| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | A1 | Common Girder | 1 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:37 Page: 1
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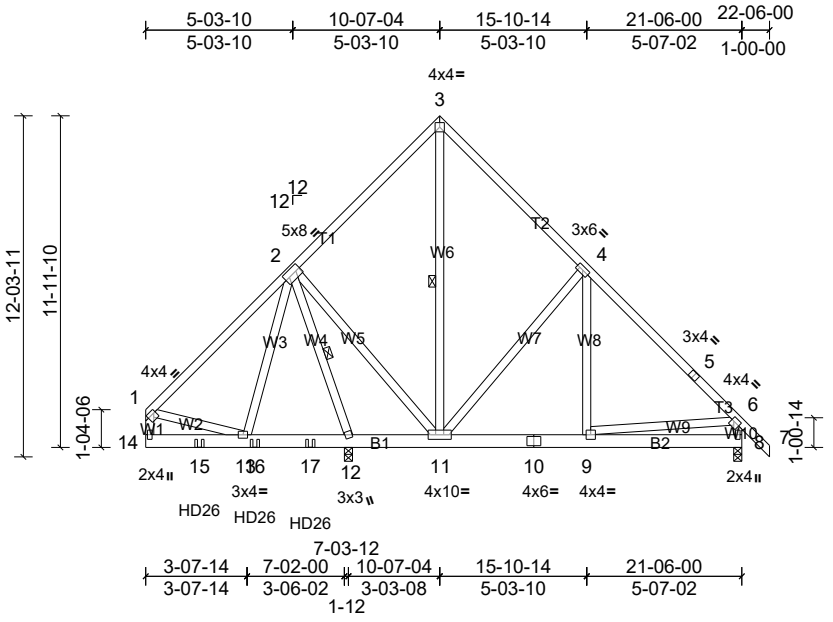


Scale = 1:83.5

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.47 | Vert(LL) | -0.01 | 9-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.28 | Vert(TL) | -0.04 | 9-11 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.45 | Horiz(TL) | 0.00 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 138 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SPF No.2
WEBS 2x4 SPF No.2 *Except* 8-6:2x4 SP No.2 P

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 1 Row at midpt 2-12, 3-11

**REACTIONS** (size) 8=3-08, (min. 1-08), 12=3-08, (min. 3-04)
Max Horiz 12=-259 (LC 4)
Max Uplift 8=-76 (LC 25), 12=-157 (LC 9)
Max Grav 8=385 (LC 20), 12=2068 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-25/370, 2-3=-40/395, 3-4=-79/342, 5-6=-276/115, 6-8=-339/102
BOT CHORD 13-16=-303/75, 16-17=-303/75, 12-17=-303/75, 11-12=-916/268
WEBS 2-13=-56/514, 2-12=-1792/163, 2-11=-32/1107, 3-11=-611/15, 4-11=-394/188, 4-9=0/258, 1-13=-263/118

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 157 lb uplift at joint 12 and 76 lb uplift at joint 8.
8) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
9) Use USP HD26 (With 4-16d nails into Girder & 2-10d x 1-1/2 nails into Truss) or equivalent spaced at 2-0-0 oc max. starting at 2-2-12 from the left end to 6-2-12 to connect truss(es) to front face of bottom chord.
10) Fill all nail holes where hanger is in contact with lumber.
11) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-3=-60, 3-6=-60, 6-7=-60, 8-14=-20
Concentrated Loads (lb)
Vert: 15=-209 (F), 16=-209 (F), 17=-209 (F)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | A2 | Common | 2 | 1 | Job Reference (optional) |

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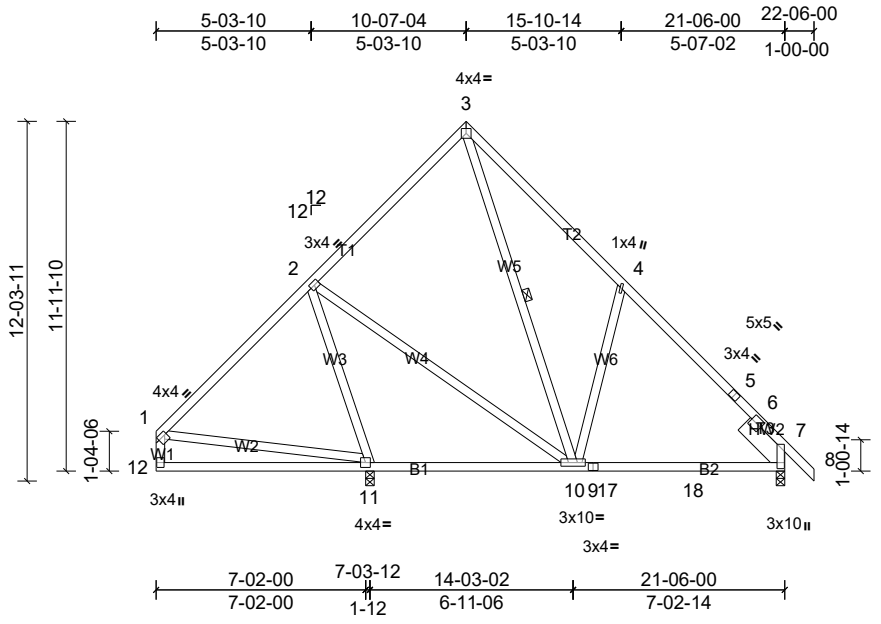


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.40 | Vert(LL) | -0.07 | 10-15 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.35 | Vert(TL) | -0.15 | 10-15 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.87 | Horiz(TL) | -0.04 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 115 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Right 2x8 SPF No.2 -- 1-11-00

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 1 Row at midpt 3-10

**REACTIONS** (size) 7=3-08, (min. 1-08), 11=3-08, (min. 2-00)
Max Horiz 11=-254 (LC 8)
Max Uplift 7=-13 (LC 10), 11=-24 (LC 11)
Max Grav 7=545 (LC 22), 11=1279 (LC 1)

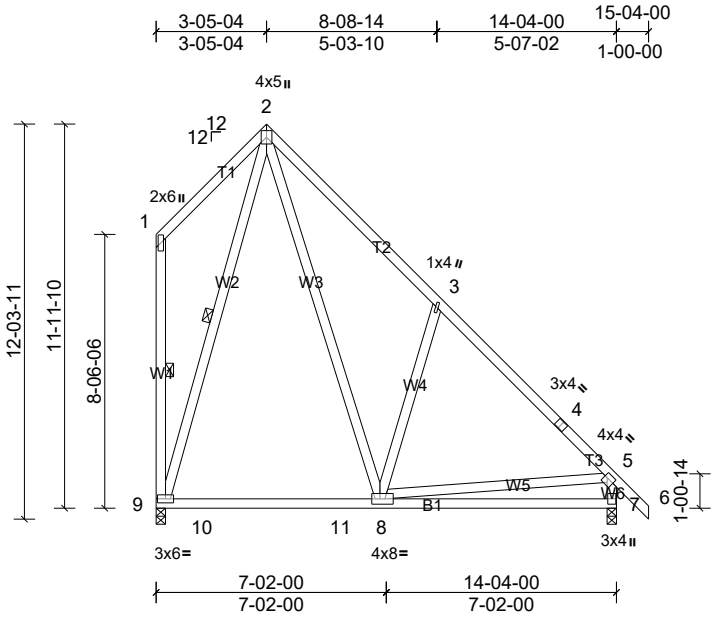
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-143/342, 2-3=-340/167, 3-4=-398/208, 4-5=-355/83, 5-6=-432/45, 6-7=-332/0
BOT CHORD 10-11=-606/315, 9-10=0/279, 9-17=0/279, 17-18=0/279, 7-18=0/279
WEBS 2-11=-1143/339, 2-10=-102/801, 4-10=-346/257, 1-11=-247/265

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 24 lb uplift at joint 11 and 13 lb uplift at joint 7.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | A3 | Common | 9 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.36 | Vert(LL) | -0.14 | 8-9 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.45 | Vert(TL) | -0.22 | 8-9 | >765 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.46 | Horiz(TL) | 0.00 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 94 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 7-5:2x4 SP No.2 P

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 1-9, 2-9

**REACTIONS** (size) 7=3-08, (min. 1-08), 9=3-08, (min. 1-08)
Max Horiz 9=-338 (LC 6)
Max Uplift 9=-84 (LC 11)
Max Grav 7=633 (LC 1), 9=673 (LC 18)

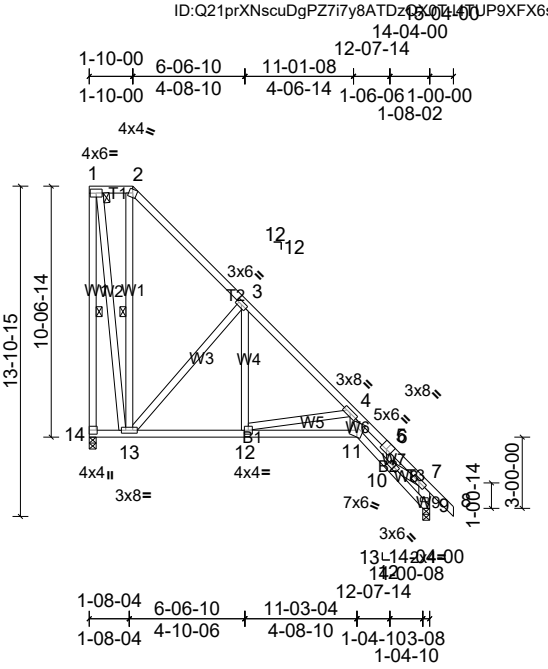
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-248/264, 2-3=-525/254, 3-4=-452/93, 4-5=-624/61, 5-7=-573/122
WEBS 2-8=-176/556, 3-8=-338/248, 2-9=-549/157, 5-8=-53/312

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 84 lb uplift at joint 9.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | A8 | Roof Special | 1 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.61 | Vert(LL) | -0.11 | 11-12 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.80 | Vert(TL) | -0.28 | 11-12 | >595 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.46 | Horiz(TL) | 0.28 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 101 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 9-7:2x6 SPF No.2, 10-7:2x4 SPF 2100F 1.8E

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 3-10-9 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 9-10.
WEBS 1 Row at midpt 1-14, 2-13

**REACTIONS** (size) 9=3-08, (min. 1-08), 14=3-08, (min. 1-08)
Max Horiz 14=-387 (LC 6)
Max Uplift 9=-20 (LC 11), 14=-87 (LC 6)
Max Grav 9=638 (LC 1), 14=557 (LC 1)

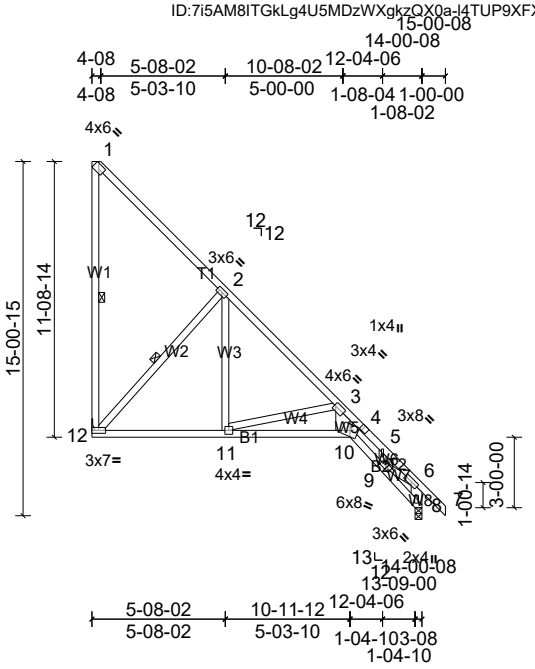
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-14=-529/145, 2-3=-311/146, 3-4=-642/44, 4-5=-2026/0, 5-6=-2030/0, 6-7=-1786/0, 7-9=-651/49
BOT CHORD 13-14=-208/336, 12-13=0/490, 11-12=0/1169, 10-11=0/1757
WEBS 1-13=-107/523, 3-13=-496/138, 4-11=0/1154, 6-10=-417/0, 3-12=0/365, 4-12=-743/51, 7-10=0/1612

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Provide adequate drainage to prevent water ponding.
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Bearing at joint(s) 9 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 87 lb uplift at joint 14 and 20 lb uplift at joint 9.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B1 | Roof Special | 1 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.67 | Vert(LL) | -0.08 | 10-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.38 | Vert(TL) | -0.21 | 10-11 | >780 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.28 | Horiz(TL) | 0.20 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 83 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF 2400F 2.0E
BOT CHORD 2x4 SPF 2400F 2.0E
WEBS 2x4 SPF No.2 *Except* 6-8:2x6 SP 2400F 2.0E, 10-3:2x8 SPF No.2, 9-6:2x4 SPF 2100F 1.8E

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-7-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 8-9.
WEBS 1 Row at midpt 1-12, 2-12

**REACTIONS** (size) 8=3-08, (min. 1-08), 12= Mechanical, (min. 1-08)
Max Horiz 12=-427 (LC 6)
Max Uplift 8=-1 (LC 11), 12=-122 (LC 11)
Max Grav 8=624 (LC 1), 12=598 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-264/141, 2-3=-639/56, 3-4=-2076/0, 4-5=-2129/0, 5-6=-1898/0, 6-8=-660/43
BOT CHORD 11-12=-26/483, 10-11=0/1095, 9-10=0/1845
WEBS 2-12=-538/162, 2-11=0/387, 3-11=-650/57, 3-10=0/1232, 5-9=-399/0, 6-9=0/1693

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 8 SPF 2400F 2.0E crushing capacity of 615 psi.
5) Refer to girder(s) for truss to truss connections.
6) Bearing at joint(s) 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 122 lb uplift at joint 12 and 1 lb uplift at joint 8.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B10 | Roof Special | 1 | 1 | Job Reference (optional) |

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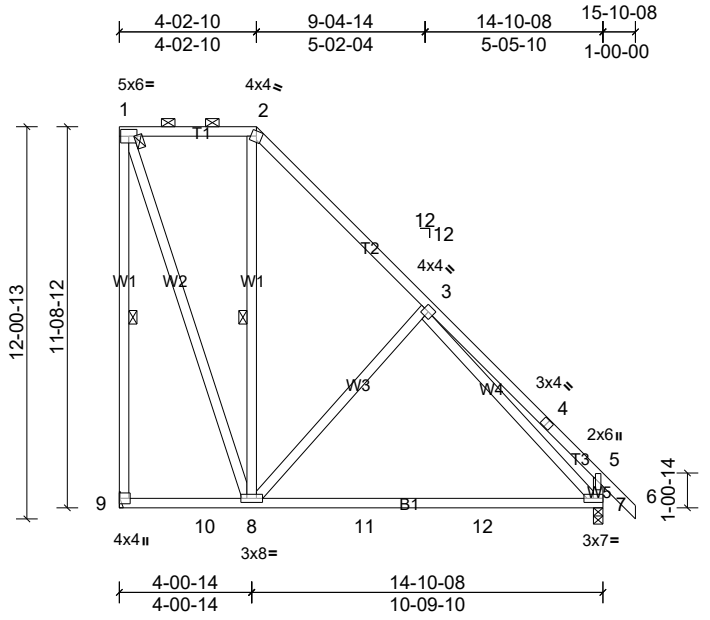


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.84 | Vert(LL) | -0.35 | 7-8 | >502 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.82 | Vert(TL) | -0.83 | 7-8 | >210 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.35 | Horiz(TL) | 0.01 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 98 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 7-5:2x4 SP No.2 P

**BRACING**
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.): 1-2.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 1 Row at midpt 1-9, 2-8

**REACTIONS** (size) 7=3-08, (min. 1-08), 9= Mechanical, (min. 1-08)
Max Horiz 9=-367 (LC 6)
Max Uplift 9=-142 (LC 6)
Max Grav 7=683 (LC 17), 9=654 (LC 18)

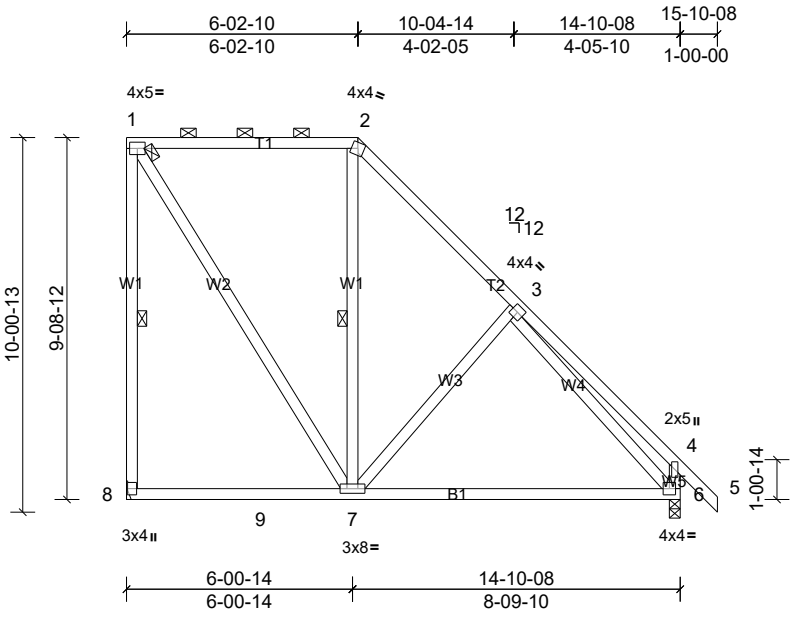
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-9=-636/115, 1-2=-280/175, 2-3=-439/169, 3-4=-366/143, 4-5=-524/112, 5-7=-513/166
BOT CHORD 9-10=-191/292, 8-10=-191/292, 8-11=0/396, 11-12=0/396, 7-12=0/396
WEBS 1-8=-105/625, 3-8=-300/226

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Provide adequate drainage to prevent water ponding.
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
6) Bearings are assumed to be: , Joint 7 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 142 lb uplift at joint 9.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B11 | Roof Special | 1 | 1 | Job Reference (optional) |






Scale = 1:62.2

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.49 | Vert(LL) | -0.14 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.51 | Vert(TL) | -0.34 | 6-7 | >511 | 180 | | |
| BCLL | 0.0* | Rep Stress Incr | YES | WB | 0.28 | Horiz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 88 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 6-4:2x4 SP No.2 P

**BRACING**
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.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 1-8, 2-7

**REACTIONS** (size) 6=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-305 (LC 6)
Max Uplift 6=-7 (LC 11), 8=-116 (LC 6)
Max Grav 6=655 (LC 1), 8=599 (LC 2)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-539/130, 1-2=-299/157, 2-3=-429/156, 3-4=-305/120, 4-6=-329/146
BOT CHORD 6-7=0/355
WEBS 1-7=-95/443, 3-6=-373/58

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Provide adequate drainage to prevent water ponding.
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
6) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 116 lb uplift at joint 8 and 7 lb uplift at joint 6.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B12 | Common | 5 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:38 Page: 1
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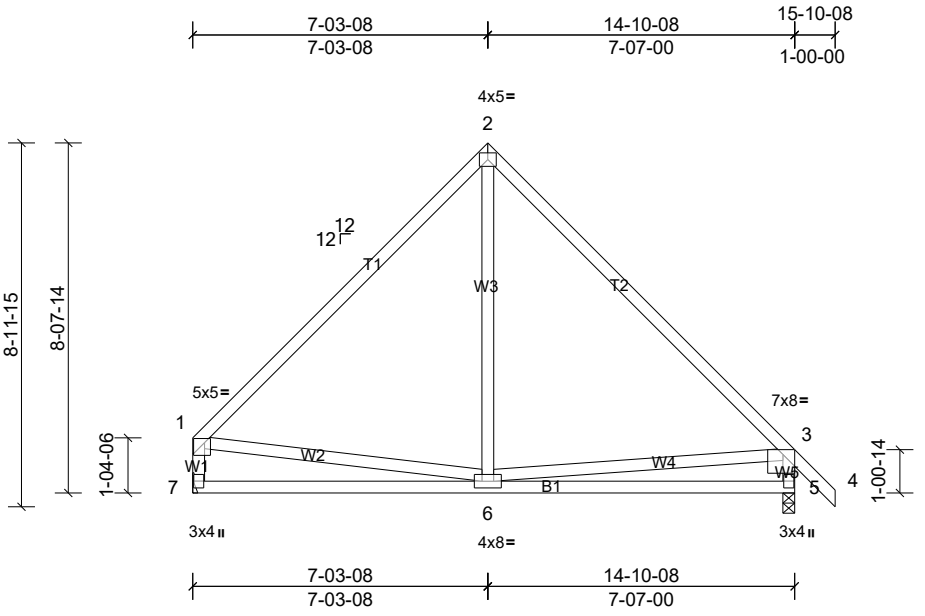


Scale = 1:57.2

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.66 | Vert(LL) | -0.06 | 5-6 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.42 | Vert(TL) | -0.16 | 5-6 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.27 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 70 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-2-3 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 7= Mechanical, (min. 1-08)
Max Horiz 7=-194 (LC 8)
Max Uplift 5=-18 (LC 11), 7=-13 (LC 11)
Max Grav 5=655 (LC 1), 7=581 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-556/94, 2-3=-575/100, 1-7=-518/83, 3-5=-589/126
BOT CHORD 6-7=-199/327, 5-6=-241/434
WEBS 2-6=0/309, 3-6=-273/392

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) The Fabrication Tolerance at joint 3 = 12%
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 13 lb uplift at joint 7 and 18 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B14 | Common | 2 | 1 | Job Reference (optional) |

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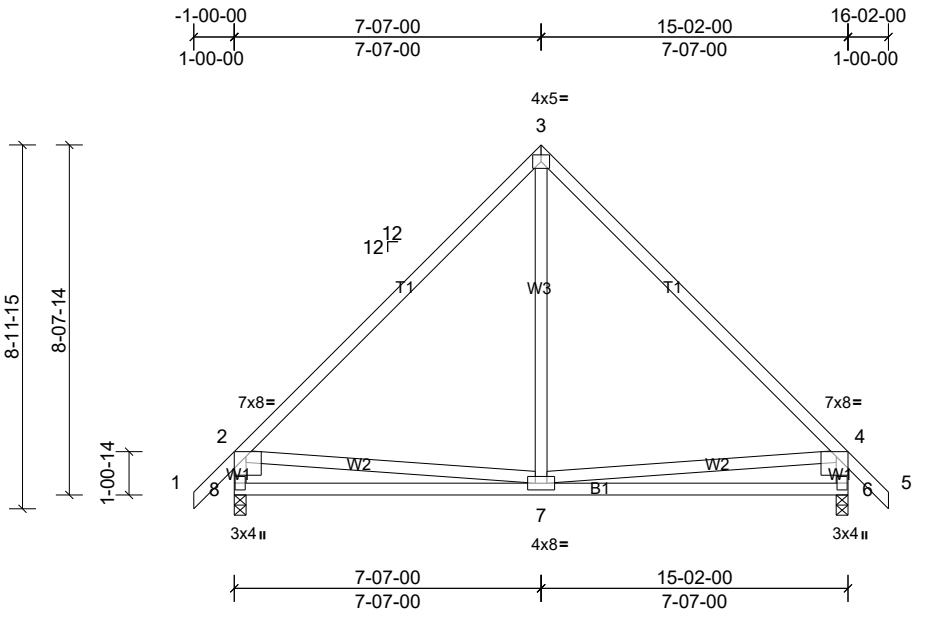



Scale = 1:57.2

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.61 | Vert(LL) | -0.06 | 7-8 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.43 | Vert(TL) | -0.15 | 7-8 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.26 | Horiz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 73 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 6=3-08, (min. 1-08), 8=3-08, (min. 1-08)
Max Horiz 8=199 (LC 9)
Max Uplift 6=-18 (LC 11), 8=-18 (LC 10)
Max Grav 6=664 (LC 1), 8=664 (LC 1)

