Columbia County New Building Permit Application

For Office Use Only Application # 44326/4448 Date Received 1/13 By MG Permit # 39210/3921

Zoning Official LW/LH Date 1-14-20 Flood Zone X Land Use Ag Zoning A-3

FEMA Map # _____ Elevation _____ MFE 1' above road River _____ Plans Examiner J.C. Date 1-21-20

Comments SPL 2001 approved 1-14-20

☑ NOC ☑ EH ☐ Deed or PA ☑ Site Plan ☐ State Road Info ☑ Well letter ☑ 911 Sheet ☐ Parent Parcel # 01729-000

☐ Dev Permit # _____ ☐ In Floodway ☑ Letter of Auth. from Contractor ☐ F W Comp. letter

☐ Owner Builder Disclosure Statement ☐ Land Owner Affidavit ☐ Ellisville Water ☑ App Fee Paid ☑ Sub VF Form

Septic Permit No 20-0019 OR City Water ☐ Fax 386-758-8920

Applicant (Who will sign/pickup the permit) SUZANNE STEWART Phone 386-752-8653

Address 465 NW ORANGE STREET, LAKE CITY, FL 32055

Owners Name KEVIN PARNELL Phone 386-697-6915

911 Address 1857 NW JAKE GLN, LAKE CI, FL 32055

Contractors Name BRYAN ZECHER Phone 386-752-8653

Address 465 NW ORANGE STREET, LAKE CITY, FL 32055

Contractor Email ZECHEROFFICE@GMAIL.COM ***Include to get updates on this job.

Fee Simple Owner Name & Address N/A

Bonding Co. Name & Address N/A

Architect/Engineer Name & Address SABO, 235 9TH AVE, JAX BEACH, FL 32250

Mortgage Lenders Name & Address DRUMMOND COMMUNITY BANK, 1627 N. YOUNG BLVD, CHIEFLAND, FL 32626

Circle the correct power company ☐ FL Power & Light ☐ Clay Elec. ☑ Suwannee Valley Elec. ☐ Duke Energy

Property ID Number 23-2S-16-01729-003 Estimated Construction Cost $368,000.

Subdivision Name _____ Lot ____ Block ____ Unit ____ Phase ____

Driving Directions from a Major Road Take US 41 Main Blvd, turn right onto NW Falling Creek Rd. turn left onto NW Jake Gln to the jobsite.

Construction of NEW HOME ____ Commercial OR X Residential

Proposed Use/Occupancy RESIDENTIAL Number of Existing Dwellings on Property ____

Is the Building Fire Sprinkled? _____ If Yes, blueprints included _____ Or Explain _____

Circle Proposed ☐ Culvert Permit or ☒ Culvert Waiver or ☐ D.O.T. Permit or ☐ Have an Existing Drive

Actual Distance of Structure from Property Lines - Front 80' Side 70' Side 70' Rear 94

Number of Stories 1 Heated Floor Area 2538 Total Floor Area 3843 Acreage 1.210

Zoning Applications applied for (Site & Development Plan, Special Exception, etc.) _____

Columbia County Building Permit Application

CODE: Florida Building Code 2017 and the 2014 National Electrical Code.

Application is hereby made to obtain a permit to do work and installations as indicated. I certify that no work or installation has commenced prior to the issuance of a permit and that all work be performed to meet the standards of all laws regulating construction in this jurisdiction.

TIME LIMITATIONS OF APPLICATION : An application for a permit for any proposed work shall be deemed to have been abandoned 180 days after the date of filing, unless pursued in good faith or a permit has been issued.

TIME LIMITATIONS OF PERMITS: Every permit issued shall become invalid unless the work authorized by such permit is commenced within 180 days after its issuance, or if the work authorized by such permit is suspended or abandoned for a period of 180 days after the time work is commenced. A valid permit receives an approved inspection every 180 days. Work shall be considered not suspended, abandoned or invalid when the permit has received an approved inspection within 180 days of the previous approved inspection.

FLORIDA'S CONSTRUCTION LIEN LAW: Protect Yourself and Your Investment: According to Florida Law, those who work on your property or provide materials, and are not paid-in-full, have a right to enforce their claim for payment against your property. This claim is known as a construction lien. If your contractor fails to pay subcontractors or material suppliers or neglects to make other legally required payments, the people who are owed money may look to your property for payment, even if you have paid your contractor in full. This means if a lien is filed against your property, it could be sold against your will to pay for labor, materials or other services which your contractor may have failed to pay.

NOTICE OF RESPONSIBILITY TO CONTRACTOR AND AGENT: ***YOU ARE HEREBY NOTIFIED*** as the recipient of a building permit from Columbia County, Florida, you will be held responsible to the County for any damage to sidewalks and/or road curbs and gutters, concrete features and structures, together with damage to drainage facilities, removal of sod, major changes to lot grades that result in ponding of water, or other damage to roadway and other public infrastructure facilities caused by you or your contractor, subcontractors, agents or representatives in the construction and/or improvement of the building and lot for which this permit is issued. No certificate of occupancy will be issued until all corrective work to these public infrastructures and facilities has been corrected.

WARNING TO OWNER: YOUR FAILURE TO RECORD A NOTICE OF COMMENCEMENT MAY RESULT IN YOU PAYING TWICE FOR IMPROVEMENTS TO YOUR PROPERTY. A NOTICE OF COMMENCEMENT MUST BE RECORDED AND POSTED ON THE JOB SITE BEFORE THE FIRST INSPECTION. IF YOU INTEND TO OBTAIN FINANCING, CONSULT WITH YOUR LENDER OR ATTORNEY BEFORE RECORDING YOUR NOTICE OF COMMENCEMENT.

OWNERS CERTIFICATION: I CERTIFY THAT ALL THE FOREGOING INFORMATION IS ACCURATE AND THAT ALL WORK WILL BE DONE IN COMPLIANCE WITH ALL APPLICABLE LAWS REGULATING CONSTRUCTION AND ZONING.

NOTICE TO OWNER: There are some properties that may have deed restrictions recorded upon them. These restrictions may limit or prohibit the work applied for in your building permit. You must verify if your property is encumbered by any restrictions or face possible litigation and or fines.

Kevin Parnell — **Print Owners Name**

Kevin Parnell — **Owners Signature**

****Property owners must sign here before any permit will be issued.**

****If this is an Owner Builder Permit Application then, ONLY the owner can sign the building permit when it is issued.**

CONTRACTORS AFFIDAVIT: By my signature I understand and agree that I have informed and provided this written statement to the owner of all the above written responsibilities in Columbia County for obtaining this Building Permit including all application and permit time limitations.

Contractor's Signature

Contractor's License Number CBC1257343
Columbia County Competency Card Number 1624

Affirmed under penalty of perjury to by the Contractor and subscribed before me this 13th **day of** January **20**20.

Personally known [ ] **or Produced Identification** FLDL

SEAL:

State of Florida Notary Signature (For the Contractor)

SUBCONTRACTOR VERIFICATION

APPLICATION/PERMIT # 44326 JOB NAME _____

THIS FORM MUST BE SUBMITTED BEFORE A PERMIT WILL BE ISSUED

Columbia County issues combination permits. One permit will cover all trades doing work at the permitted site. It is REQUIRED that we have records of the subcontractors who actually did the trade specific work under the general contractors permit.

***NOTE:** It shall be the responsibility of the general contractor to make sure that all of the subcontractors are licensed with the Columbia County Building Department.*
Use website to confirm licenses: http://www.columbiacountyfla.com/PermitSearch/ContractorSearch.aspx

***NOTE:** If this should change prior to completion of the project, it is your responsibility to have a corrected form submitted to our office, before that work has begun.*

Violations will result in stop work orders and/or fines.

			Need
ELECTRICAL ☑	Print Name Marc Matthews	Signature	☐ Lic
	Company Name: Matthews Electric		☐ Liab
CC# 0076	License #: EC13005459	Phone #: 386-344-2029	☐ W/C ☐ EX ☐ DE
MECHANICAL/	Print Name Anthony Franks	Signature	Need
A/C ☑	Company Name: Franks Plano heating and air		☐ Lic ☐ Liab ☐ W/C
CC#	License #: CAC1818631	Phone #: 386-466-7514	☐ EX ☐ DE
PLUMBING/ ☑	Print Name Cody Borrs	Signature	Need
GAS ☐	Company Name: Borrs Plumbing		☐ Lic ☐ Liab ☐ W/C
CC# 000715	License #: CFC1427145	Phone #: 386-623-0509	☐ EX ☐ DE
ROOFING ☑	Print Name Robert Dykes Jr	Signature	Need
	Company Name: Dykes Roofing & Construction		☐ Lic ☐ Liab ☐ W/C
CC# 1328619	License #: CCC 1328699	Phone #: 386-364-4838	☐ EX ☐ DE
SHEET METAL ☐	Print Name	Signature	Need
	Company Name:		☐ Lic ☐ Liab ☐ W/C
CC#	License #:	Phone #:	☐ EX ☐ DE
FIRE SYSTEM/	Print Name	Signature	Need
SPRINKLER ☐	Company Name:		☐ Lic ☐ Liab ☐ W/C
CC#	License#:	Phone #:	☐ EX ☐ DE
SOLAR ☐	Print Name	Signature	Need
	Company Name:		☐ Lic ☐ Liab ☐ W/C
CC#	License #:	Phone #:	☐ EX ☐ DE
STATE ☐	Print Name	Signature	Need
SPECIALTY	Company Name:		☐ Lic ☐ Liab ☐ W/C
CC#	License #:	Phone #:	☐ EX ☐ DE

Ref: F.S. 440.103; ORD. 2016-30

Columbia County Property Appraiser

updated: 11/27/2019

2020 Working Values

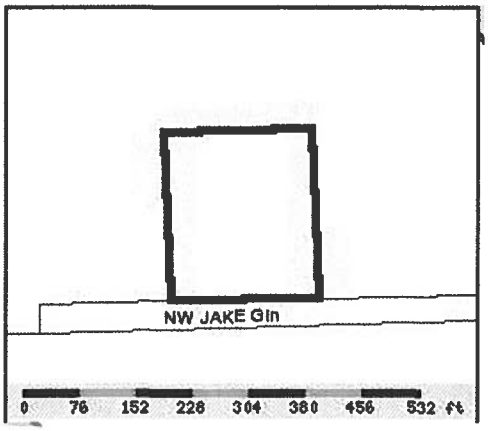
Parcel: 23-2S-16-01729-003

Tax Collector | Tax Estimator | Property Card | Parcel List Generator
<< Next Lower Parcel | Next Higher Parcel >> | 2019 TRIM (pdf) | Interactive GIS Map | Print
<< Prev Search Result: 2 of 12 Next >>

Owner & Property Info

Owner's Name	PARNELL KEVIN ADARRYL		
Mailing Address	1724 NW JAKE GLN LAKE CITY, FL 32055		
Site Address	NW JAKE GLN		
Use Desc. (code)	VACANT (000000)		
Tax District	3 (County)	**Neighborhood**	23216
Land Area	1.210 ACRES	**Market Area**	03
Description	NOTE: This description is not to be used as the Legal Description for this parcel in any legal transaction.		

