

CITY OF SACRAMENTO
1231 I Street, Sacramento, CA 95814

Permit No: 9712955
Insp Area: 2

Site Address: 15 RIVERMOOR CT SAC
Parcel No: 0310317011

Sub-Type: RES
Housing (Y/N): N

CONTRACTOR
WEATHERTITE ROOFING
4661 SUMMER CREEK
SACRAMENTO, CA
Phone: 916-672-1113

OWNER
TAMURA REY/KEIKO
15 RIVERMOOR CT
SACRAMENTO CA 95831
Phone:

ARCHITECT
Phone:

Nature of Work: REROOF - TILE

CONSTRUCTION LENDING AGENCY: I hereby affirm under penalty of perjury that there is a construction lending agency for the performance of the work for which this permit is issued (Sec. 3097, Civ. C).

Lender's Name _____ Lender's Address _____

LICENSED CONTRACTORS DECLARATION: I hereby affirm under penalty of perjury that I am licensed under provisions of Chapter 9 (commencing with section 7000) of Division 3 of the Business and Professions Code and my license is in full force and effect.

License Class C39 License Number 420375 Date 9/17/97 Contractor Signature Carolyn Pen

OWNER-BUILDER DECLARATION: I hereby affirm under penalty of perjury that I am exempt from the contractors License Law for the following reason (Sec. 7031.5, Business and Professions Code; any city or county which requires a permit to construct, alter, improve, demolish, or repair any structure, prior to its issuance, also requires the applicant for such permit to file a signed statement that he or she is licensed pursuant to the provisions of the Contractors License Law (Chapter 9 (commencing with Section 7000) of Division 8 of the Business and Professions Code) or that he or she is exempt therefrom and the basis for the alleged exemption. Any violation of Section 7031.5 by any applicant for a permit subjects the applicant to a civil penalty of not more than five hundred dollars (\$500.00);

____ I, as a owner of the property, or my employees with wages as their sole compensation, will do the work, and the structure is not intended or offered for sale (Sec. 7044, Business and Professional Code: The Contractors Law does not apply to an owner of property who builds or improves thereon, and who does such work himself or herself or through his or her own employees, provided that such improvements are not intended or offered for sale. If, however, the building or improvement is sold within one year of completion, the owner-builder will have the burden of proving that he or she did not build or improve for the purpose of sale.)

____ I, as owner of the property, am exclusively contracting with licensed contractors to construct the project (Sec. 7044, Business and Professions Code: The contractors License Law does not apply to an owner of property who builds or improves thereon, and who contracts for such projects with a contractor(s) licensed pursuant to the Contractors License Law).

____ I am exempt under Sec. _____ B & PC for this reason: _____

Date _____ Owner Signature _____

In issuing this building permit, the applicant represents, and the city relies on the representation of the applicant, that the applicant verified all measurements and locations shown on the application or accompanying drawings and that the improvement to be constructed does not violate any law or private agreement relating to permissible or prohibited locations for such improvements. This building permit does not authorize any illegal location of any improvement or the violation of any private agreement relating to location of improvements.

Date _____ Applicant/Agent Signature _____

WORKER'S COMPENSATION DECLARATION: I hereby affirm under penalty of perjury one of the following declarations:

____ I have and will maintain a certificate of consent to self-insure for workers' compensation as provided for by Section 3700 of the Labor Code, for the performance of work for which the permit is issued.

I have and will maintain workers' compensation insurance, as required by Section 3700 of the Labor Code, for the performance of the work for which this permit is issued. My workers' compensation insurance carrier and policy number are: 261-01 do

Carrier State Fund Policy Number 1271896

____ (This section need not be completed if the permit is for \$100 or less) I certify that in the performance of the work for which this permit is issued, I shall not employ any person in any manner so as to become subject to the workers' compensation laws of California and agree that if I should become subject to the workers' compensation provisions of Section 3700 of the Labor Code, I shall forthwith comply with those provisions.

Date 9/17/97 Applicant Signature Carolyn Pen

WARNING: FAILURE TO SECURE WORKER'S COMPENSATION COVERAGE IS UNLAWFUL AND SHALL SUBJECT AN EMPLOYER TO CRIMINAL PENALTIES AND CIVIL FINES UP TO ONE HUNDRED THOUSAND DOLLARS (\$100,000) IN ADDITION TO THE COST OF COMPENSATION, DAMAGES AS PROVIDED FOR IN SECTION 3706 OF THE LABOR CODE, INTEREST AND ATTORNEY'S FEE.

