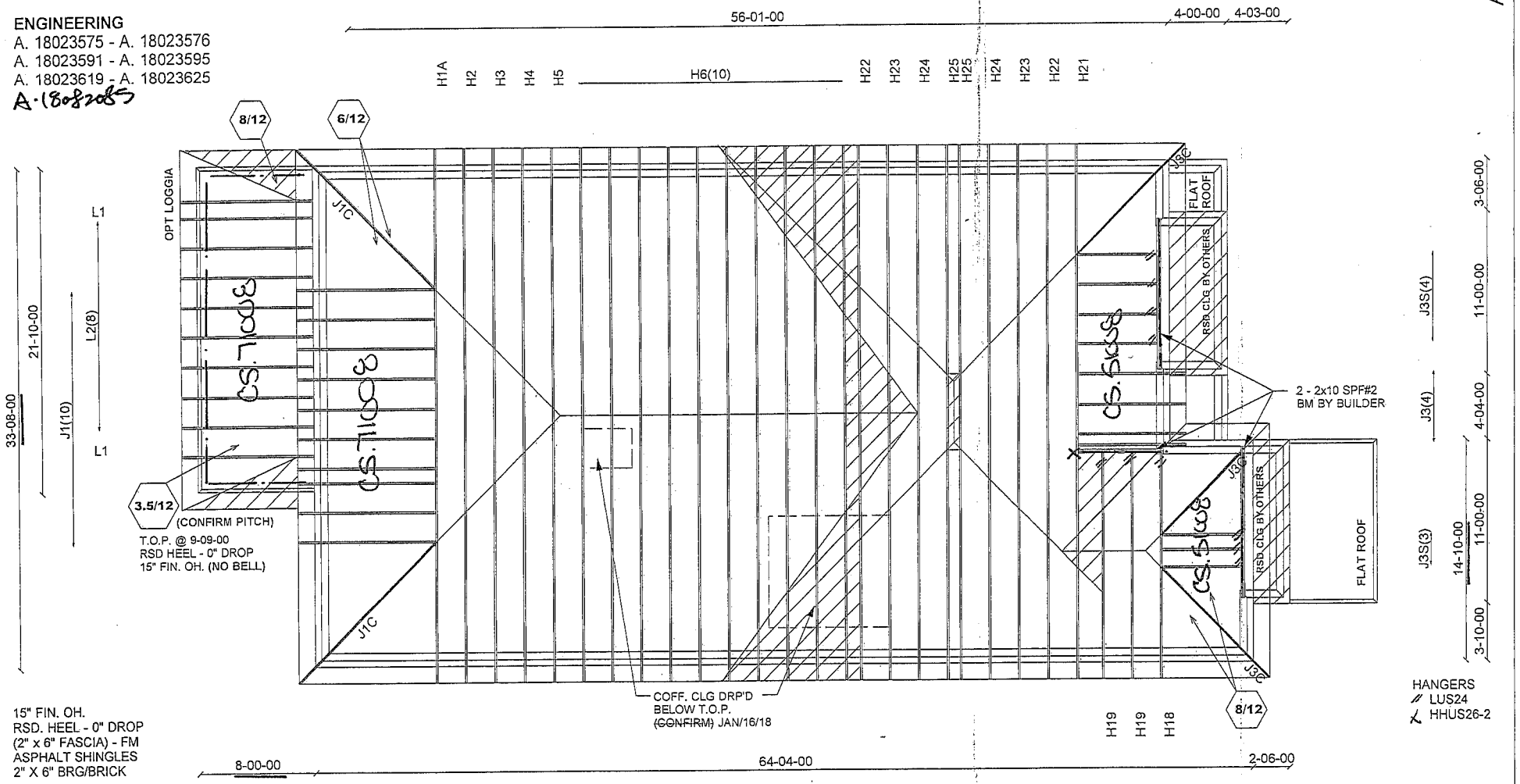
ALPA-BARRIE

ENGINEERING
A. 18023575 - A. 18023576
A. 18023591 - A. 18023595
A. 18023619 - A. 18023625
A-18082085



HANGERS
LUS24
HHUS26-2

15" FIN. OH.
RSD. HEEL - 0" DROP
(2" x 6" FASCIA) - FM
ASPHALT SHINGLES
2" X 6" BRG/BRICK

FORESTCREST

Mitek V. 8.2.0

ALL CONVENTIONAL FRAMING TO CONFORM WITH PART 9 O.B.C. LATEST EDITION. ROOF RAFTERS THAT CROSS OVER TRUSSES TO BE 2X4 SPF #2 @ 24" O.C WITH A VERT. POST TO THE TRUSS UNDERNEATH AT EACH CROSS POINT. VERT. POSTS LONGER THAN 6' TO HAVE LATERAL BRACING SO THAT THE DISTANCE BETWEEN END POINTS & BETWEEN ROWS OF BRACING DOES NOT EXCEED 6'

CONVENTIONAL FRAMING BY OTHERS

Job Track: 45147
Layout ID: 301044
Plan Log: 99352

Builder / Location: GOLD PARK HOMES / VAUGHAN

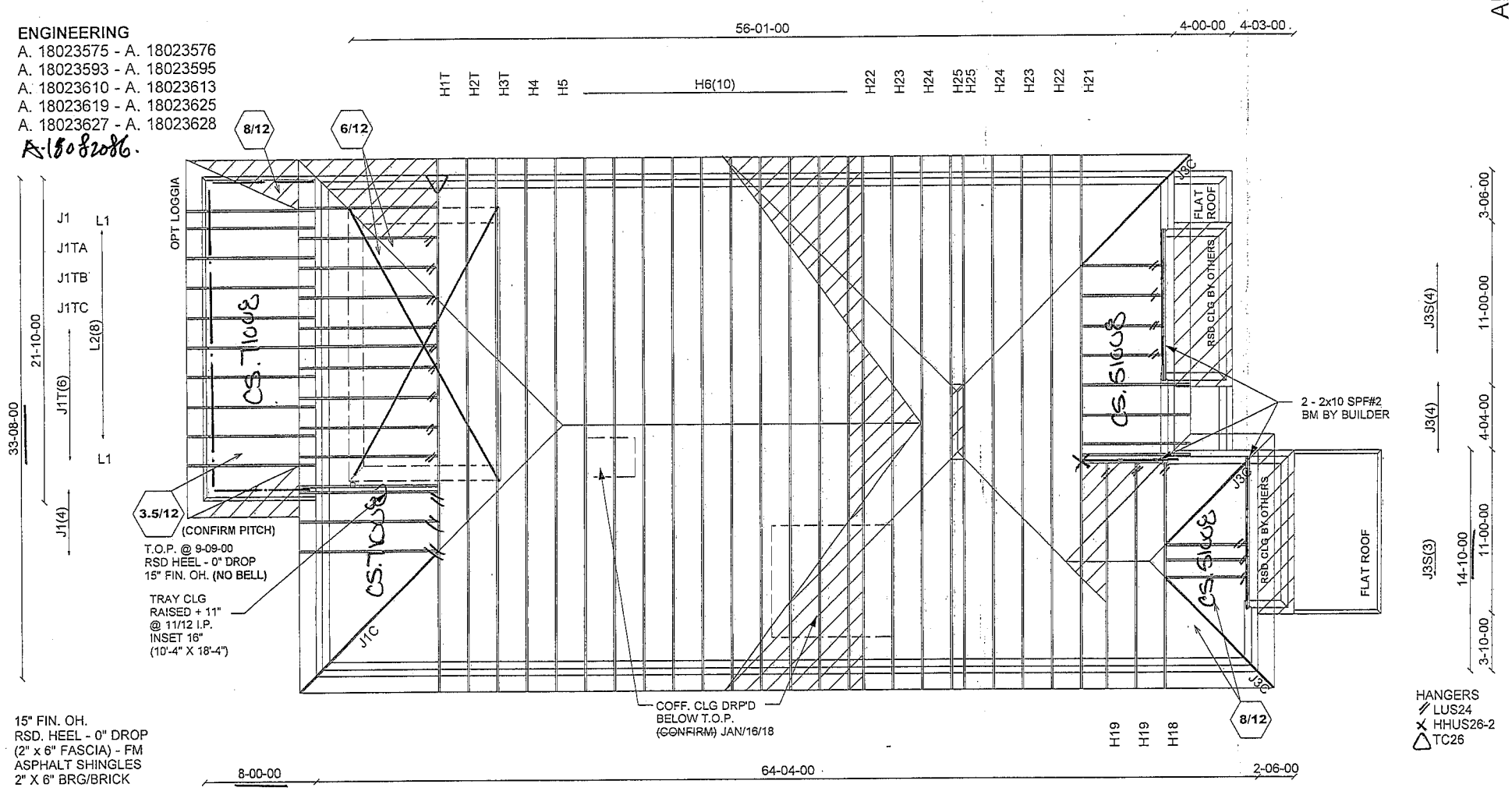
Model / Elevation: STD OR OPT 2ND FLR (SBED) OR OPT LOGGIA
4203 REV1 / C

Project: PINE VALLEY

Date: 8/14/2018 | Designer: AMANDA

ALPA-BARRIE

ENGINEERING
A. 18023575 - A. 18023576
A. 18023593 - A. 18023595
A. 18023610 - A. 18023613
A. 18023619 - A. 18023625
A. 18023627 - A. 18023628
A-18082086.



15" FIN. OH.
RSD. HEEL - 0" DROP
(2" x 6" FASCIA) - FM
ASPHALT SHINGLES
2" X 6" BRG/BRICK

HANGERS
// LUS24
X HHUS26-2
△ TC26

FORESTCREST

Mitek V. 8.2.0

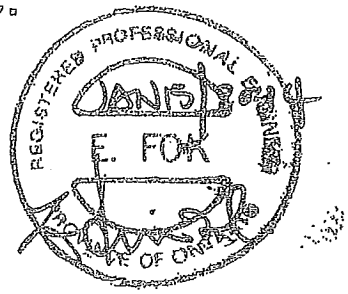
ALL CONVENTIONAL FRAMING TO CONFORM WITH PART 9 O.B.C. LATEST EDITION. ROOF RAFTERS THAT CROSS OVER TRUSSES TO BE 2X4 SPF #2 @ 24" O.C WITH A VERT. POST TO THE TRUSS UNDERNEATH AT EACH CROSS POINT. VERT. POSTS LONGER THAN 6' TO HAVE LATERAL BRACING SO THAT THE DISTANCE BETWEEN END POINTS & BETWEEN ROWS OF BRACING DOES NOT EXCEED 6'

CONVENTIONAL FRAMING BY OTHERS

Job Track: 45147	Builder / Location: GOLD PARK HOMES / VAUGHAN	Model / Elevation: 4203 REV2 / C OPT TRAY STD OR OPT 2ND FLR (5REQ) OR OPT LOGGIA	
ɔut ID: 301045	Project: PINE VALLEY		
Plan Log: 99353	Date: 8/14/2018	Designer: AMANDA	

Stracon Engineering Inc.

69 Graydon Crescent
Richmond Hill, Ontario
L4B 3W7
(905) 832-2250 Fax (905) 832-0286



RESPONSIBILITIES

1. Stracon Engineering Inc. is responsible for the design of trusses as individual components.
2. It is the responsibility of others to ascertain that the design loads utilized on this drawing meet or exceed the actual dead load imposed by the structure and the live load imposed by the local building code or the authorities with jurisdictions.
3. All dimensions are to be verified by owner contractor, architect or other authority before manufacture.
4. Stracon Engineering Inc. bears no responsibility for the erection of the trusses. Persons erecting trusses are cautioned to seek professional advice regarding temporary and permanent bracing system. Bracing shown on Stracon Engineering Inc. drawings is specified for the truss as a component only and forms an integral part of the truss design.
5. It is the truss manufacture's responsibility to ensure that trusses are manufactured in conformance with Stracon Engineering Inc. specifications outlined below.

SPECIFICATIONS

1. Trusses designed by Stracon Engineering Inc. conforms to the relevant section of the Ontario Building Code of Canada (Part 9 or Part 4) or to the Canadian code for farm buildings, whichever applies to the building type indicated on the drawings as well as to the procedures established by the truss plate institute of Canada. Unit stresses used are as per CSA-086-09.
2. Lumber is to be the sizes and grade specified.
3. Moisture content of lumber is not to exceed 19% in service unless otherwise specified.
4. Lumber not to be treated with chemicals unless otherwise specified.
5. Plates shall be applied to both faces of the truss at each joint and shall be positioned as specified.
6. The top chord is assumed to be continuously laterally braced by the roof sheathing or purlins at intervals not exceeding 12.5 times in thickness.
7. Where not rigid ceiling is attached directly to the bottom chord, laterally brace the chords at intervals not exceeding 3M (10') o.c.

January 15, 2014

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
301044	H1A	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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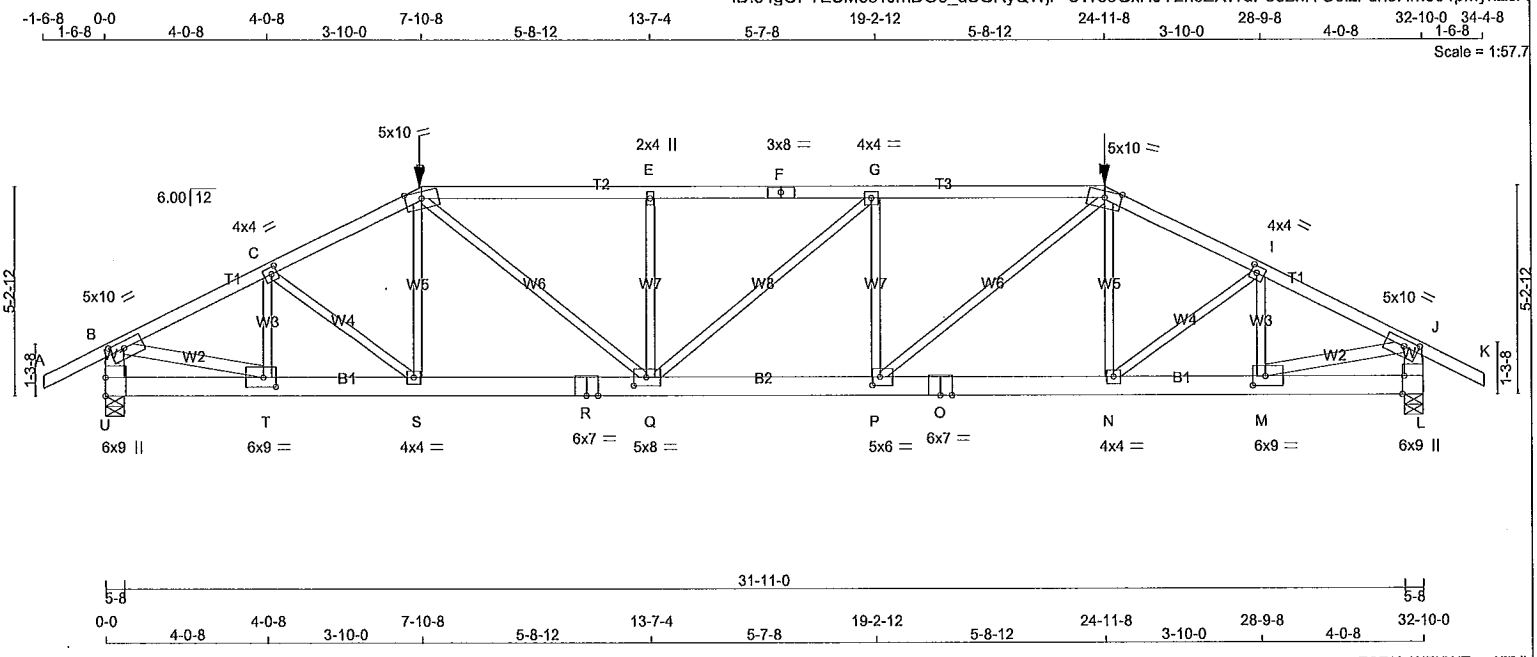


TOTAL WEIGHT = 157 lb

[M]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - F	2x4	DRY	2100F 1.8E	SPF
F - H	2x4	DRY	2100F 1.8E	SPF
H - K	2x4	DRY	No.2	SPF
U - B	2x6	DRY	No.2	SPF
L - J	2x6	DRY	No.2	SPF
U - R	2x6	DRY	1650F 1.5E	SPF
R - O	2x6	DRY	1650F 1.5E	SPF
O - L	2x6	DRY	1650F 1.5E	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF
B - T	2x4	DRY	No.2	SPF
M - J	2x4	DRY	No.2	SPF

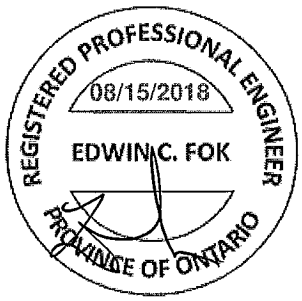
DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	5.0	10.0	2.00	4.25
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TTWW-m	MT20	5.0	10.0	Edge	
E	TMW+w	MT20	2.0	4.0		
F	TS-t	MT20	3.0	8.0		
G	TMWW-t	MT20	4.0	4.0		
H	TTWW-m	MT20	5.0	10.0	Edge	
I	TMWW-t	MT20	4.0	4.0	2.00	1.75
J	TMVW-t	MT20	5.0	10.0	2.00	4.25
L	BMV1+t	MT20	6.0	9.0	Edge	0.50
M	BMWW-t	MT20	6.0	9.0	2.75	3.75
N	BMWW-t	MT20	4.0	4.0		
O	BS-t	MT20	6.0	7.0		
P	BMWW-t	MT20	5.0	6.0	2.50	2.25
Q	BMWWW-t	MT20	5.0	8.0	2.50	3.75
R	BS-t	MT20	6.0	7.0		
S	BMWW-t	MT20	4.0	4.0		
T	BMWW-t	MT20	6.0	9.0	2.75	3.75
U	BMV1+t	MT20	6.0	9.0	5.50	

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

Note: Lateral brace(s) shown shall be 2x4 SPF#2.



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
U	3794	0	3794	0	0	5-8	5-8
L	3794	0	3794	0	0	5-8	5-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
U	2707	1639 / 0	0 / 0	0 / 0	0 / 0	1068 / 0	0 / 0
L	2707	1639 / 0	0 / 0	0 / 0	0 / 0	1068 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) U, L
BEARING SIZE FACTOR = 1.15 AT JNT(S) U, L (BASED ON SUPPORT DEPTH = 1-8)

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 2.32 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.16 (1)	10.00	T- C	-1024 / 0	0.20 (1)
B- C	-5256 / 0	-78.0	-78.0	0.63 (1)	2.57	C- S	0 / 645	0.16 (1)
C- D	-5853 / 0	-78.0	-78.0	0.70 (1)	2.32	S- D	0 / 226	0.09 (4)
D- E	-6872 / 0	-115.7	-115.7	0.77 (1)	2.82	D- Q	0 / 2169	0.54 (1)
E- F	-6872 / 0	-115.7	-115.7	0.77 (1)	2.81	Q- E	-703 / 0	0.28 (1)
F- G	-6872 / 0	-115.7	-115.7	0.77 (1)	2.81	Q- G	-12 / 0	0.01 (1)
G- H	-6881 / 0	-115.7	-115.7	0.79 (1)	2.80	P- G	-700 / 0	0.27 (1)
H- I	-5850 / 0	-78.0	-78.0	0.70 (1)	2.32	P- H	0 / 2184	0.54 (1)
I- J	-5256 / 0	-78.0	-78.0	0.63 (1)	2.57	N- H	0 / 223	0.09 (4)
J- K	0 / 28	-78.0	-78.0	0.16 (1)	10.00	N- I	0 / 641	0.16 (1)
U- B	-3661 / 0	0.0	0.0	0.26 (1)	5.54	M- I	-1021 / 0	0.20 (1)
L- J	-3661 / 0	0.0	0.0	0.26 (1)	5.54	B- T	0 / 4826	0.85 (1)
						M- J	0 / 4827	0.85 (1)
U- T	0 / 0	-45.7	-45.7	0.10 (1)	10.00			
T- S	0 / 4711	-45.7	-45.7	0.51 (1)	10.00			
S- R	0 / 5216	-122.4	-122.4	0.57 (1)	10.00			
R- Q	0 / 5216	-122.4	-122.4	0.57 (1)	10.00			
Q- P	0 / 6881	-122.4	-122.4	0.69 (1)	10.00			
P- O	0 / 5214	-122.4	-122.4	0.56 (1)	10.00			
O- N	0 / 5214	-122.4	-122.4	0.56 (1)	10.00			
N- M	0 / 4712	-45.7	-45.7	0.51 (1)	10.00			
M- L	0 / 0	-45.7	-45.7	0.10 (1)	10.00			

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
D	7-10-8	-652	-652	---	FRONT	VERT	TOTAL
H	24-11-8	-652	-652	---	FRONT	VERT	TOTAL

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF
	DL =	6.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.4	PSF
TOTAL LOAD	=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip
SIDE SETBACK = 7-10-8
END SETBACK = 7-10-8
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: PARTIAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.27")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 742 (0.53")

CSI: TC=0.79/1.00 (G-H:1) , BC=0.69/1.00 (P-Q:1) , WB=0.85/1.00 (J-M:1) , SSI=0.34/1.00 (G-H:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE HEELS OFF

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (F) (INPUT = 0.90)
JSI METAL= 0.86 (R) (INPUT = 1.00)

A-18082085

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
301045	H1T	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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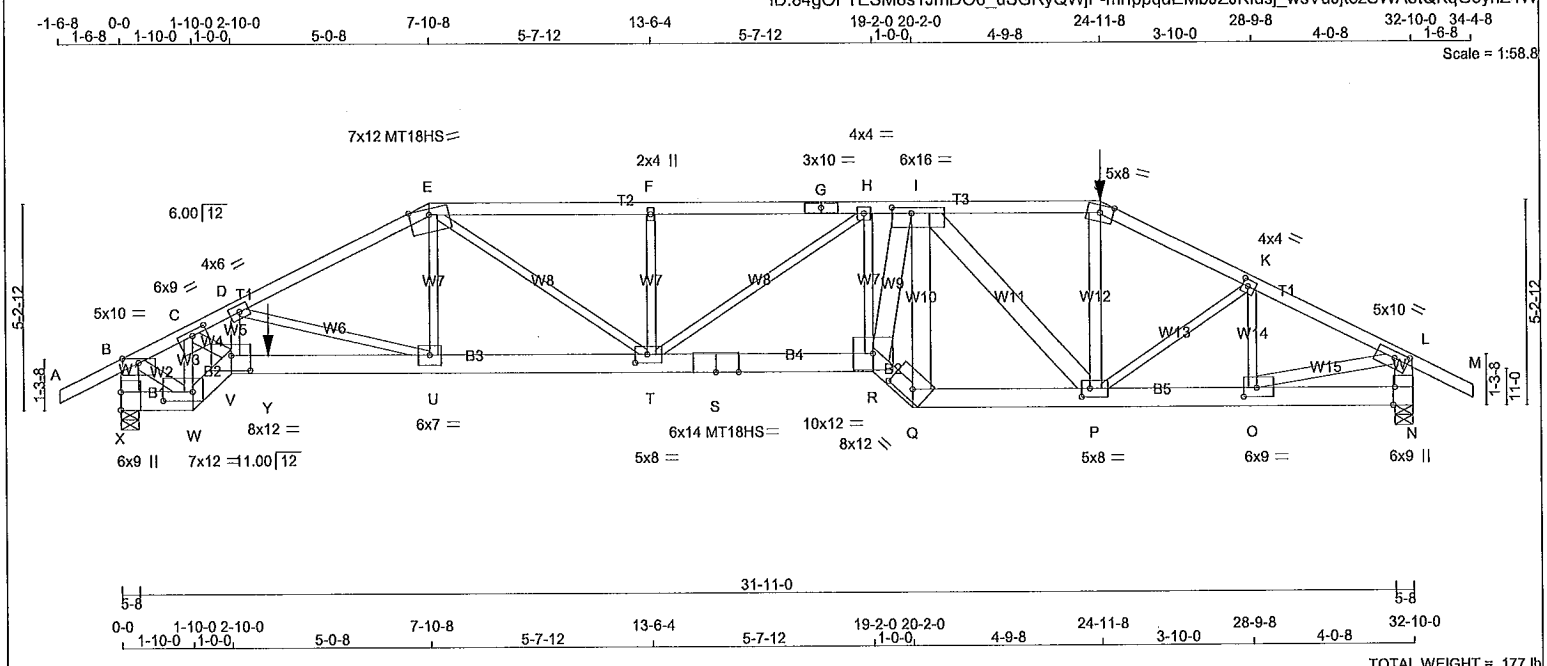


[M]

LUMBER

N. L. G. A. RULES

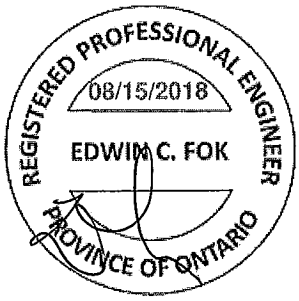
CHORDS	SIZE		LUMBER	DESCR.
A - E	2x4	DRY	2100F 1.8E	SPF
E - G	2x4	DRY	2100F 1.8E	SPF
G - J	2x4	DRY	2100F 1.8E	SPF
J - M	2x4	DRY	2100F 1.8E	SPF
X - B	2x6	DRY	No.2	SPF
N - L	2x6	DRY	No.2	SPF
X - W	2x6	DRY	No.2	SPF
W - V	2x6	DRY	1650F 1.5E	SPF
V - S	2x6	DRY	1650F 1.5E	SPF
S - R	2x6	DRY	1650F 1.5E	SPF
R - Q	2x6	DRY	1650F 1.5E	SPF
Q - N	2x6	DRY	1650F 1.5E	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF
C - V	2x4	DRY	No.2	SPF
R - I	2x6	DRY	No.2	SPF
Q - I	2x6	DRY	No.2	SPF
I - P	2x6	DRY	No.2	SPF
P - J	2x4	DRY	No.2	SPF
B - W	2x4	DRY	No.2	SPF
O - L	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-p	MT20	5.0	10.0	Edge	
C	TMWW-t	MT20	6.0	9.0	1.50	4.50
D	TMWW-t	MT20	4.0	6.0		
E	TTWW-m	MT18HS	7.0	12.0	Edge	
F	TMW+w	MT20	2.0	4.0		
G	TS-t	MT20	3.0	10.0		
H	TMWW-t	MT20	4.0	4.0		
I	TMWWW-t	MT20	6.0	16.0	1.75	6.00
J	TTW-m	MT20	5.0	8.0	Edge	
K	TMWW-t	MT20	4.0	4.0	2.00	1.75
L	TMVW-t	MT20	5.0	10.0	2.00	4.25
N	BMV1+t	MT20	6.0	9.0	Edge	0.50
O	BMWW-t	MT20	6.0	9.0	2.75	4.00
P	BMWWW-t	MT20	5.0	8.0	2.50	2.50

Note: Lateral brace(s) shown shall be 2x4 SPF#2.