COMM SE COR OF SEC, W 708.42 FT FOR POB, CONT W 200 FT, N 2 DEG W 264 FT, E 200 FT, S 2 DEG E 264 FT TO POB. DC 1311-1969, QC 1311-1970, QC 1397-472



Property & Assessment Values

2019 Certified Values
There are no 2019 Certified Values for this parcel

2020 Working Values		(...Hide Values)
Mkt Land Value	cnt: (0)	$8,797.00
Ag Land Value	cnt: (1)	$0.00
Building Value	cnt: (0)	$0.00
XFOB Value	cnt: (0)	$0.00
Total Appraised Value		$8,797.00
Just Value		$8,797.00
Class Value		$0.00
Assessed Value		$8,797.00
Exempt Value		$0.00
Total Taxable Value		Cnty: $8,797 Other: $8,797 | Schl: $8,797

NOTE: 2020 Working Values are NOT certified values and therefore are subject to change before being finalized for ad valorem assessment purposes.

Sales History

Show Similar Sales within 1/2 mile

Sale Date	OR Book/Page	OR Code	Vacant / Improved	Qualified Sale	Sale RCode	Sale Price
10/24/2019	1397/474	QC	V	U	11	$0.00
10/19/2019	1397/472	QC	V	U	11	$0.00

Building Characteristics

Bldg Item	Bldg Desc	Year Blt	Ext. Walls	Heated S.F.	Actual S.F.	Bldg Value
NONE						

Extra Features & Out Buildings

Code	Desc	Year Blt	Value	Units	Dims	Condition (% Good)
NONE						

Land Breakdown

Lnd Code	Desc	Units	Adjustments	Eff Rate	Lnd Value
000000	VAC RES (MKT)	1.21 AC	1.00/1.00/1.00/1.00	$7,270.97	$8,797.00

Columbia County Property Appraiser updated: 11/27/2019

COLUMBIA COUNTY BOARD OF COUNTY COMMISSIONERS
AGENDA ITEM REQUEST FORM

The Board of County Commissioners meets the 1st and 3rd Thursday of each month at 5:30 p.m. in the Columbia County School Board Administrative Complex Auditorium, 372 West Duval Street, Lake City, Florida 32055. All agenda items are due in the Board's office one week prior to the meeting date.

Today's Date: 1/10/2020 **Meeting Date:** 1/16/2020

Name: Liza Williams **Department:** Building And Zoning

Division Manager's Signature:

1. Nature and purpose of agenda item:

Special Family Lot Application SFLP2001 - Larry and Victoria Parnell deeding 1.21 acres to their son Kevin Parnell.

2. Recommended Motion/Action:

Recommend Approval for SFLP 2001

3. Fiscal Impact on current budget.

This item has no effect on the current budget.

THIS ITEM WAS APPROVED WITHOUT EXCEPTION BY THE BOARD OF COUNTY COMMISSIONERS ON 1/16/2020

FAMILY RELATIONSHIP AFFIDAVIT

STATE OF FLORIDA
COUNTY OF COLUMBIA

BEFORE ME the undersigned Notary Public personally appeared, Larry + Victoria Parnell, the Owner of the parent parcel which has been subdivided for Kevin Parnell, the Immediate Family Member of the Owner, and which is intended for the Immediate Family Members primary residence use. The Immediate Family Member is related to the Owner as son. Both individuals being first duly sworn according to law, depose and say:

1. Affiant acknowledges Immediate Family Member is defined as parent, grandparent, step-parent, adopted parent, sibling, child, step-child, adopted child or grandchild.

2. Both the Owner and the Immediate Family Member have personal knowledge of all matters set forth in this Affidavit.

3. The Owner holds fee simple title to certain real property situated in Columbia County, and more particularly described by reference with the Columbia County Property Appraiser Parent Tract Tax Parcel No. 01729-000.

4. The Immediate Family Member holds fee simple title to certain real property divided from the Owners' parent parcel situated in Columbia County and more particularly described by reference to the Columbia County Property Appraiser Tax Parcel No. 01729-003.

5. No person or entity other than the Owner and Immediate Family Member to whom permit is being issued, including persons residing with the family member claims or is presently entitled to the right of possession or is in possession of the property, and there are no tenancies, leases or other occupancies that affect the property.

6. This Affidavit is made for the specific purpose of inducing Columbia County to recognize a family division for an Immediate Family Member being in compliance with the density requirements of the Columbia County's Comprehensive Plan and Land Development Regulations (LDR's).

7. This Affidavit and Agreement is made and given by Affiants with full knowledge that the facts contained herein are accurate and complete, and with full knowledge that the penalties under Florida law for perjury include conviction of a felony of the third degree.

Inst: 202012001562 Date: 01/17/2020 Time: 1:41PM
Page 1 of 2 B: 1403 P: 1987, P.DeWitt Cason, Clerk of Court
Columbia, County, By: BD
Deputy Clerk

We Hereby Certify that the facts represented by us in this Affidavit are true and correct and we accept the terms of the Agreement and agree to comply with it.

Larry Parnell
Victoria Parnell
Owner

Ken Pace
Immediate Family Member

Larry Parnell
Typed or Printed Name

Kevin Parnell
Typed or Printed Name

Victoria Parnell

Subscribed and sworn to (or affirmed) before me this 9 day of January, 2020, by Larry's Victoria Parnell (Owner) who is personally known to me or has produced fl DL as identification.

Notary Public

LAURIE HODSON
MY COMMISSION # FF 976102
EXPIRES: July 14, 2020
Bonded Thru Notary Public Underwriters

Subscribed and sworn to (or affirmed) before me this 9 day of January, 2020, by Kevin Parnell (Family Member) who is personally known to me or has produced fl DL as identification.

Notary Public

LAURIE HODSON
MY COMMISSION # FF 976102
EXPIRES: July 14, 2020
Bonded Thru Notary Public Underwriters

APPROVED:
COLUMBIA COUNTY, FLORIDA

By: Liza Williams
Name: Liza Williams
Title: Planning Technician

ZONING DEPARTMENT
COLUMBIA COUNTY
GATEWAY TO FLORIDA
APPROVED

Legend

2018 Flood Zones
- 0.2 PCT ANNUAL CHANCE
- A
- AE
- AH

2018Aerials

Parcels

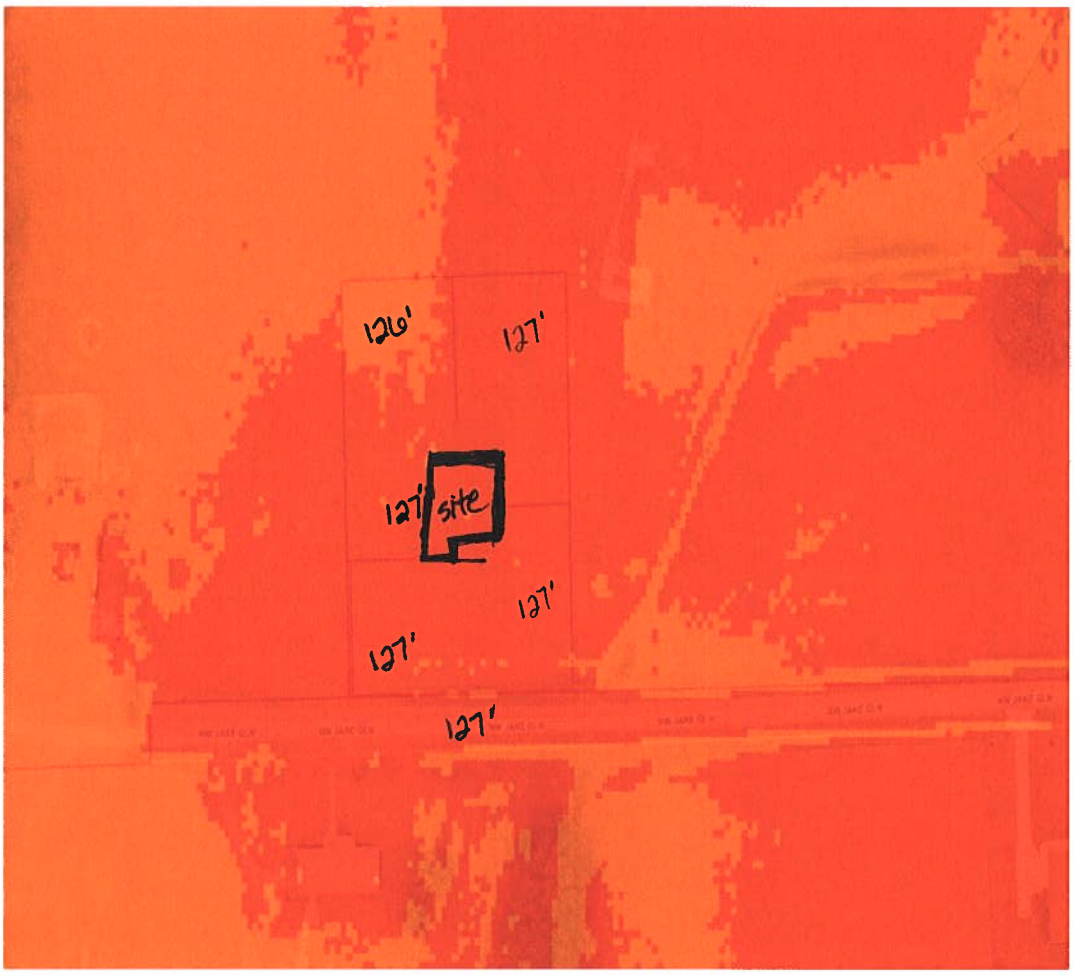
SRWMD Wetlands

Roads
- Roads
- others
- Dirt
- Interstate
- Main
- Other
- Paved
- Private

LidarElevations

Columbia County, FLA - Building & Zoning Property Map

Printed: Tue Jan 14 2020 10:34:03 GMT-0500 (Eastern Standard Time)



Parcel Information

Parcel No: 23-2S-16-01729-000

Owner: PARNELL SAMUEL, CAROLYN,

Subdivision:

Lot:

