

**Trenco**  
818 Soundside Rd  
Edenton, NC 27932

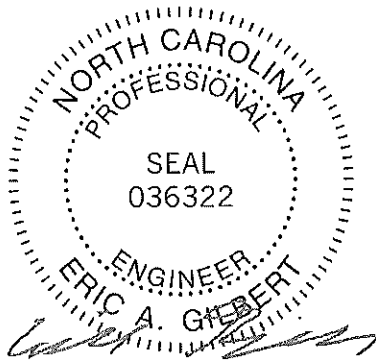
Re: 34111-34111A

The truss drawing(s) referenced below have been prepared by Truss Engineering Co. under my direct supervision based on the parameters provided by 84 Components - #2383.

Pages or sheets covered by this seal: I54618043 thru I54618088

My license renewal date for the state of North Carolina is December 31, 2022.

North Carolina COA: C-0844



October 11, 2022

Gilbert, Eric

**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.

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	I54618043
34111-34111A	A1E	GABLE	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:22 2022 Page 1  
 ID:4C\_?jOk718eo4Te8?OXgvBybTPY-N8rGhnEjBBH3XFgvpauDwostfSY6E7fe2ToIMSYvmkN



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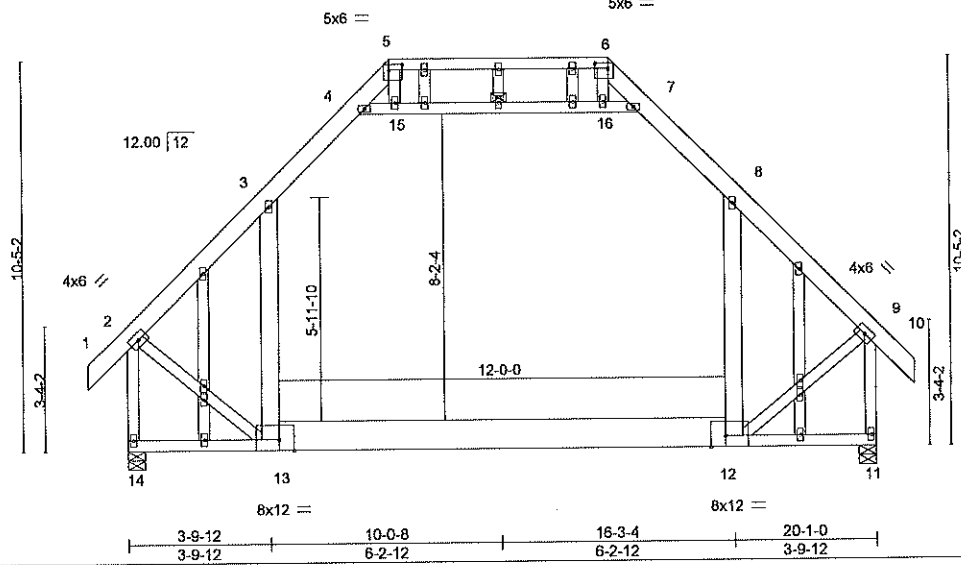


Plate Offsets (X,Y)-- [5:0-4-4,0-1-12], [6:0-4-4,0-1-12], [12:0-4-12,Edge], [13:0-4-12,Edge]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.55	Vert(LL)	-0.22 12-13	>999	240	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.64	Vert(CT)	-0.31 12-13	>765	180		
BCLL 0.0 *	Rep Stress incr	YES	WB 0.31	Horz(CT)	0.00 11	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.18 12-13	808	360		
								Weight: 206 lb	FT = 20%

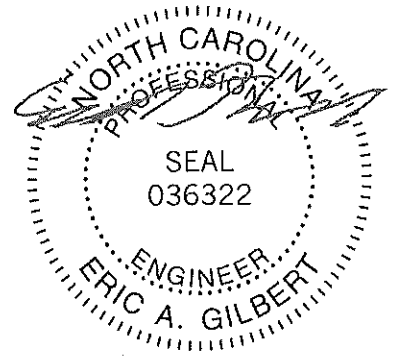
**LUMBER-**  
 TOP CHORD 2x6 SP No.2 \*Except\*  
 5-6: 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 12-13: 2x10 SP DSS  
 WEBS 2x4 SP No.3 \*Except\*  
 3-13,8-12: 2x6 SP No.2, 4-7: 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.  
 WEBS 1 Row at midpt 4-7

**REACTIONS.** (size) 14=0-5-8, 11=0-5-8  
 Max Horz 14=268(LC 9)  
 Max Grav 14=1301(LC 2), 11=1301(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-981/41, 3-4=-692/138, 4-5=-373/205, 5-6=-201/256, 6-7=-373/205, 7-8=-692/138,  
 8-9=-981/41, 2-14=-1305/0, 9-11=-1305/0  
 BOT CHORD 13-14=-268/266, 12-13=0/664  
 WEBS 3-13=-113/414, 8-12=-113/414, 2-13=-12/823, 9-12=-13/823, 4-15=-800/129,  
 15-16=-791/133, 7-16=-800/129

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Ceiling dead load (5.0 psf) on member(s) 3-4, 7-8, 4-15, 15-16, 7-16; Wall dead load (5.0psf) on member(s) 3-13, 8-12
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 12-13
  - Attic room checked for L/360 deflection.



October 11, 2022

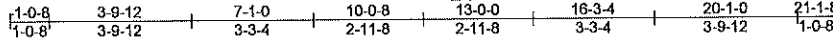
<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.          Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>          A MiTek Alliance</p> <p>818 Soundside Road          Edenton, NC 27832</p>
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Job	Truss	Truss Type	Qty	Ply	11	ONSITE- ROOF	154618044
34111-34111A	A2	ROOF TRUSS	3	1			

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, inc. Fri Oct 7 14:56:24 2022 Page 1

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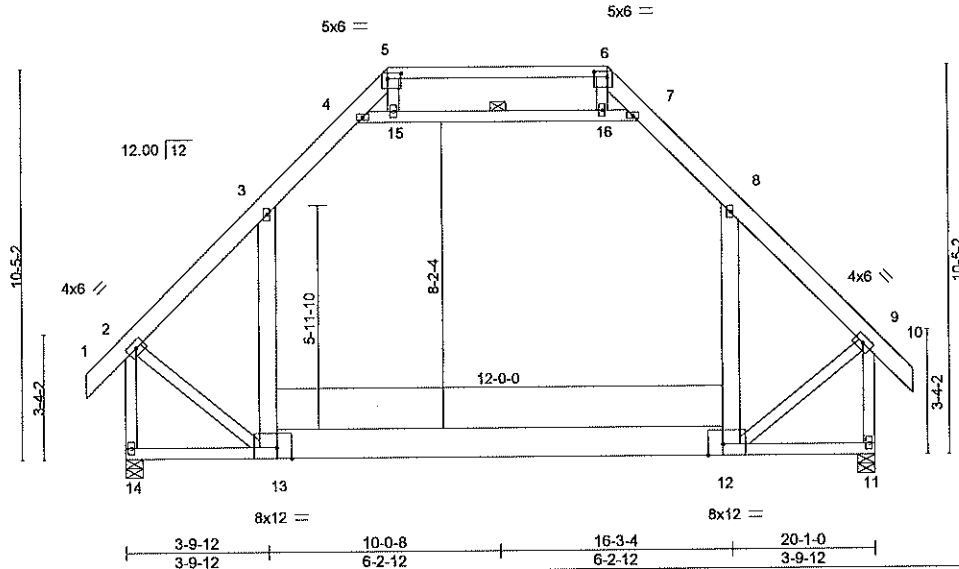


Plate Offsets (X,Y)-- [5:0-4-4,0-1-12], [6:0-4-4,0-1-12], [12:0-4-12,Edge], [13:0-4-12,Edge]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.55	Vert(LL)	-0.22	12-13	>999	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.64	Vert(CT)	-0.31	12-13	>765		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.31	Horz(CT)	0.00	11	n/a		
BCDL 10.0	Code	IRC2015/TPI2014	Matrix-MS	Attic	-0.18	12-13	808		
								Weight: 188 lb	FT = 20%

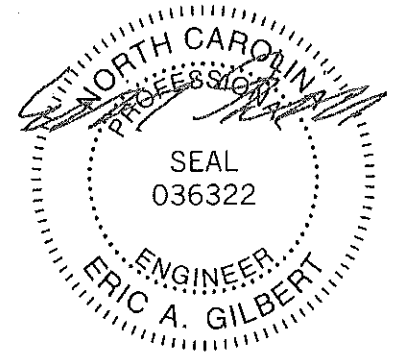
**LUMBER-**  
**TOP CHORD** 2x6 SP No.2 \*Except\*  
 5-6: 2x4 SP No.2 or 2x4 SPF No.2  
**BOT CHORD** 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 12-13: 2x10 SP DSS  
**WEBS** 2x4 SP No.3 \*Except\*  
 3-13,8-12: 2x6 SP No.2, 4-7: 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**  
**TOP CHORD** Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.  
**BOT CHORD** Rigid ceiling directly applied or 6-0-0 oc bracing.  
**WEBS** 1 Row at midpt 4-7

**REACTIONS.** (size) 14=0-5-8, 11=0-5-8  
 Max Horz 14=268(LC 9)  
 Max Grav 14=1301(LC 2), 11=1301(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
**TOP CHORD** 2-3=-981/41, 3-4=-692/138, 4-5=-373/205, 5-6=-201/256, 6-7=-373/205, 7-8=-692/138,  
 8-9=-981/41, 2-14=-1305/0, 9-11=-1305/0  
**BOT CHORD** 13-14=-268/266, 12-13=-0/664  
**WEBS** 3-13=-113/414, 8-12=-113/414, 2-13=-12/823, 9-12=-13/823, 4-15=-800/129,  
 15-16=-791/133, 7-16=-800/129

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) Provide adequate drainage to prevent water ponding.
  - 4) All plates are 2x4 MT20 unless otherwise indicated.
  - 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) Ceiling dead load (5.0 psf) on member(s). 3-4, 7-8, 4-15, 15-16, 7-16; Wall dead load (5.0psf) on member(s).3-13, 8-12
  - 8) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 12-13
  - 9) Attic room checked for L/360 deflection.



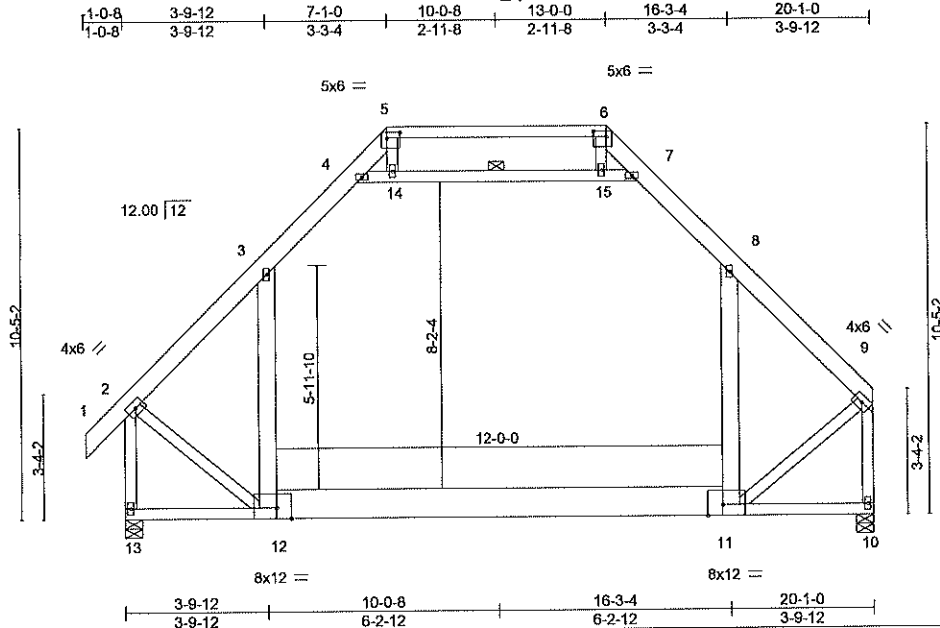
October 11, 2022

**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/PHI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2570 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
 A MiTek Alliance  
 818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	1	ONSITE-ROOF	154618045
34111-34111A	A3	ROOF TRUSS	6	1			

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 Mitek Industries, Inc. Fri Oct 7 14:56:25 2022 Page 1



Scale = 1:59.2

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

<b>LOADING</b> (psf)	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.56	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.66	Vert(LL) -0.22 11-12 >999 240		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.31	Vert(CT) -0.31 11-12 >764 180		
BCDL 10.0	Rep Stress Incr YES	Matrix-MS	Horz(CT) 0.00 10 n/a n/a		
	Code IRC2015/TPI2014		Attic -0.18 11-12 808 360	Weight: 185 lb	FT = 20%

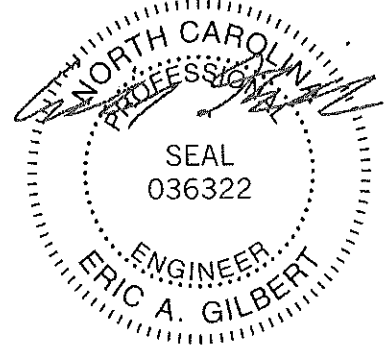
**LUMBER-**  
**TOP CHORD** 2x6 SP No.2 \*Except\*  
 5-6: 2x4 SP No.2 or 2x4 SPF No.2  
**BOT CHORD** 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 11-12: 2x10 SP DSS  
**WEBS** 2x4 SP No.3 \*Except\*  
 3-12,8-11: 2x6 SP No.2, 4-7: 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**  
**TOP CHORD** Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.  
**BOT CHORD** Rigid ceiling directly applied or 6-0-0 oc bracing.  
**WEBS** 1 Row at midpt 4-7

**REACTIONS.** (size) 13=0-5-8, 10=0-5-8  
 Max Horz 13=260(LC 7)  
 Max Grav 13=1303(LC 2), 10=1240(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
**TOP CHORD** 2-3=-984/33, 3-4=-694/131, 4-5=-371/204, 5-6=-199/258, 6-7=-371/207, 7-8=-694/135,  
 8-9=-979/20, 2-13=-1307/0, 9-10=-1252/0  
**BOT CHORD** 12-13=-260/249, 11-12=-8/655  
**WEBS** 3-12=-113/415, 8-11=-118/412, 2-12=-9/825, 9-11=-21/811, 4-14=-804/117,  
 14-15=-794/122, 7-15=-803/119

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Ceiling dead load (5.0 psf) on member(s). 3-4, 7-8, 4-14, 14-15, 7-15; Wall dead load (5.0psf) on member(s).3-12, 8-11
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 11-12
  - Attic room checked for L/360 deflection.

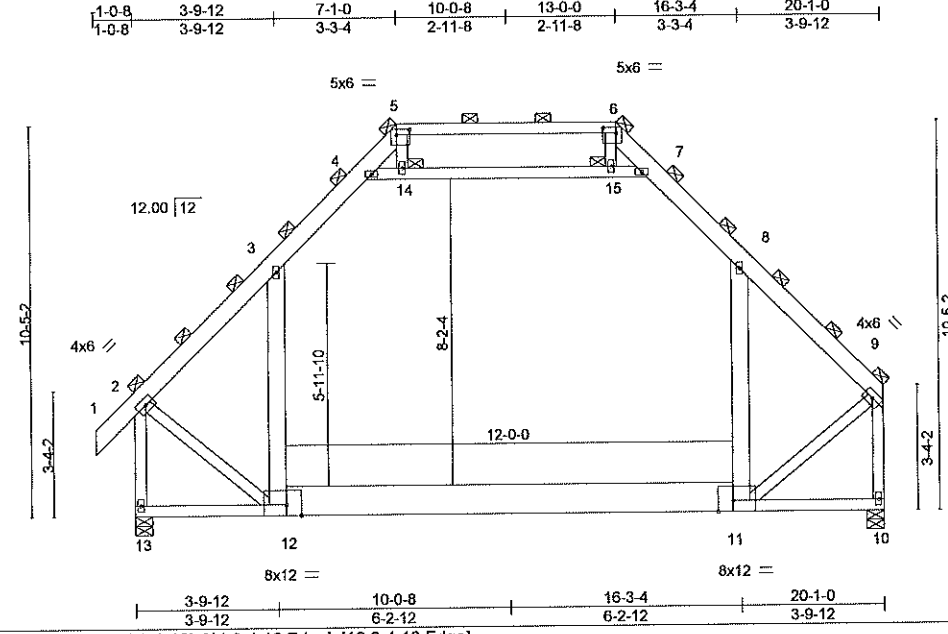


October 11, 2022

<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.        Design valid for use only with Mitek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>        A Mitek Alliance</p> <p>818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618046
34111-34111A	A3G	ROOF TRUSS	1	2	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8,620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:27 2022 Page 1  
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Scale = 1:59.2

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

LOADING (psf)	SPACING-	4-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.64	Vert(LL)	-0.22 11-12	>999	240	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.73	Vert(CT)	-0.31 11-12	>764	180		
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.31	Horz(CT)	0.00 10	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.18 11-12	808	360	Weight: 370 lb	FT = 20%

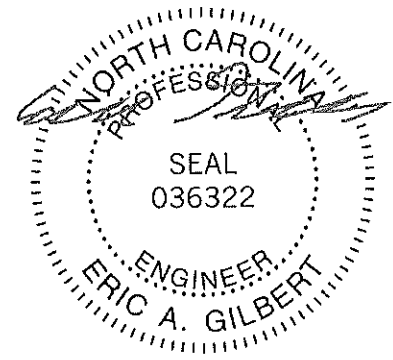
**LUMBER-**  
 TOP CHORD 2x6 SP No.2 \*Except\*  
 5-6: 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 11-12: 2x10 SP DSS  
 WEBS 2x4 SP No.3 \*Except\*  
 3-12,8-11: 2x6 SP No.2, 4-7: 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**  
 TOP CHORD 2-0-0 oc purlins (6-0-0 max.), except end verticals  
 (Switched from sheeted: Spacing > 2-8-0).  
 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.  
 JOINTS 1 Brace at Jt(s): 5, 6, 2, 9, 14, 15

**REACTIONS.** (size) 13=0-5-8, 10=0-5-8  
 Max Horz 13=519(LC 7)  
 Max Grav 13=2606(LC 2), 10=2480(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-1968/66, 3-4=-1389/261, 4-5=-742/407, 5-6=-399/515, 6-7=-743/414,  
 7-8=-1387/270, 8-9=-1959/40, 2-13=-2614/0, 9-10=-2503/0  
 BOT CHORD 12-13=-520/498, 11-12=-17/1310  
 WEBS 3-12=-226/829, 8-11=-237/823, 2-12=-17/1651, 9-11=-42/1621, 4-14=-1607/234,  
 14-15=-1588/244, 7-15=-1607/239, 5-14=-150/363, 6-15=-159/358

- 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: 2x4 - 1 row at 0-9-0 oc, 2x10 - 2 rows staggered at 0-9-0 oc.  
 Webs connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc, 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) Unbalanced roof live loads have been considered for this design.
  - 4) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 5) Provide adequate drainage to prevent water ponding.
  - 6) All plates are 2x4 MT20 unless otherwise indicated.
  - 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) Ceiling dead load (5.0 psf) on member(s) 3-4, 7-8, 4-14, 14-15, 7-15; Wall dead load (5.0psf) on member(s) 3-12, 8-11
  - 10) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 11-12
  - 11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - 12) Attic room checked for L/360 deflection.



October 11, 2022

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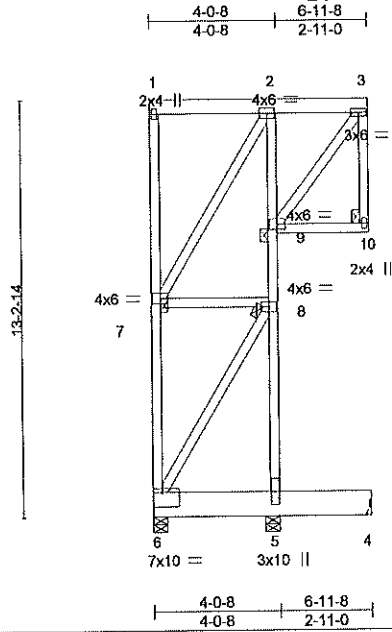
**ENGINEERING BY**  
**TRENCO**  
 A MITEK ALLIATE

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618047
34111-34111A	A4	ROOF TRUSS	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 Mitek Industries, Inc. Fri Oct 7 14:56:28 2022 Page 1  
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Scale = 1:70.3

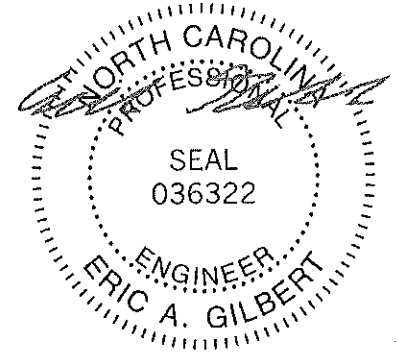


Plate Offsets (X,Y)-- [6:Edge,0-5-8]

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.42	Vert(LL)	-0.00	5	>999	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.04	Vert(CT)	-0.00	5	>999		
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.45	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MP						
								Weight: 121 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x10 SP No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 7-8,3-10,3-9: 2x4 SP No.3

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 4-0-8 oc purlins, except end verticals. Except: 6-0-0 oc bracing: 5-8, 8-9  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.  
 WEBS 1 Row at midpt 1-6  
 JOINTS 1 Brace at Jt(s): 8, 9, 10

**REACTIONS.**

(size) 6=0-5-8, 5=0-5-8, 4=Mechanical  
 Max Horz 6=-358(LC 8)  
 Max Uplift 6=-554(LC 8), 5=-506(LC 7)  
 Max Grav 6=494(LC 7), 5=882(LC 18), 4=136(LC 2)

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

TOP CHORD 5-8=-658/589, 8-9=-402/337, 2-9=-334/325  
 WEBS 7-8=-344/362, 6-8=-511/556

**NOTES-**

- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Provide adequate drainage to prevent water ponding.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 554 lb uplift at joint 6 and 506 lb uplift at joint 5.
- Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.
- Attic room checked for L/360 deflection.
- In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard

- Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-60, 2-3=-60, 5-6=-20, 4-5=-50, 9-10=-10(F)
- Dead + 0.75 Roof Live (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-50, 2-3=-50, 5-6=-20, 4-5=-109, 9-10=-10(F)

October 11, 2022

Continued on page 2

**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with Mitek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
341111-34111A	A4	ROOF TRUSS	1	1	154618047

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:28 2022 Page 2  
 ID:4C\_?jOk7f8eo4Te87OXgvBybTPY-CICXyqJUm12DFA7297dA36jTltxenwWQOFBZ5yVmkH

**LOAD CASE(S)** Standard

- 3) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 5-6=-40, 4-5=-70, 9-10=-10(F)
- 4) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=40, 2-3=40, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=34, 5-9=34
- 5) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=33, 2-3=33, 5-6=-20, 4-5=38, 9-10=-10(F)  
Horz: 1-6=31, 5-9=31
- 6) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=13, 5-9=17
- 7) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=-17, 5-9=-13
- 8) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=38, 9-10=-10(F)  
Horz: 1-6=23, 5-9=8
- 9) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=38, 9-10=-10(F)  
Horz: 1-6=-8, 5-9=23
- 10) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=11, 5-9=16
- 11) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=16, 5-9=11
- 12) Dead + 0.6 MWFRS Wind (Pos. Internal) 3rd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=11, 5-9=16
- 13) Dead + 0.6 MWFRS Wind (Pos. Internal) 4th Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=30, 9-10=-10(F)  
Horz: 1-6=16, 5-9=11
- 14) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=38, 9-10=-10(F)  
Horz: 1-6=21, 5-9=7
- 15) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=38, 9-10=-10(F)  
Horz: 1-6=7, 5-9=21
- 16) Dead: Lumber Increase=0.90, Plate Increase=0.90 Ptl. metal=0.90  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 4-6=-20, 9-10=-10(F)
- 17) Dead: Lumber Increase=0.90, Plate Increase=0.90 Ptl. metal=0.90  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 5-6=-20, 4-5=50, 9-10=-10(F)
- 18) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=32, 2-3=32, 5-6=-20, 4-5=99, 9-10=-10(F)  
Horz: 1-6=17, 5-9=6
- 19) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=32, 2-3=32, 5-6=-20, 4-5=99, 9-10=-10(F)  
Horz: 1-6=-6, 5-9=17
- 20) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=32, 2-3=32, 5-6=-20, 4-5=99, 9-10=-10(F)  
Horz: 1-6=16, 5-9=5
- 21) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Continued on page 3

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE (441-7473 rev. 5/19/2020) BEFORE USE.  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIRP11 Quality Criteria, DSB-69 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
 A MiTek Alliance

818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	1	ONSITE- ROOF	154618047
34111-34111A	A4	ROOF TRUSS	1	1		Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 Mitek Industries, Inc. Fri Oct 7 14:56:28 2022 Page 3  
 ID:4C\_?jOk7l8eo4Te87OXgvBybTPY-CICXyqJUj12DFA729r7dA36jTlIkenwWQOFBZ5yVmkH