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
X	4080	0	4080	0	0	5-8	5-8
N	3762	0	3762	0	0	5-8	5-8

ALLOW FOR 0.3" OF HORIZONTAL MOVEMENT DUE TO TOTAL LOAD

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
X	2905	1793 / 0	0 / 0	0 / 0	0 / 0	1112 / 0	0 / 0
N	2686	1618 / 0	0 / 0	0 / 0	0 / 0	1068 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) X, N

BEARING SIZE FACTOR = 1.15 AT JNT(S) X, N (BASED ON SUPPORT DEPTH = 1-8)

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 2.53 FT.

MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS

MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC	MAX CSI	MAX. UNBRAC LENGTH
A- B	0 / 28	-78.0	-78.0	0.10 (1)		10.00
B- C	-4346 / 0	-78.0	-78.0	0.28 (1)		3.90
C- D	-8749 / 0	-78.0	-78.0	0.51 (1)		2.53
D- E	-7127 / 0	-78.0	-78.0	0.60 (1)		2.94
E- F	-8334 / 0	-78.0	-78.0	0.80 (1)		2.58
F- G	-8334 / 0	-78.0	-78.0	0.79 (1)		2.58
G- H	-8334 / 0	-78.0	-78.0	0.79 (1)		2.58
H- I	-8357 / 0	-115.7	-115.7	0.52 (1)		2.59
I- J	-5197 / 0	-115.7	-115.7	0.40 (1)		3.53
J- K	-5773 / 0	-78.0	-78.0	0.28 (1)		3.49
K- L	-5227 / 0	-78.0	-78.0	0.27 (1)		3.66
L- M	0 / 28	-78.0	-78.0	0.10 (1)		10.00
X- B	-4063 / 0	0.0	0.0	0.29 (1)		5.28
N- L	-3644 / 0	0.0	0.0	0.26 (1)		5.55
X- W	0 / 0	-18.5	-18.5	0.01 (4)		10.00
W- V	0 / 4770	-18.5	-18.5	0.39 (1)		10.00
V- Y	0 / 7857	-18.5	-18.5	0.95 (1)		10.00
Y- U	0 / 7857	-160.2	-160.2	0.95 (1)		10.00
U- T	0 / 6404	-160.2	-160.2	0.81 (1)		10.00
T- S	0 / 8362	-160.2	-160.2	0.91 (1)		10.00
S- R	0 / 8362	-160.2	-160.2	0.91 (1)		10.00
R- Q	0 / 8585	-122.4	-122.4	0.71 (1)		10.00
Q- P	0 / 6587	-122.4	-122.4	0.68 (1)		10.00
P- O	0 / 4684	-45.7	-45.7	0.44 (1)		10.00
O- N	0 / 0	-45.7	-45.7	0.08 (4)		10.00

WEBS

MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI
W- C	-4994 / 0	0.81 (1)
C- V	0 / 5442	0.96 (1)
V- D	0 / 729	0.18 (1)
D- U	-1552 / 0	0.74 (1)
U- E	0 / 1479	0.37 (1)
E- T	0 / 2350	0.58 (1)
T- F	-499 / 0	0.14 (1)
T- H	-32 / 9	0.03 (1)
R- H	-102 / 0	0.03 (1)
R- I	0 / 6744	0.88 (1)
Q- I	-5429 / 0	0.97 (1)
I- P	-2065 / 0	0.69 (1)
P- J	0 / 1585	0.28 (1)
P- K	0 / 577	0.14 (1)
O- K	-940 / 0	0.19 (1)
B- W	0 / 4216	0.75 (1)
O- L	0 / 4799	0.85 (1)

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
J	24-11-8	-652	-652	—	FRONT	VERT	TOTAL
Y	3-9-4	-562	-562	—	FRONT	VERT	TOTAL

DESIGN CRITERIA

*** SPECIAL LOADS ANALYSIS ***
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.
LOADS WERE DERIVED FROM USER INPUT
NO FURTHER MODIFICATIONS WERE MADE

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CStdGirder
START DISTANCE = 3-9-4
START SPAN CARRIED = 7-10-8
END DISTANCE = 19-2-0
END SPAN CARRIED = 7-10-8
END WALL WIDTH = 0-0
APPLIED TO FRONT SIDE OF BOTTOM CHORD.
- ADDT'L LOADS BASED ON 55 % OF GSL.

GIRDER TYPE: CPrimeHip
SIDE SETBACK = 7-10-8
END SETBACK = 7-10-8
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: PARTIAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.
LOADS APPLIED TO FIRST 13-8-0 OF SPAN MEASURED FROM THE RIGHT.

*** NON STANDARD GIRDER ***
ADDT'L USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.38")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 521 (0.76")

CSI: TC=0.80/1.00 (E-F:1) , BC=0.95/1.00 (U-V:1) , WB=0.97/1.00 (I-Q:1) , SSI=0.43/1.00 (U-V:1)

A-18082086

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
301045	H1T	1	1	TRUSS DESC.	

PLATES (table is in inches)

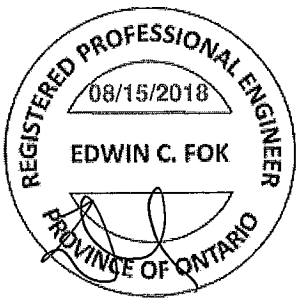
JT	TYPE	PLATES	W	LEN	Y	X
Q	BBW-h	MT20	8.0	12.0	3.00	7.25
R	BBWW-l	MT20	10.0	12.0		
S	BS-t	MT18HS	6.0	14.0		
T	BMWWW-t	MT20	5.0	8.0	2.50	3.75
U	BMWW-t	MT20	6.0	7.0		
V	BBWW-l	MT20	8.0	12.0	4.50	5.75
W	BBWW-l	MT20	7.0	12.0	2.75	9.00
X	BMV1+t	MT20	6.0	9.0	5.50	

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

HANGERS NOTES

1) SPECIAL HANGER(S) OR CONNECTION(S) REQUIRED TO SUPPORT CONCENTRATED LOAD(S) 652.4 lbs FACTORED DOWN AT 24-11-8 ON TOP CHORD, AND 562.4 lbs FACTORED DOWN AT 3-9-4 ON BOTTOM CHORD. DESIGN FOR UNSPECIFIED CONNECTION(S) IS DELEGATED TO THE BUILDING DESIGNER.

Note: Lateral brace(s) shown shall be 2x4 SPF#2.



DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE HEELS OFF

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

NAIL VALUES

PLATE	GRIP(DRY) (PSI)		SHEAR (PLI)		SECTION (PLI)	
	MAX	MIN	MAX	MIN	MAX	MIN
MT18HS	511	354	2455	1382	3004	2010
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (C) (INPUT = 0.90)
JSI METAL= 0.91 (V) (INPUT = 1.00)

A: 180820986(2)

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292612	H3T	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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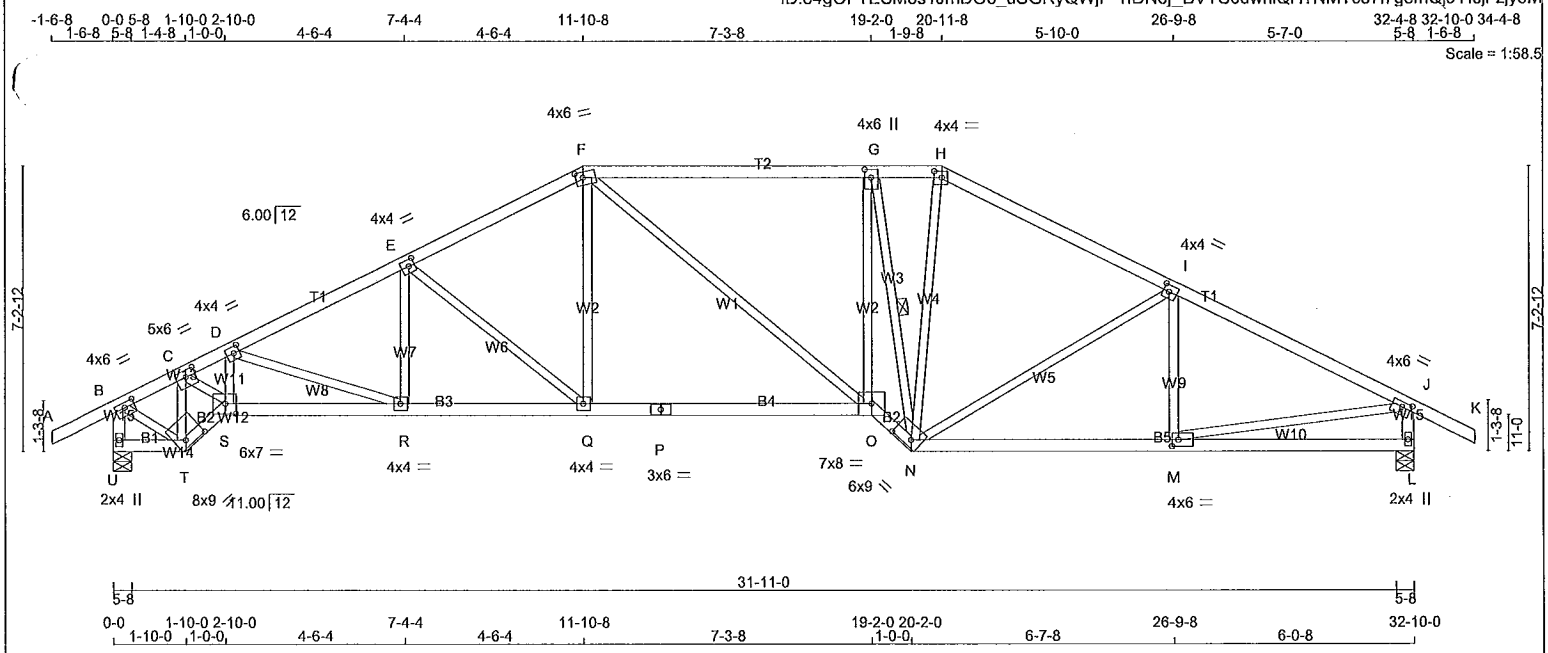


TOTAL WEIGHT = 142 lb [M][F]

LUMBER
N. L. G. A. RULES

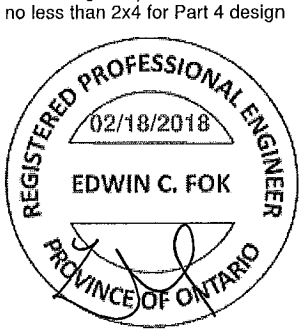
CHORDS	SIZE		LUMBER	DESCR.
A - F	2x4	DRY	No.2	SPF
F - H	2x4	DRY	No.2	SPF
H - K	2x4	DRY	No.2	SPF
U - B	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
U - T	2x4	DRY	No.2	SPF
T - S	2x4	DRY	No.2	SPF
S - P	2x4	DRY	No.2	SPF
P - O	2x4	DRY	No.2	SPF
[illegible] N	2x4	DRY	No.2	SPF
[illegible]	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	3.00
C	TMWW-t	MT20	5.0	6.0	2.00	3.00
D, E, I						
D	TMWW-t	MT20	4.0	4.0	2.00	1.75
F	TTWW-m	MT20	4.0	6.0	1.75	2.25
G	TMWW+t	MT20	4.0	6.0	2.50	2.00
H	TTW-I	MT20	4.0	4.0	2.00	2.25
J	TMVW-t	MT20	4.0	6.0	1.50	2.75
L	BMV1+p	MT20	2.0	4.0		
M	BMWW-t	MT20	4.0	6.0	2.00	1.75
N	BBWWW-h	MT20	6.0	9.0	2.00	6.00
O	BBWW-I	MT20	7.0	8.0		
P	BS-t	MT20	3.0	6.0		
Q	BMWW-t	MT20	4.0	4.0		
R	BMWW-t	MT20	4.0	4.0		
S	BBWW-I	MT20	6.0	7.0	3.00	3.25
T	BBWW-h	MT20	8.0	9.0	2.00	6.00
U	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
U	1712	0	1712	0	0	5-8	2-9
L	1706	0	1706	0	0	5-8	2-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
U	1218	758 / 0	0 / 0	0 / 0	0 / 0	460 / 0	0 / 0
L	1214	755 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) U, L

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.88 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF G-N.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD LC1 (PLF) FROM	TO	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	T- C	-1854 / 0	0.28 (1)
B- C	-1579 / 0	-78.0	-78.0	0.13 (1)	5.14	C- S	0 / 1943	0.44 (1)
C- D	-3055 / 0	-78.0	-78.0	0.17 (1)	3.88	S- D	-5 / 48	0.02 (4)
D- E	-2716 / 0	-78.0	-78.0	0.28 (1)	4.00	D- R	-349 / 0	0.13 (1)
E- F	-2245 / 0	-78.0	-78.0	0.25 (1)	4.36	R- E	0 / 170	0.04 (4)
F- G	-2158 / 0	-78.0	-78.0	0.62 (1)	3.97	E- Q	-578 / 0	0.35 (1)
G- H	-1798 / 0	-78.0	-78.0	0.42 (1)	4.50	Q- F	0 / 491	0.11 (1)
H- I	-1932 / 0	-78.0	-78.0	0.41 (1)	4.44	F- O	0 / 204	0.05 (1)
I- J	-2261 / 0	-78.0	-78.0	0.45 (1)	4.13	O- G	0 / 1896	0.43 (1)
J- K	0 / 28	-78.0	-78.0	0.14 (1)	10.00	G- N	-2528 / 0	0.83 (1)
U- B	-1695 / 0	0.0	0.0	0.17 (1)	6.38	N- H	0 / 830	0.19 (1)
L- J	-1662 / 0	0.0	0.0	0.17 (1)	6.43	N- I	-395 / 0	0.47 (1)
						M- I	-201 / 29	0.06 (1)
U- T	0 / 0	-18.5	-18.5	0.02 (4)	10.00	B- T	0 / 1548	0.35 (1)
T- S	0 / 1718	-18.5	-18.5	0.28 (1)	10.00	M- J	0 / 2070	0.47 (1)
S- R	0 / 2770	-18.5	-18.5	0.50 (1)	10.00			
R- Q	0 / 2441	-18.5	-18.5	0.50 (1)	10.00			
Q- P	0 / 2000	-18.5	-18.5	0.43 (1)	10.00			
P- O	0 / 2000	-18.5	-18.5	0.43 (1)	10.00			
O- N	0 / 2891	-18.5	-18.5	0.47 (1)	10.00			
N- M	0 / 2043	-18.5	-18.5	0.42 (1)	10.00			
M- L	0 / 0	-18.5	-18.5	0.20 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.17")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.38")

CSI: TC=0.62/1.00 (F-G:1) , BC=0.50/1.00 (R-S:1) , WB=0.83/1.00 (G-N:1) , SSI=0.26/1.00 (F-G:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (M) (INPUT = 0.90)
JSI METAL= 0.62 (P) (INPUT = 1.00)

A-18023628

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JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292612	H2T	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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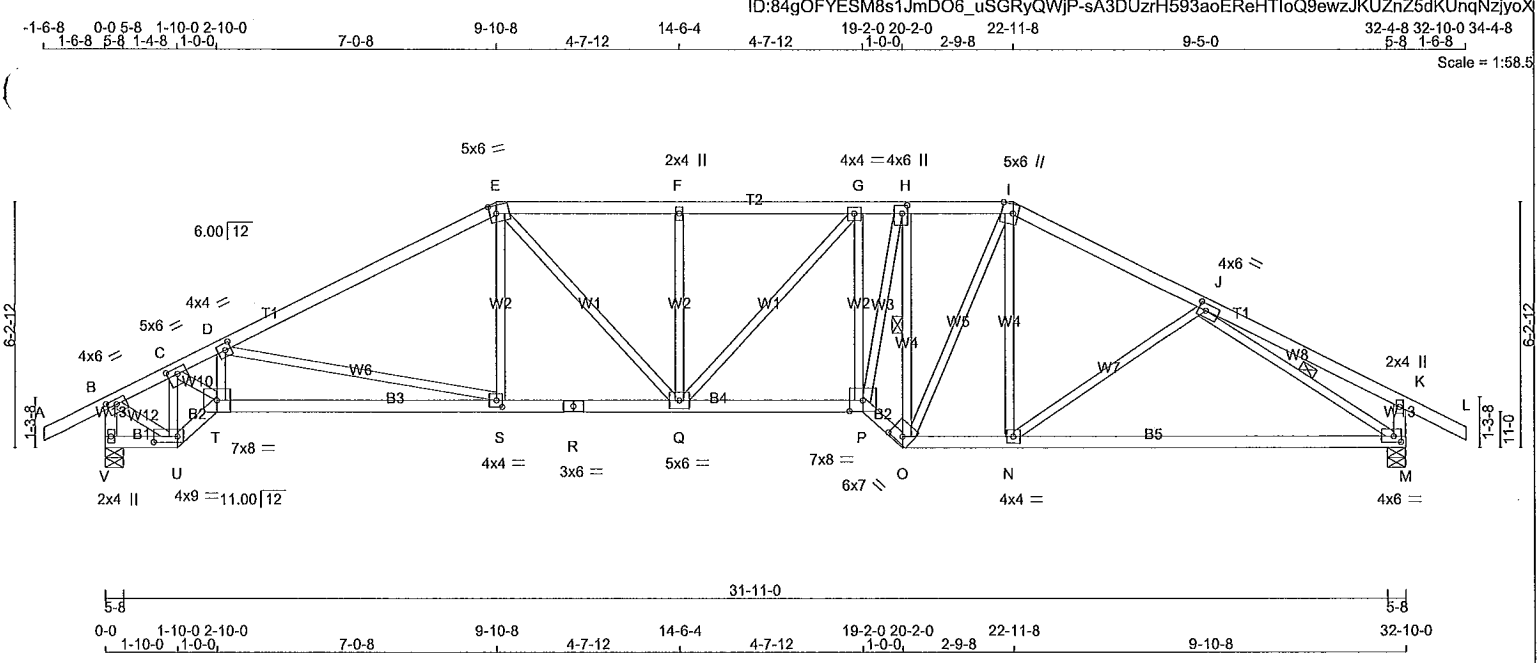


TOTAL WEIGHT = 145 lb

[M][F]

LUMBER

N. L. G. A. RULES

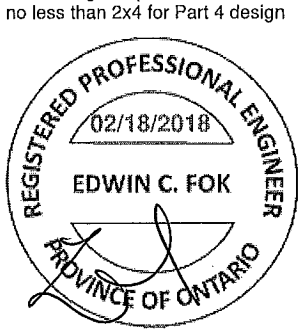
CHORDS	SIZE		LUMBER	DESCR.
A - E	2x4	DRY	No.2	SPF
E - I	2x4	DRY	No.2	SPF
I - L	2x4	DRY	No.2	SPF
V - B	2x4	DRY	No.2	SPF
M - K	2x4	DRY	No.2	SPF
V - U	2x4	DRY	No.2	SPF
U - T	2x4	DRY	No.2	SPF
T - R	2x4	DRY	No.2	SPF
R - P	2x4	DRY	No.2	SPF
P - O	2x4	DRY	No.2	SPF
O - N	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	3.00
C	TMWW-t	MT20	5.0	6.0	1.75	3.00
D	TMWW-t	MT20	4.0	4.0	2.00	1.75
E	TTWW-m	MT20	5.0	6.0	2.50	2.00
F	TMW+w	MT20	2.0	4.0		
G	TMWW-t	MT20	4.0	4.0		
H	TMWW+t	MT20	4.0	6.0	2.50	1.50
I	TTWW+m	MT20	5.0	6.0	Edge	3.50
J	TMWW-t	MT20	4.0	6.0	2.00	2.25
K	TMV+p	MT20	2.0	4.0		
M	BMVW1-t	MT20	4.0	6.0	1.75	2.25
N	BMWW-t	MT20	4.0	4.0		
O	BBWW-h	MT20	6.0	7.0	2.00	4.00
P	BBWW-l	MT20	7.0	8.0	3.25	4.00
Q	BMWWW-t	MT20	5.0	6.0		
R	BS-t	MT20	3.0	6.0		
S	BMWW-t	MT20	4.0	4.0	2.00	1.75
T	BBWW-l	MT20	7.0	8.0		
U	BBWW-l	MT20	4.0	9.0	1.75	7.25
V	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
V	1712	0	1712	0	0	5-8	2-9
M	1706	0	1706	0	0	5-8	1-14

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
V	1218	758 / 0	0 / 0	0 / 0	0 / 0	460 / 0	0 / 0
M	1214	755 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) V, M

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.48 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF H-O, J-M.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00
B- C	-1558 / 0	-78.0	-78.0	0.16 (1)	5.13
C- D	-3132 / 0	-78.0	-78.0	0.46 (1)	3.48
D- E	-2460 / 0	-78.0	-78.0	0.61 (1)	3.83
E- F	-2582 / 0	-78.0	-78.0	0.28 (1)	4.08
F- G	-2582 / 0	-78.0	-78.0	0.28 (1)	4.08
G- H	-2525 / 0	-78.0	-78.0	0.11 (1)	4.28
H- I	-2087 / 0	-78.0	-78.0	0.11 (1)	4.63
I- J	-2107 / 0	-78.0	-78.0	0.29 (1)	4.43
J- K	0 / 19	-78.0	-78.0	0.29 (1)	10.00
K- L	0 / 28	-78.0	-78.0	0.14 (1)	10.00
V- B	-1695 / 0	0.0	0.0	0.17 (1)	6.38
M- K	-281 / 0	0.0	0.0	0.03 (1)	7.81
V- U	0 / 0	-18.5	-18.5	0.02 (4)	10.00
U- T	0 / 1677	-18.5	-18.5	0.27 (1)	10.00
T- S	0 / 2974	-18.5	-18.5	0.59 (1)	10.00
S- R	0 / 2185	-18.5	-18.5	0.46 (1)	10.00
R- Q	0 / 2185	-18.5	-18.5	0.46 (1)	10.00
Q- P	0 / 2530	-18.5	-18.5	0.47 (1)	10.00
P- O	0 / 2775	-18.5	-18.5	0.45 (1)	10.00
O- N	0 / 1869	-18.5	-18.5	0.61 (4)	10.00
N- M	0 / 1944	-18.5	-18.5	0.60 (4)	10.00

WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
U- C	-1809 / 0	0.27 (1)
C- T	0 / 2228	0.50 (1)
T- D	-204 / 20	0.03 (1)
D- S	-814 / 0	0.84 (1)
S- E	0 / 297	0.07 (4)
E- Q	0 / 584	0.13 (1)
Q- F	-427 / 0	0.18 (1)
Q- G	0 / 78	0.02 (1)
P- G	-233 / 0	0.10 (1)
P- H	0 / 2224	0.50 (1)
O- H	-2346 / 0	0.60 (1)
O- I	0 / 508	0.11 (1)
N- I	0 / 236	0.07 (4)
N- J	-97 / 39	0.06 (1)
B- U	0 / 1511	0.34 (1)
J- M	-2367 / 0	0.63 (1)

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF
	DL =	6.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.4	PSF
TOTAL LOAD	=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.18")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.38")

CSI: TC=0.61/1.00 (D-E:1) , BC=0.61/1.00 (N-O:4) , WB=0.84/1.00 (D-S:1) , SSI=0.31/1.00 (C-D:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE LEFT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (U) (INPUT = 0.90)
JSI METAL= 0.63 (R) (INPUT = 1.00)

A-18023627

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H25	2	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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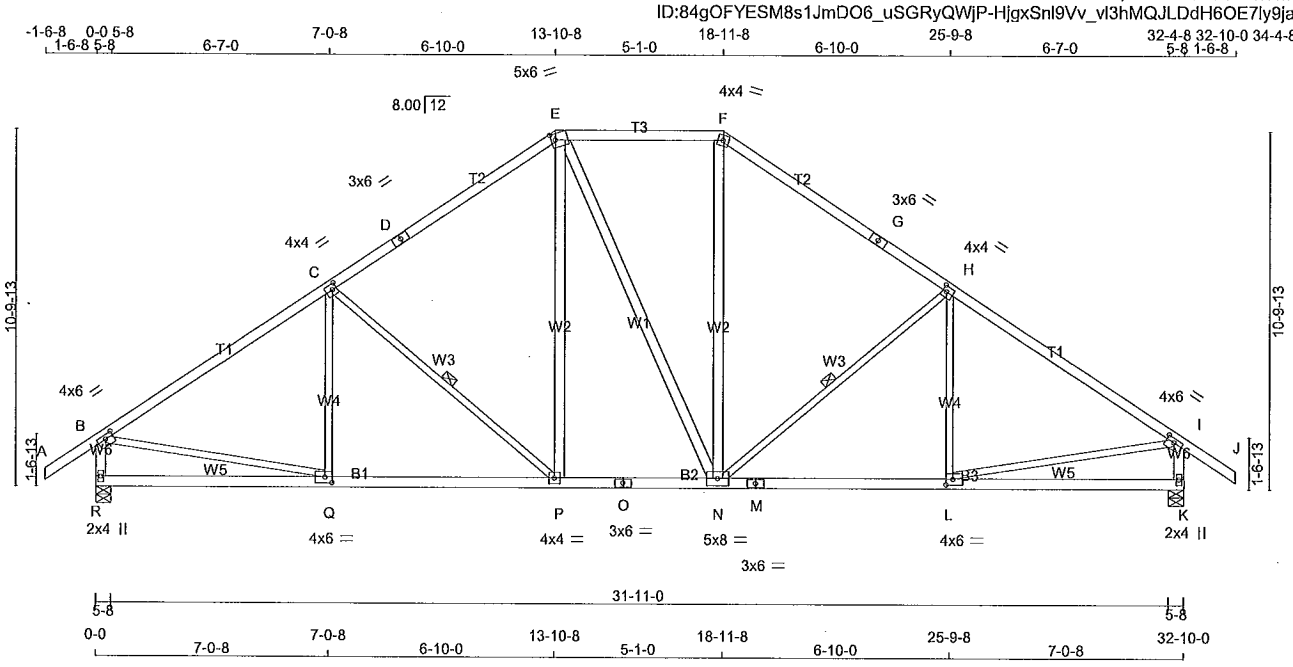


TOTAL WEIGHT = 2 X 159 = 318 lb

[M][F]

LUMBER

N. L. G. A. RULES

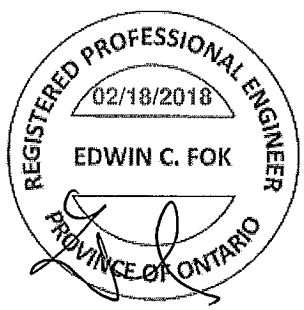
CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
E - F	2x4	DRY	No.2	SPF
F - G	2x4	DRY	No.2	SPF
G - J	2x4	DRY	No.2	SPF
R - B	2x4	DRY	No.2	SPF
K - I	2x4	DRY	No.2	SPF
R - O	2x4	DRY	No.2	SPF
O - M	2x4	DRY	No.2	SPF
M - K	2x4	DRY	No.2	SPF
WEBS EXCEPT	2x3	DRY	No.2	SPF
P - E	2x4	DRY	No.2	SPF
E - N	2x4	DRY	No.2	SPF
N - F	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	3.00
C	TMWW-t	MT20	4.0	4.0	2.00	1.50
D	TS-t	MT20	3.0	6.0		
E	TTWW-m	MT20	5.0	6.0	2.25	1.50
F	TTW-m	MT20	4.0	4.0		
G	TS-t	MT20	3.0	6.0		
H	TMWW-t	MT20	4.0	4.0	2.00	1.50
I	TMVW-t	MT20	4.0	6.0	1.50	3.00
K	BMV1+p	MT20	2.0	4.0		
L	BMWW-t	MT20	4.0	6.0	2.00	2.50
M	BS-t	MT20	3.0	6.0		
N	BMWWW-t	MT20	5.0	8.0		
O	BS-t	MT20	3.0	6.0		
P	BMWW-t	MT20	4.0	4.0		
Q	BMWW-t	MT20	4.0	6.0	2.00	2.50
R	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
R	1710	0	1710	0	0	5-8	2-9
K	1710	0	1710	0	0	5-8	2-9

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
R	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
K	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) R, K

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.26 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF C-P, H-N.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 35	-78.0	-78.0	0.15 (1)	10.00	Q- C	-129 / 61	0.08 (1)
B- C	-1847 / 0	-78.0	-78.0	0.63 (1)	4.26	C- P	-473 / 0	0.28 (1)
C- D	-1489 / 0	-78.0	-78.0	0.57 (1)	4.70	P- E	0 / 409	0.07 (1)
D- E	-1489 / 0	-78.0	-78.0	0.57 (1)	4.70	E- N	0 / 1	0.00 (1)
E- F	-1213 / 0	-78.0	-78.0	0.28 (1)	5.50	N- F	0 / 410	0.07 (1)
F- G	-1489 / 0	-78.0	-78.0	0.57 (1)	4.70	N- H	-472 / 0	0.27 (1)
G- H	-1489 / 0	-78.0	-78.0	0.57 (1)	4.70	L- H	-130 / 60	0.08 (1)
H- I	-1847 / 0	-78.0	-78.0	0.63 (1)	4.26	B- Q	0 / 1591	0.36 (1)
I- J	0 / 35	-78.0	-78.0	0.15 (1)	10.00	L- I	0 / 1591	0.36 (1)
R- B	-1658 / 0	0.0	0.0	0.17 (1)	6.44			
K- I	-1657 / 0	0.0	0.0	0.17 (1)	6.44			
R- Q	0 / 0	-18.5	-18.5	0.23 (4)	10.00			
Q- P	0 / 1567	-18.5	-18.5	0.38 (4)	10.00			
P- O	0 / 1212	-18.5	-18.5	0.27 (1)	10.00			
O- N	0 / 1212	-18.5	-18.5	0.27 (1)	10.00			
N- M	0 / 1567	-18.5	-18.5	0.38 (4)	10.00			
M- L	0 / 1567	-18.5	-18.5	0.38 (4)	10.00			
L- K	0 / 0	-18.5	-18.5	0.23 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.06")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.15")

CSI: TC=0.63/1.00 (B-C:1) , BC=0.38/1.00 (P-Q:4) , WB=0.36/1.00 (B-Q:1) , SSI=0.22/1.00 (H-I:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT.

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.87 (Q) (INPUT = 0.90)
JSI METAL= 0.52 (B) (INPUT = 1.00)

A-18023625

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H24	2	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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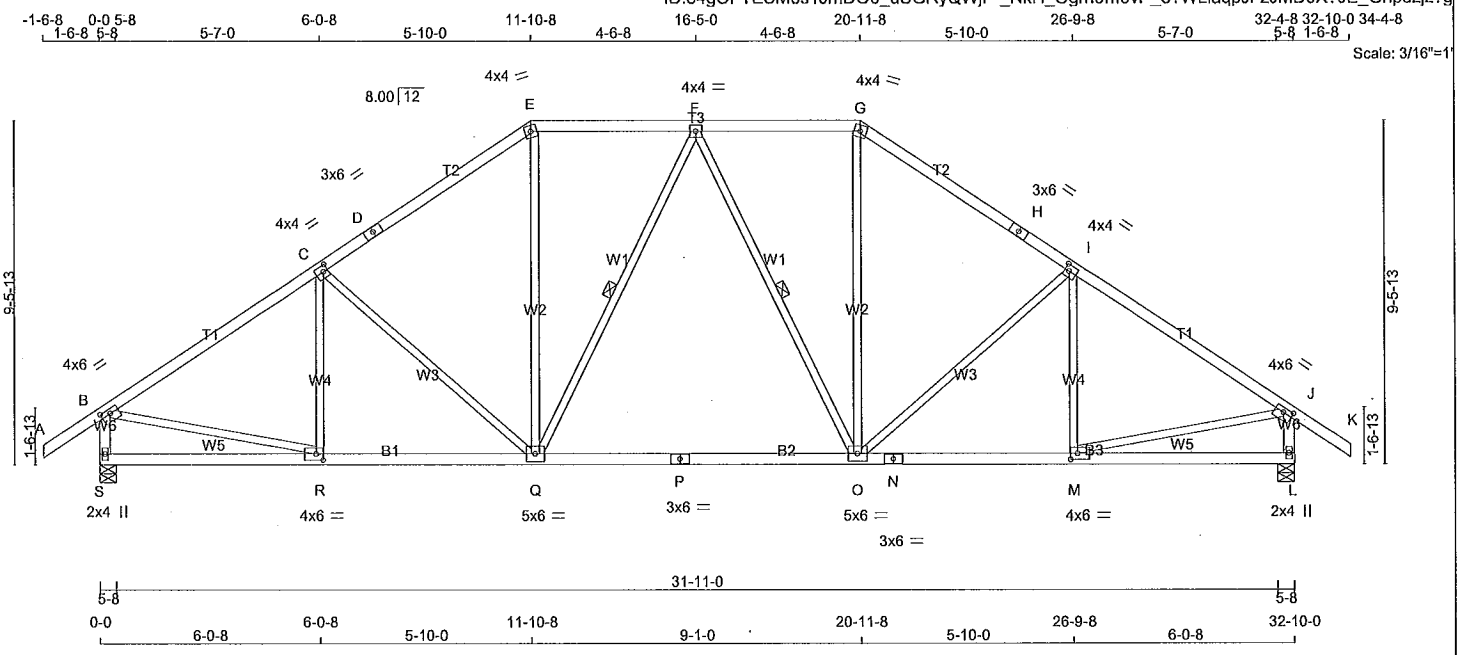


TOTAL WEIGHT = 2 X 148 = 296 lb

[M][F]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
E - G	2x4	DRY	No.2	SPF
G - H	2x4	DRY	No.2	SPF
H - K	2x4	DRY	No.2	SPF
S - B	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
S - P	2x4	DRY	No.2	SPF
P - N	2x4	DRY	No.2	SPF
N - L	2x4	DRY	No.2	SPF
EBS	2x3	DRY	No.2	SPF

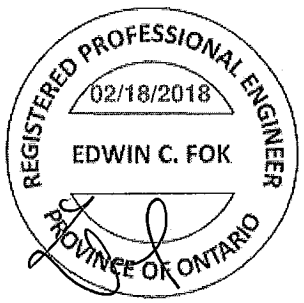
EXCEPT

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	3.00
C	TMWW-t	MT20	4.0	4.0	2.00	1.50
D	TS-t	MT20	3.0	6.0		
E	TTW-m	MT20	4.0	4.0		
F	TMWW-t	MT20	4.0	4.0		
G	TTW-m	MT20	4.0	4.0		
H	TS-t	MT20	3.0	6.0		
I	TMWW-t	MT20	4.0	4.0	2.00	1.50
J	TMVW-t	MT20	4.0	6.0	1.50	3.00
L	BMV1+p	MT20	2.0	4.0		
M	BMWW-t	MT20	4.0	6.0	2.00	2.25
N	BS-t	MT20	3.0	6.0		
O	BMWWW-t	MT20	5.0	6.0		
P	BS-t	MT20	3.0	6.0		
Q	BMWWW-t	MT20	5.0	6.0		
R	BMWW-t	MT20	4.0	6.0	2.00	2.25
S	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
S	1710	0	1710	0	0	5-8	2-9
L	1710	0	1710	0	0	5-8	2-9

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
S	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
L	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) S, L

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.52 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF F-Q, F-O.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 35	-78.0	-78.0	0.15 (1)	10.00	R- C	-211 / 1	0.10 (1)
B- C	-1834 / 0	-78.0	-78.0	0.44 (1)	4.52	C- Q	-316 / 0	0.41 (1)
C- D	-1614 / 0	-78.0	-78.0	0.41 (1)	4.78	Q- E	0 / 570	0.13 (1)
D- E	-1614 / 0	-78.0	-78.0	0.41 (1)	4.78	Q- F	-237 / 0	0.18 (1)
E- F	-1322 / 0	-78.0	-78.0	0.22 (1)	5.40	F- O	-237 / 0	0.18 (1)
F- G	-1322 / 0	-78.0	-78.0	0.22 (1)	5.40	O- G	0 / 570	0.13 (1)
G- H	-1614 / 0	-78.0	-78.0	0.41 (1)	4.78	O- I	-316 / 0	0.41 (1)
H- I	-1614 / 0	-78.0	-78.0	0.41 (1)	4.78	M- I	-211 / 1	0.10 (1)
I- J	-1834 / 0	-78.0	-78.0	0.44 (1)	4.52	B- R	0 / 1584	0.36 (1)
J- K	0 / 35	-78.0	-78.0	0.15 (1)	10.00	M- J	0 / 1584	0.36 (1)
S- B	-1662 / 0	0.0	0.0	0.17 (1)	6.43			
L- J	-1662 / 0	0.0	0.0	0.17 (1)	6.43			
S- R	0 / 0	-18.5	-18.5	0.14 (4)	10.00			
R- Q	0 / 1552	-18.5	-18.5	0.38 (1)	10.00			
Q- P	0 / 1425	-18.5	-18.5	0.37 (4)	10.00			
P- O	0 / 1425	-18.5	-18.5	0.37 (4)	10.00			
O- N	0 / 1552	-18.5	-18.5	0.38 (1)	10.00			
N- M	0 / 1552	-18.5	-18.5	0.38 (1)	10.00			
M- L	0 / 0	-18.5	-18.5	0.14 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.06")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.22")

CSI: TC=0.44/1.00 (I-J:1) , BC=0.38/1.00 (M-O:1) , WB=0.41/1.00 (I-O:1) , SSI=0.19/1.00 (I-J:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.87 (L) (INPUT = 0.90)
JSI METAL= 0.62 (P) (INPUT = 1.00)

A-18023624

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H23	2	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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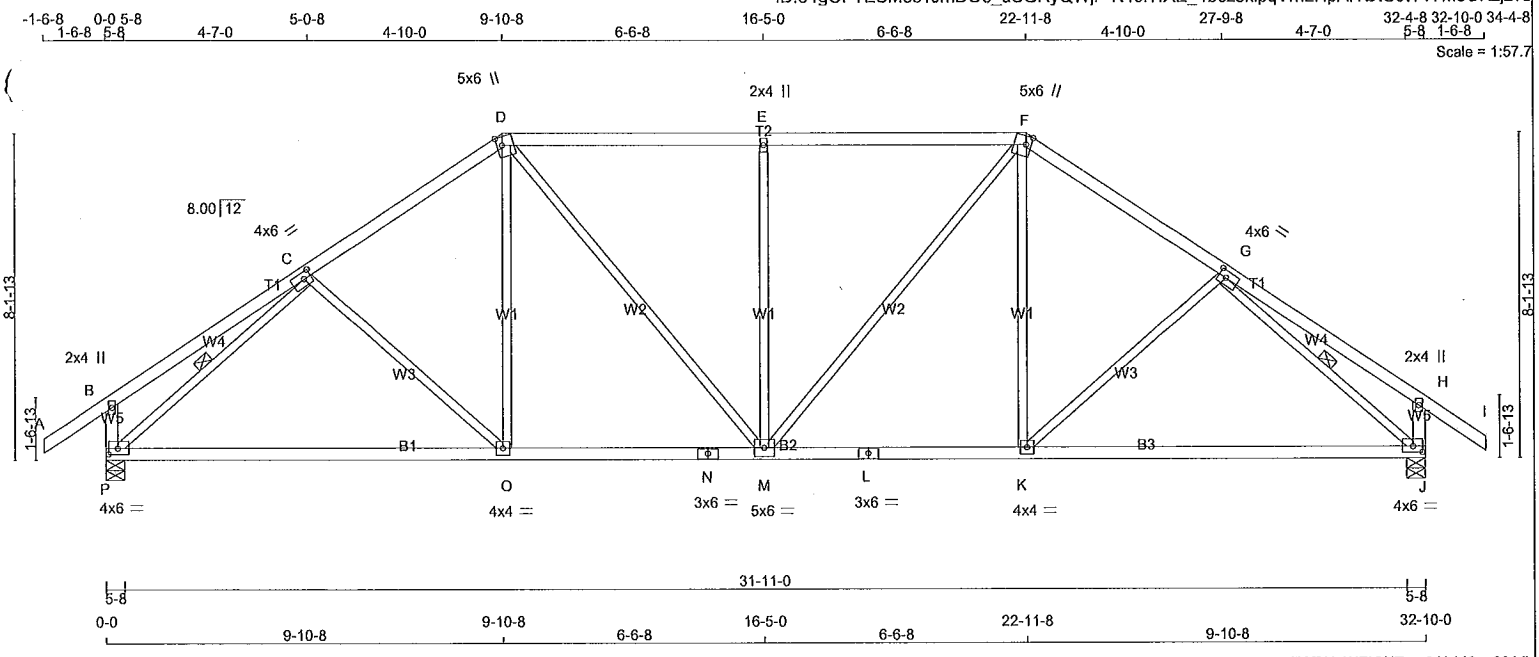


TOTAL WEIGHT = 2 X 142 = 284 lb

[M][F]

LUMBER

N. L. G. A. RULES

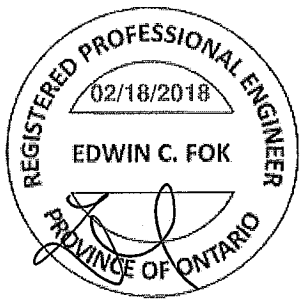
CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - F	2x4	DRY	No.2	SPF
F - I	2x4	DRY	No.2	SPF
P - B	2x4	DRY	No.2	SPF
J - H	2x4	DRY	No.2	SPF
P - N	2x4	DRY	No.2	SPF
N - L	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
WEBS T	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in Inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMV+p	MT20	2.0	4.0		
C	TMWW-t	MT20	4.0	6.0	2.00	2.25
D	TTWW+m	MT20	5.0	6.0	2.50	1.50
E	TMW+w	MT20	2.0	4.0		
F	TTWW+m	MT20	5.0	6.0	2.50	1.50
G	TMWW-t	MT20	4.0	6.0	2.00	2.25
H	TMV+p	MT20	2.0	4.0		
J	BMVW1-t	MT20	4.0	6.0	1.75	2.75
K	BMWW-t	MT20	4.0	4.0		
L	BS-t	MT20	3.0	6.0		
M	BMWWW-t	MT20	5.0	6.0		
N	BS-t	MT20	3.0	6.0		
O	BMWW-t	MT20	4.0	4.0		
P	BMVW1-t	MT20	4.0	6.0	1.75	2.75

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
P	1710	0	1710	0	0	5-8	IN-SX 1-14
J	1710	0	1710	0	0	5-8	IN-SX 1-14

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
P	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
J	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) P, J

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.55 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF C-P, G-J.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH
A- B	0 / 35	-78.0	-78.0	0.15 (1)	10.00
B- C	0 / 25	-78.0	-78.0	0.30 (1)	10.00
C- D	-1725 / 0	-78.0	-78.0	0.28 (1)	4.81
D- E	-1706 / 0	-78.0	-78.0	0.48 (1)	4.55
E- F	-1706 / 0	-78.0	-78.0	0.48 (1)	4.55
F- G	-1725 / 0	-78.0	-78.0	0.28 (1)	4.81
G- H	0 / 25	-78.0	-78.0	0.30 (1)	10.00
H- I	0 / 35	-78.0	-78.0	0.15 (1)	10.00
P- B	-274 / 0	0.0	0.0	0.03 (1)	7.81
J- H	-274 / 0	0.0	0.0	0.03 (1)	7.81
P- O	0 / 1479	-18.5	-18.5	0.54 (4)	10.00
O- N	0 / 1417	-18.5	-18.5	0.55 (4)	10.00
N- M	0 / 1417	-18.5	-18.5	0.55 (4)	10.00
M- L	0 / 1417	-18.5	-18.5	0.55 (4)	10.00
L- K	0 / 1417	-18.5	-18.5	0.55 (4)	10.00
K- J	0 / 1479	-18.5	-18.5	0.54 (4)	10.00

WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
C- O	-89 / 30	0.08 (1)
O- D	0 / 254	0.07 (4)
D- M	0 / 452	0.10 (1)
M- E	-626 / 0	0.81 (1)
M- F	0 / 452	0.10 (1)
K- F	0 / 254	0.07 (4)
K- G	-89 / 30	0.08 (1)
P- C	-2010 / 0	0.61 (1)
G- J	-2010 / 0	0.61 (1)

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.08")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.31")

CSI: TC=0.48/1.00 (D-E:1) , BC=0.55/1.00 (K-M:4) , WB=0.81/1.00 (E-M:1) , SSI=0.25/1.00 (D-E:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.88 (P) (INPUT = 0.90)
JSI METAL= 0.49 (G) (INPUT = 1.00)

A-18023623

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H22	2	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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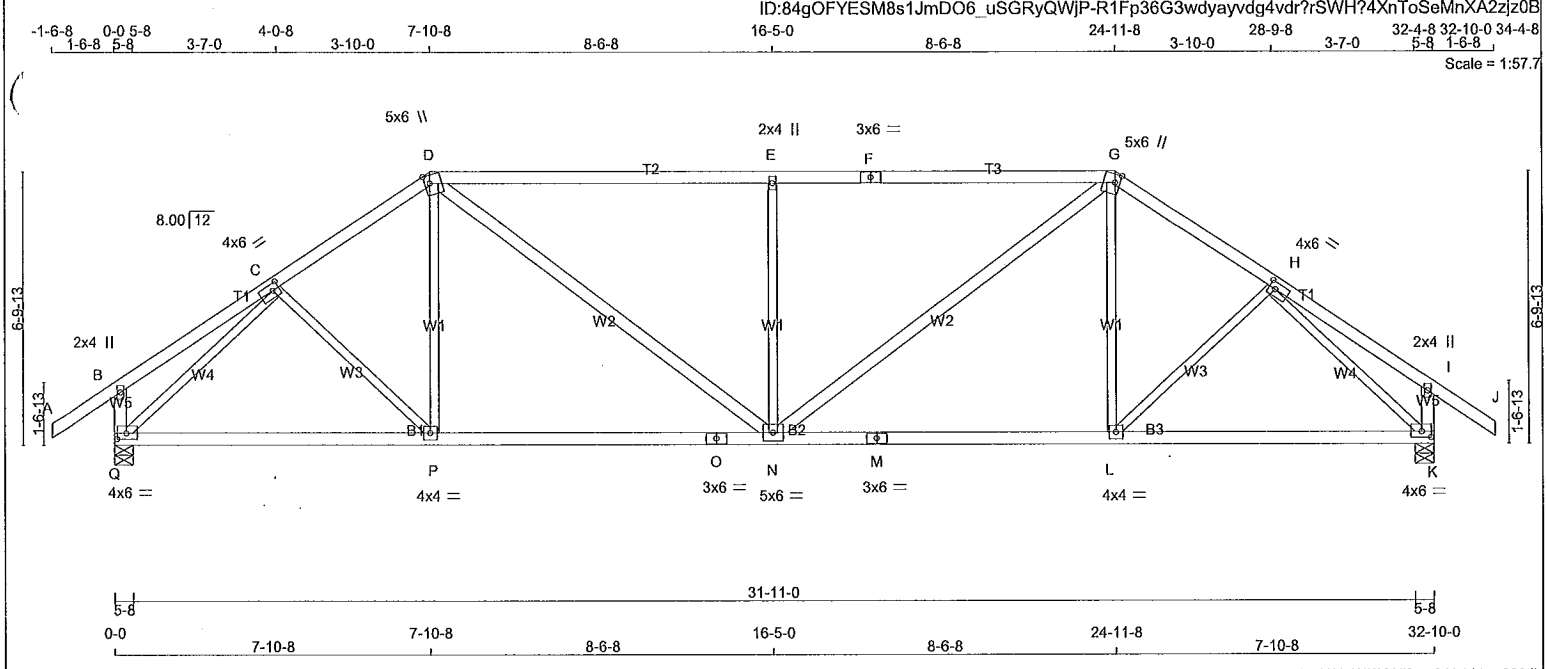