Acres: 36.36182

Deed Acres: 36.36 Ac

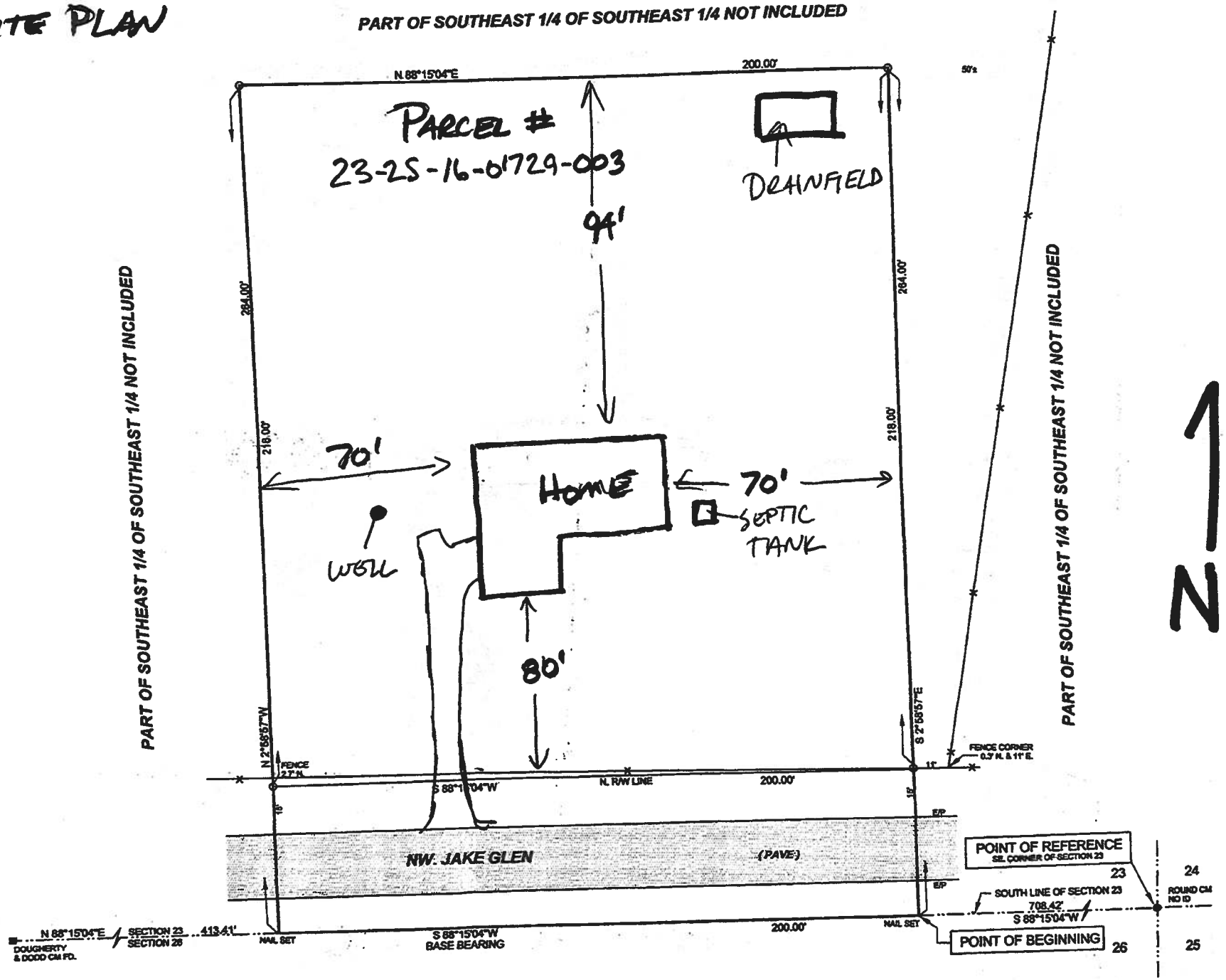
District: District 1 Ronald Williams

Future Land Uses: Agriculture - 3

Flood Zones: A,

Official Zoning Atlas: A-3

PARNELL PROPOSED
SITE PLAN



COLUMBIA COUNTY BUILDING DEPARTMENT
135 NE Hernando Ave, Suite B-21, Lake City, FL 32055
Phone: 386-758-1008 Fax: 386-758-2160

LETTER OF AUTHORIZATION TO SIGN FOR PERMITS

I, Bryan Zecher (license holder name), licensed qualifier

for Bryan Zecher Homes (company name), do certify that

the below referenced person(s) listed on this form is/are contracted/hired by me, the license holder, or is/are employed by me directly or through an employee leasing arrangement; or, is an officer of the corporation; or, partner as defined in Florida Statutes Chapter 468, and the said person(s) is/are under my direct supervision and control and is/are authorized to purchase permits, call for inspections and sign on my behalf.

Printed Name of Person Authorized	Signature of Authorized Person
1. Suzanne Stewart	1. Suzanne Stewart
2.	2.
3.	3.
4.	4.
5.	5.

I, the license holder, realize that I am responsible for all permits purchased, and all work done under my license and fully responsible for compliance with all Florida Statutes, Codes, and Local Ordinances. I understand that the State and County Licensing Boards have the power and authority to discipline a license holder for violations committed by him/her, his/her agents, officers, or employees and that I have full responsibility for compliance with all statutes, codes and ordinances inherent in the privilege granted by issuance of such permits.

If at any time the person(s) you have authorized is/are no longer agents, employee(s), or officer(s), you must notify this department in writing of the changes and submit a new letter of authorization form, which will supersede all previous lists. Failure to do so may allow unauthorized persons to use your name and/or license number to obtain permits.

License Holders Signature (Notarized)	CBC 1257343 License Number	1/6/2020 Date

NOTARY INFORMATION:
STATE OF: Florida COUNTY OF: COLUMBIA

The above license holder, whose name is BRYAN ZECHER, personally appeared before me and is known by me or has produced identification (type of I.D.)_____ on this 6th day of December, 20 20.

Suzanne Stewart
NOTARY'S SIGNATURE

(Seal/Stamp)

NOTARY PUBLIC STATE OF FLORIDA
SUZANNE STEWART
Commission # GG 932386
Expires November 17, 2023
Bonded Thru Budget Notary Services

This Instrument Prepared By:
Michael H. Harrell
Abstract Trust Title, LLC
283 NW Cole Ter
Lake City, FL 32055
ATT 4-9398

NOTICE OF COMMENCEMENT

TO WHOM IT MAY CONCERN:

The undersigned hereby give notice that improvements will be made to certain real property and in accordance with Chapter 713, Florida Statues, the following is provided in this Notice of Commencement:

1. Description of Property: Part of the Southeast quarter (SE 1/4) of the Southeast quarter (SE 1/4) of Section 23, Township 2 South, Range 16 East, being more particularly described as follows: For point of reference commence at the SE corner of said section 23, thence run South 88°15'04" West along the South line of said Section 23, a distance of 708.42 feet to the Point of Beginning; thence continue South 88°15'04" West along said South line, a distance of 200.00 feet; thence run North 2°58'57" West, a distance of 264.00 feet; thence run North 88°15'04" East, a distance of 200.00 feet; thence run South 2°58'57" East, a distance of 264.00 feet to the Point of Beginning.

2. General Description of Improvement: Construction of Dwelling

3. Owner Information:

   a. Name and Address: Kevin Adarryl Pamell, 1724 NW Jake Gln, Lake City, FL 32055

   b. Interest in property: Fee Simple

   c. Name and address of fee simple title holder (if other than Owner): NONE

4. Contractor (name and address): Bryan Zecher Construction, Inc. DBA Bryan Zecher Homes, Inc., at PO Box 815, Lake City, FL 32055

5. Surety:

   a. Name and Address: N/A

   b. Amount of Bond: N/A

6. LENDER: Drummond Community Bank
   1627 N. Young Blvd
   Chiefland, FL 32626

7. Persons within the State of Florida designated by Owner upon whom notices of other documents may be served as provided in Section 713.13(1)(a)7., Florida Statutes: NONE

8. In addition to himself, Owner designates Drummond Community Bank at 1627 N. Young Blvd, Chiefland, FL 32626, to receive a copy of the Lienor's Notice as provided in Section 713.13(1)(b) Florida Statutes.

9. Expiration date of Notice of Commencement (the expiration date is 1 year from the date of recording unless a different date is specified).

WARNING TO OWNER: ANY PAYMENTS MADE BY THE OWNER AFTER THE EXPIRATION OF THE NOTICE OF COMMENCEMENT ARE CONSIDERED IMPROPER PAYMENTS UNDER CHAPTER 713, PART 1 SECTION 713, 13, FLORIDA STATUTES AND CAN RESULT IN YOUR PAYING TWICE FOR IMPROVEMENTS TO YOUR PROPERTY. A NOTICE OF COMMENCEMENT MUST BE RECORDED AND POSTED ON THE JOB SITE BEFORE THE FIRST INSPECTION. IF YOU NEED TO OBTAIN FINANCING, CONSULT WITH YOUR LENDER OR AN ATTORNEY BEFORE COMMENCING WORK OR RECORDING YOUR NOTICE OF COMMENCEMENT.

***Owner is used for singular or plural as context requires.**

Signed, sealed and delivered in the presence:

WITNESS

WITNESS

Kevin Adarryl Parnell

STATE OF FLORIDA
COUNTY OF COLUMBIA

Before me, personally appeared Kevin Adarryl Parnell, to me known to be the person(s) described in and who executed the foregoing instrument, and they acknowledged to and before me that they executed said instrument for the purpose therein expressed.

Witness my hand and official seal this 20 day of December, 2019.

(SEAL)

NOTARY PUBLIC

Michael H. Harrell
NOTARY PUBLIC
STATE OF FLORIDA
Comm# GG095249
Expires 4/19/2021

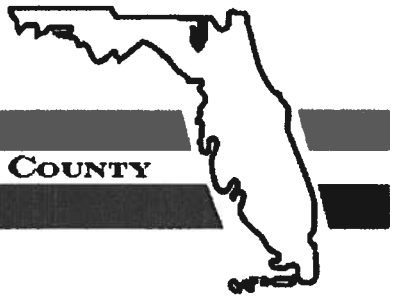
My Commission Expires:

Verification Pursuant to Section 92.525, Florida Statutes

Under Penalties of perjury, I declare that I have read the foregoing and that the facts stated in it are true to the best of my knowledge and belief.

Kevin Adarryl Parnell

District No. 1 - Ronald Williams
District No. 2 - Rocky Ford
District No. 3 - Bucky Nash
District No. 4 - Toby Witt
District No. 5 - Tim Murphy



BOARD OF COUNTY COMMISSIONERS • COLUMBIA COUNTY

Address Assignment and Maintenance Document

To maintain the county wide Addressing Policy you must make application for a 9-1-1 Address at the time you apply for a building permit. The established standards for addressing and posting numbers to all principal buildings, dwellings, businesses and industries are contained in Columbia County Ordinance 2001-9. The addressing system is to enable Emergency Services Agencies to locate you in an emergency, and to assist the United States Postal Service and the public in the timely and efficient provision of services to residents and businesses of Columbia County

Date/Time Issued:	**1/3/2020 9:34:15 PM**
Address:	**1857 NW JAKE Gln**
City:	**LAKE CITY**
State:	**FL**
Zip Code	**32055**
Parcel ID	**01729-003**

REMARKS: Address for proposed structure on parcel.

