No.2
OTHERS 2x4 SP No.3

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-4-7 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 1=4-3-13, 3=4-3-13, 4=4-3-13
Max Horz 1=-47(LC 8)
Max Uplift 1=-36(LC 13), 3=-42(LC 13), 4=-21(LC 12)
Max Grav 1=75(LC 1), 3=75(LC 1), 4=114(LC 1)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-22; Vult=130mph (3-second gust) Vasd=101mph; TCDL=4.2psf; BCDL=3.0psf; h=20ft; Cat. II; Exp C; Encl., GCpi=0.18; MWFRS (envelope) gable end zone and C-C Zone3 zone;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Building Designer / Project engineer responsible for verifying applied roof live load shown covers rain loading requirements specific to the use of this truss component.
4) Gable requires continuous bottom chord bearing.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 3, 4.

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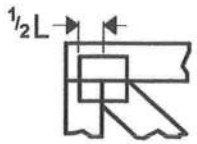
16023 Swingley Ridge Rd. Chesterfield, MO 63017
Date:

May 14,2024

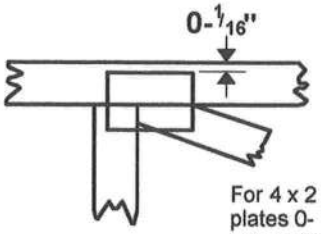
MiTek®
16023 Swingley Ridge Rd.

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 fully embed teeth.



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 software or upon request.

PLATE SIZE

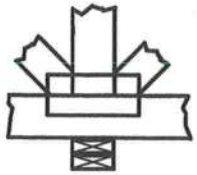
4 x 4

The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION

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

BEARING

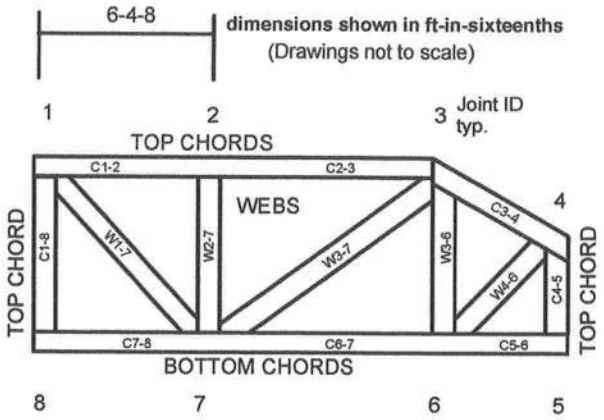


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number/letter where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-22: Design Standard for Bracing.
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing, Restraining & 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.

Product Code Approvals

ICC-ES Reports:

ESR-1988, ESR-2362, ESR-2685, ESR-3282
ESR-4722, ESL-1388

Design General Notes

Trusses are designed for wind loads in the plane of the truss unless otherwise shown.

Lumber design values are in accordance with ANSI/TPI 1 section 6.3 These truss designs rely on lumber values established by others.

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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 BCSI.
2. Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
3. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
4. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
5. Cut members to bear tightly against each other.
6. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
8. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
9. Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.
10. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
11. Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
12. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
13. Top chords must be sheathed or purlins provided at spacing indicated on design.
14. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
15. Connections not shown are the responsibility of others.
16. Do not cut or alter truss member or plate without prior approval of an engineer.
17. Install and load vertically unless indicated otherwise.
18. Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
19. Review all portions of this design (front, back, words and pictures) before use. Reviewing pictures alone is not sufficient.
20. Design assumes manufacture in accordance with ANSI/TPI 1 Quality Criteria.
21. The design does not take into account any dynamic or other loads other than those expressly stated.