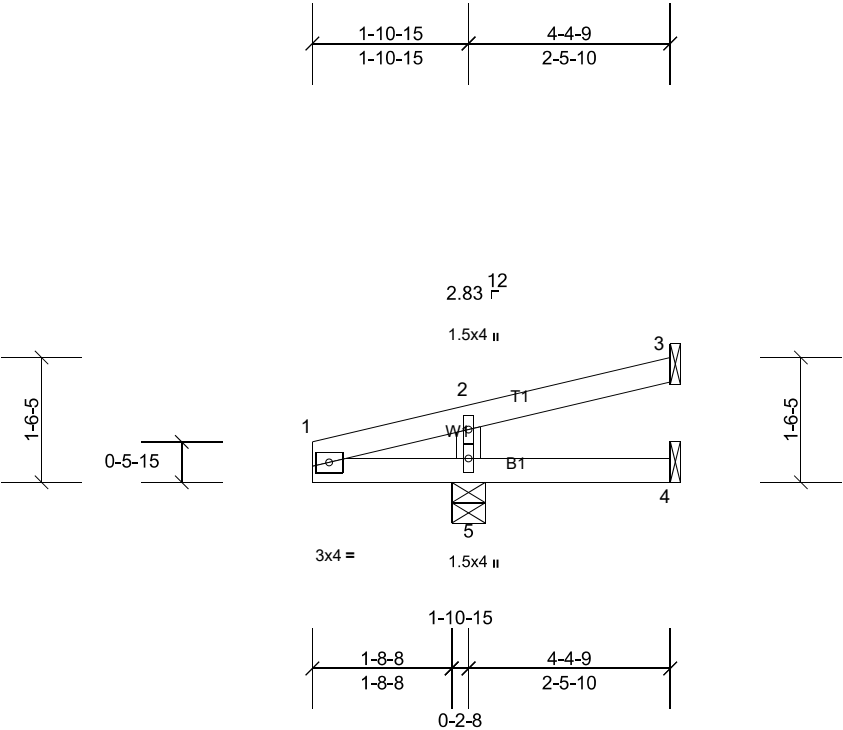


Job	Truss	Truss Type	Qty	Ply	Job Reference (optional)
MSA2408-R	CJ3	Jack-Open	7	1	



Scale = 1:28.2

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.27	Vert(LL)	0.00	4-5	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.21	Vert(CT)	0.01	4-5	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.04	Horz(CT)	-0.02	3	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP		Wind(LL)	0.00	4-5	>999	360		
BCDL	10.0										Weight: 14 lb	FT = 0%

LUMBER

TOP CHORD
 2x4 SP No.2

BOT CHORD
 2x4 SP No.2

WEBS
 2x4 SP No.2

BRACING

TOP CHORD

BOT CHORD

Structural wood sheathing directly applied or 4-4-9 oc purlins.
 Rigid ceiling directly applied or 10-0-0 oc bracing.

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

REACTIONS (lb/size)
 3=45/ Mechanical, (min. 0-1-8), 4=-5/ Mechanical, (min. 0-1-8), 5=349/0-4-15, (min. 0-1-8)

Max Horiz
 5=27 (LC 8)

Max Uplift
 3=-19 (LC 12), 4=-12 (LC 18), 5=-38 (LC 8)

Max Grav
 3=64 (LC 18), 4=23 (LC 7), 5=450 (LC 18)

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

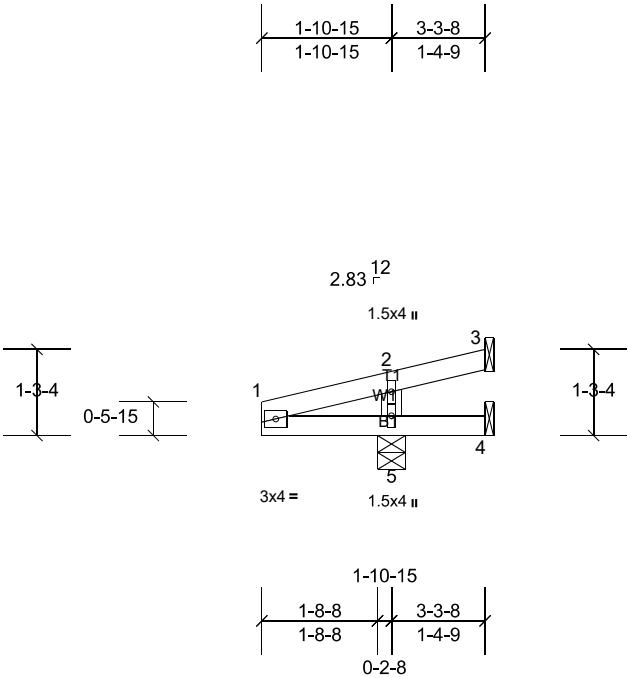
WEBS
 2-5=-320/50

NOTES

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 19 lb uplift at joint 3, 12 lb uplift at joint 4 and 38 lb uplift at joint 5.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	CJ3A	Jack-Open	1	1	Job Reference (optional)



Scale = 1:34

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.23	Vert(LL)	0.00	4-5	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.22	Vert(CT)	0.00	4-5	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.03	Horz(CT)	-0.01	3	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP		Wind(LL)	0.00	4-5	>999	360		
BCDL	10.0										Weight: 11 lb	FT = 0%

LUMBER

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

BRACING

TOP CHORD
BOT CHORD

Structural wood sheathing directly applied or 3-3-8 oc purlins.
Rigid ceiling directly applied or 10-0-0 oc bracing.
MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

REACTIONS (lb/size) 3=-19/ Mechanical, (min. 0-1-8), 4=-47/ Mechanical, (min. 0-1-8), 5=356/0-4-15, (min. 0-1-8)
Max Horiz 5=21 (LC 8)
Max Uplift 3=-26 (LC 7), 4=-61 (LC 18), 5=-45 (LC 8)
Max Grav 3=-2 (LC 8), 4=13 (LC 8), 5=446 (LC 18)

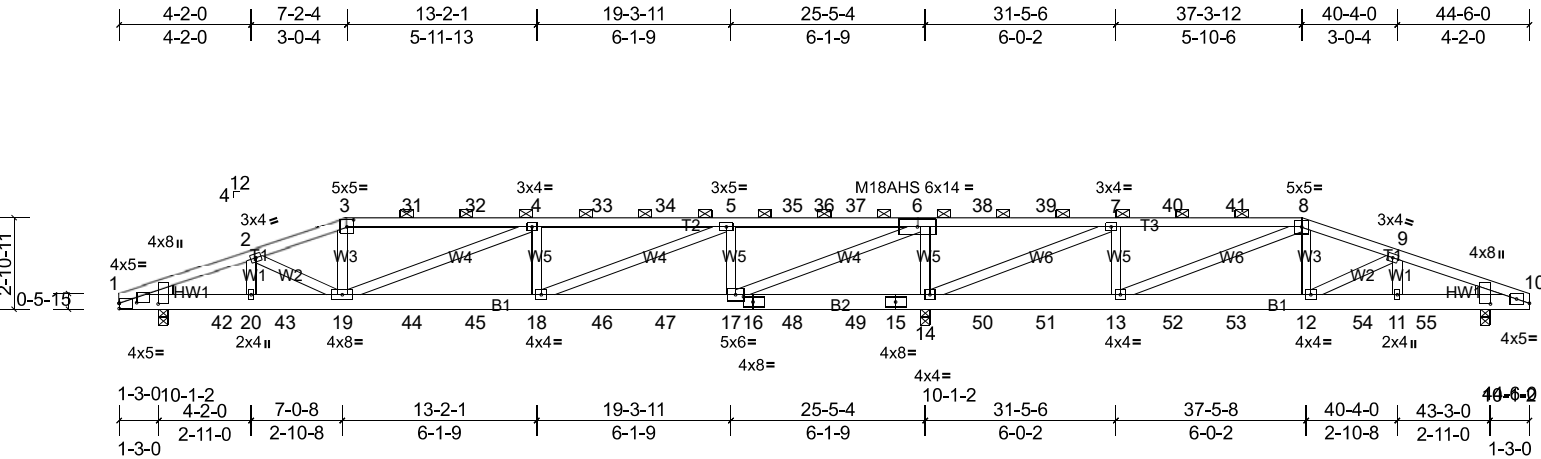
FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-5=-277/40

NOTES

- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 26 lb uplift at joint 3, 61 lb uplift at joint 4 and 45 lb uplift at joint 5.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	GR1	Hip Girder	1	2	Job Reference (optional)



Scale = 1:72.7

Plate Offsets (X, Y): [1:0-6-10,0-0-4], [1:0-0-4,1-2-12], [3:0-2-8,0-2-11], [10:0-2-6,0-0-6], [10:0-0-4,1-2-12], [16:0-3-10,0-2-0]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.86	Vert(LL)	-0.15	17-18	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.31	Vert(CT)	-0.23	18	>999	180	M18AHS	186/179
TCDL	10.0	Rep Stress Incr	NO	WB	0.75	Horz(CT)	0.02	10	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	18	>999	360		
BCDL	10.0										Weight: 502 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T3:2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 5-6-0 oc purlins, except
BOT CHORD	2x6 SP 2400F 2.0E		2-0-0 oc purlins (4-11-3 max.); 3-8.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
WEDGE	Left: 2x4 SP No.2 Right: 2x4 SP No.2		6-0-0 oc bracing: 14-17.

REACTIONS (lb/size) 1=2203/0-3-8, (min. 0-1-8), 10=1385/0-3-8, (min. 0-1-8), 14=5399/0-3-8, (min. 0-2-6)
Max Horiz 1=28 (LC 12)
Max Uplift 1=-94 (LC 12), 10=-75 (LC 13), 14=-190 (LC 8)
Max Grav 1=2348 (LC 36), 10=1581 (LC 36), 14=5797 (LC 35)

FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-3447/164, 2-3=-4067/175, 3-31=-3869/185, 31-32=-3869/185, 4-32=-3869/185, 4-33=-4689/195, 33-34=-4689/195, 5-34=-4689/195, 5-35=-2039/99, 35-36=-2039/99, 36-37=-2039/99, 6-37=-2039/99, 6-38=-115/3721, 38-39=-115/3721, 7-39=-115/3721, 7-40=-639/105, 40-41=-639/105, 8-41=-639/105, 8-9=-2019/128, 9-10=-2077/129
BOT CHORD 1-42=-150/3179, 20-42=-150/3179, 20-43=-150/3179, 19-43=-150/3179, 19-44=-159/4689, 44-45=-159/4689, 18-45=-159/4689, 18-46=-62/2039, 46-47=-62/2039, 17-47=-62/2039, 16-17=-3376/141, 16-48=-3376/141, 48-49=-3376/141, 15-49=-3376/141, 14-15=-3376/141, 14-50=-40/639, 50-51=-40/639, 13-51=-40/639, 13-52=-75/1882, 52-53=-75/1882, 12-53=-75/1882, 12-54=-90/1899, 11-54=-90/1899, 11-55=-90/1899, 10-55=-90/1899
WEBS 3-19=0/455, 8-12=0/465, 2-20=-444/12, 2-19=-10/895, 6-14=-3488/256, 7-13=0/718, 7-14=-4645/171, 8-13=-1482/64, 4-18=-825/183, 4-19=-886/29, 5-17=-2156/215, 6-17=-193/5889, 5-18=-108/2864

- NOTES**
- 2-ply truss to be connected together with 10d (0.148"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 0-9-0 oc.
Web 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 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 190 lb uplift at joint 14, 94 lb uplift at joint 1 and 75 lb uplift at joint 10.

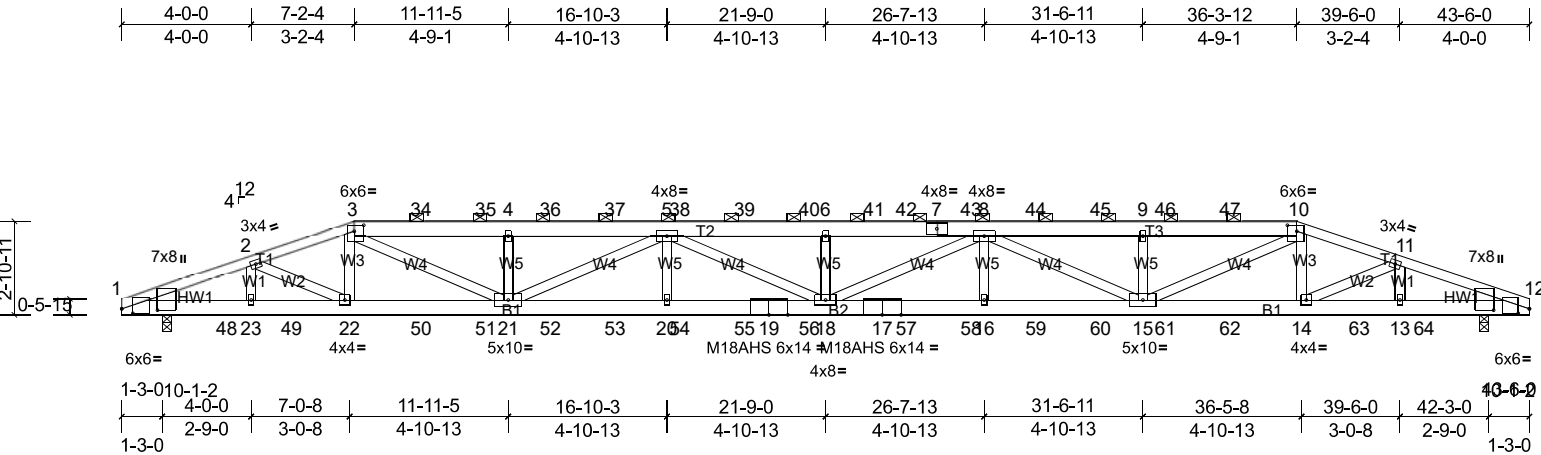
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	GR1	Hip Girder	1	2	Job Reference (optional)

- 11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 12) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 13) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 224 lb down and 46 lb up at 7-2-4, 224 lb down and 45 lb up at 9-3-0, 224 lb down and 45 lb up at 11-3-0, 224 lb down and 45 lb up at 13-3-0, 224 lb down and 45 lb up at 15-3-0, 224 lb down and 45 lb up at 17-3-0, 224 lb down and 45 lb up at 19-3-0, 224 lb down and 45 lb up at 21-3-0, 224 lb down and 45 lb up at 23-3-0, 224 lb down and 45 lb up at 25-3-0, 224 lb down and 45 lb up at 27-3-0, 224 lb down and 45 lb up at 29-3-0, 224 lb down and 45 lb up at 31-3-0, 224 lb down and 45 lb up at 33-3-0, and 224 lb down and 45 lb up at 35-3-0, and 224 lb down and 46 lb up at 37-3-12 on top chord, and 312 lb down and 21 lb up at 3-3-0, 242 lb down and 21 lb up at 5-3-0, 64 lb down at 7-3-0, 64 lb down at 9-3-0, 64 lb down at 11-3-0, 64 lb down at 13-3-0, 64 lb down at 15-3-0, 64 lb down at 17-3-0, 64 lb down at 19-3-0, 64 lb down at 21-3-0, 64 lb down at 23-3-0, 64 lb down at 25-3-0, 64 lb down at 27-3-0, 64 lb down at 29-3-0, 64 lb down at 31-3-0, 64 lb down at 33-3-0, 64 lb down at 35-3-0, 64 lb down at 37-3-0, and 242 lb down and 21 lb up at 39-3-0, and 312 lb down and 21 lb up at 41-3-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (lb/ft)
- Vert: 1-3=-70, 3-8=-70, 8-10=-70, 21-26=-20
- Concentrated Loads (lb)
- Vert: 3=-189, 19=-53, 12=-53, 6=-189, 14=-53, 7=-189, 13=-53, 8=-189, 4=-189, 18=-53, 5=-189, 17=-53, 31=-189, 32=-189, 33=-189, 34=-189, 35=-189, 37=-189, 38=-189, 39=-189, 40=-189, 41=-189, 42=-312, 43=-242, 44=-53, 45=-53, 46=-53, 47=-53, 48=-53, 49=-53, 50=-53, 51=-53, 52=-53, 53=-53, 54=-242, 55=-312

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	GR2	Hip Girder	1	2	Job Reference (optional)