**LOAD CASE(S) Standard**

Uniform Loads (plf)

Vert: 1-2=-32, 2-3=-32, 5-6=-20, 4-5=-99, 9-10=-10(F)  
 Horz: 1-6=-5, 5-9=-16

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MIL-7473 (REV. 5/19/2020) BEFORE USE.  
 Design valid for use only with Mitek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing Indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

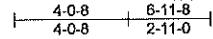
ENGINEERING BY  
**TRENCO**  
 A Mitek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
341111-34111A	A5	ROOF TRUSS	1	1	154618048

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:29 2022 Page 1  
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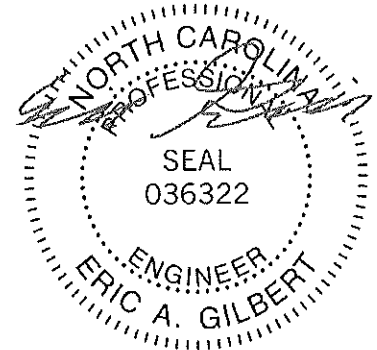
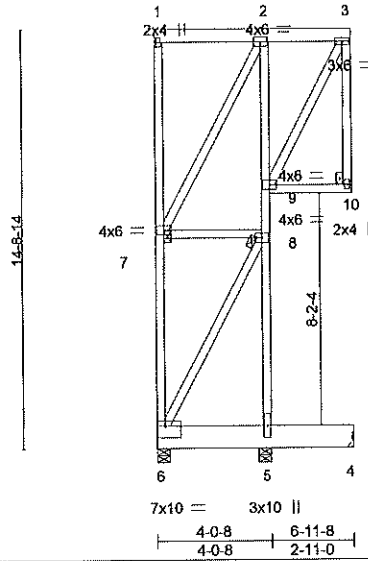


Plate Offsets (X,Y)-- [6:Edge,0-4-12]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.89	Vert(LL)	-0.00	5	>999	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.04	Vert(CT)	-0.00	5	>999		
BCLL 0.0 *	Rep Stress Incr	NO	WB 0.62	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TP12014		Matrix-MP						
								Weight: 131 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x6 SP No.2  
 BOT CHORD 2x10 SP No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 7-8,3-10,3-9: 2x4 SP No.3

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 4-0-8 oc purlins, except end verticals. Except:  
 6-0-0 oc bracing: 5-8, 8-9  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.  
 WEBS 1 Row at midpt 1-6  
 JOINTS 1 Brace at JI(s): 8, 10

**REACTIONS.**

(size) 6=0-5-8, 5=0-5-8, 4=Mechanical  
 Max Horz 6=-393(LC 8)  
 Max Uplift 6=-676(LC 8), 5=-599(LC 7)  
 Max Grav 6=587(LC 7), 5=974(LC 18), 4=136(LC 2)

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

TOP CHORD 5-8=-750/753, 8-9=-409/386, 2-9=-336/360  
 WEBS 7-8=-393/416, 6-8=-591/659

**NOTES-**

- 1) Wind: ASCE 7-10; VuIt=120mph Vasd=95mph; TC DL=6.0psf; BC DL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Provide adequate drainage to prevent water ponding.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* 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.
- 5) Refer to girder(s) for truss to truss connections.
- 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 676 lb uplift at joint 6 and 599 lb uplift at joint 5.
- 7) Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.
- 8) Attic room checked for L/360 deflection.
- 9) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard

- 1) Dead + Roof Live (balanced): Lumber increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-60, 2-3=-60, 5-6=-20, 4-5=-50, 9-10=-10(F)
- 2) Dead + 0.75 Roof Live (balanced) + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-50, 2-3=-50, 5-6=-20, 4-5=-109, 9-10=-10(F)

October 11,2022

Continued on page 2

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MI-7473 rev. 5/19/2020 BEFORE USE.  
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ENGINEERING BY  
**TRENCO**  
 A MiTek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618048
34111-34111A	A5	ROOF TRUSS	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:29 2022 Page 2  
ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-gVmvAAJ6XLA4tJfjYWsJGengH5ANCTgf27l6YyVmkG

**LOAD CASE(S)** Standard

- 3) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 5-6=-40, 4-5=-70, 9-10=-10(F)
- 4) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=40, 2-3=40, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=34, 5-9=34
- 5) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=-33, 2-3=-33, 5-6=-20, 4-5=-38, 9-10=-10(F)  
Horz: 1-6=31, 5-9=31
- 6) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=13, 5-9=17
- 7) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=-17, 5-9=-13
- 8) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=-38, 9-10=-10(F)  
Horz: 1-6=23, 5-9=8
- 9) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=-38, 9-10=-10(F)  
Horz: 1-6=-8, 5-9=-23
- 10) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=11, 5-9=16
- 11) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=-16, 5-9=-11
- 12) Dead + 0.6 MWFRS Wind (Pos. Internal) 3rd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=11, 5-9=16
- 13) Dead + 0.6 MWFRS Wind (Pos. Internal) 4th Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=21, 2-3=21, 5-6=-12, 4-5=-30, 9-10=-10(F)  
Horz: 1-6=-16, 5-9=-11
- 14) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=-38, 9-10=-10(F)  
Horz: 1-6=21, 5-9=7
- 15) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=3, 2-3=3, 5-6=-20, 4-5=-38, 9-10=-10(F)  
Horz: 1-6=-7, 5-9=-21
- 16) Dead: Lumber Increase=0.90, Plate Increase=0.90 Plt. metal=0.90  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 5-6=-20, 4-5=-50, 9-10=-10(F)
- 17) Dead: Lumber Increase=0.90, Plate Increase=0.90 Plt. metal=0.90  
Uniform Loads (plf)  
Vert: 1-2=-20, 2-3=-20, 5-6=-20, 4-5=-50, 9-10=-10(F)
- 18) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=-32, 2-3=-32, 5-6=-20, 4-5=-99, 9-10=-10(F)  
Horz: 1-6=17, 5-9=6
- 19) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=-32, 2-3=-32, 5-6=-20, 4-5=-99, 9-10=-10(F)  
Horz: 1-6=-6, 5-9=-17
- 20) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60  
Uniform Loads (plf)  
Vert: 1-2=-32, 2-3=-32, 5-6=-20, 4-5=-99, 9-10=-10(F)  
Horz: 1-6=16, 5-9=5
- 21) Dead + 0.75 Roof Live (bal.) + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Continued on page 3

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.  
Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIRP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20681

ENGINEERING BY  
**TRENCO**  
A MiTek Alliance  
818 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	1	ONSITE- ROOF	154618048
34111-34111A	A5	ROOF TRUSS	1	1		Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:29 2022 Page 3  
 ID:4C\_?jOk7l8eo4Te87OXgvBybTPY-gVmVAAJ6XLA4JlFjYWsJGenqH5ANCTgI2?l8YyVmkG

**LOAD CASE(S) Standard**

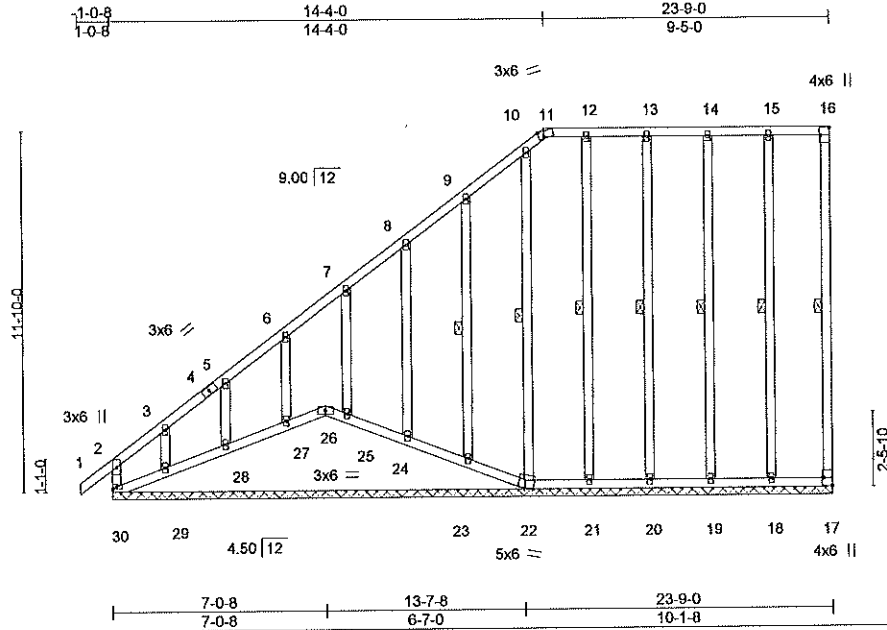
Uniform Loads (plf)

Vert: 1-2=-32, 2-3=-32, 5-6=-20, 4-5=-99, 9-10=-10(F)  
 Horz: 1-6=-5, 5-9=-16

<p><b>⚠ WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MIL-7473 rev. 5/19/2020 BEFORE USE. Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>      A MiTek Affiliate      818 Soundside Road      Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	NSITE- ROOF	154618049
34111-34111A	B1E	Piggyback Base Supported Gable	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:31 2022 Page 1  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-ctufasLN3yQo6dsdrzYKohk995i9rECz6MUsAQyVmke



Scale = 1:72.8

Plate Offsets (X,Y)-- [11:0-1-14,Edge], [16:Edge,0-3-8], [17:Edge,0-3-8]

<b>LOADING</b> (psf)	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.71	in (loc) l/def L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.33	Vert(LL) -0.00 2 n/r 120		
BCLL 0.0	Lumber DOL 1.15	WB 0.10	Vert(CT) -0.00 2 n/r 90		
BCDL 10.0	Rep Stress Incr YES	Matrix-R	Horz(CT) -0.01 17 n/a n/a		
	Code IRC2015/TPI2014			Weight: 219 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.3 \*Except\*  
 16-17: 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.  
 WEBS 1 Row at midpt 16-17, 15-18, 14-19, 13-20, 12-21, 10-22, 9-23

**REACTIONS.**

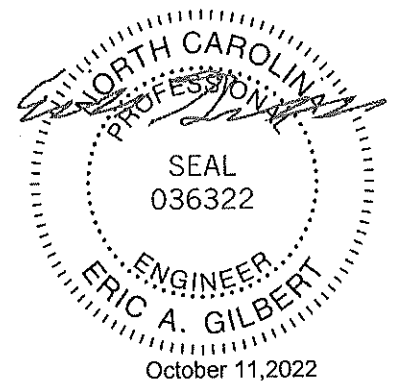
All bearings 23-9-0.  
 (lb) - Max Horz 30=384(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 17, 26, 18, 19, 20, 21, 22, 23, 24, 25, 27, 28 except 30=205(LC 6), 29=280(LC 10)  
 Max Grav All reactions 250 lb or less at joint(s) 17, 26, 18, 19, 20, 21, 22, 23, 24, 25, 27, 28 except 30=448(LC 7), 29=265(LC 8)

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

TOP CHORD 2-30=311/137, 2-3=410/259, 3-5=296/192, 5-6=275/178

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical 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) Provide adequate drainage to prevent water ponding.
- 4) All plates are 2x4 MT20 unless otherwise indicated.
- 5) Gable requires continuous bottom chord bearing.
- 6) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 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) 17, 26, 18, 19, 20, 21, 22, 23, 24, 25, 27, 28 except (jt=lb) 30=205, 29=280.
- 11) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 26, 23, 24, 25, 27, 28, 29.



October 11, 2022

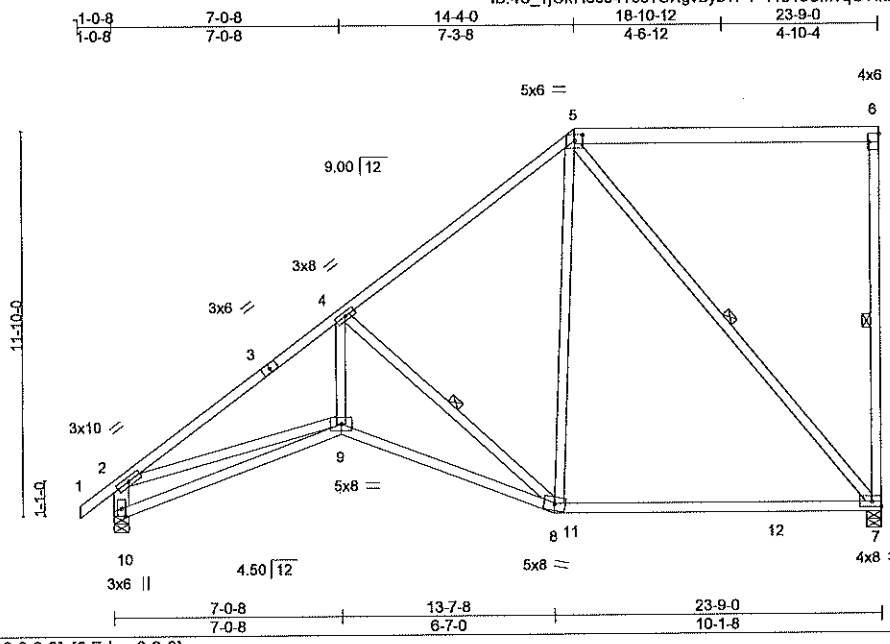
**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MIL-7473 Rev. 5/19/2020 BEFORE USE.  
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818 Soundside Road  
 Edenport, NC 27832

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	B2	Piggyback Base	1	1	154618050

84 Components (Dunn), Dunn, NC - 28334, 8,620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:32 2022 Page 1  
 ID:4C\_7jOK718eo4Te87OXgv8ybTPY-44S1oCM7qGYfnQqOg3ZKvGJmUz8aX16L0DPityVmkD



Scale = 1:68.3

Plate Offsets (X,Y)-- [5:0-3-0,0-2-2], [6:Edge,0-3-8]

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.78	Vert(LL)	-0.49	7-8	>573	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.66	Vert(CT)	-0.80	7-8	>350		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.76	Horz(CT)	0.09	7	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS						
								Weight: 172 lb	FT = 20%

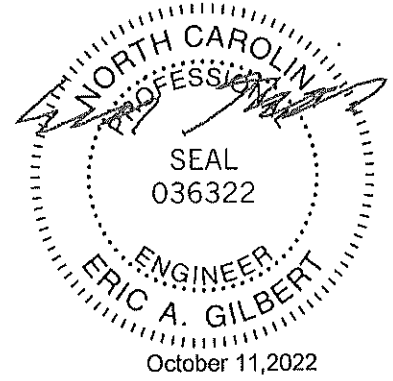
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 5-6: 2x6 SP No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 7-8: 2x4 SP DSS  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 2-10: 2x6 SP No.2

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 3-11-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 8-11-3 oc bracing.  
 WEBS 1 Row at midpt 6-7, 4-8, 5-7

**REACTIONS.** (size) 7=0-5-8, 10=0-5-8  
 Max Horz 10=381(LC 7)  
 Max Uplift 7=-135(LC 7), 10=-51(LC 10)  
 Max Grav 7=955(LC 2), 10=1013(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-4=-1797/176, 4-5=-762/205, 6-7=-273/114, 2-10=-1038/203  
 BOT CHORD 9-10=-419/470, 8-9=-382/1617, 7-8=-157/535  
 WEBS 4-9=-189/1072, 4-8=-1258/316, 5-8=-41/601, 5-7=-779/133, 2-9=0/1123

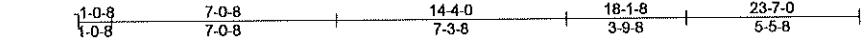
- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) Provide adequate drainage to prevent water ponding.
  - 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) Bearing at joint(s) 10 considers parallel to grain value using ANSITPI 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) 10 except (j=l=lb) 7=135.



<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.        Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPI Quality Criteria, DSB-99 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Welford, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MITek Affiliate</small></p> <p>818 Soundside Road        Edenon, NC 27932</p>
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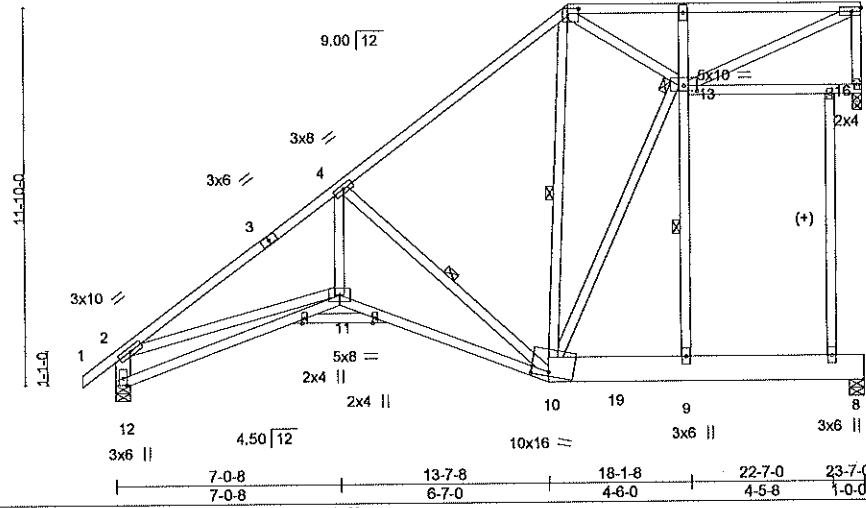
Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618051
34111-34111A	B4	ROOF TRUSS	6	1		

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:34 2022 Page 1  
 ID:4C\_?jOk7f8eo4Te8?OXgvBybTPY-1SzoDnFMtoNz5aCW561PKMgnlH2VvPpKlWnlyVmkB



Scale = 1:69.5

(+) NON-STRUCTURAL STUD(S) FOR TRUSS HANDLING. TO BE REMOVED AFTER TRUSS IS INSTALLED.



ATTIC RESIDENTIAL LIMITED ACCESS  
20 PSF. STORAGE USE ONLY.

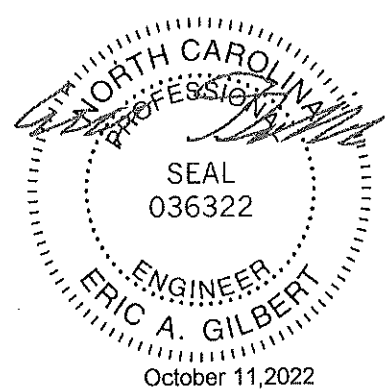
Plate Offsets (X,Y)-- [5:0-4-0,0-2-12], [10:0-6-12,0-1-8], [13:0-5-0,0-2-0]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.75	Vert(LL) -0.10	10-11	>999	360	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.62	Vert(CT) -0.25	10-11	>999	240		
BCLL 0.0 *	Rep Stress Incr NO	WB 0.48	Horz(CT) 0.14	16	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-MS	Wind(LL) 0.07	11	>999	240		
							Weight: 222 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 3-8-6 oc purlins, except end verticals. Except:
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 8-10; 2x10 SP No.2, 14-15; 2x4 SP No.3	6-0-0 oc bracing; 9-13
WEBS 2x4 SP No.2 or 2x4 SPF No.2 *Except* 2-12; 2x6 SP No.2, 13-16; 2x4 SP DSS	BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
	WEBS 1 Row at midpt 9-13, 4-10, 5-10
	JOINTS 1 Brace at J(s): 13
REACTIONS. (size) 12=0-5-8, 8=0-5-8, 16=0-3-8	
Max Horz 12=349(LC 7)	
Max Uplift 12=-16(LC 10), 16=-47(LC 7)	
Max Grav 12=1031(LC 1), 8=390(LC 2), 16=938(LC 2)	
FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.	
TOP CHORD 2-4=-1852/129, 4-5=-785/136, 5-6=-1759/93, 6-7=-1799/146, 6-13=-320/132, 2-12=-1056/179	
BOT CHORD 11-12=-380/448, 10-11=-310/1655	
WEBS 4-11=-137/1105, 4-10=-1298/323, 5-10=-666/152, 5-13=-107/1436, 2-11=0/1179, 7-16=-911/111, 7-13=-160/1967, 10-13=-154/1349	

- NOTES-
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) -1-0-8 to 23-5-4 zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bearing at joint(s) 12 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 12, 16.
  - Load case(s) 1, 2, 3, 4, 5, 6, 7, 8, 9, 10, 11, 12, 13, 14, 15, 16, 17, 18, 19, 20, 21, 22, 23, 24, 25, 26, 27, 28, 29, 30, 31, 32, 33, 34, 35, 36, 37, 38, 39, 40, 41 has/have been modified. Building designer must review loads to verify that they are correct for the intended use of this truss.
  - Attic room checked for L/360 deflection.
  - In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

LOAD CASE(S) Standard  
 1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15



Continued on page 2

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**TRENCO**  
 ENGINEERING BY  
 A MITek Alliance  
 818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	1	ONSITE- ROOF	154618051
341111-34111A	B4	ROOF TRUSS	6	1		Job Reference (optional)	

84 Componentis (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:35 2022 Page 2  
 ID:4C\_7jOk7l8eo4Te87OXgvBybTPY-Ve7AQD0I7BwDbE904pdGyXurXi?Why9Y1\_S3JCyVmkA

**LOAD CASE(S) Standard**

- Uniform Loads (plf)  
 Vert: 1-2=-60, 2-5=-60, 5-6=-60, 6-7=-60, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-50, 13-16=-10(F)
- 2) Dead + 0.75 Roof Live (balanced) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-50, 2-5=-50, 5-6=-50, 6-7=-50, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-109, 13-16=-10(F)
- 3) Dead + Uninhabitable Attic Without Storage: Lumber Increase=1.25, Plate Increase=1.25  
 Uniform Loads (plf)  
 Vert: 1-2=-20, 2-5=-20, 5-6=-20, 6-7=-20, 11-12=-41, 10-11=-41, 9-10=-40, 8-9=-70, 13-16=-10(F)
- 4) Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=35, 2-5=19, 5-6=22, 6-7=22, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-47, 2-5=-31, 9-13=29, 2-12=-29
- 5) Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=1, 2-5=-46, 5-6=-30, 6-7=-30, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-21, 2-5=26, 9-13=26, 2-12=26
- 6) Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-3, 2-5=-14, 5-6=21, 6-7=21, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=9, 2-5=2, 9-13=17, 2-12=13
- 7) Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=21, 6-7=21, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-13, 2-12=-17
- 8) Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-27, 2-5=-32, 5-6=3, 6-7=3, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=7, 2-5=12, 9-13=8, 2-12=23
- 9) Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-6, 2-5=-11, 5-6=3, 6-7=3, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=38, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-9, 9-13=-23, 2-12=-8
- 10) Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=16, 2-5=21, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-33, 9-13=16, 2-12=11
- 11) Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-11, 2-12=-16
- 12) Dead + 0.6 MWFRS Wind (Pos. Internal) 3rd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=16, 2-5=21, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-33, 9-13=16, 2-12=11
- 13) Dead + 0.6 MWFRS Wind (Pos. Internal) 4th Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-11, 2-12=-16
- 14) Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=8, 2-5=3, 5-6=-11, 6-7=-11, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-23, 9-13=7, 2-12=21
- 15) Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-6, 2-5=-11, 5-6=-11, 6-7=-11, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-9, 9-13=-21, 2-12=-7
- 16) Dead + Uninhab. Attic Storage: Lumber Increase=1.25, Plate Increase=1.25  
 Uniform Loads (plf)  
 Vert: 1-2=-20, 2-5=-20, 5-6=-20, 6-7=-20, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-60, 8-9=-50, 13-16=-10(F)
- 17) Dead + Uninhabitable Attic Storage: Lumber Increase=1.25, Plate Increase=1.25  
 Uniform Loads (plf)  
 Vert: 1-2=-20, 2-5=-20, 5-6=-20, 6-7=-20, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-60, 8-9=-50, 13-16=-10(F)
- 18) Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left): Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-55, 2-5=-59, 5-6=-32, 6-7=-32, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)  
 Horz: 1-2=5, 2-5=9, 9-13=6, 2-12=17
- 19) Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-40, 2-5=-43, 5-6=-32, 6-7=-32, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)  
 Horz: 1-2=-10, 2-5=-7, 9-13=-17, 2-12=-6
- 20) Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Continued on page 3

**⚠️ WARNINGS - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.**  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSII/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



818 Soundside Road  
 Edenton, NC 27832

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	B4	ROOF TRUSS	6	1	154618051

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:35 2022 Page 3  
 ID:4C\_?jOk7l8eo4Te8?OXgyBybTPY-Ve7AQDOI7BwDbE9O4pdGyXurXl7Wny9Y1\_S3JCyVmkA