THIS PERMIT SHALL EXPIRE BY LIMITATION IF WORK IS NOT COMMENCED WITHIN 180 DAYS.

SCHOEN ENGINEERING

9524 BEDINGTON WAY
SACRAMENTO, CA 95827

(916) 369 6886

Lic. # C042913

August 1, 1997



Larry Peer
Weather-Tite Roofing Company
P.O. Box 6068
Folsom, CA 95673

SUBJECT: Reroof at 15 Rivermoor Court, Sacramento, 95831

Dear Larry:

On August 1st, 1997 I observed the roof structure of the residence at the above mentioned address. I found the roof of the garage made up of 2x6 Douglas fir No. 2 rafters at 2' o.c., with a main span of 11'. The house roof was comprised of 2x4 trussed rafters with Douglas fir No. 1 top chords. The main house trusses spanned 38' plate to plate and were both flat bottom chord and scissors trusses. A bedroom wing truss spanned 30' plate to plate. There was also a carrier truss spanning 30' that supported the main house trusses. The garage had a 16' garage door with a 4x14 header.

It is my finding that this structure is adequate for the proposed reroof system which is comprised of 1/2" plywood installed over the existing skip sheathing; 30 lb. batts; 1x2 batts; lightweight concrete tile weighing 7 lb. per sq. ft.

NOTE: It is possible when reroofing that the increased load to structural elements also supporting wall, ceiling and floor finishes could cause some minor cosmetic cracking of these finishes. This is not untypical of a wood framed house and does not necessarily constitute structural inadequacy of these members.

This report deals with the structural adequacy of roof supporting members that were readily observable. It does not address any structure that was covered by wall finishes, buried in the ground or was otherwise not directly observable. These structures were assume to be of standard construction as called for in the Uniform Building Code. Also, it does not address any existing deflection or warping of roof members. The repair of such deflections to improve architectural appearance, is at the option of the home owner and the roofing contractor.

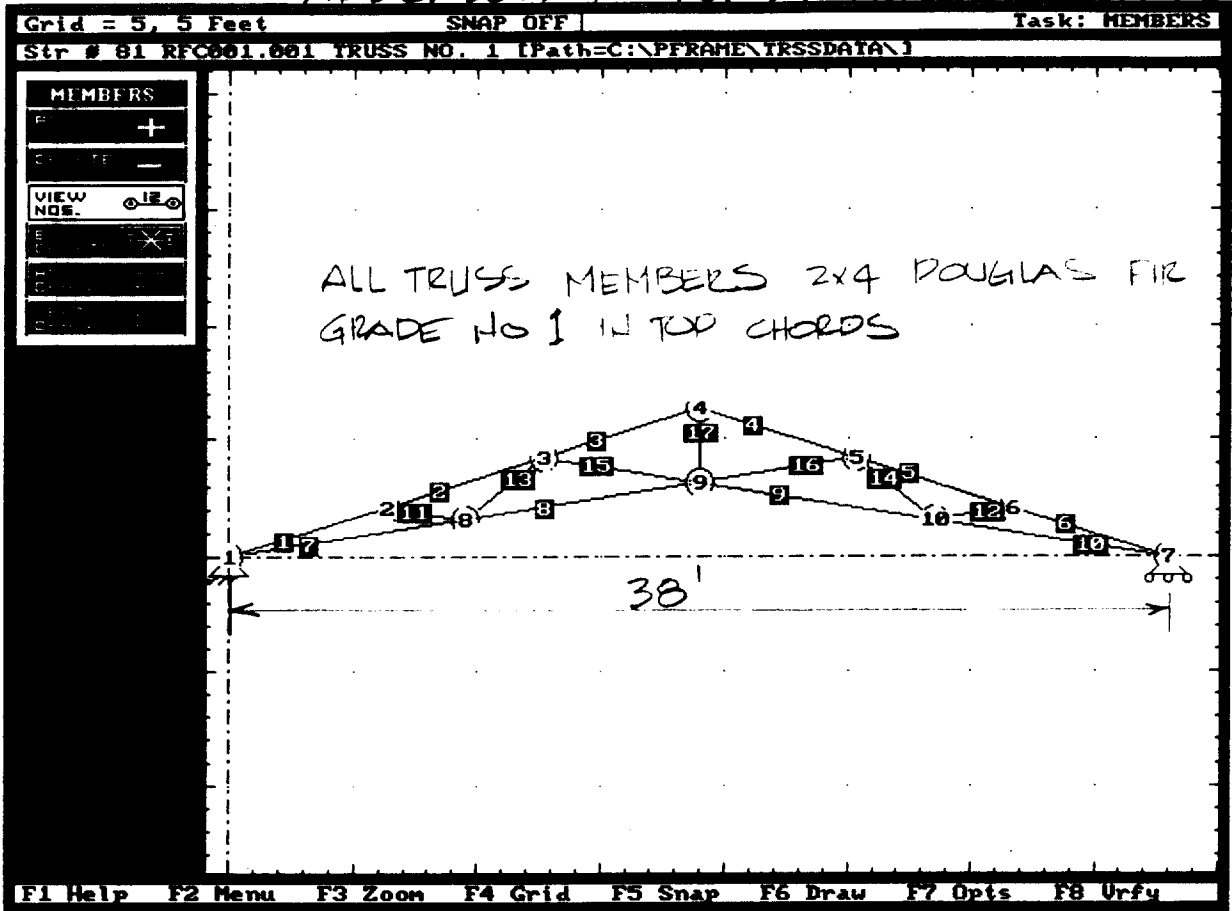
I would like to thank you for allowing me to provide my services in this matter. Please let me know if I may be of further assistance.