Scale = 1:71.2

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

Loading	(psf)	Spacing	2-0-0	CSI	DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.94	Vert(LL)	-0.87	18	>601	240	MT20 244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.69	Vert(CT)	-1.29	18	>404	180	M18AHS 186/179
TCDL	10.0	Rep Stress Incr	NO	WB	0.78	Horz(CT)	0.19	12	n/a	n/a	
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.30	18	>999	360	
BCDL	10.0										Weight: 546 lb FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T2,T3:2x6 SP 2400F 2.0E	TOP CHORD	Structural wood sheathing directly applied or 2-10-11 oc purlins, except
BOT CHORD	2x6 SP 2400F 2.0E		2-0-0 oc purlins (4-5-13 max.): 3-10.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEDGE	Left: 2x4 SP No.2 Right: 2x4 SP No.2		

REACTIONS (lb/size) 1=4442/0-3-8, (min. 0-1-14), 12=4455/0-3-8, (min. 0-1-14)
Max Horiz 1=27 (LC 57)
Max Uplift 1=-171 (LC 8), 12=-172 (LC 9)
Max Grav 1=4490 (LC 35), 12=4501 (LC 35)

FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-7468/296, 2-3=-10036/371, 3-34=-15161/535, 34-35=-15164/535, 4-35=-15170/535, 4-36=-15162/534, 36-37=-15162/534, 5-37=-15162/534, 5-38=-19917/671, 38-39=-19917/671, 39-40=-19917/671, 6-40=-19917/671, 6-41=-19917/671, 41-42=-19917/671, 7-42=-19917/671, 7-43=-19917/671, 8-43=-19917/671, 8-44=-15204/535, 44-45=-15204/535, 9-45=-15204/535, 9-46=-15212/536, 46-47=-15206/536, 10-47=-15204/536, 10-11=-10063/372, 11-12=-7487/296
BOT CHORD 1-48=-269/6959, 23-48=-269/6959, 23-49=-269/6959, 22-49=-269/6959, 22-50=-324/9574, 50-51=-324/9574, 21-51=-324/9574, 21-52=-602/18709, 52-53=-602/18709, 20-53=-602/18709, 20-54=-602/18709, 54-55=-602/18709, 19-55=-602/18709, 19-56=-602/18709, 18-56=-602/18709, 17-18=-589/18791, 17-57=-589/18791, 57-58=-589/18791, 16-58=-589/18791, 16-59=-589/18791, 59-60=-589/18791, 15-60=-589/18791, 15-61=-304/9599, 61-62=-304/9599, 14-62=-304/9599, 14-63=-249/6976, 13-63=-249/6976, 13-64=-249/6976, 12-64=-249/6976
WEBS 2-23=-1647/69, 2-22=-72/2874, 3-22=-330/88, 3-21=-209/6318, 4-21=-1085/156, 5-21=-3959/138, 5-20=0/352, 5-18=-81/1349, 6-18=-929/152, 8-18=-82/1257, 8-16=0/374, 8-15=-4004/139, 9-15=-1077/154, 10-15=-209/6336, 10-14=-332/89, 11-14=-72/2883, 11-13=-1652/69

- NOTES**
- 2-ply truss to be connected together with 10d (0.148"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc, 2x6 - 2 rows staggered at 0-9-0 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc.
Web 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 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.

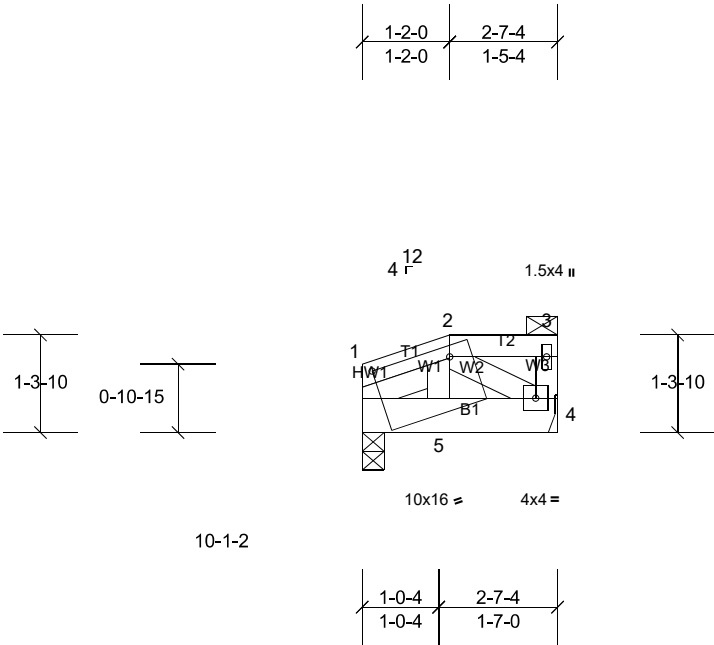
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	GR2	Hip Girder	1	2	Job Reference (optional)

- 8) All plates are MT20 plates unless otherwise indicated.
- 9) All plates are 2x4 MT20 unless otherwise indicated.
- 10) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 171 lb uplift at joint 1 and 172 lb uplift at joint 12.
- 12) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 13) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 14) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 224 lb down and 46 lb up at 7-2-4, 224 lb down and 45 lb up at 9-3-0, 224 lb down and 45 lb up at 11-3-0, 224 lb down and 45 lb up at 13-3-0, 224 lb down and 45 lb up at 15-3-0, 224 lb down and 45 lb up at 17-3-0, 224 lb down and 45 lb up at 19-3-0, 224 lb down and 45 lb up at 21-3-0, 224 lb down and 45 lb up at 23-3-0, 224 lb down and 45 lb up at 24-3-0, 224 lb down and 45 lb up at 26-3-0, 224 lb down and 45 lb up at 28-3-0, 224 lb down and 45 lb up at 30-3-0, 224 lb down and 45 lb up at 32-3-0, and 224 lb down and 45 lb up at 34-3-0, and 224 lb down and 46 lb up at 36-3-12 on top chord, and 312 lb down and 21 lb up at 3-3-0, 242 lb down and 21 lb up at 5-3-0, 64 lb down at 7-3-0, 64 lb down at 9-3-0, 64 lb down at 11-3-0, 64 lb down at 13-3-0, 64 lb down at 15-3-0, 64 lb down at 17-3-0, 64 lb down at 19-3-0, 64 lb down at 21-3-0, 64 lb down at 23-3-0, 64 lb down at 24-3-0, 64 lb down at 26-3-0, 64 lb down at 28-3-0, 64 lb down at 30-3-0, 64 lb down at 32-3-0, 64 lb down at 34-3-0, 64 lb down at 36-3-0, and 242 lb down and 21 lb up at 38-3-0, and 312 lb down and 21 lb up at 40-3-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (lb/ft)
- Vert: 1-3=-70, 3-10=-70, 10-12=-70, 24-29=-30
- Concentrated Loads (lb)
- Vert: 3=-189, 10=-189, 22=-53, 14=-53, 17=-53, 34=-189, 35=-189, 36=-189, 37=-189, 38=-189, 39=-189, 40=-189, 41=-189, 42=-189, 43=-189, 44=-189, 45=-189, 46=-189, 47=-189, 48=-312, 49=-242, 50=-53, 51=-53, 52=-53, 53=-53, 54=-53, 55=-53, 56=-53, 57=-53, 58=-53, 59=-53, 60=-53, 61=-53, 62=-53, 63=-242, 64=-312

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	GR3	Half Hip Girder	1	1	Job Reference (optional)



Scale = 1:30.7

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

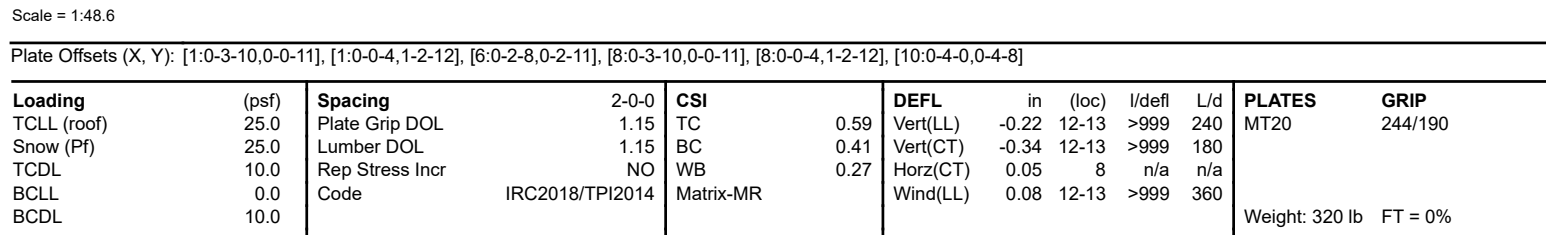
Loading	(psf)	Spacing	2-0-0	CSI	DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.11	Vert(LL)	0.00	8	>999	240	MT20
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.21	Vert(CT)	0.00	5-8	>999	180	244/190
TCDL	10.0	Rep Stress Incr	NO	WB	0.14	Horz(CT)	0.00	1	n/a	n/a	
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP		Wind(LL)	0.00	8	>999	360	
BCDL	10.0										Weight: 15 lb FT = 0%

LUMBER	BRACING
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 2-7-4 oc purlins, except end verticals, and 2-0-0 oc purlins: 2-3.
BOT CHORD 2x6 SP 2400F 2.0E	BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 2x4 SP No.2	
SLIDER Left 2x4 SP No.2 -- 0-11-10	
REACTIONS (lb/size) 1=1750/0-3-8, (min. 0-1-8), 4=493/ Mechanical, (min. 0-1-8)	MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
Max Horiz 1=22 (LC 11)	
Max Uplift 1=-73 (LC 8), 4=-41 (LC 9)	
Max Grav 1=1774 (LC 33), 4=522 (LC 32)	

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	1-2=-619/35
BOT CHORD	1-5=-52/646, 4-5=-51/558
WEBS	2-5=-14/574, 2-4=-685/56

- NOTES**
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - 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.
 - Refer to girder(s) for truss to truss connections.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 73 lb uplift at joint 1 and 41 lb uplift at joint 4.
 - This truss is designed in accordance with the 2018 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.
 - Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 112 lb up at 1-2-0 on top chord, and 2089 lb down and 44 lb up at 0-8-0, and 86 lb up at 1-2-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.
- LOAD CASE(S)** Standard
- Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (lb/ft)
- Vert: 1-2=-70, 2-3=-70, 4-6=-20
- Concentrated Loads (lb)
- Vert: 5=34, 2=33, 8=-2089

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:45 Page: 1
ID:HerTJcOXXwntufBFevYp6Sya17H-eY5kNMhJLsEetEdHvUdSwi0IHOZO1DXTcePXvyZmhw



REACTIONS (lb/size) 1=2805/0-3-8, (min. 0-1-8), 8=2805/0-3-8, (min. 0-1-8)
 Max Horiz 1=28 (LC 57)
 Max Uplift 1=-113 (LC 8), 8=-113 (LC 9)
 Max Grav 1=2951 (LC 36), 8=2951 (LC 36)

NOTES

- 2-ply truss to be connected together with 10d (0.148"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 0-9-0 oc.
Web 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 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCdL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 113 lb uplift at joint 1 and 113 lb uplift at joint 8.
- This truss is designed in accordance with the 2018 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	
MSA2408-R	GR4	Hip Girder	1	2	Job Reference (optional)

12) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 224 lb down and 46 lb up at 7-2-4, 224 lb down and 45 lb up at 9-3-0, 224 lb down and 45 lb up at 11-3-0, 224 lb down and 45 lb up at 13-3-0, 224 lb down and 45 lb up at 15-3-0, 224 lb down and 45 lb up at 17-3-0, and 224 lb down and 45 lb up at 19-3-0, and 224 lb down and 46 lb up at 21-3-12 on top chord, and 312 lb down and 21 lb up at 3-3-0, 242 lb down and 21 lb up at 5-3-0, 64 lb down at 7-3-0, 64 lb down at 9-3-0, 64 lb down at 11-3-0, 64 lb down at 13-3-0, 64 lb down at 15-3-0, 64 lb down at 17-3-0, 64 lb down at 19-3-0, 64 lb down at 21-3-0, and 242 lb down and 21 lb up at 23-3-0, and 312 lb down and 21 lb up at 25-3-0 on bottom chord. The design/selecion of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard

- 1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
- Uniform Loads (lb/ft)
- Vert: 1-3=-70, 3-6=-70, 6-8=-70, 16-21=-20
- Concentrated Loads (lb)
- Vert: 6=-189, 14=-53, 3=-189, 10=-53, 26=-189, 27=-189, 28=-189, 30=-189, 31=-189, 32=-189, 33=-312, 34=-242, 35=-53, 36=-53, 37=-53, 38=-53, 39=-53, 40=-53, 41=-242, 42=-312

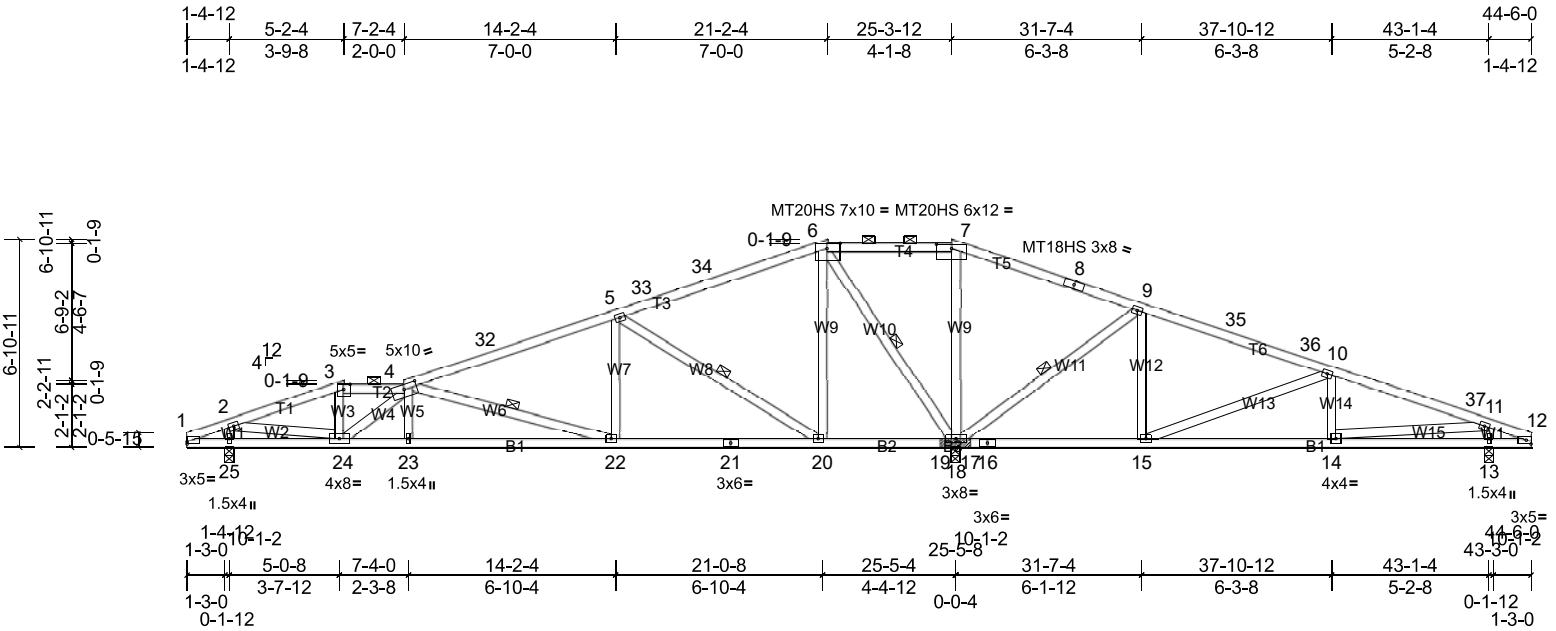
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1	Roof Special	1	1	Job Reference (optional)

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER

Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:46

Page: 1

ID:ET3Ha9_iFgl9F4QQQnf7RLz1hwh-37ms?OkBencDkhMsacA9LYejZbgLbFOz9at38EYzmht



Scale = 1:76.3

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.97	Vert(LL)	-0.12	22-23	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.66	Vert(CT)	-0.22	22-23	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.82	Horz(CT)	0.04	13	n/a	n/a	MT18HS	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	22-23	>999	360		
BCDL	10.0											
											Weight: 247 lb	FT = 0%

LUMBER
TOP CHORD 2x4 SP No.2 *Except* T3,T6:2x4 SP No.1
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.2

REACTIONS (lb/size) 13=463/0-3-8, (min. 0-1-8), 18=2668/(0-3-8 + bearing block),
(req. 0-4-2), 25=874/0-3-8, (min. 0-1-8)
Max Horiz 25=74 (LC 12)
Max Uplift 13=63 (LC 9), 25=49 (LC 8)
Max Grav 13=659 (LC 48), 18=3471 (LC 40), 25=1146 (LC 40)