**LOAD CASE(S) Standard**

- Uniform Loads (plf)  
 Vert: 1-2=-29, 2-5=-32, 5-6=-43, 6-7=-43, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)  
 Horz: 1-2=-21, 2-5=-18, 9-13=5, 2-12=16
- 21) Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-40, 2-5=-43, 5-6=-43, 6-7=-43, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)  
 Horz: 1-2=-10, 2-5=-7, 9-13=-16, 2-12=-5
- 22) 1st Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-60, 2-5=-60, 5-6=-60, 6-7=-60, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-50, 13-16=-10(F)
- 23) 2nd Dead + Roof Live (unbalanced): Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-20, 2-5=-20, 5-6=-60, 6-7=-60, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-50, 13-16=-10(F)
- 24) 3rd Dead + 0.75 Roof Live (unbalanced) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-50, 2-5=-50, 5-6=-60, 6-7=-60, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-109, 13-16=-10(F)
- 25) 4th Dead + 0.75 Roof Live (unbalanced) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor: Lumber Increase=1.15, Plate Increase=1.15  
 Uniform Loads (plf)  
 Vert: 1-2=-20, 2-5=-20, 5-6=-60, 6-7=-60, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-109, 13-16=-10(F)
- 26) Reversal: Dead + 0.6 C-C Wind (Pos. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=35, 2-5=19, 5-6=22, 6-7=22, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-47, 2-5=-31, 9-13=29, 2-12=-29
- 27) Reversal: Dead + 0.6 C-C Wind (Neg. Internal) Case 1: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=1, 2-5=-46, 5-6=-30, 6-7=-30, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-21, 2-5=26, 9-13=-26, 2-12=26
- 28) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-3, 2-5=-14, 5-6=21, 6-7=21, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-9, 2-5=2, 9-13=17, 2-12=13
- 29) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=21, 6-7=21, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-13, 2-12=-17
- 30) Reversal: Dead + 0.6 MWFRS Wind (Neg. Internal) Left: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-27, 2-5=-32, 5-6=3, 6-7=3, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=7, 2-5=12, 9-13=8, 2-12=23
- 31) Reversal: Dead + 0.6 MWFRS Wind (Neg. Internal) Right: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-6, 2-5=-11, 5-6=3, 6-7=3, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-9, 9-13=-23, 2-12=-8
- 32) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=16, 2-5=21, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-33, 9-13=16, 2-12=11
- 33) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-11, 2-12=-16
- 34) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) 3rd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=16, 2-5=21, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-33, 9-13=16, 2-12=11
- 35) Reversal: Dead + 0.6 MWFRS Wind (Pos. Internal) 4th Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=2, 2-5=7, 5-6=7, 6-7=7, 11-12=-12, 10-11=-12, 9-10=-12, 8-9=-30, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-19, 9-13=-11, 2-12=-16
- 36) Reversal: Dead + 0.6 MWFRS Wind (Neg. Internal) 1st Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=8, 2-5=3, 5-6=-11, 6-7=-11, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-28, 2-5=-23, 9-13=7, 2-12=21
- 37) Reversal: Dead + 0.6 MWFRS Wind (Neg. Internal) 2nd Parallel: Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-6, 2-5=-11, 5-6=-11, 6-7=-11, 11-12=-20, 10-11=-20, 9-10=-20, 8-9=-38, 13-16=-10(F)  
 Horz: 1-2=-14, 2-5=-9, 9-13=-21, 2-12=-7
- 38) Reversal: Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Left):  
 Lumber Increase=1.60, Plate Increase=1.60  
 Uniform Loads (plf)  
 Vert: 1-2=-55, 2-5=-59, 5-6=-32, 6-7=-32, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)  
 Horz: 1-2=5, 2-5=9, 9-13=6, 2-12=17

Continued on page 4

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/13/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIPR Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
 A MITek Alliance  
 818 Soundside Road  
 Edenonton, NC 27932



Job	Truss	Truss Type	Qty	Ply	Job Reference (optional)
34111-34111A	B4	ROOF TRUSS	6	1	

ONSITE- ROOF  
IS4618051

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:35 2022 Page 4  
ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-Ve7AQDOl7BwDbE9O4pdGyXurXI?Wny9Y1\_S3JCyVmkA

**LOAD CASE(S) Standard**

39) Reversal: Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) Right): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-40, 2-5=-43, 5-6=-32, 6-7=-32, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)

Horz: 1-2=-10, 2-5=-7, 9-13=-17, 2-12=-6

40) Reversal: Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 1st Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-29, 2-5=-32, 5-6=-43, 6-7=-43, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)

Horz: 1-2=-21, 2-5=-18, 9-13=5, 2-12=16

41) Reversal: Dead + 0.75 Roof Live (bal.) + 0.75 Uninhab. Attic Storage + 0.75 Attic Floor + 0.75(0.6 MWFRS Wind (Neg. Int) 2nd Parallel): Lumber Increase=1.60, Plate Increase=1.60

Uniform Loads (plf)

Vert: 1-2=-40, 2-5=-43, 5-6=-43, 6-7=-43, 11-12=-20, 10-11=-20, 10-19=-20, 9-19=-50, 8-9=-99, 13-16=-10(F)

Horz: 1-2=-10, 2-5=-7, 9-13=-16, 2-12=-5

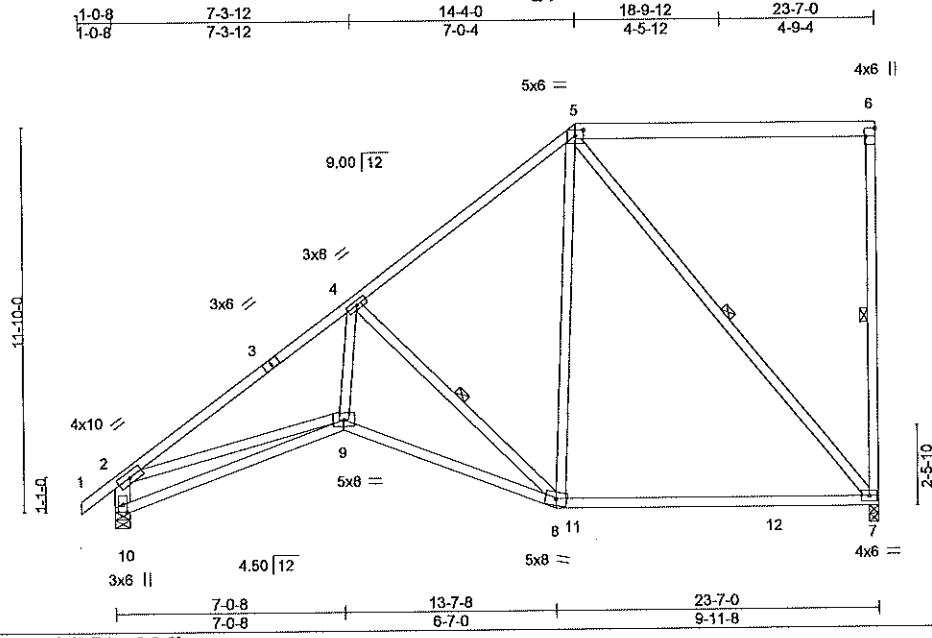
**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE Mill-7473 Rev. 5/19/2020 BEFORE USE.  
Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSII/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
A MITEK AFFILIATE

816 Soundside Road  
Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618052
34111-34111A	B5	Piggyback Base	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:36 2022 Page 1  
 ID:4C\_?jOk7l8ee4Te87OXgvBybTPY-zrhYeZPWuV24CokbdW8VVIR?Z6F7WLlIGeBdreyVmk9



Scale = 1:68.3

Plate Offsets (X,Y)-- [5:0-3-0,0-2-2], [6:Edge,0-3-8]

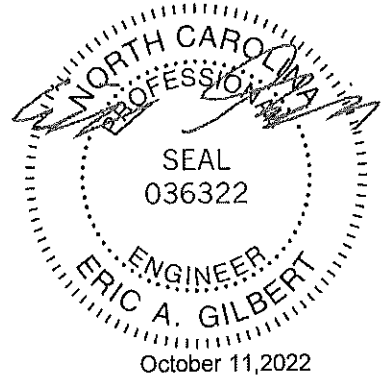
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/defl	<b>L/d</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.79	Vert(LL) -0.53 7-8 >528	240	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.98	Vert(CT) -0.86 7-8 >323	180		
BCLL 0.0	Rep Stress Incr YES	WB 0.74	Horz(CT) 0.09 7 n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-MS				
					Weight: 172 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 5-6: 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 3-9-11 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 7-8: 2x4 SP No.1	BOT CHORD Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS 2x4 SP No.2 or 2x4 SPF No.2 *Except* 2-10: 2x6 SP No.2	WEBS 1 Row at midpt 6-7, 4-8, 5-7

**REACTIONS.** (size) 7=0-3-8, 10=0-5-8  
 Max Horz 10=381(LC 7)  
 Max Uplift 7=-135(LC 7), 10=-51(LC 10)  
 Max Grav 7=947(LC 2), 10=1007(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-4=-1766/167, 4-5=-748/208, 6-7=-269/113, 2-10=-1042/209  
 BOT CHORD 9-10=-428/501, 8-9=-360/1500, 7-8=-155/526  
 WEBS 4-9=-182/1031, 4-8=-1164/303, 5-8=-48/608, 5-7=-772/133, 2-9=0/1065

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bearing at joint(s) 10 considers parallel to grain value using ANSIT/TP1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10 except (jt=lb) 7=135.



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618053
34111-34111A	B6	Piggyback Base	2	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:37 2022 Page 1  
 ID:4C\_?jOk7f8eo4TeB7OXgvBybTPY-R1FwrvQ8foAxqYJnBDkfy\_AWWcjFnOrVlxAO4yVmk8

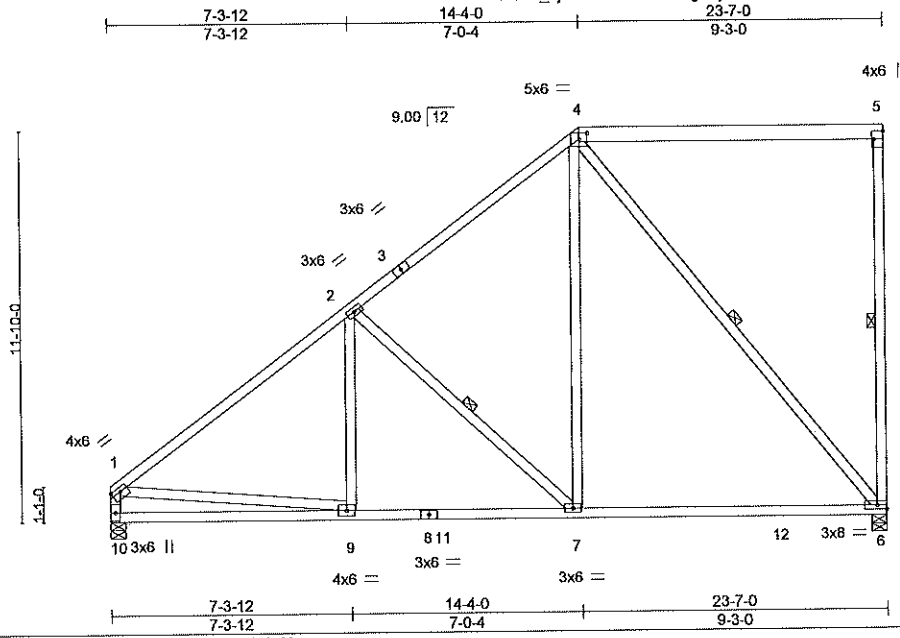


Plate Offsets (X,Y)-- [1:Edge,0-1-8], [4:0-3-0,0-2-2], [5:Edge,0-3-8]

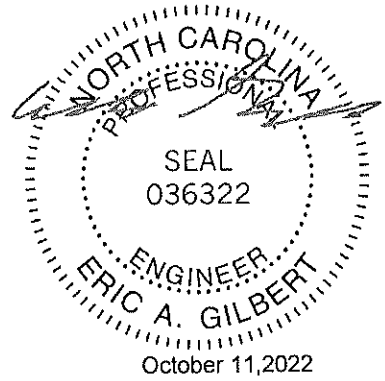
<b>LOADING</b> (psf)	<b>SPACING-</b> 2-0-0	<b>CSI.</b>	<b>DEFL.</b> in (loc) l/def L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.78	Vert(LL) -0.34 6-7 >815 240	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.96	Vert(CT) -0.57 6-7 >493 180		
BCLL 0.0	Rep Stress Incr YES	WB 0.82	Horz(CT) 0.02 6 n/a n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-MS		Weight: 171 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 4-5: 2x6 SP No.2	TOP CHORD Structural wood sheathing directly applied or 4-3-8 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied or 2-2-0 oc bracing.
WEBS 2x4 SP No.2 or 2x4 SPF No.2 *Except* 1-10: 2x4 SP No.3	WEBS 1 Row at midpt 5-6, 2-7, 4-6

**REACTIONS.** (size) 6=0-5-8, 10=0-5-8  
 Max Horz 10=366(LC 7)  
 Max Uplift 6=-133(LC 7), 10=-32(LC 10)  
 Max Grav 6=979(LC 2), 10=932(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-2=-1114/135, 2-4=-782/203, 5-6=-269/114, 1-10=-861/117  
 BOT CHORD 9-10=-352/385, 7-9=-193/949, 6-7=-147/570  
 WEBS 2-7=-500/202, 4-7=-39/688, 4-6=-849/118, 1-9=0/659

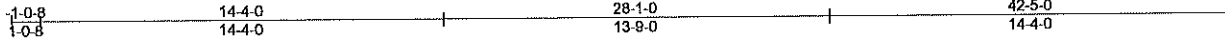
- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10 except (J=lb) 6=133.



<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MH-7473 rev. 5/19/2020 BEFORE USE.          Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIP/TPI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>          A MITek Affiliate          818 Soundside Road          Edenon, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE-ROOF	154618054
34111-34111A	C1E	Piggyback Base Supported Gable	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:39 2022 Page 1  
 ID:4C\_?jOK7l8eo4Te8?OXgvBybTPY-NQNhgBROAQf3sTAJehC6N3aXJUGjreBycQHSzyMk6



Scale = 1:78.5

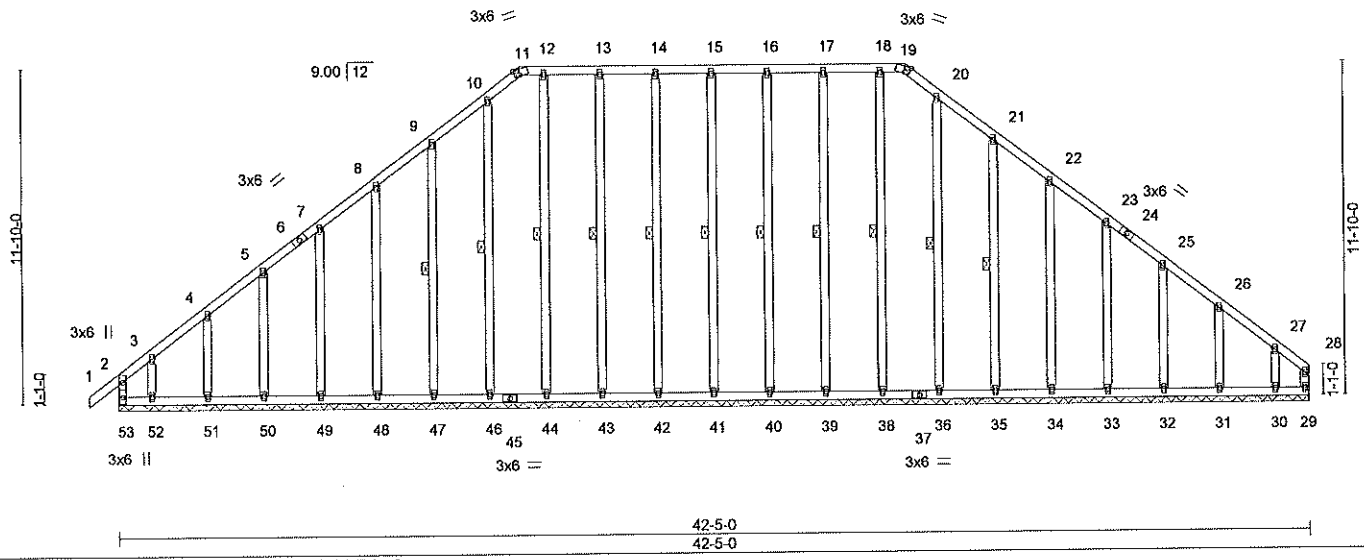


Plate Offsets (X,Y)-- [11:0-1-14,Edge], [19:0-1-14,Edge]

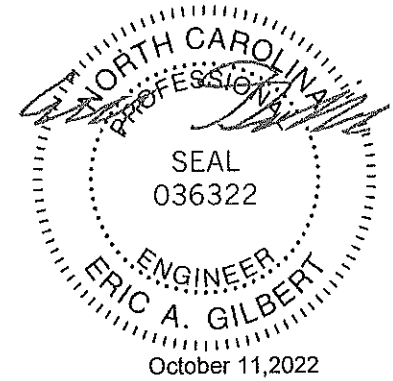
<b>LOADING</b> (psf)	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.24	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.12	Vert(LL) -0.00 1 n/r 120		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.13	Vert(CT) -0.00 1 n/r 90		
BCDL 10.0	Rep Stress Incr YES	Matrix-R	Horz(CT) 0.01 29 n/a n/a		
	Code IRC2015/TPI2014			Weight: 382 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.3 *Except*	WEBS 1 Row at midpt
28-29: 2x4 SP No.2 or 2x4 SPF No.2	
OTHERS 2x4 SP No.2 or 2x4 SPF No.2	

**REACTIONS.** All bearings 42-5-0.  
 (lb) - Max Horz 53=264(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 41, 42, 43, 47, 48, 49, 50, 51, 40, 39, 35, 34, 33, 32, 31 except 53=181(LC 6), 29=146(LC 9), 52=215(LC 10), 30=190(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 29, 41, 42, 43, 44, 46, 47, 48, 49, 50, 51, 52, 40, 39, 38, 36, 35, 34, 33, 32, 31, 30 except 53=281(LC 18)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 9-10=227/263, 10-11=227/260, 19-20=227/260, 20-21=227/263

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - Gable requires continuous bottom chord bearing.
  - Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 41, 42, 43, 47, 48, 49, 50, 51, 40, 39, 35, 34, 33, 32, 31 except (j=lb) 53=181, 29=146, 52=215, 30=190.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MIL-7473 rev. 5/19/2020 BEFORE USE.**  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-69 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

**ENGINEERING BY**  
**TRENCO**  
 A MITek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

Job 34111-34111A	Truss C2	Truss Type PIGGYBACK BASE	Qty 5	Ply 1	ONSITE- ROOF 154618055
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84 Components (Dunn), Dunn, NC - 28334, ID:4C\_7jOk7l8eo4Ta87OXgvBybTPY-h0JPuzcDWB7dsIX500pNIT49ahcT4aWWbhMyV\_h0  
 1-0-8 7-3-12 14-4-0 21-2-8 28-1-0 35-1-4 42-5-0  
 1-0-8 7-3-12 7-0-4 6-10-8 6-10-8 7-0-4 7-3-12

Scale = 1:76.0

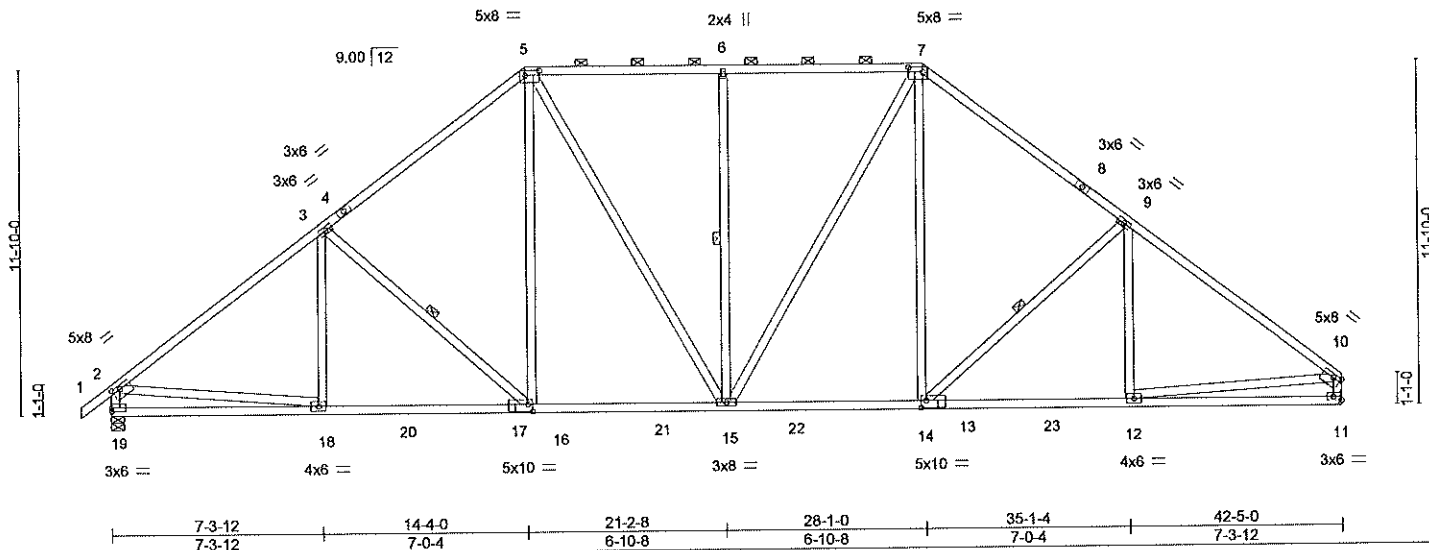


Plate Offsets (X,Y)-- [2:0-3-4,0-1-8], [5:0-6-0,0-2-0], [7:0-6-0,0-2-0], [10:Edge,0-1-8], [11:Edge,0-1-8], [14:0-2-0,0-3-0], [17:0-2-0,0-3-0]

<b>LOADING</b> (psf)	<b>SPACING</b>	2-0-0	<b>CSI</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.90	Vert(LL)	-0.14 14-15	>999	240	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.70	Vert(CT)	-0.25 14-15	>999	180		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.48	Horz(CT)	0.08 11	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS					Weight: 296 lb	FT = 20%

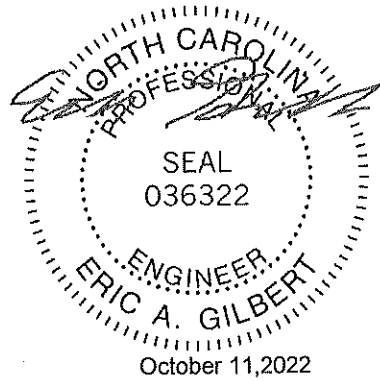
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 2-19,10-11: 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (3-10-10 max.): 5-7.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.  
 WEBS 1 Row at midpt 3-16, 6-15, 9-14

**REACTIONS.** (size) 19=0-5-8, 11=Mechanical  
 Max Horz 19=264(LC 7)  
 Max Uplift 19=53(LC 10), 11=34(LC 11)  
 Max Grav 19=1757(LC 1), 11=1690(LC 2)

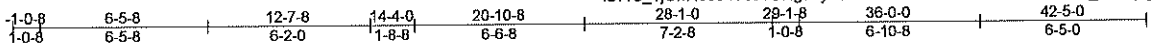
**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2233/264, 3-5=-1924/338, 5-6=-1629/347, 6-7=-1629/347, 7-9=-1927/339,  
 9-10=-2233/262, 2-19=-1688/247, 10-11=-1624/205  
 BOT CHORD 18-19=-273/477, 16-18=-109/1767, 15-16=-70/1449, 14-15=0/1450, 12-14=-92/1710  
 WEBS 3-16=-454/196, 5-16=-47/547, 5-15=-153/465, 6-15=-469/172, 7-15=-153/463,  
 7-14=-49/554, 9-14=-464/200, 2-18=0/1454, 10-12=-47/1521

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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 BCCL = 10.0psf.
  - All bearings are assumed to be User Defined crushing capacity of 425 psi.
  - Refer to girder(s) for truss to truss connections.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 53 lb uplift at joint 19 and 34 lb uplift at joint 11.
  - This truss is designed in accordance with the 2015 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618056
34111-34111A	C3	PIGGYBACK BASE	4	1		

84 Components (Dunn), Dunn, NC - 28334, ID:4C\_7jOk7l8eo4Te8?OXgyBybTPY-23D?Dxv7KcJG7Wc79EdV68\_Z7?Zj3\_JGRN5zldyV\_gF  
 8.610 s May 25 2022 MiTek Industries, Inc. Mon Oct 10 11:54:06 2022 Page 1