Sincerely,

Mark S. Schoen P.E.

ISSUED
8/1/97
Sacramento Building Dept.
1155 K Street
Sacramento, CA 95833
Tel: (916) 441-3111
Fax: (916) 441-3112

ADDENDUM TO REPORT FOR 15 RIVINGTON CT.



LOADS: (THESE LOADS WERE USED IN COMPUTER ANALYSIS)

LIVE LOAD = 16 #/ft

DEAD LOAD: (T.C) TILE 7.4 #/ft
 EXIST SHTR 1.0 #/ft
 FLYWOOD SHTR
 FELT & BATT 2.0 #/ft
 TRUSS TOP CHORD 1.0 #/ft
 TOTAL T.C. D.L. 11.9 #/ft

(B.C) SHTRAK 2.5 #/ft
 INS & MX. 1.5 #/ft
 TRUSS BOTTOM CHORD 1.0 #/ft
 5 #/ft



MAX ALLOW. STRESS IN TOP CHORDS: (DOUGLAS FIR G1)

$$1,000 \text{ #/ft} \times 1.15 \times 1.25 \times 1.5 = 2,156 \text{ #/ft} > 1,878 \text{ #/ft} \therefore \text{OK}$$

SCHOEN ENGINEERING

RFC001.001 TRUSS NO. 1

***** MEMBER STRESSES *****

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
1	1	1	-1,243.5	30.4	0.0	-1,243.5	-1,243.5
		2	-1,222.4	32.8	166.5	-1,055.8	-1,388.9
2	1	2	-1,109.4	27.0	166.5	-942.9	-1,276.0
		3	-1,088.4	36.1	790.2	-298.2	-1,878.5
3	1	3	-760.2	37.3	790.2	30.0	-1,550.3
		4	-739.1	25.8	0.0	-739.1	-739.1
4	1	4	-739.1	25.8	0.0	-739.1	-739.1
		5	-760.2	37.3	790.2	30.0	-1,550.3
5	1	5	-1,088.4	36.1	790.2	-298.2	-1,878.5
		6	-1,109.4	27.0	166.5	-942.9	-1,276.0
6	1	6	-1,222.4	32.8	166.5	-1,055.8	-1,388.9
		7	-1,243.5	30.4	0.0	-1,243.5	-1,243.5
7	1	1	1,184.6	9.2	0.0	1,184.6	1,184.6
		8	1,187.6	8.9	-37.9	1,149.8	1,225.5
8	1	8	965.8	8.9	-37.9	927.9	1,003.7
		9	968.8	9.2	0.0	968.8	968.8
9	1	9	968.8	9.2	0.0	968.8	968.8
		10	965.8	8.9	-37.9	927.9	1,003.7
10	1	7	1,184.6	-9.2	0.0	1,184.6	1,184.6
		10	1,187.6	-8.9	37.9	1,225.5	1,149.8
11	1	2	-127.9	0.0	0.0	-127.9	-127.9
		8	-127.9	0.0	0.0	-127.9	-127.9
12	1	6	-127.9	0.0	0.0	-127.9	-127.9
		10	-127.9	0.0	0.0	-127.9	-127.9
13	1	3	116.9	0.0	0.0	116.9	116.9
		8	116.9	0.0	0.0	116.9	116.9
14	1	5	116.9	0.0	0.0	116.9	116.9
		10	116.9	0.0	0.0	116.9	116.9
15	1	3	-248.1	0.0	0.0	-248.1	-248.1
		9	-248.1	0.0	0.0	-248.1	-248.1
16	1	5	-248.1	0.0	0.0	-248.1	-248.1
		9	-248.1	0.0	0.0	-248.1	-248.1