TOTAL WEIGHT = 2 X 141 = 283 lb

[M]

LUMBER

N. L. G. A. RULES

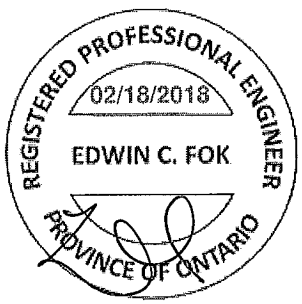
CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - F	2x4	DRY	2100F 1.8E	SPF
F - G	2x4	DRY	2100F 1.8E	SPF
G - J	2x4	DRY	No.2	SPF
Q - B	2x4	DRY	No.2	SPF
K - I	2x4	DRY	No.2	SPF
Q - O	2x4	DRY	No.2	SPF
O - M	2x4	DRY	No.2	SPF
M - K	2x4	DRY	No.2	SPF
EBS	2x3	DRY	No.2	SPF
PT				
D - N	2x4	DRY	No.2	SPF
N - G	2x4	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMV+p	MT20	2.0	4.0		
C	TMWW-t	MT20	4.0	6.0	2.00	2.00
D	TTWW+m	MT20	5.0	6.0	2.50	1.50
E	TMW+w	MT20	2.0	4.0		
F	TS-t	MT20	3.0	6.0		
G	TTWW+m	MT20	5.0	6.0	2.50	1.50
H	TMWW-t	MT20	4.0	6.0	2.00	2.00
I	TMV+p	MT20	2.0	4.0		
K	BMWW1-t	MT20	4.0	6.0	1.75	2.75
L	BMWW-t	MT20	4.0	4.0		
M	BS-t	MT20	3.0	6.0		
N	BMWWW-t	MT20	5.0	6.0		
O	BS-t	MT20	3.0	6.0		
P	BMWW-t	MT20	4.0	4.0		
Q	BMWW1-t	MT20	4.0	6.0	1.75	2.75

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
Q	1710	0	1710	0	0	5-8	1-14
K	1710	0	1710	0	0	5-8	1-14

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
Q	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
K	1217	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) Q, K

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.50 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH
A- B	0 / 35	-78.0	-78.0	0.15 (1)	10.00
B- C	0 / 18	-78.0	-78.0	0.18 (1)	10.00
C- D	-1793 / 0	-78.0	-78.0	0.23 (1)	4.77
D- E	-2112 / 0	-78.0	-78.0	0.82 (1)	4.50
E- F	-2113 / 0	-78.0	-78.0	0.82 (1)	4.50
F- G	-2113 / 0	-78.0	-78.0	0.82 (1)	4.50
G- H	-1793 / 0	-78.0	-78.0	0.23 (1)	4.77
H- I	0 / 18	-78.0	-78.0	0.18 (1)	10.00
I- J	0 / 35	-78.0	-78.0	0.15 (1)	10.00
Q- B	-247 / 0	0.0	0.0	0.03 (1)	7.81
K- I	-247 / 0	0.0	0.0	0.03 (1)	7.81
Q- P	0 / 1428	-18.5	-18.5	0.43 (4)	10.00
P- O	0 / 1476	-18.5	-18.5	0.45 (4)	10.00
O- N	0 / 1476	-18.5	-18.5	0.45 (4)	10.00
N- M	0 / 1476	-18.5	-18.5	0.45 (4)	10.00
M- L	0 / 1476	-18.5	-18.5	0.45 (4)	10.00
L- K	0 / 1428	-18.5	-18.5	0.43 (4)	10.00

WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
C- P	0 / 75	0.03 (4)
P- D	0 / 140	0.05 (4)
D- N	0 / 800	0.13 (1)
N- E	-821 / 0	0.64 (1)
N- G	0 / 800	0.13 (1)
L- G	0 / 140	0.05 (4)
L- H	0 / 75	0.03 (4)
Q- C	-2003 / 0	0.99 (1)
H- K	-2003 / 0	0.99 (1)

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.08")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.18")

CSI: TC=0.82/1.00 (E-G:1) , BC=0.45/1.00 (L-N:4) , WB=0.99/1.00 (H-K:1) , SSI=0.32/1.00 (D-E:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.88 (K) (INPUT = 0.90)
JSI METAL= 0.51 (M) (INPUT = 1.00)

A-18023622

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H21	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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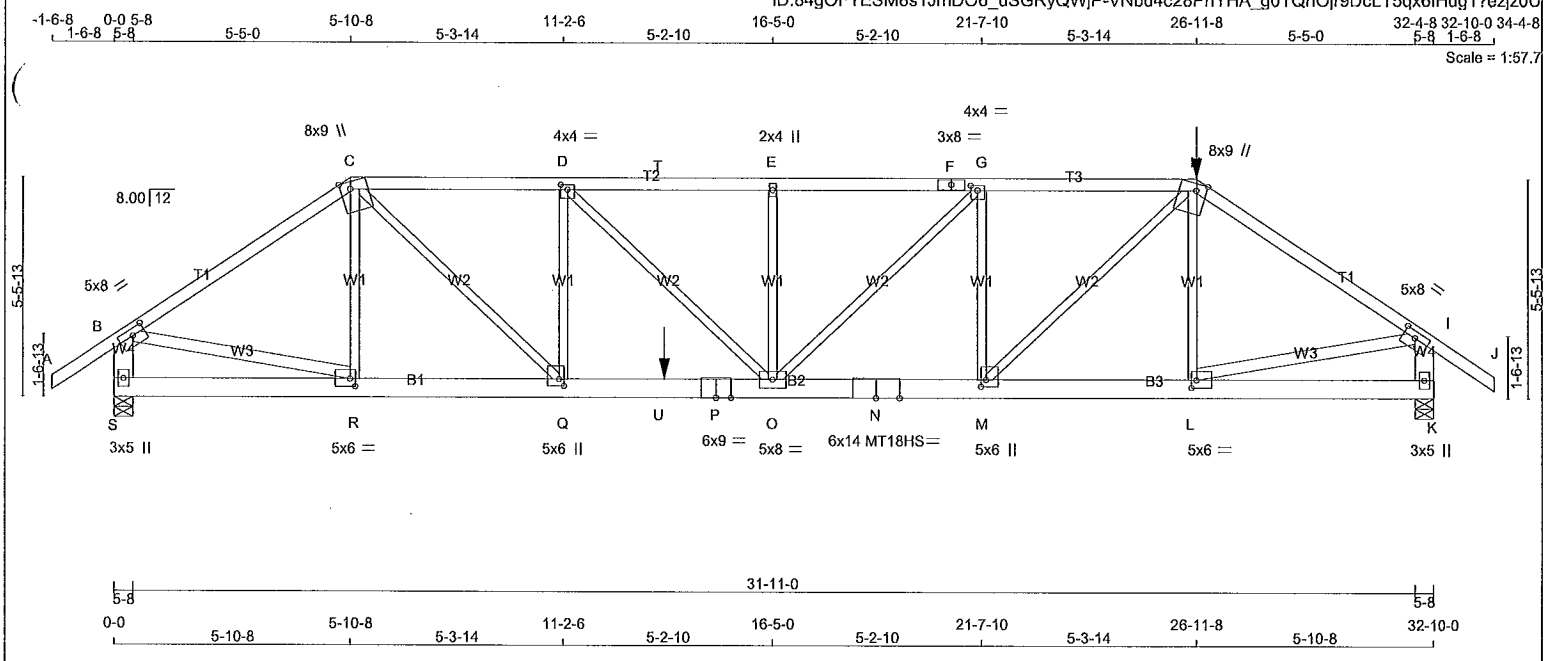


TOTAL WEIGHT = 162 lb

[M]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - C	2x4	DRY	1650F 1.5E	SPF
C - F	2x4	DRY	1650F 1.5E	SPF
F - H	2x4	DRY	1650F 1.5E	SPF
H - J	2x4	DRY	1650F 1.5E	SPF
S - B	2x6	DRY	No.2	SPF
K - I	2x6	DRY	No.2	SPF
S - P	2x6	DRY	1650F 1.5E	SPF
P - N	2x6	DRY	1650F 1.5E	SPF
N - K	2x6	DRY	1650F 1.5E	SPF
EBS T	2x3	DRY	No.2	SPF
B - R	2x4	DRY	No.2	SPF
L - I	2x4	DRY	No.2	SPF

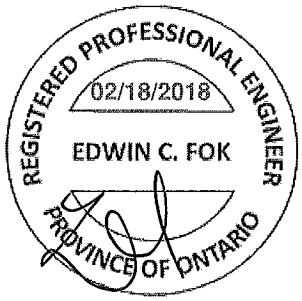
DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	5.0	8.0	2.00	3.75
C	TTWW+m	MT20	8.0	9.0	Edge	3.00
D	TMWW-t	MT20	4.0	4.0	1.50	2.00
E	TMW+w	MT20	2.0	4.0		
F	TS-t	MT20	3.0	8.0		
G	TMWW-t	MT20	4.0	4.0	1.50	2.00
H	TTWW+m	MT20	8.0	9.0	Edge	3.00
I	TMVW-t	MT20	5.0	8.0	2.00	3.75
K	BMV1+p	MT20	3.0	5.0		
L	BMWW-t	MT20	5.0	6.0	2.25	1.50
M	BMWW+t	MT20	5.0	6.0	2.00	1.50
N	BS-t	MT18HS	6.0	14.0		
O	BMWWW-t	MT20	5.0	8.0		
P	BS-t	MT20	6.0	9.0		
Q	BMWW+t	MT20	5.0	6.0	2.00	1.50
R	BMWW-t	MT20	5.0	6.0	2.25	1.50
S	BMV1+p	MT20	3.0	5.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
S	2882	0	2882	0	0	5-8	3-14
K	3292	0	3292	0	0	5-8	5-3

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
S	2052	1269 / 0	0 / 0	0 / 0	0 / 0	782 / 0	0 / 0
K	2347	1432 / 0	0 / 0	0 / 0	0 / 0	915 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) S, K

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 2.44 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 35	-78.0	-78.0	0.13 (1)	10.00		R- C	-546 / 0	0.24 (1)
B- C	-3434 / 0	-78.0	-78.0	0.70 (1)	3.69		C- Q	0 / 2965	0.73 (1)
C- D	-4985 / 0	-78.0	-78.0	0.58 (1)	3.21		Q- D	-1259 / 0	0.55 (1)
D- T	-5765 / 0	-78.0	-78.0	0.69 (1)	2.89		D- O	0 / 1092	0.27 (1)
T- E	-5765 / 0	-153.5	-153.5	0.69 (1)	2.89		O- E	-731 / 0	0.32 (1)
E- F	-5765 / 0	-153.5	-153.5	0.98 (1)	2.44		O- G	0 / 1005	0.25 (1)
F- G	-5765 / 0	-153.5	-153.5	0.98 (1)	2.44		M- G	-1614 / 0	0.70 (1)
G- H	-5047 / 0	-153.5	-153.5	0.90 (1)	2.71		M- H	0 / 2431	0.60 (1)
H- I	-3969 / 0	-78.0	-78.0	0.78 (1)	3.43		L- H	-376 / 25	0.16 (1)
I- J	0 / 35	-78.0	-78.0	0.13 (1)	10.00		B- R	0 / 2908	0.51 (1)
S- B	-2821 / 0	0.0	0.0	0.21 (1)	6.20		L- I	0 / 3361	0.59 (1)
K- I	-3205 / 0	0.0	0.0	0.23 (1)	5.87				
S- R	0 / 0	-18.5	-18.5	0.06 (4)	10.00				
R- Q	0 / 2843	-18.5	-18.5	0.45 (1)	10.00				
Q- U	0 / 4985	-18.5	-18.5	0.96 (1)	10.00				
U- P	0 / 4985	-36.4	-36.4	0.96 (1)	10.00				
P- O	0 / 4985	-36.4	-36.4	0.96 (1)	10.00				
O- N	0 / 5047	-36.4	-36.4	0.59 (1)	10.00				
N- M	0 / 5047	-36.4	-36.4	0.59 (1)	10.00				
M- L	0 / 3291	-36.4	-36.4	0.33 (1)	10.00				
L- K	0 / 0	-36.4	-36.4	0.11 (4)	10.00				

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
H	26-11-8	-334	-334	---	FRONT	VERT	TOTAL
U	13-8-8	-1065	-1065	---	FRONT	VERT	TOTAL

DESIGN CRITERIA

*** SPECIAL LOADS ANALYSIS ***
GEOMETRY AND/OR BASIC LOADS CHANGED BY USER.
LOADS WERE DERIVED FROM USER INPUT
NO FURTHER MODIFICATIONS WERE MADE

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip
SIDE SETBACK = 5-10-8
END SETBACK = 5-10-8
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: CONVENTIONAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.
LOADS APPLIED TO FIRST 19-3-0 OF SPAN MEASURED FROM THE RIGHT.

*** NON STANDARD GIRDER ***
ADDT'L USER-DEFINED LOADS APPLIED TO ALL LOAD CASES.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.26")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 778 (0.51")

CSI: TC=0.98/1.00 (E-G:1) , BC=0.96/1.00 (O-Q:1) , WB=0.73/1.00 (C-Q:1) , SSI=0.43/1.00 (O-Q:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE HEELS OFF

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

A-18023621

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H19	2	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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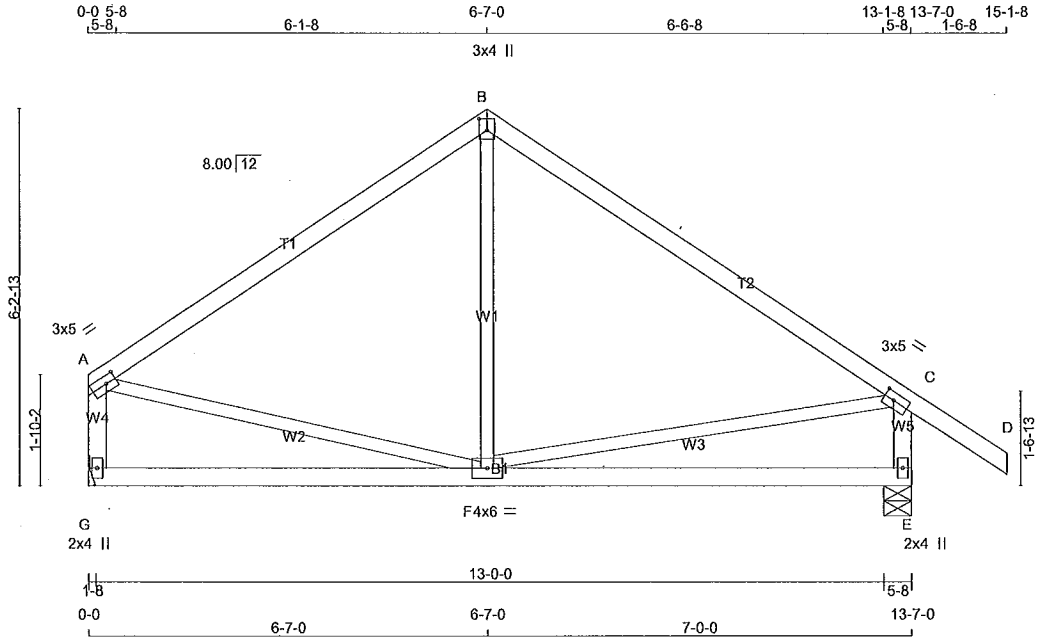


TOTAL WEIGHT = 2 X 55 = 109 lb

[M][F]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - B	2x4	DRY	1650F 1.5E	SPF
B - D	2x4	DRY	2100F 1.8E	SPF
G - A	2x4	DRY	No.2	SPF
E - C	2x4	DRY	No.2	SPF
G - E	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF

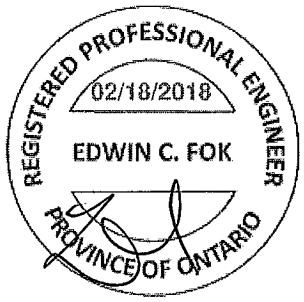
EXCEPT

SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW-t	MT20	3.0	5.0	1.50	2.00
B	TTW+p	MT20	3.0	4.0	2.25	1.50
C	TMVW-t	MT20	3.0	5.0	1.50	2.00
E	BMV1+p	MT20	2.0	4.0		
F	BMWWW-t	MT20	4.0	6.0		
G	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
G	655	0	655	0	0	IN-SX	IN-SX
						HANGER BY OTHERS	
						MIN. SEAT SIZE: 1-8	
E	782	0	782	0	0	5-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
G	467	285 / 0	0 / 0	0 / 0	0 / 0	182 / 0	0 / 0
E	555	353 / 0	0 / 0	0 / 0	0 / 0	201 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) E

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD LC1 (PLF) FROM	TO	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	-472 / 0	-78.0	-78.0	0.37 (1)	6.25	F- B	-6 / 107	0.04 (4)
B- C	-472 / 0	-78.0	-78.0	0.32 (1)	6.25	A- F	0 / 404	0.09 (1)
C- D	0 / 35	-78.0	-78.0	0.09 (1)	10.00	F- C	0 / 399	0.09 (1)
G- A	-613 / 0	0.0	0.0	0.07 (1)	7.81			
E- C	-729 / 0	0.0	0.0	0.08 (1)	7.81			
G- F	0 / 0	-18.5	-18.5	0.25 (4)	10.00			
F- E	0 / 0	-18.5	-18.5	0.25 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF
	DL =	6.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.4	PSF
TOTAL LOAD	=	34.4	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.45")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.45")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.07")

CSI: TC=0.37/1.00 (A-B:1) , BC=0.25/1.00 (F-G:4) , WB=0.09/1.00 (A-F:1) , SSI=0.18/1.00 (B-C:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.74 (F) (INPUT = 0.90)
JSI METAL= 0.21 (C) (INPUT = 1.00)

A-18023620

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291817	H18	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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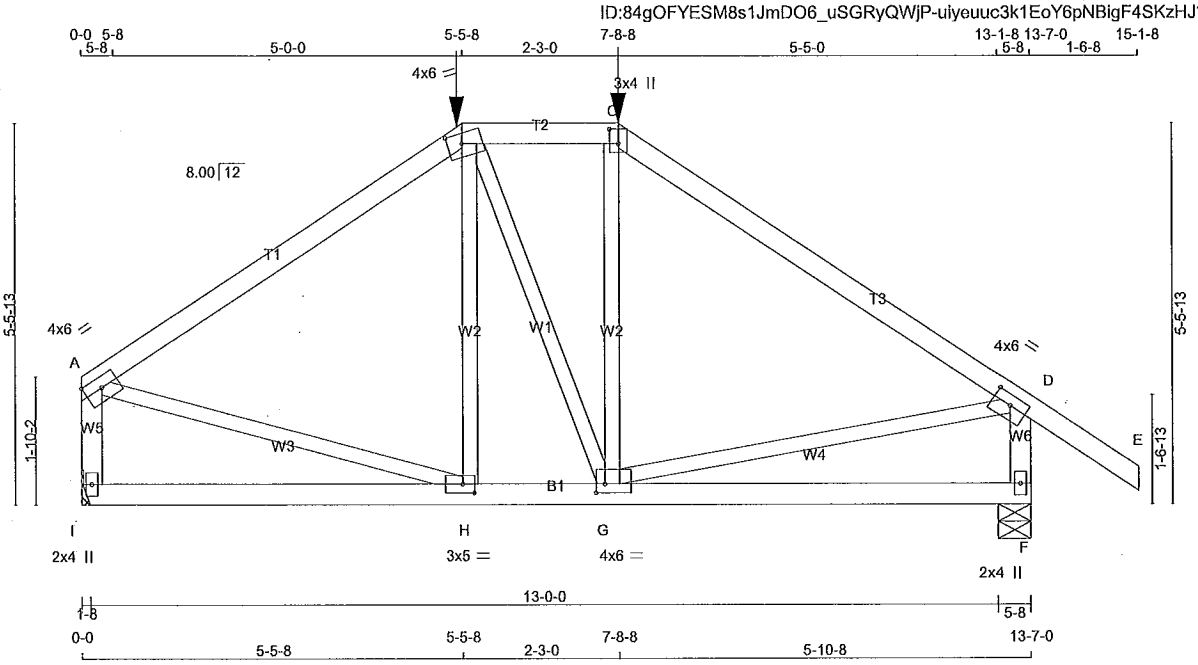


TOTAL WEIGHT = 60 lb [M]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - B	2x4	DRY	No.2	SPF
B - C	2x4	DRY	No.2	SPF
C - E	2x4	DRY	No.2	SPF
I - A	2x4	DRY	No.2	SPF
F - D	2x4	DRY	No.2	SPF
I - F	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

EASONED LUMBER.