Scale = 1:84.5

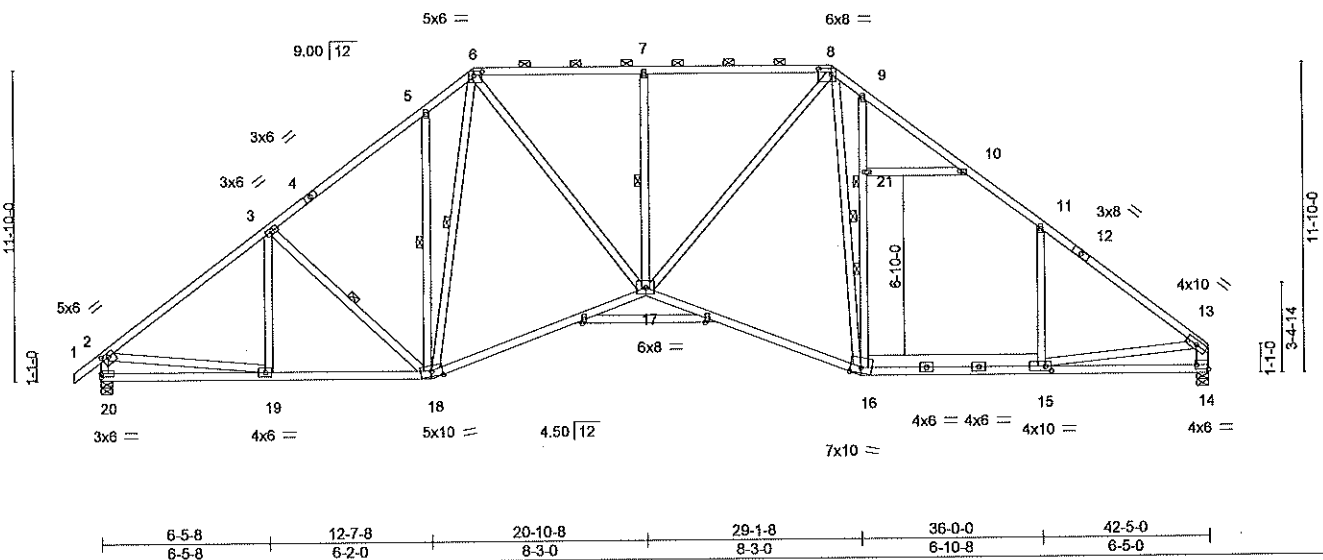


Plate Offsets (X,Y)--	[2:0-3-0,0-1-12], [6:0-3-12,0-1-12], [8:0-6-0,0-2-12], [14:Edge,0-2-0], [15:0-2-12,0-2-0]
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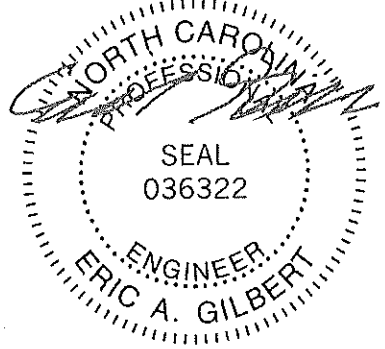
LOADING (psf)	SPACING-	CSL	DEFL.	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.87	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.82	Vert(LL) 0.57 14-15 >887 240		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.93	Vert(CT) -0.88 14-15 >572 180		
BCDL 10.0	Rep Stress Incr YES	Matrix-MS	Horz(CT) 0.10 14 n/a n/a	Weight: 326 lb	FT = 20%
	Code IRC2015/TPI2014		Attic -0.26 15-16 310 360		

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 8-12,12-13; 2x4 SP No.1	TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (2-2-0 max.): 6-8.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 14-16; 2x4 SP DSS, 15-16; 2x6 SP No.2, 22-23; 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 7-1-7 oc bracing: 14-15.
WEBS 2x4 SP No.2 or 2x4 SPF No.2 *Except* 2-20; 2x4 SP No.3, 13-14; 2x6 SP No.2	WEBS 1 Row at mldpt 3-18, 5-18, 6-18, 7-17, 8-16, 16-21
	JOINTS 1 Brace at Jt(s): 21

**REACTIONS.** (size) 20=0-5-8, 14=0-5-8  
 Max Horz 20=265(LC 7)  
 Max Uplift 20=-44(LC 10), 14=-2(LC 11)  
 Max Grav 20=1769(LC 1), 14=1835(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-2197/245, 3-5=-1965/313, 5-6=-1911/424, 6-7=-2171/322, 7-8=-2171/322, 8-9=-2219/481, 9-10=-1914/256, 10-11=-2085/264, 11-13=-2201/136, 2-20=-1706/233, 13-14=-1637/116  
 BOT CHORD 19-20=-266/424, 18-19=-104/1667, 17-18=-92/1599, 16-17=0/1666, 15-16=0/1674, 14-15=-189/559  
 WEBS 3-18=-315/162, 5-18=-309/184, 6-18=-240/303, 6-17=-13/1181, 7-17=-471/172, 8-17=-150/1059, 8-16=-413/960, 16-21=-796/387, 9-21=-796/387, 11-15=-258/178, 2-19=-4/1441, 13-15=-65/1244

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BC DL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; and vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 15-16
  - All bearings are assumed to be User Defined crushing capacity of 425 psi.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 44 lb uplift at joint 20 and 2 lb uplift at joint 14.
  - This truss is designed in accordance with the 2015 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - ATTIC SPACE SHOWN IS DESIGNED AS UNINHABITABLE.



October 11, 2022

<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MH-7473 rev. 5/19/2020 BEFORE USE.        Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p><b>ENGINEERING BY</b>  <b>TRENCO</b>        A MiTek Affiliate        818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618057
34111-34111A	C4	PIGGYBACK BASE	1	1		

84 Components (Dunn), Dunn, NC - 28334, ID:4C...?Ok7f8eo4Te8?OXgvBybTPY-lhyO4i2IAxR6UBOJf6wWl8lQabFb3sY6t16kECyV\_ef  
 8.610 s May 25 2022 Mitek Industries, Inc. Mon Oct 10 11:56:14 2022 Page 1  
 Job Reference (optional)

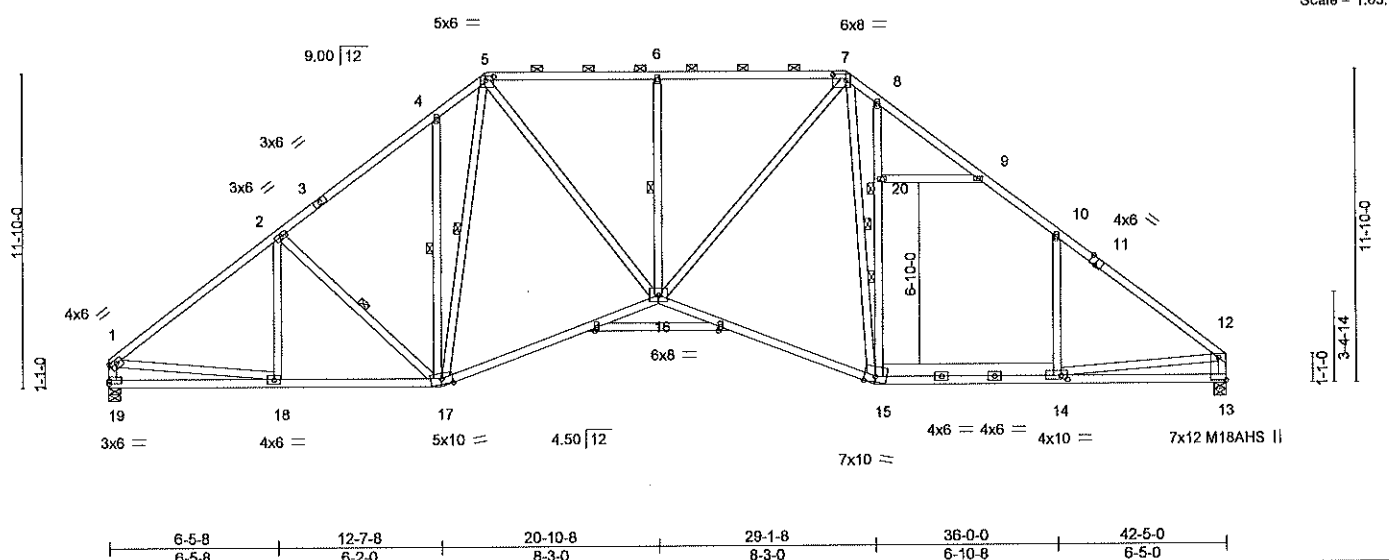


Plate Offsets (X,Y)--	[1:0-3-0,0-1-12], [5:0-3-12,0-1-12], [7:0-6-0,0-2-12], [11:0-3-0,Edge], [13:Edge,0-3-8], [14:0-3-0,0-1-12]
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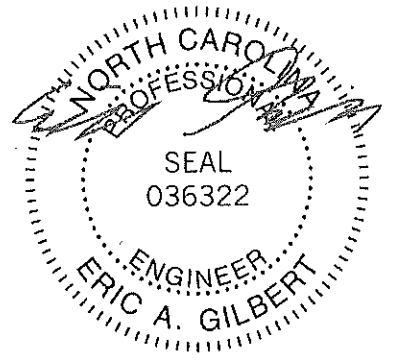
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.95	Vert(LL)	0.60 13-14	>841	240	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.83	Vert(CT)	-0.95 13-14	>532	180	M18AHS	142/136
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.98	Horz(CT)	0.10 13	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MS	Attic	-0.28 14-15	292	360		
								Weight: 323 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 7-11,11-12: 2x4 SP No.1	TOP CHORD Structural wood sheathing directly applied, except end verticals, and 2-0-0 oc purlins (2-2-0 max.): 5-7.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 *Except* 13-15: 2x4 SP DSS, 14-15: 2x6 SP No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-9-5 oc bracing: 13-14.
WEBS 2x4 SP No.2 or 2x4 SPF No.2 *Except* 1-19,12-13: 2x4 SP No.3	WEBS 1 Row at midpt 2-17, 4-17, 5-17, 6-16, 7-15, 15-20
	JOINTS 1 Brace at Jt(s): 20

<b>REACTIONS.</b>	(size) 19=0-5-8, 13=0-5-8
	Max Horz 19=-252(LC 6)
	Max Uplift 19=-25(LC 10), 13=-3(LC 11)
	Max Grav 19=1700(LC 1), 13=1838(LC 2)

<b>FORCES.</b>	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	1-2=-2205/243, 2-4=-1976/315, 4-5=-1916/422, 5-6=-2182/323, 6-7=-2182/323, 7-8=-2244/483, 8-9=-1923/257, 9-10=-2099/266, 10-12=-2223/136, 1-19=-1637/191, 12-13=-1638/117
BOT CHORD	18-19=-243/370, 17-18=-103/1681, 16-17=-90/1607, 15-16=0/1678, 14-15=0/1690, 13-14=-188/572
WEBS	2-17=-321/166, 4-17=-299/179, 5-17=-237/297, 5-16=-14/1187, 6-16=-471/171, 7-16=-149/1060, 7-15=-415/985, 15-20=-816/388, 8-20=-816/388, 10-14=-252/180, 1-18=-52/1503, 12-14=-62/1244

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Provide adequate drainage to prevent water ponding.
  - All plates are MT20 plates unless otherwise indicated.
  - All plates are 2x4 MT20 unless otherwise indicated.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 14-15
  - All bearings are assumed to be User Defined crushing capacity of 425 psi.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 25 lb uplift at joint 19 and 3 lb uplift at joint 13.
  - This truss is designed in accordance with the 2015 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
  - Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
  - ATTIC SPACE SHOWN IS DESIGNED AS UNINHABITABLE.



October 11, 2022

**Continued on page 2**

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**ENGINEERING BY**  
**TRENCO**  
 A Mitek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	Job Reference (optional)
34111-34111A	C4	PIGGYBACK BASE	1	1	ONSITE- ROOF I54618057

8.610 s May 25 2022 MITEK Industries, Inc. Mon Oct 10 11:58:14 2022 Page 2  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-ihyO4i2lAxR6UBOj6wWl8lQebFb3sY6l6kECyV\_eF

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.  
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ENGINEERING BY  
**TRENCO**  
 A MITEK ALLIATE  
 818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618058
34111-34111A	C5	ROOF TRUSS	3	1		

84 Components (Dunn), Dunn, NC - 28334, 8,620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:47 2022 Page 1  
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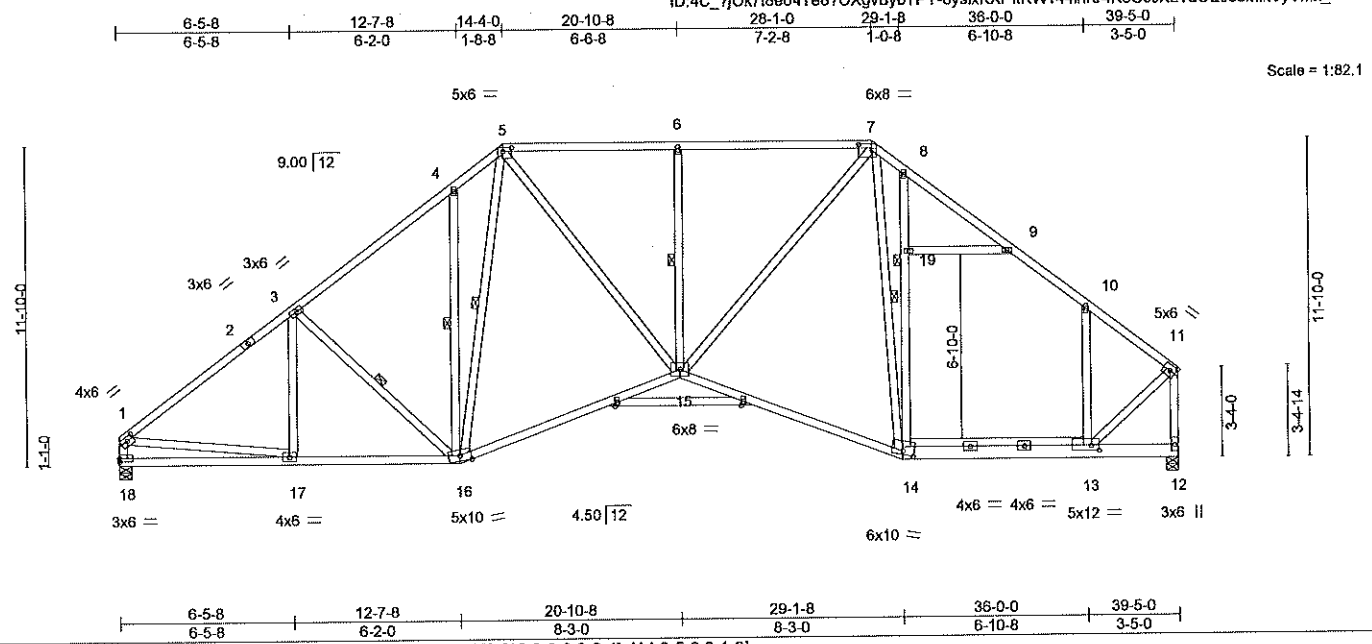


Plate Offsets (X,Y)-- [1:0-3-0,0-1-12], [5:0-3-12,0-1-12], [7:0-6-0,0-2-12], [13:0-3-8,0-2-4], [14:0-5-0,0-1-8]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.89	Vert(LL)	-0.25 14-15	>999	240	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.80	Vert(CT)	-0.57 14-15	>818	180		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.41	Horz(CT)	0.11 12	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-MS	Attic	-0.10 13-14	777	360	Weight: 316 lb	FT = 20%

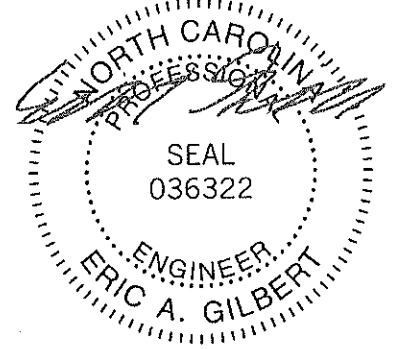
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 12-14: 2x6 SP DSS, 20-21: 2x4 SP No.3  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 1-18,11-12: 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.  
 WEBS 1 Row at midpt 3-16, 4-16, 5-16, 6-15, 7-14  
 JOINTS 1 Brace at Jt(s): 19

**REACTIONS.** (size) 18=0-5-8, 12=0-5-8  
 Max Horz 18=275(LC 7)  
 Max Uplift 18=-31(LC 10)  
 Max Grav 18=1576(LC 1), 12=1761(LC 2)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-3=-2031/229, 3-4=-1787/300, 4-5=-1724/407, 5-6=-1881/303, 6-7=-1881/303,  
 7-8=-1539/405, 8-9=-1553/239, 9-10=-1638/229, 10-11=-1511/99, 1-18=-1514/181,  
 11-12=-2041/70  
 BOT CHORD 17-18=-267/362, 16-17=-145/1542, 15-16=-138/1436, 14-15=-32/1311, 13-14=0/1215  
 WEBS 3-16=-334/165, 4-16=-295/179, 5-16=-231/343, 5-15=-11/952, 6-15=-472/172,  
 7-15=-152/1089, 7-14=-412/358, 14-19=-338/301, 8-19=-338/301, 10-13=-463/184,  
 1-17=-41/1367, 11-13=0/1677

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) Provide adequate drainage to prevent water ponding.
  - 4) All plates are 2x4 MT20 unless otherwise indicated.
  - 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) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 13-14
  - 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18.
  - 9) ATTIC SPACE SHOWN IS DESIGNED AS UNINHABITABLE.



October 11, 2022

<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MH-7473 rev. 5/19/2020 BEFORE USE.        Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing Indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANS/HPH Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p><b>ENGINEERING BY</b>  <b>TRENCO</b>        A MITEK Affiliate</p> <p>818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	D1E	Common Supported Gable	1	1	154618059

84 Components (Dunn), Dunn, NC - 28334,

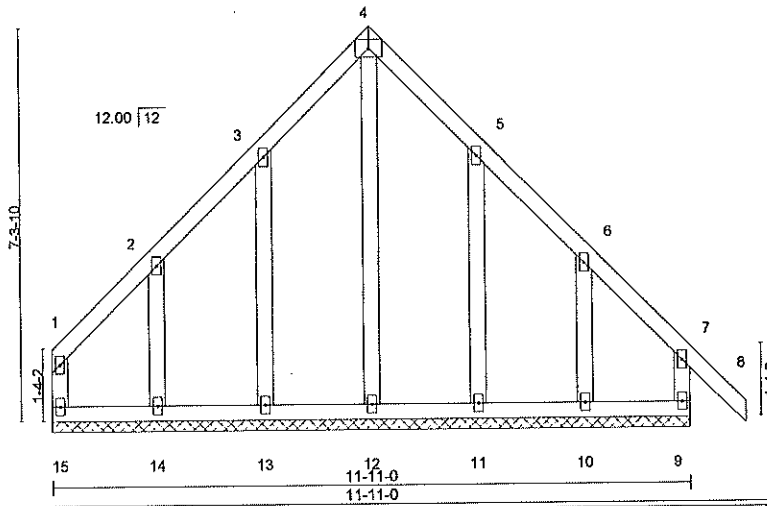
8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:48 2022 Page 1

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4x6 =

Scale = 1:41.2



<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.15	In (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.10	Vert(LL) -0.00 8 n/r 120		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.24	Vert(CT) -0.01 8 n/r 90		
BCDL 10.0	Rep Stress Incr YES	Matrix-R	Horz(CT) 0.00 9 n/a n/a	Weight: 81 lb	FT = 20%
	Code IRC2015/TPI2014				

**LUMBER-**

- TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2
- BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2
- WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
7-9: 2x4 SP No.3
- OTHERS 2x4 SP No.3 \*Except\*  
4-12: 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**

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

**REACTIONS.**

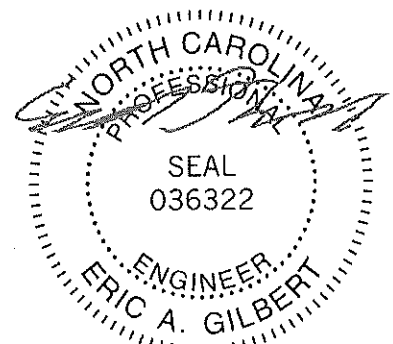
- All bearings 11-11-0.
- (lb) - Max Horz 15=-174(LC 6)
- Max Uplift All uplift 100 lb or less at joint(s) 15, 9, 13, 11 except 14=-130(LC 10), 10=-136(LC 11)
- Max Grav All reactions 250 lb or less at joint(s) 15, 9, 12, 13, 14, 11, 10

**FORCES.**

- (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
- WEBS 4-12=-289/165

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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.
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- Gable studs spaced at 2-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 15, 9, 13, 11 except (it=lb) 14=130, 10=136.



October 11, 2022

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITTEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MITTEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing Indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

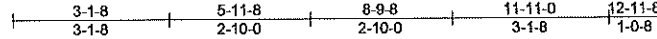
ENGINEERING BY  
**TRENCO**  
 A MiTek Alliance  
 818 Soundside Road  
 Edenon, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	D2G	Common Girder	1	2	154618060

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:50 2022 Page 1

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4x6 ||

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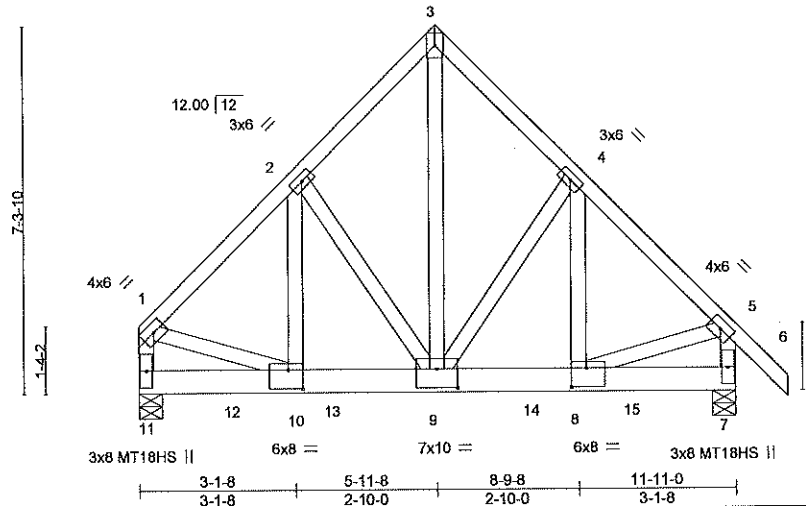


Plate Offsets (X,Y)-- [8:0-3-8,0-4-8], [9:0-5-0,0-4-8], [10:0-3-8,0-4-8]

<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.60	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.59	Vert(LL) -0.03 8-9 >999 240	MT18HS	244/190
BCLL 0.0 *	Lumber DOL 1.15	WB 0.54	Vert(CT) -0.06 8-9 >999 180		
BCDL 10.0	Rep Stress Incr NO	Matrix-MS	Horz(CT) 0.01 7 n/a n/a		
	Code IRC2015/TPI2014			Weight: 202 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x6 SP No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 1-11,5-7: 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) 11=0-5-8, 7=0-5-8  
 Max Horz 11=-172(LC 4)  
 Max Uplift 11=-134(LC 9), 7=-137(LC 9)  
 Max Grav 11=4681(LC 1), 7=4640(LC 1)

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

TOP CHORD 1-2=-4280/160, 2-3=-3295/189, 3-4=-3292/188, 4-5=-4291/163, 1-11=-4043/132, 5-7=-4139/139  
 BOT CHORD 10-11=-153/345, 9-10=-117/2969, 8-9=-47/2968  
 WEBS 3-9=-201/4386, 4-9=-1156/139, 4-8=-52/1539, 2-9=-1157/140, 2-10=-47/1518, 1-10=-58/2875, 5-8=-50/2898

**NOTES-**

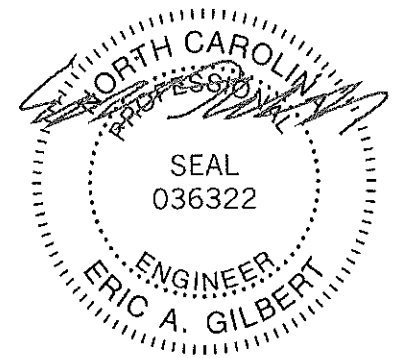
- 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:  
 Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc.  
 Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-6-0 oc.  
 Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
- All loads are considered equally 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.
- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- All plates are MT20 plates unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 11=134, 7=137.
- Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 1670 lb down and 54 lb up at 1-10-4, 1670 lb down and 54 lb up at 3-10-4, 1670 lb down and 54 lb up at 5-10-4, and 1670 lb down and 54 lb up at 7-10-4, and 1670 lb down and 54 lb up at 9-10-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

October 11,2022

Continued on page 2

**WARNING** - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI Quality Criteria, DSB-69 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601



818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618060
34111-34111A	D2G	Common Girder	1	2	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:50 2022 Page 2  
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**LOAD CASE(S)** Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15

Uniform Loads (plf)

Vert: 1-3=-60, 3-5=-60, 5-6=-60, 7-11=-20

Concentrated Loads (lb)

Vert: 9=-1664(B) 12=-1664(B) 13=-1664(B) 14=-1664(B) 15=-1664(B)

<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE. Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MITek Alliance</small></p> <p>818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618061
34111-34111A	G1E	Common Supported Gable	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:51 2022 Page 1  
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 19-11-0 20-11-8  
 9-11-8 1-0-8