SCHOEN ENGINEERING

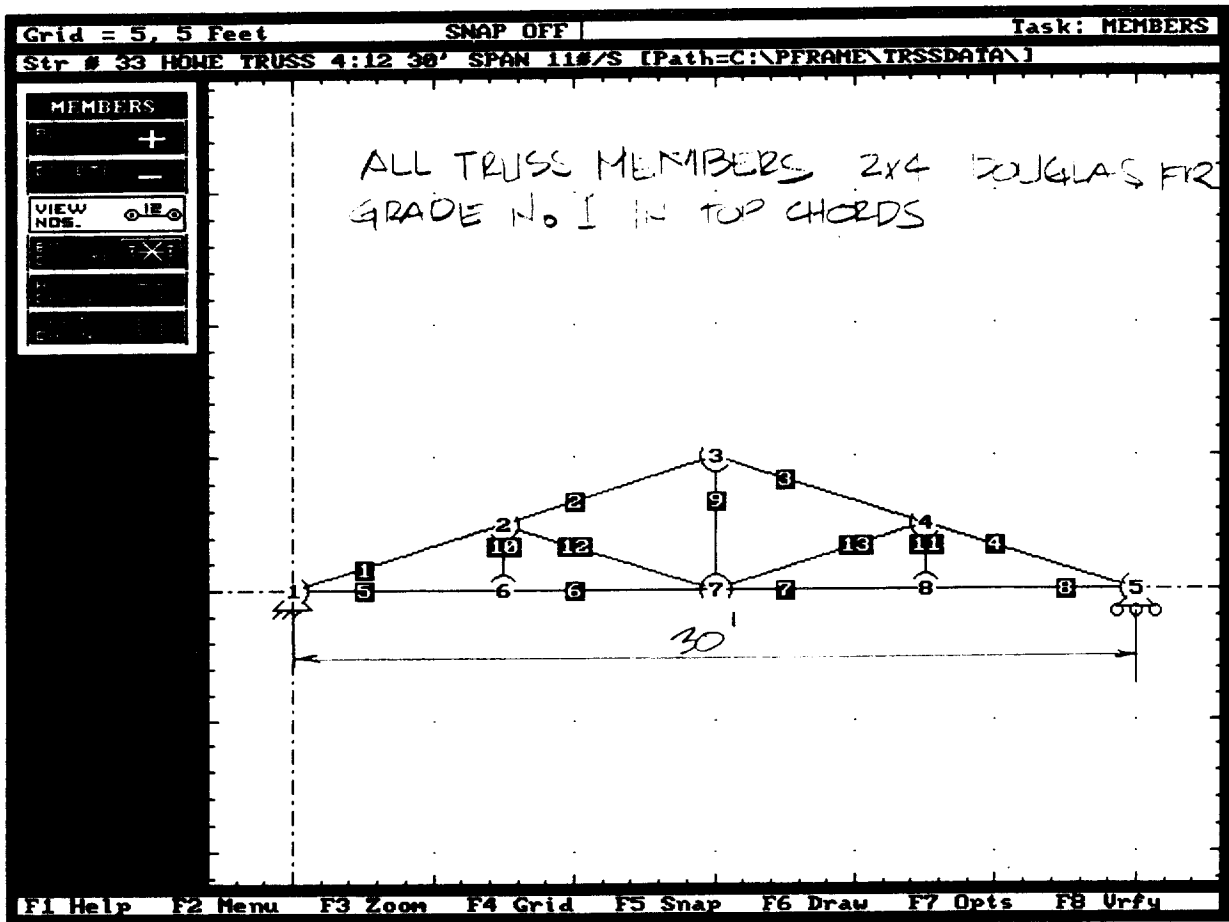
RFC001.001 TRUSS NO. 1

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
17	1	4	418.4	0.0	0.0	418.4	418.4
		9	418.4	0.0	0.0	418.4	418.4

Notes:

1. Axial stress is positive for tension.
2. Shear stress is positive for positive shear.
3. Bending stress is for top of member. Bending stress is positive for tension.
4. Top Normal stress = Axial + Bending. Bottom Normal stress = Axial - Bending.