NOTICE: THIS ADDRESS WAS ISSUED BASED ON LOCATION AND ACCESS INFORMATION RECEIVED FROM THE REQUESTER. SHOULD, AT A LATER DATE, THE LOCATION AND/OR ACCESS INFORMATION BE FOUND TO BE IN ERROR OR CHANGED, THIS ADDRESS IS SUBJECT TO CHANGE.

Address Issued By: **Signed:/ Matt Crews**

Columbia County GIS/911 Addressing Coordinator

COLUMBIA COUNTY
911 ADDRESSING / GIS DEPARTMENT

263 NW Lake City Ave., Lake City, FL 32055 Telephone: (386) 758-1125
Email: gis@columbiacountyfla.com

PAT LYNCH
LYNCH DRILLING CORP
P O Box 934
Branford, FL 32008
(386)935-1076

DATE 1-7-20

CUSTOMER Kevin Parnell
1857 NW Lake Glen
Lake City, FL 32055.

LOCATION
Part 23-2S-16-01729-003

WE WILL CONSTRUCT A 4" WATER WELL COMPLETE WITH 4" WATER WELL STEEL CASING, 1HP SUBMERSIBLE PUMP WITH 1 1/4" DROP PIPE, AND AN 85 GALLON CAPTIVE AIR TANK (21.9 GALLON DRAWDOWN).

WELL WILL BE COMPLETE AT THE WELL SITE, WE DO NOT INCLUDE ELECTRICAL NOR PLUMBING CONNECTIONS FROM THE WELL TO THE HOME AND/OR POWER POLE.

ANY VARIATIONS OF THE ABOVE ARE SUBJECT TO APPROVAL FROM THE CUSTOMER AND.OR CONTRACTOR PRIOR TO COMMENCEMENT OF THE INDIVIDUAL JOB.

THANK YOU

NOT RESPONSIBLE FOR THE QUALITY OF WATER

STATE OF FLORIDA
DEPARTMENT OF HEALTH
ONSITE SEWAGE TREATMENT AND DISPOSAL SYSTEM
APPLICATION FOR CONSTRUCTION PERMIT

PERMIT NO. 20-0019
DATE PAID: 1/8/20
FEE PAID: 310.00
RECEIPT #: 144291

APPLICATION FOR:
[X] New System [ ] Existing System [ ] Holding Tank [ ] Innovative
[ ] Repair [ ] Abandonment [ ] Temporary [ ] _____

APPLICANT: Kevin Parnell

AGENT: ROCKY FORD, A & B CONSTRUCTION TELEPHONE: 386-497-2311

MAILING ADDRESS: 546 SW Dortch Street, FT. WHITE, FL, 32038

TO BE COMPLETED BY APPLICANT OR APPLICANT'S AUTHORIZED AGENT. SYSTEMS MUST BE CONSTRUCTED BY A PERSON LICENSED PURSUANT TO 489.105(3)(m) OR 489.552, FLORIDA STATUTES. IT IS THE APPLICANT'S RESPONSIBILITY TO PROVIDE DOCUMENTATION OF THE DATE THE LOT WAS CREATED OR PLATTED (MM/DD/YY) IF REQUESTING CONSIDERATION OF STATUTORY GRANDFATHER PROVISIONS.

PROPERTY INFORMATION

LOT: NA BLOCK: NA SUB: NA PLATTED: _____

PROPERTY ID #: 23-2S-16-01729-003 ZONING: _____ I/M OR EQUIVALENT: [Y / N]

PROPERTY SIZE: 1.210 ACRES WATER SUPPLY: [X] PRIVATE PUBLIC [ ]<=2000GPD [ ]>2000GPD

IS SEWER AVAILABLE AS PER 381.0065, FS? [Y / (N)] DISTANCE TO SEWER: NA FT

PROPERTY ADDRESS: NW Jake Glen, Lake City, FL

DIRECTIONS TO PROPERTY: Head W on NE Franklin St. toward NE Calhoun Ave, TR onto US-41 N, TR onto NW Falling Creek Rd, Cont. Straight onto NW Falling Creek Rd, TL onto NW Jake Glen

BUILDING INFORMATION [X] RESIDENTIAL [ ] COMMERCIAL

Unit No	Type of Establishment	No. of Bedrooms	Building Area Sqft	Commercial/Institutional System Design Table 1, Chapter 64E-6, FAC
1	SF Residential	3	2538	
2				
3				

[ ] Floor/Equipment Drains [ ] Other (Specify) _____

SIGNATURE: William A. Bishop II DATE: 1/7/2020

DH 4015, 08/09 (Obsoletes previous editions which may not be used)
Incorporated 64E-6.001, FAC

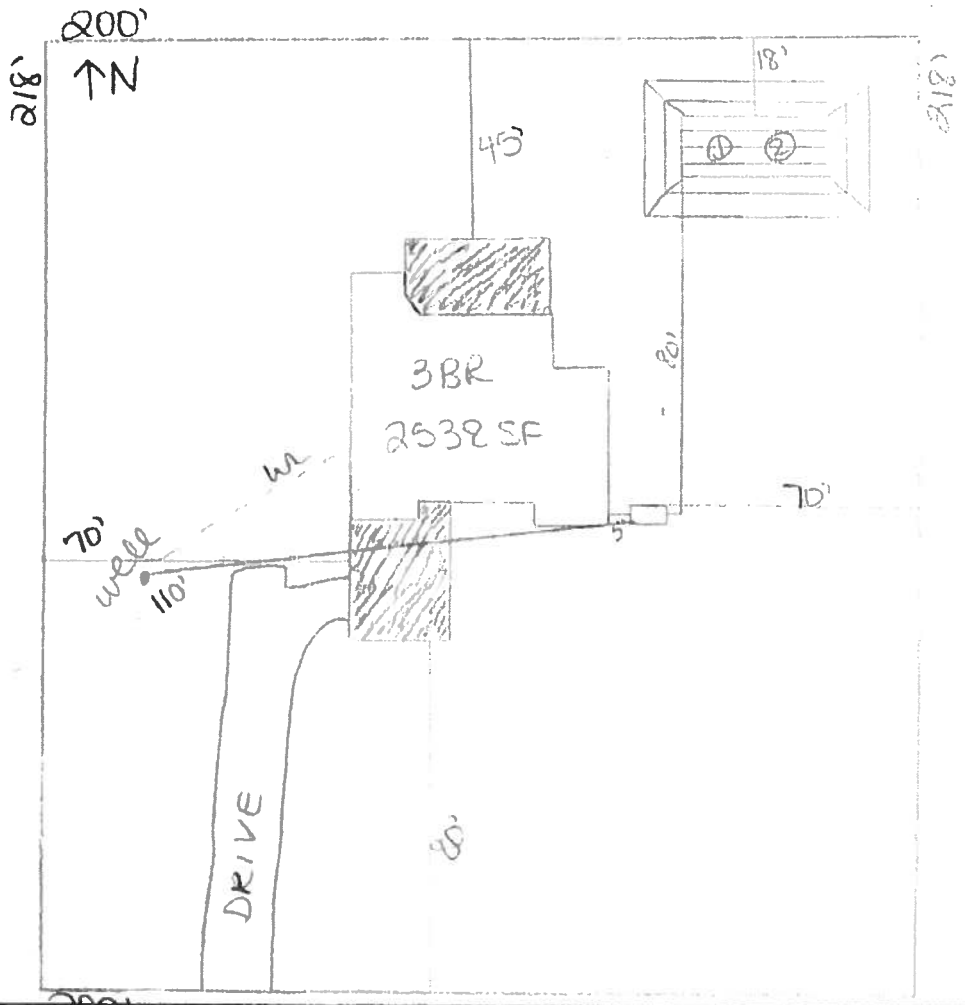
STATE OF FLORIDA
DEPARTMENT OF HEALTH
APPLICATION FOR ONSITE SEWAGE DISPOSAL SYSTEM CONSTRUCTION PERMIT

Permit Application Number 20-0019

Parnell

PART II - SITEPLAN

Scale: 1 inch = 40 feet.



Notes: _____

Site Plan submitted by: William D. Bishop II — MASTER CONTRACTOR

Plan Approved ✓ Not Approved _____ Date 1-7-20

By _____ County Health Department

11/24/20

ALL CHANGES MUST BE APPROVED BY THE COUNTY HEALTH DEPARTMENT

COLUMBIA COUNTY BUILDING DEPARTMENT
RESIDENTIAL CHECK LIST

MINIMUM PLAN REQUIREMENTS: FLORIDA BUILDING CODE RESIDENTIAL 2017 EFFECTIVE 1 JANUARY 2018 AND THE NATIONAL ELECTRICAL 2014 EFFECTIVE 1 JANUARY 2018

ALL REQUIREMENTS ARE SUBJECT TO CHANGE

ALL BUILDING PLANS MUST INDICATE COMPLIANCE WITH THE CURRENT FLORIDA BUILDING CODES RESIDENTIAL AND THE NATIONAL ELECTRICAL CODE. ALL PLANS OR DRAWINGS SHALL PROVIDE CALCULATIONS AND DETAILS THAT HAVE THE SEAL AND SIGNATURE OF A CERTIFIED ARCHITECT OR ENGINEER REGISTERED IN THE STATE OF FLORIDA, OR ALTERNATE METHODOLOGIES, APPROVED BY THE STATE OF FLORIDA BUILDING COMMISSION FOR ONE-AND-TWO FAMILY DWELLINGS, FBC 1609.3.1 THRU 1609.3.3.

FOR DESIGN PURPOSES THE FOLLOWING BASIC WIND SPEEDS ARE PER FLORIDA BUILDING CODE FIGURE 1609-A THROUGH 1609-C ULTIMATE DESIGN WIND SPEEDS FOR RISK CATEGORY AND BUILDINGS AND OTHER STRUCTURES

Revised 7/1/18

Website: http://www.columbiacountyfla.com/BuildingandZoning.asp

	GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL			Items to Include- Each Box shall be Circled as Applicable		
				Select From Drop down		
1	Two (2) complete sets of plans containing the following:					
2	All drawings must be clear, concise, drawn to scale, details that are not used shall be marked void					
3	**Condition space (Sq. Ft.)**	2538	**Total (Sq. Ft.) under roof** 3843	Yes	No	NA

Designers name and signature shall be on all documents and a licensed architect or engineer, signature and official embossed seal shall be affixed to the plans and documents as per the FLORIDA BUILDING CODES RESIDENTIAL 107.1.

Site Plan information including:

4	Dimensions of lot or parcel of land	- /		
5	Dimensions of all building set backs	- /		
6	Location of all other structures (include square footage of structures) on parcel, existing or proposed well and septic tank and all utility easements.	- /		
7	Provide a full legal description of property.	- /		

Wind-load Engineering Summary, calculations and any details are required.

	GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL	Items to Include- Each Box shall be Circled as Applicable		
8	**Plans or specifications must show compliance with FBCR Chapter 3**	Yes	No	NA
		Select From Drop down		
9	Basic wind speed (3-second gust), miles per hour	- /		
10	(Wind exposure – if more than one wind exposure is used, the wind exposure and applicable wind direction shall be indicated)	- /		
11	Wind importance factor and nature of occupancy	-		
12	The applicable internal pressure coefficient, Components and Cladding	- /		
13	The design wind pressure in terms of psf (kN/m²), to be used for the design of exterior component, cladding materials not specifally designed by the registered design professional.	- /		

Elevations Drawing including:

14	All side views of the structure	- /		
15	Roof pitch	- /		
16	Overhang dimensions and detail with attic ventilation	- /		
17	Location, size and height above roof of chimneys	- /		
18	Location and size of skylights with Florida Product Approval	- /		
19	Number of stories	- /		
20	Building height from the established grade to the roofs highest peak	-		

Floor Plan Including:

21	Dimensioned area plan showing rooms, attached garage, breeze ways, covered porches, deck, balconies	-		
22	Raised floor surfaces located more than 30 inches above the floor or grade	-		
23	All exterior and interior shear walls indicated	-		
24	Shear wall opening shown (Windows, Doors and Garage doors)	-		
25	Show compliance with Section FBCR 310 Emergency escape and rescue opening shown in each bedroom (net clear opening shown) and Show compliance with Section FBC 1405.13.2 where the opening of an operable window is located more than 72 inches above the finished grade or surface below, the lowest part of the clear opening of the window shall be a minimum of 24 inches above the finished floor of the room in which the window is located. Glazing between the floor and 24 inches shall be fixed or have openings through which a 4-inch-diameter sphere cannot pass.	-		
26	Safety glazing of glass where needed	-		
27	Fireplaces types (gas appliance) (vented or non-vented) or wood burning with Hearth (see chapter 10 and chapter 24 of FBCR)	-		
28	Show stairs with dimensions (width, tread and riser and total run) details of guardrails, Handrails	-		
29	Identify accessibility of bathroom (see FBCR SECTION 320)	-		

All materials placed within opening or onto/into exterior walls, soffits or roofs shall have Florida product approval number and mfg. installation information submitted with the plans
(see Florida product approval form)

GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL	Items to Include- Each Box shall be Circled as Applicable

FBCR 403: Foundation Plans

Select From Drop down

30	Location of all load-bearing walls footings indicated as standard, monolithic, dimensions, size and type of reinforcing.	-		
31	All posts and/or column footing including size and reinforcing	-		
32	Any special support required by soil analysis such as piling.	-		
33	Assumed load-bearing valve of soil 1000 Pound Per Square Foot	-		
34	Location of horizontal and vertical steel, for foundation or walls (include # size and type) For structures with foundation which establish new electrical utility companies service connection a Concrete Encased Electrode will be required within the foundation to serve as an grounding electrode system. Per the National Electrical Code article 250.52.3	-		

FBCR 506: CONCRETE SLAB ON GRADE

35	Show Vapor retarder (6mil. Polyethylene with joints lapped 6 inches and sealed)	-		
36	Show control joints, synthetic fiber reinforcement or welded fire fabric reinforcement and Supports	-		

FBCR 318: PROTECTION AGAINST TERMITES

37	Indicate on the foundation plan if soil treatment is used for subterranean termite prevention or Submit other approved termite protection methods. **Protection shall be provided by registered termiticides**	-		

FBCR 606: Masonry Walls and Stem walls (load bearing & shear Walls)

38	Show all materials making up walls, wall height, and Block size, mortar type	-		
39	Show all Lintel sizes, type, spans and tie-beam sizes and spacing of reinforcement	-		

Metal frame shear wall and roof systems shall be designed, signed and sealed by Florida Prof. Engineer or Architect

Floor Framing System: First and/or second story

40	Floor truss package shall including layout and details, signed and sealed by Florida Registered Professional Engineer	-		
41	Show conventional floor joist type, size, span, spacing and attachment to load bearing walls, stem walls and/or priers	-		
42	Girder type, size and spacing to load bearing walls, stem wall and/or priers	-		
43	Attachment of joist to girder	-		
44	Wind load requirements where applicable	-		
45	Show required under-floor crawl space	-		
46	Show required amount of ventilation opening for under-floor spaces	-		
47	Show required covering of ventilation opening	-		
48	Show the required access opening to access to under-floor spaces	-		
49	Show the sub-floor structural panel sheathing type, thickness and fastener schedule on the edges & intermediate of the areas structural panel sheathing	-		
50	Show Draftstopping, Fire caulking and Fire blocking	-		
51	Show fireproofing requirements for garages attached to living spaces, per FBCR section 302.6	-		
52	Provide live and dead load rating of floor framing systems (psf).	-		

FBCR CHAPTER 6 WOOD WALL FRAMING CONSTRUCTION

	GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL	Items to Include- Each Box shall be Circled as Applicable		
		Select from Drop down		
53	Stud type, grade, size, wall height and oc spacing for all load bearing or shear walls	-		
54	Fastener schedule for structural members per table FBC-R602.3.2 are to be shown	-		
55	Show Wood structural panel's sheathing attachment to studs, joist, trusses, rafters and structural members, showing fastener schedule attachment on the edges & intermediate of the areas structural panel sheathing	-		
56	Show all required connectors with a max uplift rating and required number of connectors and oc spacing for continuous connection of structural walls to foundation and roof trusses or rafter systems	-		
57	Show sizes, type, span lengths and required number of support jack studs, king studs for shear wall opening and girder or header per FBC-R602.7.	-		
58	Indicate where pressure treated wood will be placed	-		
59	Show all wall structural panel sheathing, grade, thickness and show fastener schedule for structural panel sheathing edges & intermediate areas	-		
60	A detail showing gable truss bracing, wall balloon framing details or/ and wall hinge bracing detail	-		

FBCR :ROOF SYSTEMS:

61	Truss design drawing shall meet section FBC-R 802.10. 1 Wood trusses	-		
62	Include a layout and truss details, signed and sealed by Florida Professional Engineer	-		
63	Show types of connector's assemblies' and resistance uplift rating for all trusses and rafters	-		
64	Show gable ends with rake beams showing reinforcement or gable truss and wall bracing details	-		
65	Provide dead load rating of trusses	-		

FBCR 802:Conventional Roof Framing Layout

66	Rafter and ridge beams sizes, span, species and spacing	-		
67	Connectors to wall assemblies' include assemblies' resistance to uplift rating	-		
68	Valley framing and support details	-		
69	Provide dead load rating of rafter system	-		

FBCR 803 ROOF SHEATHING

70	Include all materials which will make up the roof decking, identification of structural panel sheathing, grade, thickness	-		
71	Show fastener Size and schedule for structural panel sheathing on the edges & intermediate areas	-		

ROOF ASSEMBLIES FRC Chapter 9

72	Include all materials which will make up the roof assembles covering	-		
73	Submit Florida Product Approval numbers for each component of the roof assembles covering	-		

FBCR Chapter 11 Energy Efficiency Code for Residential Building

Residential construction shall comply with this code by using the following compliance methods in the FBCR Chapter 11 Residential buildings compliance methods. **Two of the required forms are to be submitted**, *N1100.1.1.1 As an alternative to the computerized Compliance Method A, the Alternate Residential Point System Method hand calculation, Alternate Form 600A, may be used. All requirements specific to this calculation are located in Sub appendix C to Appendix G. Buildings complying by this alternative shall meet all mandatory requirements of this chapter. Computerized versions of the Alternate Residential Point System Method shall not be acceptable for code compliance.*

	GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL	Items to Include- Each Box shall be Circled as Applicable		
		Select from Drop Down		
74	Show the insulation R value for the following areas of the structure	-		
75	Attic space	-		
76	Exterior wall cavity	-		
77	Crawl space	-		

HVAC information

78	Submit two copies of a Manual J sizing equipment or equivalent computation study	-		
79	Exhaust fans shown in bathrooms **Mechanical exhaust capacity of 50 cfm intermittent or 20 cfm continuous required**	-		
80	Show clothes dryer route and total run of exhaust duct	-		

Plumbing Fixture layout shown

81	All fixtures waste water lines shall be shown on the foundation plan	-		
82	Show the location of water heater	-		

Private Potable Water

83	Pump motor horse power	-		
84	Reservoir pressure tank gallon capacity	-		
85	Rating of cycle stop valve if used	-		

Electrical layout shown including

86	Show Switches, receptacles outlets, lighting fixtures and Ceiling fans	-		
87	Show all 120-volt, single phase, 15- and 20-ampere branch circuits outlets required to be protected by **Ground-Fault Circuit Interrupter (GFCI) Article 210.8 A**	-		
88	Show the location of smoke detectors & Carbon monoxide detectors	-		
89	Show service panel, sub-panel, location(s) and total ampere ratings	-		
90	On the electrical plans identify the electrical service overcurrent protection device for the main electrical service. This device shall be installed on the exterior of structures to serve as a disconnecting means for the utility company electrical service. Conductors used from the exterior disconnecting means to a panel or sub panel shall have four-wire conductors, of which one conductor shall be used as an equipment ground. Indicate if the utility company service entrance cable will be of the overhead or underground type. **For structures** with foundation which establish new electrical utility companies service connection a Concrete Encased Electrode will be required within the foundation to serve as an Grounding electrode system. Per the National Electrical Code article 250.52.3	-		
91	Appliances and HVAC equipment and disconnects	-		
92	Show all 120-volt, single phase, 15- and 20-ampere branch circuits supplying outlets installed in dwelling unit family rooms, dining rooms, living rooms, parlors, libraries, dens, bedrooms, sunrooms, recreation rooms, closets, hallways, or similar rooms or areas shall be protected by a listed **Combination arc-fault circuit interrupter,** Protection device.			

Notice Of Commencement:

A notice of commencement form RECORDED in the Columbia County Clerk Office is required to be filed with the Building Department BEFORE ANY INSPECTIONS can be performed.