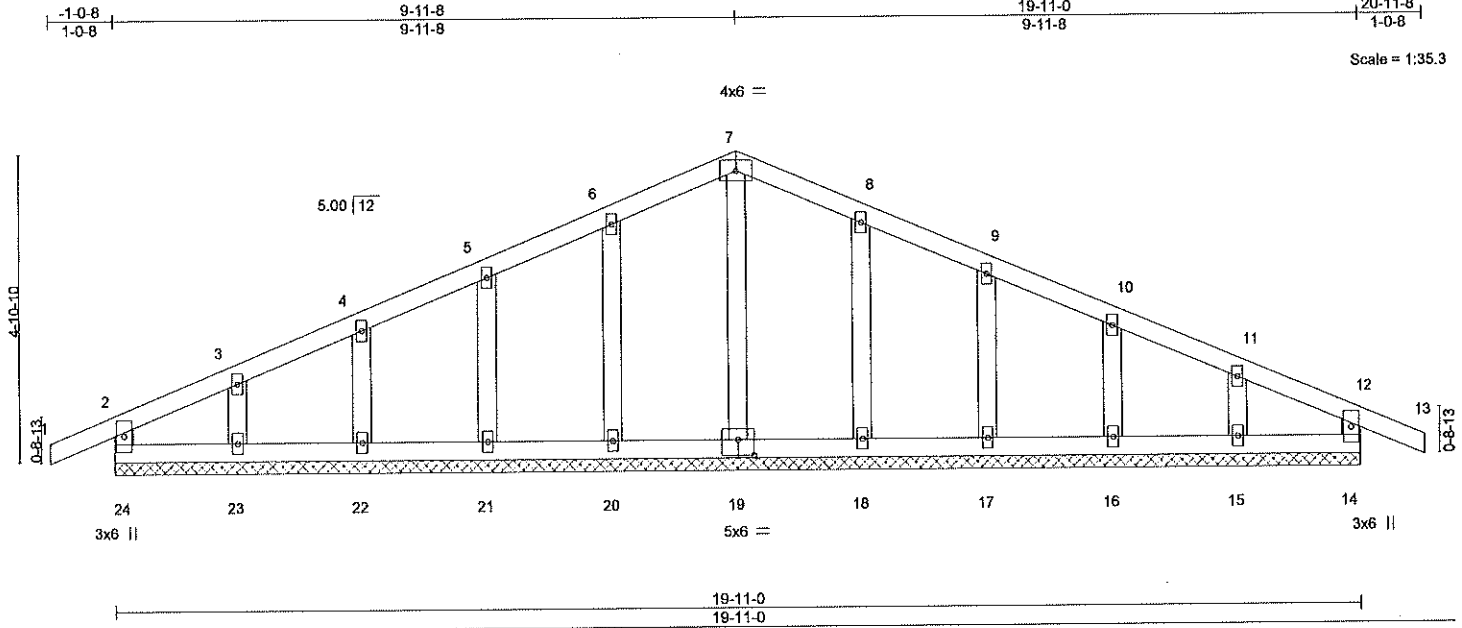


Plate Offsets (X,Y)--	[19:0-3-0,0-3-0]							
LOADING (psf)	SPACING- 2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.09	Vert(LL) -0.00	13	n/r	120	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.03	Vert(CT) -0.01	13	n/r	90		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.05	Horz(CT) 0.00	14	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-R					Weight: 99 lb	FT = 20%

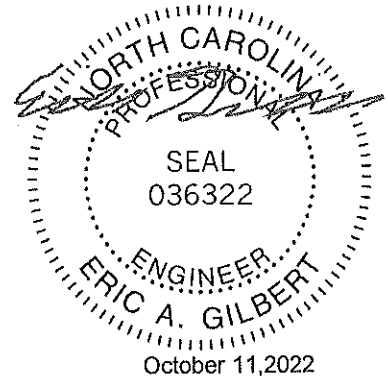
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.3  
 OTHERS 2x4 SP No.3

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

**REACTIONS.** All bearings 19-11-0.  
 (lb) - Max Horz 24=-52(LC 15)  
 Max Uplift All uplift 100 lb or less at joint(s) 24, 14, 20, 21, 22, 23, 18, 17, 16, 15  
 Max Grav All reactions 250 lb or less at joint(s) 24, 14, 19, 20, 21, 22, 23, 18, 17, 16, 15

**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 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical 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) All plates are 2x4 MT20 unless otherwise indicated.
  - 5) Gable requires continuous bottom chord bearing.
  - 6) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
  - 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) 24, 14, 20, 21, 22, 23, 18, 17, 16, 15.

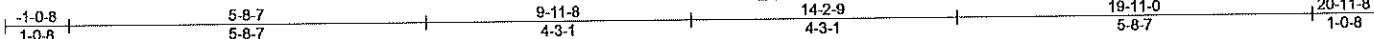


<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.          Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>          A MITek Affiliate          818 Soundside Road          Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	1	ONSITE- ROOF	IS4618062
34111-34111A	G2	Common	5	1	Job Reference (optional)		

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:53 2022 Page 1  
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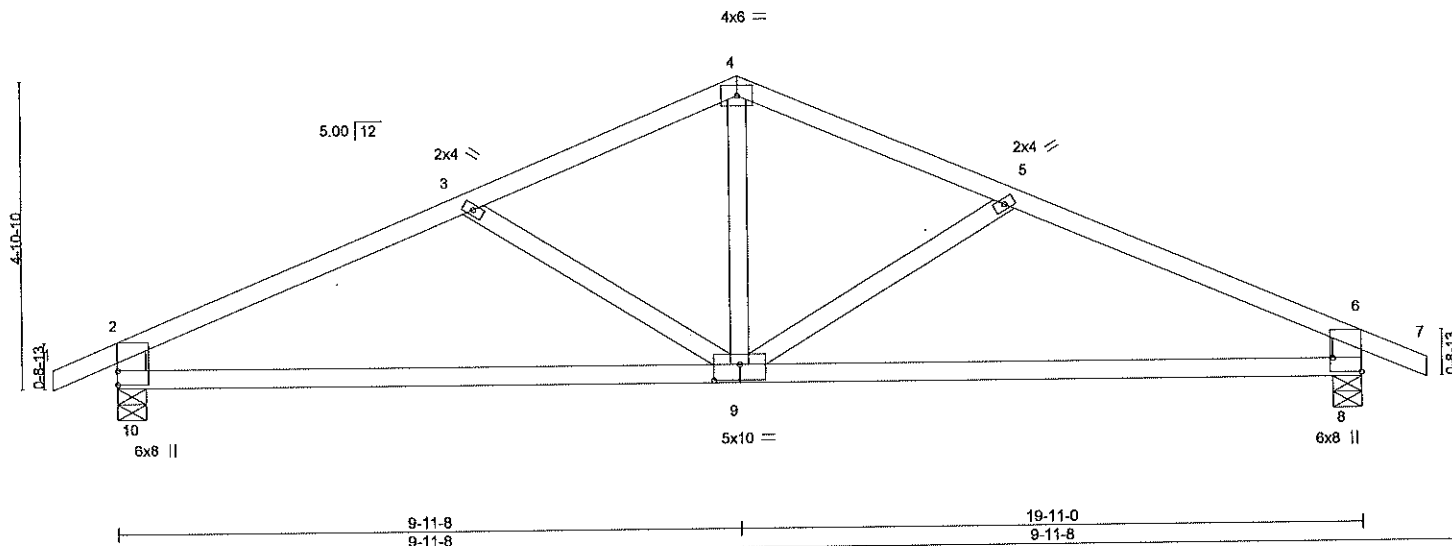


Plate Offsets (X,Y)-- [8:Edge,0-5-8], [9:0-5-0,0-3-0]

LOADING (psf)	SPACING-	CSL.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.92	Vert(LL)	-0.18	9-10	>999	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.89	Vert(CT)	-0.37	9-10	>632		
BCLL 0.0	Lumber DOL 1.15	WB 0.12	Horz(CT)	0.03	8	n/a		
BCDL 10.0	Rep Stress Incr YES	Matrix-MS					Weight: 88 lb	FT = 20%
	Code IRC2015/TP12014							

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 2-10,6-8: 2x6 SP No.2

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.**

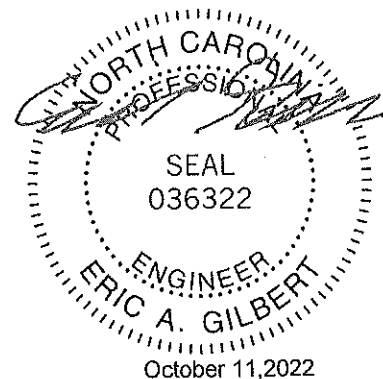
(size) 10=0-5-8, 8=0-5-8  
 Max Horz 10=51(LC 10)  
 Max Uplift 10=-66(LC 10), 8=-66(LC 11)  
 Max Grav 10=855(LC 1), 8=855(LC 1)

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

TOP CHORD 2-3=-1228/239, 3-4=-967/172, 4-5=-967/172, 5-6=-1228/239, 2-10=-753/226, 6-8=-753/226  
 BOT CHORD 9-10=-117/1048, 8-9=-117/1048  
 WEBS 4-9=-21/469, 5-9=-257/151, 3-9=-257/151

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TC DL=6.0psf; BC DL=8.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 10, 8.



**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
 A MiTek Alliance

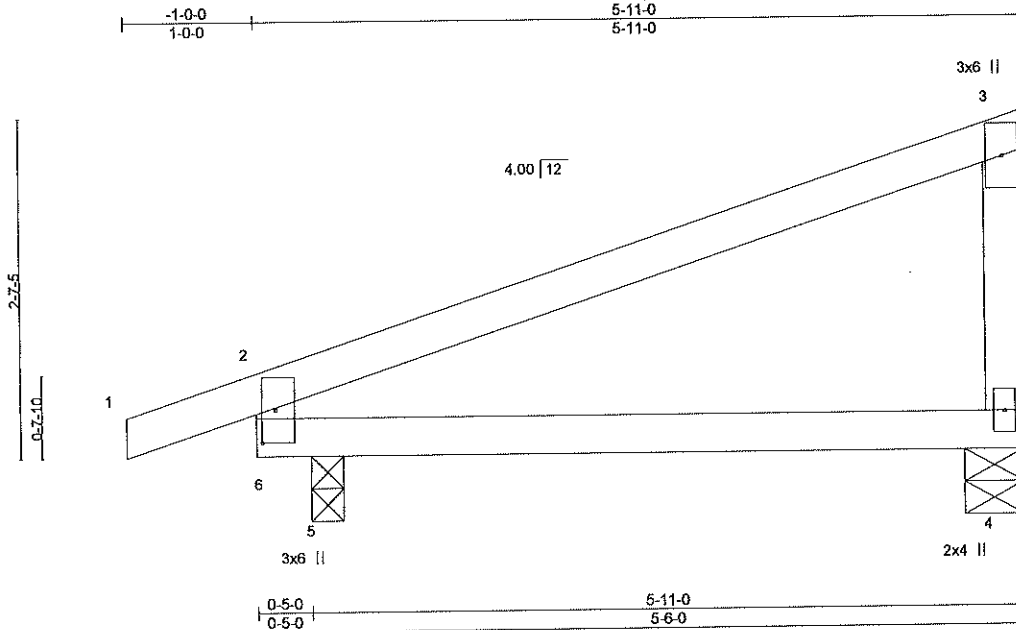
818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618063
34111-34111A	M1	Monopitch	5	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:56:53 2022 Page 1

ID:4C\_?;Ok7l8eo4Te8?OXgvBybTPY-z6D\_CNcAljBgl7Xs7byUHKoOwyEx\_C8CAnp0x9yVmju



Scale = 1:17.0

Plate Offsets (X,Y)-- [6:0-3-0,0-1-4]

LOADING (psf)	SPACING-	CSL	DEFL.	In (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.37	Vert(LL) -0.03	4-5	>999	240	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.22	Vert(CT) -0.05	4-5	>999	180		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.00	Horz(CT) 0.00	4	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-MR					Weight: 23 lb	FT = 20%

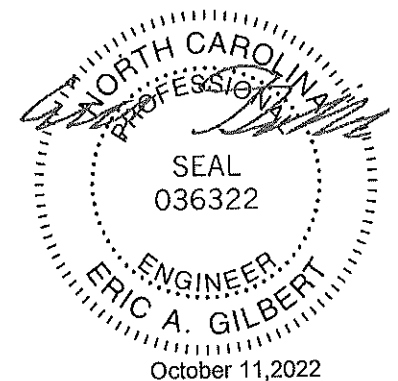
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 2-6: 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 5-11-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (size) 4=0-5-8, 5=0-3-0  
 Max Horz 5=86(LC 7)  
 Max Uplift 4=-28(LC 10), 5=-69(LC 6)  
 Max Grav 4=195(LC 1), 5=324(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-6=-265/169

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* 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.
  - 4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 4, 5.



**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MI-7473 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITP1 Quality Criteria, DSB-89 and BCS1 Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20681

**ENGINEERING BY**  
**TRENCO**  
 A Mitek Affiliate  
 818 Soundside Road  
 Edenon, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618064
34111-34111A	M1E	Jack-Partial Supported Gable	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:54 2022 Page 1  
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Scale = 1:11.8

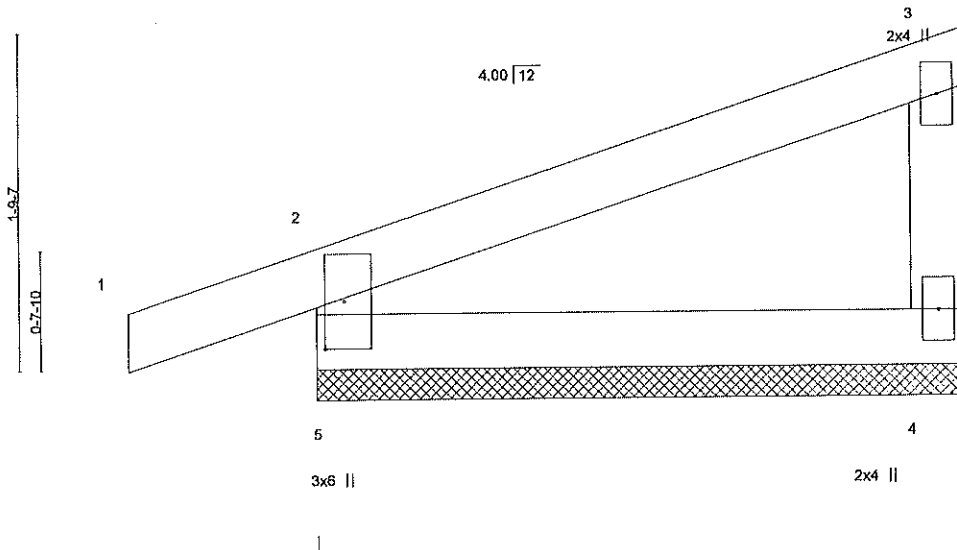


Plate Offsets (X,Y)-- [5:0-3-0,0-1-4]									
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.10	Vert(LL)	-0.00	1	n/r	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.08	Vert(CT)	0.00	1	n/r		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	4	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-R					Weight: 14 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.3

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 3-5-8 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.**

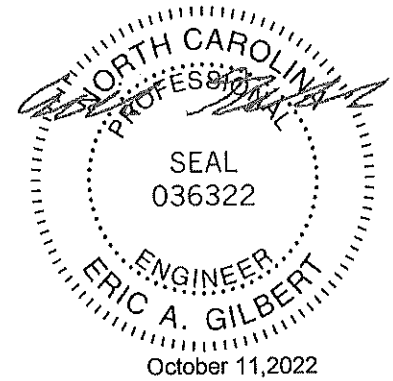
(size) 5=3-5-8, 4=3-5-8  
 Max Horz 5=57(LC 7)  
 Max Uplift 5=-52(LC 6), 4=-16(LC 10)  
 Max Grav 5=208(LC 1), 4=114(LC 1)

**FORCES.**

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

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical 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) Gable requires continuous bottom chord bearing.
- 4) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 5) Gable studs spaced at 2-0-0 oc.
- 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) 5, 4.



<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MIT-7473 rev. 5/19/2020 BEFORE USE.          Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MiTek Alliance</small>          818 Soundside Road          Edenton, NC 27932</p>
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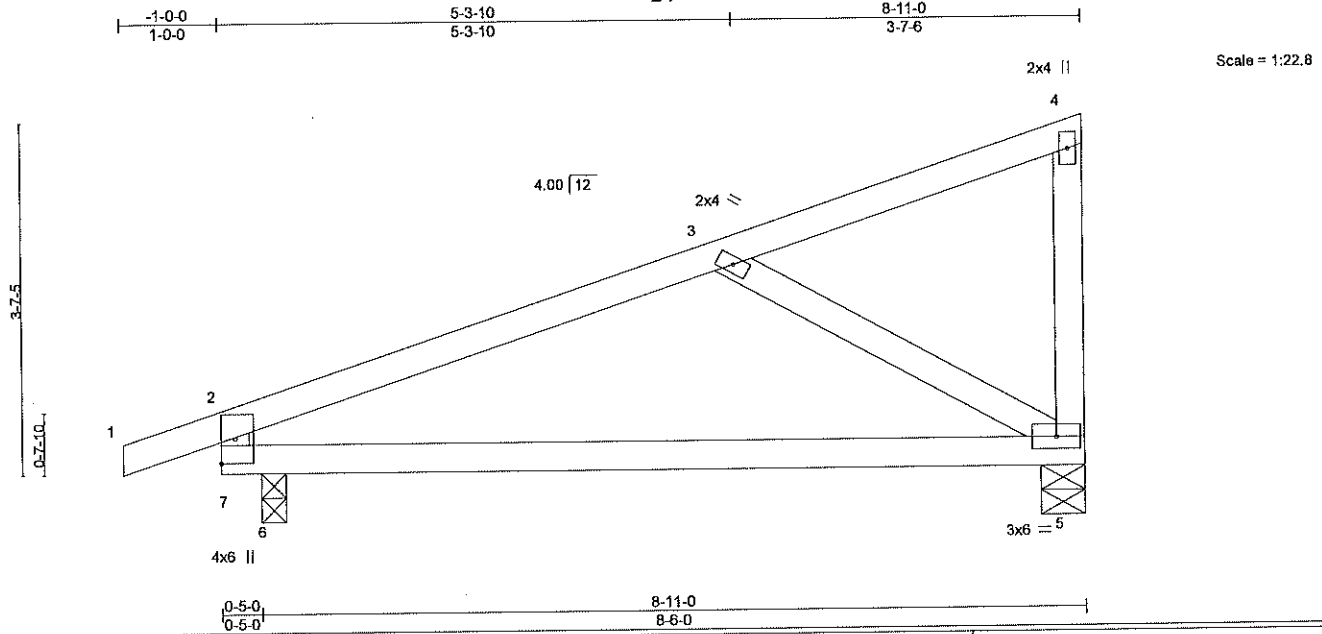


Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	M2	Monopitch	2	1	154618065

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:55 2022 Page 1

ID:4C\_7jOk7l8eo4Te8?OXgvBybTPY-vVKkd3dQPKRO\_jhEF?\_ymIj?mr2S50Ve5l7?yVmjs



Scale = 1:22.8

<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.46	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.57	Vert(LL) -0.14 5-6 >689 240		
BCLL 0.0	Lumber DOL 1.15	WB 0.10	Vert(CT) -0.27 5-6 >366 180		
BCDL 10.0	Rep Stress Incr YES	Matrix-MS	Horz(CT) 0.00 5 n/a n/a		
	Code IRC2015/TPI2014			Weight: 39 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2 \*Except\*  
 2-7: 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.**

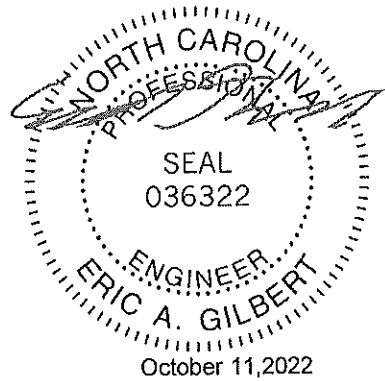
(size) 5=0-5-8, 6=0-3-0  
 Max Horz 6=111(LC 6)  
 Max Uplift 5=-56(LC 10), 6=-66(LC 6)  
 Max Grav 5=320(LC 1), 6=438(LC 1)

**FORCES.**

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-385/87, 2-7=-335/173  
 BOT CHORD 6-7=-10/318, 5-6=-158/318  
 WEBS 3-5=-343/193

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 3) \* 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.
- 4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 6.

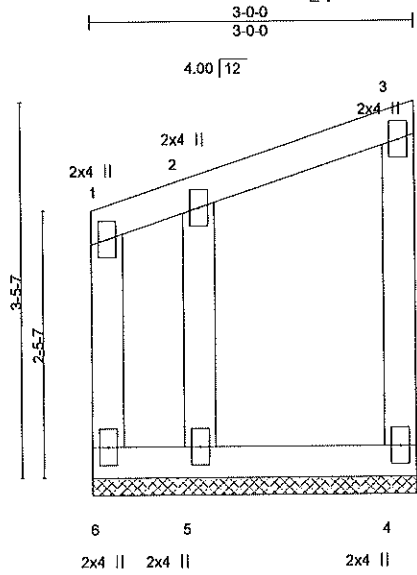


<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE Mill-7473 rev. 5/13/2020 BEFORE USE.          Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p><b>ENGINEERING BY</b>  <b>TRENCO</b>          A MiTek Affiliate          818 Soundside Road          Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	M2E	Monopitch Supported Gable	1	1	154618066

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22, 2022 MiTek Industries, Inc. Fri Oct 7 14:56:56 2022 Page 1  
 ID:4C\_?jOk7I8eo4Te8?OXgvBybTPY-OhuGqPe2AeaFcTGRojVBjzGal9InBZxesi1gYUyVmjr



Scale = 1:20.4

<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.10	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.09	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.02	Horz(CT)	-0.00	4	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-R					Weight: 20 lb	FT = 20%

**LUMBER-**

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

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 3-0-0 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

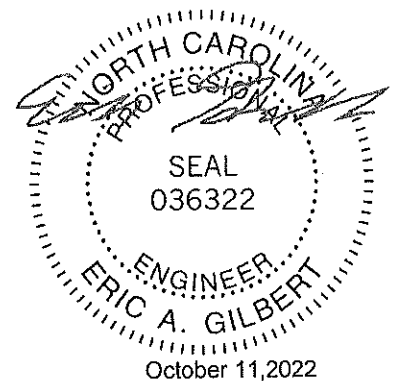
**REACTIONS.**

(size) 6=3-0-0, 4=3-0-0, 5=3-0-0  
 Max Horz 6=100(LC 7)  
 Max Uplift 6=27(LC 8), 4=28(LC 7), 5=93(LC 7)  
 Max Grav 6=125(LC 7), 4=65(LC 1), 5=136(LC 1)

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

**NOTES-**

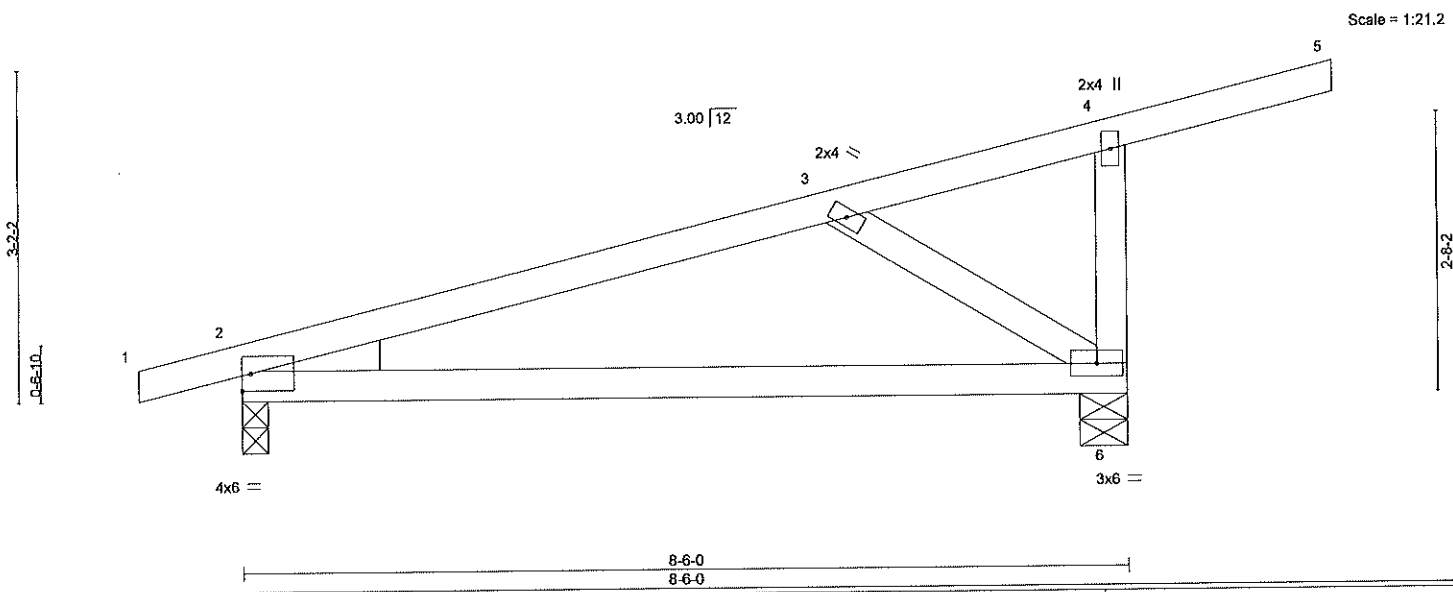
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 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) Gable requires continuous bottom chord bearing.
- 4) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
- 5) Gable studs spaced at 2-0-0 oc.
- 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) 6, 4, 5.