MAX ALLOWABLE STRESS (DOUGLAS FIR No 1 TOP CHORDS):

$$2156 \text{ #/in}^2 > 1835 \text{ #/in}^2 \therefore \text{O.K.}$$

SCHOEN ENGINEERING

HOWE TRUSS 4:12 30' SPAN 11#/SQ.FT. DEAD LOAD

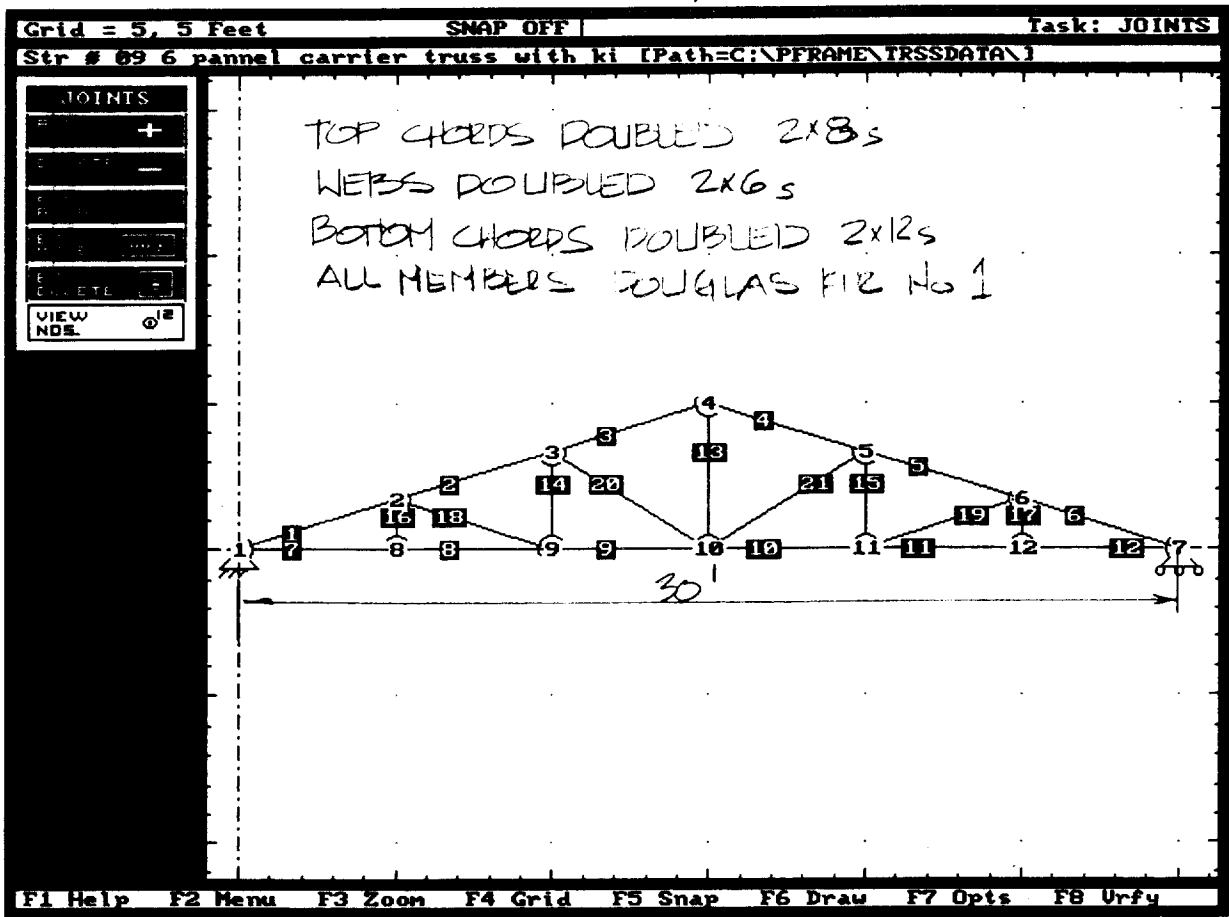
*** MEMBER STRESSES ***

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
1	1	1	-481.3	28.9	0.0	-481.3	-481.3
		2	-456.3	45.9	1,378.9	922.6	835.2
2	1	2	-312.0	45.9	1,378.9	1,066.8	-1,690.9
		3	-287.1	28.9	0.0	-287.1	-287.1
3	1	3	-287.1	28.9	0.0	-287.1	-287.1
		4	-312.0	45.9	1,378.9	1,066.8	-1,690.9
4	1	4	-456.3	45.9	1,378.9	922.6	835.2
		5	-481.3	28.9	0.0	-481.3	-481.3
5	1	1	447.4	6.6	0.0	447.4	447.4
		6	447.4	7.7	79.5	526.9	367.9
6	1	6	447.4	6.2	79.5	526.9	367.9
		7	447.4	8.1	220.7	668.1	226.7
7	1	7	447.4	8.1	220.7	668.1	226.7
		8	447.4	6.2	79.5	526.9	367.9
8	1	5	447.4	-6.6	0.0	447.4	447.4
		8	447.4	-7.7	-79.5	367.9	526.9
9	1	3	126.7	0.0	0.0	126.7	126.7
		7	126.7	0.0	0.0	126.7	126.7
10	1	2	13.9	0.0	0.0	13.9	13.9
		6	13.9	0.0	0.0	13.9	13.9
11	1	4	13.9	0.0	0.0	13.9	13.9
		8	13.9	0.0	0.0	13.9	13.9
12	1	2	-174.9	0.0	0.0	-174.9	-174.9
		7	-174.9	0.0	0.0	-174.9	-174.9
13	1	4	-174.9	0.0	0.0	-174.9	-174.9
		7	-174.9	0.0	0.0	-174.9	-174.9

Notes:

1. Axial stress is positive for tension.
2. Shear stress is positive for positive shear.
3. Bending stress is for top of member. Bending stress is positive for tension.
4. Top Normal stress = Axial + Bending. Bottom Normal stress = Axial - Bending.



MAX. ALLOWABLE STRESS:

TOP CHORDS: $1,000 \frac{\text{lb}}{\text{in}^2} \times 1.2 \times 1.25 = \underline{\underline{1500 \frac{\text{lb}}{\text{in}^2}}} > 1373 \frac{\text{lb}}{\text{in}^2} \therefore \text{O.K.}$