PLATES (table is in inches)

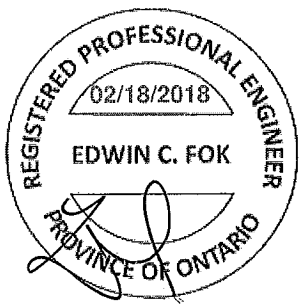
JT	TYPE	PLATES	W	LEN	Y	X
A	TMVW-t	MT20	4.0	6.0	1.75	Edge
B	TTWW-m	MT20	4.0	6.0	1.75	2.50
C	TTW+p	MT20	3.0	4.0	2.50	1.50
D	TMVW-t	MT20	4.0	6.0	1.75	3.00
F	BMV1+p	MT20	2.0	4.0		
G	BMWWW-t	MT20	4.0	6.0	1.50	1.50
H	BMWW-t	MT20	3.0	5.0	1.50	2.00
I	BMV1+p	MT20	2.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

HANGERS NOTES

1) SPECIAL HANGER(S) OR CONNECTION(S) REQUIRED TO SUPPORT CONCENTRATED LOAD(S) 334.0 lbs FACTORED DOWN AT 7-8-8, AND 310.3 lbs FACTORED DOWN AT 5-5-8 ON TOP CHORD. DESIGN FOR UNSPECIFIED CONNECTION(S) IS DELEGATED TO THE BUILDING DESIGNER.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
I	1195	0	1195	0	0	IN-SX	IN-SX
						HANGER BY OTHERS	
						MIN. SEAT SIZE: 1-8	
F	1300	0	1300	0	0	5-8	1-15

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
I	854	510 / 0	0 / 0	0 / 0	0 / 0	344 / 0	0 / 0
F	927	567 / 0	0 / 0	0 / 0	0 / 0	360 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) F

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.02 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	-1143 / 0	-78.0	-78.0	0.51 (1)	5.22	H- B	-118 / 59		0.05 (1)
B- C	-970 / 0	-153.5	-153.5	0.16 (1)	6.10	B- G	0 / 62		0.02 (1)
C- D	-1171 / 0	-78.0	-78.0	0.60 (1)	5.02	G- C	-85 / 90		0.04 (1)
D- E	0 / 35	-78.0	-78.0	0.16 (1)	10.00	A- H	0 / 985		0.24 (1)
I- A	-1109 / 0	0.0	0.0	0.13 (1)	7.49	G- D	0 / 994		0.25 (1)
F- D	-1208 / 0	0.0	0.0	0.14 (1)	7.25				
I- H	0 / 0	-36.4	-36.4	0.26 (4)	10.00				
H- G	0 / 947	-36.4	-36.4	0.39 (4)	10.00				
G- F	0 / 0	-36.4	-36.4	0.29 (4)	10.00				

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
B	5-5-8	-310	-310	---	FRONT	VERT	TOTAL
C	7-8-8	-334	-334	---	FRONT	VERT	TOTAL

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF	
	DL =	6.0	PSF	
BOT CH.	LL =	0.0	PSF	
	DL =	7.4	PSF	
TOTAL LOAD	=	34.4	PSF	

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip
LEFT SETBACK = 5-5-8
RIGHT SETBACK = 5-10-8
END SETBACK = 5-10-8
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: CONVENTIONAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.45")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.02")
ALLOWABLE DEFL.(TL)= L/360 (0.45")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.09")

CSI: TC=0.60/1.00 (C-D:1) , BC=0.39/1.00 (G-H:4) , WB=0.25/1.00 (D-G:1) , SSI=0.19/1.00 (F-G:4)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.83 (C) (INPUT = 0.90)
JSI METAL= 0.34 (D) (INPUT = 1.00)

A-18023619

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292604	J1TC	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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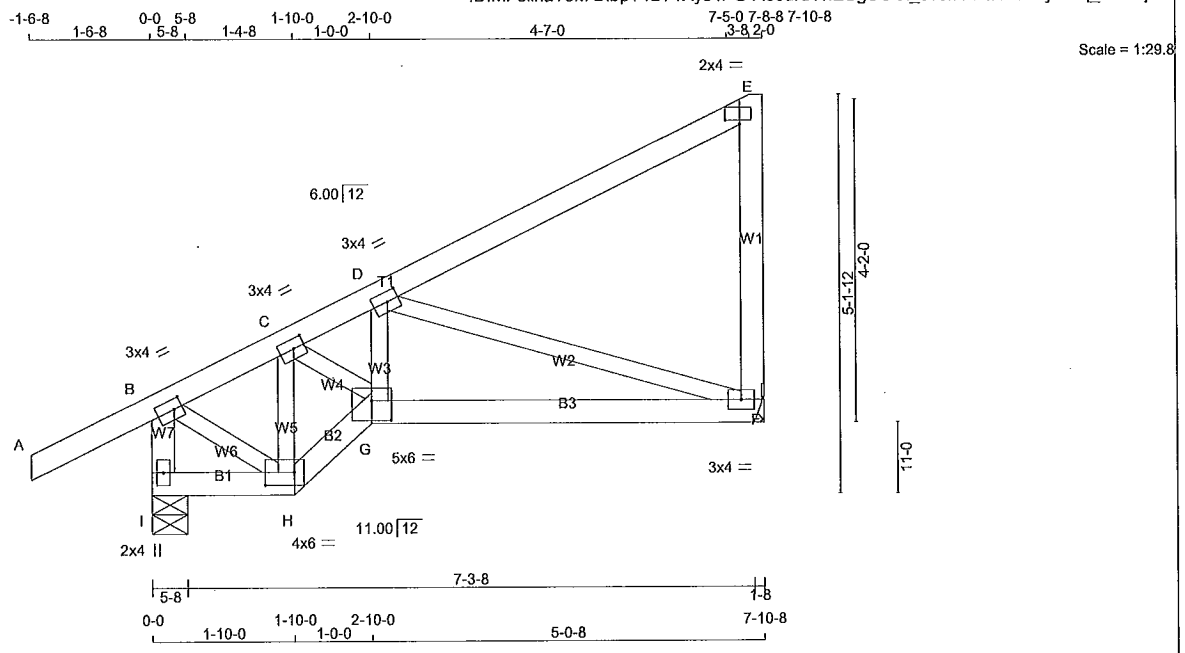


TOTAL WEIGHT = 35 lb

[M][F]

LUMBER
N. L. G. A. RULES

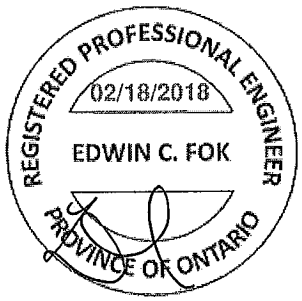
CHORDS	SIZE		LUMBER	DESCR.
A - E	2x4	DRY	No.2	SPF
F - E	2x4	DRY	No.2	SPF
I - B	2x4	DRY	No.2	SPF
I - H	2x4	DRY	No.2	SPF
H - G	2x4	DRY	No.2	SPF
G - F	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

EASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	4.0	1.50	1.25
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TMWW-t	MT20	3.0	4.0	1.50	1.75
E	TVM-p	MT20	2.0	4.0	0.75	2.25
F	BMVW1-t	MT20	3.0	4.0		
G	BBWW-l	MT20	5.0	6.0	3.00	3.00
H	BBWW-l	MT20	4.0	6.0	2.00	4.50
I	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
F	367	0	367	0	0	HANGER BY OTHERS MIN. SEAT SIZE: 1-8	
I	518	0	518	0	0	5-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
F	262	158 / 0	0 / 0	0 / 0	0 / 0	104 / 0	0 / 0
I	366	240 / 0	0 / 0	0 / 0	0 / 0	127 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) I

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD LC1 FROM	TO	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	H- C	-270 / 0	0.04 (1)
B- C	-280 / 0	-78.0	-78.0	0.11 (1)	6.25	C- G	0 / 435	0.10 (1)
C- D	-514 / 0	-78.0	-78.0	0.19 (1)	6.25	G- D	-34 / 57	0.02 (4)
D- E	-16 / 0	-78.0	-78.0	0.21 (1)	6.25	D- F	-564 / 0	0.24 (1)
F- E	-156 / 0	0.0	0.0	0.05 (1)	7.81	B- H	0 / 243	0.05 (1)
I- B	-501 / 0	0.0	0.0	0.05 (1)	7.81			
I- H	0 / 0	-18.5	-18.5	0.02 (4)	10.00			
H- G	0 / 271	-18.5	-18.5	0.05 (1)	10.00			
G- F	0 / 539	-18.5	-18.5	0.19 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.26")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.26")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.04")

CSI: TC=0.21/1.00 (D-E:1) , BC=0.19/1.00 (F-G:4) , WB=0.24/1.00 (D-F:1) , SSI=0.17/1.00 (C-D:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.81 (F) (INPUT = 0.90)
JSI METAL= 0.20 (F) (INPUT = 1.00)

A-18023613

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292604	J1TB	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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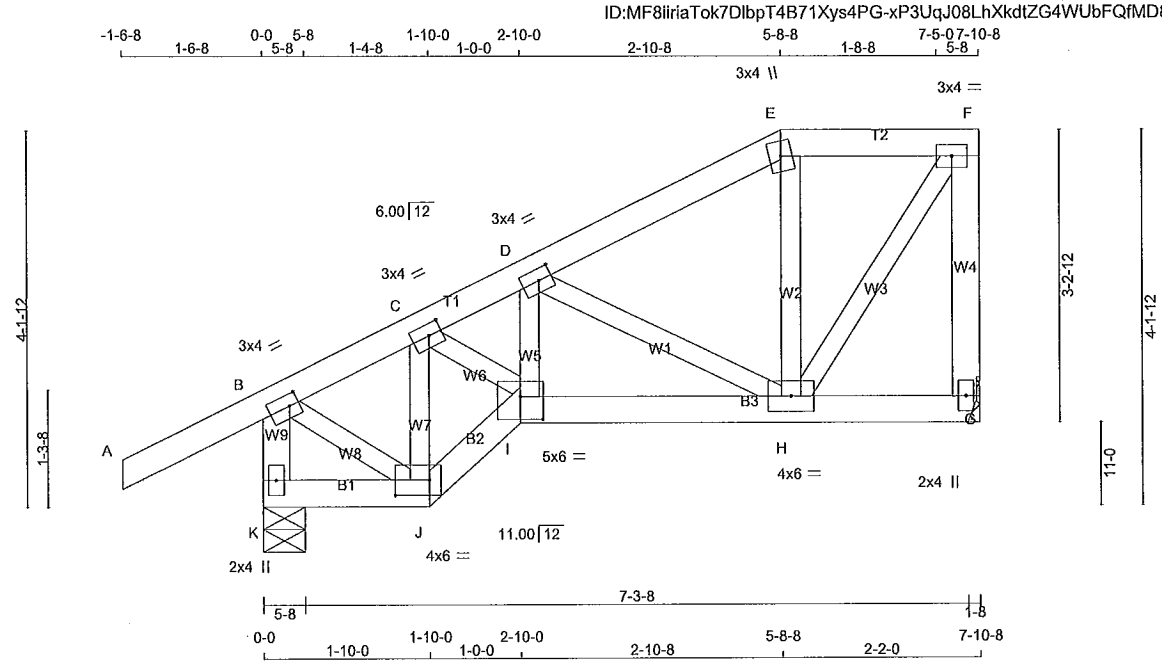


TOTAL WEIGHT = 37 lb

[M][F]

LUMBER
N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - E	2x4	DRY	No.2	SPF
E - F	2x4	DRY	No.2	SPF
G - F	2x4	DRY	No.2	SPF
K - B	2x4	DRY	No.2	SPF
K - J	2x4	DRY	No.2	SPF
J - I	2x4	DRY	No.2	SPF
I - G	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF

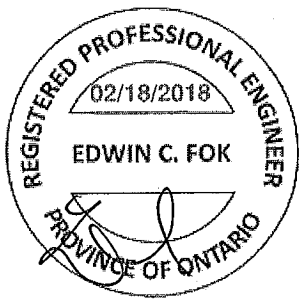
F PT

L SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	4.0	1.50	1.25
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TMWW-t	MT20	3.0	4.0	1.50	1.75
E	TTW+m	MT20	3.0	4.0		
F	TMVW-t	MT20	3.0	4.0		
G	BMV1+p	MT20	2.0	4.0		
H	BMWWW-t	MT20	4.0	6.0		
I	BBWW-l	MT20	5.0	6.0	3.00	3.00
J	BBWW-l	MT20	4.0	6.0	2.00	4.50
K	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
G	367	0	367	0	0	IN-SX	IN-SX
						HANGER BY OTHERS	
						MIN. SEAT SIZE: 1-8	
K	518	0	518	0	0	5-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
G	262	158 / 0	0 / 0	0 / 0	0 / 0	104 / 0	0 / 0
K	366	240 / 0	0 / 0	0 / 0	0 / 0	127 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) K

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	J- C	-290 / 0	0.04 (1)	
B- C	-290 / 0	-78.0	-78.0	0.11 (1)	6.25	C- I	0 / 312	0.07 (1)	
C- D	-480 / 0	-78.0	-78.0	0.05 (1)	6.25	I- D	0 / 51	0.02 (4)	
D- E	-223 / 0	-78.0	-78.0	0.06 (1)	6.25	D- H	-295 / 0	0.06 (1)	
E- F	-189 / 0	-78.0	-78.0	0.05 (1)	6.25	H- E	-79 / 1	0.01 (1)	
G- F	-353 / 0	0.0	0.0	0.06 (1)	7.81	H- F	0 / 329	0.07 (1)	
K- B	-501 / 0	0.0	0.0	0.05 (1)	7.81	B- J	0 / 259	0.06 (1)	
K- J	0 / 0	-18.5	-18.5	0.02 (4)	10.00				
J- I	0 / 289	-18.5	-18.5	0.05 (1)	10.00				
I- H	0 / 452	-18.5	-18.5	0.09 (1)	10.00				
H- G	0 / 0	-18.5	-18.5	0.03 (4)	10.00				

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.26")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.26")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.01")

CSI: TC=0.14/1.00 (A-B:1) , BC=0.09/1.00 (H-I:1) , WB=0.07/1.00 (F-H:1) , SSI=0.10/1.00 (B-C:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.69 (B) (INPUT = 0.90)
JSI METAL= 0.14 (B) (INPUT = 1.00)

A-18023612

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292604	J1TA	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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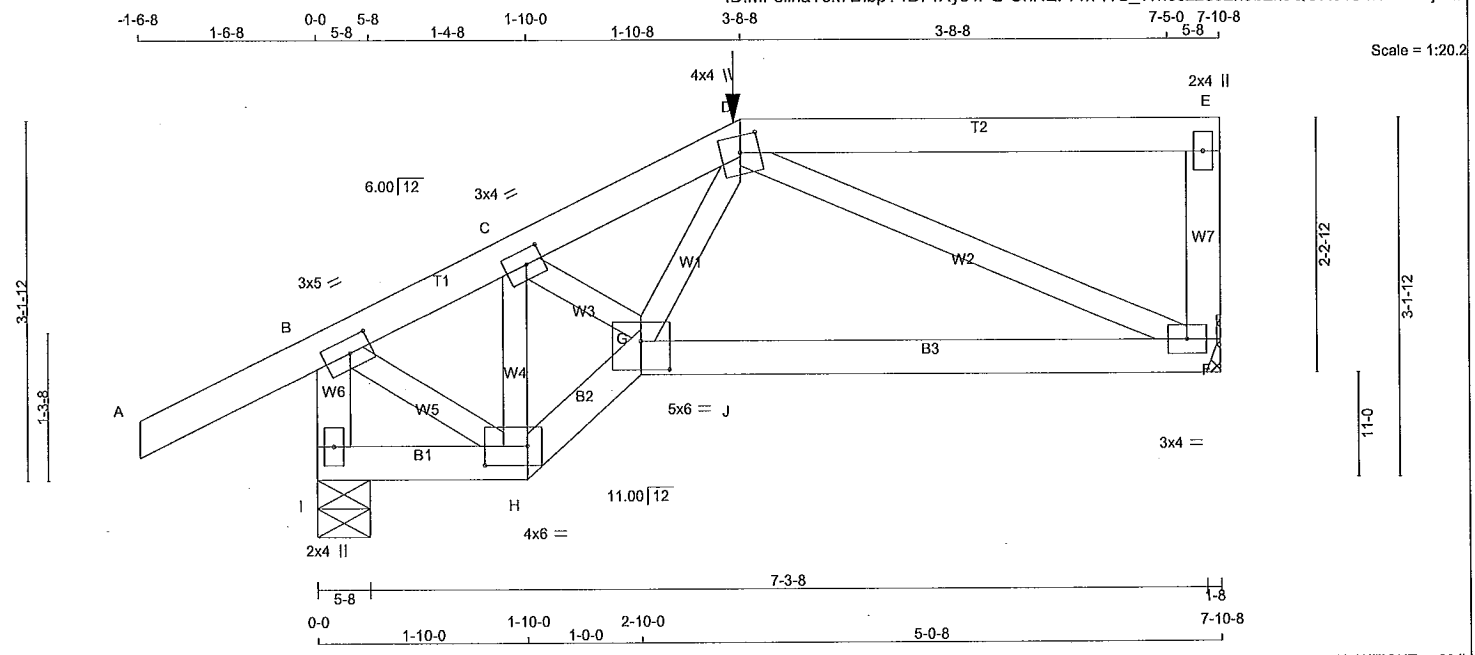


TOTAL WEIGHT = 33 lb

[M]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
F - E	2x4	DRY	No.2	SPF
I - B	2x4	DRY	No.2	SPF
I - H	2x4	DRY	No.2	SPF
H - G	2x4	DRY	No.2	SPF
G - F	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF

F 'T

D. SEASONED LUMBER.

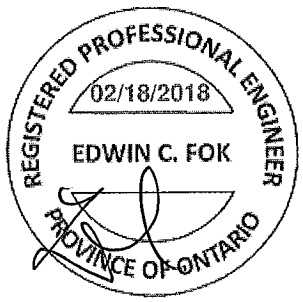
PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	5.0	1.50	2.25
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TTWW+m	MT20	4.0	4.0	1.75	2.00
E	TMV+p	MT20	2.0	4.0		
F	BMVW1-t	MT20	3.0	4.0		
G	BBWW-I	MT20	5.0	6.0	3.00	3.00
H	BBWW-I	MT20	4.0	6.0	2.00	4.50
I	BMV1+p	MT20	2.0	4.0		

HANGERS NOTES

1) SPECIAL HANGER(S) OR CONNECTION(S) REQUIRED TO SUPPORT CONCENTRATED LOAD(S) 106.4 lbs FACTORED DOWN AT 3-8-8 ON TOP CHORD. DESIGN FOR UNSPECIFIED CONNECTION(S) IS DELEGATED TO THE BUILDING DESIGNER.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
F	550	0	550	0	0	HANGER BY OTHERS MIN. SEAT SIZE: 1-8	
I	642	0	642	0	0	5-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
F	392	240 / 0	0 / 0	0 / 0	0 / 0	152 / 0	0 / 0
I	456	290 / 0	0 / 0	0 / 0	0 / 0	166 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) I

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.16 (1)	10.00	H- C	-451 / 0	0.07 (1)
B- C	-425 / 0	-78.0	-78.0	0.15 (1)	6.25	C- G	0 / 374	0.09 (1)
C- D	-691 / 0	-78.0	-78.0	0.07 (1)	6.25	G- D	0 / 163	0.05 (4)
D- E	0 / 0	-111.3	-111.3	0.36 (1)	10.00	D- F	-607 / 0	0.21 (1)
F- E	-232 / 0	0.0	0.0	0.03 (1)	7.81	B- H	0 / 401	0.10 (1)
I- B	-618 / 0	0.0	0.0	0.07 (1)	7.81			
I- H	0 / 0	-26.4	-26.4	0.03 (4)	10.00			
H- G	0 / 447	-26.4	-26.4	0.08 (1)	10.00			
G- J	0 / 550	-26.4	-26.4	0.27 (4)	10.00			
J- F	0 / 550	-26.4	-26.4	0.27 (4)	10.00			

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
D	3-8-8	-106	-106	---	FRONT	VERT	TOTAL

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip
LEFT SETBACK = 3-8-8
RIGHT SETBACK = 0-0
END SETBACK = 3-8-8
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: CONVENTIONAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.26")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.26")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.05")

CSI: TC=0.36/1.00 (D-E:1) , BC=0.27/1.00 (F-G:4) , WB=0.21/1.00 (D-F:1) , SSI=0.20/1.00 (D-E:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

A-18023611

CONTINUED ON PAGE 2

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292604	J1T	4	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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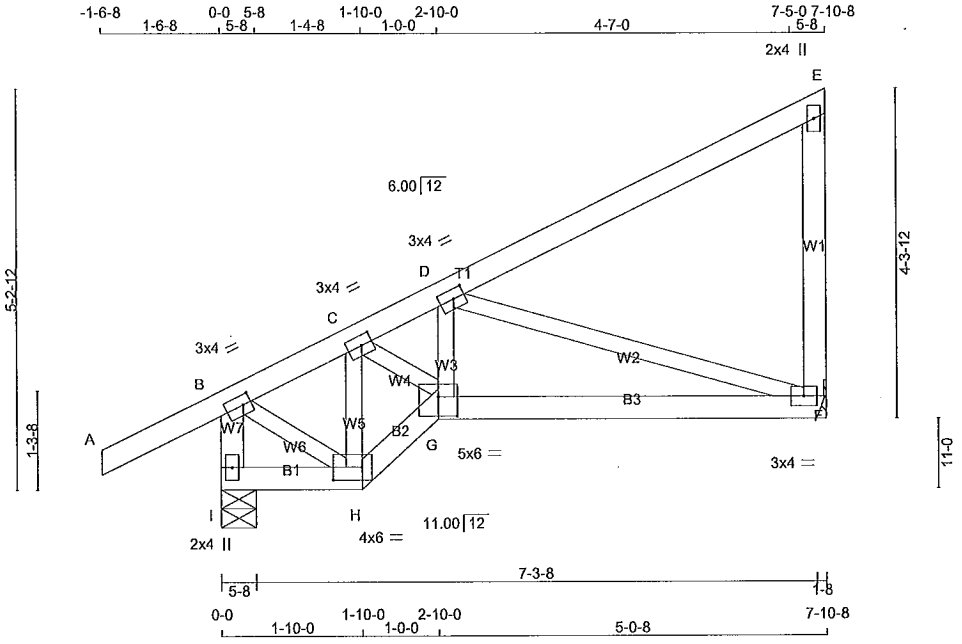


TOTAL WEIGHT = 4 X 35 = 142 lb

[M][F]

LUMBER
N. L. G. A. RULES

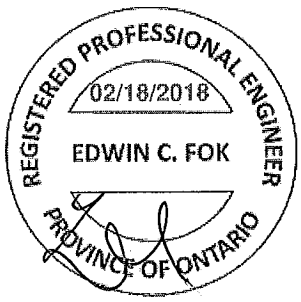
CHORDS	SIZE		LUMBER	DESCR.
I - B	2x4	DRY	No.2	SPF
A - E	2x4	DRY	No.2	SPF
F - E	2x4	DRY	No.2	SPF
I - H	2x4	DRY	No.2	SPF
H - G	2x4	DRY	No.2	SPF
G - F	2x4	DRY	No.2	SPF
ALL WEBS	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	4.0	1.50	1.25
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TMWW-t	MT20	3.0	4.0	1.50	1.75
E	TMV+p	MT20	2.0	4.0		
F	BMVW1-t	MT20	3.0	4.0		
G	BBWW-l	MT20	5.0	6.0	3.00	3.00
H	BBWW-l	MT20	4.0	6.0	2.00	4.50
I	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
I	518	0	518	0	0	5-8	1-8
F	367	0	367	0	0	HANGER BY OTHERS MIN. SEAT SIZE: 1-8	

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
I	366	240 / 0	0 / 0	0 / 0	0 / 0	127 / 0	0 / 0
F	262	158 / 0	0 / 0	0 / 0	0 / 0	104 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) I

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.25 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
I- B	-501 / 0	0.0	0.0	0.05 (1)	7.81	B- H	0 / 243	0.05 (1)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	H- C	-270 / 0	0.04 (1)
B- C	-280 / 0	-78.0	-78.0	0.11 (1)	6.25	C- G	0 / 435	0.10 (1)
C- D	-514 / 0	-78.0	-78.0	0.19 (1)	6.25	G- D	-34 / 57	0.02 (4)
D- E	-16 / 0	-78.0	-78.0	0.21 (1)	6.25	D- F	-564 / 0	0.24 (1)
F- E	-156 / 0	0.0	0.0	0.04 (1)	7.81			
I- H	0 / 0	-18.5	-18.5	0.02 (4)	10.00			
H- G	0 / 271	-18.5	-18.5	0.05 (1)	10.00			
G- F	0 / 539	-18.5	-18.5	0.19 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

DESIGN ASSUMPTIONS
-OVERHANG NOT TO BE ALTERED OR CUT OFF.