<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MH-7473 rev. 5/19/2020 BEFORE USE.          Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A.M.I. &amp; A.I.B.A.®</small></p> <p>818 Soundside Road          Edenonton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618067
34111-34111A	M3	MONOPITCH	5	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 Mitek Industries, Inc. Fri Oct 7 14:56:57 2022 Page 1  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-stSU2lfhxyi6ErdmMQQrAppzZVYw?\_o5PnE4wyVmjq



LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	f/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.43	Vert(LL)	-0.17	6-9	>593	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.69	Vert(CT)	-0.35	6-9	>285		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.07	Horz(CT)	0.02	2	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-MP					Weight: 40 lb	FT = 20%

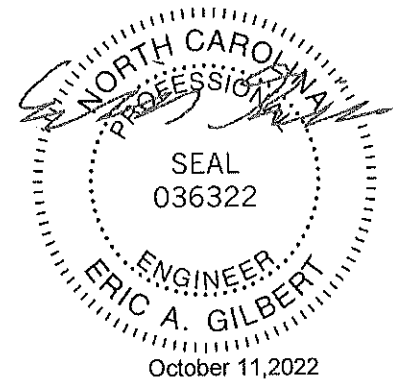
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2  
 WEDGE  
 Left: 2x4 SP No.3

**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) 2=0-3-0, 6=0-5-8  
 Max Horz 2=97(LC 7)  
 Max Uplift 2=-57(LC 6), 6=-86(LC 10)  
 Max Grav 2=381(LC 1), 6=476(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 2-3=-357/78  
 BOT CHORD 2-6=-81/322  
 WEBS 3-6=-378/139

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 3) \* 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.
  - 4) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 6.



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618068
34111-34111A	M3E	MONOPITCH SUPPORTED	2	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:58 2022 Page 1  
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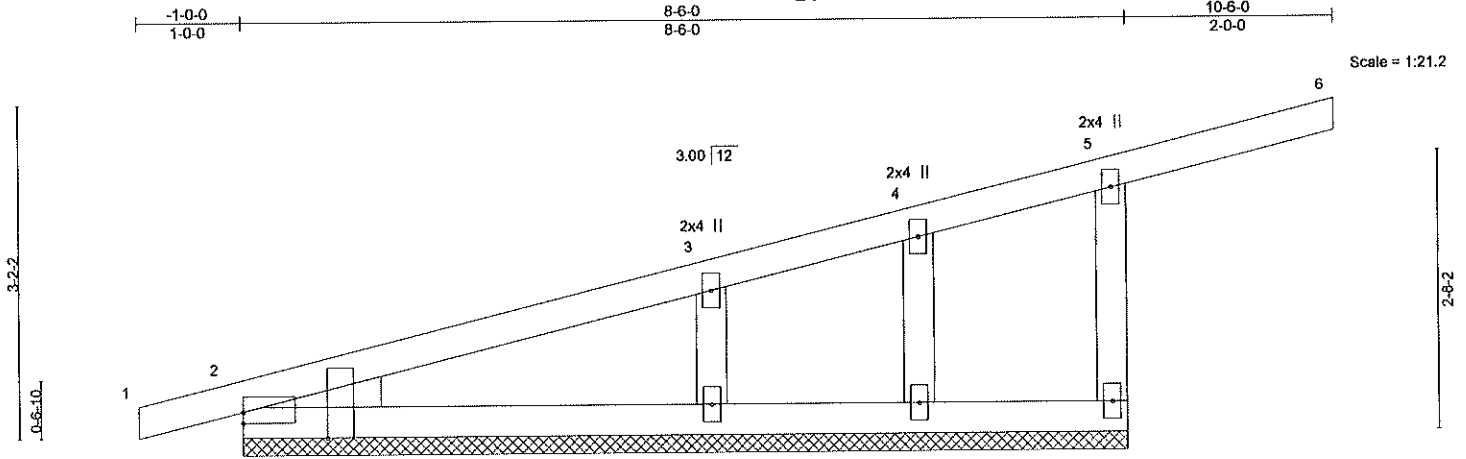


Plate Offsets (X,Y)--		[2:0-0-0,0-1-4], [2:0-3-0,Edge]						PLATES	GRIP
LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(oc)	l/defl	L/d	
TCLL 20.0	Plate Grip DOL	1.15	TC 0.31	Vert(LL)	0.01	6	n/r	120	MT20
TCDL 10.0	Lumber DOL	1.15	BC 0.16	Vert(CT)	-0.01	6	n/r	90	
BCLL 0.0	Rep Stress Incr	YES	WB 0.06	Horz(CT)	-0.00	7	n/a	n/a	
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P						Weight: 39 lb
									FT = 20%

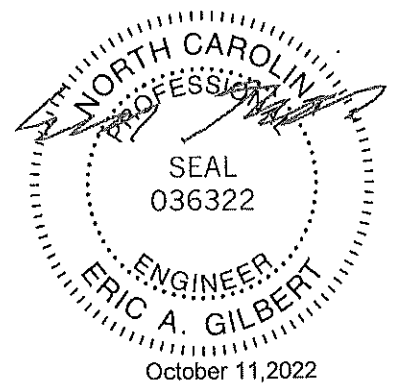
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3  
 WEDGE  
 Left: 2x4 SP No.3

**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.** All bearings 8-6-0.  
 (lb) - Max Horz 2=98(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 7, 2, 8, 9  
 Max Grav All reactions 250 lb or less at joint(s) 2, 8 except 7=294(LC 1), 9=374(LC 1)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 5-7=-275/205  
 WEBS 3-9=-281/174

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical 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) Gable requires continuous bottom chord bearing.
  - 4) Gable studs spaced at 2-0-0 oc.
  - 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) 7, 2, 8, 9.

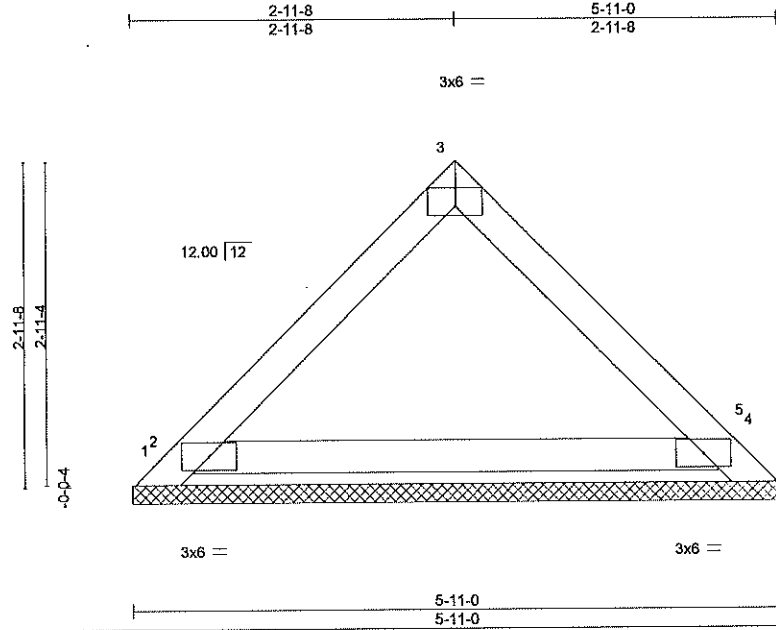


<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.          Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MiTek Affiliate</small></p> <p>818 Soundside Road          Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
341111-341111A	PB1	GABLE	10	1	I54618069

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:56:59 2022 Page 1  
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Scale = 1:20.2

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

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in	(loc)	l/def	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.10	Vert(LL)	n/a	-	n/a	999	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.29	Vert(CT)	n/a	-	n/a	999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	5	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P						Weight: 19 lb	FT = 20%

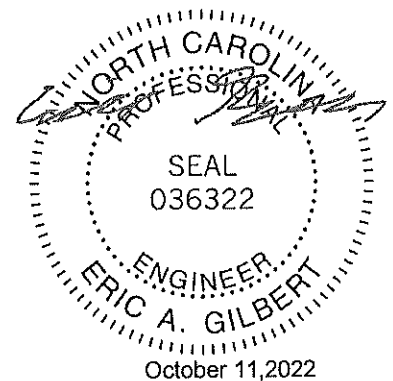
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 5-11-0 oc purlins.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 5-11-0.  
 (lb) - Max Horz 1=57(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) except 1=157(LC 17), 5=124(LC 18), 2=146(LC 10), 4=117(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 2=358(LC 17), 4=328(LC 1)

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

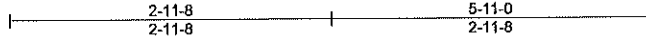
- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and 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) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 4-0-0 oc.
  - 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) Bearing at joint(s) 5, 4 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 157 lb uplift at joint 1, 124 lb uplift at joint 5, 146 lb uplift at joint 2 and 117 lb uplift at joint 4.
  - 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



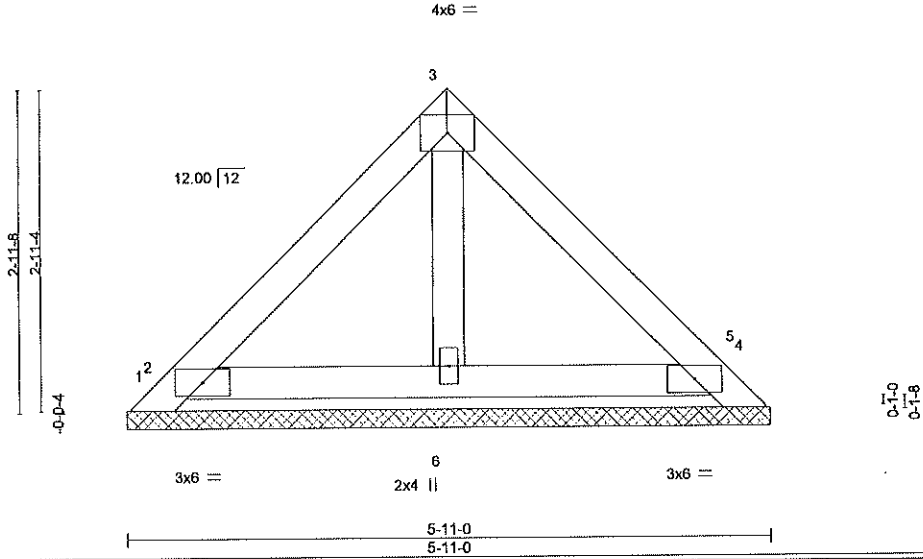
Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	PB1E	GABLE	1	1	154618070

84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:00 2022 Page 1  
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Scale = 1:20.3



<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.10	In (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.06	Vert(LL) n/a - n/a 999		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.02	Vert(CT) n/a - n/a 999		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-P	Horz(CT) 0.00 4 n/a n/a	Weight: 23 lb	FT = 20%

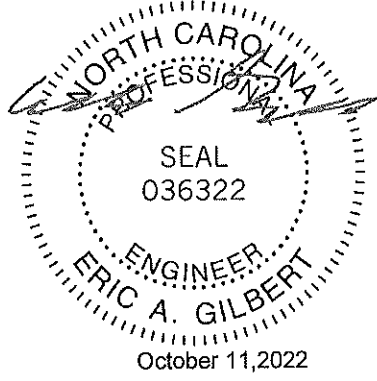
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 5-11-0 oc purlins.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** All bearings 5-11-0.  
 (lb) - Max Horz 1=57(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) except 1=155(LC 17), 5=123(LC 18), 2=161(LC 10), 4=139(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5, 6 except 2=290(LC 17), 4=265(LC 18)

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

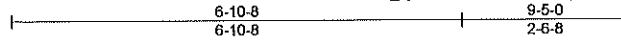
- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vu11=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 2-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bearing at joint(s) 5, 4 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 155 lb uplift at joint 1, 123 lb uplift at joint 5, 161 lb uplift at joint 2 and 139 lb uplift at joint 4.
  - See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618071
34111-34111A	PB2	GABLE	1	1	Job Reference (optional)	

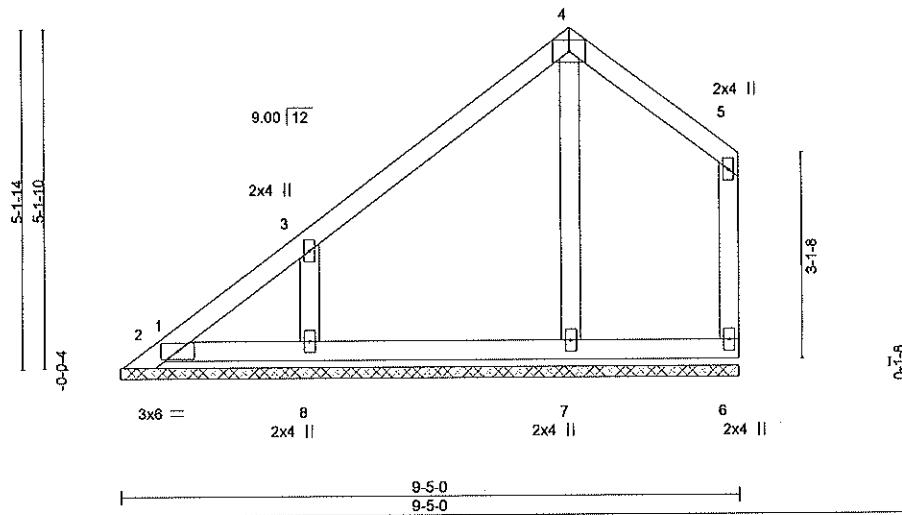
84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:01 2022 Page 1  
 ID:4C\_7jOk7l8eo4Te87OXgvBybTPY-kf1?IGIB?ACXIE8ObG5M00zPSA?qspwN01IRDhVymjm



4x6 =

Scale = 1:33.6



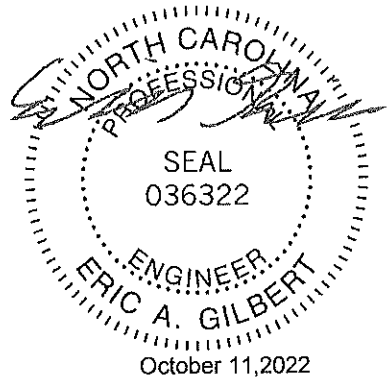
<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.21	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.09	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.08	Horz(CT)	-0.00	6	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P					Weight: 43 lb	FT = 20%

<b>LUMBER-</b>	<b>BRACING-</b>
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.3	
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 9-5-0.  
 (lb) - Max Horz 1=136(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 6 except 8=125(LC 10)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 6, 2 except 7=256(LC 17), 8=343(LC 17)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 3-8=271/175

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical 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) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 4-0-0 oc.
  - 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) Bearing at joint(s) 1, 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 6 except (if=lb) 8=125.
  - 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
341111-341111A	PB2E	GABLE	1	1	I54618072

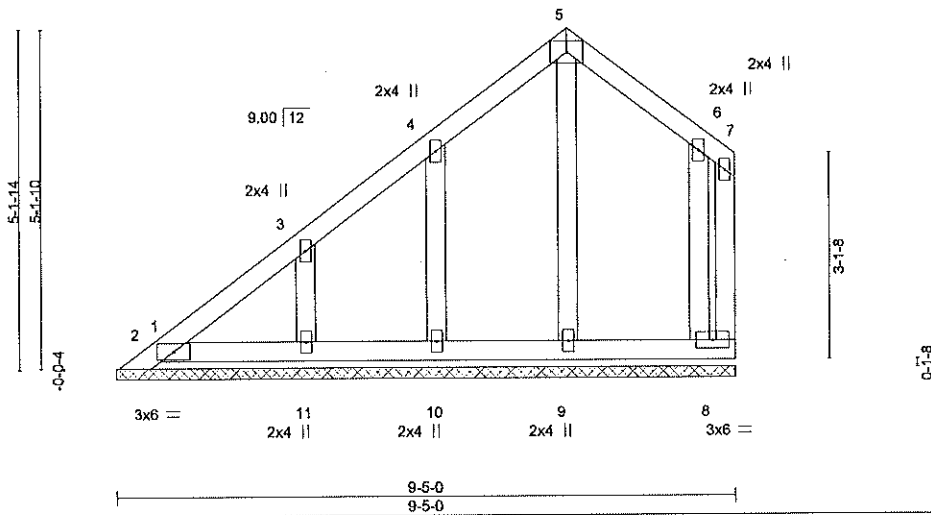
84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:57:02 2022 Page 1  
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4x6 =

Scale = 1:33.6



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.12	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.04	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.04	Horz(CT)	-0.00	8	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P					Weight: 52 lb	FT = 20%

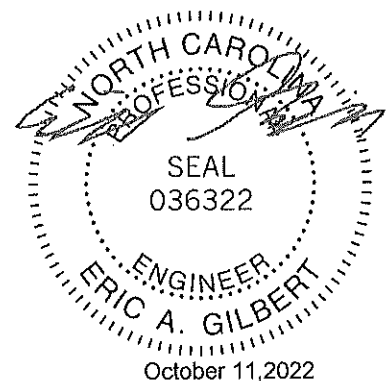
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.3  
 OTHERS 2x4 SP No.3

**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.** All bearings 9-5-0.  
 (lb) - Max Horz 1=136(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 8, 2, 9, 10, 11  
 Max Grav All reactions 250 lb or less at joint(s) 1, 8, 2, 9, 10, 11

**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 7-10; Vull=120mph Vasd=95mph; TCCL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical 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) Gable requires continuous bottom chord bearing.
  - 5) Gable studs spaced at 2-0-0 oc.
  - 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) Bearing at joint(s) 1, 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 8, 2, 9, 10, 11.
  - 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/13/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20687

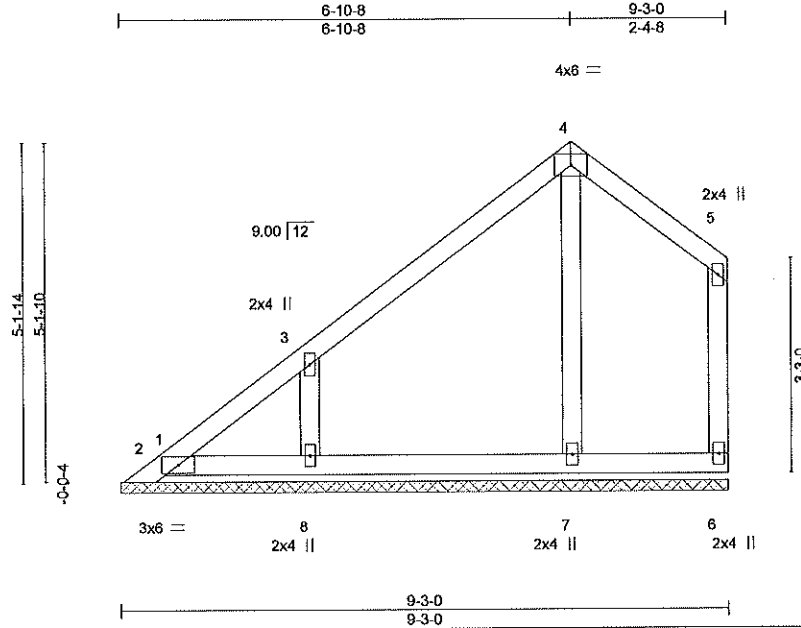
**ENGINEERING BY**  
**TRENCO**  
 A MITek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932



Job	Truss	Truss Type	Qty	Ply	9 ONSITE- ROOF	154618073
341111-341111A	PB3	Piggyback	9	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:57:04 2022 Page 1  
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Scale = 1:33.6

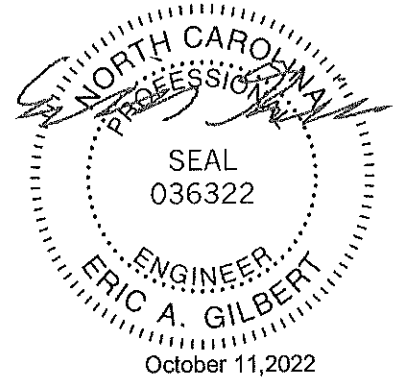
LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	l/d	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.21	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.09	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.08	Horz(CT)	-0.00	6	n/a		
BCDL 10.0	Rep Stress Incr YES	Matrix-P					Weight: 43 lb	FT = 20%
	Code IRC2015/TPI2014							

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2	TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.3	
OTHERS 2x4 SP No.3	

**REACTIONS.** All bearings 9-3-0.  
 (lb) - Max Horz 1=137(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 6, 7 except 8=125(LC 10)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 6, 2 except 7=251(LC 17), 8=343(LC 17)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 3-8=271/176

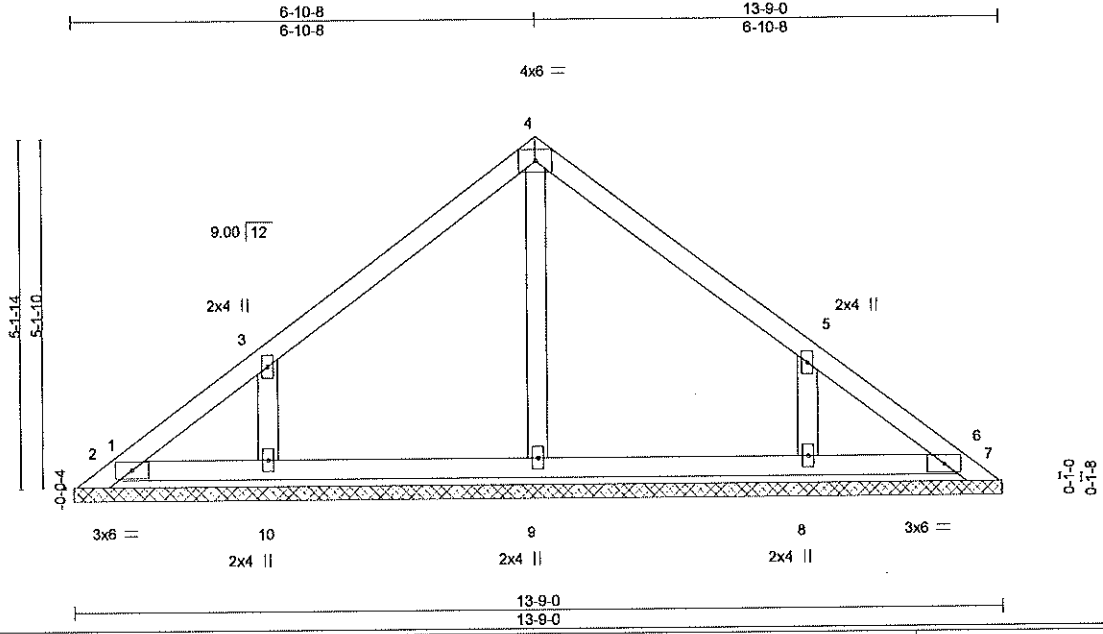
- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 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.
  - Gable requires continuous bottom chord bearing.
  - Gable studs spaced at 4-0-0 oc.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Bearing at joint(s) 1, 2 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 6, 7 except (jt=lb) 8=125.
  - See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



Job	Truss	Truss Type	Qty	Ply	INSITE- ROOF	154618074
34111-34111A	PB6	Piggyback	13	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 Mitek Industries, Inc. Fri Oct 7 14:57:05 2022 Page 1  
 ID:4C\_?jOk7I8eo4Te8?OXgvBybTPY-dQxWjUI3PizBrS9q69IA8B6xMKocxzxfjfMSyVmj



Scale = 1:32.7

<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL 1.15	TC 0.17	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.12	Vert(LL) n/a - n/a 999		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.08	Vert(CT) n/a - n/a 999		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S	Horz(CT) 0.00 7 n/a n/a	Weight: 55 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF 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.