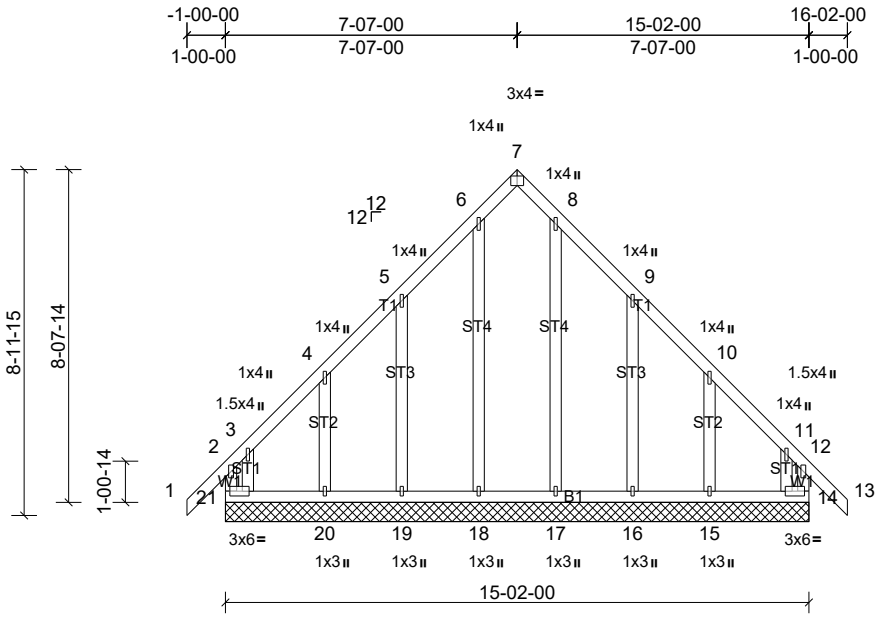
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-587/99, 3-4=-587/99, 2-8=-599/125, 4-6=-599/125
BOT CHORD 7-8=-335/539, 6-7=-243/438
WEBS 3-7=0/329, 2-7=-270/391, 4-7=-269/395

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) The Fabrication Tolerance at joint 2 = 12%, joint 4 = 12%
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 18 lb uplift at joint 8 and 18 lb uplift at joint 6.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B15 | Common Supported Gable | 1 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.12 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.09 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.11 | Horiz(TL) | 0.00 | 14 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 85 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 15-02-00.
(lb) - Max Horiz 21=199 (LC 9)
Max Uplift All uplift 100 (lb) or less at joint(s) 14, 16, 19, 21 except 15=-166 (LC 11), 20=-169 (LC 10)
Max Grav All reactions 250 (lb) or less at joint (s) 14, 15, 16, 17, 18, 19, 20, 21

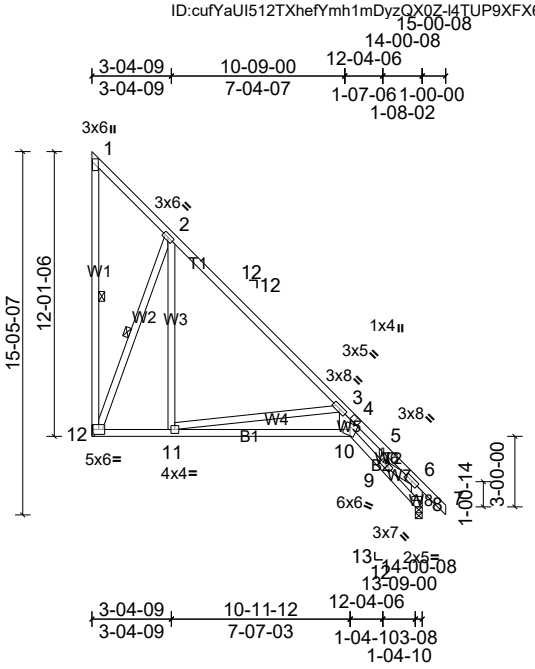
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) All plates are 1x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
7) Gable studs spaced at 2-0-0 oc.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
10) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 21, 14, 19, 16 except (jt=lb) 20=169, 15=166.
12) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B2 | Roof Special | 1 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.69 | Vert(LL) | -0.12 | 10-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.49 | Vert(TL) | -0.37 | 10-11 | >448 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.92 | Horiz(TL) | 0.28 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 89 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF 2400F 2.0E
BOT CHORD 2x4 SPF 2400F 2.0E
WEBS 2x4 SPF No.2 *Except* 10-3:2x6 SP No.2, 8-6:2x6 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-3-14 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 8-9.
WEBS 1 Row at midpt 1-12, 2-12

**REACTIONS** (size) 8=3-08, (min. 1-08), 12= Mechanical, (min. 1-08)
Max Horiz 12=-427 (LC 6)
Max Uplift 8=-1 (LC 11), 12=-122 (LC 11)
Max Grav 8=624 (LC 1), 12=598 (LC 18)

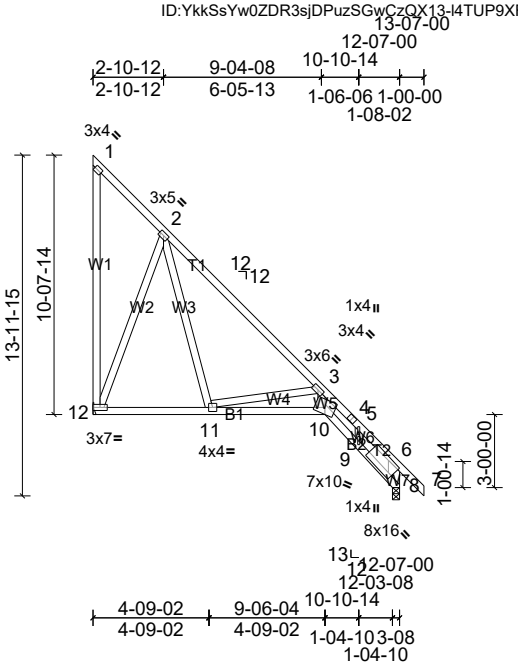
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-519/103, 3-4=-2250/0, 4-5=-2291/0, 5-6=-2052/0, 6-8=-709/75
BOT CHORD 11-12=-81/371, 10-11=0/1250, 9-10=0/2006
WEBS 2-12=-631/203, 2-11=-6/412, 3-11=-970/167, 3-10=0/1362, 5-9=-411/0, 6-9=0/1844

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 8 SPF 2400F 2.0E crushing capacity of 615 psi.
5) Refer to girder(s) for truss to truss connections.
6) Bearing at joint(s) 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 122 lb uplift at joint 12 and 1 lb uplift at joint 8.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B3 | Roof Special | 1 | 1 | Job Reference (optional) |






Scale = 1:95

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.90 | Vert(LL) | -0.23 | 10-11 | >644 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.91 | Vert(TL) | -0.55 | 10-11 | >264 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.56 | Horiz(TL) | 0.58 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 76 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2 *Except* 4-7:2x4 SPF 1650F 1.5E
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 8-6:2x6 SP 2400F 2.0E

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
2-2-0 oc bracing: 8-9.

**REACTIONS** (size) 8=3-08, (min. 1-08), 12= Mechanical, (min. 1-08)
Max Horiz 12=-382 (LC 6)
Max Uplift 8=-8 (LC 11), 12=-103 (LC 11)
Max Grav 8=566 (LC 1), 12=530 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-534/67, 3-4=-1374/0, 4-5=-1417/0, 5-6=-1656/0, 6-8=-1444/0
BOT CHORD 11-12=-88/318, 10-11=0/860, 9-10=0/1182, 8-9=0/1345
WEBS 2-12=-522/183, 3-10=0/681, 5-9=-31/265, 2-11=0/365, 3-11=-594/166

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) The Fabrication Tolerance at joint 6 = 16%
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) Bearings are assumed to be: , Joint 8 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) Bearing at joint(s) 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 103 lb uplift at joint 12 and 8 lb uplift at joint 8.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B4 | Roof Special | 1 | 1 | Job Reference (optional) |

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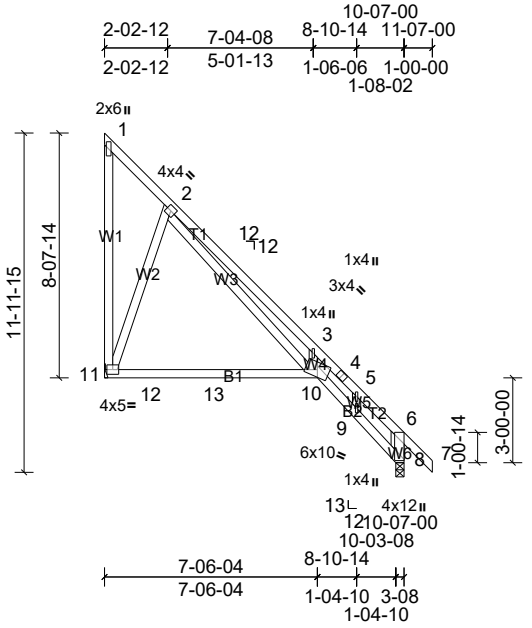


Scale = 1:81.8

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.82 | Vert(LL) | -0.21 | 10-11 | >575 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.68 | Vert(TL) | -0.63 | 10-11 | >195 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.27 | Horiz(TL) | 0.49 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 61 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 8-6:2x6 SPF No.2

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

**REACTIONS** (size) 8=3-08, (min. 1-08), 11= Mechanical, (min. 1-08)
Max Horiz 11=-321 (LC 6)
Max Uplift 8=-18 (LC 11), 11=-78 (LC 11)
Max Grav 8=487 (LC 1), 11=486 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1030/172, 3-4=-1206/0, 4-5=-1254/0, 5-6=-1342/0, 6-8=-1166/0
BOT CHORD 11-12=-89/263, 12-13=-89/263, 10-13=-89/263, 9-10=0/1065, 8-9=0/1078
WEBS 2-11=-382/154, 2-10=-175/897, 3-10=-104/348

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
4) Bearings are assumed to be: , Joint 8 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Bearing at joint(s) 8 considers parallel to grain value using ANSI/TPI 1 angle to grain formula. Building designer should verify capacity of bearing surface.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 78 lb uplift at joint 11 and 18 lb uplift at joint 8.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B5 | Roof Special | 1 | 1 | Job Reference (optional) |

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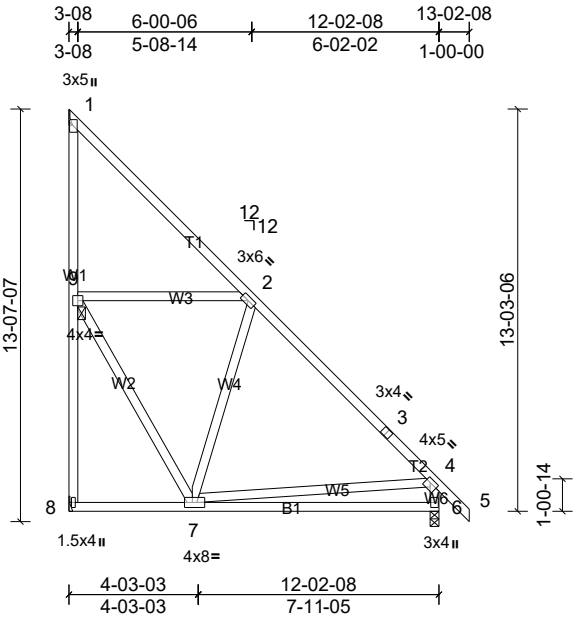


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.39 | Vert(LL) | -0.10 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.41 | Vert(TL) | -0.25 | 6-7 | >565 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.21 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 83 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 6-4:2x4 SP No.2 P

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

**REACTIONS** (size) 1= Mechanical, (min. 1-08), 6=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 1=-205 (LC 17), 8=-228 (LC 6)
Max Uplift 1=-32 (LC 11), 6=-55 (LC 11), 8=-35 (LC 6)
Max Grav 1=418 (LC 1), 6=440 (LC 1), 8=190 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-78/295, 3-4=-308/76, 4-6=-365/148
BOT CHORD 6-7=-70/250
WEBS 2-9=-347/225, 7-9=-96/441

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
5) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 35 lb uplift at joint 8, 32 lb uplift at joint 1 and 55 lb uplift at joint 6.
8) Non Standard bearing condition. Review required.
9) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
10) Gap between inside of top chord bearing and first diagonal or vertical web shall not exceed 0.500in.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | B6 | Roof Special | 1 | 1 | Job Reference (optional) |

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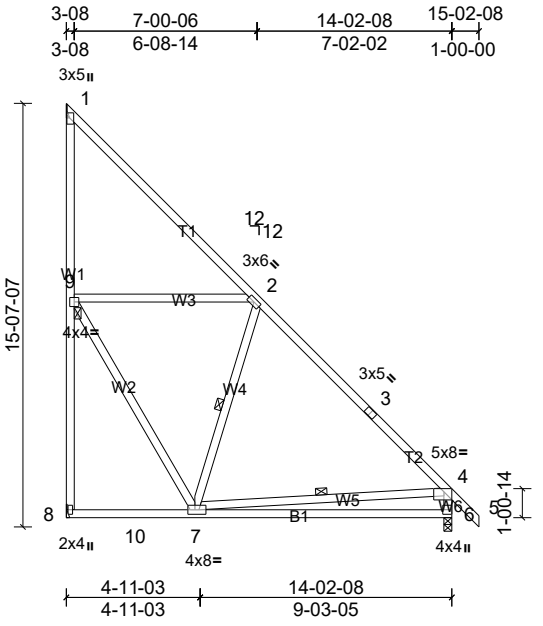


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.55 | Vert(LL) | -0.19 | 6-7 | >899 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.58 | Vert(TL) | -0.47 | 6-7 | >359 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.32 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 96 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 6-4:2x4 SP No.2 P

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 1 Row at midpt 1-8, 2-7, 4-7

**REACTIONS** (size) 1= Mechanical, (min. 1-08), 6=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 1=-237 (LC 17), 8=-261 (LC 6)
Max Uplift 1=-33 (LC 11), 6=-66 (LC 11), 8=-40 (LC 6)
Max Grav 1=480 (LC 1), 6=509 (LC 1), 8=282 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-92/341, 3-4=-374/105, 4-6=-422/163
BOT CHORD 6-7=-105/341
WEBS 2-7=-259/203, 2-9=-400/253, 7-9=-110/530

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
4) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
5) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 40 lb uplift at joint 8, 33 lb uplift at joint 1 and 66 lb uplift at joint 6.
8) Non Standard bearing condition. Review required.
9) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
10) Gap between inside of top chord bearing and first diagonal or vertical web shall not exceed 0.500in.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | B7 | Roof Special | 1 | 1 | Job Reference (optional) |

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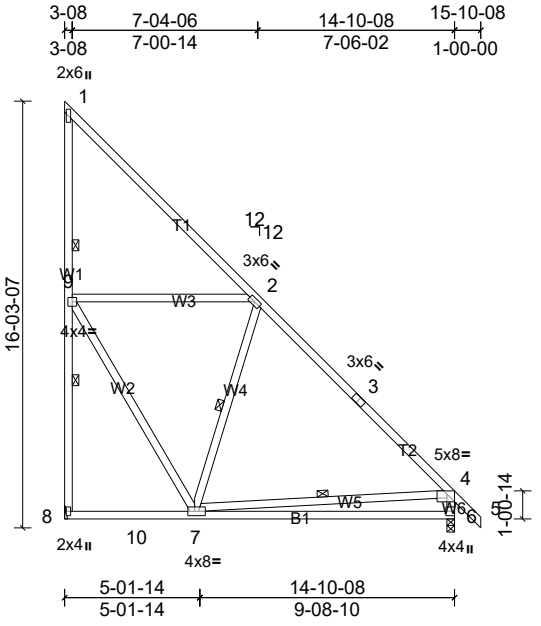



Scale = 1:88.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.60 | Vert(LL) | -0.22 | 6-7 | >782 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.64 | Vert(TL) | -0.56 | 6-7 | >311 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.37 | Horiz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 100 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 6-4:2x4 SP No.2 P

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.
WEBS 1 Row at midpt 2-7, 4-7
WEBS 2 Rows at 1/3 pts 1-8

**REACTIONS** (size) 6=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-491 (LC 6)
Max Uplift 8=-208 (LC 6)
Max Grav 6=706 (LC 17), 8=758 (LC 18)

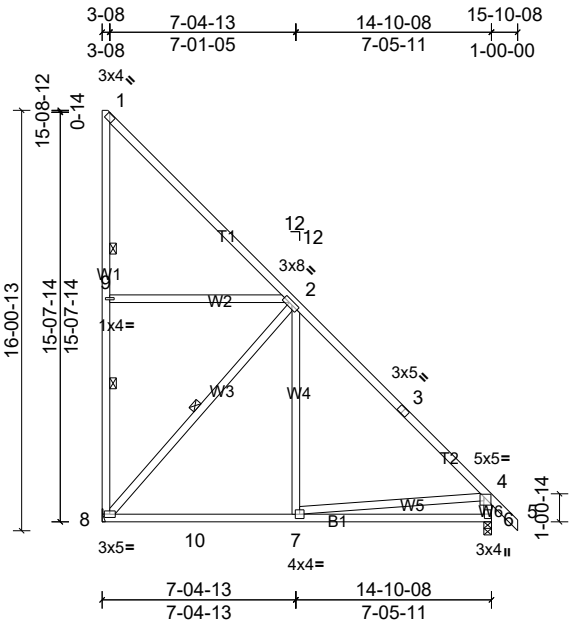
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 8-9=-681/213, 2-3=-457/106, 3-4=-692/71, 4-6=-617/126
BOT CHORD 8-10=-285/446, 7-10=-285/446, 6-7=-113/377
WEBS 2-7=-270/207, 4-7=-253/332, 2-9=-416/264, 7-9=-130/555

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
4) Lumber designated with a "P" is pressure-treated with preservatives. Plate lateral resistance values have been reduced 20% where used in this lumber. Plates should be protected from corrosion per the recommendation of the treatment company. Borate or other suitable treatment may be used if it does not corrode the plates. If ACQ, CBA, or CA-B treated lumber is used, improved corrosion protection is required, and G185 galvanized plates may be used with this design. Incising factors have not been considered for this design. Building designer to verify suitability of this product for its intended use.
5) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 208 lb uplift at joint 8.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B8 | Roof Special | 1 | 1 | Job Reference (optional) |






Scale = 1:88.4

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.61 | Vert(LL) | -0.11 | 7-8 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.44 | Vert(TL) | -0.21 | 7-8 | >837 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.34 | Horiz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 98 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 2-8
WEBS 2 Rows at 1/3 pts 1-8

**REACTIONS** (size) 6=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-491 (LC 6)
Max Uplift 8=-208 (LC 6)
Max Grav 6=741 (LC 17), 8=760 (LC 18)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-532/85, 3-4=-765/50, 4-6=-689/111
BOT CHORD 8-10=-44/494, 7-10=-44/494, 6-7=-143/324
WEBS 2-8=-623/184, 2-7=0/330, 4-7=-175/368

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
4) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 208 lb uplift at joint 8.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | B9 | Roof Special | 1 | 1 | Job Reference (optional) |

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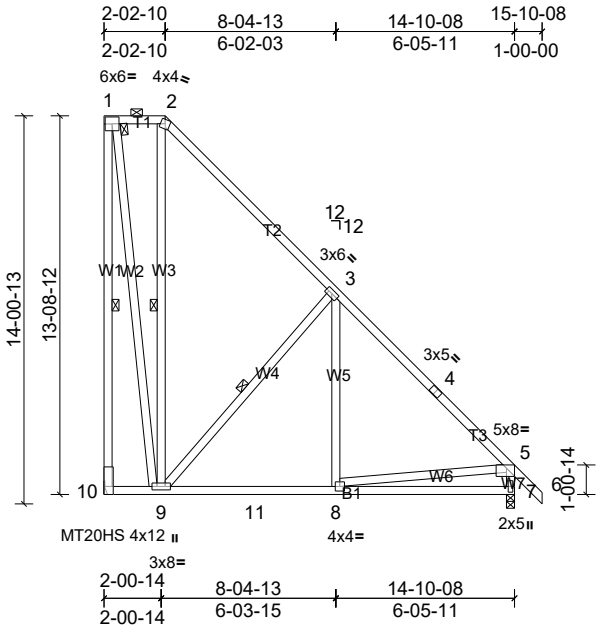



Scale = 1:83.8

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.70 | Vert(LL) | -0.04 | 8-9 | >999 | 240 | MT20HS | 148/108 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.39 | Vert(TL) | -0.10 | 8-9 | >999 | 180 | MT20 | 197/144 |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.52 | Horiz(TL) | 0.01 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 113 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2 *Except* 10-1:2x4 SPF 2100F 1.8E

**BRACING**
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.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 1-10, 2-9, 3-9

**REACTIONS** (size) 7=3-08, (min. 1-08), 10= Mechanical, (min. 1-08)
Max Horiz 10=-429 (LC 6)
Max Uplift 10=-173 (LC 6)
Max Grav 7=693 (LC 17), 10=657 (LC 18)

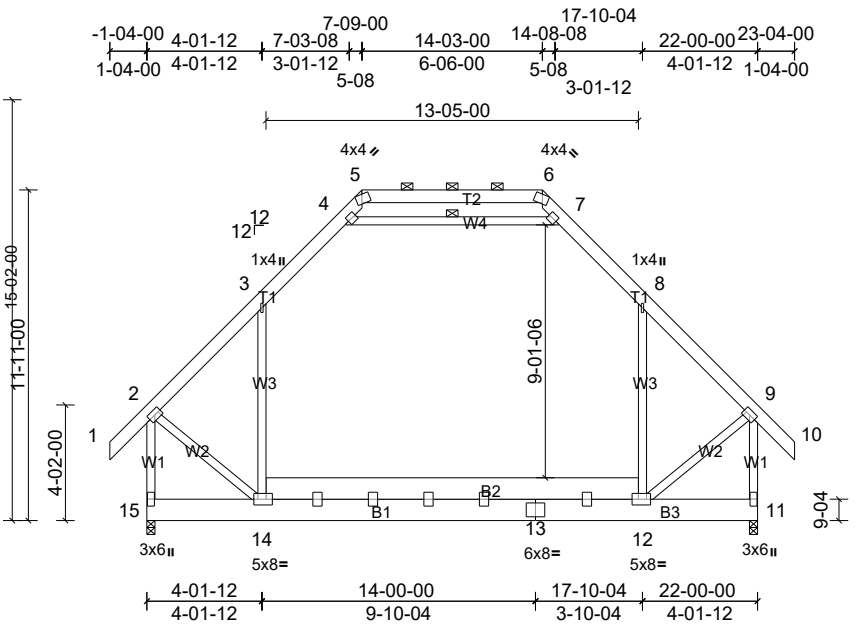
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-10=-636/208, 2-3=-381/195, 3-4=-500/83, 4-5=-702/53, 5-7=-641/107
BOT CHORD 9-10=-220/341, 9-11=-4/458, 8-11=-4/458
WEBS 1-9=-160/672, 3-9=-475/216, 3-8=0/263, 5-8=-75/328

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Provide adequate drainage to prevent water ponding.
3) All plates are MT20 plates unless otherwise indicated.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
6) Bearings are assumed to be: , Joint 7 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 173 lb uplift at joint 10.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | C1 | Attic | 6 | 1 | Job Reference (optional) |






Scale = 1:83.4

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.53 | Vert(LL) | -0.15 | 12-14 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.38 | Vert(TL) | -0.21 | 12-14 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.21 | Horiz(TL) | 0.00 | 11 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | Attic | -0.09 | 12-14 | >999 | 360 | Weight: 209 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x6 SPF No.2
BOT CHORD 2x10 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
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.): 5-6.
BOT CHORD Rigid ceiling directly applied or 9-9-4 oc bracing.
WEBS 1 Row at midpt 4-7
This truss requires both edges of the bottom chord be sheathed in the room area.