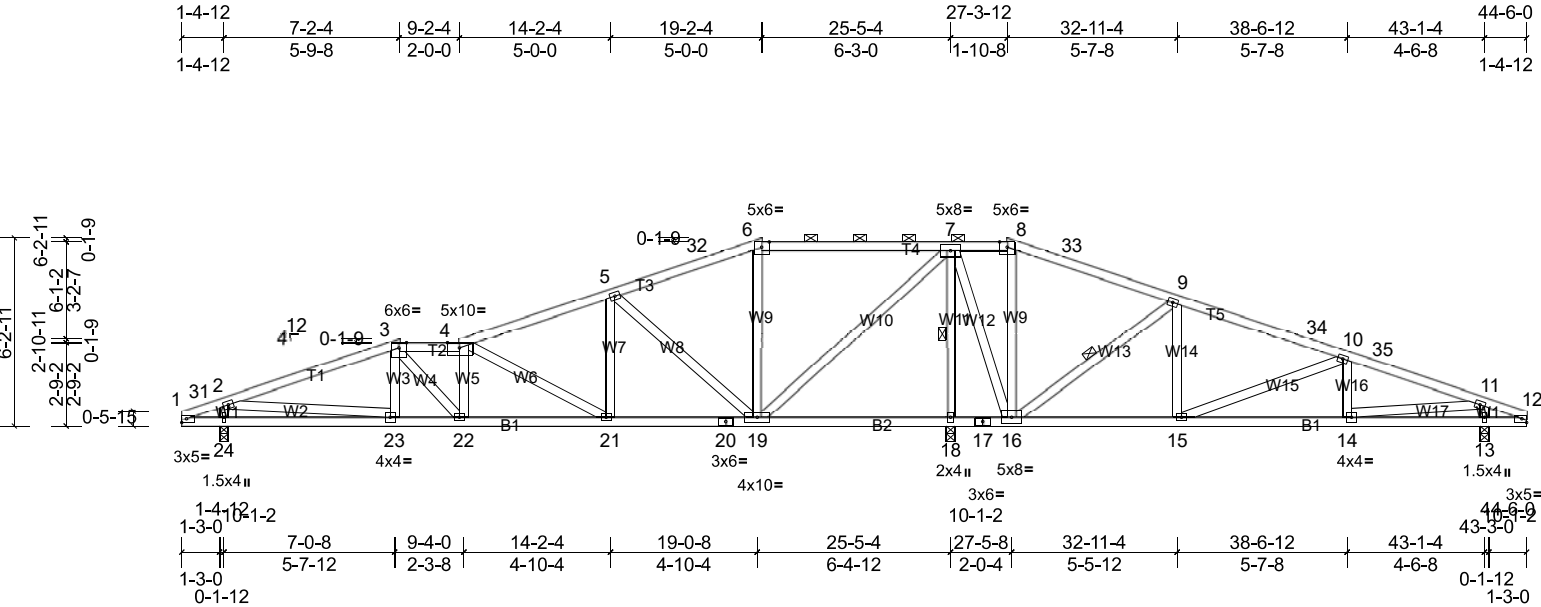
BRACING
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except
2-0-0 oc purlins (2-2-0 max.): 3-4, 6-7.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 18-20,15-18,14-15.
WEBS 1 Row at midpt 4-22, 5-20, 6-18, 9-18
MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1539/57, 3-4=-1391/63, 4-32=-1031/53, 5-32=-859/68, 5-33=0/511, 33-34=0/591, 6-34=0/725, 6-7=0/1641,
7-8=0/1839, 8-9=0/1646, 9-35=-35/729, 35-36=-45/691, 10-36=-118/666, 10-37=-710/285, 11-37=-814/255
BOT CHORD 23-24=-111/1996, 22-23=-106/2003, 21-22=-45/901, 20-21=-45/901, 19-20=-611/91, 18-19=-611/91, 17-18=-656/92,
16-17=-656/92, 15-16=-656/92, 14-15=-253/723
WEBS 3-24=0/403, 4-24=-820/33, 4-22=-1245/63, 5-22=0/475, 5-20=-1636/79, 6-20=0/963, 6-18=-1881/52, 7-18=-911/45,
9-18=-1482/63, 9-15=0/501, 10-15=-1050/39, 2-25=-1065/91, 2-24=-30/1278, 11-13=-593/117, 11-14=-265/617

- NOTES**
- 2x4 SP No.2 bearing block 12" long at jt. 18 attached to front face with 2 rows of 10d (0.148"x3") nails spaced 3" o.c. 8 Total fasteners. Bearing is assumed to be SP No.2.
 - Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are MT20 plates unless otherwise indicated.
 - All plates are 3x4 MT20 unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 49 lb uplift at joint 25 and 63 lb uplift at joint 13.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1A	Roof Special	1	1	Job Reference (optional)



Scale = 1:76.2

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.92	Vert(LL)	-0.10	21-22	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.50	Vert(CT)	-0.17	21-22	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.87	Horz(CT)	0.02	13	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.04	22	>999	360		
BCDL	10.0										Weight: 257 lb	FT = 0%

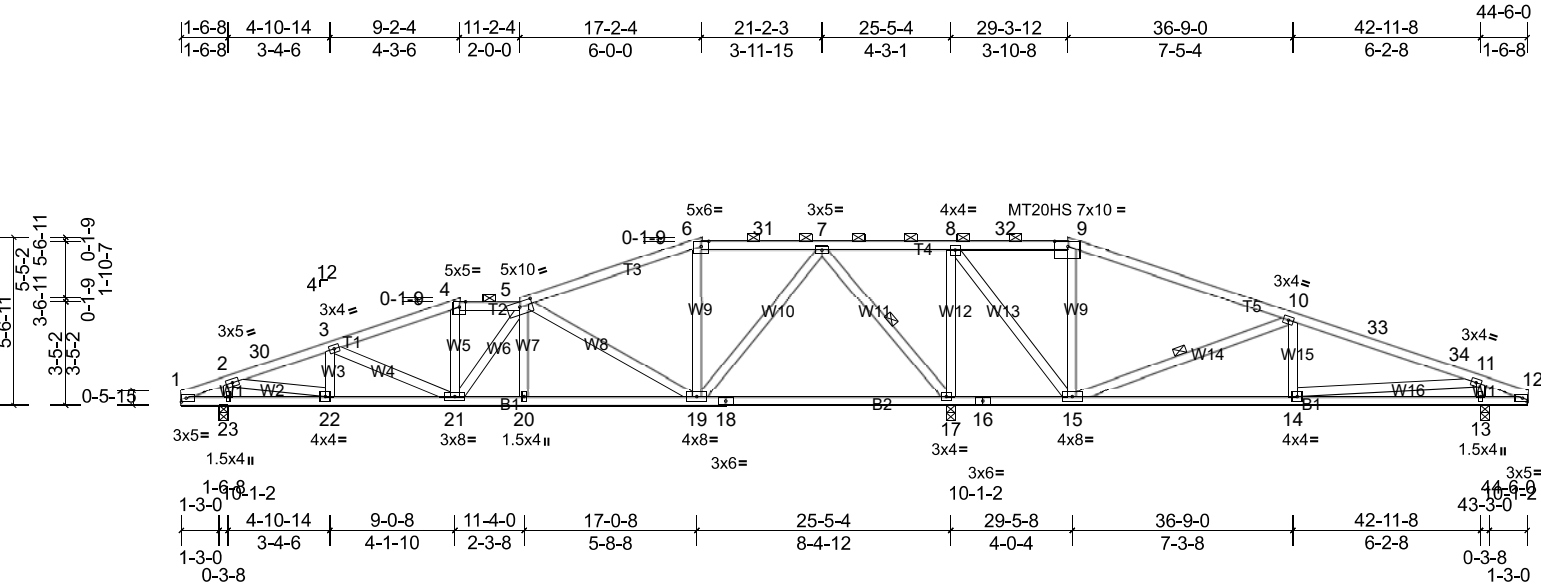
LUMBER	BRACING
TOP CHORD 2x4 SP No.2	TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except
BOT CHORD 2x4 SP No.2	2-0-0 oc purlins (2-2-0 max.): 3-4, 6-8.
WEBS 2x4 SP No.2	Rigid ceiling directly applied or 4-8-11 oc bracing.
REACTIONS (lb/size)	1 Row at midpt 9-16, 7-18
13=573/0-3-8, (min. 0-1-8), 18=2480/0-3-8, (min. 0-3-7), 24=952/0-3-8, (min. 0-1-8)	MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
Max Horiz 24=66 (LC 12)	
Max Uplift 13=-59 (LC 9), 18=-6 (LC 8), 24=-52 (LC 8)	
Max Grav 13=870 (LC 40), 18=2915 (LC 40), 24=1244 (LC 40)	

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	1-31=-323/16, 2-31=-293/2, 2-3=-1788/70, 3-4=-1776/89, 4-5=-1156/81, 5-32=-353/81, 6-7=-302/92, 7-8=0/870, 8-33=0/1016, 9-33=0/929, 9-34=-456/349, 10-34=-537/317, 10-35=-1008/105, 11-35=-1103/96
BOT CHORD	1-24=-9/374, 23-24=-74/374, 22-23=-77/1607, 21-22=-73/1768, 20-21=-32/1026, 19-20=-32/1026, 18-19=-1365/47, 17-18=-1365/47, 16-17=-1365/47, 15-16=-313/433, 14-15=-60/1004
WEBS	4-22=-255/103, 6-19=-422/63, 8-16=-678/16, 9-16=-1270/54, 3-22=-54/414, 5-21=0/520, 5-19=-1226/67, 4-21=-919/46, 7-18=-2751/62, 7-16=-14/1512, 7-19=-47/1889, 2-24=-1206/131, 2-23=-21/1237, 9-15=0/420, 10-15=-792/32, 11-13=-798/99, 11-14=-54/925

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are 3x4 MT20 unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 6 lb uplift at joint 18, 52 lb uplift at joint 24 and 59 lb uplift at joint 13.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1B	Roof Special	1	1	Job Reference (optional)



Scale = 1:76.2

Plate Offsets (X, Y): [5:0-5-0,0-2-0], [9:0-5-4,Edge]											
Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in (loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.84	Vert(LL)	-0.11 17-19	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.59	Vert(CT)	-0.22 17-19	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.86	Horz(CT)	0.03 13	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.03 19-20	>999	360		
BCDL	10.0									Weight: 247 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T5:2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 4-2-10 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (4-0-3 max.): 4-5, 6-9.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 4-8-13 oc bracing.
REACTIONS (lb/size)	13=594/0-3-8, (min. 0-1-8), 17=2442/0-3-8, (min. 0-3-0), 23=970/0-3-8, (min. 0-1-8)	WEBS	1 Row at midpt 10-15, 7-17
Max Horiz	23=-58 (LC 13)		
Max Uplift	13=-59 (LC 9), 17=-21 (LC 8), 23=-55 (LC 8)		
Max Grav	13=905 (LC 40), 17=2567 (LC 40), 23=1257 (LC 40)		

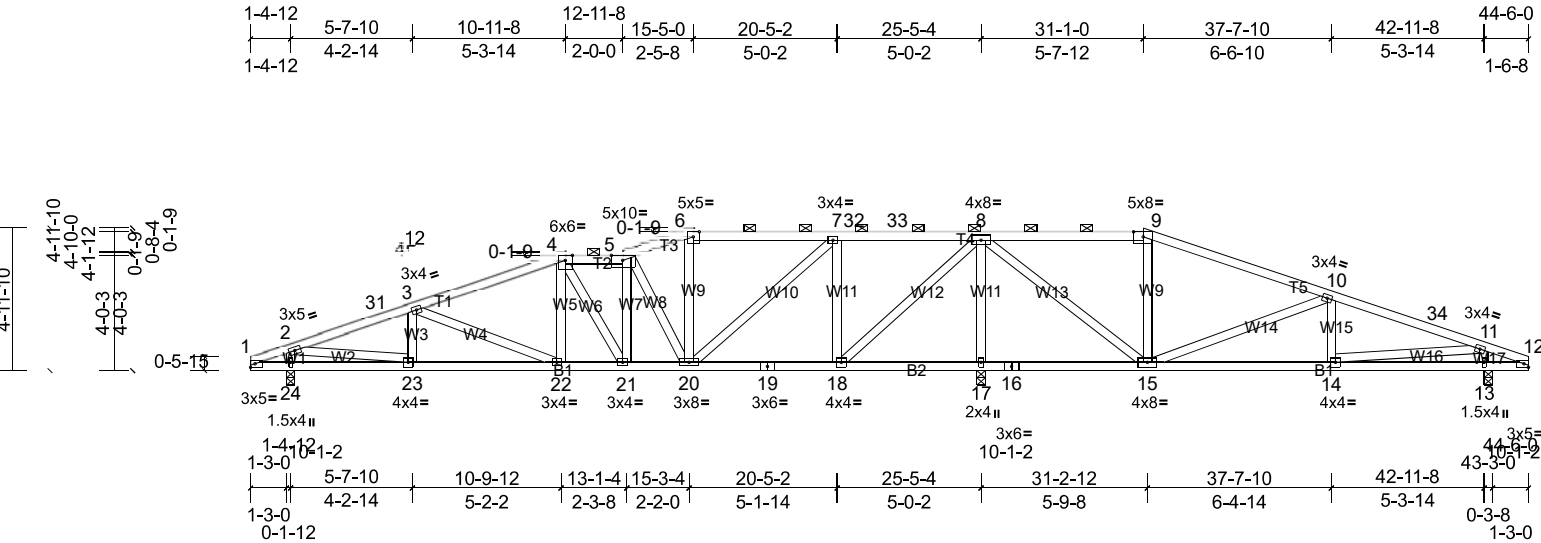
MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	2-30=-1658/49, 3-30=-1553/58, 3-4=-1473/76, 4-5=-1321/83, 5-6=-645/72, 6-31=-553/85, 7-31=-557/85, 7-8=0/1384, 8-32=0/467, 9-32=0/469, 9-10=-15/560, 10-33=-952/108, 33-34=-1041/94, 11-34=-1120/86
BOT CHORD	21-22=-68/1521, 20-21=-58/1381, 19-20=-56/1383, 18-19=-448/68, 17-18=-448/68, 16-17=-1384/53, 15-16=-1384/53, 14-15=-51/988
WEBS	4-21=0/293, 5-19=-1146/77, 6-19=-322/61, 9-15=-689/68, 10-15=-1325/56, 10-14=0/266, 5-21=-259/136, 3-22=-277/60, 2-23=-1137/72, 2-22=-43/1548, 11-13=-844/121, 11-14=-73/767, 7-19=-1/1322, 7-17=-1474/73, 8-17=-1301/74, 8-15=-35/1597

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 55 lb uplift at joint 23, 59 lb uplift at joint 13 and 21 lb uplift at joint 17.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1C	Roof Special	1	1	Job Reference (optional)