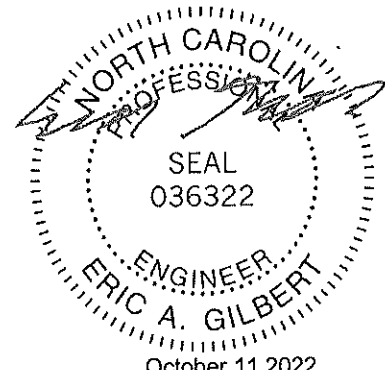
**REACTIONS.**

All bearings 13-9-0.  
 (lb) - Max Horz 1=104(LC 7)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 7 except 10=114(LC 10), 8=113(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 7, 2, 6 except 9=254(LC 1), 10=315(LC 17), 8=314(LC 18)

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

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 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.
- Gable requires continuous bottom chord bearing.
- Gable studs spaced at 4-0-0 oc.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 7 except (jt=lb) 10=114, 8=113.
- See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



October 11, 2022

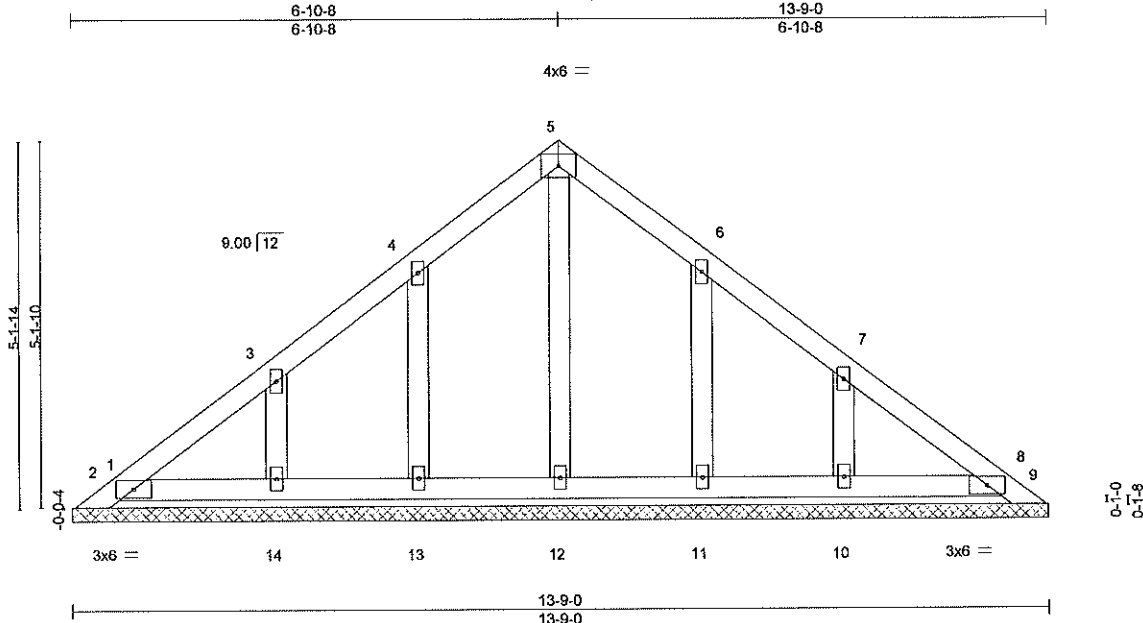
**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.**  
 Design valid for use only with Mitek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing Indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20687

**ENGINEERING BY**  
**TRENCO**  
 A MITEK AFFILIATE  
 818 Soundside Road  
 Edenon, NC 27932

Job 34111-34111A	Truss PB6E	Truss Type Piggyback	Qty 1	Ply 1	ONSITE- ROOF 154618075
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84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:07 2022 Page 1  
 ID:4C\_?jOk7I8eo4Te8?OXgvBybTPY-Zo3G8AnyayhQ9cYyXCmFHDFb38GXzGOzCmRLyVmjj



Scale = 1:31.1

<b>LOADING</b> (psf)	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.06	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.04	Vert(LL) n/a - n/a 999		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.04	Vert(CT) n/a - n/a 999		
BCDL 10.0	Rep Stress Incr YES	Matrix-S	Horz(CT) 0.00 8 n/a n/a	Weight: 64 lb	FT = 20%
	Code IRC2015/TPI2014				

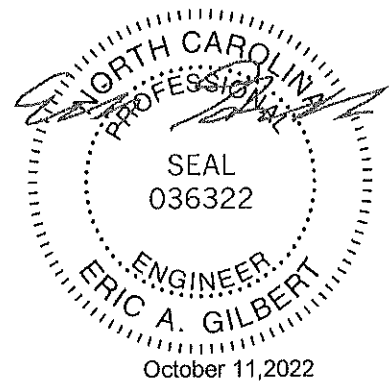
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3

**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 13-9-0.  
 (lb) - Max Horz 1=-104(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 9, 2, 8, 13, 14, 11, 10  
 Max Grav All reactions 250 lb or less at joint(s) 1, 9, 2, 8, 12, 13, 14, 11, 10

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

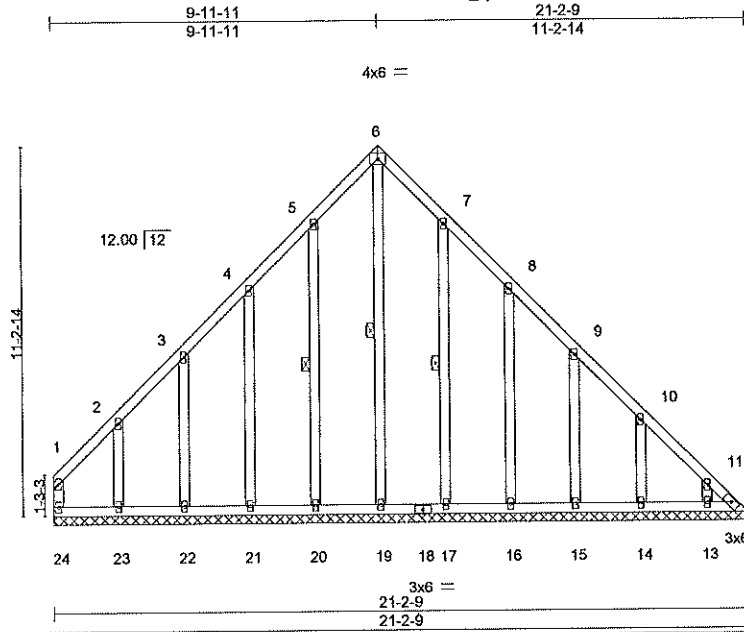
- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left 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) 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) 1, 9, 2, 8, 13, 14, 11, 10.
  - 10) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.



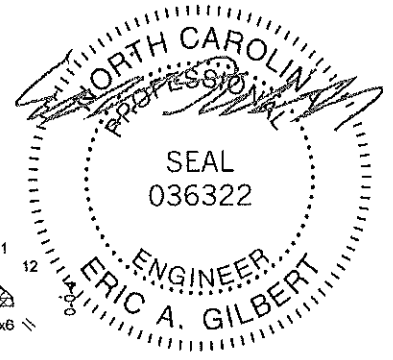
Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618076
34111-34111A	V1	GABLE	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:09 2022 Page 1  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-VBB1ZroC6eCPgTx3yEEKilnDPkK00ZsHhsVdYmje



Scale = 1:67.5



LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.16	Vert(LL) n/a	-	n/a	999	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.10	Vert(CT) n/a	-	n/a	999		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.20	Horz(CT) 0.01	12	n/a	n/a		
BCDL 10.0	Code IRC2015/TPI2014	Matrix-S					Weight: 161 lb	FT = 20%

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

**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.  
 WEBS 1 Row at midpt 6-19, 5-20, 7-17

**REACTIONS.** All bearings 21-2-9.  
 (lb) - Max Horz 24=-241(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) 24, 19, 20, 21, 22, 17, 16, 15, 14, 13 except 12=-151(LC 9), 23=-173(LC 10)  
 Max Grav All reactions 250 lb or less at joint(s) 24, 12, 20, 21, 22, 23, 17, 16, 15, 14, 13 except 19=372(LC 10)

**FORCES.** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 5-6=-272/302, 6-7=-272/303, 11-12=-268/234  
 WEBS 6-19=-368/267

- NOTES-**
- 1) Unbalanced roof live loads have been considered for this design.
  - 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 3) All plates are 2x4 MT20 unless otherwise indicated.
  - 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) 24, 19, 20, 21, 22, 17, 16, 15, 14, 13 except (it=tb) 12=151, 23=173.

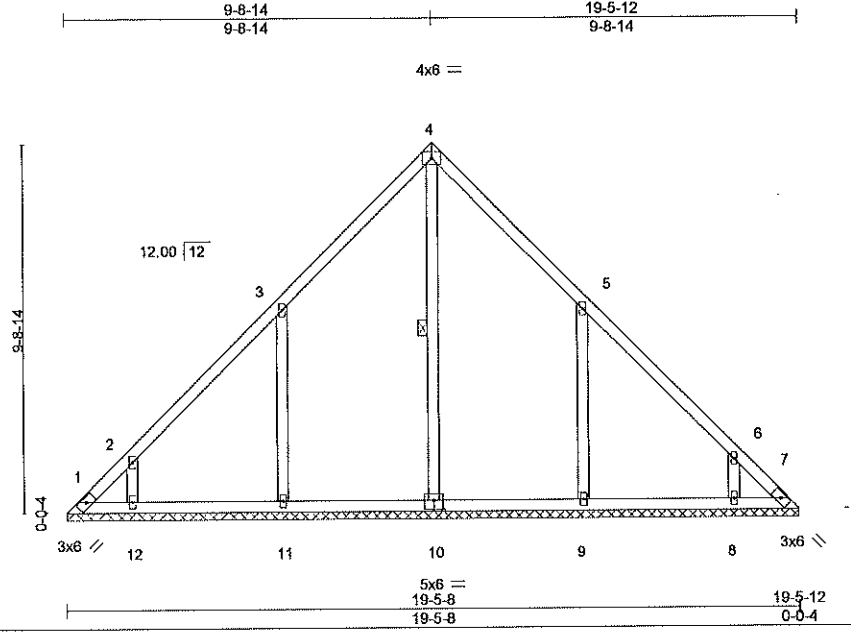
October 11, 2022

<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.        Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>        A MiTek Affiliate        818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	V2	Valley	1	1	154618077

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:57:13 2022 Page 1  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-OyQXPDJAsjq843lnJAVYTSS04AgDI8nuf4e7yVmja  
 19-5-12  
 9-8-14



Scale = 1:58.6

Plate Offsets (X,Y)-- [10;0-3-0,0-3-0]

<b>LOADING</b> (psf)	<b>SPACING-</b>	<b>CSI.</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.20	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.19	Vert(LL) n/a - n/a 999		
BCLL 0.0	Lumber DOL 1.15	WB 0.15	Vert(CT) n/a - n/a 999		
BCDL 10.0	Rep Stress Incr YES	Matrix-S	Horz(CT) 0.01 7 n/a n/a		
	Code IRC2015/TPI2014			Weight: 101 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.2 or 2x4 SPF No.2

**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.**

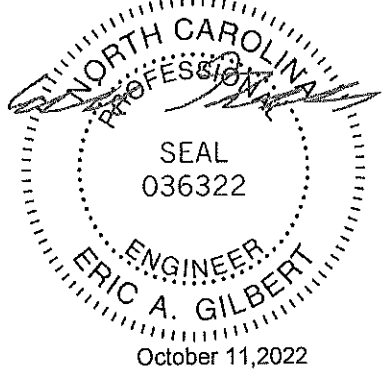
All bearings 19-5-4.  
 (lb) - Max Horz 1=-198(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) 7 except 1=-109(LC 8), 11=-189(LC 10), 12=-133(LC 10), 9=-188(LC 11), 8=-134(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 7 except 10=385(LC 20), 11=442(LC 17), 12=272(LC 17), 9=442(LC 18), 8=273(LC 18)

**FORCES.**

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 TOP CHORD 1-2=-277/174  
 WEBS 3-11=-312/238, 5-9=-312/238

**NOTES-**

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- All plates are 2x4 MT20 unless otherwise indicated.
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 7 except (l=lb) 1=109, 11=189, 12=133, 9=188, 8=134.

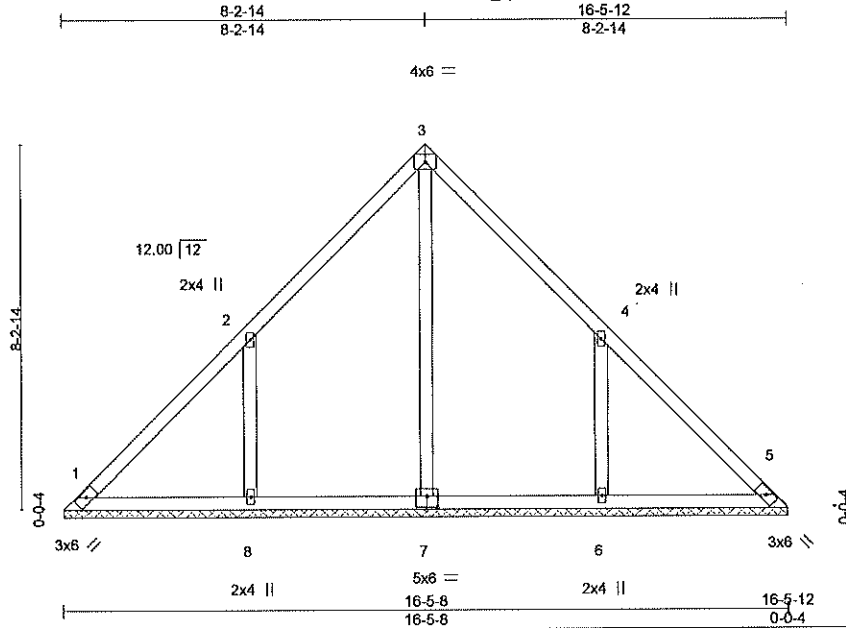


<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 9/19/2020 BEFORE USE.        Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSII/TPI1 Quality Criteria, DSB-89 and BCS1 Building Component Safety Information available from Truss Plate Institute, 2870 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MITek Affiliate</small>        818 Soundside Road        Edenboro, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE-ROOF
34111-34111A	V3	Valley	1	1	154618078
Job Reference (optional)					

84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:57:15 2022 Page 1  
 ID:4C\_?JOK7lBeo4Te8?OXgvBybTPY-KLYlpvtziUzYOOD4QCLeazYojqmh871REC8BjtyVmjY



Scale = 1:50.1

Plate Offsets (X,Y)-- [7:0-3-0,0-3-0]

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.22	Vert(LL)	n/a	n/a	999	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.18	Vert(CT)	n/a	n/a	999		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.16	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Rep Stress Incr YES	Matrix-S					Weight: 80 lb	FT = 20%
	Code IRC2015/TPI2014							

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3 \*Except\*  
 3-7: 2x4 SP No.2 or 2x4 SPF No.2

**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.**

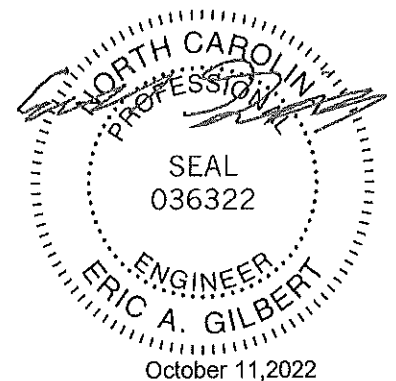
All bearings 16-5-4.  
 (lb) - Max Horz 1=166(LC 9)  
 Max Uplift All uplift 100 lb or less at joint(s) 1 except 8=201(LC 10), 6=201(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=363(LC 20), 8=467(LC 17), 6=467(LC 18)

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

WEBS 2-8=-327/245, 4-6=-327/245

**NOTES-**

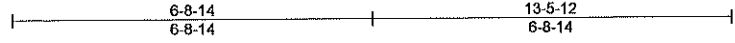
- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 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 100 lb uplift at joint(s) 1 except (jt=lb) 8=201, 6=201.



**WARNINGS -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MI-7473 rev. 5/10/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITP11 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20681

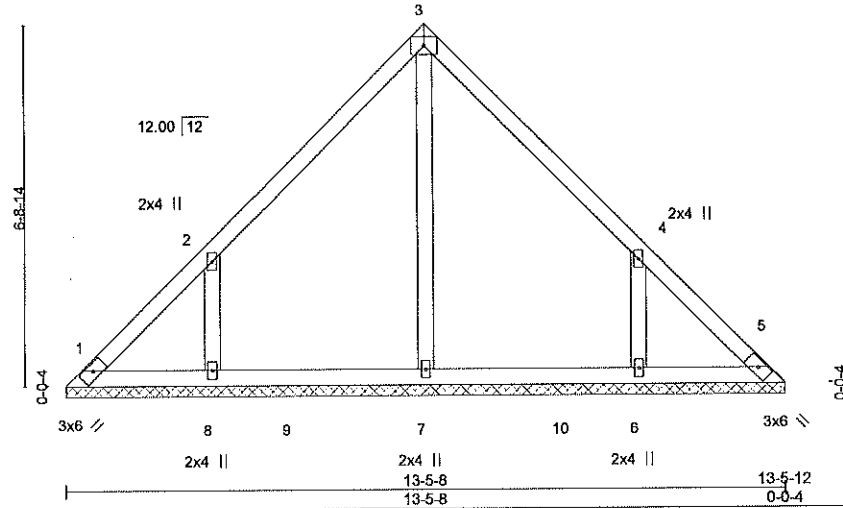
ENGINEERING BY  
**TRENCO**  
 A MITEK Alliance  
 818 Soundside Road  
 Eden, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
341111-341111A	V4	Valley	1	1	154618079
84 Components (Dunn), Dunn, NC - 28334, 8,620 s Aug 22 2022 MITEK Industries, Inc. Fri Oct 7 14:57:16 2022 Page 1					
Job Reference (optional) ID:4C_?jOk7lBeo4Te8?OXgvBybTPY-oX6g1FubTn5P?YoHzwst6B5_5D6E1bEbTstkFJyVmJX					



4x6 =

Scale = 1:41.3



<b>LOADING (psf)</b>	<b>SPACING-</b>	<b>CSL</b>	<b>DEFL.</b>	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	2-0-0	TC 0.18	in (loc) l/defl L/d	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.16	Vert(LL) n/a - n/a 999		
BCDL 10.0	Lumber DOL 1.15	WB 0.10	Vert(CT) n/a - n/a 999		
BCLL 0.0 *	Rep Stress Incr YES	Matrix-S	Horz(CT) 0.00 5 n/a n/a	Weight: 62 lb	FT = 20%
BCDL 10.0	Code IRC2015/TPI2014				

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3 \*Except\*  
 3-7: 2x4 SP No.2 or 2x4 SPF No.2

**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.**

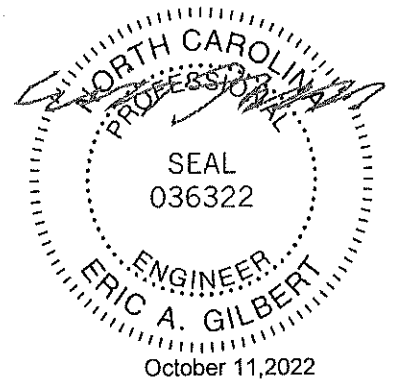
All bearings 13-5-4.  
 (lb) - Max Horz 1=-135(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 5 except 8=-169(LC 10), 6=-169(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=339(LC 20), 8=359(LC 17), 6=359(LC 18)

**FORCES.**

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.  
 WEBS 2-8=-278/210, 4-6=-278/210

**NOTES-**

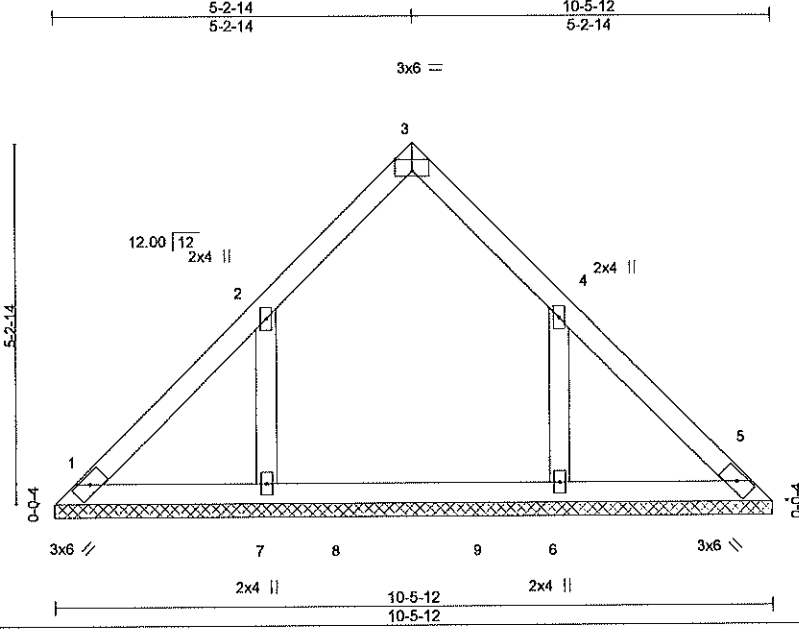
- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- Gable requires continuous bottom chord bearing.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- \* 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 5 except (l=lb) 8=169, 6=169.



<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE.          Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>          A MITEK Affiliate          818 Soundside Road          Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618080
34111-34111A	V5	GABLE	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334, 8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:17 2022 Page 1  
 ID:4C\_?Ok7f8eo4Te87OXgvBybTPY-Gkg2EauDE5DGdiNTXdN6fOeAGdSrc3NkhWdHnmyVmJW



Scale: 3/8"=1'

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	1.15	TC 0.09	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.14	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.05	Horz(CT)	0.00	5	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-S					Weight: 44 lb	FT = 20%

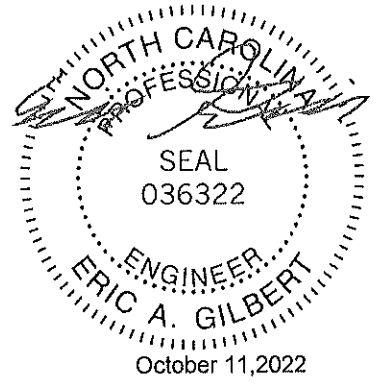
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3

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

**REACTIONS.** All bearings 10-5-12.  
 (lb) - Max Horz 1=103(LC 6)  
 Max Uplift All uplift 100 lb or less at joint(s) except 7=109(LC 10), 6=108(LC 11)  
 Max Grav All reactions 250 lb or less at joint(s) 1, 5 except 7=322(LC 17), 6=321(LC 18)

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

- NOTES-**
- Unbalanced roof live loads have been considered for this design.
  - Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCCL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - Gable requires continuous bottom chord bearing.
  - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - \* 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.
  - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 109 lb uplift at joint 7 and 108 lb uplift at joint 6.

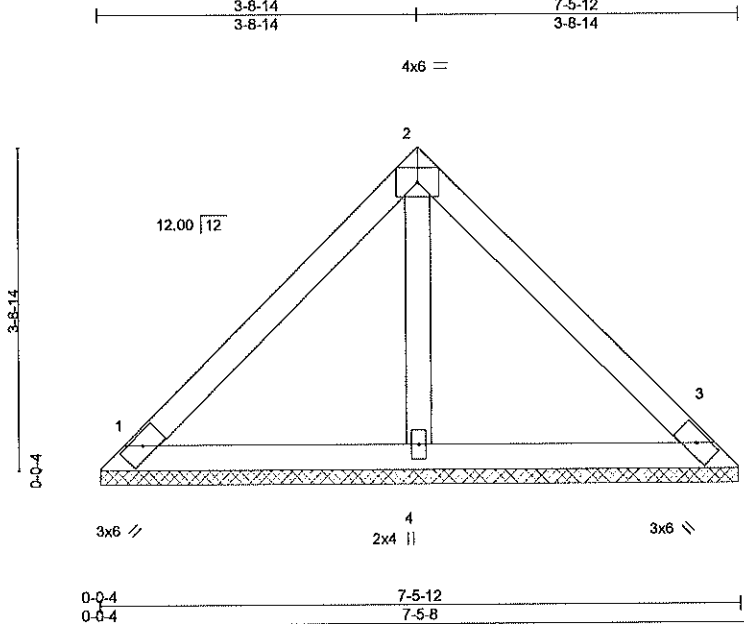


<p><b>WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.</b>        Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPIH Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>        A MiTek Affiliate        818 Soundside Road        Edenton, NC 27932</p>
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Job 34111-34111A	Truss V6	Truss Type Valley	Qty 1	Ply 1	ONSITE- ROOF 154618081
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84 Components (Dunn), Dunn, NC - 28334, ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-kwDQSwvs?PL7FryfSLuL.CcAHW1oSLWmlwAMrJCyVmjV  
 8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:18 2022 Page 1



LOADING (psf)	SPACING-	CSL.	DEFL.	in (loc)	l/def	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL 1.15	TC 0.38	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL 1.15	BC 0.12	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr YES	WB 0.04	Horz(CT)	0.00	3	n/a		
BCDL 10.0	Code IRC2015/TP12014	Matrix-P					Weight: 30 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.3  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF 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.**

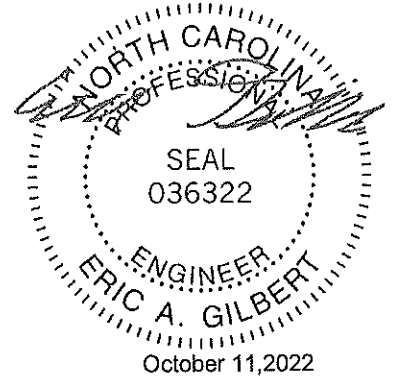
{size} 1=7-5-4, 3=7-5-4, 4=7-5-4  
 Max Horz 1=-71(LC 6)  
 Max Uplift 1=-27(LC 11), 3=-27(LC 11)  
 Max Grav 1=162(LC 1), 3=162(LC 1), 4=217(LC 1)

**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 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 27 lb uplift at joint 1 and 27 lb uplift at joint 3.