**REACTIONS** (size) 11=3-08, (min. 2-01), 15=3-08, (min. 2-01)
Max Horiz 15=292 (LC 9)
Max Grav 11=1314 (LC 2), 15=1314 (LC 2)

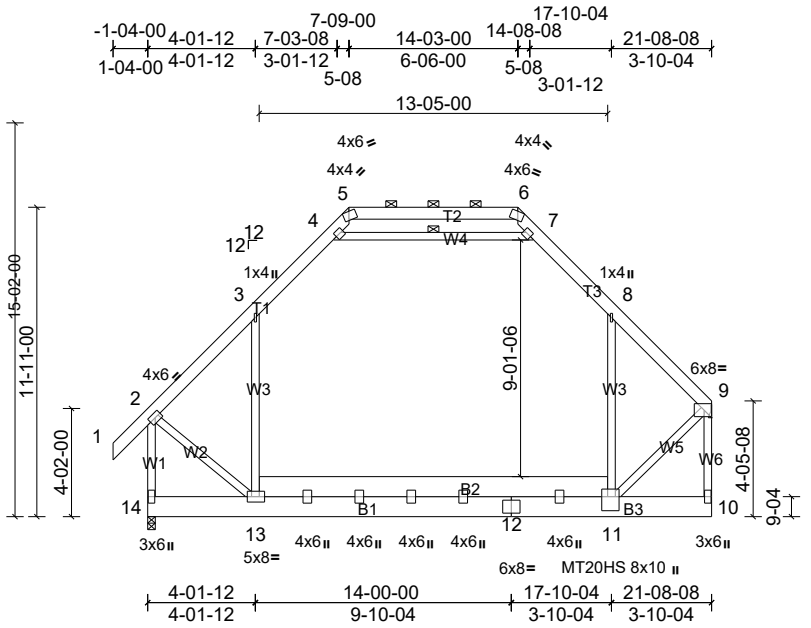
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-945/106, 3-4=-685/172, 4-5=-338/262, 5-6=-258/470, 6-7=-338/262, 7-8=-685/172, 8-9=-944/106, 2-15=-1346/51, 9-11=-1345/51
BOT CHORD 14-15=-274/262, 13-14=-57/618, 12-13=-57/618
WEBS 3-14=-226/354, 8-12=-226/354, 4-7=-951/251, 2-14=-53/797, 9-12=-53/797

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) All plates are 4x6 MT20 unless otherwise indicated.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
7) Ceiling dead load (5.0 psf) on member(s). 3-4, 7-8, 4-7
8) Bottom chord live load (40.0 psf) and additional bottom chord dead load (0.0 psf) applied only to room. 12-14
9) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
10) This truss is designed in accordance with the 2012 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) Attic room checked for L/360 deflection.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | C2 | Attic | 10 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.58 | Vert(LL) | -0.14 | 11-13 | >999 | 240 | MT20 | 244/190 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.37 | Vert(TL) | -0.20 | 11-13 | >999 | 180 | MT20HS | 148/108 |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.22 | Horiz(TL) | -0.07 | 9 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | Attic | -0.08 | 11-13 | >999 | 360 | Weight: 221 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x6 SP No.2
BOT CHORD 2x10 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
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.): 5-6.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 4-7
This truss requires both edges of the bottom chord be sheathed in the room area.

**REACTIONS** (size) 9= Mechanical, (min. 1-08), 14=3-08, (min. 2-01)
Max Horiz 14=285 (LC 7)
Max Grav 9=1234 (LC 2), 14=1300 (LC 2)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-926/93, 3-4=-677/166, 4-5=-345/247, 5-6=-270/447, 6-7=-346/247, 7-8=-677/167, 8-9=-921/83, 2-14=-1320/34
BOT CHORD 13-14=-267/242, 12-13=-72/594, 11-12=-72/594
WEBS 3-13=-234/340, 8-11=-246/344, 4-7=-918/230, 2-13=-51/781, 9-11=-72/829

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) All plates are MT20 plates unless otherwise indicated.
5) All plates are 4x6 MT20 unless otherwise indicated.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
8) Ceiling dead load (5.0 psf) on member(s). 3-4, 7-8, 4-7
9) Bottom chord live load (40.0 psf) and additional bottom chord dead load (0.0 psf) applied only to room. 11-13
10) Bearings are assumed to be: , Joint 14 SPF No.2 crushing capacity of 425 psi.
11) Refer to girder(s) for truss to truss connections.
12) This truss is designed in accordance with the 2012 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) Gap between inside of top chord bearing and first diagonal or vertical web shall not exceed 0.500in.
15) Attic room checked for L/360 deflection.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | D1 | Common Supported Gable | 1 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:39 Page: 1
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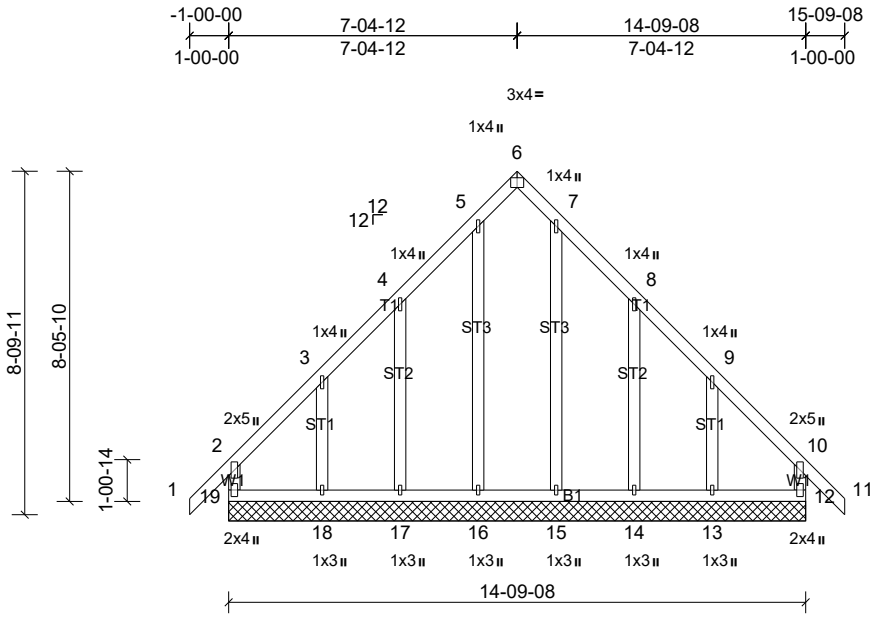



Scale = 1:59.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.13 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.10 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.12 | Horiz(TL) | 0.00 | 12 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 80 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 14-09-08.
(lb) - Max Horiz 19=-195 (LC 8)
Max Uplift All uplift 100 (lb) or less at joint(s) 12, 14, 17, 19 except 13=-157 (LC 11), 18=-160 (LC 10)
Max Grav All reactions 250 (lb) or less at joint (s) 12, 13, 14, 15, 16, 17, 18, 19

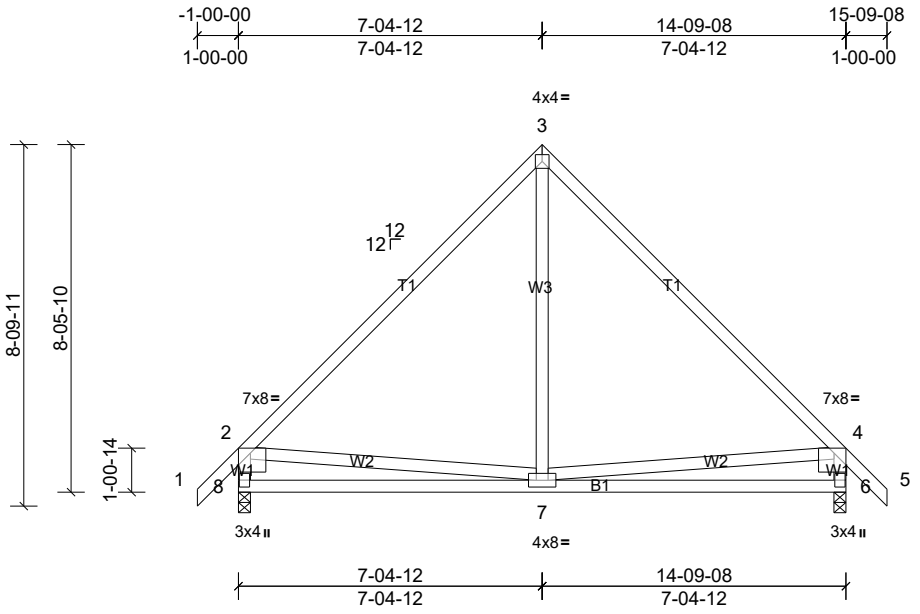
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Gable requires continuous bottom chord bearing.
5) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
9) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 19, 12, 17, 14 except (jt=lb) 18=159, 13=156.
11) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | D2 | Common | 8 | 1 | Job Reference (optional) |






Scale = 1:56.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.58 | Vert(LL) | -0.06 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.41 | Vert(TL) | -0.14 | 6-7 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.23 | Horiz(TL) | 0.01 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 71 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 6=3-08, (min. 1-08), 8=3-08, (min. 1-08)
Max Horiz 8=-195 (LC 8)
Max Uplift 6=-18 (LC 11), 8=-18 (LC 10)
Max Grav 6=649 (LC 1), 8=649 (LC 1)

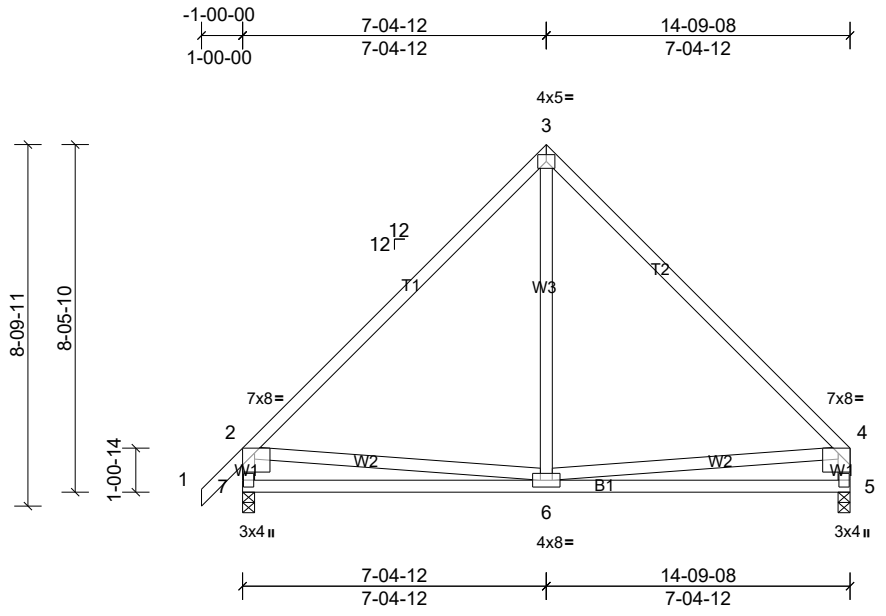
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-570/98, 3-4=-570/98, 2-8=-585/124, 4-6=-585/124
BOT CHORD 7-8=-318/513, 6-7=-229/415
WEBS 3-7=0/319, 2-7=-251/374, 4-7=-251/377

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) The Fabrication Tolerance at joint 2 = 16%, joint 4 = 16%
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 18 lb uplift at joint 8 and 18 lb uplift at joint 6.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | D3 | Common | 1 | 1 | Job Reference (optional) |






Scale = 1:56.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.68 | Vert(LL) | -0.06 | 5-6 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.41 | Vert(TL) | -0.14 | 5-6 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.22 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 69 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 5=3-08, (min. 1-08), 7=3-08, (min. 1-08)
Max Horiz 7=188 (LC 7)
Max Uplift 5=-11 (LC 10), 7=-18 (LC 10)
Max Grav 5=577 (LC 1), 7=651 (LC 1)

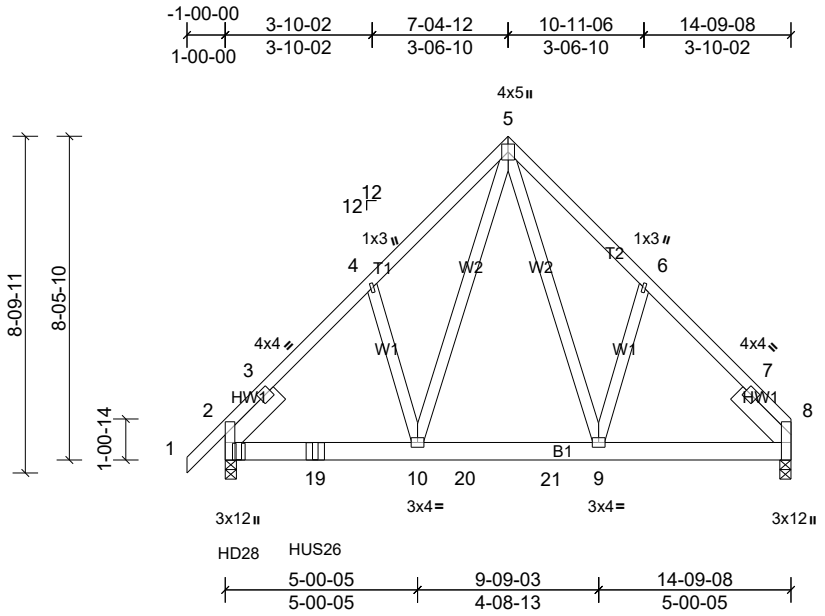
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-574/99, 3-4=-564/90, 2-7=-588/125, 4-5=-514/84
BOT CHORD 6-7=-330/497, 5-6=-144/261
WEBS 3-6=0/315, 2-6=-240/370, 4-6=-126/258

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) The Fabrication Tolerance at joint 2 = 16%, joint 4 = 16%
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 18 lb uplift at joint 7 and 11 lb uplift at joint 5.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | D4 | Common Girder | 1 | **2** | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.23 | Vert(LL) | -0.03 | 10-17 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.71 | Vert(TL) | -0.08 | 10-17 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.14 | Horiz(TL) | 0.02 | 2 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 179 lb | FT = 20% |

**LUMBER**

| | |
|---|---|
| TOP CHORD | 2x4 SPF No.2 |
| BOT CHORD | 2x6 SPF No.2 |
| WEBS | 2x4 SPF No.2 |
| SLIDER | Left 2x6 SP No.2 -- 1-11-00, Right 2x6 SP No.2 -- 1-11-00 |

**BRACING**

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

**REACTIONS** (size) 2=3-08, (min. 2-00), 8=3-08, (min. 1-08)
Max Horiz 2=163 (LC 7)
Max Uplift 8=-11 (LC 8)
Max Grav 2=2565 (LC 1), 8=815 (LC 1)

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

| | |
|---|---|
| TOP CHORD | 2-3=-1637/0, 3-4=-1257/65, 4-5=-1267/145, 5-6=-805/146, 6-7=-844/62, 7-8=-438/0 |
| BOT CHORD | 2-19=-83/936, 10-19=-53/936, 10-20=0/530, 20-21=0/530, 9-21=0/530, 8-9=0/556 |
| WEBS | 5-10=-126/1176, 4-10=-278/159 |

**NOTES**

1) Special connection required to distribute top chord loads equally between all plies.
2) Special connection required to distribute bottom chord loads equally between all plies.
3) Special connection required to distribute web loads equally between all plies.
4) 2-ply truss to be connected together with WS6 as follows:
   Top chords connected as follows: 2x4 - 1 row at 1-00 oc.
   Bottom chords connected as follows: 2x6 - 2 rows staggered at 1-00 oc.
   Web connected as follows: 2x4 - 1 row at 1-00 oc.
5) 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.
6) Unbalanced roof live loads have been considered for this design.
7) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
10) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 11 lb uplift at joint 8.
12) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
13) Use USP HD28 (With 8-16d nails into Girder & 6-10d x 1-1/2 nails into Truss) or equivalent at 0-4-4 from the left end to connect truss(es) to back face of bottom chord.
14) Use USP HUS26 (With 14-16d nails into Girder & 6-16d nails into Truss) or equivalent at 2-4-4 from the left end to connect truss(es) to back face of bottom chord.
15) Fill all nail holes where hanger is in contact with lumber.

**LOAD CASE(S)** Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
   Uniform Loads (lb/ft)
   Vert: 1-5=-60, 5-8=-60, 11-15=-20
   Concentrated Loads (lb)
   Vert: 17=-891 (B), 19=-1245 (B)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | E1 | Hip Girder | 1 | 1 | Job Reference (optional) |

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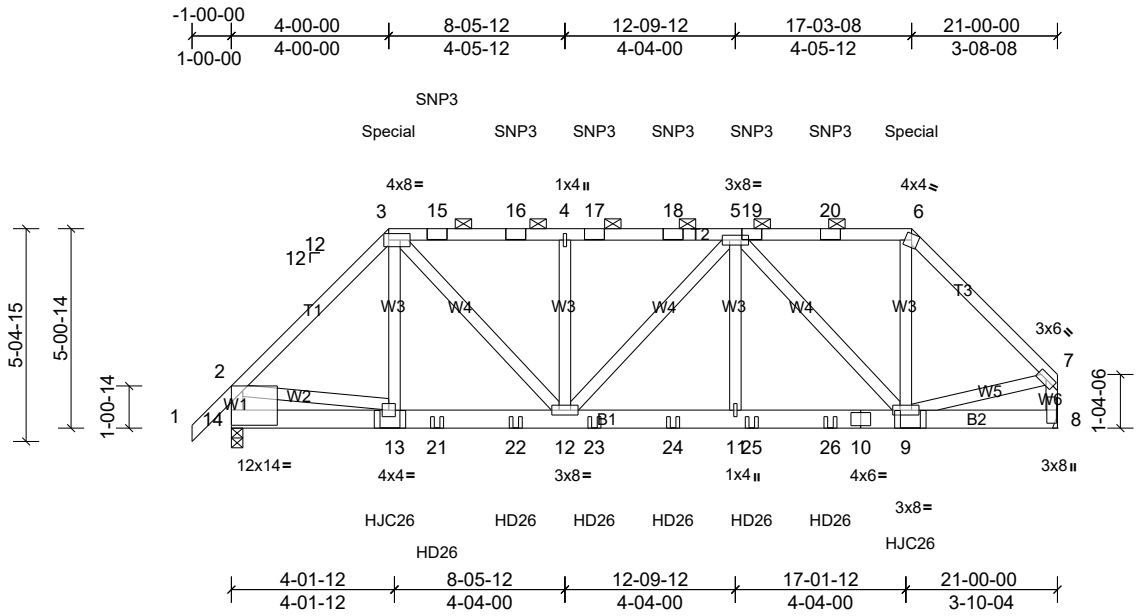


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.31 | Vert(LL) | 0.05 | 11-12 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.29 | Vert(TL) | -0.08 | 11-12 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.51 | Horiz(TL) | 0.02 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 117 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-0-6 oc purlins, except end verticals, and 2-0-0 oc purlins (4-10-4 max.): 3-6.
BOT CHORD Rigid ceiling directly applied or 8-11-13 oc bracing.

**REACTIONS** (size) 8= Mechanical, (min. 1-08), 14=3-08, (min. 2-00)
Max Horiz 14=121 (LC 7)
Max Uplift 8=-501 (LC 9), 14=-532 (LC 8)
Max Grav 8=1201 (LC 16), 14=1284 (LC 15)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1353/637, 3-15=-1361/685, 15-16=-1361/685, 4-16=-1361/685, 4-17=-1361/685, 17-18=-1361/685, 5-18=-1361/685, 5-19=-861/449, 19-20=-861/449, 6-20=-861/449, 6-7=-1252/582, 2-14=-1240/548, 7-8=-1160/513
BOT CHORD 13-21=-492/942, 21-22=-492/942, 12-22=-492/942, 12-23=-683/1380, 23-24=-683/1380, 11-24=-683/1380, 11-25=-683/1380, 25-26=-683/1380, 10-26=-683/1380, 9-10=-683/1380
WEBS 3-12=-356/705, 4-12=-374/274, 5-9=-756/389, 6-9=-157/493, 2-13=-463/893, 7-9=-432/861

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: Joint 14 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 532 lb uplift at joint 14 and 501 lb uplift at joint 8.
9) This truss is designed in accordance with the 2012 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) Use USP HJC26 (With 16-16d nails into Girder & 10d nails into Truss) or equivalent spaced at 13-2-12 oc max. starting at 4-0-6 from the left end to 17-3-2 to connect truss(es) to front face of bottom chord.
12) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent spaced at 2-0-0 oc max. starting at 5-2-12 from the left end to 15-2-12 to connect truss(es) to front face of top chord.
13) Use USP HD26 (With 4-16d nails into Girder & 2-10d x 1-1/2 nails into Truss) or equivalent spaced at 2-0-0 oc max. starting at 5-2-12 from the left end to 15-2-12 to connect truss(es) to front face of bottom chord.
14) Fill all nail holes where hanger is in contact with lumber.
15) A minimum of (6) 8d x 1-1/2" nails are required into each member for SNP3 installation. All nailing is required in face of supported chords. For sloped applications, flanges may protrude above or below truss chords. Bending of extended flanges is permitted.
16) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 217 lb down and 192 lb up at 4-0-0, and 217 lb down and 192 lb up at 17-3-8 on top chord. The design/selection of such connection device(s) is the responsibility of others.
17) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-2=-60, 2-3=-60, 3-6=-60, 6-7=-60, 8-14=-20
Concentrated Loads (lb)
Vert: 3=-94 (F), 6=-94 (F), 13=-52 (F), 9=-52 (F), 15=-38 (F), 16=-38 (F), 17=-38 (F), 18=-38 (F), 19=-38 (F), 20=-38 (F), 21=-23 (F), 22=-23 (F), 23=-23 (F), 24=-23 (F), 25=-23 (F), 26=-23 (F)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | E2 | Hip | 1 | 1 | Job Reference (optional) |

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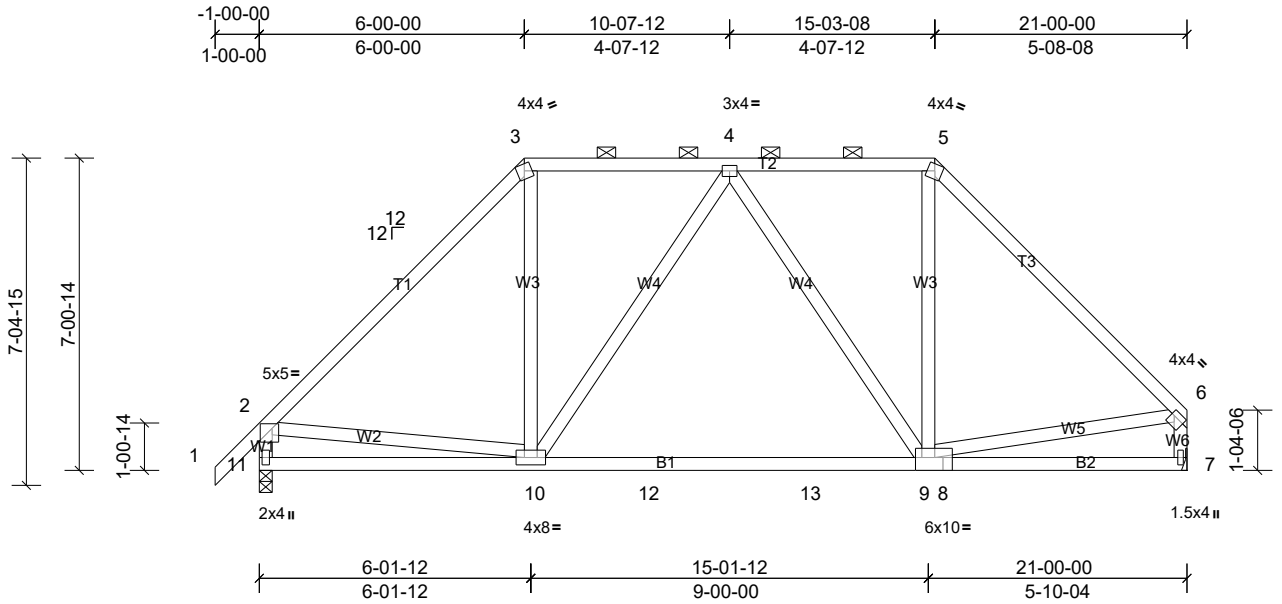


Scale = 1:52.4

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.40 | Vert(LL) | -0.21 | 9-10 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.62 | Vert(TL) | -0.40 | 9-10 | >628 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.27 | Horiz(TL) | 0.01 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 103 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-5-0 oc purlins, except end verticals, and 2-0-0 oc purlins (6-0-0 max.): 3-5.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 7= Mechanical, (min. 1-08), 11=3-08, (min. 1-08)
Max Horiz 11=164 (LC 7)
Max Uplift 11=-9 (LC 10)
Max Grav 7=826 (LC 1), 11=899 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-900/119, 3-4=-545/145, 4-5=-533/145, 5-6=-866/115, 2-11=-852/138, 6-7=-783/96
BOT CHORD 10-11=-233/312, 10-12=-72/634, 12-13=-72/634, 9-13=-72/634
WEBS 3-10=0/326, 5-9=0/312, 2-10=-64/479, 6-9=-35/483

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
6) Bearings are assumed to be: Joint 11 SPF No.2 crushing capacity of 425 psi.
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 11.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E3 | Hip | 1 | 1 | Job Reference (optional) |