Scale = 1:80.2

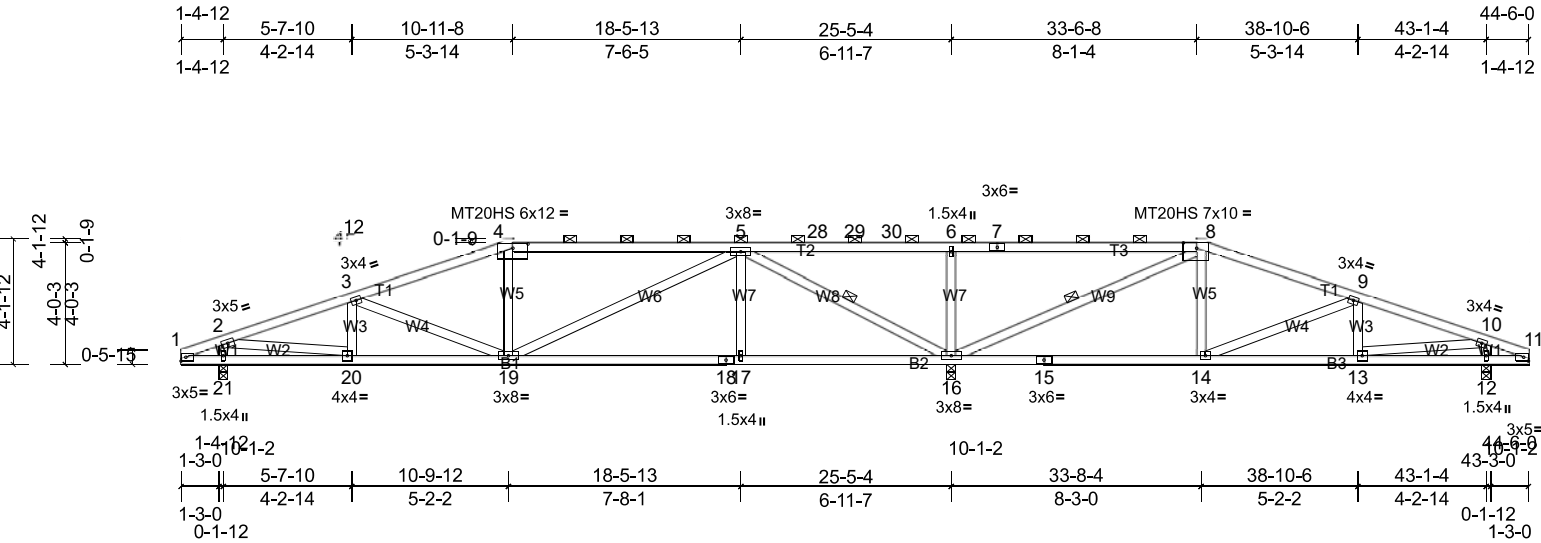
Plate Offsets (X, Y): [5:0-4-12,Edge]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.81	Vert(LL)	-0.08	22-23	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.51	Vert(CT)	-0.14	22-23	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.91	Horz(CT)	0.02	17	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.04	22-23	>999	360		
BCDL	10.0											
											Weight: 251 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 4-1-3 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (4-11-7 max.); 4-5, 6-9.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
REACTIONS (lb/size)	13=657/0-3-8, (min. 0-1-8), 17=2338/0-3-8, (min. 0-3-1), 24=1010/0-3-8, (min. 0-1-8)		6-0-0 oc bracing: 18-20
	Max Horiz 24=51 (LC 12)		5-3-11 oc bracing: 17-18
	Max Uplift 13=-57 (LC 9), 17=-31 (LC 8), 24=-54 (LC 8)		5-3-14 oc bracing: 15-17.
	Max Grav 13=970 (LC 48), 17=2594 (LC 39), 24=1282 (LC 40)		
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.		
TOP CHORD	2-31=-1887/60, 3-31=-1754/69, 3-4=-1404/85, 4-5=-1163/92, 5-6=-986/89, 6-7=-952/95, 7-32=-375/116, 32-33=-375/116, 8-33=-375/116, 9-10=-337/190, 10-34=-1064/88, 11-34=-1217/75		
BOT CHORD	22-23=-65/1724, 21-22=-37/1247, 20-21=-33/1168, 19-20=-95/375, 18-19=-95/375, 17-18=-1178/37, 16-17=-1178/37, 15-16=-1178/37, 14-15=-38/1083		
WEBS	3-22=-510/45, 4-22=0/299, 4-21=-403/25, 5-21=-17/346, 5-20=-687/48, 9-15=-469/71, 10-15=-1037/54, 8-17=-2473/93, 8-15=-20/1565, 8-18=-44/1717, 7-18=-1062/92, 7-20=-25/1062, 2-24=-1176/87, 2-23=-42/1617, 11-13=-889/105, 11-14=-39/976		
NOTES			
1)	Unbalanced roof live loads have been considered for this design.		
2)	Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60		
3)	TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10		
4)	Unbalanced snow loads have been considered for this design.		
5)	Provide adequate drainage to prevent water ponding.		
6)	All plates are 3x4 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)	Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 31 lb uplift at joint 17, 54 lb uplift at joint 24 and 57 lb uplift at joint 13.		
9)	This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.		
10)	Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.		

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1D	Hip	1	1	Job Reference (optional)



Scale = 1:76.1

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.82	Vert(LL)	-0.09	14-16	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.55	Vert(CT)	-0.20	17-19	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.71	Horz(CT)	0.04	12	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.04	19	>999	360		
BCDL	10.0										Weight: 225 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T2:2x4 SP 2400F 2.0E, T3:2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 3-8-4 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (5-9-6 max.): 4-8.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
REACTIONS (lb/size)	12=674/0-3-8, (min. 0-1-8), 16=2305/0-3-8, (min. 0-3-6), 21=1026/0-3-8, (min. 0-1-8)	WEBS	1 Row at midpt 5-16, 8-16
Max Horiz	21=41 (LC 12)		
Max Uplift	12=45 (LC 9), 16=50 (LC 8), 21=51 (LC 8)		
Max Grav	12=963 (LC 36), 16=2862 (LC 35), 21=1250 (LC 36)		
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.		
TOP CHORD	2-3=-1812/75, 3-4=-1483/84, 4-5=-1416/98, 5-28=0/1138, 28-29=0/1138, 29-30=0/1138, 6-30=0/1138, 6-7=0/1138, 7-8=0/1142, 8-9=-653/103, 9-10=-1217/90		
BOT CHORD	19-20=-74/1654, 18-19=-27/995, 17-18=-27/995, 16-17=-27/995, 15-16=-20/530, 14-15=-20/530, 13-14=-46/1094		
WEBS	3-19=-500/94, 8-14=0/392, 9-14=-662/37, 5-19=-23/887, 6-16=-876/118, 5-16=-2420/62, 8-16=-1634/40, 5-17=0/285, 10-12=-869/94, 10-13=-43/1018, 2-21=-1140/92, 2-20=-38/1542		

- NOTES
- 1) Unbalanced roof live loads have been considered for this design.

2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60

3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10

4) Unbalanced snow loads have been considered for this design.

5) Provide adequate drainage to prevent water ponding.

6) All plates are MT20 plates unless otherwise indicated.

7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

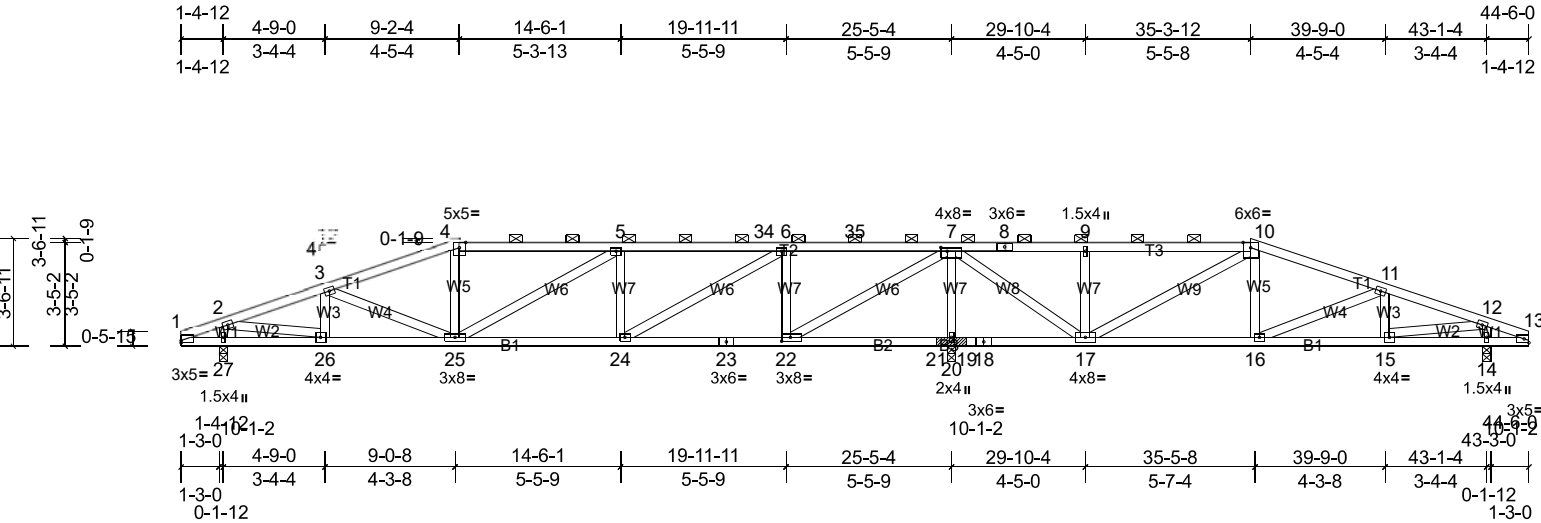
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 50 lb uplift at joint 16, 45 lb uplift at joint 12 and 51 lb uplift at joint 21.

9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

10) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H1E	Hip	1	1	Job Reference (optional)



Scale = 1:76.1

Plate Offsets (X, Y): [1:Edge,0-0-14], [7:0-2-8,0-1-8], [22:0-3-8,0-1-8]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.63	Vert(LL)	-0.12	24	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.50	Vert(CT)	-0.19	24-25	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.65	Horz(CT)	0.02	20	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	24-25	>999	360		
BCDL	10.0										Weight: 232 lb	FT = 0%

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

REACTIONS (lb/size) 14=681/0-3-8, (min. 0-1-8), 20=2293/(0-3-8 + bearing block), (min. 0-3-9), 27=1031/0-3-8, (min. 0-1-8)
Max Horiz 27=-34 (LC 13)
Max Uplift 14=-45 (LC 9), 20=-56 (LC 8), 27=-53 (LC 8)
Max Grav 14=926 (LC 36), 20=3003 (LC 35), 27=1188 (LC 36)

BRACING
TOP CHORD
BOT CHORD

Structural wood sheathing directly applied or 4-1-9 oc purlins, except
2-0-0 oc purlins (3-10-7 max.): 4-10.
Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
4-6-8 oc bracing: 20-22
4-6-4 oc bracing: 17-20.

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

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

TOP CHORD 2-3=-1616/72, 3-4=-1700/87, 4-5=-1611/97, 5-34=-1815/99, 6-34=-1815/99, 6-35=-730/73, 7-35=-730/73, 10-11=-753/106, 11-12=-1103/87

BOT CHORD 25-26=-70/1481, 24-25=-54/1815, 23-24=-29/730, 22-23=-29/730, 21-22=-1576/53, 20-21=-1576/53, 19-20=-1576/53, 18-19=-1576/53, 17-18=-1576/53, 16-17=-35/640, 15-16=-49/998

WEBS 3-25=-258/234, 10-16=0/275, 11-16=-418/25, 2-27=-1070/75, 2-26=-42/1463, 12-14=-823/77, 12-15=-50/1003, 7-20=-2879/113, 7-17=-35/1743, 9-17=-543/75, 10-17=-871/18, 7-22=-64/2658, 5-24=-512/82, 5-25=-239/307, 6-24=-31/1250, 6-22=-1225/99

- NOTES**
- 2x4 SP No.2 bearing block 12" long at jt. 20 attached to front face with 2 rows of 10d (0.148"x3") nails spaced 3" o.c. 8 Total fasteners. Bearing is assumed to be SP No.2.
 - Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are 3x4 MT20 unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 53 lb uplift at joint 27, 45 lb uplift at joint 14 and 56 lb uplift at joint 20.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

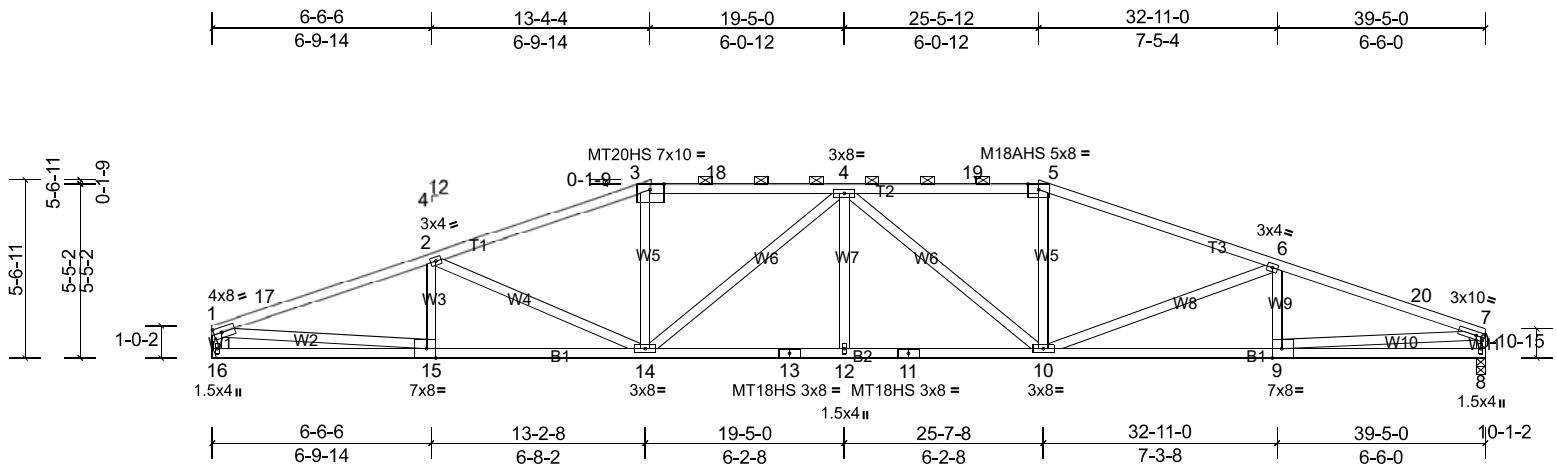
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H2	Hip	1	1	Job Reference (optional)

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER

Run: 8.81 S Jul 11 2024 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:51

Page: 1

ID:OTplqGGJqHn6tE7AV3tcEyeynL-P5al26oKTJEVqSFpN9mK1cLaQcKxGTGjJsapqRyZmho



Scale = 1:71.9

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.90	Vert(LL)	-0.33	12	>999	240	MT20HS	187/143
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.89	Vert(CT)	-0.56	12-14	>837	180	M18AHS	186/179
TCDL	10.0	Rep Stress Incr	YES	WB	0.97	Horz(CT)	0.14	8	n/a	n/a	MT20	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.14	12	>999	360	MT18HS	244/190
BCDL	10.0										Weight: 214 lb	FT = 0%

LUMBER

TOP CHORD 2x4 SP 2400F 2.0E *Except* T2:2x4 SP No.2
BOT CHORD 2x4 SP No.1 *Except* B2:2x4 SP No.2
WEBS 2x4 SP No.2 *Except* W10:2x4 SP No.1

REACTIONS (lb/size) 8=1774/0-3-8, (min. 0-2-8), 16=1774/ Mechanical, (min. 0-1-8)
Max Horiz 16=-54 (LC 13)
Max Uplift 8=-35 (LC 9), 16=-34 (LC 8)
Max Grav 8=2112 (LC 36), 16=2105 (LC 36)

FORCES

(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-17=-4207/66, 2-17=-4138/85, 2-3=-3558/97, 3-18=-3246/110, 4-18=-3248/109, 4-19=-3299/112, 5-19=-3297/112,
5-6=-3619/97, 6-20=-4311/89, 7-20=-4373/72
BOT CHORD 14-15=-79/3925, 13-14=-9/3637, 12-13=-9/3637, 11-12=-9/3637, 10-11=-9/3637, 9-10=-49/4090
WEBS 2-15=-309/96, 2-14=-724/73, 3-14=0/601, 4-14=-713/57, 4-10=-670/59, 5-10=0/591, 6-9=-286/98, 6-10=-830/78,
7-8=-2056/64, 7-9=-49/4112, 1-16=-2046/66, 1-15=-43/3951

NOTES

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- 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.
- Refer to girder(s) for truss to truss connections.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 34 lb uplift at joint 16 and 35 lb uplift at joint 8.
- This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

BRACING

TOP CHORD Structural wood sheathing directly applied or 2-8-6 oc purlins, except
2-0-0 oc purlins (2-2-0 max.): 3-5.

BOT CHORD

Rigid ceiling directly applied or 10-0-0 oc bracing.