BOTTOM CHORDS $1,000 \frac{\text{lb}}{\text{in}^2} \times 1.25 = \underline{\underline{1250 \frac{\text{lb}}{\text{in}^2}}} > 1141 \frac{\text{lb}}{\text{in}^2} \therefore \text{O.K.}$

SCHOEN ENGINEERING

6 pannel carrier truss with king post

*** MEMBER STRESSES ***

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
1	1	1	-857.0	13.2	0.0	-857.0	-857.0
		2	-855.1	-7.3	-518.3	-373.4	-336.7
	2	1	-480.5	7.1	0.0	-480.5	-480.5
		2	-479.7	-4.6	-294.9	-774.6	-184.8
2	1	2	-781.1	-5.5	-518.3	-1,299.5	-262.8
		3	-779.2	11.3	-92.2	-871.4	-687.1
	2	2	-437.9	-3.5	-294.9	-732.8	-143.1
		3	-437.1	5.9	-55.8	-493.0	-381.3
3	1	3	-586.0	1.1	-92.2	-678.2	-493.9
		4	-584.1	4.7	0.0	-584.1	-584.1
	2	3	-328.5	.1	-55.8	-384.3	-272.7
		4	-327.7	2.3	0.0	-327.7	-327.7
4	1	4	-584.1	4.7	0.0	-584.1	-584.1
		5	-586.0	1.1	-92.2	-678.2	-493.9
	2	4	-327.7	2.3	0.0	-327.7	-327.7
		5	-328.5	.1	-55.8	-384.3	-272.7
5	1	5	-779.2	11.3	-92.2	-871.4	-687.1
		6	-781.1	-5.5	-518.3	-1,299.5	-262.8
	2	5	-437.1	5.9	-55.8	-493.0	-381.3
		6	-437.9	-3.5	-294.9	-732.8	-143.1
6	1	6	-855.1	-7.3	-518.3	-373.4	-336.7
		7	-857.0	13.2	0.0	-857.0	-857.0
	2	6	-479.7	-4.6	-294.9	-774.6	-184.8
		7	-480.5	7.1	0.0	-480.5	-480.5
7	1	1	539.2	57.9	0.0	539.2	539.2
		8	539.2	20.3	-602.5	-63.3	1,141.7
	2	1	302.4	32.7	0.0	302.4	302.4
		8	302.4	11.7	-336.2	-33.7	638.6
8	1	8	539.2	18.1	-602.5	-63.3	1,141.7
		9	539.2	60.1	69.5	608.8	469.7
	2	8	302.4	10.4	-336.2	-33.7	638.6
		9	302.4	34.0	40.7	343.1	261.7
9	1	9	495.2	41.3	69.5	564.7	425.7
		10	495.2	36.9	0.0	495.2	495.2
	2	9	277.7	23.5	40.7	318.4	237.0
		10	277.7	20.9	0.0	277.7	277.7
10	1	10	495.2	36.9	0.0	495.2	495.2
		11	495.2	41.3	69.5	564.7	425.7