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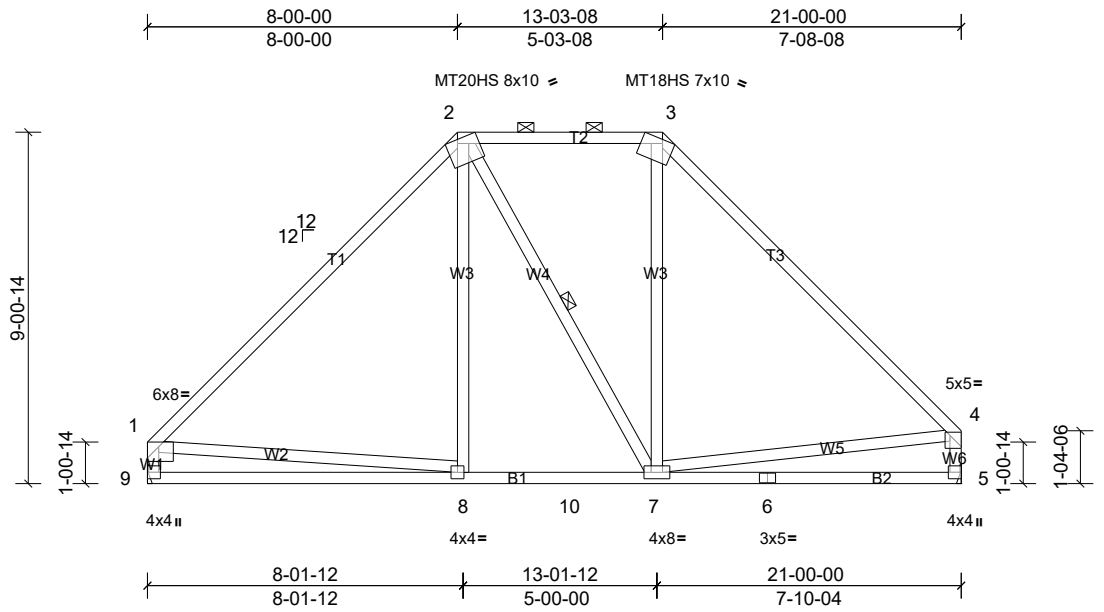


Scale = 1:59.7

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.85 | Vert(LL) | -0.11 | 8-9 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.44 | Vert(TL) | -0.29 | 8-9 | >861 | 180 | MT20HS | 148/108 |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.12 | Horiz(TL) | 0.01 | 5 | n/a | n/a | MT18HS | 197/144 |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 106 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2 *Except* 1-2:2x4 SPF 2100F 1.8E
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 5= Mechanical, (min. 1-08), 9= Mechanical, (min. 1-08)
Max Horiz 9=189 (LC 7)
Max Grav 5=828 (LC 1), 9=828 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-861/122, 2-3=-481/175, 3-4=-843/125, 1-9=-751/113, 4-5=-752/111
BOT CHORD 8-9=-244/455, 8-10=-51/515, 7-10=-51/515
WEBS 2-8=0/251, 1-8=-106/340, 4-7=-71/363

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) All plates are MT20 plates unless otherwise indicated.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Refer to girder(s) for truss to truss connections.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E4 | Hip | 1 | 1 | Job Reference (optional) |

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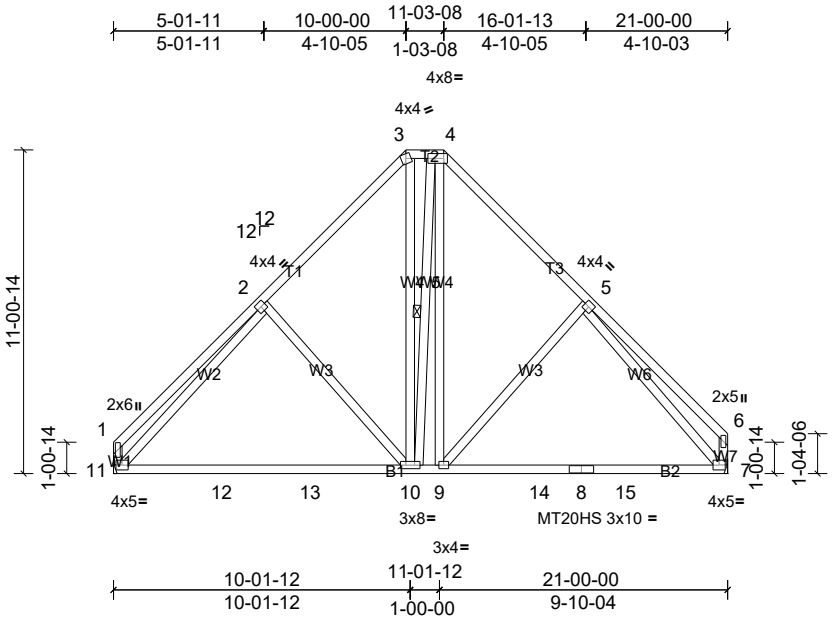


Scale = 1:79.1

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.28 | Vert(LL) | -0.22 | 10-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.74 | Vert(TL) | -0.56 | 10-11 | >444 | 180 | MT20HS | 148/108 |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.60 | Horiz(TL) | 0.02 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 129 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
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 Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 4-10

**REACTIONS** (size) 7= Mechanical, (min. 1-08), 11= Mechanical, (min. 1-08)
Max Horiz 11=229 (LC 7)
Max Uplift 7=-7 (LC 10), 11=-4 (LC 11)
Max Grav 7=828 (LC 1), 11=828 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-440/103, 2-3=-711/187, 3-4=-469/185, 4-5=-706/187, 5-6=-336/102, 1-11=-381/93, 6-7=-302/89
BOT CHORD 11-12=-83/650, 12-13=-83/650, 10-13=-83/650, 9-10=0/481, 9-14=0/528, 8-14=0/528, 8-15=0/528, 7-15=0/528
WEBS 2-10=-252/210, 3-10=-83/330, 4-9=-80/282, 2-11=-571/52, 5-7=-643/44

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) All plates are MT20 plates unless otherwise indicated.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 4 lb uplift at joint 11 and 7 lb uplift at joint 7.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E5 | Common | 4 | 1 | Job Reference (optional) |

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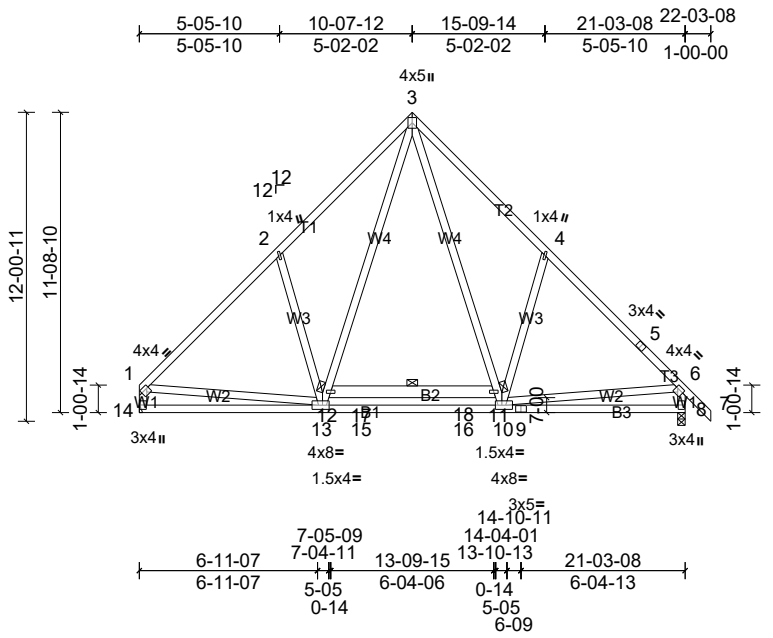


Scale = 1:90.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.31 | Vert(LL) | -0.13 | 10-13 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.43 | Vert(TL) | -0.21 | 10-13 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.23 | Horiz(TL) | 0.01 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 130 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except* 12-11:2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-1 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. Except:
6-0-0 oc bracing: 11-12

**REACTIONS** (size) 8=3-08, (min. 1-09), 14= Mechanical, (min. 1-08)
Max Horiz 14=-253 (LC 8)
Max Grav 8=989 (LC 21), 14=937 (LC 21)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-1076/64, 2-3=-1002/222, 3-4=-995/219, 4-5=-982/66, 5-6=-1077/35, 1-14=-883/58, 6-8=-936/97
BOT CHORD 13-14=-209/340, 13-15=0/587, 15-16=0/587, 10-16=0/587
WEBS 1-13=0/623, 6-10=0/616, 2-13=-331/252, 12-13=-177/488, 3-12=-135/618, 3-11=-132/608, 10-11=-173/477, 4-10=-320/242

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) Bearings are assumed to be: , Joint 8 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E6 | Common | 1 | 1 | Job Reference (optional) |

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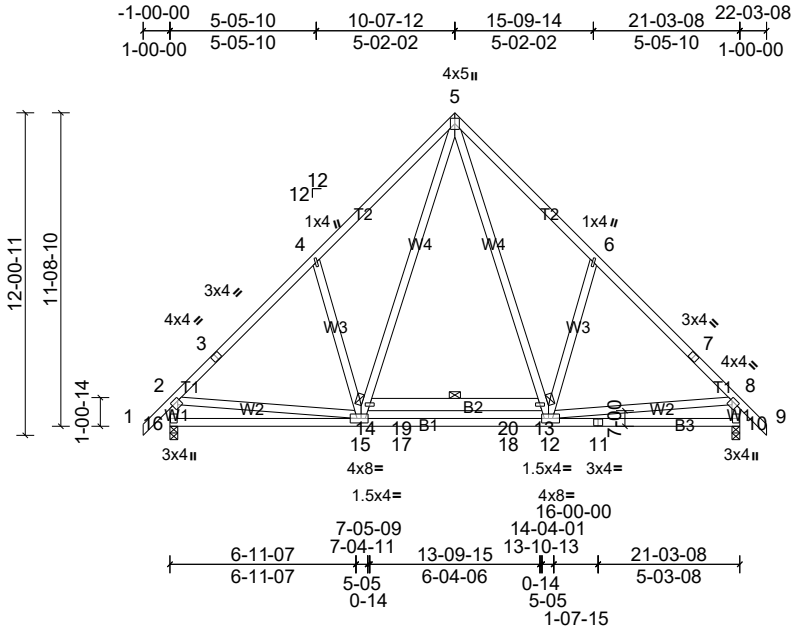


Scale = 1:86.5

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.29 | Vert(LL) | -0.13 | 12-15 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.43 | Vert(TL) | -0.21 | 12-15 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.23 | Horiz(TL) | 0.01 | 10 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 131 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except* 14-13:2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-7-8 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. Except:
6-0-0 oc bracing: 13-14

**REACTIONS** (size) 10=3-08, (min. 1-09), 16=3-08, (min. 1-09)
Max Horiz 16=261 (LC 9)
Max Grav 10=988 (LC 18), 16=988 (LC 17)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1075/34, 3-4=-979/66, 4-5=-994/219, 5-6=-993/219, 6-7=-980/66, 7-8=-1074/34, 2-16=-935/97, 8-10=-934/97
BOT CHORD 15-16=-228/361, 15-17=0/585, 17-18=0/585, 12-18=0/585
WEBS 2-15=0/606, 8-12=0/614, 4-15=-319/243, 14-15=-174/478, 5-14=-132/608, 5-13=-132/608, 12-13=-173/477, 6-12=-319/242

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E7 | Common | 1 | 1 | Job Reference (optional) |

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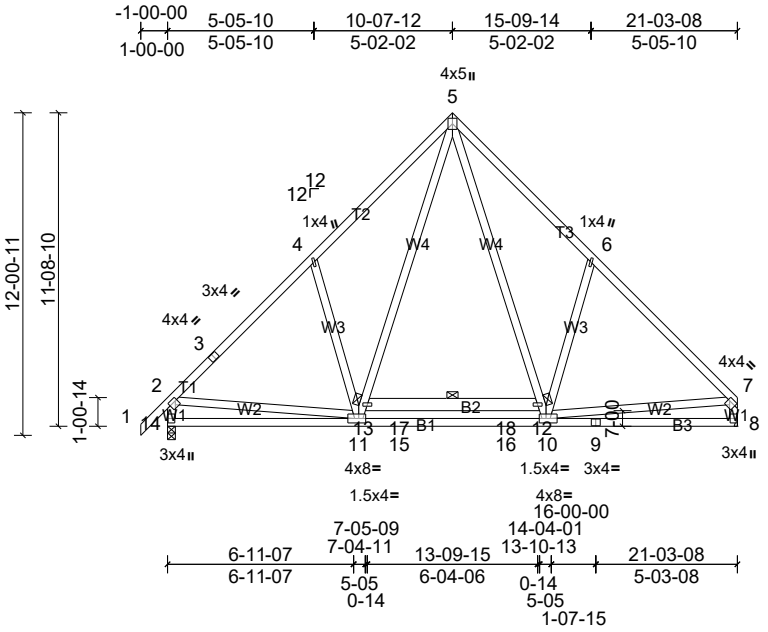


Scale = 1:86.5

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.31 | Vert(LL) | -0.13 | 10-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.43 | Vert(TL) | -0.21 | 10-11 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.23 | Horiz(TL) | 0.01 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 130 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except* 13-12:2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-1 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. Except:
6-0-0 oc bracing: 12-13

**REACTIONS** (size) 8= Mechanical, (min. 1-08), 14=3-08, (min. 1-09)
Max Horiz 14=253 (LC 7)
Max Grav 8=937 (LC 17), 14=989 (LC 17)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1077/35, 3-4=-982/66, 4-5=-996/219, 5-6=-1002/222, 6-7=-1076/64, 2-14=-936/97, 7-8=-883/58
BOT CHORD 11-14=-237/346, 11-15=0/575, 15-16=0/575, 10-16=0/575
WEBS 2-11=0/608, 7-10=0/629, 4-11=-320/243, 11-13=-174/479, 5-13=-133/608, 5-12=-135/618, 10-12=-176/487, 6-10=-331/251

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members, with BCDL = 10.0psf.
5) Bearings are assumed to be: Joint 14 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | E8 | Common Girder | 1 | 1 | Job Reference (optional) |

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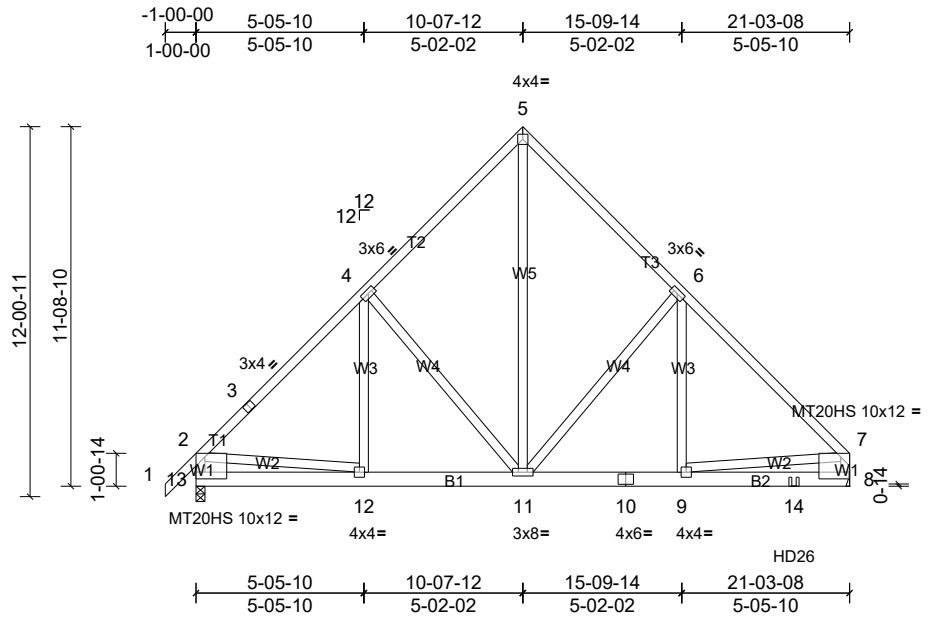


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.36 | Vert(LL) | -0.03 | 8-9 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.52 | Vert(TL) | -0.08 | 8-9 | >999 | 180 | MT20HS | 148/108 |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.49 | Horiz(TL) | 0.01 | 8 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 130 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-3-11 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 8= Mechanical, (min. 1-08), 13=3-08, (min. 1-08)
Max Horiz 13=251 (LC 5)
Max Uplift 8=-52 (LC 8), 13=-24 (LC 8)
Max Grav 8=1265 (LC 1), 13=947 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-964/46, 3-4=-854/78, 4-5=-729/167, 5-6=-731/167, 6-7=-1082/86, 2-13=-892/53, 7-8=-893/51
BOT CHORD 12-13=-249/340, 11-12=-63/667, 10-11=0/694, 9-10=0/694, 9-14=-74/313, 8-14=-74/313
WEBS 5-11=-125/583, 6-11=-447/195, 6-9=0/300, 4-11=-316/180, 2-12=0/447, 7-9=0/389

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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) All plates are MT20 plates unless otherwise indicated.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: Joint 13 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 24 lb uplift at joint 13 and 52 lb uplift at joint 8.
9) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
10) Use USP HD26 (With 4-16d nails into Girder & 2-10d x 1-1/2 nails into Truss) or equivalent at 19-5-12 from the left end to connect truss(es) to back face of bottom chord.
11) Fill all nail holes where hanger is in contact with lumber.
12) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-2=-60, 2-5=-60, 5-7=-60, 8-13=-20
Concentrated Loads (lb)
Vert: 14=-463 (B)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | G1 | Roof Special | 1 | 1 | Job Reference (optional) |

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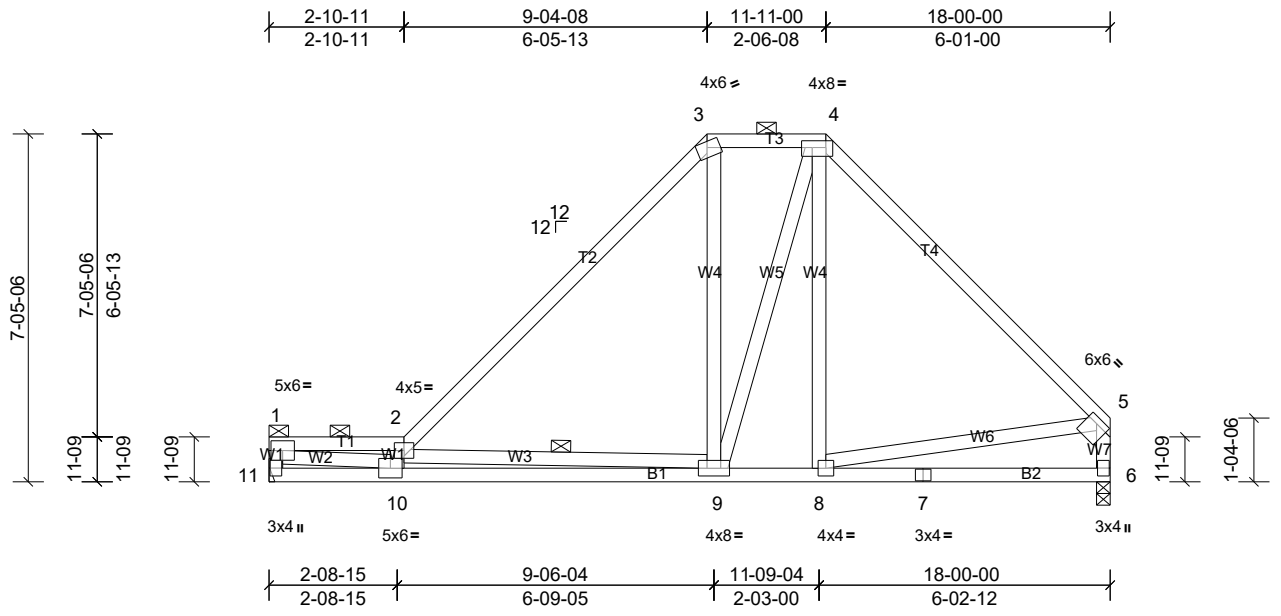


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.66 | Vert(LL) | -0.14 | 9-10 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.85 | Vert(TL) | -0.40 | 9-10 | >531 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.53 | Horiz(TL) | 0.04 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 90 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 4-4-14 oc purlins, except end verticals, and 2-0-0 oc purlins (3-10-5 max.): 1-2, 3-4.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.
WEBS 1 Row at midpt 2-9

**REACTIONS** (size) 6=3-08, (min. 1-08), 11= Mechanical, (min. 1-08)
Max Horiz 11=156 (LC 9)
Max Uplift 11=-20 (LC 10)
Max Grav 6=708 (LC 1), 11=708 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-11=-619/48, 1-2=-2252/226, 2-3=-757/104, 3-4=-469/150, 4-5=-710/105, 5-6=-647/90
BOT CHORD 9-10=-239/2370, 8-9=0/408
WEBS 1-10=-216/2158, 2-10=-553/147, 2-9=-1915/300, 4-9=-71/262, 5-8=-29/293

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 6 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 20 lb uplift at joint 11.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G2 | Roof Special | 1 | 1 | Job Reference (optional) |

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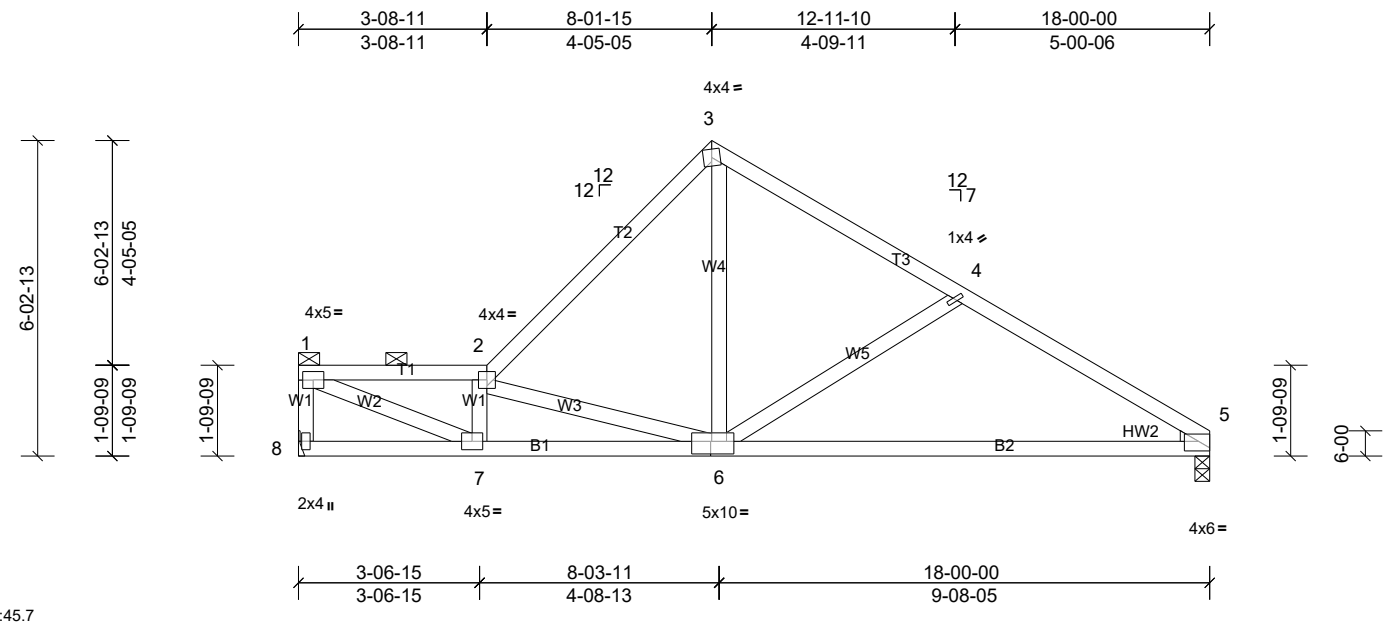


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.32 | Vert(LL) | -0.18 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.65 | Vert(TL) | -0.47 | 6-11 | >457 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.36 | Horiz(TL) | 0.02 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 70 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-9 oc purlins, except end verticals, and 2-0-0 oc purlins (5-0-0 max.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-134 (LC 8)
Max Uplift 5=-30 (LC 11), 8=-20 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-660/80, 1-2=-1307/141, 2-3=-877/99, 3-4=-747/108, 4-5=-1024/135
BOT CHORD 6-7=-110/1358, 5-6=-56/849
WEBS 1-7=-130/1373, 2-7=-528/88, 2-6=-841/166, 3-6=-19/619, 4-6=-343/142

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 20 lb uplift at joint 8 and 30 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G3 | Roof Special | 1 | 1 | Job Reference (optional) |