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

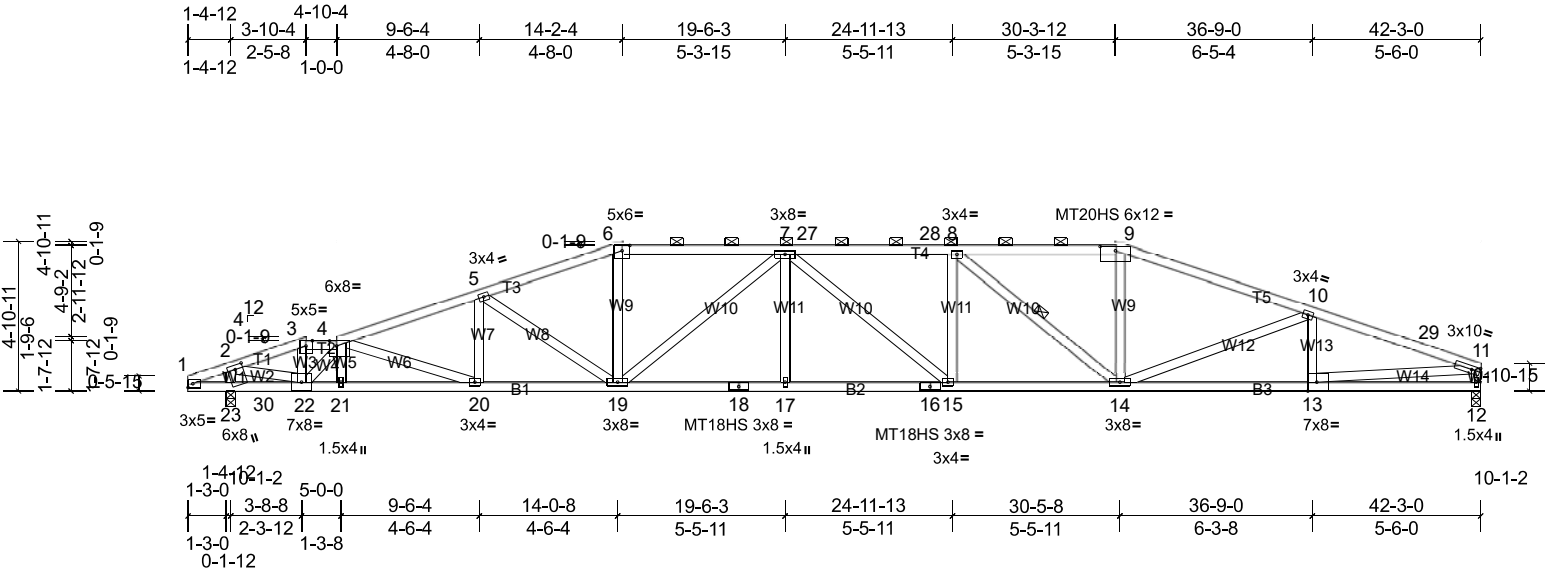
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H2A	Roof Special Girder	1	1	Job Reference (optional)

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER

Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:51

Page: 1

ID:Hz?G0WMOG2uYWPAXnD6WRfz0UCs-P5al26oKTJEVqSFpN9mK1cLgcJlGUbJsaqpRyZmho



Scale = 1:75.3

Plate Offsets (X, Y): [4:0-2-12,0-2-0], [9:0-6-0,0-1-11], [13:0-3-8,Edge], [23:0-1-12,0-3-0]

Loading	(psf)	Spacing	2-0-0	CSI	DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.82	Vert(LL)	-0.46	15-17	>999	240	MT20 244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.93	Vert(CT)	-0.78	15-17	>627	180	MT20HS 187/143
TCDL	10.0	Rep Stress Incr	NO	WB	0.95	Horz(CT)	0.21	12	n/a	n/a	MT18HS 244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.20	17	>999	360	
BCDL	10.0										Weight: 232 lb FT = 0%

LUMBER
TOP CHORD 2x4 SP No.2 *Except* T4:2x4 SP No.1, T5:2x4 SP 2400F 2.0E
BOT CHORD 2x4 SP No.1
WEBS 2x4 SP No.2 *Except* W14:2x4 SP No.1
REACTIONS (lb/size) 12=1843/0-3-8, (min. 0-2-6), 23=2448/0-3-8, (min. 0-3-2)
Max Horiz 23=57 (LC 12)
Max Uplift 12=42 (LC 9), 23=-117 (LC 8)
Max Grav 12=2032 (LC 40), 23=2661 (LC 40)

BRACING
TOP CHORD Structural wood sheathing directly applied or 1-11-15 oc purlins, except
2-0-0 oc purlins (2-4-8 max.): 3-4, 6-9.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 8-14
MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-367/26, 2-3=-3624/119, 3-4=-3380/118, 4-5=-4543/133, 5-6=-4211/131, 6-7=-3970/137, 7-27=-4754/124, 27-28=-4754/124, 8-28=-4754/124, 8-9=-3768/127, 9-10=-4012/115, 10-29=-4051/101, 11-29=-4105/87
BOT CHORD 1-23=-17/332, 23-30=-61/332, 22-30=-61/332, 21-22=-157/4620, 20-21=-151/4619, 19-20=-108/4221, 18-19=-63/4831, 17-18=-63/4831, 16-17=-63/4831, 15-16=-63/4831, 14-15=-40/4754, 13-14=-66/3844
WEBS 3-22=-33/1042, 2-23=-2049/90, 4-22=-2086/111, 6-19=0/936, 9-14=0/847, 10-13=-362/87, 2-22=-88/3226, 7-19=-1117/64, 8-15=0/263, 8-14=-1278/59, 5-19=-812/76, 4-20=-416/74, 11-12=-1982/66, 11-13=-66/3873, 10-14=-507/261, 7-15=-254/97

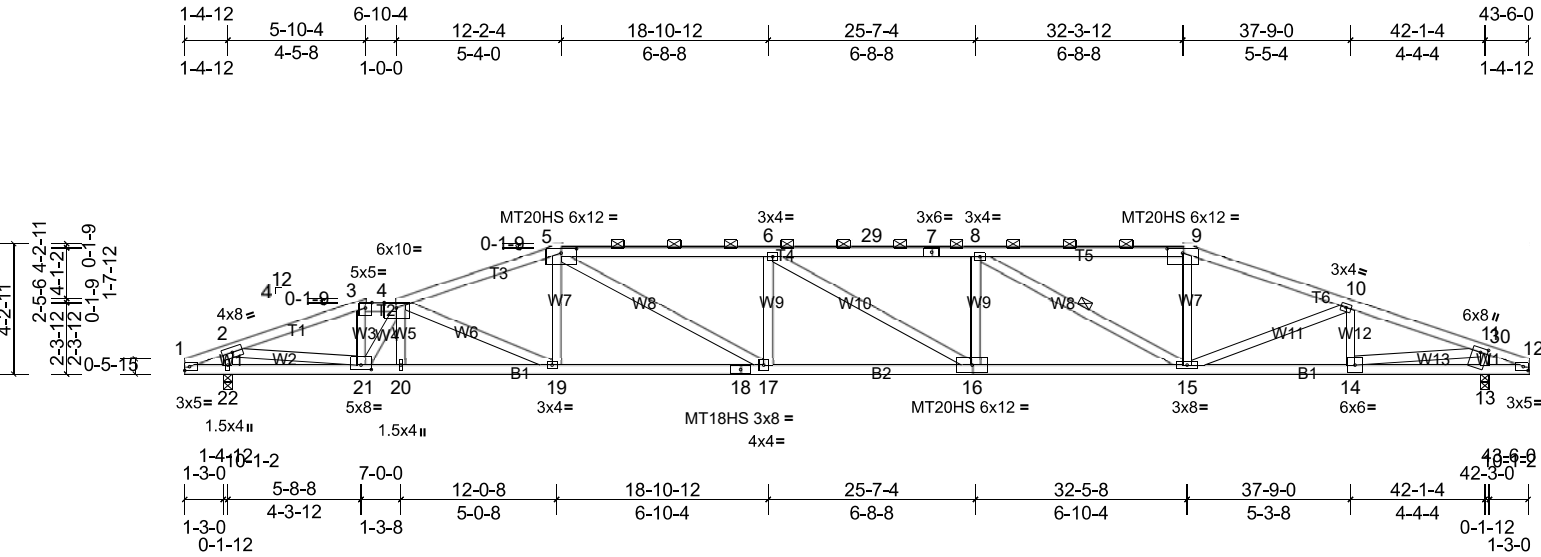
- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 117 lb uplift at joint 23 and 42 lb uplift at joint 12.
 - This truss is designed in accordance with the 2018 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.
 - Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 502 lb down and 53 lb up at 2-5-12 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard
1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H2A	Roof Special Girder	1	1	Job Reference (optional)

Vert: 1-3=-70, 3-4=-70, 4-6=-70, 6-9=-70, 9-11=-70, 12-24=-20
Concentrated Loads (lb)
Vert: 30=-502

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H2B	Roof Special	1	1	Job Reference (optional)



Scale = 1:74.6

Plate Offsets (X, Y): [4:0-4-12,Edge], [5:0-6-0,0-1-11], [9:0-6-0,0-1-11], [11:0-1-12,0-2-12], [21:0-4-0,0-1-12]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.85	Vert(LL)	-0.57	16-17	>857	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.56	Vert(CT)	-0.91	16-17	>534	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.84	Horz(CT)	0.19	13	n/a	n/a	MT18HS	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.22	16-17	>999	360		
BCDL	10.0										Weight: 226 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T4,T5:2x4 SP 2400F 2.0E	TOP CHORD	Structural wood sheathing directly applied or 1-11-5 oc purlins, except
BOT CHORD	2x4 SP 2400F 2.0E		2-0-0 oc purlins (2-5-6 max.): 3-4, 5-9.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
REACTIONS (lb/size)	13=1958/0-3-8, (min. 0-1-11), 22=1957/0-3-8, (min. 0-1-11)	WEBS	1 Row at midpt 8-15
Max Horiz	22=43 (LC 12)		
Max Uplift	13=-68 (LC 9), 22=-71 (LC 8)		
Max Grav	13=2046 (LC 40), 22=2027 (LC 40)		

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	1-2=-390/8, 2-3=-3975/105, 3-4=-3725/111, 4-5=-4756/133, 5-6=-6052/156, 6-29=-5954/143, 7-29=-5954/143, 7-8=-5954/143, 8-9=-4182/132, 9-10=-4431/121, 10-11=-3837/101, 11-30=-350/1, 12-30=-359/0
BOT CHORD	1-22=0/384, 21-22=-27/384, 20-21=-114/4555, 19-20=-112/4563, 18-19=-77/4502, 17-18=-77/4502, 16-17=-89/6048, 15-16=-69/5949, 14-15=-56/3605, 13-14=0/360, 12-13=0/360
WEBS	3-21=0/1043, 4-21=-1826/51, 4-19=-617/80, 5-19=0/370, 5-17=-69/1784, 6-17=-758/116, 6-16=-253/90, 8-16=0/298, 8-15=-2024/72, 9-15=0/894, 10-15=-122/653, 2-22=-1861/116, 2-21=-66/3410, 10-14=-472/67, 11-13=-1867/105, 11-14=-66/3282

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 71 lb uplift at joint 22 and 68 lb uplift at joint 13.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

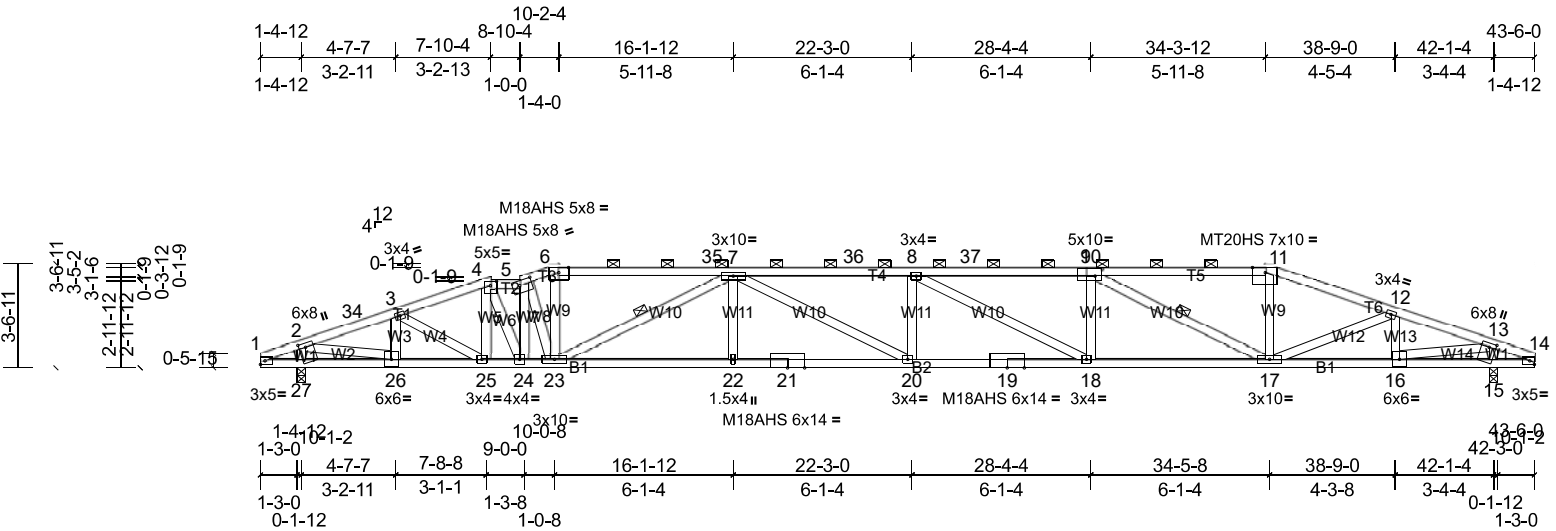
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H2C	Roof Special	1	1	Job Reference (optional)

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER

Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:53

Page: 1

ID:118aTBbLqa_uWbwCHjObdTz0U7O-MTiWTnpa_wUD4mOCUaoo71RwQQ22kQ6?mA3wuKyZmhm



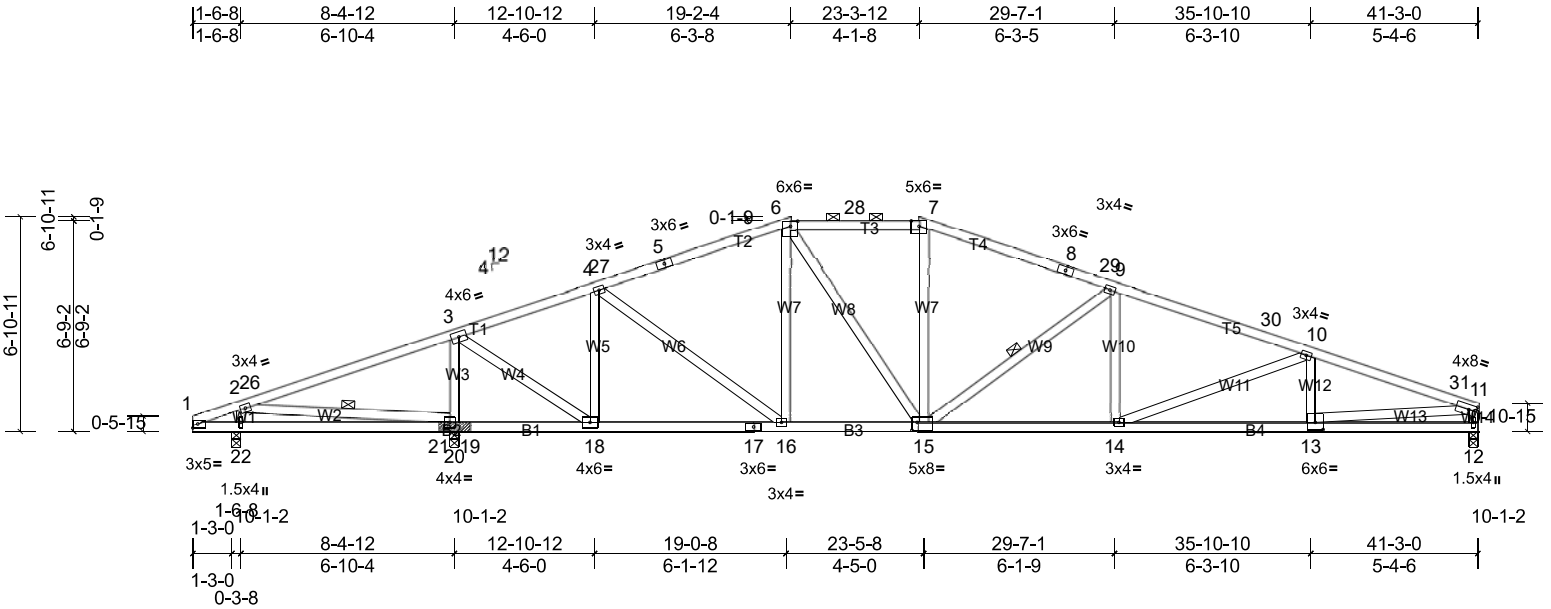
Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H3	Hip	1	1	Job Reference (optional)