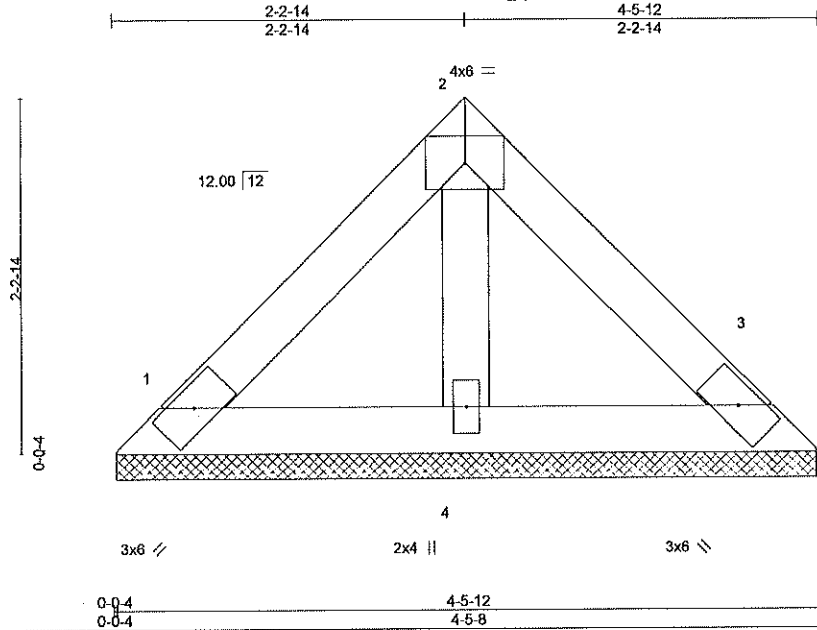


Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF	154618082
34111-34111A	V7	Valley	1	1	Job Reference (optional)	

84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MITek Industries, Inc. Fri Oct 7 14:57:19 2022 Page 1

ID:4C\_7jOk7lBeo4Te8?OXgvBybTPY-C6npfGwUmIT\_s?Wsf2PakpjWTR9X4zL19q6OsayVmJl



Scale = 1:14.0

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/def	L/d	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.11	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Plate Grip DOL 1.15	BC 0.06	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.02	Horz(CT)	0.00	3	n/a		
BCDL 10.0	Rep Stress Incr YES	Matrix-P					Weight: 17 lb	FT = 20%
	Code IRC2015/TPI2014							

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

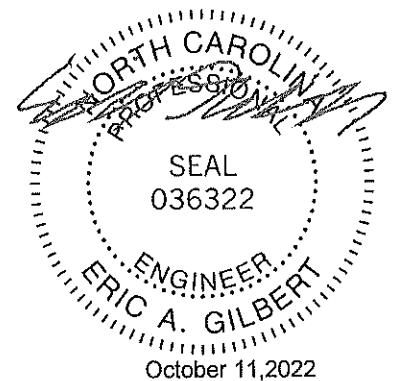
**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 4-5-12 oc purlins.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (size) 1=4-5-4, 3=4-5-4, 4=4-5-4  
 Max Horz 1=40(LC 6)  
 Max Uplift 1=16(LC 11), 3=16(LC 11)  
 Max Grav 1=90(LC 1), 3=90(LC 1), 4=122(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 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 3) Gable requires continuous bottom chord bearing.
- 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 16 lb uplift at joint 1 and 16 lb uplift at joint 3.



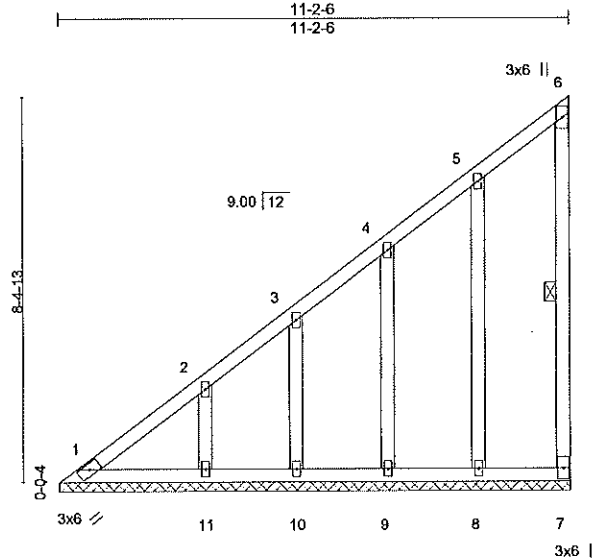
**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MITek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPH Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

ENGINEERING BY  
**TRENCO**  
 A MITek Affiliate  
 818 Soundside Road  
 Edenon, NC 27932

Job 34111-34111A	Truss V8	Truss Type Valley	Qty 1	Ply 1	ONSITE- ROOF 154618083
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84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:20 2022 Page 1  
 ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-hJLbtX6W0brU952ClxpH1GdErT0pO7AOUryO6yVmJT



Scale: 1/4"=1'

LOADING (psf)	SPACING-	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	2-0-0	TC 0.36	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Plate Grip DOL 1.15	BC 0.17	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Lumber DOL 1.15	WB 0.11	Horz(CT)	-0.00	7	n/a		
BCDL 10.0	Rep Stress Incr YES	Matrix-S					Weight: 73 lb	FT = 20%
	Code IRC2015/TPI2014							

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.2 or 2x4 SPF No.2  
 OTHERS 2x4 SP No.3 \*Except\*  
 5-8: 2x4 SP No.2 or 2x4 SPF No.2

**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.  
 WEBS 1 Row at midpt 6-7

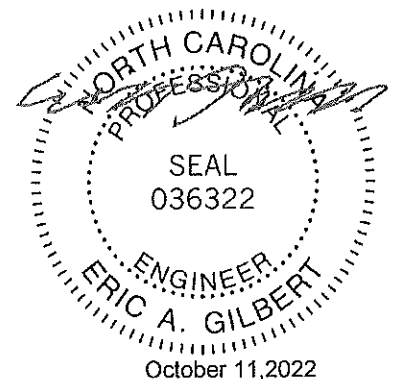
**REACTIONS.**

All bearings 11-2-6.  
 (lb) - Max Horz 1=256(LC 9)  
 Max Uplift All uplift 100 lb or less at joint(s) 1, 7, 8, 9, 10, 11  
 Max Grav All reactions 250 lb or less at joint(s) 1, 7, 8, 9, 10, 11

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

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) All plates are 2x4 MT20 unless otherwise indicated.
- 3) Gable requires continuous bottom chord bearing.
- 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) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 7, 8, 9, 10, 11.



**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/13/2020 BEFORE USE.  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/PTI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

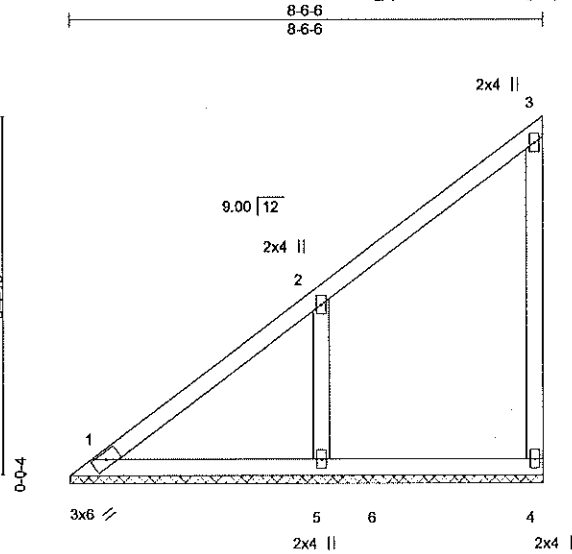
ENGINEERING BY  
**TRENCO**  
 A MiTek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

Job 34111-34111A	Truss V9	Truss Type Valley	Qty 2	Ply 1	JNSITE- ROOF 154618084
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84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:21 2022 Page 1

ID:4C\_?jOk7l8eo4Te8?OXgvBybTPY-9VvZ4yykHKji6JgEmTS2pEoIFepJYruKc8bVwXyVmjs



Scale = 1:39.6

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.54	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.17	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.08	Horz(CT)	-0.00	4	n/a		
BCDL 10.0	Code	IRC2015/TPI2014	Matrix-P					Weight: 41 lb	FT = 20%

**LUMBER-**

TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 WEBS 2x4 SP No.3  
 OTHERS 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.**

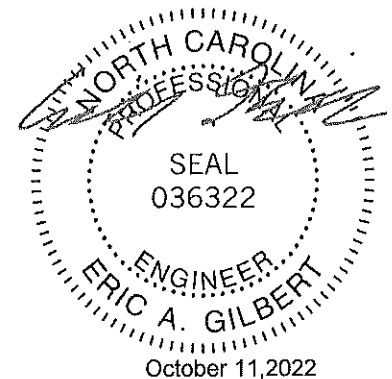
(size) 1=8-6-6, 4=8-6-6, 5=8-6-6  
 Max Horz 1=192(LC 7)  
 Max Uplift 1=-6(LC 6), 4=-37(LC 7), 5=-136(LC 10)  
 Max Grav 1=157(LC 18), 4=180(LC 17), 5=459(LC 17)

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

WEBS 2-5=-317/207

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cal. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* 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.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 4 except (ft=lb) 5=136.



**WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MH-7472 (rev. 5/13/2020) BEFORE USE.**  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/TP1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

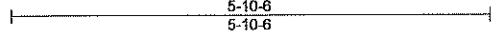
ENGINEERING BY  
**TRENCO**  
 A MiTek Affiliate  
 818 Soundside Road  
 Edenton, NC 27932

Job	Truss	Truss Type	Qty	Ply	ONSITE- ROOF
34111-34111A	V10	Valley	2	1	154618085

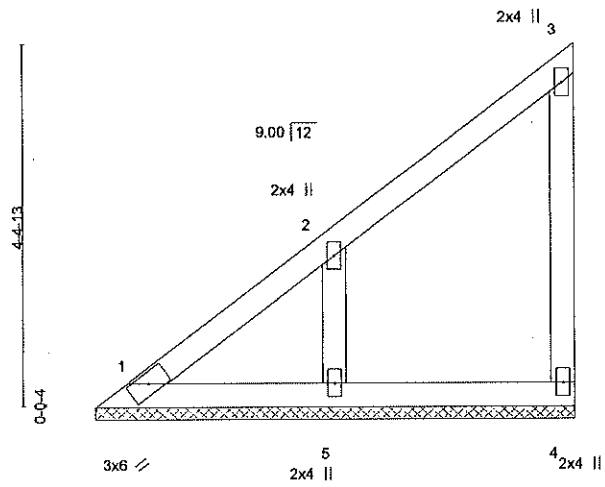
84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MITEK Industries, Inc. Fri Oct 7 14:57:10 2022 Page 1

ID:4C\_?jOk7I8eo4Te8?OXgvBybTPY-zNkPmBpqIxKGHdK7dfITwixrp4ITugi4xQQ1gyVmjd



Scale = 1:27.0



<b>LOADING</b> (psf)	<b>SPACING-</b>	2-0-0	<b>CSI.</b>	<b>DEFL.</b>	in (loc)	l/defl	L/d	<b>PLATES</b>	<b>GRIP</b>
TCLL 20.0	Plate Grip DOL	1.15	TC 0.23	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.07	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.04	Horz(CT)	0.00	4	n/a		
BCDL 10.0	Code IRC2015/TP12014		Matrix-P					Weight: 27 lb	FT = 20%

**LUMBER-**

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

**BRACING-**

TOP CHORD Structural wood sheathing directly applied or 5-10-6 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.**

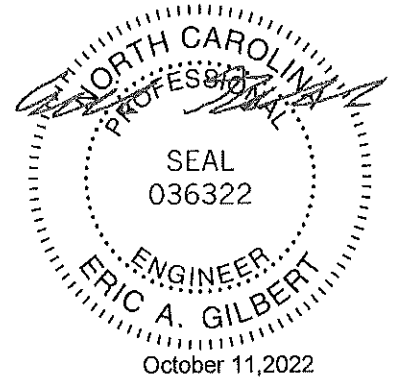
(size) 1=5-10-6, 4=5-10-6, 5=5-10-6  
 Max Horz 1=127(LC 7)  
 Max Uplift 1=8(LC 6), 4=26(LC 7), 5=90(LC 10)  
 Max Grav 1=99(LC 18), 4=100(LC 17), 5=277(LC 17)

**FORCES.**

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

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; and vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* 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.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 1, 4, 5.

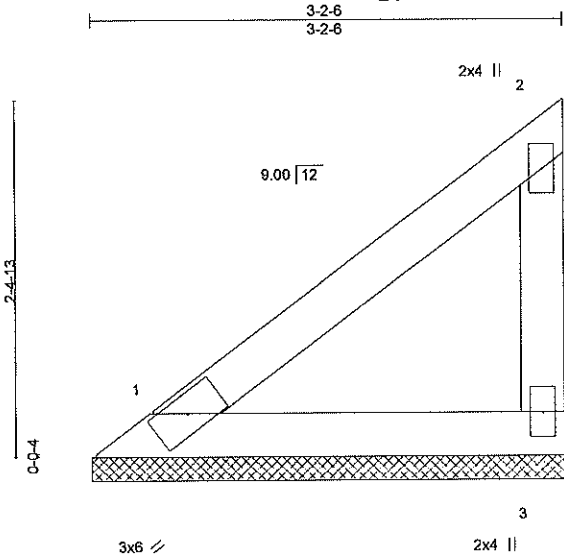


<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/19/2020 BEFORE USE. Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPH Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A Mitek Affiliate</small>        818 Soundside Road        Edenton, NC 27932</p>
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Job	Truss	Truss Type	Qty	Ply	NSITE- ROOF
34111-34111A	V11	Valley	2	1	154618086
Job Reference (optional)					

84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MITEK Industries, Inc. Fri Oct 7 14:57:11 2022 Page 1  
ID:4C\_?jOK7l8eo4Te8?OXgvBybTPY-Rain\_XqTeFT7vvnvJBMGIP706lCOcCLbrJbAza6yVmjc



Scale = 1:14.9

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	In (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.21	Vert(LL)	n/a	-	n/a	MT20	244/190
TCDL 10.0	Lumber DOL	1.15	BC 0.13	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	3	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-P					Weight: 12 lb	FT = 20%

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

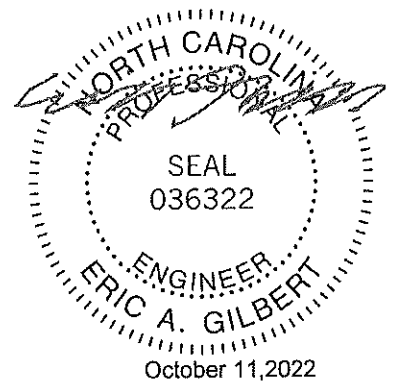
**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 3-2-6 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (size) 1=3-2-6, 3=3-2-6  
 Max Horz 1=63(LC 7)  
 Max Uplift 3=-24(LC 10)  
 Max Grav 1=105(LC 1), 3=114(LC 17)

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

**NOTES-**

- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCCL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
- 2) Gable requires continuous bottom chord bearing.
- 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 4) \* 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.
- 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3.



October 11, 2022

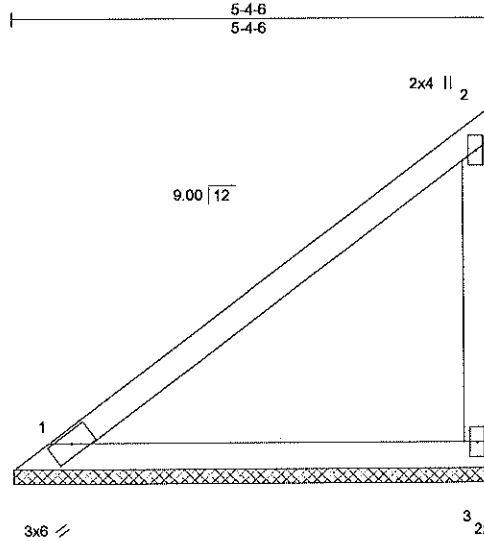
<p><b>WARNING -</b> Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 Rev. 5/19/2020 BEFORE USE. Design valid for use only with MITEK® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSI/TPI1 Quality Criteria, DSB-59 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MITEK Alliance</small>        818 Soundside Road        Edenton, NC 27932</p>
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Job 34111-34111A	Truss V12	Truss Type GABLE	Qty 1	Ply 1	ONSITE- ROOF 154618087
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84 Components (Dunn), Dunn, NC - 28334,

8.620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:11 2022 Page 1

ID:4C\_7jOk7l8eo4Te8?OXgvBybTPY-Rain\_XqTeFT7vvnJBMGIP7O2?CJ9CLbrJbAza6yVmj



Scale = 1:24.8

LOADING (psf)	SPACING-	2-0-0	CSI.	DEFL.	in (loc)	l/def	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	1.15	TC 0.46	Vert(LL)	n/a	-	n/a	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.48	Vert(CT)	n/a	-	n/a		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.00	Horz(CT)	0.00	3	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Malrix-P					Weight: 22 lb	FT = 20%

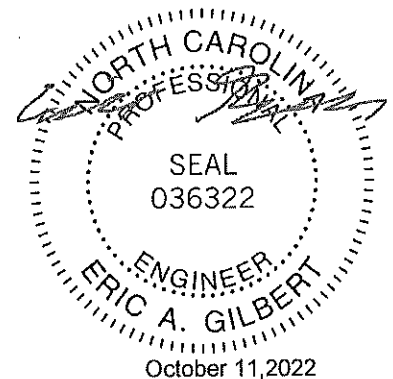
**LUMBER-**  
 TOP CHORD 2x4 SP No.2 or 2x4 SPF No.2  
 BOT CHORD 2x4 SP No.3  
 WEBS 2x4 SP No.3

**BRACING-**  
 TOP CHORD Structural wood sheathing directly applied or 5-4-6 oc purlins, except end verticals.  
 BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS.** (size) 1=5-4-6, 3=5-4-6  
 Max Horz 1=115(LC 7)  
 Max Uplift 3=44(LC 10)  
 Max Grav 1=191(LC 1), 3=209(LC 17)

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

- NOTES-**
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed; end vertical left and right exposed; C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) Gable requires continuous bottom chord bearing.
  - 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 4) \* 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.
  - 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 3.



**WARNING -** Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7472 rev. 5/19/2020 BEFORE USE.  
 Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSIT/PTI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601

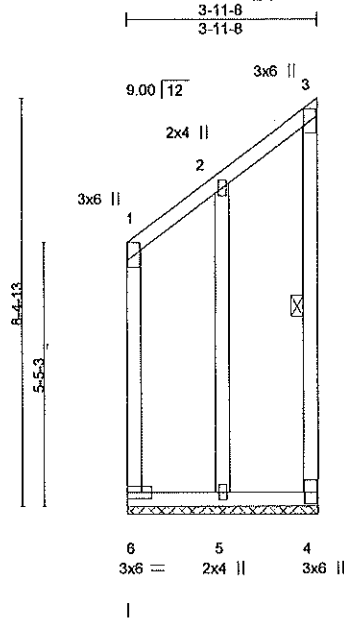
ENGINEERING BY  
**TRENCO**  
 A MiTek Alliance  
 818 Soundside Road  
 Edenton, NC 27932

Job 34111-34111A	Truss V13	Truss Type GABLE	Qty 1	Ply 1	ONSITE- ROOF 154618088
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84 Components (Dunn), Dunn, NC - 28334,

8,620 s Aug 22 2022 MiTek Industries, Inc. Fri Oct 7 14:57:12 2022 Page 1

ID:4C\_?jOk7lBeo4Te8?OXgvBybTPY-wms9Btr5PZbzXwUWk4nxylw9Ace4xmZ?YEvW6YyVmbj



Scale = 1:45.6

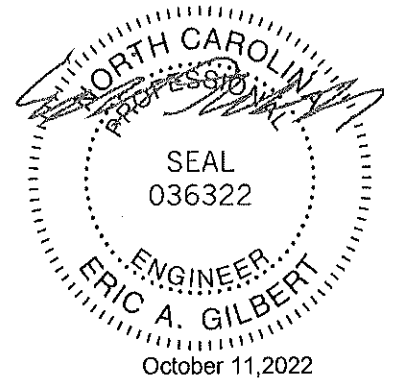
LOADING (psf)	SPACING-		CSI.	DEFL.	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL 20.0	Plate Grip DOL	2-0-0	TC 0.75	Vert(LL)	n/a	-	999	MT20	197/144
TCDL 10.0	Lumber DOL	1.15	BC 0.56	Vert(CT)	n/a	-	999		
BCLL 0.0 *	Rep Stress Incr	YES	WB 0.15	Horz(CT)	-0.00	4	n/a		
BCDL 10.0	Code IRC2015/TPI2014		Matrix-R					Weight: 42 lb	FT = 20%

LUMBER-	BRACING-
TOP CHORD 2x4 SP No.3	TOP CHORD Structural wood sheathing directly applied or 3-11-8 oc purlins, except end verticals.
BOT CHORD 2x4 SP No.3	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.3 *Except*	WEBS 1 Row at midpt 3-4
3-4: 2x4 SP No.2 or 2x4 SPF No.2	
OTHERS 2x4 SP No.2 or 2x4 SPF No.2	

REACTIONS. (size) 6=3-11-8, 4=3-11-8, 5=3-11-8  
 Max Horz 6=91(LC 10)  
 Max Uplift 6=-53(LC 8), 4=-80(LC 10), 5=-198(LC 10)  
 Max Grav 6=245(LC 10), 4=78(LC 17), 5=220(LC 17)

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

- NOTES-
- 1) Wind: ASCE 7-10; Vult=120mph Vasd=95mph; TCDL=6.0psf; BCDL=6.0psf; h=30ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) gable end zone and C-C Exterior(2) zone; cantilever left and right exposed ;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
  - 2) Gable requires continuous bottom chord bearing.
  - 3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
  - 4) \* 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.
  - 5) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 6, 4 except (jt=lb) 5=198.

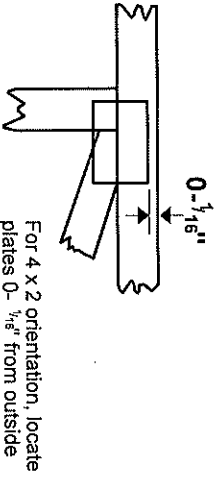
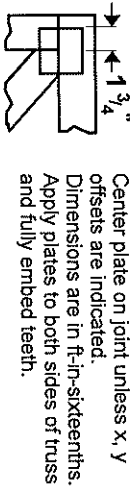


<p><b>WARNING</b> - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 5/13/2020 BEFORE USE. Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ANSITPI Quality Criteria, DSB-89 and BCSI Building Component Safety Information available from Truss Plate Institute, 2670 Crain Highway, Suite 203 Waldorf, MD 20601</p>	<p>ENGINEERING BY  <b>TRENCO</b>  <small>A MiTek Alliance</small>        818 Soundside Road        Edenon, NC 27932</p>
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# Symbols

## PLATE LOCATION AND ORIENTATION



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

\* Plate location details available in MITek 2020 software or upon request.

## PLATE SIZE

4 X 4

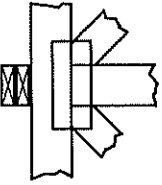
The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

## 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

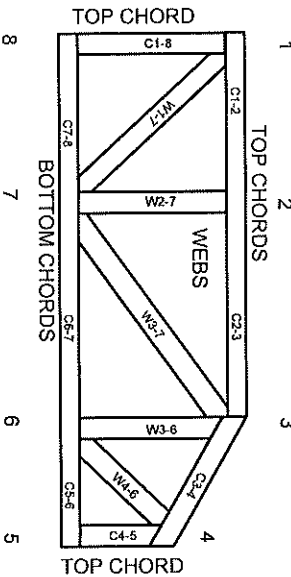


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

## Industry Standards:

- ANSI/TP1: National Design Specification for Metal Plate Connected Wood Truss Construction.
- DSB-89: Design Standard for Bracing.
- BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

# Numbering System



JOINTS ARE GENERALLY NUMBERED/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-1311, ESR-1352, ESR1988
- ER-3907, ESR-2362, ESR-1397, ESR-3282

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

Lumber design values are in accordance with ANSI/TP1 1 section 6.3 These truss designs rely on lumber values established by others.

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MITek Engineering Reference Sheet Mill-7473 rev. 5/19/2020

# 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 1 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/TP1 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TP1 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 punirs 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/TP1 1 Quality Criteria.
21. The design does not take into account any dynamic or other loads other than those expressly stated.