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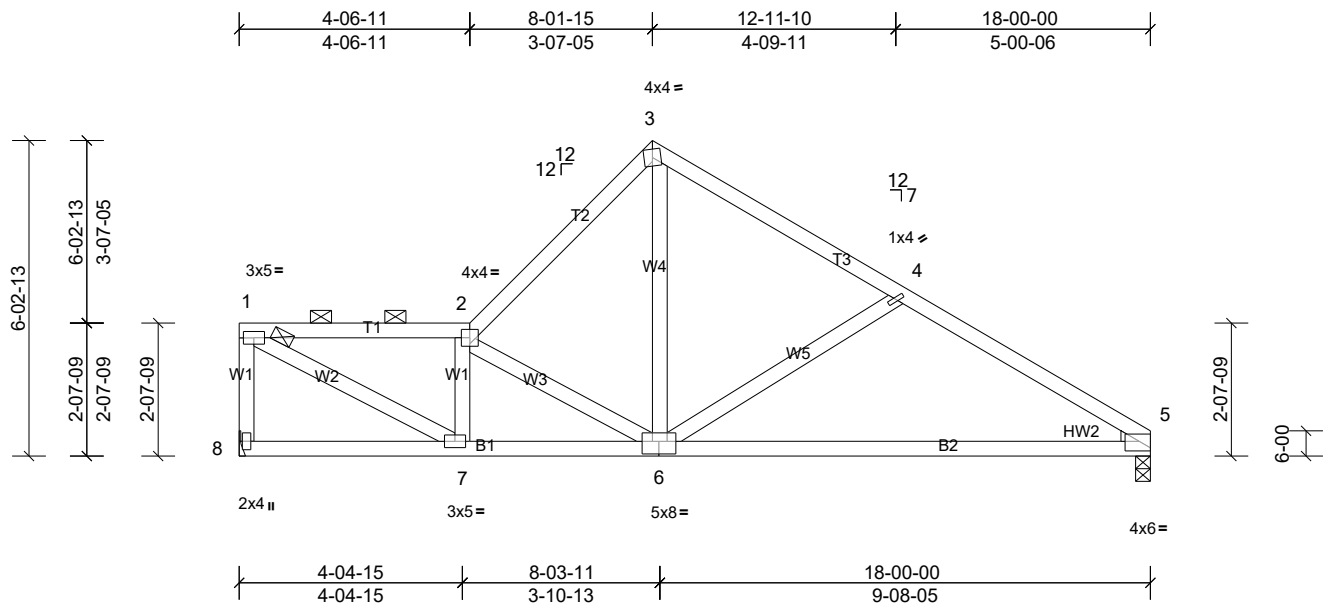


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.32 | Vert(LL) | -0.18 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.63 | Vert(TL) | -0.47 | 6-11 | >456 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.27 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 72 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

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

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-143 (LC 8)
Max Uplift 5=-30 (LC 11), 8=-24 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-661/89, 1-2=-995/119, 2-3=-857/110, 3-4=-744/108, 4-5=-1024/136
BOT CHORD 6-7=-60/1026, 5-6=-58/850
WEBS 1-7=-96/1093, 2-7=-493/77, 2-6=-554/129, 3-6=-38/644, 4-6=-346/144

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 24 lb uplift at joint 8 and 30 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G4 | Roof Special | 1 | 1 | Job Reference (optional) |

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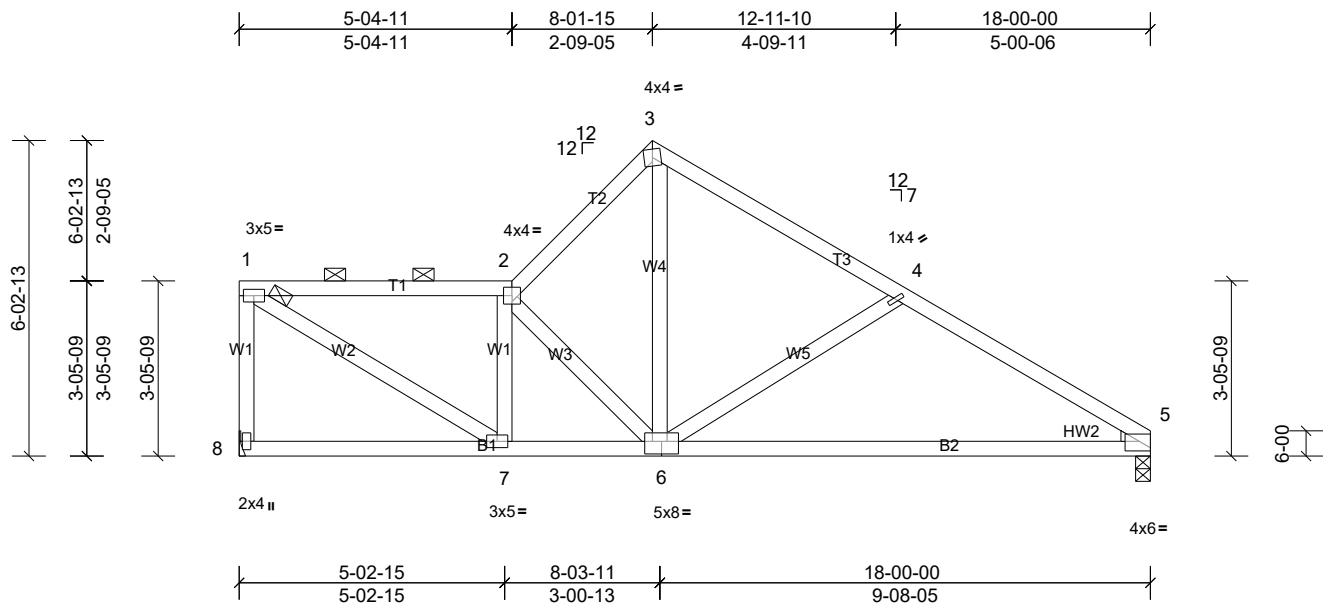


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.38 | Vert(LL) | -0.18 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.63 | Vert(TL) | -0.46 | 6-11 | >469 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.23 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 75 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-9 oc purlins, except end verticals, and 2-0-0 oc purlins (5-8-9 max.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-152 (LC 8)
Max Uplift 5=-29 (LC 11), 8=-29 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-657/95, 1-2=-831/114, 2-3=-835/122, 3-4=-746/108, 4-5=-1025/137
BOT CHORD 6-7=-28/853, 5-6=-59/851
WEBS 1-7=-79/940, 2-7=-461/70, 2-6=-444/117, 3-6=-59/672, 4-6=-346/144

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 29 lb uplift at joint 8 and 29 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G5 | Roof Special | 1 | 1 | Job Reference (optional) |

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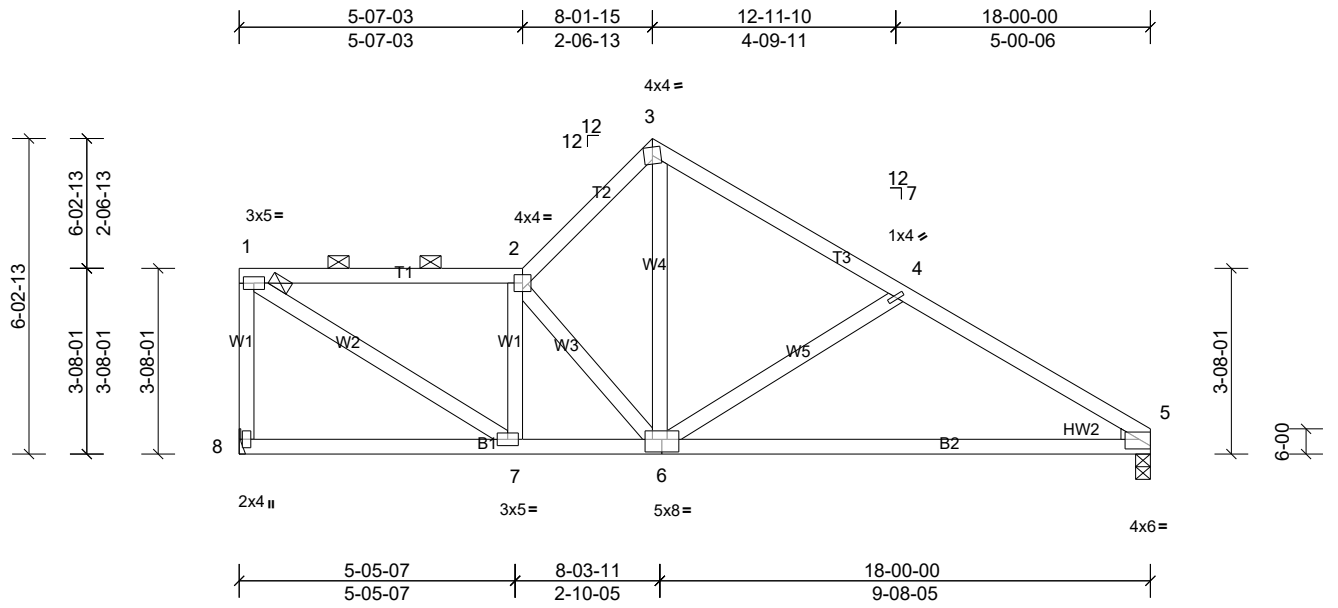


Scale = 1:45.7

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.41 | Vert(LL) | -0.18 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.62 | Vert(TL) | -0.45 | 6-11 | >472 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.22 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 76 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-9 oc purlins, except end verticals, and 2-0-0 oc purlins (5-8-10 max.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-154 (LC 8)
Max Uplift 5=-29 (LC 11), 8=-31 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-656/97, 1-2=-801/114, 2-3=-831/125, 3-4=-746/108, 4-5=-1025/137
BOT CHORD 6-7=-22/821, 5-6=-59/851
WEBS 1-7=-76/912, 2-7=-454/68, 2-6=-431/116, 3-6=-64/680, 4-6=-346/145

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 31 lb uplift at joint 8 and 29 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G6 | Roof Special | 1 | 1 | Job Reference (optional) |

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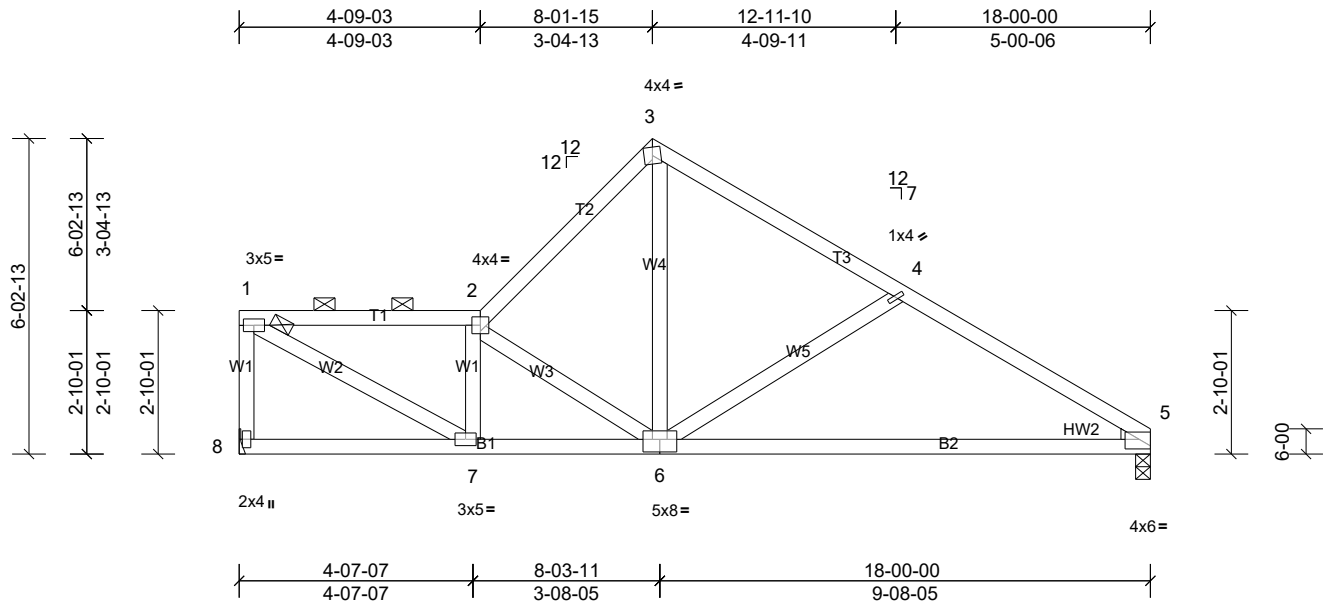


Scale = 1:45.7

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.32 | Vert(LL) | -0.18 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.62 | Vert(TL) | -0.47 | 6-11 | >459 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.26 | Horiz(TL) | 0.01 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 73 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

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

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-145 (LC 8)
Max Uplift 5=-29 (LC 11), 8=-25 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-660/90, 1-2=-945/117, 2-3=-851/113, 3-4=-745/108, 4-5=-1025/137
BOT CHORD 6-7=-51/973, 5-6=-58/850
WEBS 1-7=-91/1047, 2-7=-484/75, 2-6=-516/124, 3-6=-43/650, 4-6=-346/144

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 25 lb uplift at joint 8 and 29 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G7 | Roof Special | 1 | 1 | Job Reference (optional) |

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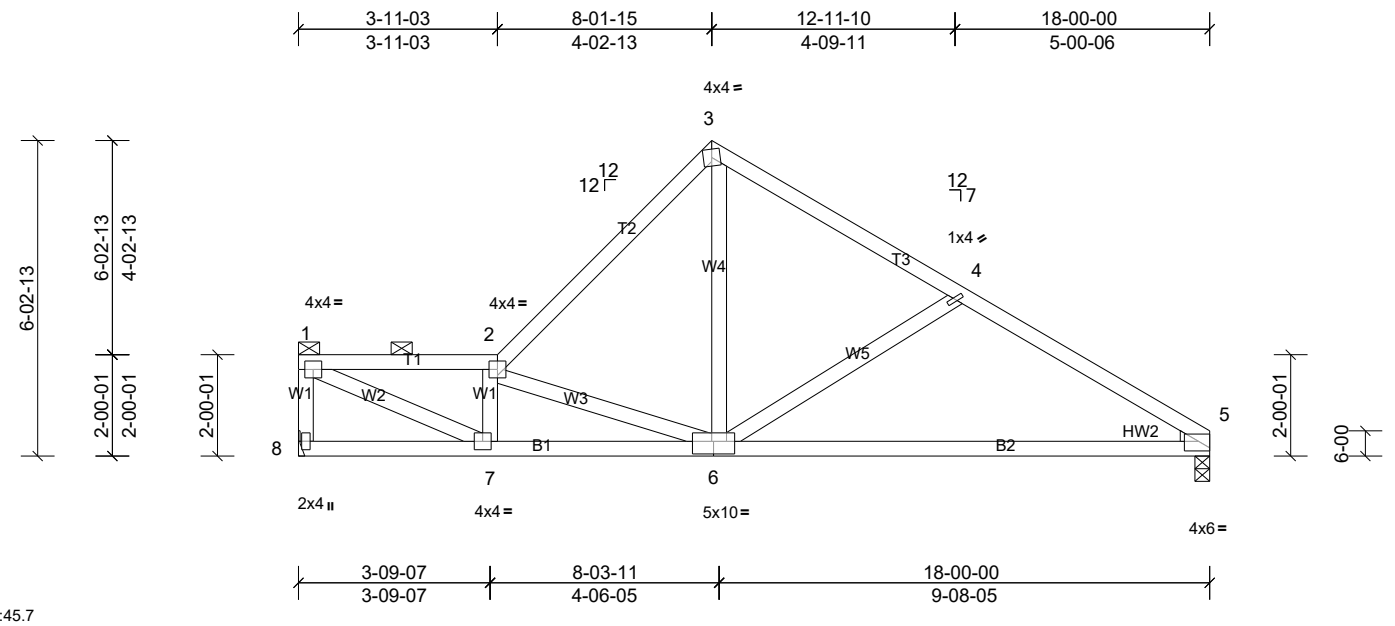


Scale = 1:45.7

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.33 | Vert(LL) | -0.19 | 6-11 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.64 | Vert(TL) | -0.49 | 6-11 | >439 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.31 | Horiz(TL) | 0.02 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 71 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
WEDGE Right: 2x3 SPF Stud

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-6-7 oc purlins, except end verticals, and 2-0-0 oc purlins (5-2-0 max.): 1-2.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 8= Mechanical, (min. 1-08)
Max Horiz 8=-136 (LC 8)
Max Uplift 5=-30 (LC 11), 8=-21 (LC 10)
Max Grav 5=714 (LC 1), 8=714 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-8=-660/83, 1-2=-1203/134, 2-3=-881/101, 3-4=-741/108, 4-5=-1023/136
BOT CHORD 6-7=-95/1248, 5-6=-57/849
WEBS 1-7=-120/1281, 2-7=-522/83, 2-6=-736/155, 3-6=-23/628, 4-6=-346/143

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 21 lb uplift at joint 8 and 30 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | G8 | Roof Special | 1 | 1 | Job Reference (optional) |

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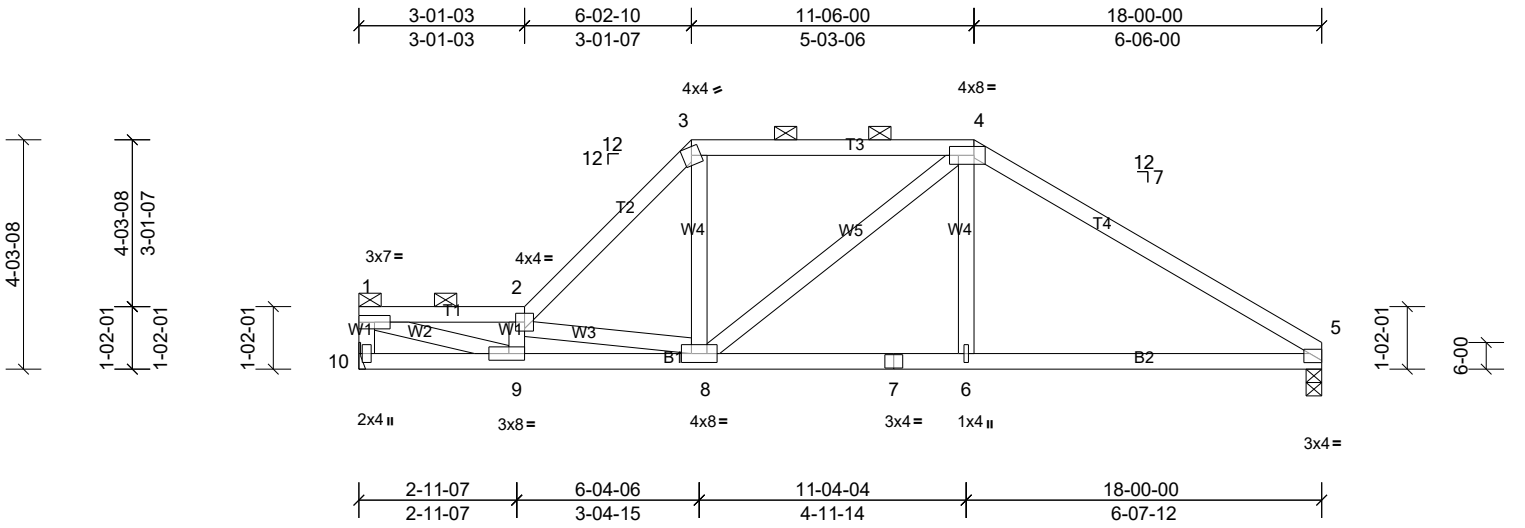


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.48 | Vert(LL) | -0.06 | 8-9 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.59 | Vert(TL) | -0.16 | 6-13 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.43 | Horiz(TL) | 0.02 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 67 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 4-9-10 oc purlins, except end verticals, and 2-0-0 oc purlins (4-3-0 max.): 1-2, 3-4.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5=3-08, (min. 1-08), 10= Mechanical, (min. 1-08)
Max Horiz 10=-89 (LC 8)
Max Uplift 5=-12 (LC 11), 10=-10 (LC 10)
Max Grav 5=714 (LC 1), 10=714 (LC 1)

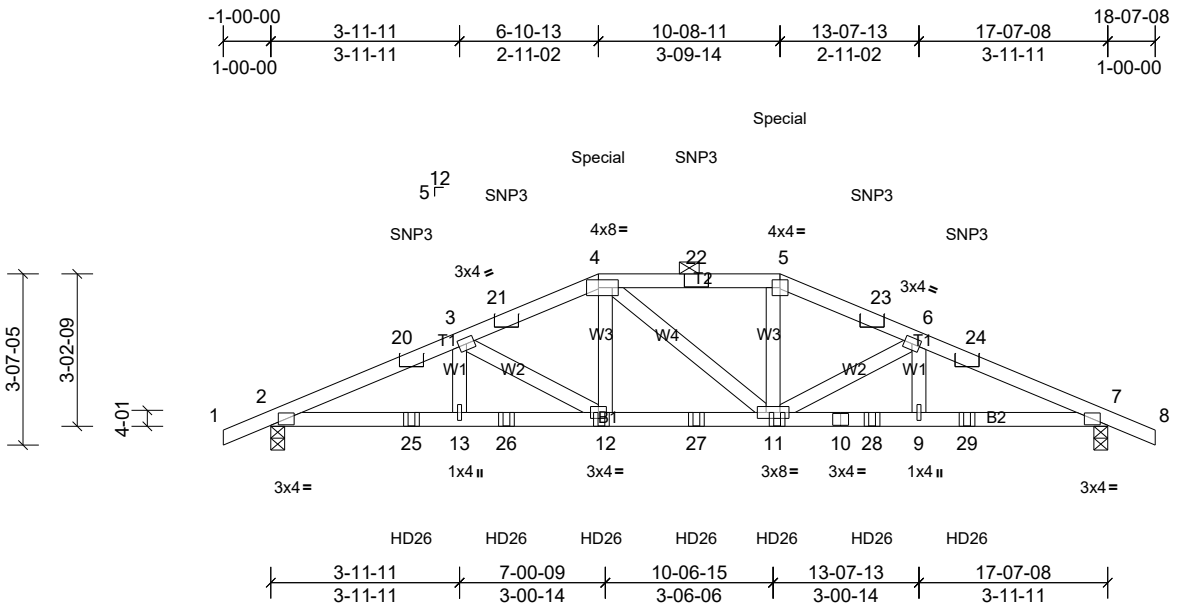
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-10=-642/76, 1-2=-1803/175, 2-3=-1046/121, 3-4=-746/124, 4-5=-1008/112
BOT CHORD 8-9=-170/1892, 7-8=-17/791, 6-7=-17/791, 5-6=-19/786
WEBS 1-9=-160/1767, 2-9=-547/94, 2-8=-1215/165, 3-8=0/446, 4-6=0/253

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 10 lb uplift at joint 10 and 12 lb uplift at joint 5.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | H1 | Hip Girder | 1 | 1 | Job Reference (optional) |



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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.20 | Vert(LL) | 0.05 | 11-12 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.43 | Vert(TL) | -0.09 | 12-13 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.04 | Horiz(TL) | 0.03 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 65 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-5-12 oc purlins, except 2-0-0 oc purlins (6-0-0 max.): 4-5.
BOT CHORD Rigid ceiling directly applied or 8-4-14 oc bracing.