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER

Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:54

Page: 1

ID: gSPqfllYdRVn2QsX0FXRLkz1i5K-qgFuh7qCIec4hwzO2HJ1fEz4YqLiTs9?ppUQmyZmhl



Scale = 1:74

Plate Offsets (X, Y): [6:0-2-12,0-2-0], [13:0-3-0,0-2-12], [15:0-2-0,0-3-0]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.97	Vert(LL)	-0.23	13-14	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.95	Vert(CT)	-0.37	13-14	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.86	Horz(CT)	0.08	12	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.08	13-14	>999	360		
BCDL	10.0											
Weight: 234 lb FT = 0%												

LUMBER

TOP CHORD 2x4 SP No.2 *Except* T1:2x4 SP No.1
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.2

REACTIONS (lb/size) 12=1379/0-3-8, (min. 0-2-3), 20=2300/(0-3-8 + bearing block),
(req. 0-3-10), 22=20/0-3-8, (min. 0-1-8)
Max Horiz 22=81 (LC 12)
Max Uplift 12=-29 (LC 9), 20=-4 (LC 8), 22=-180 (LC 52)
Max Grav 12=1861 (LC 36), 20=3061 (LC 36), 22=166 (LC 51)

BRACING

TOP CHORD Structural wood sheathing directly applied, except
2-0-0 oc purlins (3-3-7 max.): 6-7.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
5-2-5 oc bracing: 18-20
2-2-0 oc bracing: 13-14.
WEBS 1 Row at midpt 9-15, 2-20

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

FORCES

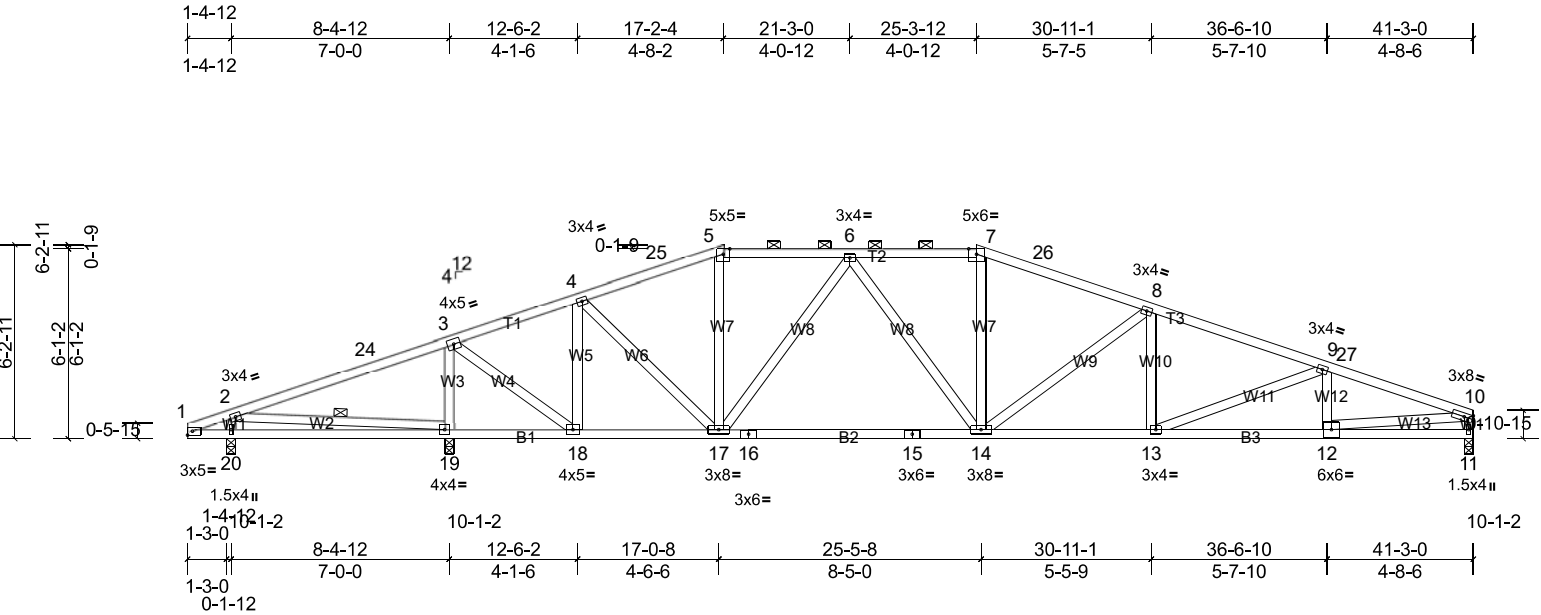
(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-26=0/1097, 3-26=0/1330, 3-4=-1099/54, 4-27=-1873/47, 5-27=-1860/55, 5-6=-1758/70, 6-28=-2031/98, 7-28=-2031/98,
7-8=-2138/86, 8-29=-2248/66, 9-29=-2260/63, 9-30=-3171/82, 10-30=-3277/61, 10-31=-3686/70, 11-31=-3739/52
BOT CHORD 1-22=-21/302, 21-22=-94/302, 20-21=-94/302, 19-20=-1147/52, 18-19=-1147/52, 17-18=-13/962, 16-17=-13/962,
15-16=0/1685, 14-15=0/3009, 13-14=-37/3497
WEBS 4-18=-1322/42, 6-16=-424/63, 6-15=-54/703, 7-15=0/282, 3-20=-2757/69, 3-18=0/2533, 4-16=0/908, 9-14=0/341,
9-15=-1205/68, 11-12=-1812/53, 10-13=-332/81, 10-14=-522/54, 11-13=-37/3525, 2-22=-130/276, 2-20=-1456/17

NOTES

- 2x4 SP No.2 bearing block 12" long at jt. 20 attached to front face with 2 rows of 10d (0.148"x3") nails spaced 3" o.c. 8 Total fasteners. Bearing is assumed to be SP No.2.
- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- Provide adequate drainage to prevent water ponding.
- All plates are 3x4 MT20 unless otherwise indicated.
- This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 29 lb uplift at joint 12, 4 lb uplift at joint 20 and 180 lb uplift at joint 22.
- This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H3A	Hip	1	1	Job Reference (optional)



Scale = 1:73.9

Loading	(psf)	Spacing	2-0-0	CSI	DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.85	Vert(LL)	-0.20	13	>999	240	MT20 244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.88	Vert(CT)	-0.35	14-17	>999	180	
TCDL	10.0	Rep Stress Incr	YES	WB	0.79	Horz(CT)	0.08	11	n/a	n/a	
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.07	13	>999	360	
BCDL	10.0										Weight: 233 lb FT = 0%

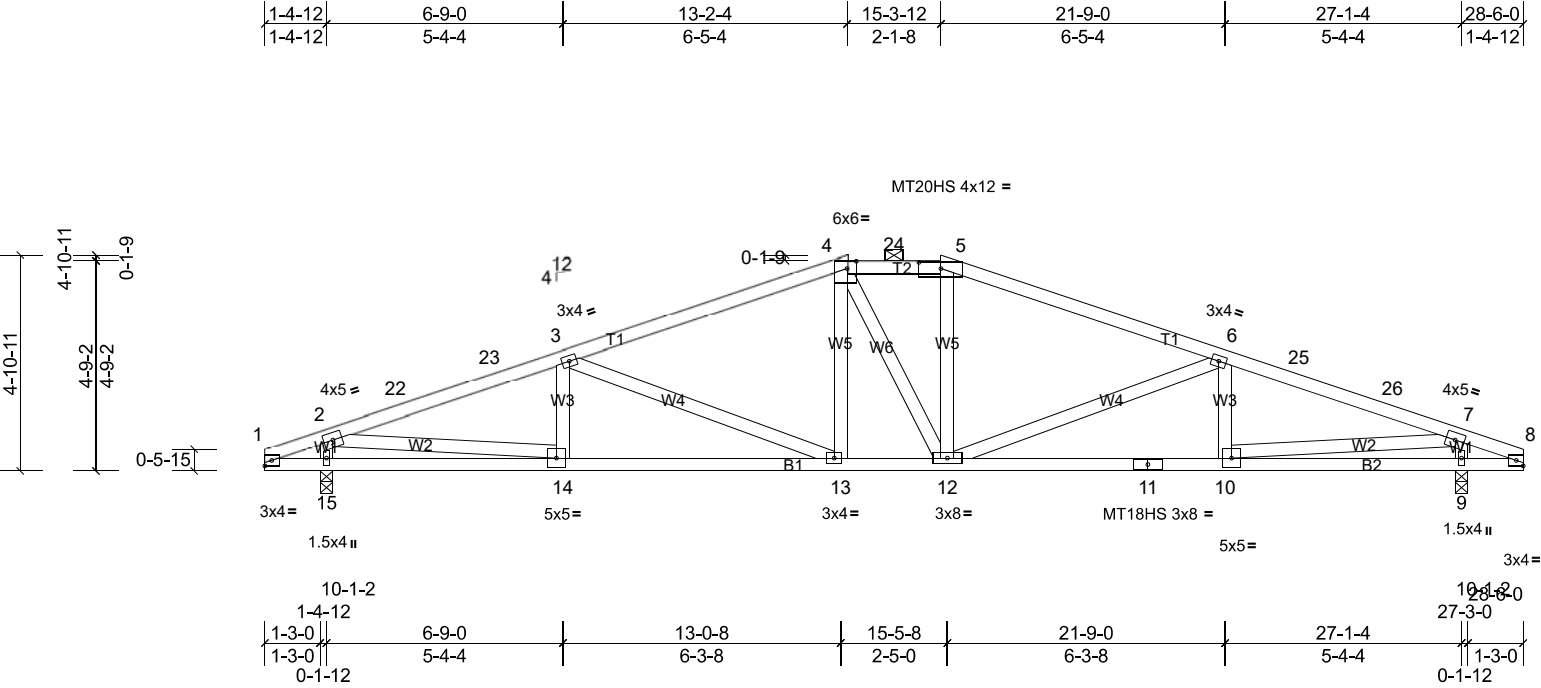
LUMBER		BRACING	
TOP CHORD	2x4 SP No.2 *Except* T1:2x4 SP No.1	TOP CHORD	Structural wood sheathing directly applied or 2-4-2 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (3-7-9 max.): 5-7.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
REACTIONS	(lb/size) 11=1372/0-3-8, (min. 0-2-1), 19=2338/0-3-8, (min. 0-3-6), 20=-11/0-3-8, (min. 0-1-8)	WEBS	5-3-7 oc bracing: 18-19.
	Max Horiz 20=72 (LC 12)		1 Row at midpt 2-19
	Max Uplift 11=-34 (LC 9), 19=-19 (LC 8), 20=-223 (LC 52)		MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
	Max Grav 11=1771 (LC 36), 19=2855 (LC 36), 20=127 (LC 38)		

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	2-24=-11/1154, 3-24=0/1278, 3-4=-794/62, 4-25=-1475/52, 5-25=-1384/61, 5-6=-1332/71, 6-7=-2064/103, 7-26=-2153/93, 8-26=-2276/83, 8-9=-3118/96, 9-27=-3272/77, 10-27=-3415/75
BOT CHORD	1-20=-22/319, 19-20=-90/319, 18-19=-1095/64, 17-18=-15/665, 16-17=0/1757, 15-16=0/1757, 14-15=0/1757, 13-14=-15/2869, 12-13=-47/3195
WEBS	6-17=-875/68, 6-14=-23/570, 7-14=0/313, 8-14=-993/70, 10-11=-1728/53, 9-12=-364/78, 10-12=-47/3229, 9-13=-350/43, 4-18=-1255/24, 3-19=-2555/90, 4-17=0/1065, 2-20=-176/314, 2-19=-1420/30, 3-18=0/2177

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - All plates are 3x4 MT20 unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 34 lb uplift at joint 11, 19 lb uplift at joint 19 and 223 lb uplift at joint 20.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H4	Hip	1	1	Job Reference (optional)



Scale = 1:52.2
Plate Offsets (X, Y): [4:0-2-8,0-2-0], [5:0-6-0,0-1-11]

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.88	Vert(LL)	-0.19	13-14	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.82	Vert(CT)	-0.31	13-14	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.62	Horz(CT)	0.07	9	n/a	n/a	MT18HS	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	13-14	>999	360		
BCDL	10.0											
											Weight: 149 lb	FT = 0%

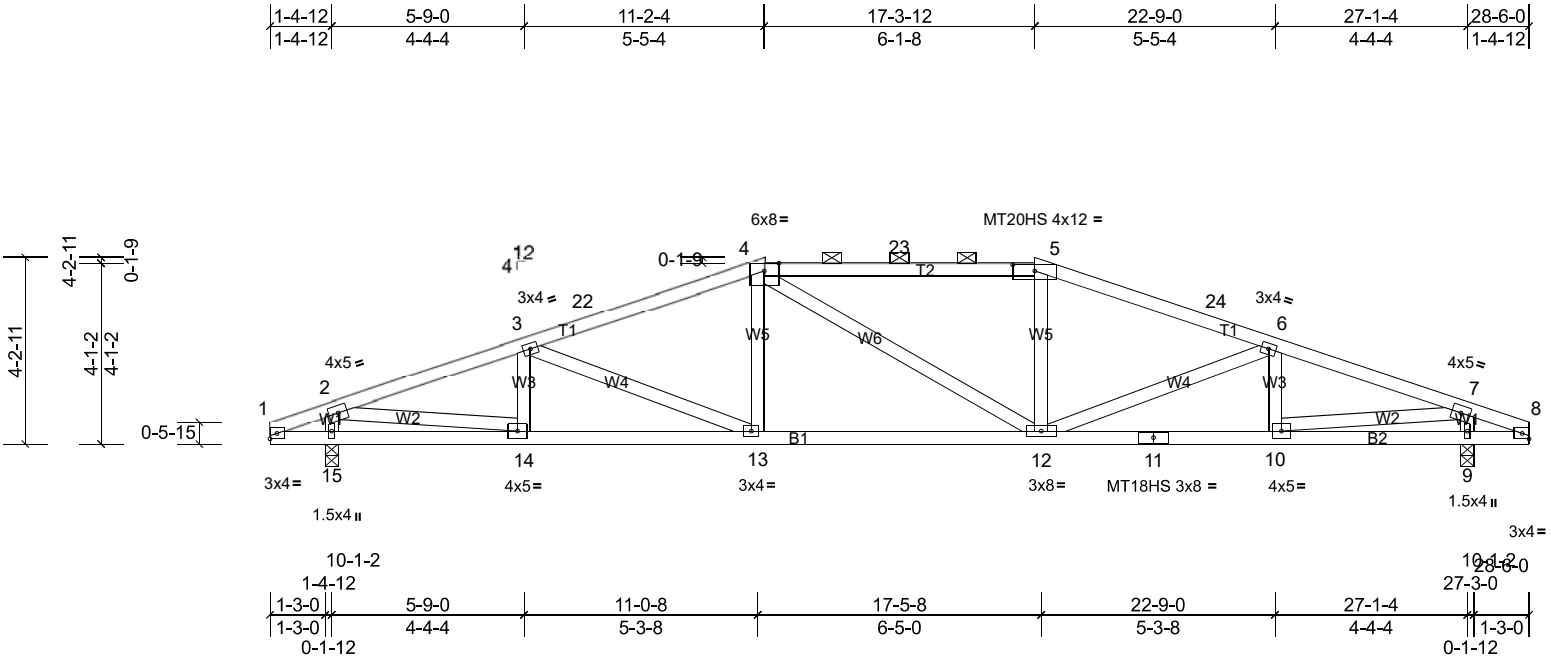
LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-2-0 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (2-5-6 max.): 4-5.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
REACTIONS	(lb/size) 9=1283/0-3-8, (min. 0-2-1), 15=1283/0-3-8, (min. 0-2-1)		MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
	Max Horiz 15=50 (LC 12)		
	Max Uplift 9=-34 (LC 9), 15=-34 (LC 8)		
	Max Grav 9=1774 (LC 36), 15=1774 (LC 36)		

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	1-2=-287/9, 2-22=-3049/15, 22-23=-2961/17, 3-23=-2881/29, 3-4=-2429/33, 4-24=-2196/50, 5-24=-2196/50, 5-6=-2430/33, 6-25=-2880/29, 25-26=-2960/18, 7-26=-3048/15, 7-8=-288/0
BOT CHORD	1-15=0/314, 14-15=-48/314, 13-14=-20/2809, 12-13=0/2194, 11-12=0/2808, 10-11=0/2808, 9-10=-1/315, 8-9=-1/315
WEBS	3-13=-648/66, 4-13=0/327, 4-12=-267/273, 5-12=0/397, 6-12=-645/66, 2-15=-1663/87, 2-14=0/2514, 7-9=-1663/87, 7-10=0/2512

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 34 lb uplift at joint 15 and 34 lb uplift at joint 9.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	H4A	Hip	1	1	Job Reference (optional)



Scale = 1:52.2

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.93	Vert(LL)	-0.14	13	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.69	Vert(CT)	-0.25	12-13	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.56	Horz(CT)	0.07	9	n/a	n/a	MT18HS	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	13	>999	360		
BCDL	10.0											
											Weight: 143 lb	FT = 0%

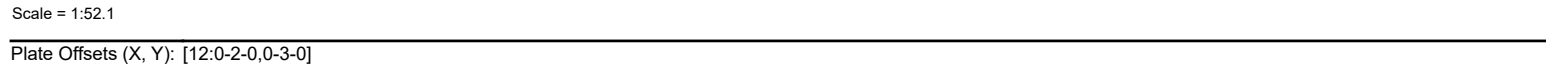
LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 2-9-3 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (2-2-0 max.): 4-5.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
REACTIONS	(lb/size) 9=1283/0-3-8, (min. 0-1-15), 15=1283/0-3-8, (min. 0-1-15)		
	Max Horiz 15=43 (LC 12)		
	Max Uplift 9=-42 (LC 9), 15=-42 (LC 8)		
	Max Grav 9=1624 (LC 36), 15=1624 (LC 36)		

FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD	2-3=-2629/45, 3-22=-2279/35, 4-22=-2184/53, 4-23=-2070/68, 5-23=-2070/68, 5-24=-2185/53, 6-24=-2279/35, 6-7=-2629/45
BOT CHORD	13-14=-35/2426, 12-13=0/2070, 11-12=-4/2426, 10-11=-4/2426
WEBS	3-13=-373/125, 4-13=0/278, 5-12=0/278, 6-12=-372/125, 3-14=-283/60, 6-10=-283/60, 7-9=-1495/81, 7-10=-18/2265, 2-15=-1495/81, 2-14=-19/2265

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - Provide adequate drainage to prevent water ponding.
 - 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.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 42 lb uplift at joint 9 and 42 lb uplift at joint 15.
 - This truss is designed in accordance with the 2018 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.