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.26")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.01")
ALLOWABLE DEFL.(TL)= L/360 (0.26")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.04")

CSI: TC=0.21/1.00 (D-E:1) , BC=0.19/1.00 (F-G:4) , WB=0.24/1.00 (D-F:1) , SSI=0.17/1.00 (C-D:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.81 (F) (INPUT = 0.90)
JSI METAL= 0.20 (F) (INPUT = 1.00)

A-18023610

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292603	H6	8	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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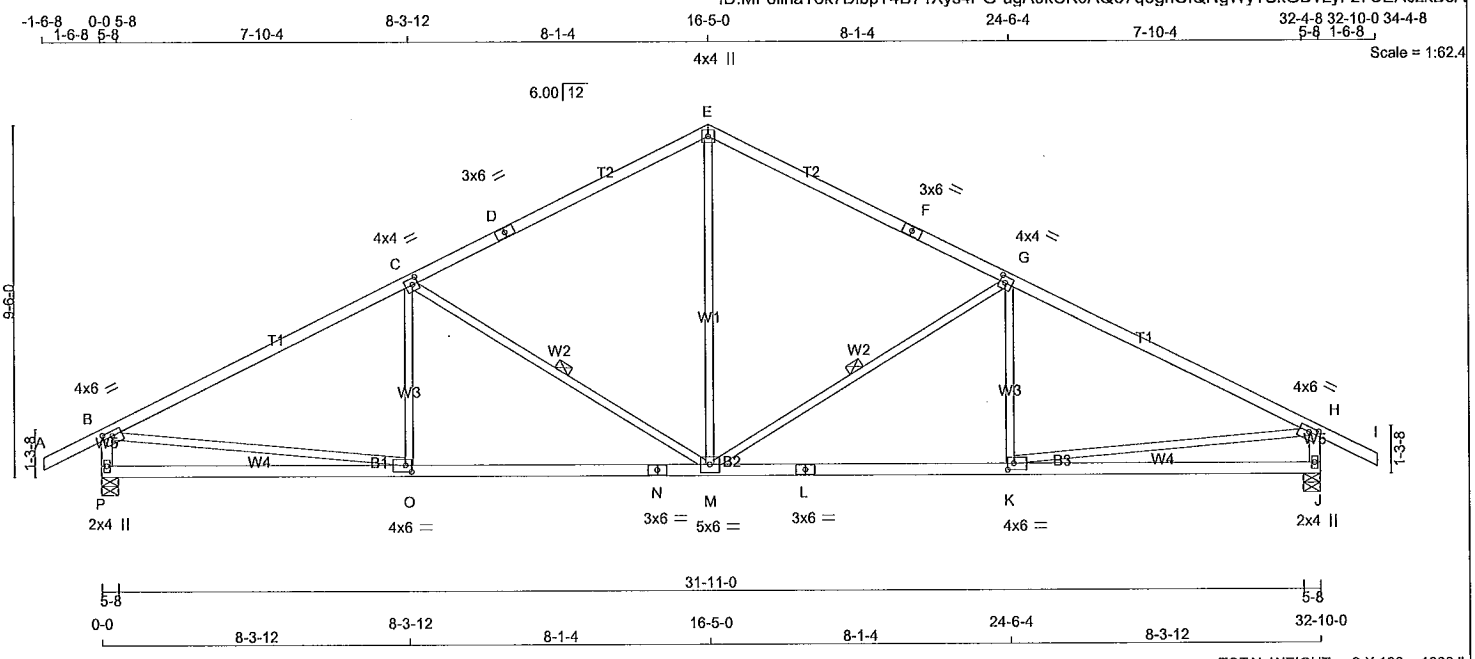


TOTAL WEIGHT = 8 X 129 = 1030 lb

[M][F]

LUMBER

N. L. G. A. RULES

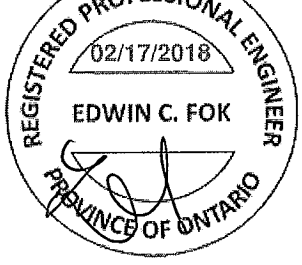
CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
E - F	2x4	DRY	No.2	SPF
F - I	2x4	DRY	No.2	SPF
P - B	2x4	DRY	No.2	SPF
J - H	2x4	DRY	No.2	SPF
P - N	2x4	DRY	No.2	SPF
N - L	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
EBS	2x3	DRY	No.2	SPF
T				

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	2.75
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TS-t	MT20	3.0	6.0		
E	TTW+p	MT20	4.0	4.0		
F	TS-t	MT20	3.0	6.0		
G	TMWW-t	MT20	4.0	4.0	2.00	1.75
H	TMVW-t	MT20	4.0	6.0	1.50	2.75
J	BMV1+p	MT20	2.0	4.0		
K	BMWW-t	MT20	4.0	6.0	2.00	2.00
L	BS-t	MT20	3.0	6.0		
M	BMWWW-t	MT20	5.0	6.0		
N	BS-t	MT20	3.0	6.0		
O	BMWW-t	MT20	4.0	6.0	2.00	2.00
P	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
P	1709	0	1709	0	0	5-8	2-8
J	1709	0	1709	0	0	5-8	2-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
P	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
J	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) P, J

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.37 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF G-M, C-M.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	M- E	0 / 950	0.21 (1)
B- C	-2268 / 0	-78.0	-78.0	0.96 (1)	3.37	M- G	-752 / 0	0.49 (1)
C- D	-1628 / 0	-78.0	-78.0	0.81 (1)	4.04	K- G	-75 / 98	0.03 (4)
D- E	-1628 / 0	-78.0	-78.0	0.81 (1)	4.04	C- M	-752 / 0	0.49 (1)
E- F	-1628 / 0	-78.0	-78.0	0.81 (1)	4.04	O- C	-75 / 98	0.03 (4)
F- G	-1628 / 0	-78.0	-78.0	0.81 (1)	4.04	B- O	0 / 2074	0.47 (1)
G- H	-2268 / 0	-78.0	-78.0	0.96 (1)	3.37	K- H	0 / 2074	0.47 (1)
H- I	0 / 28	-78.0	-78.0	0.14 (1)	10.00			
P- B	-1646 / 0	0.0	0.0	0.17 (1)	6.45			
J- H	-1646 / 0	0.0	0.0	0.17 (1)	6.45			
P- O	0 / 0	-18.5	-18.5	0.30 (4)	10.00			
O- N	0 / 2059	-18.5	-18.5	0.50 (4)	10.00			
N- M	0 / 2059	-18.5	-18.5	0.50 (4)	10.00			
M- L	0 / 2059	-18.5	-18.5	0.50 (4)	10.00			
L- K	0 / 2059	-18.5	-18.5	0.50 (4)	10.00			
K- J	0 / 0	-18.5	-18.5	0.30 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.11")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.24")

CSI: TC=0.96/1.00 (G-H:1) , BC=0.50/1.00 (K-M:4) , WB=0.49/1.00 (G-M:1) , SSI=0.28/1.00 (G-H:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (K) (INPUT = 0.90)
JSI METAL= 0.67 (L) (INPUT = 1.00)

A-18023595

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292603	H5	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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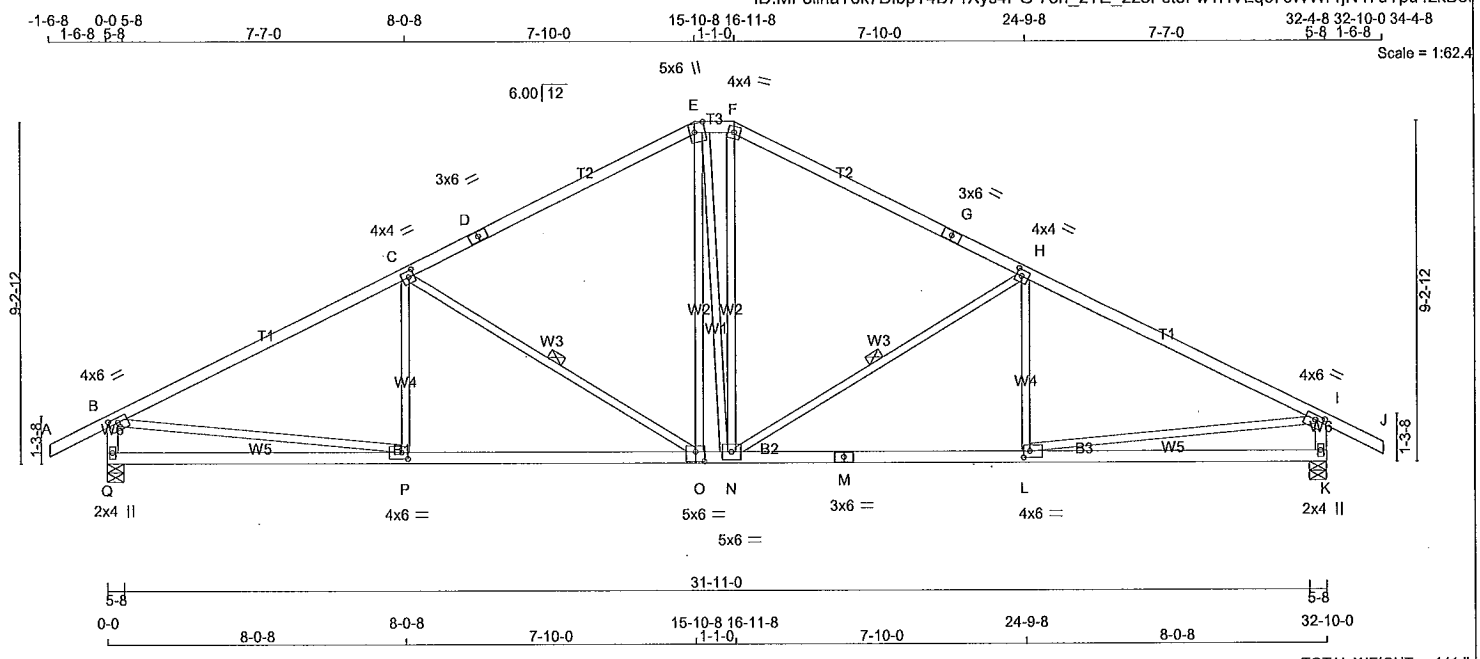


TOTAL WEIGHT = 141 lb [M][F]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
E - F	2x4	DRY	No.2	SPF
F - G	2x4	DRY	No.2	SPF
G - J	2x4	DRY	No.2	SPF
Q - B	2x4	DRY	No.2	SPF
K - I	2x4	DRY	No.2	SPF
Q - O	2x4	DRY	No.2	SPF
O - M	2x4	DRY	No.2	SPF
M - K	2x4	DRY	No.2	SPF
WEBS	2x3	DRY	No.2	SPF

EXCEPT

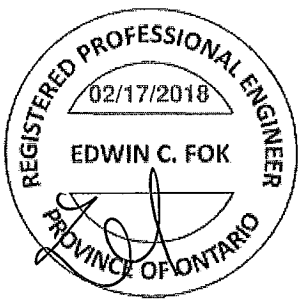
DRY: SEASONED LUMBER.

PLATES (table is in Inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	2.75
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TS-t	MT20	3.0	6.0		
E	TTWW+m	MT20	5.0	6.0	Edge	3.50
F	TTW-m	MT20	4.0	4.0		
G	TS-t	MT20	3.0	6.0		
H	TMWW-t	MT20	4.0	4.0	2.00	1.75
I	TMVW-t	MT20	4.0	6.0	1.50	2.75
K	BMV1+p	MT20	2.0	4.0		
L	BMWW-t	MT20	4.0	6.0	2.00	2.00
M	BS-t	MT20	3.0	6.0		
N	BMWWW-t	MT20	5.0	6.0		
O	BSWW-t	MT20	5.0	6.0	3.00	3.00
P	BMWW-t	MT20	4.0	6.0	2.00	2.00
Q	BMV1+p	MT20	2.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
Q	1709	0	1709	0	0	5-8	2-8
K	1709	0	1709	0	0	5-8	2-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
Q	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
K	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) Q, K

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.51 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF C-O, H-N.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	P- C	-73 / 107	0.04 (4)
B- C	-2278 / 0	-78.0	-78.0	0.89 (1)	3.51	C- O	-730 / 0	0.45 (1)
C- D	-1655 / 0	-78.0	-78.0	0.76 (1)	4.15	O- E	0 / 352	0.08 (1)
D- E	-1655 / 0	-78.0	-78.0	0.76 (1)	4.15	E- N	0 / 103	0.03 (4)
E- F	-1464 / 0	-78.0	-78.0	0.03 (1)	5.40	N- F	0 / 460	0.10 (1)
F- G	-1666 / 0	-78.0	-78.0	0.76 (1)	4.14	N- H	-713 / 0	0.44 (1)
G- H	-1666 / 0	-78.0	-78.0	0.76 (1)	4.14	L- H	-89 / 91	0.04 (1)
H- I	-2273 / 0	-78.0	-78.0	0.89 (1)	3.52	B- P	0 / 2082	0.47 (1)
I- J	0 / 28	-78.0	-78.0	0.14 (1)	10.00	L- I	0 / 2078	0.47 (1)
Q- B	-1650 / 0	0.0	0.0	0.17 (1)	6.45			
K- I	-1648 / 0	0.0	0.0	0.17 (1)	6.45			
Q- P	0 / 0	-18.5	-18.5	0.33 (4)	10.00			
P- O	0 / 2067	-18.5	-18.5	0.53 (4)	10.00			
O- N	0 / 1453	-18.5	-18.5	0.36 (1)	10.00			
N- M	0 / 2062	-18.5	-18.5	0.48 (4)	10.00			
M- L	0 / 2062	-18.5	-18.5	0.48 (4)	10.00			
L- K	0 / 0	-18.5	-18.5	0.28 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.10")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.28")

CSI: TC=0.89/1.00 (B-C;1) , BC=0.53/1.00 (O-P;4) , WB=0.47/1.00 (B-P;1) , SSI=0.27/1.00 (B-C;1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.90 (P) (INPUT = 0.90)
JSI METAL= 0.69 (M) (INPUT = 1.00)

A-18023594

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292603	H4	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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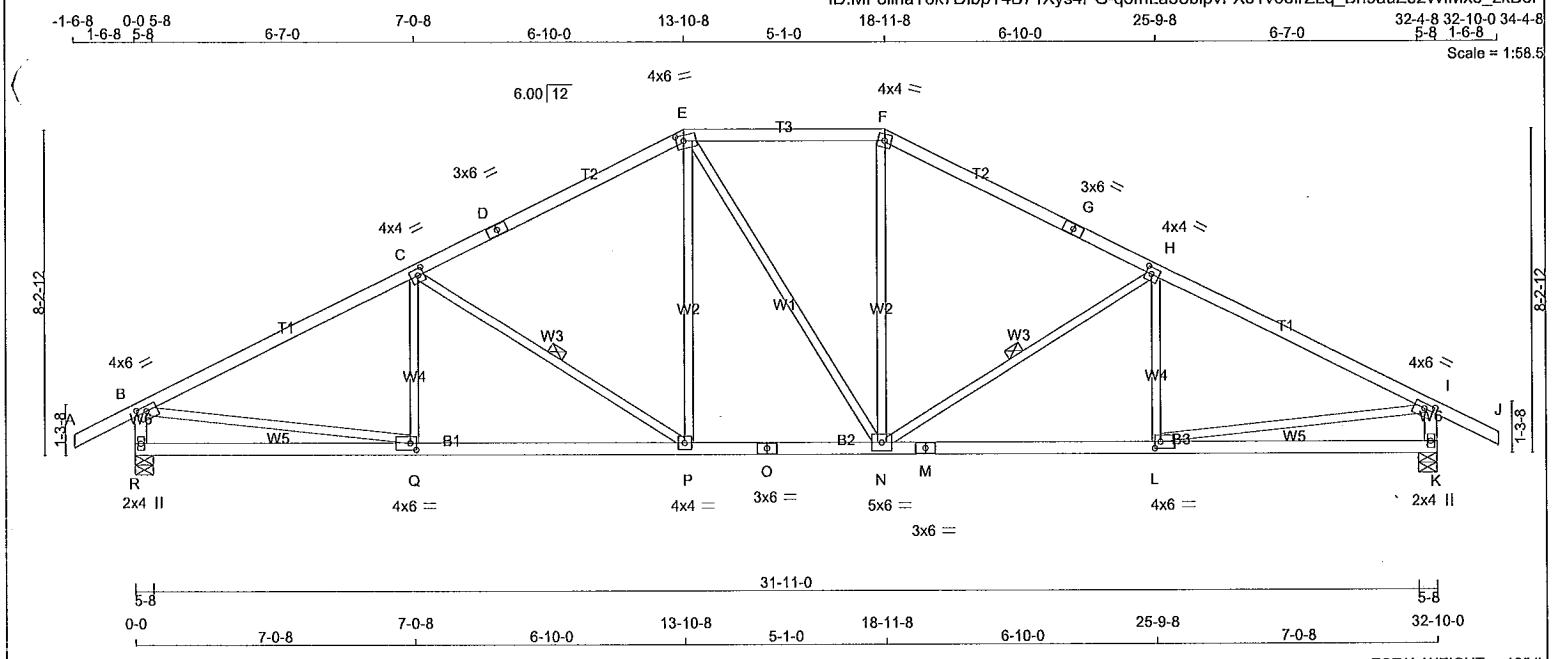


TOTAL WEIGHT = 135 lb

[M][F]

LUMBER
N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - E	2x4	DRY	No.2	SPF
E - F	2x4	DRY	No.2	SPF
F - G	2x4	DRY	No.2	SPF
G - J	2x4	DRY	No.2	SPF
R - B	2x4	DRY	No.2	SPF
K - I	2x4	DRY	No.2	SPF
R - O	2x4	DRY	No.2	SPF
O - M	2x4	DRY	No.2	SPF
[illegible] K	2x4	DRY	No.2	SPF
[illegible] EBS	2x3	DRY	No.2	SPF

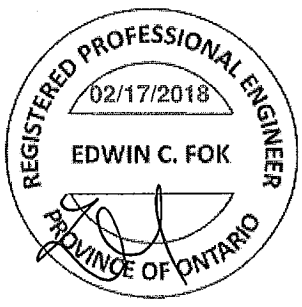
EXCEPT

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	2.75
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TS-t	MT20	3.0	6.0		
E	TTWW-m	MT20	4.0	6.0	1.75	2.25
F	TTW-m	MT20	4.0	4.0		
G	TS-t	MT20	3.0	6.0		
H	TMWW-t	MT20	4.0	4.0	2.00	1.75
I	TMVW-t	MT20	4.0	6.0	1.50	2.75
K	BMV1+p	MT20	2.0	4.0		
L	BMWW-t	MT20	4.0	6.0	2.00	1.75
M	BS-t	MT20	3.0	6.0		
N	BMWWW-t	MT20	5.0	6.0		
O	BS-t	MT20	3.0	6.0		
P	BMWW-t	MT20	4.0	4.0		
Q	BMWW-t	MT20	4.0	6.0	2.00	1.75
R	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
R	1709	0	1709	0	0	5-8	2-8
K	1709	0	1709	0	0	5-8	2-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
R	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
K	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) R, K

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 3.88 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF C-P, H-N.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	Q- C	-143 / 55	0.05 (1)
B- C	-2278 / 0	-78.0	-78.0	0.65 (1)	3.88	C- P	-550 / 0	0.26 (1)
C- D	-1821 / 0	-78.0	-78.0	0.57 (1)	4.33	P- E	0 / 403	0.09 (1)
D- E	-1821 / 0	-78.0	-78.0	0.57 (1)	4.33	E- N	0 / 1	0.00 (1)
E- F	-1607 / 0	-78.0	-78.0	0.29 (1)	4.91	N- F	0 / 405	0.09 (1)
F- G	-1822 / 0	-78.0	-78.0	0.57 (1)	4.33	N- H	-549 / 0	0.26 (1)
G- H	-1822 / 0	-78.0	-78.0	0.57 (1)	4.33	L- H	-144 / 55	0.05 (1)
H- I	-2278 / 0	-78.0	-78.0	0.65 (1)	3.88	B- Q	0 / 2083	0.47 (1)
I- J	0 / 28	-78.0	-78.0	0.14 (1)	10.00	L- I	0 / 2083	0.47 (1)
R- B	-1655 / 0	0.0	0.0	0.17 (1)	6.44			
K- I	-1655 / 0	0.0	0.0	0.17 (1)	6.44			
R- Q	0 / 0	-18.5	-18.5	0.22 (4)	10.00			
Q- P	0 / 2063	-18.5	-18.5	0.44 (1)	10.00			
P- O	0 / 1607	-18.5	-18.5	0.33 (1)	10.00			
O- N	0 / 1607	-18.5	-18.5	0.33 (1)	10.00			
N- M	0 / 2063	-18.5	-18.5	0.44 (1)	10.00			
M- L	0 / 2063	-18.5	-18.5	0.44 (1)	10.00			
L- K	0 / 0	-18.5	-18.5	0.22 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.10")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.21")

CSI: TC=0.65/1.00 (B-C:1) , BC=0.44/1.00 (P-Q:1) , WB=0.47/1.00 (B-Q:1) , SSI=0.24/1.00 (H-I:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.87 (R) (INPUT = 0.90)
JSI METAL= 0.61 (B) (INPUT = 1.00)

A-18023593

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292603	H3	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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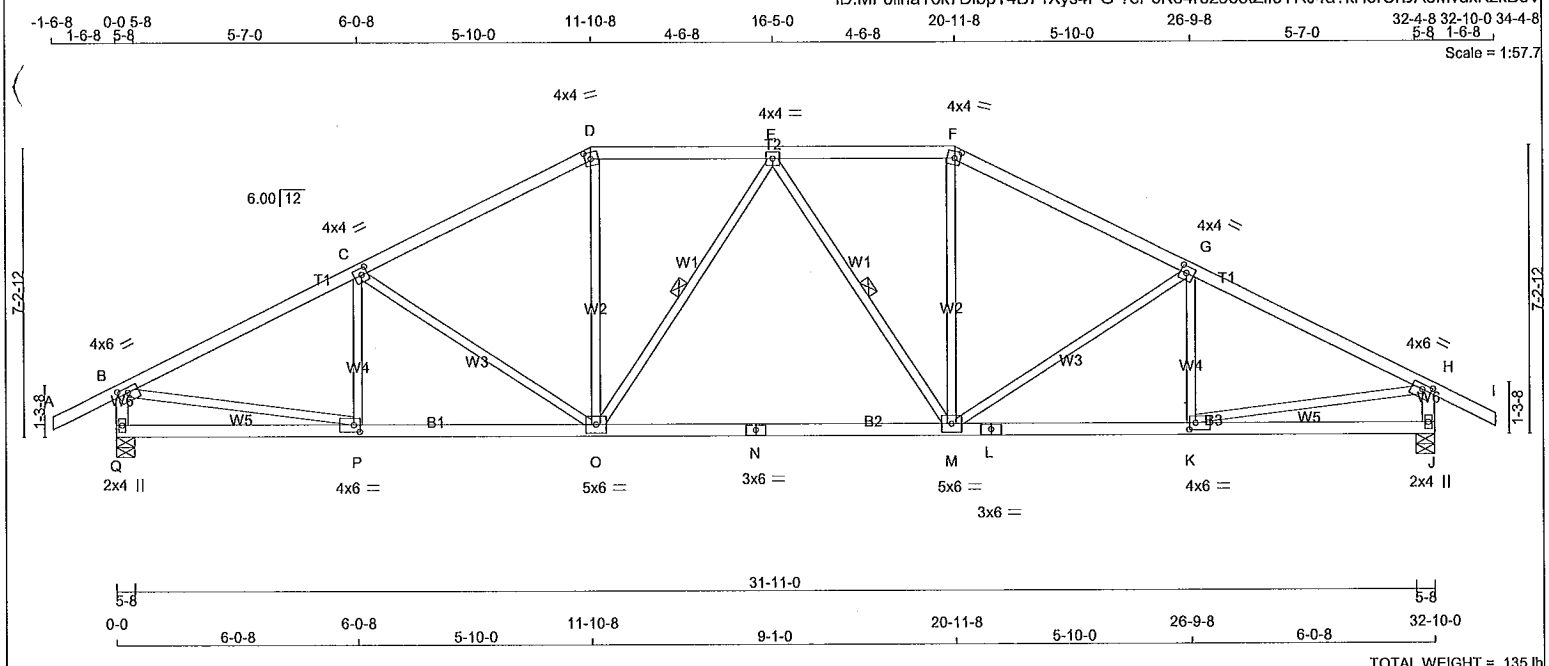

TOTAL WEIGHT = 135 lb

[M][F]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - F	2x4	DRY	No.2	SPF
F - I	2x4	DRY	No.2	SPF
Q - B	2x4	DRY	No.2	SPF
J - H	2x4	DRY	No.2	SPF
Q - N	2x4	DRY	No.2	SPF
N - L	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
WEBS T	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	4.0	6.0	1.50	2.75
C	TMWW-t	MT20	4.0	4.0	2.00	1.75
D	TTW-m	MT20	4.0	4.0	2.00	1.75
E	TMWW-t	MT20	4.0	4.0		
F	TTW-m	MT20	4.0	4.0	2.00	1.75
G	TMWW-t	MT20	4.0	4.0	2.00	1.75
H	TMVW-t	MT20	4.0	6.0	1.50	2.75
J	BMV1+p	MT20	2.0	4.0		
K	BMWW-t	MT20	4.0	6.0	2.00	1.75
L	BS-t	MT20	3.0	6.0		
M	BMWWW-t	MT20	5.0	6.0		
N	BS-t	MT20	3.0	6.0		
O	BMWWW-t	MT20	5.0	6.0		
P	BMWW-t	MT20	4.0	6.0	2.00	1.75
Q	BMV1+p	MT20	2.0	4.0		

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design

DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
Q	1709	0	1709	0	0	5-8	2-8
J	1709	0	1709	0	0	5-8	2-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
Q	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
J	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) Q, J

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.13 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF E-O, E-M.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00	P- C	-226 / 0	0.06 (1)
B- C	-2256 / 0	-78.0	-78.0	0.45 (1)	4.13	C- O	-358 / 0	0.35 (1)
C- D	-1974 / 0	-78.0	-78.0	0.41 (1)	4.40	O- D	0 / 562	0.13 (1)
D- E	-1751 / 0	-78.0	-78.0	0.23 (1)	4.82	O- E	-255 / 0	0.12 (1)
E- F	-1751 / 0	-78.0	-78.0	0.23 (1)	4.82	E- M	-255 / 0	0.12 (1)
F- G	-1974 / 0	-78.0	-78.0	0.41 (1)	4.40	M- F	0 / 562	0.13 (1)
G- H	-2256 / 0	-78.0	-78.0	0.45 (1)	4.13	M- G	-358 / 0	0.35 (1)
H- I	0 / 28	-78.0	-78.0	0.14 (1)	10.00	K- G	-226 / 0	0.06 (1)
Q- B	-1659 / 0	0.0	0.0	0.17 (1)	6.44	B- P	0 / 2066	0.46 (1)
J- H	-1659 / 0	0.0	0.0	0.17 (1)	6.44	K- H	0 / 2066	0.46 (1)
Q- P	0 / 0	-18.5	-18.5	0.14 (4)	10.00			
P- O	0 / 2040	-18.5	-18.5	0.46 (1)	10.00			
O- N	0 / 1889	-18.5	-18.5	0.44 (1)	10.00			
N- M	0 / 1889	-18.5	-18.5	0.44 (1)	10.00			
M- L	0 / 2040	-18.5	-18.5	0.46 (1)	10.00			
L- K	0 / 2040	-18.5	-18.5	0.46 (1)	10.00			
K- J	0 / 0	-18.5	-18.5	0.14 (4)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.09")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.28")

CSI: TC=0.45/1.00 (G-H:1) , BC=0.46/1.00 (K-M:1) , WB=0.46/1.00 (H-K:1) , SSI=0.20/1.00 (G-H:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (P) (INPUT = 0.90)
JSI METAL= 0.75 (N) (INPUT = 1.00)

A-18023592

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
292603	H2	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

Version 8.200 S Jan 6 2018 MiTek Industries, Inc. Sat Feb 17 16:32:02 2018 Page 1