**REACTIONS** (size) 2=3-08, (min. 1-08), 7=3-08, (min. 1-08)
Max Horiz 2=-45 (LC 33)
Max Uplift 2=-280 (LC 8), 7=-282 (LC 9)
Max Grav 2=659 (LC 1), 7=659 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-20=-1143/514, 3-20=-1091/510, 3-21=-972/408, 4-21=-940/411, 4-22=-874/393, 5-22=-874/393, 5-23=-940/413, 6-23=-972/410, 6-24=-1093/514, 7-24=-1145/518
BOT CHORD 2-25=-473/1062, 13-25=-473/1062, 13-26=-473/1062, 12-26=-473/1062, 12-27=-327/914, 11-27=-327/914, 10-11=-438/1031, 10-28=-438/1031, 9-28=-438/1031, 9-29=-438/1031, 7-29=-438/1031

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 280 lb uplift at joint 2 and 282 lb uplift at joint 7.
8) This truss is designed in accordance with the 2012 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.
10) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent spaced at 7-8-6 oc max. starting at 2-11-9 from the left end to 14-7-15 to connect truss(es) to back face of top chord.
11) Use USP HD26 (With 4-16d nails into Girder & 4-10d x 1-1/2 nails into Truss) or equivalent spaced at 11-8-6 oc max. starting at 2-11-9 from the left end to 14-7-15 to connect truss(es) to back face of bottom chord.
12) Use USP HD26 (With 4-16d nails into Girder & 2-10d x 1-1/2 nails into Truss) or equivalent spaced at 2-0-0 oc max. starting at 4-11-9 from the left end to 12-7-15 to connect truss(es) to back face of bottom chord.
13) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent at 8-11-9 from the left end to connect truss(es) to back face of top chord, skewed 0.0 deg.to the left, sloping -45.0 deg. down.
14) Fill all nail holes where hanger is in contact with lumber.
15) A minimum of (6) 8d x 1-1/2" nails are required into each member for SNP3 installation. All nailing is required in face of supported chords. For sloped applications, flanges may protrude above or below truss chords. Bending of extended flanges is permitted.
16) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 59 lb down and 45 lb up at 6-10-13, and 59 lb down and 45 lb up at 10-8-11 on top chord. The design/selection of such connection device(s) is the responsibility of others.
17) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-4=-60, 4-5=-60, 5-8=-60, 14-17=-20
Concentrated Loads (lb)
Vert: 12=1 (B), 11=1 (B), 20=-6 (B), 24=-6 (B), 25=111 (B), 26=0 (B), 27=1 (B), 28=0 (B), 29=111 (B)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | H2 | Common | 5 | 1 | Job Reference (optional) |

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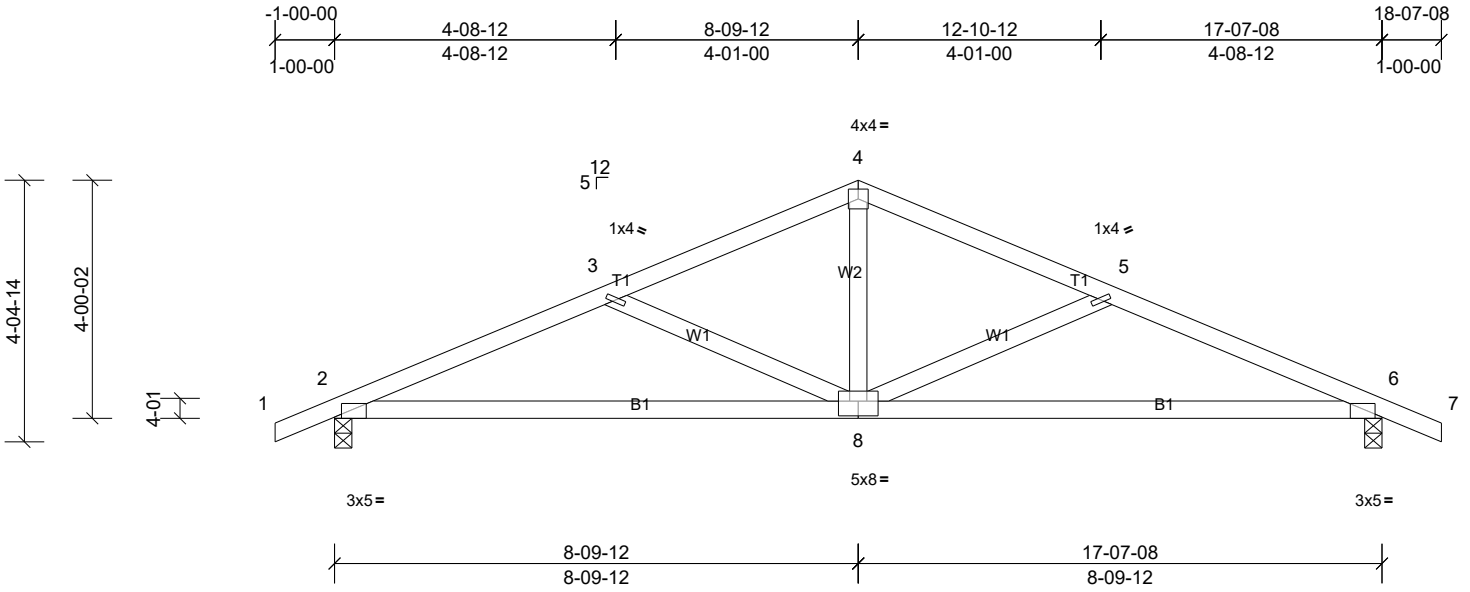


Scale = 1:38.9

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.17 | Vert(LL) | -0.08 | 8-14 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.55 | Vert(TL) | -0.21 | 8-14 | >996 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.13 | Horiz(TL) | 0.04 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 59 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-2-1 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 2=3-08, (min. 1-08), 6=3-08, (min. 1-08)
Max Horiz 2=56 (LC 14)
Max Uplift 2=-48 (LC 10), 6=-48 (LC 11)
Max Grav 2=765 (LC 1), 6=765 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1249/237, 3-4=-936/156, 4-5=-936/156, 5-6=-1249/237
BOT CHORD 2-8=-148/1114, 6-8=-148/1114
WEBS 4-8=-19/446, 5-8=-343/147, 3-8=-343/147

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 48 lb uplift at joint 2 and 48 lb uplift at joint 6.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | H3 | Common Girder | 1 | **2** | Job Reference (optional) |

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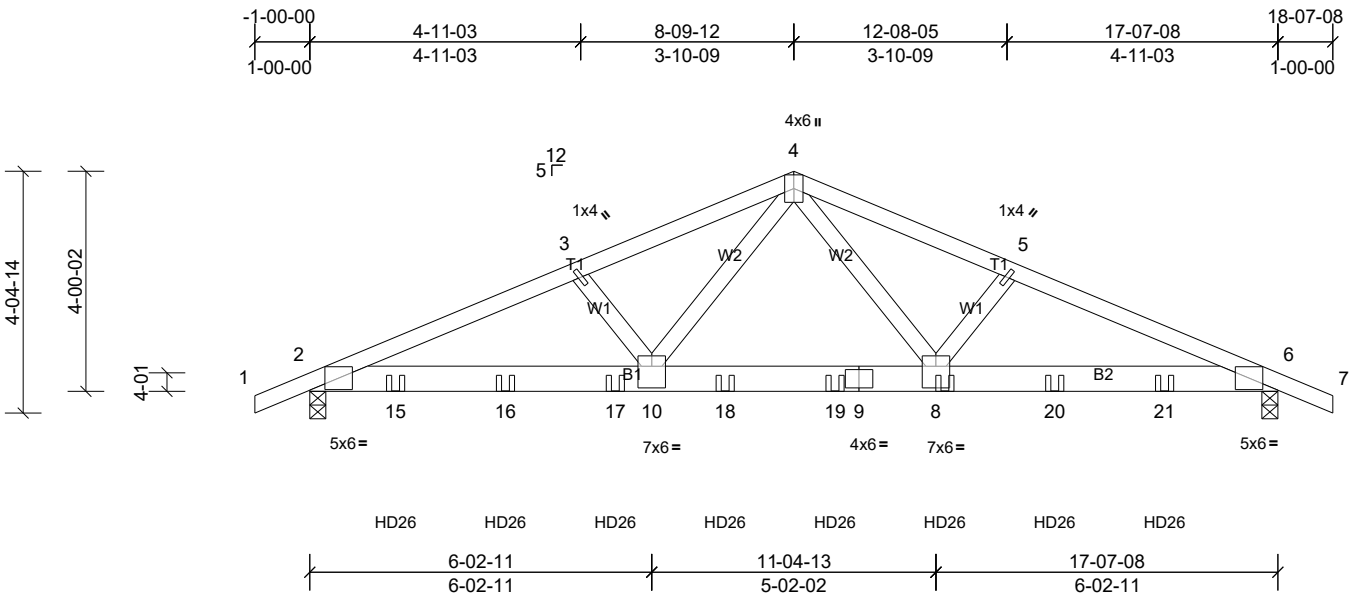


Scale = 1:42.1

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.59 | Vert(LL) | -0.11 | 10-12 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.53 | Vert(TL) | -0.28 | 10-12 | >758 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.38 | Horiz(TL) | 0.06 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 160 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SP 2400F 2.0E
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 6=3-08, (min. 1-08)
Max Horiz 2=-56 (LC 26)
Max Uplift 2=-193 (LC 8), 6=-177 (LC 9)
Max Grav 2=3622 (LC 1), 6=3456 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-7133/368, 3-4=-6873/363, 4-5=-6823/354, 5-6=-6970/359
BOT CHORD 2-15=-340/6483, 15-16=-340/6483, 16-17=-340/6483, 10-17=-340/6483, 10-18=-178/4484, 18-19=-178/4484, 9-19=-178/4484, 8-9=-178/4484, 8-20=-275/6432, 20-21=-275/6432, 6-21=-275/6432
WEBS 4-8=-162/3051, 5-8=-318/104, 4-10=-174/3127, 3-10=-329/106

**NOTES**
1) Special connection required to distribute top chord loads equally between all plies.
2) Special connection required to distribute bottom chord loads equally between all plies.
3) Special connection required to distribute web loads equally between all plies.
4) 2-ply truss to be connected together with WS6 as follows:
Top chords connected as follows: 2x4 - 1 row at 1-00 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 1-00 oc.
Web connected as follows: 2x4 - 1 row at 1-00 oc.
5) 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.
6) Unbalanced roof live loads have been considered for this design.
7) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
10) All bearings are assumed to be SP 2400F 2.0E crushing capacity of 805 psi.
11) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 193 lb uplift at joint 2 and 177 lb uplift at joint 6.
12) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
13) Use USP HD26 (With 4-16d nails into Girder & 2-10d x 1-1/2 nails into Truss) or equivalent spaced at 2-0-0 oc max. starting at 1-6-12 from the left end to 15-6-12 to connect truss(es) to front face of bottom chord.
14) Fill all nail holes where hanger is in contact with lumber.

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-4=-60, 4-7=-60, 2-6=-20
Concentrated Loads (lb)
Vert: 8=-694 (F), 15=-688 (F), 16=-694 (F), 17=-694 (F), 18=-694 (F), 19=-694 (F), 20=-694 (F), 21=-694 (F)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | J1 | Jack-Open | 8 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:41 Page: 1
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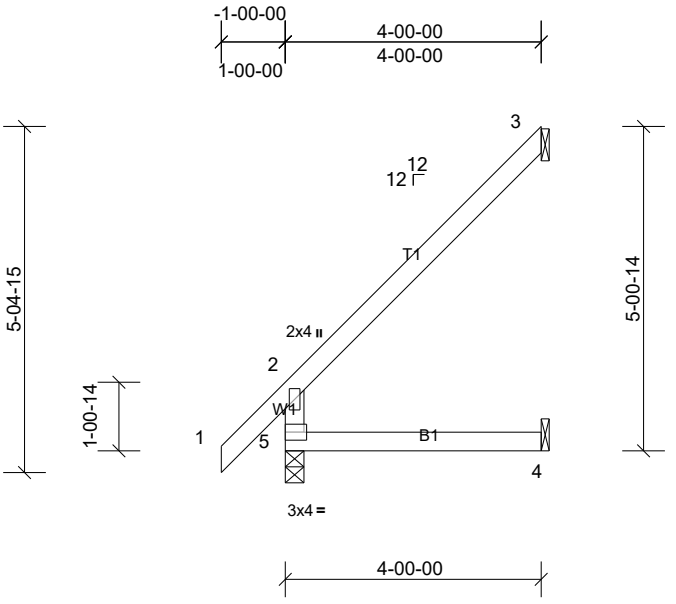


Scale = 1:36.2

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.22 | Vert(LL) | 0.02 | 4-5 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.20 | Vert(TL) | -0.03 | 4-5 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.04 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 14 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 3= Mechanical, (min. 1-08), 4= Mechanical, (min. 1-08), 5=3-08, (min. 1-08)
Max Horiz 5=141 (LC 10)
Max Uplift 3=-95 (LC 10), 4=-6 (LC 10)
Max Grav 3=114 (LC 20), 4=72 (LC 3), 5=231 (LC 1)

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 95 lb uplift at joint 3 and 6 lb uplift at joint 4.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | J2 | Monopitch | 5 | 1 | Job Reference (optional) |

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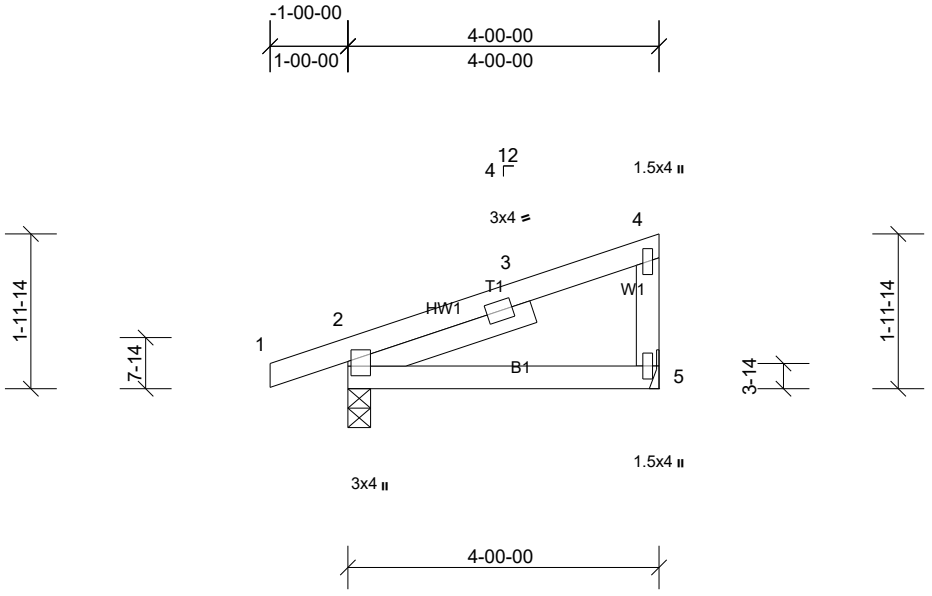



Scale = 1:29.7

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.17 | Vert(LL) | 0.01 | 5-8 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.11 | Vert(TL) | -0.02 | 5-8 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.01 | 2 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 16 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
SLIDER Left 2x4 SP No.2 -- 2-05-13

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 5= Mechanical, (min. 1-08)
Max Horiz 2=58 (LC 9)
Max Uplift 2=-43 (LC 6), 5=-18 (LC 10)
Max Grav 2=222 (LC 1), 5=146 (LC 1)

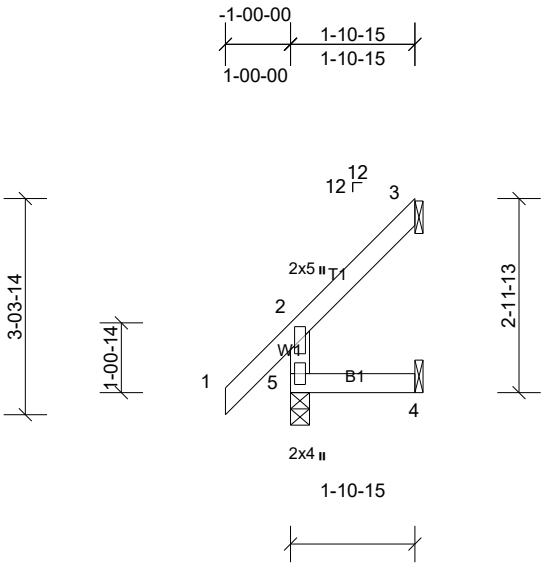
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: Joint 2 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 18 lb uplift at joint 5 and 43 lb uplift at joint 2.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | J3 | Jack-Open | 4 | 1 | Job Reference (optional) |






Scale = 1:35.6

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.09 | Vert(LL) | 0.00 | 4-5 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | 0.00 | 4-5 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | -0.01 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 8 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 1-10-15 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 3= Mechanical, (min. 1-08), 4= Mechanical, (min. 1-08), 5=3-08, (min. 1-08)
Max Horiz 5=77 (LC 10)
Max Uplift 3=-48 (LC 10), 4=-11 (LC 10)
Max Grav 3=46 (LC 17), 4=32 (LC 3), 5=161 (LC 1)

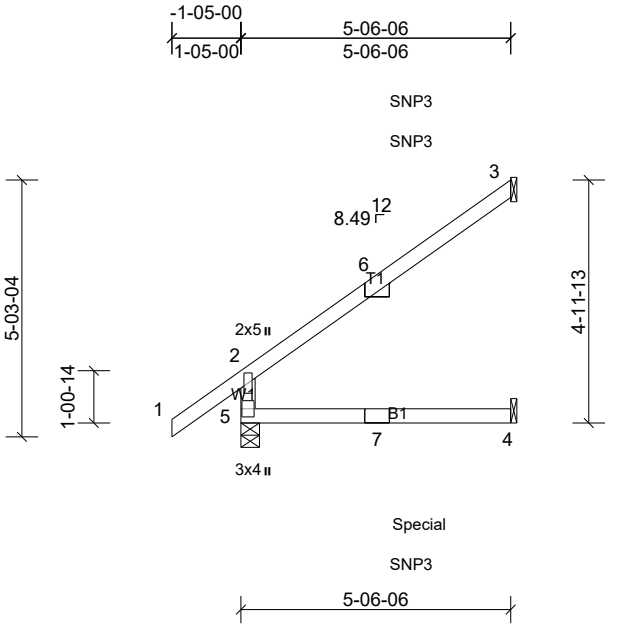
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 48 lb uplift at joint 3 and 11 lb uplift at joint 4.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | J4 | Diagonal Hip Girder | 2 | 1 | Job Reference (optional) |






Scale = 1:47.4

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.43 | Vert(LL) | 0.07 | 4-5 | >978 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.30 | Vert(TL) | -0.11 | 4-5 | >578 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.00 | Horiz(TL) | -0.08 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 17 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 3= Mechanical, (min. 1-08), 4= Mechanical, (min. 1-08), 5=4-09, (min. 1-08)
Max Horiz 5=140 (LC 8)
Max Uplift 3=-105 (LC 8), 4=-5 (LC 8), 5=-16 (LC 8)
Max Grav 3=159 (LC 15), 4=102 (LC 3), 5=318 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-5=-272/45

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 16 lb uplift at joint 5, 105 lb uplift at joint 3 and 5 lb uplift at joint 4.
7) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
8) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent at 2-9-8 from the left end to connect truss(es) to front face of top chord, skewed 45.0 deg.to the left, sloping -45.0 deg. down.
9) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent at 2-9-8 from the left end to connect truss(es) to back face of top chord, skewed 45.0 deg.to the right, sloping -45.0 deg. down.
10) Use USP SNP3 (With 6-8d x 1-1/2 nails into Girder & 6-8d x 1-1/2 nails into Truss) or equivalent at 2-9-8 from the left end to connect truss(es) to back face of bottom chord, skewed 45.0 deg.to the right, sloping 0.0 deg. down.
11) Fill all nail holes where hanger is in contact with lumber.
12) A minimum of (6) 8d x 1-1/2" nails are required into each member for SNP3 installation. All nailing is required in face of supported chords. For sloped applications, flanges may protrude above or below truss chords. Bending of extended flanges is permitted.
13) In the LOAD CASE(S) section, loads applied to the face of the truss are noted as front (F) or back (B).

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-2=-60, 2-3=-60, 4-5=-20
Concentrated Loads (lb)
Vert: 7=4 (F=2, B=2)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | J5 | Jack-Open | 2 | 1 | Job Reference (optional) |

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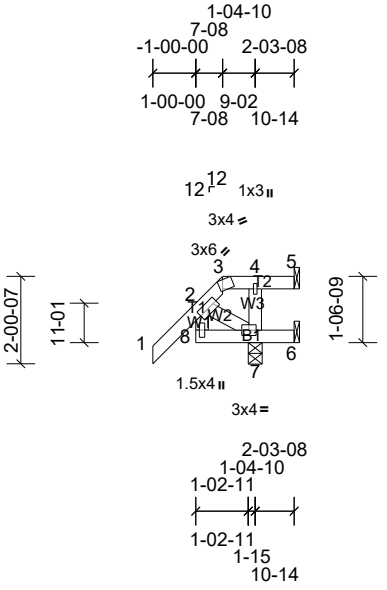



Scale = 1:53.9

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.09 | Vert(LL) | 0.00 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.40 | Vert(TL) | 0.00 | 6-7 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.02 | Horiz(TL) | -0.09 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 10 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 2-3-8 oc purlins, except end verticals, and 2-0-0 oc purlins: 3-5.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 5= Mechanical, (min. 1-08), 6= Mechanical, (min. 1-08), 7=3-14, (min. 1-08)
Max Horiz 7=40 (LC 10)
Max Uplift 5=-40 (LC 10), 6=-252 (LC 1), 7=-31 (LC 10)
Max Grav 5=66 (LC 1), 6=60 (LC 10), 7=422 (LC 1)

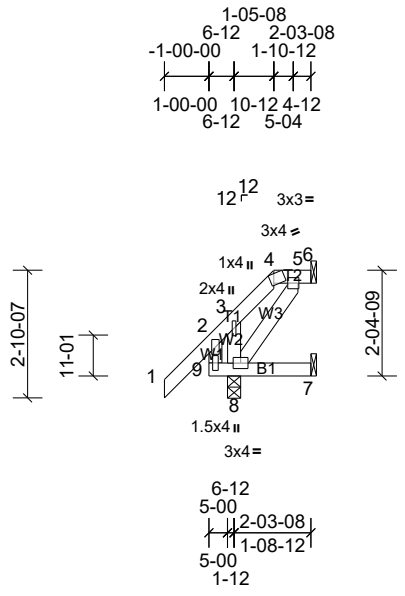
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) -1-0-0 to 2-2-12 zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 7 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 40 lb uplift at joint 5, 252 lb uplift at joint 6 and 31 lb uplift at joint 7.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | J6 | Jack-Open | 2 | 1 | Job Reference (optional) |






Scale = 1:52

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.08 | Vert(LL) | 0.00 | 7-8 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.04 | Vert(TL) | 0.00 | 7-8 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.01 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 12 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 2-3-8 oc purlins, except end verticals, and 2-0-0 oc purlins: 4-6.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

**REACTIONS** (size) 6= Mechanical, (min. 1-08), 7= Mechanical, (min. 1-08), 8=3-09, (min. 1-08)
Max Horiz 8=67 (LC 10)
Max Uplift 6=-35 (LC 7)
Max Grav 6=29 (LC 22), 7=26 (LC 3), 8=214 (LC 1)

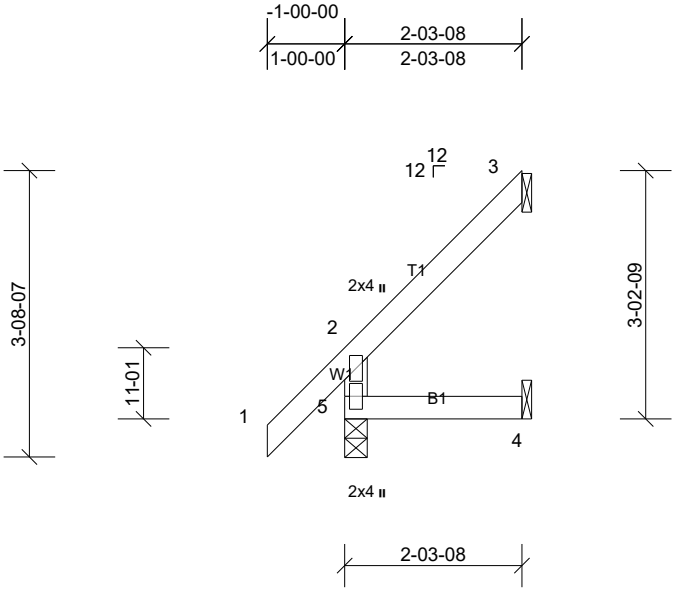
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Provide adequate drainage to prevent water ponding.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: , Joint 8 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 35 lb uplift at joint 6.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | J8 | Jack-Open | 3 | 1 | Job Reference (optional) |






Scale = 1:29.9

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.08 | Vert(LL) | 0.00 | 4-5 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | 0.00 | 4-5 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.01 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 9 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 2-3-8 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 3= Mechanical, (min. 1-08), 4= Mechanical, (min. 1-08), 5=3-08, (min. 1-08)
Max Horiz 5=89 (LC 10)
Max Uplift 3=-53 (LC 10), 4=-6 (LC 10)
Max Grav 3=57 (LC 17), 4=38 (LC 3), 5=171 (LC 1)

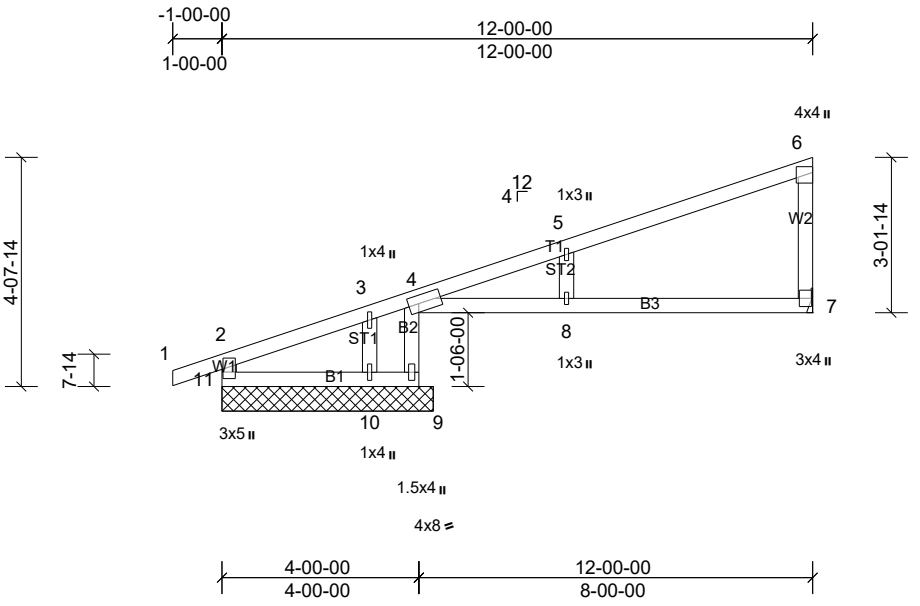
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 5 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 53 lb uplift at joint 3 and 6 lb uplift at joint 4.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | K1 | Monopitch Supported Gable | 1 | 1 | Job Reference (optional) |






Scale = 1:47

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.76 | Vert(LL) | -0.09 | 7-8 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.46 | Vert(TL) | -0.24 | 7-8 | >403 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.10 | Horiz(TL) | -0.01 | 7 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 36 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 4-9.