SCHOEN ENGINEERING

6 pannel carrier truss with king post

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
	2	10	277.7	20.9	0.0	277.7	277.7
		11	277.7	23.5	40.7	318.4	237.0
11	1	11	539.2	60.1	69.5	608.8	469.7
		12	539.2	18.1	-602.5	-63.3	141.7
	2	11	302.4	34.0	40.7	343.1	261.7
		12	302.4	10.4	-336.2	-33.7	638.6
12	1	7	539.2	-57.9	0.0	539.2	539.2
		12	539.2	-20.3	602.5	141.7	-63.3
	2	7	302.4	-32.7	0.0	302.4	302.4
		12	302.4	-11.7	336.2	638.6	-33.7
13	1	4	491.5	0.0	0.0	491.5	491.5
		10	491.5	0.0	0.0	491.5	491.5
	2	4	276.6	0.0	0.0	276.6	276.6
		10	276.6	0.0	0.0	276.6	276.6
14	1	3	237.4	0.0	0.0	237.4	237.4
		9	237.4	0.0	0.0	237.4	237.4
	2	3	134.4	0.0	0.0	134.4	134.4
		9	134.4	0.0	0.0	134.4	134.4
15	1	5	237.4	0.0	0.0	237.4	237.4
		11	237.4	0.0	0.0	237.4	237.4
	2	5	134.4	0.0	0.0	134.4	134.4
		11	134.4	0.0	0.0	134.4	134.4
16	1	2	78.5	0.0	0.0	78.5	78.5
		8	78.5	0.0	0.0	78.5	78.5
	2	2	45.3	0.0	0.0	45.3	45.3
		8	45.3	0.0	0.0	45.3	45.3
17	1	6	78.5	0.0	0.0	78.5	78.5
		12	78.5	0.0	0.0	78.5	78.5
	2	6	45.3	0.0	0.0	45.3	45.3
		12	45.3	0.0	0.0	45.3	45.3
18	1	2	-94.9	0.0	0.0	-94.9	-94.9
		9	-94.9	0.0	0.0	-94.9	-94.9
	2	2	-53.2	0.0	0.0	-53.2	-53.2
		9	-53.2	0.0	0.0	-53.2	-53.2
19	1	6	-94.9	0.0	0.0	-94.9	-94.9
		11	-94.9	0.0	0.0	-94.9	-94.9
	2	6	-53.2	0.0	0.0	-53.2	-53.2
		11	-53.2	0.0	0.0	-53.2	-53.2
20	1	3	-306.8	0.0	0.0	-306.8	-306.8

SCHOEN ENGINEERING

6 pannel carrier truss with king post

Load Combination Results

Mem No.	Load Comb	Joint No.	Axial (psi)	Shear (psi)	Bending (psi)	Top Normal (psi)	Bot Normal (psi)
		10	-306.8	0.0	0.0	-306.8	-306.8
	2	3	-172.1	0.0	0.0	-172.1	-172.1
		10	-172.1	0.0	0.0	-172.1	-172.1
21	1	5	-306.8	0.0	0.0	-306.8	-306.8
		10	-306.8	0.0	0.0	-306.8	-306.8
	2	5	-172.1	0.0	0.0	-172.1	-172.1
		10	-172.1	0.0	0.0	-172.1	-172.1

Notes:

1. Axial stress is positive for tension.
2. Shear stress is positive for positive shear.
3. Bending stress is for top of member. Bending stress is positive for tension.
4. Top Normal stress = Axial + Bending. Bottom Normal stress = Axial - Bending.