	GENERAL REQUIREMENTS: APPLICANT – PLEASE CHECK ALL APPLICABLE BOXES BEFORE SUBMITTAL	Items to Include- Each Box shall be Circled as Applicable

****ITEMS 95, 96, & 98 Are Required After APPROVAL from the ZONING DEPT.****

Select from Drop down

93	**Building Permit Application** A current Building Permit Application is to be completed, by following the Checklist all supporting documents must be submitted. There is a **$15.00** application fee. The completed application with attached documents and application fee can be mailed.	-		
94	**Parcel Number** The parcel number (Tax ID number) from the Property Appraisers Office (386) 758-1083 is required. A copy of property deed is also required. www.columbiacountyfla.com	-		
95	**Environmental Health Permit or Sewer Tap Approval** A copy of a approved Columbia County Environmental Health (386) 758-1058	-		
96	**City of Lake City** A City Water and/or Sewer letter. Call 386-752-2031	-		
97	**Toilet facilities shall be provided for all construction sites**	-		
98	**Town of Fort White** (386) 497-2321 If the parcel in the application for building permit is within the Corporate city limits of Fort White, an approval land use development letter issued by the Town of Fort is required to be submitted with the application for a building permit.	-		
99	**Flood Information:** All projects within the Floodway of the Suwannee or Santa Fe Rivers shall require permitting through the Suwannee River Water Management District, before submitting a application to this office. Any project located within a flood zone where the base flood elevation (100 year flood) has been established shall meet the requirements of Section 8.5.2 of the Columbia County Land Development Regulations. Any project located within a flood zone where the base flood elevation has not been established (Zone A) shall meet the requirements of Section 8.5.3 of the Columbia County Land Development Regulations (Municode.com)	-		
100	**CERTIFIED FINISHED FLOOR ELEVATIONS** will be required on any project where the approved FIRM Flood Maps show the property is in a AE, Floodway, and AH flood zones. Additionally One Foot Rise letters are required for AE and AH zones. In the Floodway Flood zones a Zero Rise letter is required.	-		
101	A Flood development permit is also required for AE, Floodway & AH. Development permit cost is **$50.00**	-		
102	**Driveway Connection:** If the property does not have an existing access to a public road, then an application for a culvert permit **($25.00)** must be made. County Public Works Dept. determines the size and length of every culvert before instillation and completes a final inspection before permanent power is granted. If the applicant feels that a culvert is not needed, they may apply for a culvert waiver **($50.00)** Separate Check when issued. If the project is to be located on an F.D.O.T. maintained road, then an F.D.O.T. access permit is required.	-		
103	**911 Address:** An application for a 911address must be applied for and **received** through the Columbia County Emergency Management Office of 911 Addressing Department (386) 758-1125.	-		

Ordinance Sec. 90-75. - Construction debris. (e) It shall be unlawful for any person to dispose of or discard solid waste, including construction or demolition debris at any place within the county other than on an authorized disposal site or at the county's solid waste facilities. The temporary storage, not to exceed seven days of solid waste (excluding construction and demolition debris) on the premises where generated or vegetative trash pending disposition as authorized by law or ordinance, shall not be deemed a violation of this section. The temporary storage of construction and demolition debris on the premises where generated or vegetative trash pending disposition as authorized by law or ordinance shall not be deemed in violation of this section; provided, however, such construction and demolition debris must be disposed of in accordance with this article prior to the county's issuance of a certificate of occupancy for the premises. The burning of lumber from a construction or demolition project or vegetative trash when done so with legal and proper permits from the authorized agencies and in accordance with such agencies' rules and regulations, shall not be deemed a violation of this section. No person shall bury, throw, place, or deposit, or cause to be buried, thrown, placed, or deposited, any solid waste, special waste, or debris of any kind into or on any of the public streets, road right-of-way, highways, bridges, alleys, lanes, thoroughfares, waters, canals, or vacant lots or lands within the county. No person shall bury any vegetative trash on any of the public streets, road right-of-way, highways, bridges, lanes, thoroughfares, waters, canals, or lots less than ten acres in size within the county.

As required by Florida Statute 553.842 and Florida Administrative Code 9B-72, please provide the information and approval numbers on the building components listed below if they will be utilized on the construction project for which you are applying for a building permit. We recommend you contact your local product supplier should you not know the product approval number for any of the applicable listed products. Statewide approved products are listed online @ www.floridabuilding.org

Category/Subcategory	Manufacturer	Product Description	Approval Number(s)
1. EXTERIOR DOORS			
A. SWINGING	THERMO - TRU	EXTERIOR HINGED DOORS	FL 5891 - R3
B. SLIDING	PGT	SLIDING GLASS DOORS	FL 251 - R15
C. SECTIONAL/ROLL UP		GARAGE DOORS	FL 5678 - R2
D. OTHER			
2. WINDOWS			
A. SINGLE/DOUBLE HUNG	PGT	WINDOW	FL 239 - R19
B. HORIZONTAL SLIDER	PGT	WINDOW	FL 242 - R16
C. CASEMENT			
D. FIXED	PGT	WINDOW	FL 243 - R14
E. MULLION			
F. SKYLIGHTS			
G. OTHER			
3. PANEL WALL			
A. SIDING	HARDIE	PANEL WALL SIDING	FL 13192 - R5
B. SOFFITS	KAYCON	ALUMINUM SOFFIT / FACIA	FL 12198 - R1
C. STOREFRONTS	STO	STUCCO FINISH	FL 15026 - R1
D. GLASS BLOCK			
E. OTHER			
4. ROOFING PRODUCTS			
A. ASPHALT SHINGLES	GAF	ARCH SHINGLES 30YR	FL 10124 - R20
B. NON-STRUCTURAL METAL	GAF	TAR PAPER	FL 4911 - R3
C. ROOFING TILES	OMG	ROOFING NAILS	FL 699 - R3
D. SINGLE PLY ROOF			
E. OTHER			
5. STRUCTURAL COMPONENTS			
A. WOOD CONNECTORS	USPC	ANCHORS	FL 5631 - R1
B. WOOD ANCHORS	USPC	ANCHORS	FL 5631 - R1
C. TRUSS PLATES			
D. INSULATION FORMS			
E. LINTELS			
F. OTHERS			
6. NEW EXTERIOR			
ENVELOPE PRODUCTS			

The products listed below did not demonstrate product approval at plan review. I understand that at the time of inspection of these products, the following information must be available to the inspector on the jobsite; 1) copy of the product approval, 2) performance characteristics which the product was tested and certified to comply with, 3) copy of the applicable manufacturers installation requirements.
Further, I understand these products may have to be removed if approval cannot be demonstrated during inspection.

5/31/18

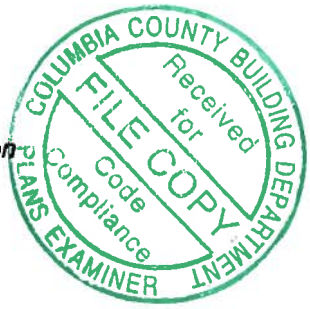
Contractor OR Agent Signature Date

NOTES: _____

RESIDENTIAL ENERGY CONSERVATION CODE DOCUMENTATION CHECKLIST

Florida Department of Business and Professional Regulation
Simulated Performance Alternative (Performance) Method

Applications for compliance with the 2017 Florida Building Code, Energy Conservation via the residential Simulated Performance Method shall include:



- ☐ *This checklist*
- ☐ *A Form R405 report that documents that the Proposed Design complies with Section R405.3 of the Florida Energy Code. This form shall include a summary page indicating home address, e-ratio and the pass or fail status along with summary areas and types of components, whether the home was simulated as a worst-case orientation, name and version of the compliance software tool, name of individual completing the compliance report (one page) and an input summary checklist that can be used for field verification (usually four pages/may be greater).*
- ☐ *Energy Performance Level (EPL) Display Card (one page)*
- ☐ *HVAC system sizing and selection based on ACCA Manual S or per exceptions provided in Section R403.7*
- ☐ *Mandatory Requirements (five pages)*

Required prior to CO for the Performance Method:

- ☐ *Air Barrier and Insulation Inspection Component Criteria checklist (Table R402.4.1.1 - one page)*
- ☐ *A completed Envelope Leakage Test Report (usually one page)*
- ☐ *If Form R405 duct leakage type indicates anything other than "default leakage", then a completed Form R405 Duct Leakage Test Report (usually one page)*

FORM R405-2017

FLORIDA ENERGY EFFICIENCY CODE FOR BUILDING CONSTRUCTION

Florida Department of Business and Professional Regulation - Residential Performance Method

Project Name:	200001 Parnell Res	Builder Name:	Bryan Zecher
Street:		Permit Office:	
City, State, Zip:	, FL ,	Permit Number:	
Owner:	Parnell Res	Jurisdiction:	
Design Location:	FL, Gainesville	County:	Columbia (Florida Climate Zone 2)

1. New construction or existing	New (From Plans)
2. Single family or multiple family	Single-family
3. Number of units, if multiple family	1
4. Number of Bedrooms	3
5. Is this a worst case?	Yes
6. Conditioned floor area above grade (ft²)	2538
Conditioned floor area below grade (ft²)	0

7. Windows(318.3 sqft.)	Description	Area
a. U-Factor:	Dbl, U=0.30	318.33 ft²
SHGC:	SHGC=0.20	
b. U-Factor:	N/A	ft²
SHGC:		
c. U-Factor:	N/A	ft²
SHGC:		
d. U-Factor:	N/A	ft²
SHGC:		
Area Weighted Average Overhang Depth:		8.221 ft.
Area Weighted Average SHGC:		0.200

8. Floor Types (2538.0 sqft.)	Insulation	Area
a. Slab-On-Grade Edge Insulation	R=0.0	2538.00 ft²
b. N/A	R=	ft²
c. N/A	R=	ft²

9. Wall Types (2197.9 sqft.)	Insulation	Area
a. Frame - Wood, Exterior	R=13.0	1954.90 ft²
b. Frame - Wood, Adjacent	R=13.0	243.00 ft²
c. N/A	R=	ft²
d. N/A	R=	ft²

10. Ceiling Types (2711.0 sqft.)	Insulation	Area
a. Roof Deck (Unvented)	R=22.0	2711.00 ft²
b. N/A	R=	ft²
c. N/A	R=	ft²

11. Ducts	R	ft²
a. Sup: Attic, Ret: Attic, AH: Main	6	507.6

12. Cooling systems	kBtu/hr	Efficiency
a. Central Unit	43.0	SEER:18.00

13. Heating systems	kBtu/hr	Efficiency
a. Electric Heat Pump	43.0	HSPF:9.50

14. Hot water systems	
a. Natural Gas Tankless	Cap: 1 gallons
	EF: 0.600
b. Conservation features	
None	
15. Credits	Pstat

Glass/Floor Area: 0.125

Total Proposed Modified Loads: 63.40

Total Baseline Loads: 66.25

PASS

I hereby certify that the plans and specifications covered by this calculation are in compliance with the Florida Energy Code.

PREPARED BY: Evan Beamsley

DATE: 2020-01-03

I hereby certify that this building, as designed, is in compliance with the Florida Energy Code.

OWNER/AGENT: _____

DATE: 1/6/20

Review of the plans and specifications covered by this calculation indicates compliance with the Florida Energy Code. Before construction is completed this building will be inspected for compliance with Section 553.908 Florida Statutes.

BUILDING OFFICIAL: _____

DATE: _____

- Compliance requires certification by the air handler unit manufacturer that the air handler enclosure qualifies as certified factory-sealed in accordance with R403.3.2.1.