**REACTIONS** All bearings 4-03-08. except 7= Mechanical
(lb) - Max Horiz 11=134 (LC 7)
Max Uplift All uplift 100 (lb) or less at joint(s) 7, 11 except 9=-112 (LC 6), 10=-335 (LC 1)
Max Grav All reactions 250 (lb) or less at joint (s) 10, 11 except 7=269 (LC 1), 9=880 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
BOT CHORD 4-9=-886/192
WEBS 3-10=-46/394

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
3) Gable studs spaced at 2-0-0 oc.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) Bearings are assumed to be: Joint 10 SPF No.2 crushing capacity of 425 psi.
7) Refer to girder(s) for truss to truss connections.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 11, 7 except (jt=lb) 9=111, 10=334.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | K2 | Monopitch | 5 | 1 | Job Reference (optional) |

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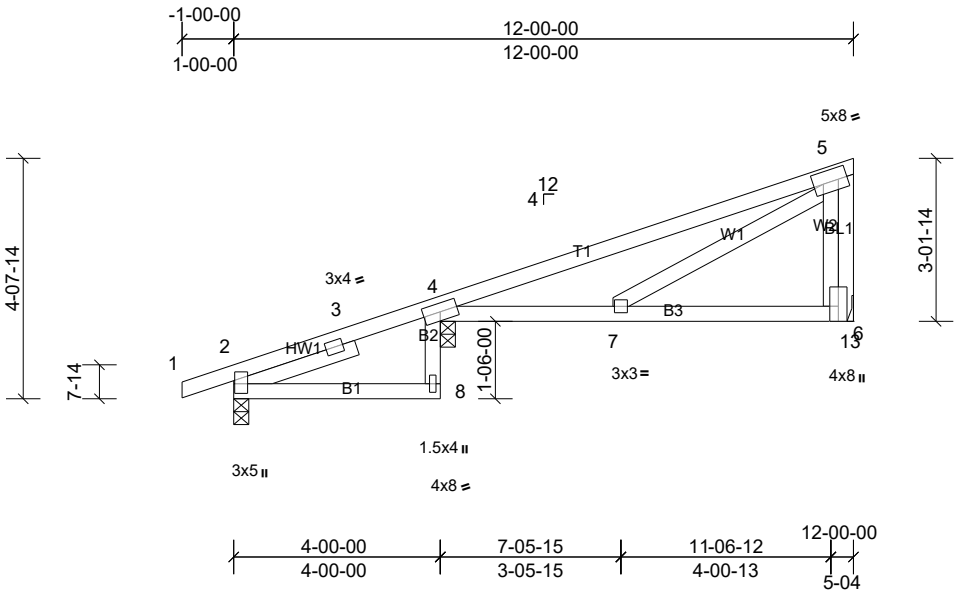



Scale = 1:44.8

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.60 | Vert(LL) | -0.01 | 4-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.28 | Vert(TL) | -0.03 | 6-7 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.07 | Horiz(TL) | 0.00 | 13 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 46 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2
SLIDER Left 2x4 SP No.2 -- 2-05-13

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 4=3-08, (min. 1-08), 13= Mechanical, (min. 1-08)
Max Horiz 2=136 (LC 6)
Max Uplift 4=-105 (LC 10), 13=-32 (LC 6)
Max Grav 2=164 (LC 1), 4=555 (LC 1), 13=266 (LC 1)

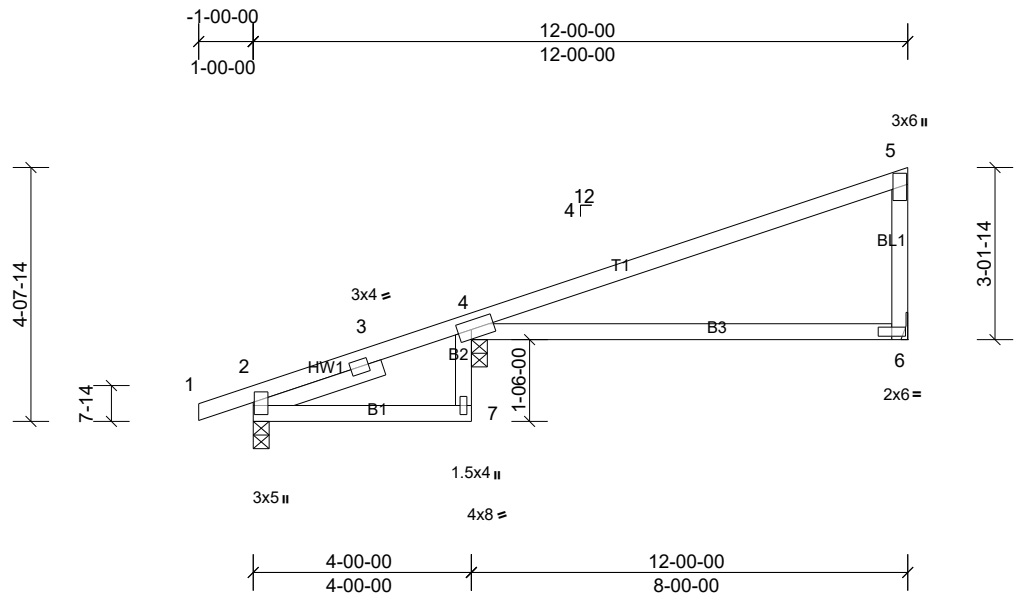
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 4-5=-369/0
BOT CHORD 4-7=0/315
WEBS 5-7=0/310, 5-13=-272/60

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: Joint 2 SPF No.2 crushing capacity of 425 psi, Joint 4 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 105 lb uplift at joint 4 and 32 lb uplift at joint 13.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | K3 | Monopitch | 2 | 1 | Job Reference (optional) |






Scale = 1:42.4

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.63 | Vert(LL) | -0.10 | 4-6 | >932 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.41 | Vert(TL) | -0.28 | 4-6 | >339 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 38 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2
SLIDER Left 2x4 SP No.2 -- 2-05-13

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 4=3-08, (min. 1-08), 6= Mechanical, (min. 1-08)
Max Horiz 2=127 (LC 7)
Max Uplift 2=-7 (LC 6), 4=-86 (LC 10), 6=-31 (LC 10)
Max Grav 2=134 (LC 1), 4=597 (LC 1), 6=278 (LC 1)

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: Joint 2 SPF No.2 crushing capacity of 425 psi, Joint 4 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 7 lb uplift at joint 2, 86 lb uplift at joint 4 and 31 lb uplift at joint 6.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | L1 | Common Supported Gable | 1 | 1 | Job Reference (optional) |

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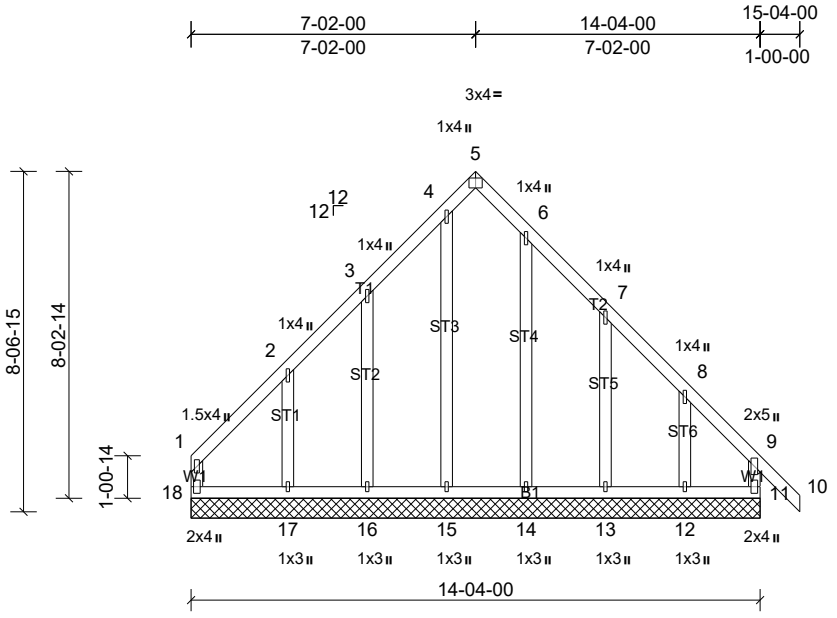


Scale = 1:58.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.12 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.09 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.12 | Horiz(TL) | 0.00 | 11 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 75 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 14-04-00.
(lb) - Max Horiz 18=-183 (LC 6)
Max Uplift All uplift 100 (lb) or less at joint(s) 11, 13, 16, 18 except 12=-153 (LC 11), 17=-154 (LC 10)
Max Grav All reactions 250 (lb) or less at joint (s) 11, 12, 13, 14, 15, 16, 17, 18

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Gable requires continuous bottom chord bearing.
5) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
9) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 18, 11, 16, 13 except (jt=lb) 17=153, 12=152.
11) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | M1 | Monopitch Supported Gable | 1 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:42 Page: 1
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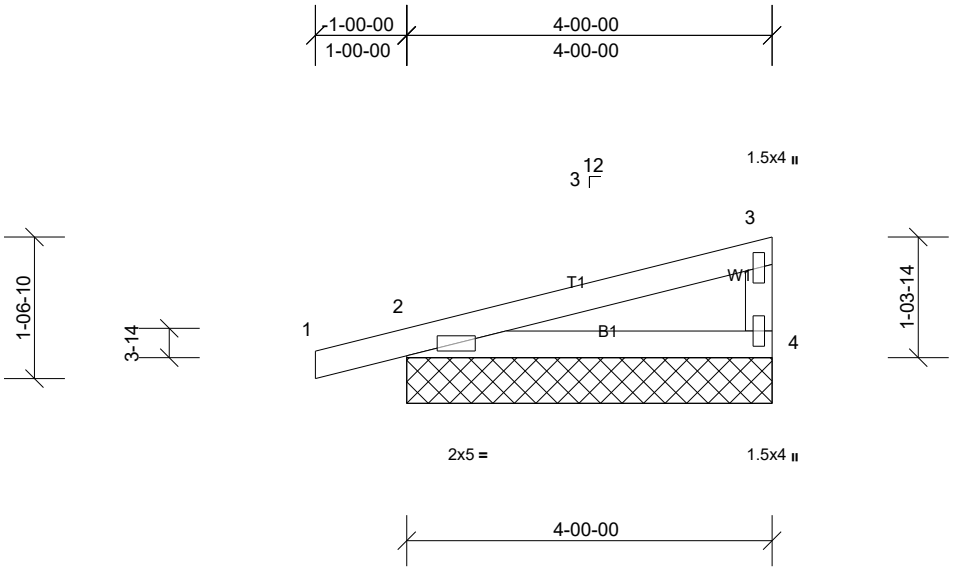



Scale = 1:25.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.15 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.14 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 2 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 11 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 2=4-00-00, (min. 1-08), 4=4-00-00, (min. 1-08), 5=4-00-00, (min. 1-08)
Max Horiz 2=37 (LC 9), 5=37 (LC 9)
Max Uplift 2=-47 (LC 6), 4=-13 (LC 10), 5=-47 (LC 6)
Max Grav 2=222 (LC 1), 4=149 (LC 1), 5=222 (LC 1)

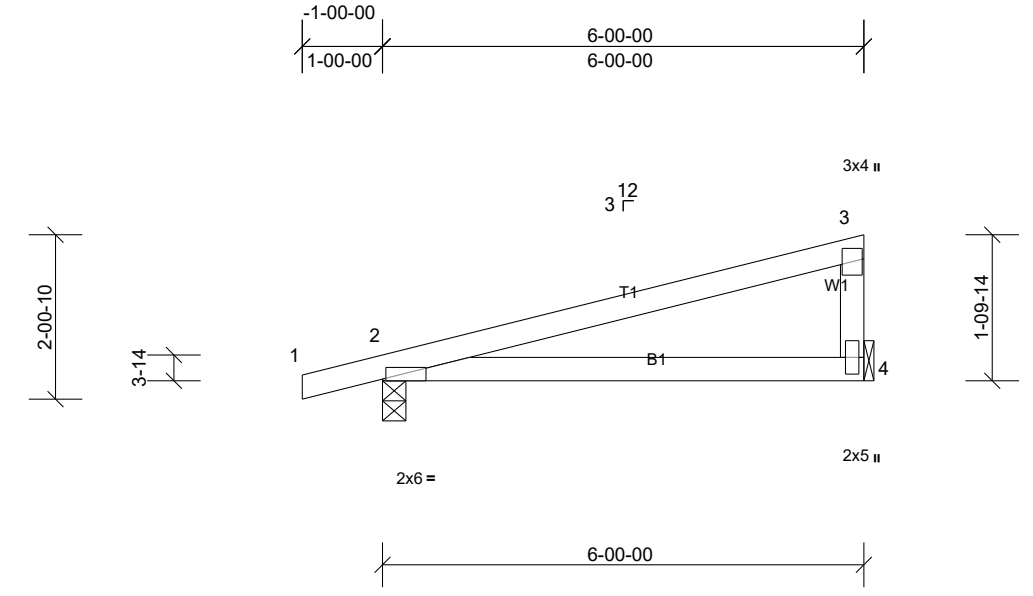
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
3) Gable requires continuous bottom chord bearing.
4) Gable studs spaced at 2-0-0 oc.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
7) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 47 lb uplift at joint 2, 13 lb uplift at joint 4 and 47 lb uplift at joint 2.
9) Beveled plate or shim required to provide full bearing surface with truss chord at joint(s) 2, 5.
10) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | M2 | Jack-Closed | 3 | 1 | Job Reference (optional) |






Scale = 1:28.8

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.31 | Vert(LL) | -0.04 | 4-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.31 | Vert(TL) | -0.11 | 4-7 | >664 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 2 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 17 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 4= Mechanical, (min. 1-08)
Max Horiz 2=53 (LC 9)
Max Uplift 2=-52 (LC 6), 4=-24 (LC 10)
Max Grav 2=299 (LC 1), 4=229 (LC 1)

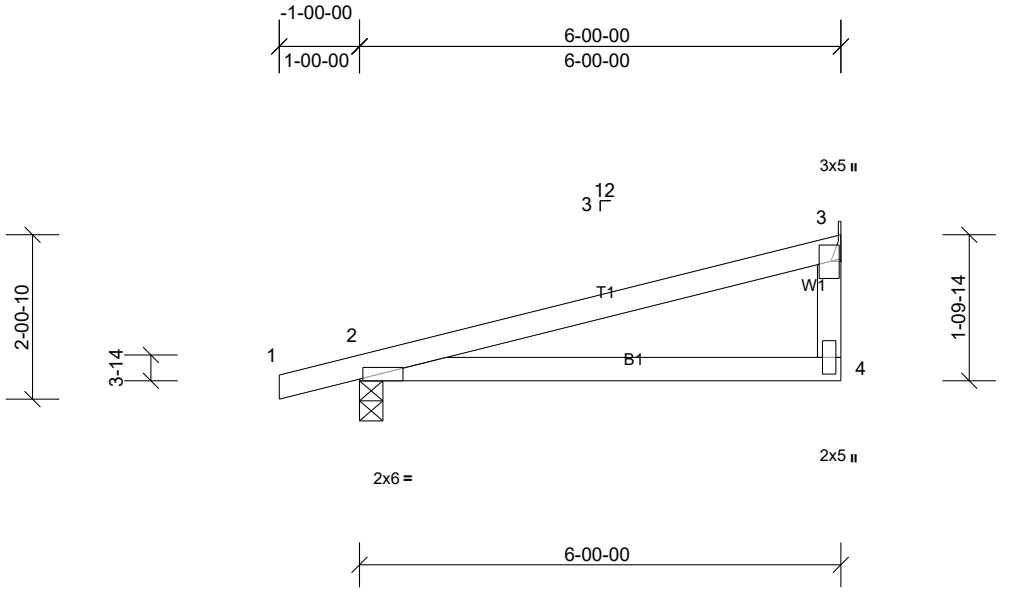
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: Joint 2 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 24 lb uplift at joint 4 and 52 lb uplift at joint 2.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | M4 | Monopitch | 8 | 1 | Job Reference (optional) |






Scale = 1:28.8

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.31 | Vert(LL) | -0.04 | 4-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.31 | Vert(TL) | -0.11 | 4-7 | >664 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 2 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 17 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 2=3-08, (min. 1-08), 3= Mechanical, (min. 1-08)
Max Horiz 2=53 (LC 9)
Max Uplift 2=-52 (LC 6), 3=-24 (LC 10)
Max Grav 2=299 (LC 1), 3=229 (LC 1)

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 2 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 24 lb uplift at joint 3 and 52 lb uplift at joint 2.
7) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
8) Gap between inside of top chord bearing and first diagonal or vertical web shall not exceed 0.500in.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | PB1 | Piggyback | 1 | 1 | Job Reference (optional) |

Run: 8.43 S Jan 4 2021 Print: 8.430 S Jan 4 2021 MiTek Industries, Inc. Fri Jul 23 16:33:42 Page: 1
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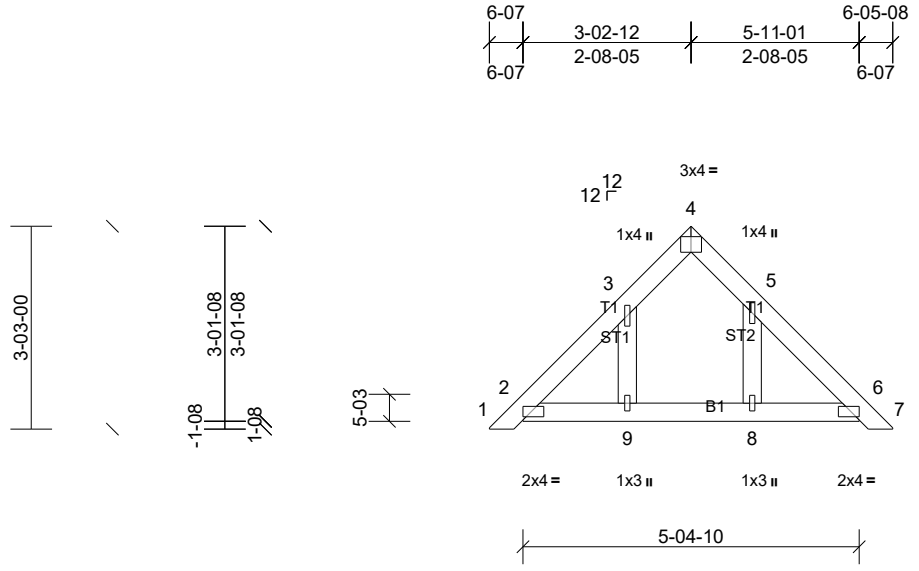


Scale = 1:37

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.02 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.03 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.01 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 20 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 5-04-10.
(lb) - Max Horiz 2=-61 (LC 8), 10=-61 (LC 8)
Max Uplift All uplift 100 (lb) or less at joint(s) 8, 9
Max Grav All reactions 250 (lb) or less at joint (s) 2, 6, 8, 9, 10, 13

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Gable requires continuous bottom chord bearing.
5) Gable studs spaced at 2-0-0 oc.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
8) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 9, 8.
10) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
11) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | PB2 | Piggyback | 15 | 1 | Job Reference (optional) |

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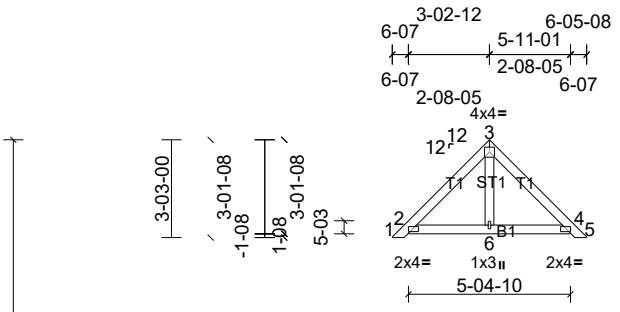


Scale = 1:76.9

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.06 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0* | Rep Stress Incr | YES | WB | 0.01 | Horiz(TL) | 0.00 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 19 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 5-04-10.
(lb) - Max Horiz 2=-61 (LC 8), 7=-61 (LC 8)
Max Uplift All uplift 100 (lb) or less at joint(s) 2, 4, 7, 10
Max Grav All reactions 250 (lb) or less at joint (s) 2, 4, 6, 7, 10

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Gable requires continuous bottom chord bearing.
5) Gable studs spaced at 4-0-0 oc.
6) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
7) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
8) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
9) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 2, 4, 2, 4.
10) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
11) See Standard Industry Piggyback Truss Connection Detail for Connection to base truss as applicable, or consult qualified building designer.

