Job	Truss	Truss Type	Qty	Ply	SMITH DOUGLAS-LANDEN BEH
72516194REP1	A3	Common	5	1	Job Reference (optional)

UFP Mid Atlantic LLC, 5631 S. NC 62, Burlington, NC, JMP — Run: 8.83 S Apr 11 2025 Print: 8.830 S Apr 11 2025 MiTek Industries, Inc. Tue Sep 02 11:37:32 — Page: 1

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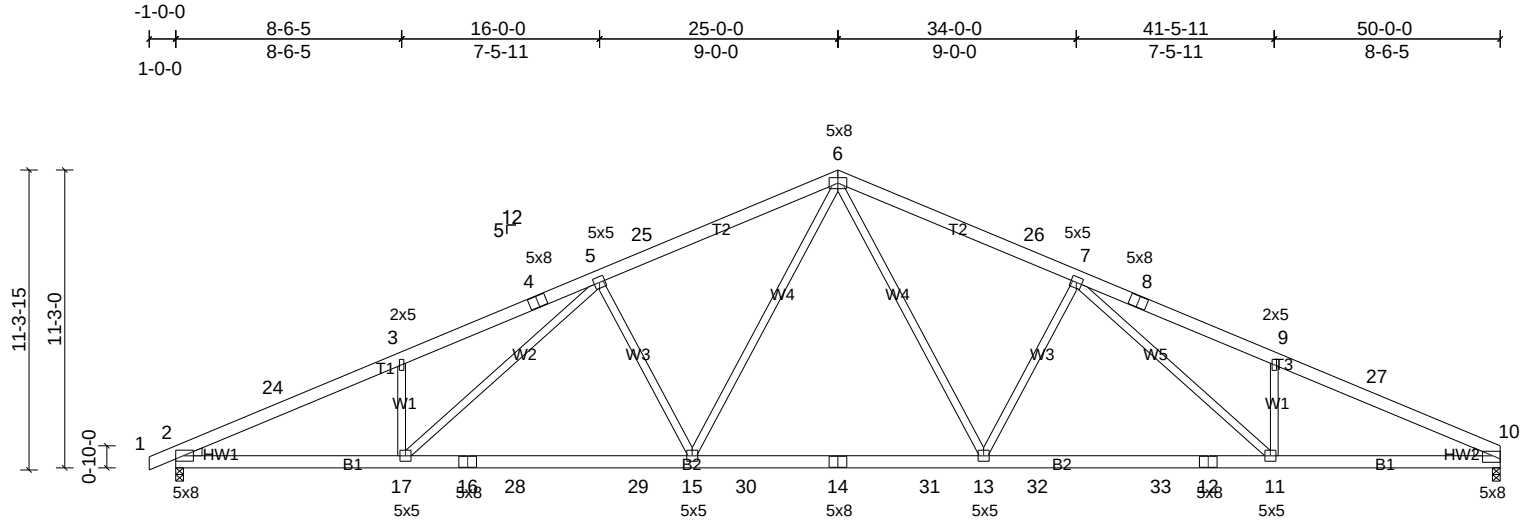
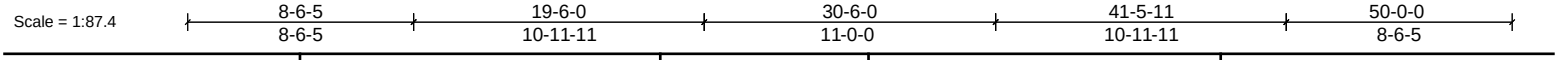


New bearing condition. No truss repair required.



Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.73	Vert(LL)	-0.33	15-17	>999	240	MT20	244/190
Snow (Ps/Pg)	14.0/20.0	Lumber DOL	1.15	BC	1.00	Vert(CT)	-0.63	15-17	>948	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.90	Horz(CT)	0.16	10	n/a	n/a		
BCLL	0.0 *	Code	IRC2015/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 345 lb	FT = 20%

LUMBER

TOP CHORD	2x6 SP No.2
BOT CHORD	2x6 SP No.1 *Except* 16-14,12-14:2x6 SP No.2
WEBS	2x4 SP No.3 *Except* 11-7:2x4 SP No.1
WEDGE	Left: 2x4 SP No.2 Right: 2x4 SP No.2

BRACING

TOP CHORD	Structural wood sheathing directly applied or 2-8-10 oc purlins.
BOT CHORD	Rigid ceiling directly applied or 2-2-0 oc bracing.