- Compliance requires an Air Barrier and Insulation Inspection Checklist in accordance with R402.4.1.1 and this project requires an envelope leakage test report with envelope leakage no greater than 7.00 ACH50 (R402.4.1.2).

FORM R405-2017

INPUT SUMMARY CHECKLIST REPORT

PROJECT

Title:	200001 Parnell Res	Bedrooms:	3	Address Type:	Street Address
Building Type:	User	Conditioned Area:	2538	Lot #	
Owner Name:	Parnell Res	Total Stories:	1	Block/Subdivision:	
# of Units:	1	Worst Case:	Yes	PlatBook:	
Builder Name:	Bryan Zecher	Rotate Angle:	225	Street:	
Permit Office:		Cross Ventilation:		County:	Columbia
Jurisdiction:		Whole House Fan:		City, State, Zip:	,
Family Type:	Single-family				FL ,
New/Existing:	New (From Plans)				
Comment:					

CLIMATE

√	Design Location	TMY Site	Design Temp 97.5 %	Design Temp 2.5 %	Int Design Temp Winter	Int Design Temp Summer	Heating Degree Days	Design Moisture	Daily Temp Range
_____	FL, Gainesville	FL_GAINESVILLE_REGI	32	92	70	75	1305.5	51	Medium

BLOCKS

Number	Name	Area	Volume
1	Block1	2538	25380

SPACES

Number	Name	Area	Volume	Kitchen	Occupants	Bedrooms	Infil ID	Finished	Cooled	Heated
1	Main	2538	25380	Yes	8	3	1	Yes	Yes	Yes

FLOORS

√	#	Floor Type	Space	Perimeter	R-Value	Area		Tile	Wood	Carpet
_____	1	Slab-On-Grade Edge Insulatio	Main	234 ft	0	2538 ft²	----	0.3	0.3	0.4

ROOF

√	#	Type	Materials	Roof Area	Gable Area	Roof Color	Rad Barr	Solar Absor.	SA Tested	Emitt	Emitt Tested	Deck Insul.	Pitch (deg)
_____	1	Hip	Composition shingles	2940 ft²	0 ft²	Dark	N	0.92	No	0.9	No	22	30.3

ATTIC

√	#	Type	Ventilation	Vent Ratio (1 in)	Area	RBS	IRCC
_____	1	Full attic	Unvented	0	2538 ft²	N	N

CEILING

√	#	Ceiling Type	Space	R-Value	Ins Type	Area	Framing Frac	Truss Type
_____	1	Under Attic (Unvented)	Main	0	Blown	2711 ft²	0	Wood

INPUT SUMMARY CHECKLIST REPORT

WALLS

√	#	Ornt	Adjacent To	Wall Type	Space	Cavity R-Value	Width Ft	Width In	Height Ft	Height In	Area	Sheathing R-Value	Framing Fraction	Solar Absor.	Below Grade%
____	1	N=>SW	Exterior	Frame - Wood	Main	13	14	0	9	0	126.0 ft²		0.23	0.75	0
____	2	E=>NW	Exterior	Frame - Wood	Main	13	3	10	9		34.5 ft²		0.23	0.75	0
____	3	NE=>W	Exterior	Frame - Wood	Main	13	5	8	9		51.0 ft²		0.23	0.75	0
____	4	N=>SW	Exterior	Frame - Wood	Main	13	25	9	11		283.3 ft²		0.23	0.75	0
____	5	E=>NW	Exterior	Frame - Wood	Main	13	11	10	11		130.2 ft²		0.23	0.75	0
____	6	N=>SW	Exterior	Frame - Wood	Main	13	13	2	9		118.5 ft²		0.23	0.75	0
____	7	E=>NW	Exterior	Frame - Wood	Main	13	35	8	9		321.0 ft²		0.23	0.75	0
____	8	S=>NE	Exterior	Frame - Wood	Main	13	15		9		135.0 ft²		0.23	0.75	0
____	9	W=>SE	Exterior	Frame - Wood	Main	13	4	8	9		42.0 ft²		0.23	0.75	0
____	10	S=>NE	Exterior	Frame - Wood	Main	13	8		11		88.0 ft²		0.23	0.75	0
____	11	S=>NE	Exterior	Frame - Wood	Main	13	10	2	9		91.5 ft²		0.23	0.75	0
____	12	S=>NE	Garage	Frame - Wood	Main	13	7	6	9		67.5 ft²		0.23	0.75	0
____	13	E=>NW	Garage	Frame - Wood	Main	13	3	6	9		31.5 ft²		0.23	0.75	0
____	14	S=>NE	Garage	Frame - Wood	Main	13	16		9		144.0 ft²		0.23	0.75	0
____	15	W=>SE	Exterior	Frame - Wood	Main	13	32	6	9		292.5 ft²		0.23	0.75	0
____	16	S=>NE	Exterior	Frame - Wood	Main	13	2	2	9		19.5 ft²		0.23	0.75	0
____	17	W=>SE	Exterior	Frame - Wood	Main	13	6		9		54.0 ft²		0.23	0.75	0
____	18	N=>SW	Exterior	Frame - Wood	Main	13	2	2	9		19.5 ft²		0.23	0.75	0
____	19	W=>SE	Exterior	Frame - Wood	Main	13	16	6	9		148.5 ft²		0.23	0.75	0

DOORS

√	#	Ornt	Door Type	Space	Storms	U-Value	Width Ft	Width In	Height Ft	Height In	Area
_____	1	NE=>W	Insulated	Main	None	.4	1		8		8 ft²
_____	2	N=>SW	Insulated	Main	None	.4	6		9		54 ft²
_____	3	S=>NE	Insulated	Main	None	.4	3		6	8	20 ft²
_____	4	S=>NE	Insulated	Main	None	.4	2		8		16 ft²

WINDOWS

Orientation shown is the entered orientation (=>) changed to Worst Case.

√	#	Ornt	Wall ID	Frame	Panes	NFRC	U-Factor	SHGC	Imp	Area	Overhang Depth	Overhang Separation	Int Shade	Screening
_____	1	N=>SW	1	Metal	Low-E Double	Yes	0.3	0.2	N	36.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	2	NE=>W	3	Metal	Low-E Double	Yes	0.3	0.2	N	13.3 ft²	24 ft 0 in	2 ft 0 in	None	None
_____	3	N=>SW	4	Metal	Low-E Double	Yes	0.3	0.2	N	108.0 ft²	15 ft 8 in	0 ft 0 in	None	None
_____	4	N=>SW	6	Metal	Low-E Double	Yes	0.3	0.2	N	36.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	5	E=>NW	7	Metal	Low-E Double	Yes	0.3	0.2	N	15.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	6	E=>NW	7	Metal	Low-E Double	Yes	0.3	0.2	N	6.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	7	S=>NE	8	Metal	Low-E Double	Yes	0.3	0.2	N	4.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	8	S=>NE	8	Metal	Low-E Double	Yes	0.3	0.2	N	15.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	9	S=>NE	10	Metal	Low-E Double	Yes	0.3	0.2	N	32.0 ft²	8 ft 10 in	1 ft 0 in	None	None
_____	10	S=>NE	11	Metal	Low-E Double	Yes	0.3	0.2	N	15.0 ft²	6 ft 6 in	1 ft 2 in	None	None
_____	11	W=>SE	15	Metal	Low-E Double	Yes	0.3	0.2	N	30.0 ft²	1 ft 6 in	1 ft 0 in	None	None
_____	12	W=>SE	15	Metal	Low-E Double	Yes	0.3	0.2	N	4.0 ft²	1 ft 6 in	1 ft 0 in	None	None

FORM R405-2017

INPUT SUMMARY CHECKLIST REPORT

WINDOWS

Orientation shown is the entered orientation (=>) changed to Worst Case.

√	#	Ornt	Wall ID	Frame	Panes	NFRC	U-Factor	SHGC	Imp	Area	Overhang Depth	Overhang Separation	Int Shade	Screening
_____	13	W=>SE	17	Metal	Low-E Double	Yes	0.3	0.2	N	4.0 ft²	1 ft 6 in	1 ft 0 in	None	None

GARAGE

√	#	Floor Area	Ceiling Area	Exposed Wall Perimeter	Avg. Wall Height	Exposed Wall Insulation
_____	1	696.07 ft²	696.07 ft²	84 ft	9 ft	1

INFILTRATION

#	Scope	Method	SLA	CFM 50	ELA	EqLA	ACH	ACH 50
1	Wholehouse	Proposed ACH(50)	.000445	2961	162.55	305.71	.183	7

HEATING SYSTEM

√	#	System Type	Subtype	Efficiency	Capacity	Block	Ducts
_____	1	Electric Heat Pump/	None	HSPF:9.5	43 kBtu/hr	1	sys#1

COOLING SYSTEM

√	#	System Type	Subtype	Efficiency	Capacity	Air Flow	SHR	Block	Ducts
_____	1	Central Unit/	None	SEER: 18	43 kBtu/hr	1290 cfm	0.75	1	sys#1

HOT WATER SYSTEM

√	#	System Type	SubType	Location	EF	Cap	Use	SetPnt	Conservation
_____	1	Natural Gas	Tankless	Exterior	0.6	1 gal	60 gal	120 deg	None

SOLAR HOT WATER SYSTEM

√	FSEC Cert #	Company Name	System Model #	Collector Model #	Collector Area	Storage Volume	FEF
_____	None	None			ft²		

DUCTS

√	#	Supply Location	Supply R-Value	Supply Area	Return Location	Return Area	Leakage Type	Air Handler	CFM 25 TOT	CFM25 OUT	QN	RLF	HVAC # Heat	HVAC # Cool
_____	1	Attic	6	507.6 ft	Attic	126.9 ft	Default Leakage	Main	(Default)	(Default)			1	1

FORM R405-2017

INPUT SUMMARY CHECKLIST REPORT

TEMPERATURES

Programable Thermostat: Y

Ceiling Fans:

	Jan	Feb	Mar	Apr	May	Jun	Jul	Aug	Sep	Oct	Nov	Dec
Cooling	[ ]	[ ]	[ ]	[ ]	[ ]	[X]	[X]	[X]	[X]	[ ]	[ ]	[ ]
Heating	[X]	[X]	[X]	[ ]	[ ]	[ ]	[ ]	[ ]	[ ]	[ ]	[X]	[X]
Venting	[ ]	[ ]	[X]	[X]	[ ]	[ ]	[ ]	[ ]	[ ]	[X]	[X]	[ ]

Thermostat Schedule: HERS 2006 Reference

Schedule Type		Hours 1	2	3	4	5	6	7	8	9	10	11	12
Cooling (WD)	AM	78	78	78	78	78	78	78	78	80	80	80	80
	PM	80	80	78	78	78	78	78	78	78	78	78	78
Cooling (WEH)	AM	78	78	78	78	78	78	78	78	78	78	78	78
	PM	78	78	78	78	78	78	78	78	78	78	78	78
Heating (WD)	AM	66	66	66	66	66	68	68	68	68	68	68	68
	PM	68	68	68	68	68	68	68	68	68	68	66	66
Heating (WEH)	AM	66	66	66	66	66	68	68	68	68	68	68	68
	PM	68	68	68	68	68	68	68	68	68	68	66	66

MASS

Mass Type	Area	Thickness	Furniture Fraction	Space
Default(8 lbs/sq.ft.	0 ft²	0 ft	0.3	Main

ENERGY PERFORMANCE LEVEL (EPL) DISPLAY CARD

ESTIMATED ENERGY PERFORMANCE INDEX* = 96

The lower the Energy Performance Index, the more efficient the home.