LOAD CASE(S) Standard

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:57 Page: 1
ID:CaDOdzPz5XIIGS8EIlk?Vcya19e-EFx1J9s529?fYNizjQItkHtth1P9gJQbhn1815yZmhi



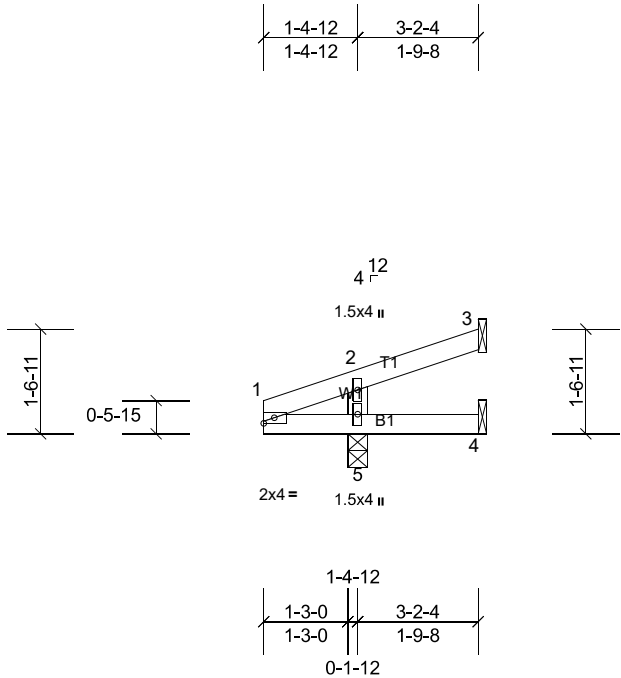
LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 3-6-3 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins (3-6-0 max.): 4-6.
WEBS	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
REACTIONS	(lb/size)		MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
	10=1275/0-3-8, (min. 0-1-12), 16=1290/0-3-8, (min. 0-1-12)		
Max Horiz	16=34 (LC 12)		
Max Uplift	10=-49 (LC 9), 16=-51 (LC 8)		
Max Grav	10=1465 (LC 36), 16=1482 (LC 36)		

NOTES

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Provide adequate drainage to prevent water ponding.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 51 lb uplift at joint 16 and 49 lb uplift at joint 10.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	J2	Jack-Open	12	1	Job Reference (optional)



Scale = 1:34.2

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.14	Vert(LL)	0.00	4-5	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.11	Vert(CT)	0.00	4-5	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.03	Horz(CT)	-0.01	3	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 10 lb	FT = 0%

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

BRACING
TOP CHORD
BOT CHORD

Structural wood sheathing directly applied or 3-2-4 oc purlins.
Rigid ceiling directly applied or 10-0-0 oc bracing.

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

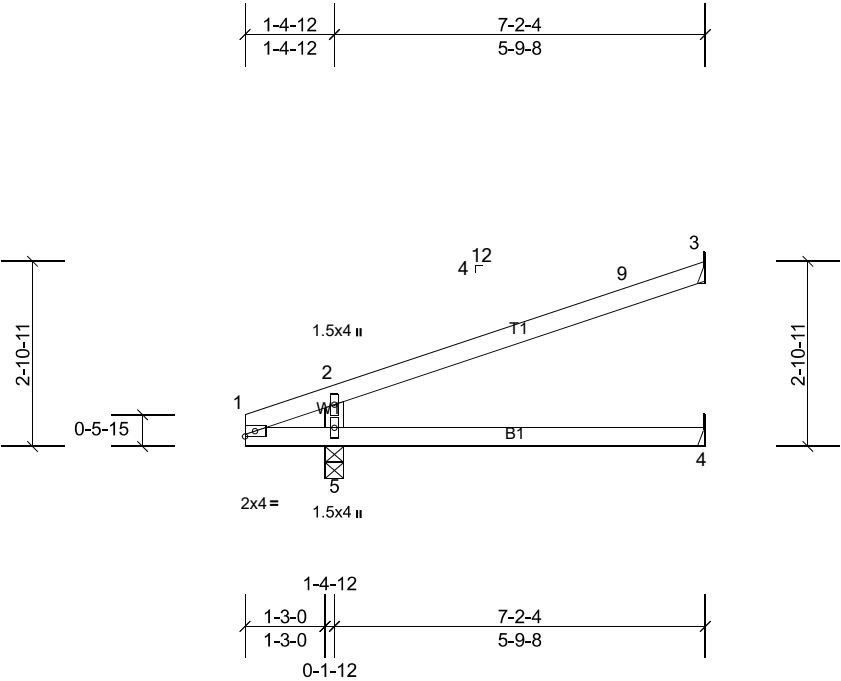
REACTIONS (lb/size) 3=32/ Mechanical, (min. 0-1-8), 4=-5/ Mechanical, (min. 0-1-8), 5=254/0-3-8, (min. 0-1-8)
Max Horiz 5=28 (LC 8)
Max Uplift 3=-17 (LC 12), 4=-10 (LC 18), 5=-22 (LC 8)
Max Grav 3=46 (LC 18), 4=16 (LC 7), 5=329 (LC 18)

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

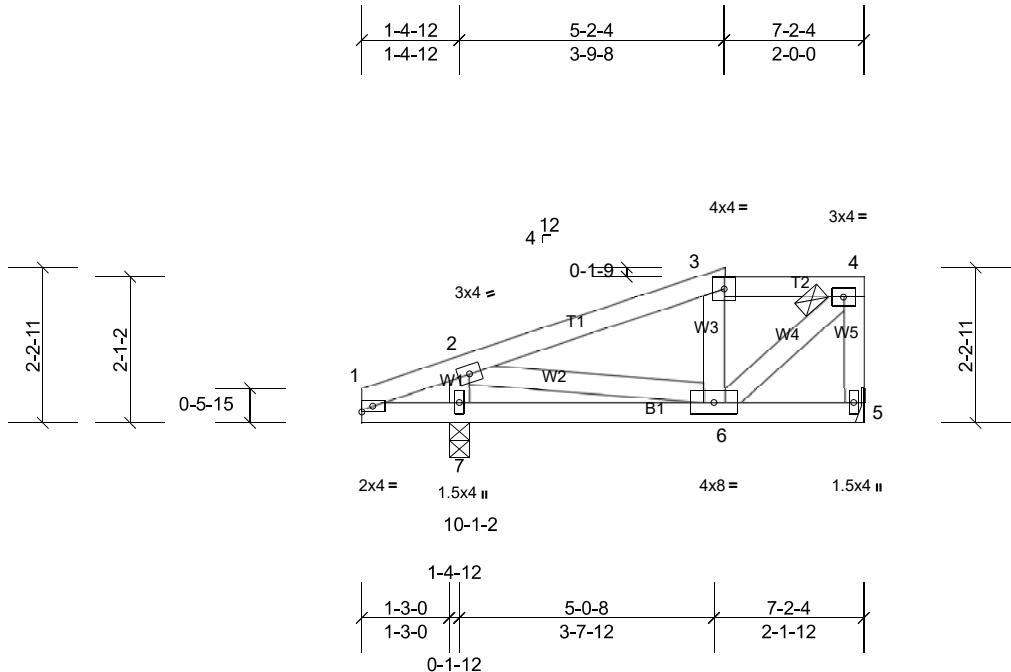
- NOTES**
- 1) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - 2) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - 3) Unbalanced snow loads have been considered for this design.
 - 4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 5) Refer to girder(s) for truss to truss connections.
 - 6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 17 lb uplift at joint 3, 10 lb uplift at joint 4 and 22 lb uplift at joint 5.
 - 7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	J6	Jack-Partial	40	1	Job Reference (optional)



Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	J6A	Half Hip	6	1	Job Reference (optional)



Scale = 1:33

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.33	Vert(LL)	0.00	6-7	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.09	Vert(CT)	-0.01	6-7	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.06	Wind(LL)	0.00	6	>999	360		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MP								
BCDL	10.0										Weight: 36 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-4.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS	2x4 SP No.2		
REACTIONS	(lb/size) 5=239/ Mechanical, (min. 0-1-8), 7=395/0-3-8, (min. 0-1-8)		
	Max Horiz 7=50 (LC 11)		
	Max Uplift 5=-9 (LC 8), 7=-29 (LC 8)		
	Max Grav 5=262 (LC 32), 7=548 (LC 33)		
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.		
TOP CHORD	2-3=-270/5, 4-5=-251/14		
WEBS	2-7=-518/70, 4-6=0/260		

- NOTES
- 1) Unbalanced roof live loads have been considered for this design.

2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60

3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10

4) Unbalanced snow loads have been considered for this design.

5) Provide adequate drainage to prevent water ponding.

6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

7) Refer to girder(s) for truss to truss connections.

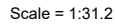
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 9 lb uplift at joint 5 and 29 lb uplift at joint 7.

9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

10) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

LOAD CASE(S) Standard

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:58 Page: 1
ID:N?I3FSITPDbBeG8GbjazNQz1iJa-iRVPXVtpT7WAXH9H7Ozq48sVRjPs3lwRnhZXyZmh

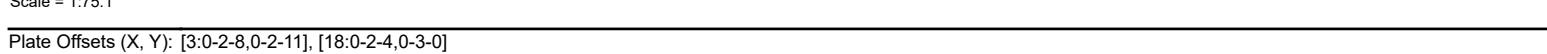


LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 6-0-0 oc purlins, except
BOT CHORD	2x4 SP No.2		2-0-0 oc purlins: 3-4.
WEBS	2x4 SP No.2	BOT CHORD	<u>Rigid ceiling directly applied or 10-0-0 oc bracing.</u>
REACTIONS	(lb/size) 5=234/ Mechanical, (min. 0-1-8), 7=389/0-3-8, (min. 0-1-8)		MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
	Max Horiz 7=29 (LC 71)		
	Max Uplift 5=-9 (LC 9), 7=-29 (LC 8)		
	Max Grav 5=332 (LC 32), 7=474 (LC 33)		
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.		
TOP CHORD	2-3=-261/0		
WEBS	2-7=-294/30		

- ### NOTES
- 1) Unbalanced roof live loads have been considered for this design.
 - 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; C_{DL}=6.0psf, BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - 3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - 4) Unbalanced snow loads have been considered for this design.
 - 5) Provide adequate drainage to prevent water ponding.
 - 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - 7) Refer to girder(s) for truss to truss connections.
 - 8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 9 lb uplift at joint 5 and 29 lb uplift at joint 7.
 - 9) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
 - 10) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
 - 11) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 75 lb down and 41 lb up at 3-2-4, and 37 lb down and 18 lb up at 5-3-0 on top chord, and 14 lb down and 37 lb up at 3-2-4, and 5 lb down and 16 lb up at 5-3-0 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

LOAD CASE(S) Standard
1) Dead + Snow (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-3=-70, 3-4=-70, 5-8=-20
Concentrated Loads (lb)
Vert: 6=7, 12=3

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:42:59 Page: 1
ID:5wnyG0D3uwThAB_At72HTz1f3Q-iRVPXVtjP7WAXH9H7Ozq48mORmiPeXlwRnhZXyZmhh



LUMBER			BRACING		
TOP CHORD	2x4 SP No.2 *Except* T4,T5:2x4 SP No.1		TOP CHORD		Structural wood sheathing directly applied or 1-7-8 oc purlins, except
BOT CHORD	2x4 SP No.2				2-0-0 oc purlins (5-1-12 max.): 3-4.
WEBS	2x4 SP No.2		BOT CHORD		Rigid ceiling directly applied or 5-8-6 oc bracing.
REACTIONS	(lb/size)	13=454/0-3-8, (min. 0-1-8), 17=2683/0-3-8, (min. 0-3-4), 23=864/0-3-8, (min. 0-1-8) Max Horiz 23=-82 (LC 13) Max Uplift 13=-65 (LC 89), 23=-46 (LC 8) Max Grav 13=630 (LC 85), 17=2756 (LC 38), 23=1213 (LC 38)	WEBS		1 Row at midpt 7-17
					MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

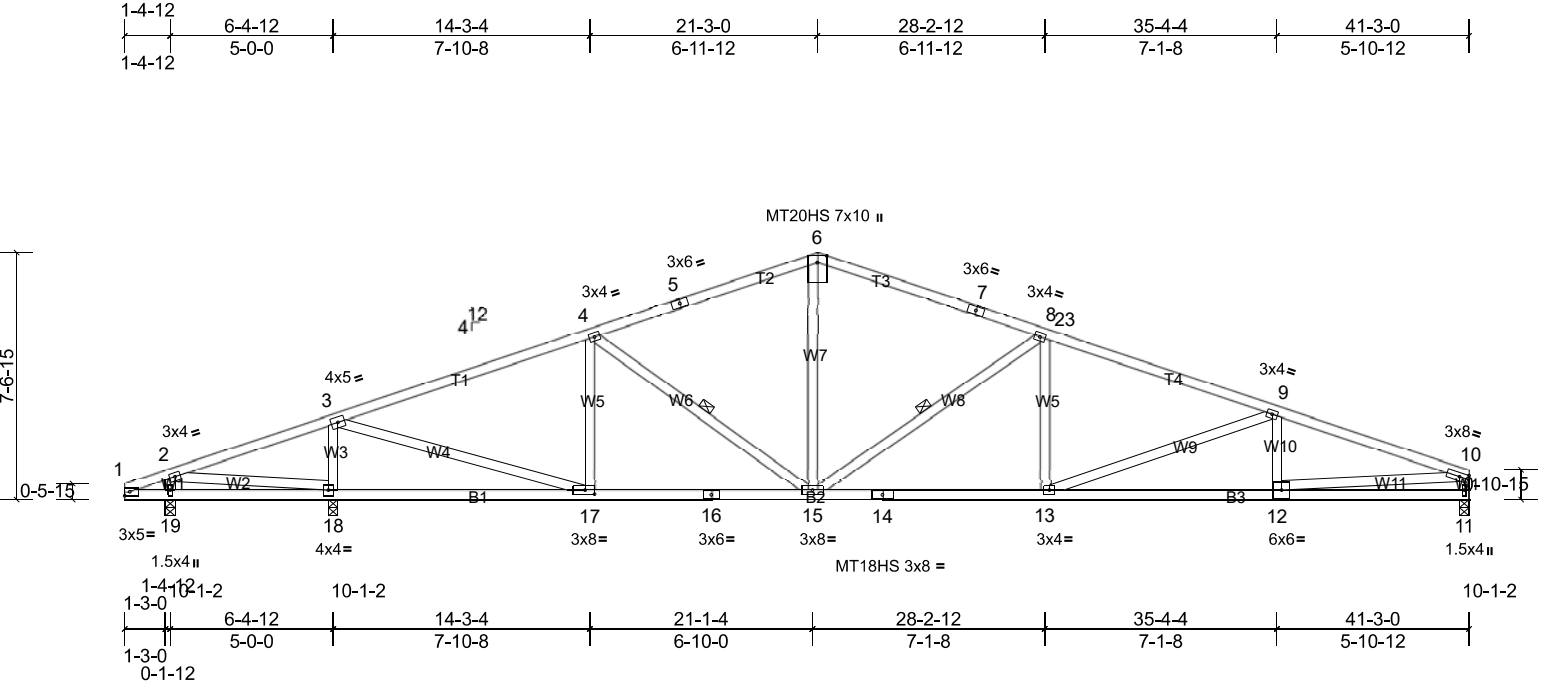
NOTES

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) Provide adequate drainage to prevent water ponding.
- 6) All plates are MT20 plates unless otherwise indicated.
- 7) All plates are 3x4 MT20 unless otherwise indicated.
- 8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 46 lb uplift at joint 23 and 65 lb uplift at joint 13.
- 10) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- 11) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
- 12) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 43 lb down and 22 lb up at 3-2-4 on top chord, and 9 lb down and 21 lb up at 3-2-4 on bottom chord. The design/selection of such connection device(s) is the responsibility of others.