REACTIONS (size) 2=0-3-8, (min. 0-2-7), 10=0-3-8, (min. 0-2-6)
Max Horiz 2=188 (LC 16)
Max Uplift 2=-264 (LC 12), 10=-242 (LC 13)
Max Grav 2=2061 (LC 2), 10=1999 (LC 2)

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

TOP CHORD	2-24=-4124/546, 3-24=-4012/567, 3-4=-4052/636, 4-5=-3937/667, 5-25=-3316/589, 6-25=-3222/626, 6-26=-3223/628, 7-26=-3316/591, 7-8=-3945/689, 8-9=-4060/658, 9-27=-4020/585, 10-27=-4130/566
BOT CHORD	2-17=-511/3704, 16-17=-374/3265, 16-28=-374/3265, 28-29=-374/3265, 15-29=-374/3265, 15-30=-207/2448, 14-30=-207/2448, 14-31=-207/2448, 13-31=-207/2448, 13-32=-378/3266, 32-33=-378/3266, 12-33=-378/3266, 11-12=-378/3266, 10-11=-444/3710
WEBS	3-17=-365/248, 5-17=-188/719, 5-15=-780/345, 6-15=-197/1175, 6-13=-197/1175, 7-13=-781/345, 7-11=-192/729, 9-11=-369/249

NOTES (11)

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) -1-0-0 to 4-0-0, Interior (1) 4-0-0 to 17-11-2, Exterior (2) 17-11-2 to 32-0-14, Interior (1) 32-0-14 to 45-0-0, Exterior (2) 45-0-0 to 50-0-0 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) TCLL: ASCE 7-10; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=20.0 psf (ground snow); Ps=14.0 psf (roof snow: Lum DOL=1.15 Plate DOL=1.15); Category II; Exp B; Partially Exp.; Ct=1.00; Min. flat roof snow load governs. Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.
4) Roof design snow load has been reduced to account for slope.
5) This truss has been checked for uniform snow load only, except as noted.
6) This truss has been designed for greater of min roof live load of 12.0 psf or 2.00 times flat roof load of 14.0 psf on overhangs non-concurrent with other live loads.
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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 242 lb uplift at joint 10 and 264 lb uplift at joint 2.
10) 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.
11) This repair has been prepared based on information and use conditions supplied by client. Designer has made a good faith effort to outline damage and repair conditions as reported by client. When actual field conditions do not approximate those indicated on this drawing, client shall immediately inform the engineer and refrain from applying the repair.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	SMITH DOUGLAS-LANDEN BEH
72516194REP1	A4	Common	4	1	Job Reference (optional)

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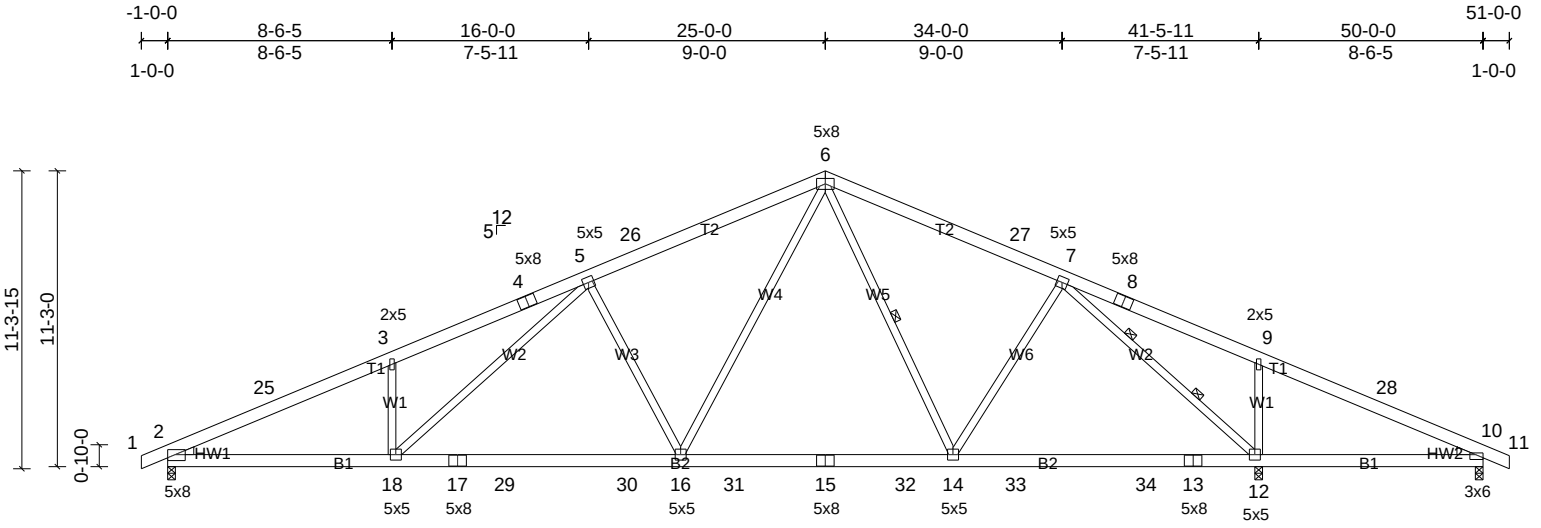
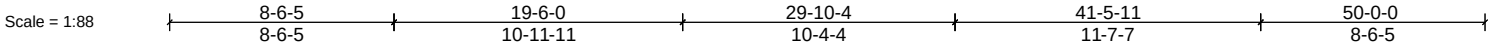


New bearing condition. No truss repair required.



Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.58	Vert(LL)	-0.23	16-18	>999	240	MT20	244/190
Snow (Ps/Pg)	14.0/20.0	Lumber DOL	1.15	BC	0.83	Vert(CT)	-0.44	16-18	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.93	Horz(CT)	0.08	12	n/a	n/a		
BCLL	0.0 *	Code	IRC2015/TPI2014	Matrix-MSH								
BCDL	10.0										Weight: 348 lb	FT = 20%

LUMBER

TOP CHORD 2x6 SP No.2
BOT CHORD 2x6 SP No.1 *Except* 17-15,13-15:2x6 SP No.2
WEBS 2x4 SP No.3 *Except* 14-6:2x4 SP No.1
WEDGE Left: 2x4 SP No.2
Right: 2x4 SP No.2

BRACING

TOP CHORD Structural wood sheathing directly applied or 3-5-15 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 10-12.
WEBS 1 Row at midpt 6-14
WEBS 2 Rows at 1/3 pts 7-12

REACTIONS (size) 2=0-3-8, (min. 0-2-0), 10=0-3-8, (min. 0-1-8), 12=0-3-8, (min. 0-2-11)
Max Horiz 2=-181 (LC 13)
Max Uplift 2=-244 (LC 12), 10=-102 (LC 13), 12=-195 (LC 13)
Max Grav 2=1686 (LC 2), 10=321 (LC 29), 12=2285 (LC 3)

FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-25=-3222/437, 3-25=-3119/458, 3-4=-3176/528, 4-5=-3047/559, 5-26=-2333/473, 6-26=-2240/510, 6-27=-1693/439, 7-27=-1783/402, 7-8=0/427, 8-9=-76/314, 9-28=-40/384, 10-28=-73/343
BOT CHORD 2-18=-462/2879, 17-18=-323/2369, 17-29=-323/2369, 29-30=-323/2369, 16-30=-323/2369, 16-31=-76/1540, 15-31=-76/1540, 15-32=-76/1540, 14-32=-76/1540, 14-33=-131/1358, 33-34=-131/1358, 13-34=-131/1358, 12-13=-131/1358, 10-12=-317/81
WEBS 3-18=-386/249, 5-18=-191/781, 5-16=-795/345, 6-16=-204/1172, 7-14=0/520, 7-12=-2204/270, 9-12=-517/264

NOTES (11)

1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=103mph; TCDL=6.0psf; BCDL=6.0psf; h=25ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) -1-0-0 to 4-0-0, Interior (1) 4-0-0 to 17-11-2, Exterior (2) 17-11-2 to 32-0-14, Interior (1) 32-0-14 to 46-0-0, Exterior (2) 46-0-0 to 51-0-0 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) TCLL: ASCE 7-10; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=20.0 psf (ground snow); Ps=14.0 psf (roof snow: Lum DOL=1.15 Plate DOL=1.15); Category II; Exp B; Partially Exp.; Ct=1.00; Min. flat roof snow load governs. Rain surcharge applied to all exposed surfaces with slopes less than 0.500/12 in accordance with IBC 1608.3.4.
4) Roof design snow load has been reduced to account for slope.
5) This truss has been checked for uniform snow load only, except as noted.
6) This truss has been designed for greater of min roof live load of 12.0 psf or 2.00 times flat roof load of 14.0 psf on overhangs non-concurrent with other live loads.
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 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 244 lb uplift at joint 2, 195 lb uplift at joint 12 and 102 lb uplift at joint 10.
10) 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.
11) This repair has been prepared based on information and use conditions supplied by client. Designer has made a good faith effort to outline damage and repair conditions as reported by client. When actual field conditions do not approximate those indicated on this drawing, client shall immediately inform the engineer and refrain from applying the repair.

LOAD CASE(S) Standard

This design is based upon parameters shown, and is for an individual building component to be installed and loaded vertically. Applicability of design parameters and proper incorporation of component is responsibility of the Building Designer. Building Designer shall verify all design information on this sheet for conformance with conditions and requirements of the specific building and governing codes and ordinances. Building Designer accepts responsibility for the correctness or accuracy of the design information as it may relate to a specific building. Certification is valid only when truss is fabricated by a UFPI plant. Bracing shown is for lateral support of truss members only and does not replace erection and permanent bracing. Refer to Building Component Safety Information (BCSI) for general guidance regarding storage, erection and bracing available from SBCA and Truss Plate Institute.