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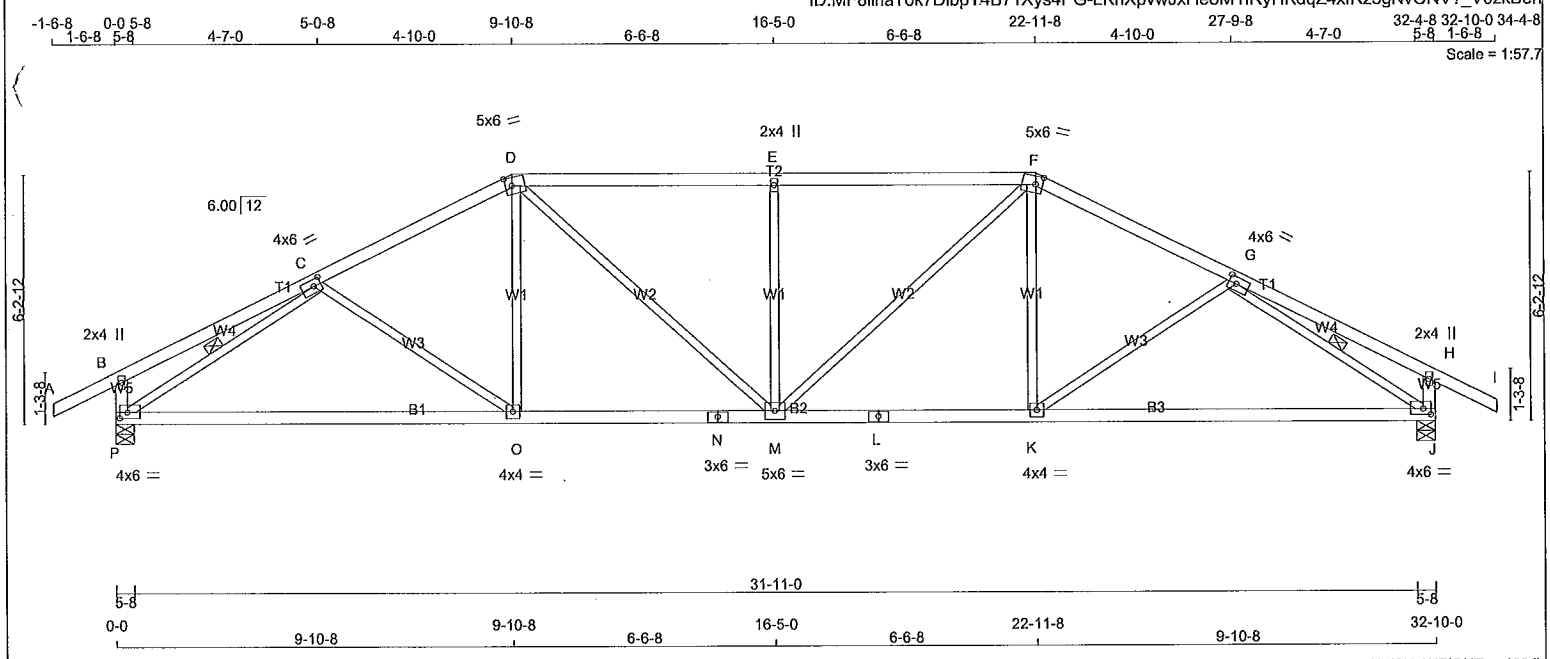


TOTAL WEIGHT = 130 lb

[M][F]

LUMBER

N. L. G. A. RULES

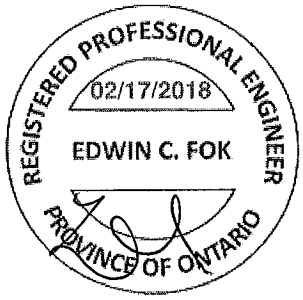
CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
D - F	2x4	DRY	No.2	SPF
F - I	2x4	DRY	No.2	SPF
P - B	2x4	DRY	No.2	SPF
J - H	2x4	DRY	No.2	SPF
P - N	2x4	DRY	No.2	SPF
N - L	2x4	DRY	No.2	SPF
L - J	2x4	DRY	No.2	SPF
WEBS T	2x3	DRY	No.2	SPF

DRY: SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMV+p	MT20	2.0	4.0		
C	TMWW-t	MT20	4.0	6.0	2.00	2.25
D	TTWW-m	MT20	5.0	6.0	2.50	2.00
E	TMW+w	MT20	2.0	4.0		
F	TTWW-m	MT20	5.0	6.0	2.50	2.00
G	TMWW-t	MT20	4.0	6.0	2.00	2.25
H	TMV+p	MT20	2.0	4.0		
J	BMVW1-t	MT20	4.0	6.0	1.75	2.25
K	BMWW-t	MT20	4.0	4.0		
L	BS-t	MT20	3.0	6.0		
M	BMWWW-t	MT20	5.0	6.0		
N	BS-t	MT20	3.0	6.0		
O	BMWW-t	MT20	4.0	4.0		
P	BMVW1-t	MT20	4.0	6.0	1.75	2.25

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
P	1709	0	1709	0	0	5-8	1-14
J	1709	0	1709	0	0	5-8	1-14

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
P	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0
J	1216	757 / 0	0 / 0	0 / 0	0 / 0	459 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) P, J

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 4.02 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

1 LATERAL BRACE(S) AT 1/ 2 LENGTH OF C-P, G-J.

END VERTICAL(S) MUST BE SHEATHED OR HAVE BRACES AS INDICATED IN THE MAX. UNBRACED LENGTH COLUMN OF THE TABLE BELOW

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH
A- B	0 / 28	-78.0	-78.0	0.14 (1)	10.00
B- C	0 / 19	-78.0	-78.0	0.29 (1)	10.00
C- D	-2111 / 0	-78.0	-78.0	0.29 (1)	4.43
D- E	-2257 / 0	-78.0	-78.0	0.52 (1)	4.02
E- F	-2257 / 0	-78.0	-78.0	0.52 (1)	4.02
F- G	-2111 / 0	-78.0	-78.0	0.29 (1)	4.43
G- H	0 / 19	-78.0	-78.0	0.29 (1)	10.00
H- I	0 / 28	-78.0	-78.0	0.14 (1)	10.00
P- B	-276 / 0	0.0	0.0	0.03 (1)	7.81
J- H	-276 / 0	0.0	0.0	0.03 (1)	7.81
P- O	0 / 1943	-18.5	-18.5	0.58 (4)	10.00
O- N	0 / 1874	-18.5	-18.5	0.59 (4)	10.00
N- M	0 / 1874	-18.5	-18.5	0.59 (4)	10.00
M- L	0 / 1874	-18.5	-18.5	0.59 (4)	10.00
L- K	0 / 1874	-18.5	-18.5	0.59 (4)	10.00
K- J	0 / 1943	-18.5	-18.5	0.58 (4)	10.00

WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
C- O	-90 / 42	0.06 (1)
O- D	0 / 245	0.07 (4)
D- M	0 / 518	0.12 (1)
M- E	-627 / 0	0.39 (1)
M- F	0 / 518	0.12 (1)
K- F	0 / 245	0.07 (4)
K- G	-90 / 42	0.06 (1)
P- C	-2370 / 0	0.61 (1)
G- J	-2370 / 0	0.61 (1)

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF
	DL =	6.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.4	PSF
TOTAL LOAD	=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (1.09")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.11")
ALLOWABLE DEFL.(TL)= L/360 (1.09")
CALCULATED VERT. DEFL.(TL) = L/ 999 (0.35")

CSI: TC=0.52/1.00 (D-E:1) , BC=0.59/1.00 (K-M:4) , WB=0.61/1.00 (G-J:1) , SSI=0.25/1.00 (D-E:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 Inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (J) (INPUT = 0.90)
JSI METAL= 0.60 (N) (INPUT = 1.00)

A-18023591

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291813	L2	3	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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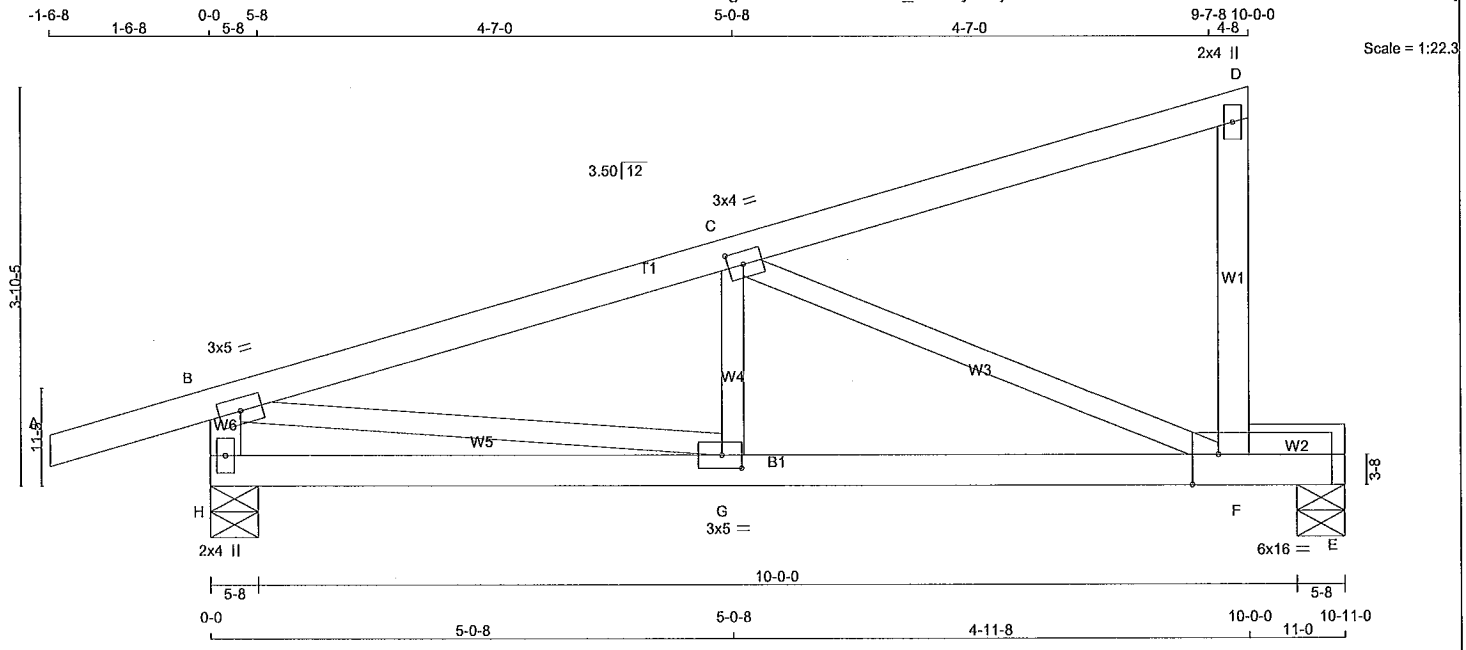


TOTAL WEIGHT = 3 X 41 = 122 lb

[M]

LUMBER
N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - D	2x4	DRY	No.2	SPF
F - D	2x4	DRY	No.2	SPF
H - B	2x4	DRY	No.2	SPF
H - E	2x4	DRY	No.2	SPF
F - E	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

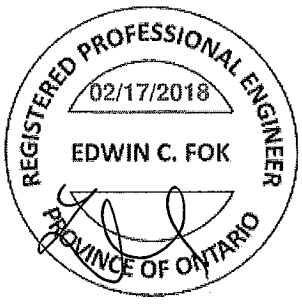
[*] SEASONED LUMBER.

PLATES (table is in inches)

JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	5.0		
C	TMWW-t	MT20	3.0	4.0	1.50	1.75
D	TMV+p	MT20	2.0	4.0		
F	BMVWW-t	MT20	6.0	16.0	Edge	3.00
G	BMWW-t	MT20	3.0	5.0	1.50	2.25
H	BMV1+p	MT20	2.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG	REQRD BRG
H	647	0	647	0	0	5-8	1-8
E	458	0	458	0	0	5-8	1-8

UNFACTORED REACTIONS

JT	1ST LCASE COMBINED	MAX./MIN. COMPONENT REACTIONS SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
H	459	294 / 0	0 / 0	0 / 0	0 / 0	165 / 0	0 / 0
E	328	192 / 0	0 / 0	0 / 0	0 / 0	136 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) H, E

BRACING
TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 6.13 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING
TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD LC1 (PLF) FROM	TO	MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 17	-78.0	-78.0	0.14 (1)	10.00	G- C	0 / 134	0.05 (4)
B- C	-861 / 0	-78.0	-78.0	0.33 (1)	6.13	C- F	-911 / 0	0.42 (1)
C- D	-13 / 0	-78.0	-78.0	0.30 (1)	6.25	B- G	0 / 845	0.19 (1)
F- D	-148 / 0	0.0	0.0	0.03 (1)	7.81			
H- B	-627 / 0	0.0	0.0	0.06 (1)	7.81			
H- G	0 / 0	-18.5	-18.5	0.20 (4)	10.00			
G- F	0 / 838	-18.5	-18.5	0.70 (1)	10.00			
F- E	0 / 0	-18.5	-18.5	0.23 (1)	10.00			

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL =	21.0	PSF
	DL =	6.0	PSF
BOT CH.	LL =	0.0	PSF
	DL =	7.4	PSF
TOTAL LOAD	=	34.4	PSF

SPACING = 24.0 IN. C/C

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.36")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.11")
ALLOWABLE DEFL.(TL)= L/360 (0.36")
CALCULATED VERT. DEFL.(TL) = L/ 563 (0.23")

CSI: TC=0.33/1.00 (B-C:1) , BC=0.70/1.00 (F-G:1) , WB=0.42/1.00 (C-F:1) , SSI=0.18/1.00 (B-C:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.10 COMP=1.10 SHEAR=1.10 TENS= 1.10

COMPANION LIVE LOAD FACTOR = 1.00

AUTOSOLVE RIGHT HEEL ONLY

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.86 (G) (INPUT = 0.90)
JSI METAL= 0.28 (B) (INPUT = 1.00)

A-18023576

JOB NAME	TRUSS NAME	QUANTITY	PLY	JOB DESC.	DRWG NO.
291813	L1	1	1	TRUSS DESC.	

Alpa Roof Truss, Maple

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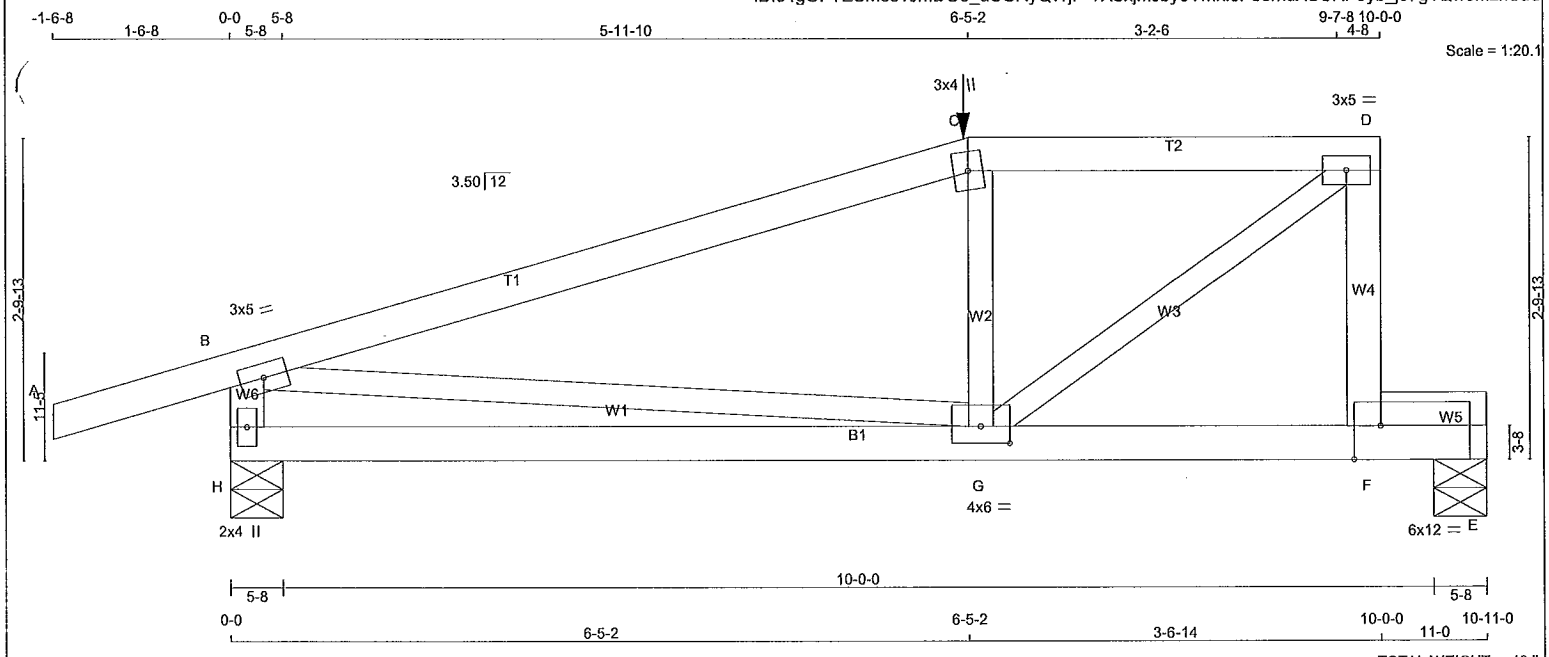


TOTAL WEIGHT = 40 lb [M]

LUMBER

N. L. G. A. RULES

CHORDS	SIZE		LUMBER	DESCR.
A - C	2x4	DRY	No.2	SPF
C - D	2x4	DRY	No.2	SPF
F - D	2x4	DRY	No.2	SPF
H - B	2x4	DRY	No.2	SPF
H - E	2x4	DRY	No.2	SPF
F - E	2x4	DRY	No.2	SPF
ALL WEBS EXCEPT	2x3	DRY	No.2	SPF

EASONED LUMBER.

PLATES (table is in inches)

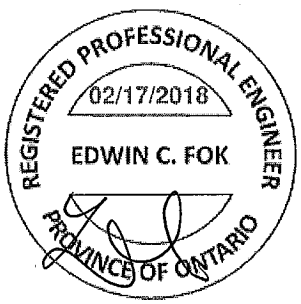
JT	TYPE	PLATES	W	LEN	Y	X
B	TMVW-t	MT20	3.0	5.0		
C	TTW+m	MT20	3.0	4.0		
D	TMVW-t	MT20	3.0	5.0		
F	BMVW-t	MT20	6.0	12.0	Edge	2.75
G	BMWWW-t	MT20	4.0	6.0	1.75	3.00
H	BMV1+p	MT20	2.0	4.0		

Edge - INDICATES REFERENCE CORNER OF PLATE TOUCHES EDGE OF CHORD.

HANGERS NOTES

1) SPECIAL HANGER(S) OR CONNECTION(S) REQUIRED TO SUPPORT CONCENTRATED LOAD(S) 41.8 lbs FACTORED DOWN AT 6-5-2 ON TOP CHORD. DESIGN FOR UNSPECIFIED CONNECTION(S) IS DELEGATED TO THE BUILDING DESIGNER.

NOTE: Lateral brace(s) shown shall be 1x4 for Part 9 design as per OBC 9.23.13.11, and no less than 2x4 for Part 4 design



DIMENSIONS, SUPPORTS AND LOADINGS SPECIFIED BY FABRICATOR TO BE VERIFIED BY BUILDING DESIGNER

BEARINGS

JT	FACTORED GROSS REACTION VERT	HORZ	MAXIMUM FACTORED GROSS REACTION DOWN	HORZ	UPLIFT	INPUT BRG IN-SX	REQRD BRG IN-SX
H	667	0	667	0	0	5-8	1-8
E	551	0	551	0	0	5-8	1-8

UNFACTORED REACTIONS

1ST LCASE MAX./MIN. COMPONENT REACTIONS

JT	COMBINED	SNOW	LIVE	PERM.LIVE	WIND	DEAD	SOIL
H	473	305 / 0	0 / 0	0 / 0	0 / 0	168 / 0	0 / 0
E	392	242 / 0	0 / 0	0 / 0	0 / 0	150 / 0	0 / 0

BEARING MATERIAL TO BE SPF NO.2 OR BETTER AT JOINT(S) H, E

BRACING

TOP CHORD TO BE SHEATHED OR MAX. PURLIN SPACING = 5.94 FT.
MAX. UNBRACED BOTTOM CHORD LENGTH = 10.00 FT OR RIGID CEILING DIRECTLY APPLIED.

ALL PITCH BREAKS AND PERIMETER CORNER JOINTS MUST BE LATERALLY RESTRAINED.

LOADING

TOTAL LOAD CASES: (4)

CHORDS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	FACTORED VERT. LOAD (PLF) FROM	TO	LC1 MAX CSI (LC)	MAX. UNBRAC LENGTH	WEBS MEMB. FR-TO	MAX. FACTORED FORCE (LBS)	MAX CSI (LC)
A- B	0 / 17	-78.0	-78.0	0.15 (1)	10.00	G- C	-243 / 0	0.04 (1)
B- C	-676 / 0	-78.0	-78.0	0.65 (1)	5.94	G- D	0 / 787	0.19 (1)
C- D	-630 / 0	-78.0	-78.0	0.19 (1)	6.25	B- G	0 / 652	0.16 (1)
F- D	-610 / 0	0.0	0.0	0.09 (1)	7.81			
H- B	-627 / 0	0.0	0.0	0.07 (1)	7.81			
H- G	0 / 0	-18.5	-18.5	0.25 (4)	10.00			
G- F	0 / 0	-18.5	-18.5	0.70 (1)	10.00			
F- E	0 / 0	-96.5	-96.5	0.29 (1)	10.00			

FACTORED CONCENTRATED LOADS (LBS)

JT	LOC.	LC1	MAX-	MAX+	FACE	DIR.	TYPE
C	6-5-2	-42	-42	---	FRONT	VERT	TOTAL

DESIGN CRITERIA

SPECIFIED LOADS:

TOP CH.	LL	=	21.0	PSF
	DL	=	6.0	PSF
BOT CH.	LL	=	0.0	PSF
	DL	=	7.4	PSF
TOTAL LOAD		=	34.4	PSF

SPACING = 24.0 IN. C/C

LOADING IN FLAT SECTION BASED ON A SLOPE OF 2.00/12 MINIMUM

GIRDER TYPE: CPrimeHip
LEFT SETBACK = 6-5-2
RIGHT SETBACK = 0-0
END SETBACK = 2-0-0
END WALL WIDTH = 0-0
CORNER FRAMING TYPE: CONVENTIONAL
END JACK TYPE: CONVENTIONAL
APPLIED TO FRONT SIDE
- ADDT'L LOADS BASED ON 55 % OF GSL.

THIS TRUSS IS DESIGNED FOR RESIDENTIAL OR SMALL BUILDING REQUIREMENTS OF PART 9, NBCC 2010, NBCC 2015

THIS DESIGN COMPLIES WITH:
- PART 9 OF OBC 2012, OBC 2018
- CSA 086-09, CSA 086-14
- TPIC 2011, TPIC 2014

(55 % OF 23.0 P.S.F. G.S.L. PLUS 8.4 P.S.F. RAIN LOAD) EQUALS 21.0 P.S.F. SPECIFIED ROOF LIVE LOAD

ALLOWABLE DEFL.(LL)= L/360 (0.36")
CALCULATED VERT. DEFL.(LL) = L/ 999 (0.08")
ALLOWABLE DEFL.(TL)= L/360 (0.36")
CALCULATED VERT. DEFL.(TL) = L/ 897 (0.15")

CSI: TC=0.65/1.00 (B-C:1) , BC=0.70/1.00 (F-G:1) , WB=0.19/1.00 (D-G:1) , SSI=0.24/1.00 (E-F:1)

DOL LUMBER=1.00 NAIL=1.00 LS BEND=1.00 COMP=1.00 SHEAR=1.00 TENS= 1.00

COMPANION LIVE LOAD FACTOR = 1.00

TRUSS PLATE MANUFACTURER IS NOT RESPONSIBLE FOR QUALITY CONTROL IN THE TRUSS MANUFACTURING PLANT .