**LOAD CASE(S)** Standard

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | S1 | Common | 1 | 1 | Job Reference (optional) |

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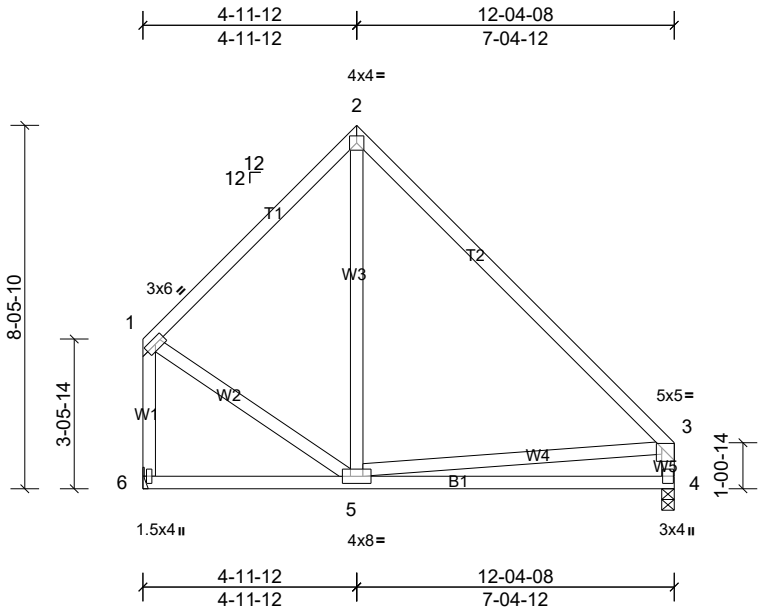


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.65 | Vert(LL) | -0.07 | 4-5 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.36 | Vert(TL) | -0.19 | 4-5 | >783 | 180 | | |
| BCLL | 0.0* | Rep Stress Incr | YES | WB | 0.19 | Horiz(TL) | 0.00 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 62 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-8-7 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 4=3-08, (min. 1-08), 6= Mechanical, (min. 1-08)
Max Horiz 6=-198 (LC 6)
Max Uplift 6=-30 (LC 11)
Max Grav 4=483 (LC 1), 6=483 (LC 1)

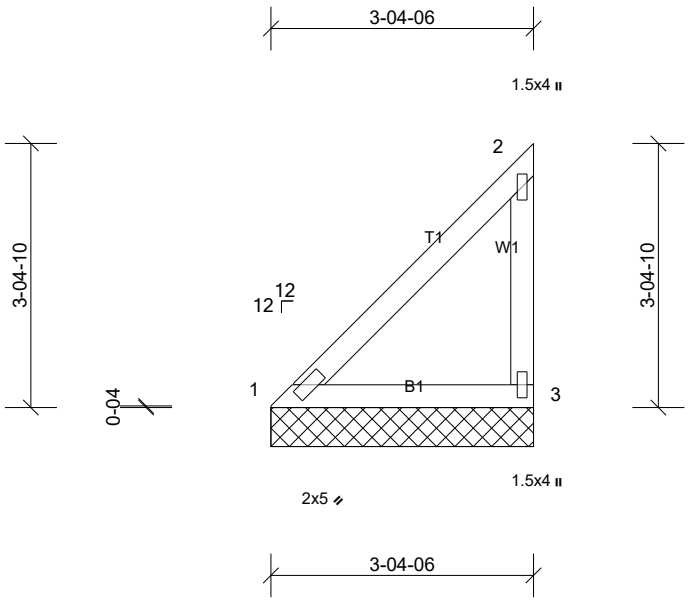
**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 1-2=-370/114, 2-3=-438/85, 1-6=-452/64, 3-4=-414/84
BOT CHORD 4-5=-139/271
WEBS 1-5=-32/263, 3-5=-206/256

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) Bearings are assumed to be: , Joint 4 SPF No.2 crushing capacity of 425 psi.
6) Refer to girder(s) for truss to truss connections.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 30 lb uplift at joint 6.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V1 | Valley | 1 | 1 | Job Reference (optional) |






Scale = 1:29.6

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.11 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.12 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 12 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 3-4-6 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 1=3-04-06, (min. 1-08), 3=3-04-06, (min. 1-08)
Max Horiz 1=92 (LC 7)
Max Uplift 3=-35 (LC 10)
Max Grav 1=135 (LC 18), 3=147 (LC 17)

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Gable requires continuous bottom chord bearing.
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 35 lb uplift at joint 3.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V2 | Valley | 1 | 1 | Job Reference (optional) |

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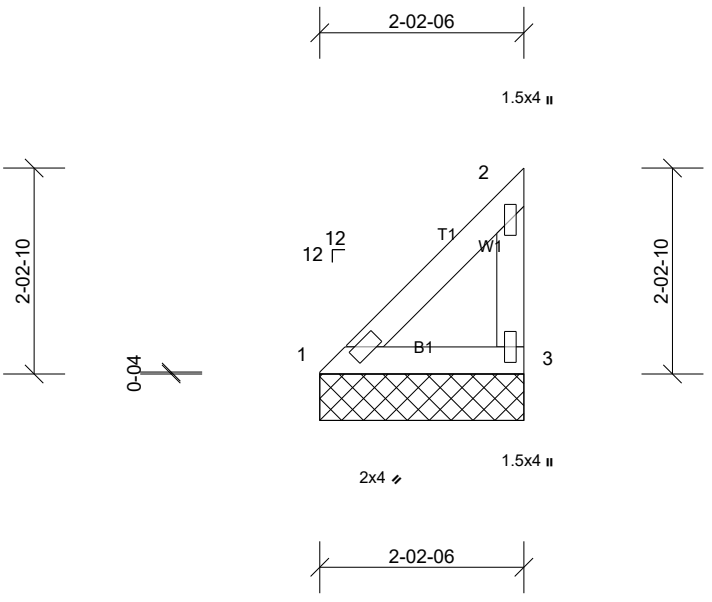


Scale = 1:24.9

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.04 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.05 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 7 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 1=2-02-06, (min. 1-08), 3=2-02-06, (min. 1-08)
Max Horiz 1=56 (LC 7)
Max Uplift 3=-22 (LC 10)
Max Grav 1=85 (LC 18), 3=93 (LC 17)

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Gable requires continuous bottom chord bearing.
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 22 lb uplift at joint 3.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V3 | Valley | 1 | 1 | Job Reference (optional) |

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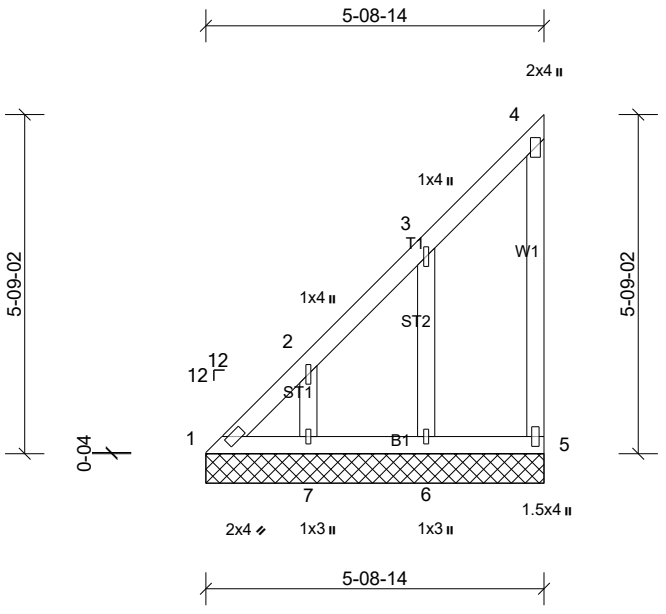


Scale = 1:39.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.14 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.03 | Horiz(TL) | 0.00 | 5 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 26 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-8-14 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** All bearings 5-08-14.
(lb) - Max Horiz 1=165 (LC 7)
Max Uplift All uplift 100 (lb) or less at joint(s) 1, 5, 6, 7
Max Grav All reactions 250 (lb) or less at joint (s) 1, 5, 6, 7

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

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
3) Gable requires continuous bottom chord bearing.
4) Gable studs spaced at 2-0-0 oc.
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
7) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
8) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 5, 1, 6, 7.
9) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V5 | Valley | 1 | 1 | Job Reference (optional) |

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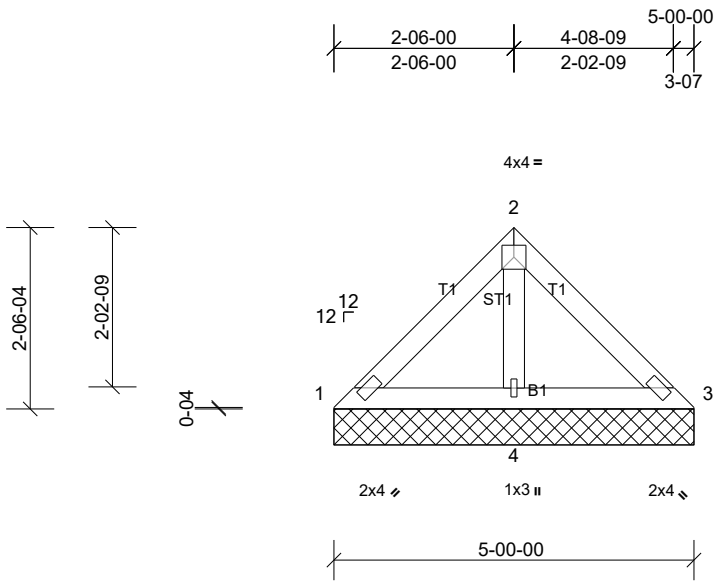


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.06 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.03 | Horiz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 15 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-0-0 oc purlins.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

**REACTIONS** (size) 1=5-00-00, (min. 1-08), 3=5-00-00, (min. 1-08), 4=5-00-00, (min. 1-08)
Max Horiz 1=-47 (LC 6)
Max Uplift 4=-28 (LC 10)
Max Grav 1=62 (LC 21), 3=62 (LC 22), 4=299 (LC 1)

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Gable requires continuous bottom chord bearing.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 28 lb uplift at joint 4.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V7 | Valley | 1 | 1 | Job Reference (optional) |

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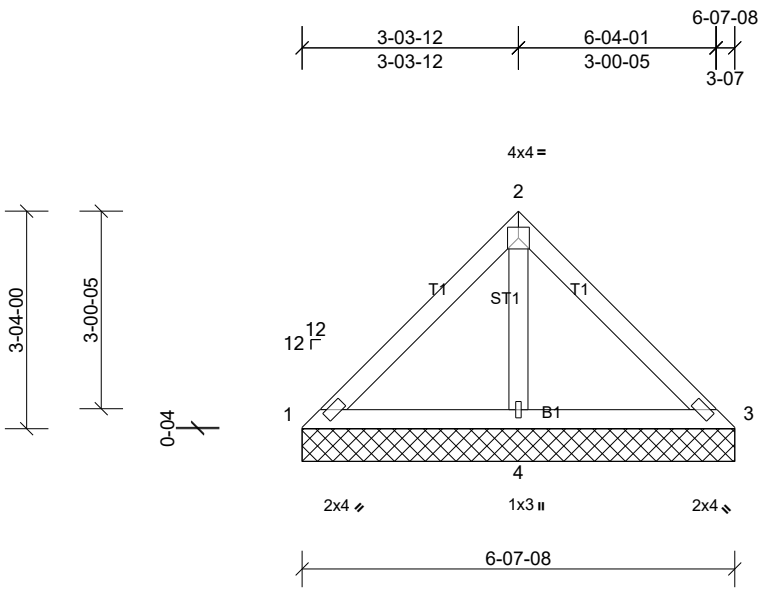


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.10 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.11 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.05 | Horiz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 20 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
OTHERS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 6-7-8 oc purlins.
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing.

**REACTIONS** (size) 1=6-07-08, (min. 1-08), 3=6-07-08, (min. 1-08), 4=6-07-08, (min. 1-08)
Max Horiz 1=-63 (LC 6)
Max Uplift 4=-42 (LC 10)
Max Grav 1=74 (LC 21), 3=74 (LC 22), 4=417 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
WEBS 2-4=-291/89

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Gable requires continuous bottom chord bearing.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 42 lb uplift at joint 4.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | V8 | Valley | 1 | 1 | Job Reference (optional) |

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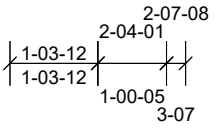


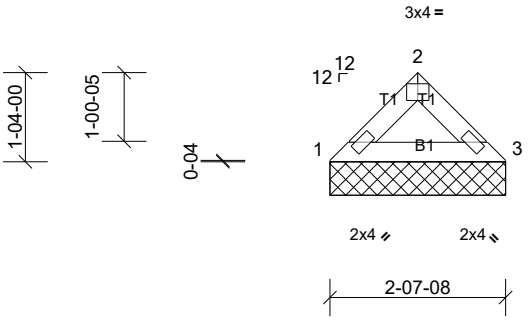


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.04 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.04 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.00 | Horiz(TL) | 0.00 | 3 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MP | | | | | | | Weight: 6 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 2-7-8 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

**REACTIONS** (size) 1=2-07-08, (min. 1-08), 3=2-07-08, (min. 1-08)
Max Horiz 1=-23 (LC 6)
Max Uplift 1=-2 (LC 10), 3=-2 (LC 11)
Max Grav 1=105 (LC 1), 3=105 (LC 1)

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Gable requires continuous bottom chord bearing.
4) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
5) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
6) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
7) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 2 lb uplift at joint 1 and 2 lb uplift at joint 3.
8) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | W1 | Common Supported Gable | 1 | 1 | Job Reference (optional) |

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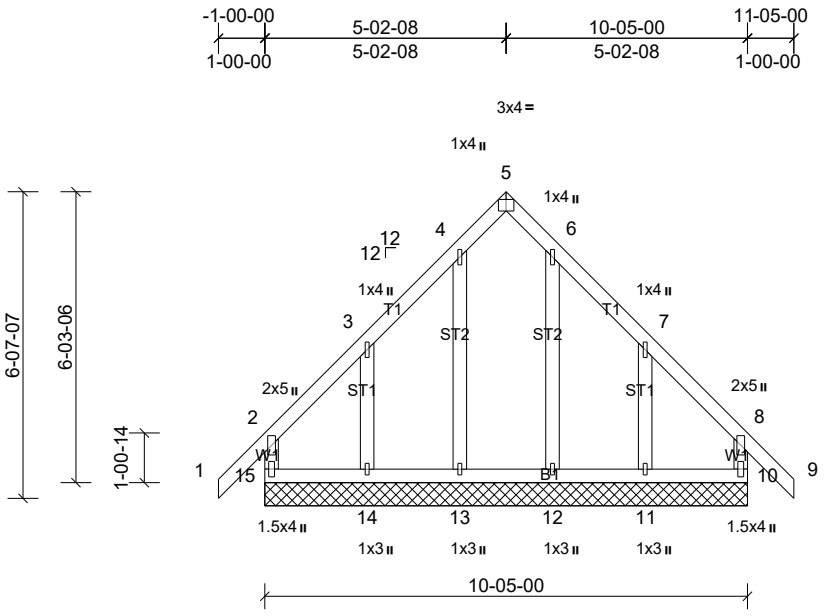


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.09 | Vert(LL) | n/a | - | n/a | 999 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.07 | Vert(TL) | n/a | - | n/a | 999 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.05 | Horiz(TL) | 0.00 | 10 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MR | | | | | | | Weight: 51 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2
OTHERS 2x4 SPF No.2

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

**REACTIONS** All bearings 10-05-00.
(lb) - Max Horiz 15=-151 (LC 8)
Max Uplift All uplift 100 (lb) or less at joint(s) 10, 15 except 11=-161 (LC 11), 14=-162 (LC 10)
Max Grav All reactions 250 (lb) or less at joint (s) 10, 11, 12, 13, 14, 15

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

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) Gable requires continuous bottom chord bearing.
5) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
9) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 15, 10 except (jt=lb) 14=162, 11=161.
11) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | W2 | Common | 3 | 1 | Job Reference (optional) |

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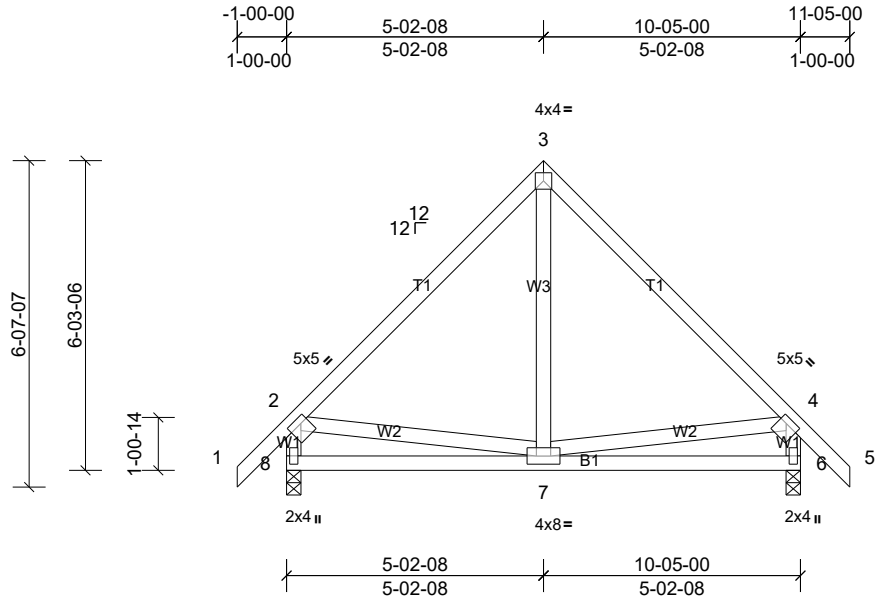


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.26 | Vert(LL) | -0.01 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.19 | Vert(TL) | -0.04 | 6-7 | >999 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.05 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 51 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x4 SPF No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 6=3-08, (min. 1-08), 8=3-08, (min. 1-08)
Max Horiz 8=-151 (LC 8)
Max Uplift 6=-17 (LC 11), 8=-17 (LC 10)
Max Grav 6=474 (LC 1), 8=474 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-380/79, 3-4=-380/79, 2-8=-429/108, 4-6=-429/108
BOT CHORD 7-8=-167/262

**NOTES**
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
5) All bearings are assumed to be SPF No.2 crushing capacity of 425 psi.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 17 lb uplift at joint 8 and 17 lb uplift at joint 6.
7) This truss is designed in accordance with the 2012 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 | |
|---|---|---|---|---|---|
| 21040572 | W3 | Common Girder | 1 | **2** | Job Reference (optional) |

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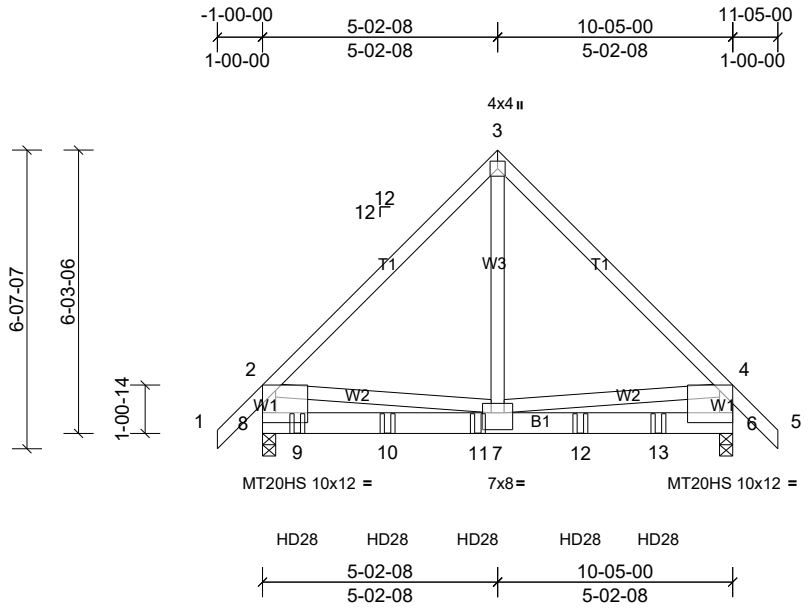


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| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.39 | Vert(LL) | -0.03 | 6-7 | >999 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.69 | Vert(TL) | -0.08 | 6-7 | >999 | 180 | MT20HS | 148/108 |
| BCLL | 0.0 * | Rep Stress Incr | NO | WB | 0.29 | Horiz(TL) | 0.00 | 6 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 127 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x4 SPF No.2
BOT CHORD 2x6 SP No.2
WEBS 2x4 SPF No.2

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

**REACTIONS** (size) 6=3-08, (min. 1-08), 8=3-08, (min. 1-10)
Max Horiz 8=149 (LC 7)
Max Grav 6=2504 (LC 16), 8=2728 (LC 1)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1996/0, 3-4=-1996/0, 2-8=-1671/0, 4-6=-1662/0
BOT CHORD 8-9=-135/669, 9-10=-135/669, 10-11=-135/669, 7-11=-135/669, 7-12=0/660, 12-13=0/660, 6-13=0/660
WEBS 3-7=0/2423, 2-7=0/918, 4-7=0/821

**NOTES**
1) Special connection required to distribute top chord loads equally between all plies.
2) Special connection required to distribute bottom chord loads equally between all plies.
3) Special connection required to distribute web loads equally between all plies.
4) 2-ply truss to be connected together with WS6 as follows:
Top chords connected as follows: 2x4 - 1 row at 1-00 oc.
Bottom chords connected as follows: 2x6 - 2 rows staggered at 1-00 oc.
Web connected as follows: 2x4 - 1 row at 1-00 oc.
5) 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.
6) Unbalanced roof live loads have been considered for this design.
7) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; 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
8) All plates are MT20 plates unless otherwise indicated.
9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
10) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
11) All bearings are assumed to be SP No.2 crushing capacity of 565 psi.
12) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.
13) Use USP HD28 (With 8-16d nails into Girder & 6-10d x 1-1/2 nails into Truss) or equivalent spaced at 2-3-4 oc max. starting at 0-9-4 from the left end to 8-9-4 to connect truss(es) to front face of bottom chord.
14) Fill all nail holes where hanger is in contact with lumber.

**LOAD CASE(S)** Standard
1) Dead + Roof Live (balanced): Lumber Increase=1.15, Plate Increase=1.15
Uniform Loads (lb/ft)
Vert: 1-2=-60, 2-3=-60, 3-4=-60, 4-5=-60, 6-8=-20
Concentrated Loads (lb)
Vert: 9=-812 (F), 10=-808 (F), 11=-885 (F), 12=-885 (F), 13=-885 (F)

| Job | Truss | Truss Type | Qty | Ply | |
|---|---|---|---|---|---|
| 21040572 | Z1 | Roof Special | 4 | 1 | Job Reference (optional) |

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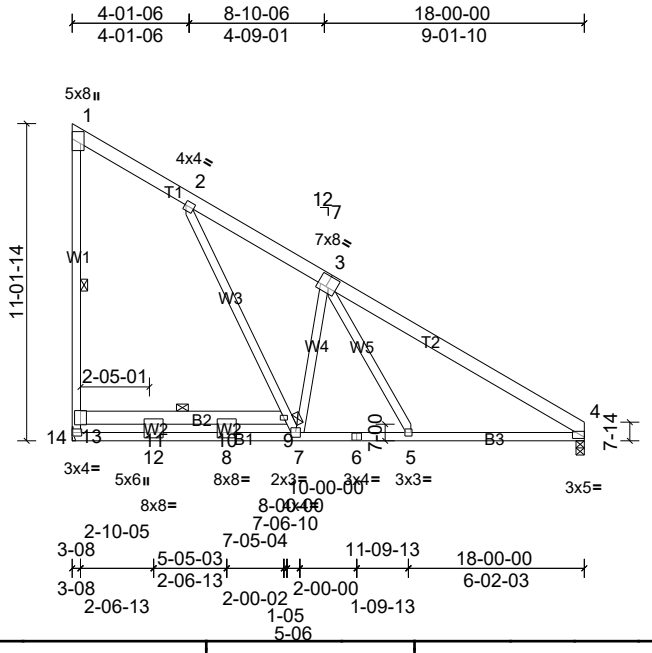


Scale = 1:81.3

| Loading | (psf) | Spacing | 2-00-00 | CSI | | DEFL | in | (loc) | l/defl | L/d | PLATES | GRIP |
|---|---|---|---|---|---|---|---|---|---|---|---|---|
| TCLL (roof) | 20.0 | Plate Grip DOL | 1.15 | TC | 0.93 | Vert(LL) | 0.31 | 5-7 | >688 | 240 | MT20 | 197/144 |
| TCDL | 10.0 | Lumber DOL | 1.15 | BC | 0.66 | Vert(TL) | -0.76 | 5-7 | >281 | 180 | | |
| BCLL | 0.0 * | Rep Stress Incr | YES | WB | 0.72 | Horiz(TL) | 0.01 | 4 | n/a | n/a | | |
| BCDL | 10.0 | Code | IRC2012/TPI2007 | Matrix-MSH | | | | | | | Weight: 112 lb | FT = 20% |

**LUMBER**
TOP CHORD 2x6 SP 2400F 2.0E *Except* 3-4:2x6 SPF No.2
BOT CHORD 2x4 SPF No.2 *Except* 13-9:2x6 SPF No.2
WEBS 2x4 SPF No.2

**BRACING**
TOP CHORD Structural wood sheathing directly applied or 5-1-1 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing. Except:
6-0-0 oc bracing: 9-13
WEBS 1 Row at midpt 1-14

**REACTIONS** (size) 4=3-08, (min. 1-08), 14= Mechanical, (min. 1-08)
Max Horiz 14=-327 (LC 8)
Max Uplift 14=-49 (LC 11)
Max Grav 4=745 (LC 1), 14=864 (LC 21)

**FORCES** (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 13-14=-796/72, 1-13=-625/145, 1-2=-98/298, 2-3=-928/198, 3-4=-1055/53
BOT CHORD 12-14=-37/434, 8-12=-37/434, 7-8=-37/434, 6-7=0/714, 5-6=0/714, 4-5=0/821, 11-13=-320/90, 10-11=-320/90, 9-10=-320/90
WEBS 2-9=-204/1134, 7-9=-198/898, 3-7=-1029/327, 3-5=0/281

**NOTES**
1) Wind: ASCE 7-10; Vult=115mph (3-second gust) V (IRC2012)=91mph; TCDL=6.0psf; BCDL=6.0psf; h=35ft; Cat. II; Exp B; Enclosed; MWFRS (envelope) exterior zone and C-C Exterior (2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
2) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
3) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-06-00 tall by 2-00-00 wide will fit between the bottom chord and any other members.
4) Bearings are assumed to be: , Joint 4 SPF No.2 crushing capacity of 425 psi.
5) Refer to girder(s) for truss to truss connections.
6) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 49 lb uplift at joint 14.
7) This truss is designed in accordance with the 2012 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.

**LOAD CASE(S)** Standard