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	T1	Roof Special Girder	1	1	Job Reference (optional)

Concentrated Loads (lb)
Vert: 22=4

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	T3	Common	4	1	Job Reference (optional)



Scale = 1:70.7

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

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.93	Vert(LL)	-0.19	12-13	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.85	Vert(CT)	-0.37	12-13	>999	180	MT20HS	187/143
TCDL	10.0	Rep Stress Incr	YES	WB	0.73	Horz(CT)	0.07	11	n/a	n/a	MT18HS	244/190
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.09	12-13	>999	360		
BCDL	10.0										Weight: 220 lb	FT = 0%

LUMBER

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

BRACING

TOP CHORD
BOT CHORD
WEBS

Structural wood sheathing directly applied or 2-2-0 oc purlins.
Rigid ceiling directly applied or 6-0-0 oc bracing.
1 Row at midpt 4-15, 8-15

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

REACTIONS (lb/size) 11=1497/0-3-8, (min. 0-1-13), 18=2282/0-3-8, (min. 0-2-11),
19=-80/0-3-8, (min. 0-1-8)
Max Horiz 19=90 (LC 12)
Max Uplift 11=-19 (LC 9), 18=-7 (LC 8), 19=-197 (LC 19)
Max Grav 11=1527 (LC 19), 18=2282 (LC 1), 19=65 (LC 31)

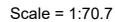
FORCES (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-8/879, 3-4=-1835/23, 4-5=-1868/40, 5-6=-1788/64, 6-7=-1775/57, 7-8=-1853/33, 8-23=-2606/56, 9-23=-2769/54,
9-10=-3133/49
BOT CHORD 17-18=-769/44, 16-17=0/1663, 15-16=0/1663, 14-15=0/2559, 13-14=0/2559, 12-13=-14/2936
WEBS 4-17=-574/75, 3-18=-2029/91, 3-17=0/2517, 6-15=0/647, 4-15=-192/320, 8-13=0/392, 8-15=-1125/81, 9-13=-498/65,
2-18=-681/13, 10-11=-1477/45, 10-12=-14/2955

NOTES

- Unbalanced roof live loads have been considered for this design.
- Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- Unbalanced snow loads have been considered for this design.
- 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.
- Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 19 lb uplift at joint 11, 7 lb uplift at joint 18 and 197 lb uplift at joint 19.
- This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

LOAD CASE(S) Standard

QUALITY TRUSS LLC, SMITHVILLE, MO, MICHAEL PARKER Run: 8.81 S Jul 11 2024 Print: 8.810 S Jul 11 2024 MiTek Industries, Inc. Thu Sep 26 11:43:00 Page: 1
ID:eoFsfjv4ELskJrJ?39JT45z1iFS-epd9xAvzL4NDPrROYOQRvVD7CFQbtZb1NiGDoQyZmhf



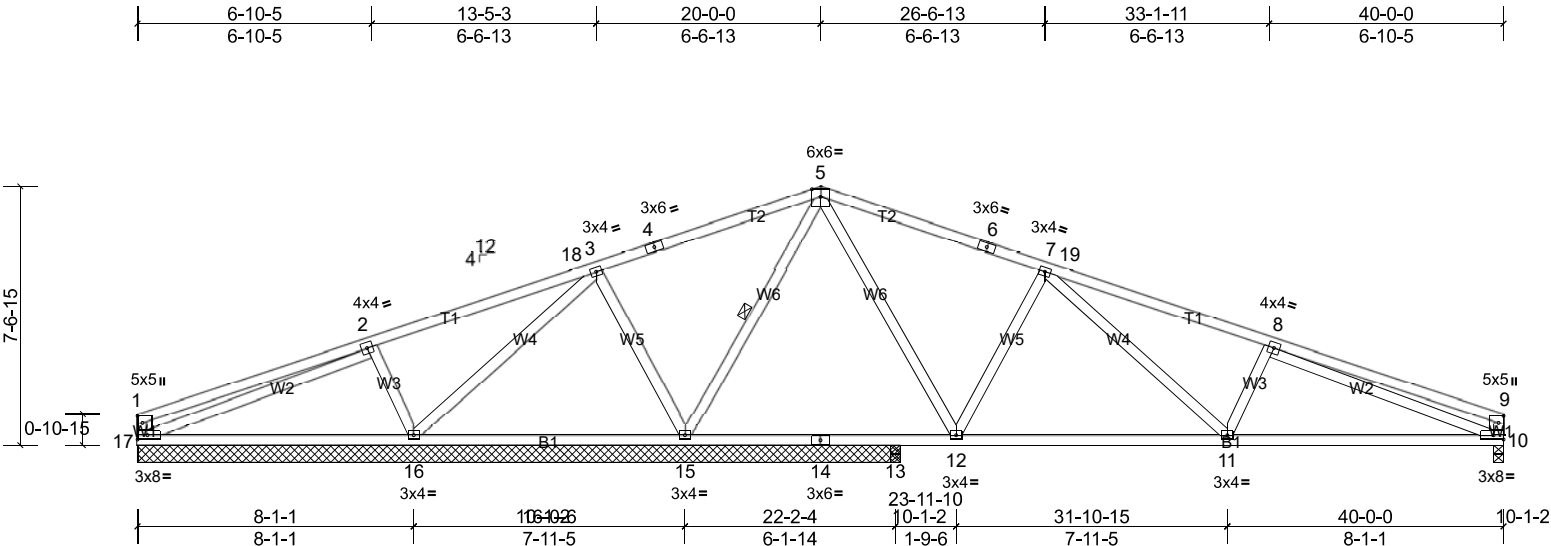
LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied. Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 17-18. 1 Row at midpt 8-15
BOT CHORD	2x4 SP No.2	BOT CHORD	
WEBS	2x4 SP No.2	WEBS	
REACTIONS	(lb/size)	11=1384/0-3-8, (min. 0-1-11), 18=2273/0-3-8, (min. 0-2-11), 19=43/0-3-8, (min. 0-1-8)	
	Max Horiz	19=90 (LC 12)	
	Max Uplift	11=-22 (LC 9), 19=-141 (LC 32)	
	Max Grav	11=1425 (LC 19), 18=2273 (LC 1), 19=199 (LC 31)	
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.		
TOP CHORD	2-3=0/956, 3-4=-1190/39, 4-5=-1536/54, 5-6=-1463/70, 6-7=-1435/63, 7-8=-1554/39, 8-23=-2327/62, 9-23=-2486/61, 9-10=-2898/54		
BOT CHORD	17-18=-866/59, 16-17=0/1071, 15-16=0/1071, 14-15=0/2292, 13-14=0/2292, 12-13=-18/2712		
WEBS	3-18=-2019/68, 4-17=-827/49, 3-17=0/2061, 6-15=0/465, 4-15=-10/677, 8-13=0/400, 8-15=-1133/81, 9-13=-534/62, 2-18=-1039/22, 10-11=-1375/48, 10-12=-18/2729		

NOTES

- 1) Unbalanced roof live loads have been considered for this design.
- 2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDF=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
- 3) TCFL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
- 4) Unbalanced snow loads have been considered for this design.
- 5) All plates are MT20 plates unless otherwise indicated.
- 6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
- 7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 22 lb uplift at joint 11 and 141 lb uplift at joint 19.
- 8) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

LOAD CASE(S) Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	T3B	Common	1	1	Job Reference (optional)



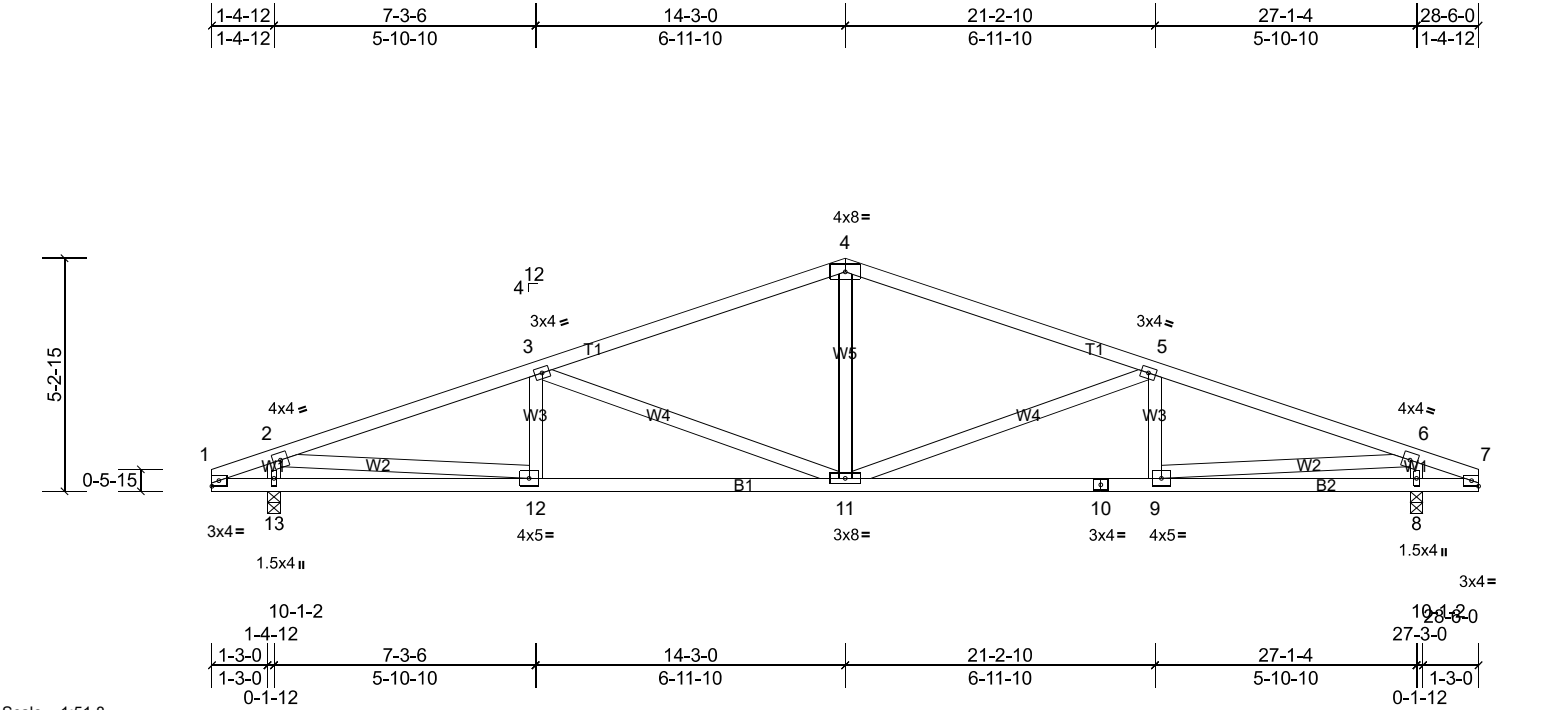
Scale = 1:67.5

Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	I/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.85	Vert(LL)	-0.10	11-12	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.63	Vert(CT)	-0.22	11-12	>955	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.91	Horz(CT)	0.02	10	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.04	11-12	>999	360		
BCDL	10.0										Weight: 214 lb	FT = 0%

LUMBER		BRACING	
TOP CHORD	2x4 SP No.2	TOP CHORD	Structural wood sheathing directly applied or 3-11-2 oc purlins, except end verticals.
BOT CHORD	2x4 SP No.2	BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS	2x4 SP No.2	WEBS	1 Row at midpt 5-15
REACTIONS	All bearings 22-4-0. except 10=0-3-8, 13=0-3-8 (lb) - Max Horiz 17=-62 (LC 13) Max Uplift All uplift 100 (lb) or less at joint(s) 10, 15, 16, 17 Max Grav All reactions 250 (lb) or less at joint(s) 13 except 10=907 (LC 19), 15=1957 (LC 1), 16=542 (LC 31), 17=317 (LC 31)		MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.
FORCES	(lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown. TOP CHORD 1-2=-535/39, 3-4=0/775, 4-5=0/840, 5-6=-476/101, 6-7=-587/78, 7-19=-1338/96, 8-19=-1491/94, 8-9=-690/47, 1-17=-374/56, 9-10=-435/59 BOT CHORD 15-16=-563/92, 11-12=0/857, 10-11=-43/1488 WEBS 2-17=-23/402, 8-10=-986/36, 2-16=-490/117, 3-16=-4/538, 3-15=-655/94, 5-15=-1583/64, 5-12=-35/937, 7-12=-891/120, 7-11=-2/720, 8-11=-360/111		

- NOTES**
- Unbalanced roof live loads have been considered for this design.
 - Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
 - TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10
 - Unbalanced snow loads have been considered for this design.
 - All plates are 3x4 MT20 unless otherwise indicated.
 - This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
 - Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 17, 10, 16, 15.
 - This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
- LOAD CASE(S)** Standard

Job	Truss	Truss Type	Qty	Ply	
MSA2408-R	T4	Common	1	1	Job Reference (optional)



Loading	(psf)	Spacing	2-0-0	CSI		DEFL	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	25.0	Plate Grip DOL	1.15	TC	0.97	Vert(LL)	-0.12	11-12	>999	240	MT20	244/190
Snow (Pf)	25.0	Lumber DOL	1.15	BC	0.70	Vert(CT)	-0.24	11-12	>999	180		
TCDL	10.0	Rep Stress Incr	YES	WB	0.70	Horz(CT)	0.05	8	n/a	n/a		
BCLL	0.0	Code	IRC2018/TPI2014	Matrix-MR		Wind(LL)	0.05	11-12	>999	360		
BCDL	10.0										Weight: 140 lb	FT = 0%

LUMBER

TOP CHORD 2x4 SP No.2

BOT CHORD 2x4 SP No.2

WEBS 2x4 SP No.2

REACTIONS (lb/size)

8=1283/0-3-8, (min. 0-1-9), 13=1283/0-3-8, (min. 0-1-9)

Max Horiz 13=55 (LC 12)

Max Uplift 8=-29 (LC 9), 13=-29 (LC 8)

Max Grav 8=1319 (LC 19), 13=1319 (LC 18)

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

TOP CHORD 1-2=-268/11, 2-3=-2358/19, 3-4=-1727/25, 4-5=-1727/25, 5-6=-2358/19, 6-7=-268/0

BOT CHORD 1-13=0/290, 12-13=-52/290, 11-12=-11/2185, 10-11=0/2185, 9-10=0/2185, 8-9=0/290, 7-8=0/290

WEBS 3-11=-730/80, 4-11=0/544, 5-11=-730/80, 2-13=-1185/96, 2-12=0/1953, 6-8=-1185/95, 6-9=0/1953

NOTES

1) Unbalanced roof live loads have been considered for this design.

2) Wind: ASCE 7-16; Vult=115mph (3-second gust) Vasd=91mph; TCDL=6.0psf; BCDL=6.0psf; h=20ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone; cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60

3) TCLL: ASCE 7-16; Pr=25.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pf=25.0 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Fully Exp.; Ce=0.9; Cs=1.00; Ct=1.10

4) Unbalanced snow loads have been considered for this design.

5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.

6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 29 lb uplift at joint 13 and 29 lb uplift at joint 8.

7) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

BRACING

TOP CHORD

BOT CHORD

Structural wood sheathing directly applied.

Rigid ceiling directly applied or 10-0-0 oc bracing.

MiTek recommends that Stabilizers and required cross bracing be installed during truss erection, in accordance with Stabilizer Installation guide.

LOAD CASE(S)

Standard