NAIL VALUES

PLATE	GRIP(DRY) (PSI) MAX	MIN	SHEAR (PLI) MAX	MIN	SECTION (PLI) MAX	MIN
MT20	618	354	1667	788	1987	1656

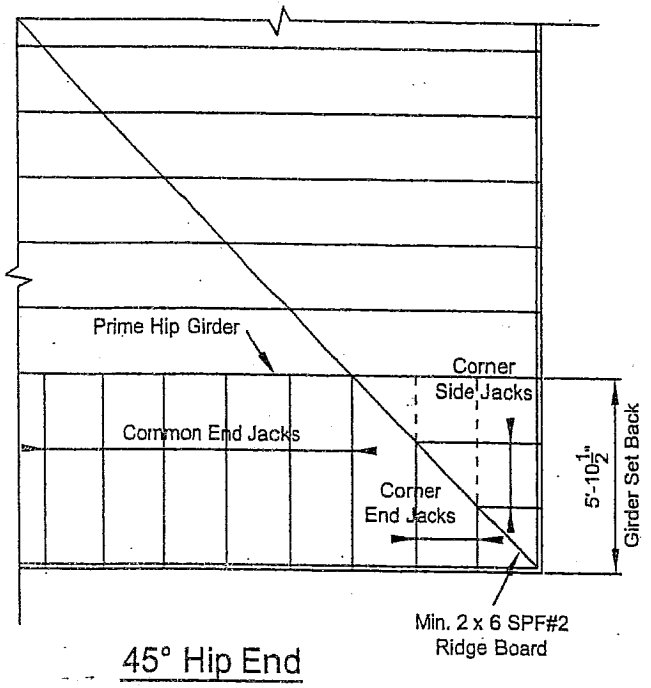
PLATE PLACEMENT TOL. = 0.250 inches

PLATE ROTATION TOL. = 5.0 Deg.

JSI GRIP= 0.89 (G) (INPUT = 0.90)
JSI METAL= 0.24 (F) (INPUT = 1.00)

A-18023575

STRACON ENGINEERING INC.



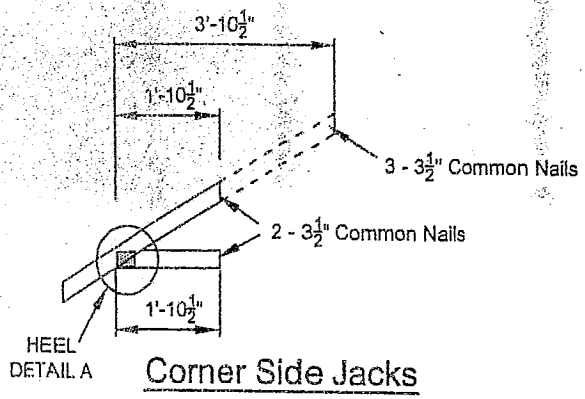
45° Hip End

LUMBER SPECIFICATION

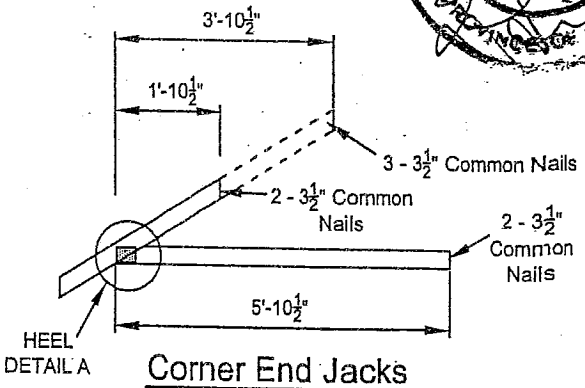
TOP CHORD : 2 x 4 SPF#2
BOTTOM CHORD : 2 x 4 SPF#2
WEBS : 2 x 3 SPF#2
UNLESS OTHERWISE SHOWN

DESIGN LOAD

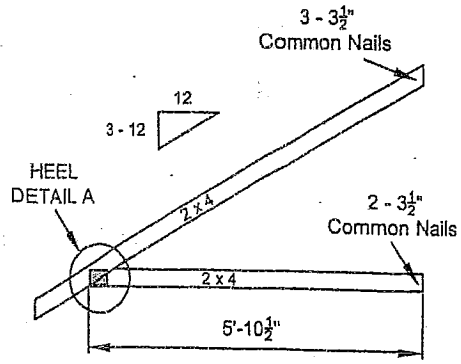
TOP CHORD SNOW LOAD	:	40.5 P.S.F.
TOP CHORD DEAD LOAD	:	3.0 P.S.F.
BOTTOM CHORD LIVE LOAD	:	0.0 P.S.F.
BOTTOM CHORD DEAD LOAD	:	7.0 P.S.F.
TOTAL LOAD	:	50.5 P.S.F



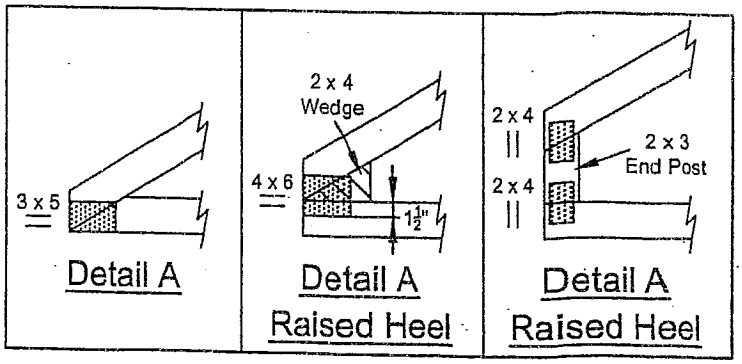
Corner Side Jacks



Corner End Jacks



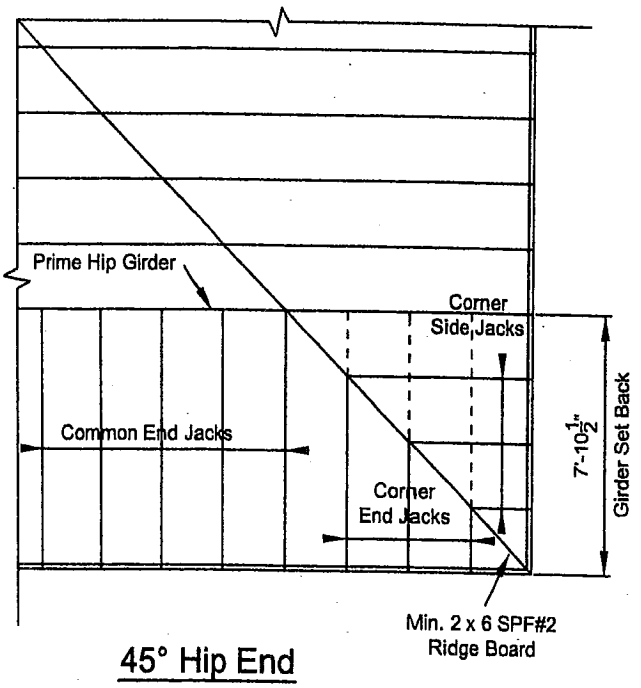
Common End Jacks



NOTE: DESIGN CONFORMS TO PART 9, O.B.C. 2012 (L.S.D. DESIGN)

CS-51008

STRACON ENGINEERING INC.



45° Hip End

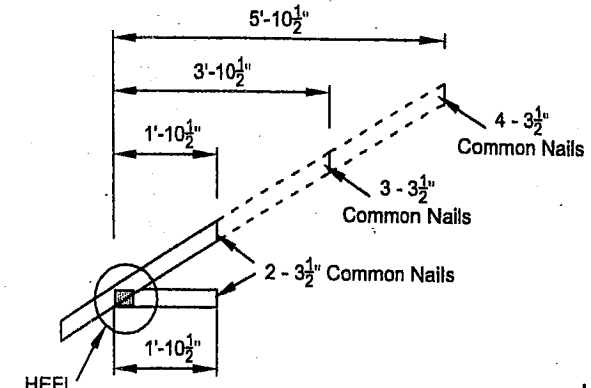
LUMBER SPECIFICATION

TOP CHORD	:	2 x 4 SPF#2
BOTTOM CHORD	:	2 x 4 SPF#2
WEBS	:	2 x 3 SPF#2

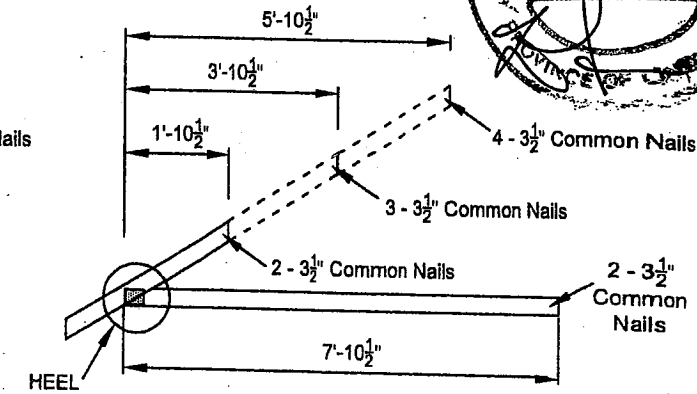
UNLESS OTHERWISE SHOWN

DESIGN LOAD

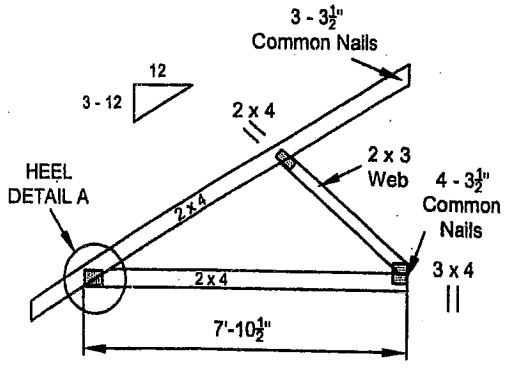
TOP CHORD SNOW LOAD	:	34.8 P.S.F.
TOP CHORD DEAD LOAD	:	3.0 P.S.F.
BOTTOM CHORD LIVE LOAD	:	0.0 P.S.F.
BOTTOM CHORD DEAD LOAD	:	7.0 P.S.F.
TOTAL LOAD	:	44.8 P.S.F



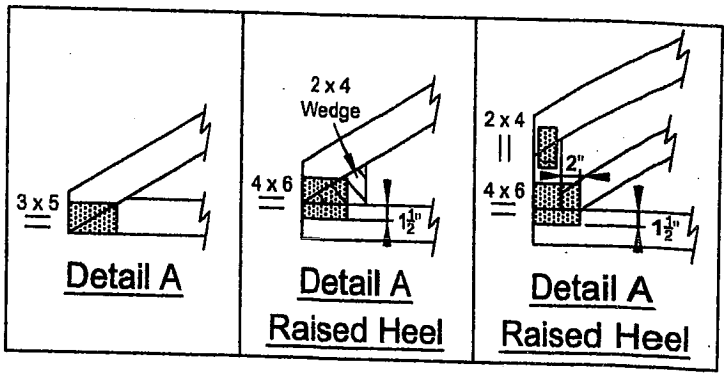
Corner Side Jacks



Corner End Jacks



Common End Jacks



NOTE: DESIGN CONFORMS TO PART 9, O.B.C. 2012 (L.S.D. DESIGN)

CS-71008N

LUS – Double Shear Joist Hangers

SIMPSON Strong-Tie®

All LUS hangers have double shear nailing. This patented innovation distributes the load through two points on each joist nail for greater strength. It also allows the use of fewer nails, faster installation and the use of common nails for all connections.

Material: 18 gauge

Finish: G90 galvanized

Design:

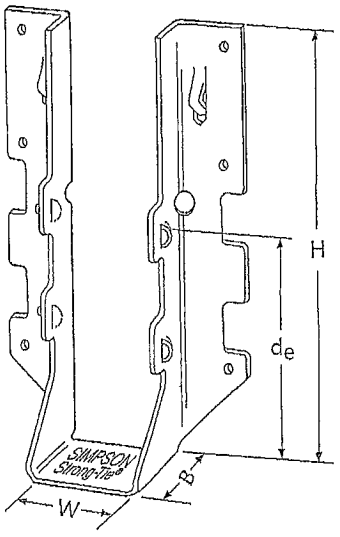
- Factored resistances are in accordance with CSA O86-14.
- Uplift resistances have been increased 15%. No further increase is permitted.
- Wood shear is not considered in the factored resistances given. The specifier must ensure that the joist and header capacities are capable of withstanding these loads.

Installation:

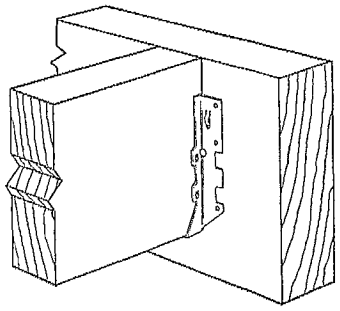
- Use all specified fasteners.
- Nails: 16d = 0.162" dia. x 3½" long common wire, 10d = 0.148" x 3" long common wire.
- Double shear nails must be driven at an angle through the joist or truss into the header to achieve the table loads.
- Not designed for welded or nailer applications.

Options:

- These hangers cannot be modified



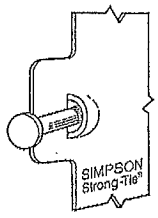
LUS28



Typical LUS Installation

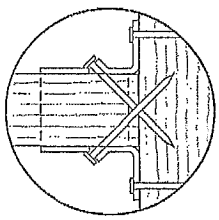
Model No.	Ga.	Dimensions (in.)				Fasteners		Factored Resistance (lb.)			
								D.Fir-L		S-P-F	
		W	H	B	d_e[1]	Face	Joist	Uplift (K_D=1.15)	Normal (K_D=1.00)	Uplift (K_D=1.15)	Normal (K_D=1.00)
LUS24	18	1⁹⁄₁₆	3⅛	1¾	1 15⁄16	(4) 10d	(2) 10d	710	1630	645	1155
LUS24-2	18	3⅛	3⅛	2	1 13⁄16	(4) 16d	(2) 16d	835	2020	590	1435
LUS26	18	1⁹⁄₁₆	4¾	1¾	3⅝	(4) 10d	(4) 10d	1420	2170	1290	1630
LUS26-2	18	3⅛	4⅞	2	4	(4) 16d	(4) 16d	1720	2595	1545	1920
LUS26-3	18	4⅝	4⁹⁄₁₆	2	3¼	(4) 16d	(4) 16d	1720	2595	1545	2340
LUS28	18	1⁹⁄₁₆	6⅝	1¾	3¾	(6) 10d	(6) 10d	1420	2520	1290	1790
LUS28-2	18	3⅛	7	2	4	(6) 16d	(4) 16d	1720	3325	1545	2575
LUS28-3	18	4⅝	6¼	2	3¼	(6) 16d	(4) 16d	1720	3325	1545	2375
LUS210	18	1⁹⁄₁₆	7 13⁄16	1¾	3⅞	(8) 10d	(4) 10d	1420	2785	1290	2210
LUS210-2	18	3⅛	9	2	6	(8) 16d	(6) 16d	2580	4500	2320	3195
LUS210-3	18	4⅝	8⁹⁄₁₆	2	5¼	(8) 16d	(6) 16d	2580	3345	2320	2375

1. d_e is the distance from the seat of the hanger to the highest joist nail.

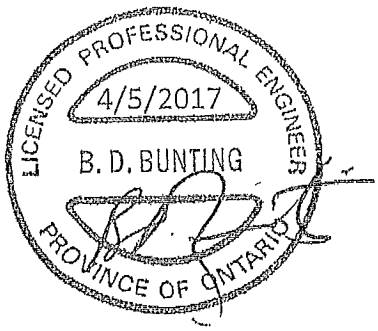


Dome Double Shear Nailing prevents tabs breaking off (available on some models).

U.S. Patent 5,603,580



Double Shear Nailing Top View.



LIMIT STATES DESIGN

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(800) 999-5099
strongtie.com

TECHNICAL BULLETIN

HHUS – Double Shear Joist Hangers

SIMPSON Strong-Tie®

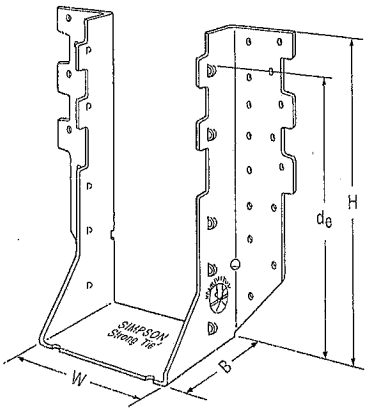
All HHUS hangers have double shear nailing. This patented innovation distributes the load through two points on each joist nail for greater strength. It also allows the use of fewer nails, faster installation and the use of common nails for all connections. Do not bend or remove tabs.

Material: 14 gauge

Finish: G90 galvanized

Design:

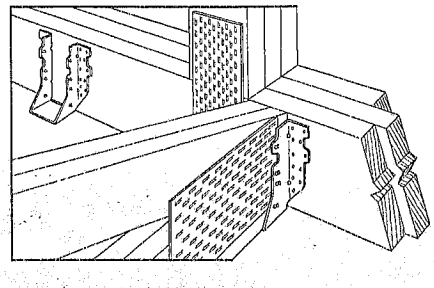
- Factored resistances are in accordance with CSA O86-14.
- Uplift resistances have been increased 15%. No further increase is permitted.
- Wood shear is not considered in the factored resistances given. The specifier must ensure that the joist and header capacities are capable of withstanding these loads.



HHUS410

Installation:

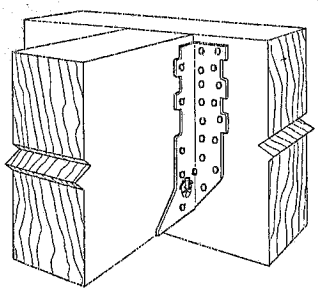
- Use all specified fasteners
- Nails: 16d = 0.162" dia. x 3½" long common wire
- Double shear nails must be driven at an angle through the joist or truss into the header to achieve the table loads
- Not designed for welded or nailer applications



Typical HHUS Installation (Truss Designer to provide fastener quantity for connecting multiple members together)

Options:

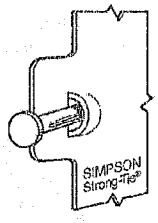
- See current catalogue for options



Typical HHUS Installation

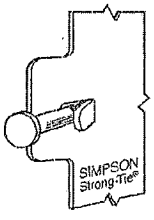
Model No.	Ga.	Dimensions (in.)				Fasteners		Factored Resistance (lb.)			
								D.Fir-L		S-P-F	
		W	H	B	d_e[1]	Face	Joist	Uplift (K_D=1.15)	Normal (K_D=1.00)	Uplift (K_D=1.15)	Normal (K_D=1.00)
HHUS26-2	14	3 5/16	5 13/16	3	3 15/16	(14) 16d	(6) 16d	2850	7335	2065	5205
HHUS28-2	14	3 5/16	7 1/32	3	6 5/32	(22) 16d	(8) 16d	3765	8940	2675	6345
HHUS210-2	14	3 5/16	9 3/32	3	8	(30) 16d	(10) 16d	4745	9660	4310	7000
HHUS210-3	14	4 11/16	9	3	7 15/16	(30) 16d	(10) 16d	4745	10545	4310	7485
HHUS210-4	14	6 1/8	8 29/32	3	7 27/32	(30) 16d	(10) 16d	4745	10545	4310	7485
HHUS46	14	3 5/8	5 13/32	3	3 15/16	(14) 16d	(6) 16d	2540	7335	2065	5205
HHUS48	14	3 5/8	7 1/8	3	6 1/8	(22) 16d	(8) 16d	3765	8945	2267	6345
HHUS410	14	3 5/8	9	3	8	(30) 16d	(10) 16d	4745	9855	4310	7000
HHUS5.50/10	14	5 1/2	9	3	8	(30) 16d	(10) 16d	4745	10545	4310	7485
HHUS7.25/10	14	7 1/4	9	3 5/16	7 29/32	(30) 16d	(10) 16d	4745	10770	4310	7650

1. d_e is the distance from the seat of the hanger to the highest joist nail.

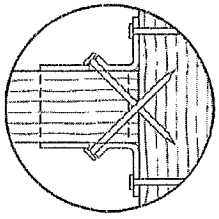


Dome Double Shear Nailing prevents tabs breaking off (available on some models).

U.S. Patent 5,603,580



Double Shear Nailing Side View. Do not bend tab back.



Double Shear Nailing Top View.

LIMIT STATES DESIGN

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(800) 999-5099
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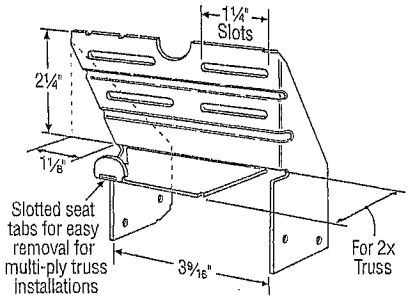
TC – Truss Connectors

The TC truss connector is an ideal connector for scissor trusses and can allow horizontal movement up to 1¼". The TC also attaches plated trusses to top plates or sill plates to resist uplift forces. Typically used on one or both ends of truss as determined by the building designer.

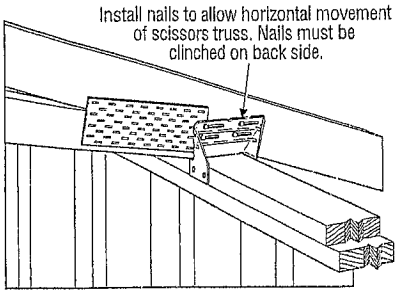
Material: 16 gauge

Finish: G90 galvanized

Design: Factored resistances are in accordance with CSA 086-14



TC24
U.S. Patent 4,932,173



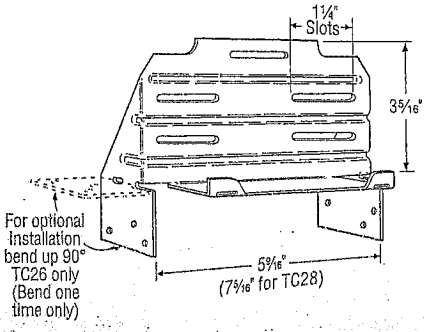
Typical TC24 Installation

Installation:

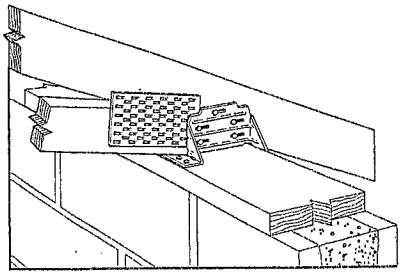
- Use all specified fasteners.
- Nails: 10d = 0.148" dia. x 3" long common wire, 10d x 1½ = 0.148" dia. x 1½" long.
- Drive 10d nails into the truss at the inside end of the slotted holes (inside end is towards the centre of the truss) and clinch on the back side. Do not seat these nails into the truss–allow room under the nail head for movement of the truss with respect to the wall.

Optional TC Installation:

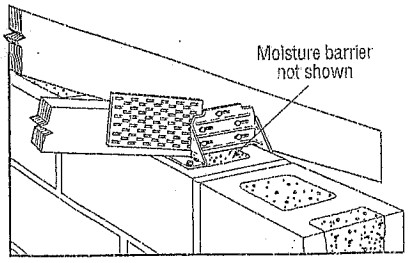
- Bend one flange up 90°. Drive specified nails into the top and face of the top plates or install Titen® screws into the top and face of masonry wall. See optional load tables and installation details.



TC26
(TC28 Similiar)



Optional TC26 Installation for Grouted Concrete Block using a Wood Nailer
(8", 10", 12" Wall Installation Similar)



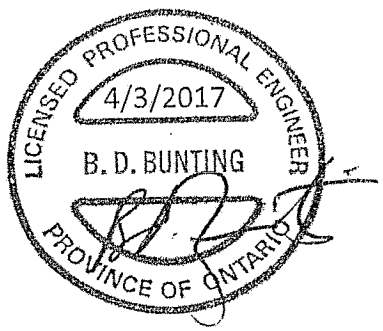
Optional TC26 Installation for Grouted Concrete Block using Titen Screws

Model No.	Fasteners		Factored Resistance	
	Truss	Wall Plates	D.Fir-L	S-P-F
			Uplift (K_D=1.15)	Uplift (K_D=1.15)
			lb.	lb.
TC24	(4) 10d	(4) 10d	605	430
TC26	(5) 10d	(6) 10d	1015	720
TC28	(5) 10d	(6) 10d	1015	720

Optional TC Installation Table

Model No.	Fasteners		Factored Resistance	
	Truss	Wall Plates	D.Fir-L	S-P-F
			Uplift (K_D=1.15)	Uplift (K_D=1.15)
			lb.	lb.
TC26	(5) 10d	(6) 10d x 1½"	810	660
	(5) 10d	(6) 10d	930	660

1. Factored resistances have been increased 15% for earthquake or wind loading; no further increase allowed; reduce where other loads govern.
2. Grout strength is 15 MPa minimum.
3. Optional TC26 installation with 10d nails requires minimum 3" top plate thickness.
4. TC26 fastened to grouted concrete block with (6) – ⅜" x 2¼" Titen screws has a factored uplift resistance of 275 lb.



LIMIT STATES DESIGN

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