1. New home or, addition	1. New (From Plans)
2. Single-family or multiple-family	2. Single-family
3. No. of units (if multiple-family)	3. 1
4. Number of bedrooms	4. 3
5. Is this a worst case? (yes/no)	5. Yes
6. Conditioned floor area (sq. ft.)	6. 2538
7. Windows, type and area	
a) U-factor:(weighted average)	7a. 0.300
b) Solar Heat Gain Coefficient (SHGC)	7b. 0.200
c) Area	7c. 318.3
8. Skylights	
a) U-factor:(weighted average)	8a. NA
b) Solar Heat Gain Coefficient (SHGC)	8b. NA
9. Floor type, insulation level:	
a) Slab-on-grade (R-value)	9a. 0.0
b) Wood, raised (R-value)	9b.
c) Concrete, raised (R-value)	9c.
10. Wall type and insulation:	
A. Exterior:	
1. Wood frame (Insulation R-value)	10A1. 13.0
2. Masonry (Insulation R-value)	10A2.
B. Adjacent:	
1. Wood frame (Insulation R-value)	10B1. 13.0
2. Masonry (Insulation R-value)	10B2.
11. Ceiling type and insulation level	
a) Under attic	11a. 0.0
b) Single assembly	11b.
c) Knee walls/skylight walls	11c.
d) Radiant barrier installed	11d. No

12. Ducts, location & insulation level	
a) Supply ducts	R 6.0
b) Return ducts	R 6.0
c) AHU location	Main
13. Cooling system:	Capacity 43.0
a) Split system	SEER
b) Single package	SEER
c) Ground/water source	SEER/COP
d) Room unit/PTAC	EER
e) Other	18.0
14. Heating system:	Capacity 43.0
a) Split system heat pump	HSPF
b) Single package heat pump	HSPF
c) Electric resistance	COP
d) Gas furnace, natural gas	AFUE
e) Gas furnace, LPG	AFUE
f) Other	9.50
15. Water heating system	
a) Electric resistance	EF
b) Gas fired, natural gas	EF 0.60
c) Gas fired, LPG	EF
d) Solar system with tank	EF
e) Dedicated heat pump with tank	EF
f) Heat recovery unit	HeatRec%
g) Other	
16. HVAC credits claimed (Performance Method)	
a) Ceiling fans	
b) Cross ventilation	No
c) Whole house fan	No
d) Multizone cooling credit	
e) Multizone heating credit	
f) Programmable thermostat	Yes

*Label required by Section R303.1.3 of the Florida Building Code, Energy Conservation, if not DEFAULT.

I certify that this home has complied with the Florida Building Code, Energy Conservation, through the above energy saving features which will be installed (or exceeded) in this home before final inspection. Otherwise, a new EPL display card will be completed based on installed code compliant features.

Builder Signature: _____ Date: 1/6/20

Address of New Home: 1857 NW Jake Gln City/FL Zip: , FL

Florida Building Code, Energy Conservation, 6th Edition (2017)
Mandatory Requirements for Residential Performance, Prescriptive and ERI Methods

ADDRESS:	Permit Number:
, FL ,	

MANDATORY REQUIREMENTS See individual code sections for full details.

√

SECTION R401 GENERAL

☐ **R401.3 Energy Performance Level (EPL) display card (Mandatory).** The building official shall require that an energy performance level (EPL) display card be completed and certified by the builder to be accurate and correct before final approval of the building for occupancy. Florida law (Section 553.9085, Florida Statutes) requires the EPL display card to be included as an addendum to each sales contract for both presold and nonpresold residential buildings. The EPL display card contains information indicating the energy performance level and efficiencies of components installed in a dwelling unit. The building official shall verify that the EPL display card completed and signed by the builder accurately reflects the plans and specifications submitted to demonstrate code compliance for the building. A copy of the EPL display card can be found in Appendix RD.

☐ **R402.4 Air leakage (Mandatory).** The building thermal envelope shall be constructed to limit air leakage in accordance with the requirements of Sections R402.4.1 through R402.4.5.

Exception: Dwelling units of R-2 Occupancies and multiple attached single family dwellings shall be permitted to comply with Section C402.5.

☐ **R402.4.1 Building thermal envelope.** The building thermal envelope shall comply with Sections R402.4.1.1 and R402.4.1.2. The sealing methods between dissimilar materials shall allow for differential expansion and contraction.

☐ **R402.4.1.1 Installation.** The components of the building thermal envelope as listed in Table R402.4.1.1 shall be installed in accordance with the manufacturer's instructions and the criteria listed in Table R402.4.1.1, as applicable to the method of construction. Where required by the code official, an approved third party shall inspect all components and verify compliance.

☐ **R402.4.1.2 Testing.** The building or dwelling unit shall be tested and verified as having an air leakage rate not exceeding seven air changes per hour in Climate Zones 1 and 2, and three air changes per hour in Climate Zones 3 through 8. Testing shall be conducted in accordance with ANSI/RESNET/ICC 380 and reported at a pressure of 0.2 inch w.g. (50 pascals). Testing shall be conducted by either individuals as defined in Section 553.993(5) or (7), Florida Statutes, or individuals licensed as set forth in Section 489.105(3)(f), (g) or (i) or an approved third party. A written report of the results of the test shall be signed by the party conducting the test and provided to the code official. Testing shall be performed at any time after creation of all penetrations of the building thermal envelope.

Exception: Testing is not required for additions, alterations, renovations, or repairs, of the building thermal envelope of existing buildings in which the new construction is less than 85 percent of the building thermal envelope.

During testing:
1. Exterior windows and doors, fireplace and stove doors shall be closed, but not sealed, beyond the intended weatherstripping or other infiltration control measures.
2. Dampers including exhaust, intake, makeup air, backdraft and flue dampers shall be closed, but not sealed beyond intended infiltration control measures.
3. Interior doors, if installed at the time of the test, shall be open.
4. Exterior doors for continuous ventilation systems and heat recovery ventilators shall be closed and sealed.
5. Heating and cooling systems, if installed at the time of the test, shall be turned off.
6. Supply and return registers, if installed at the time of the test, shall be fully open.

☐ **R402.4.2 Fireplaces.** New wood-burning fireplaces shall have tight-fitting flue dampers or doors, and outdoor combustion air. Where using tight-fitting doors on factory-built fireplaces listed and labeled in accordance with UL 127, the doors shall be tested and listed for the fireplace. Where using tight-fitting doors on masonry fireplaces, the doors shall be listed and labeled in accordance with UL 907.

☐ **R402.4.3 Fenestration air leakage.** Windows, skylights and sliding glass doors shall have an air infiltration rate of no more than 0.3 cfm per square foot (1.5 L/s/m2), and swinging doors no more than 0.5 cfm per square foot (2.6 L/s/m2), when tested according to NFRC 400 or AAMA/ WDMA/CSA 101/I.S.2/A440 by an accredited, independent laboratory and listed and labeled by the manufacturer.

Exception: Site-built windows, skylights and doors.

MANDATORY REQUIREMENTS - (Continued)

☐ **R402.4.4 Rooms containing fuel-burning appliances.** In Climate Zones 3 through 8, where open combustion air ducts provide combustion air to open combustion fuel burning appliances, the appliances and combustion air opening shall be located outside the building thermal envelope or enclosed in a room, isolated from inside the thermal envelope. Such rooms shall be sealed and insulated in accordance with the envelope requirements of Table R402.1.2, where the walls, floors and ceilings shall meet not less than the basement wall R-value requirement. The door into the room shall be fully gasketed and any water lines and ducts in the room insulated in accordance with Section R403. The combustion air duct shall be insulated where it passes through conditioned space to a minimum of R-8.

Exceptions:

1. Direct vent appliances with both intake and exhaust pipes installed continuous to the outside.
2. Fireplaces and stoves complying with Section R402.4.2 and Section R1006 of the Florida Building Code, Residential.

☐ **R402.4.5 Recessed lighting.** Recessed luminaires installed in the building thermal envelope shall be sealed to limit air leakage between conditioned and unconditioned spaces. All recessed luminaires shall be IC-rated and labeled as having an air leakage rate not more than 2.0 cfm (0.944 L/s) when tested in accordance with ASTM E283 at a 1.57 psf (75 Pa) pressure differential. All recessed luminaires shall be sealed with a gasket or caulk between the housing and the interior wall or ceiling covering.

SECTION R403 SYSTEMS

R403.1 Controls.

☐ **R403.1.1 Thermostat provision (Mandatory).** At least one thermostat shall be provided for each separate heating and cooling system.

☐ **R403.1.3 Heat pump supplementary heat (Mandatory).** Heat pumps having supplementary electric-resistance heat shall have controls that, except during defrost, prevent supplemental heat operation when the heat pump compressor can meet the heating load.

☐ **R403.3.2 Sealing (Mandatory)** All ducts, air handlers, filter boxes and building cavities that form the primary air containment passageways for air distribution systems shall be considered ducts or plenum chambers, shall be constructed and sealed in accordance with Section C403.2.9.2 of the Commercial Provisions of this code and shall be shown to meet duct tightness criteria below.

Duct tightness shall be verified by testing in accordance with ANSI/RESNET/ICC 380 by either individuals as defined in Section 553.993(5) or (7), Florida Statutes, or individuals licensed as set forth in Section 489.105(3)(f), (g) or (i), Florida Statutes, to be "substantially leak free" in accordance with Section R403.3.3.

☐ **R403.3.2.1 Sealed air handler.** Air handlers shall have a manufacturer's designation for an air leakage of no more than 2 percent of the design airflow rate when tested in accordance with ASHRAE 193.

☐ **R403.3.3 Duct testing (Mandatory).** Ducts shall be pressure tested to determine air leakage by one of the following methods:

1. Rough-in test: Total leakage shall be measured with a pressure differential of 0.1 inch w.g. (25 Pa) across the system, including the manuf air handler enclosure if installed at the time of the test. All registers shall be taped or otherwise sealed during the test.
2. Postconstruction test: Total leakage shall be measured with a pressure differential of 0.1 inch w.g. (25 Pa) across the entire system, including the manufacturer's air handler enclosure. Registers shall be taped or otherwise sealed during the test.

Exceptions:

1. A duct air leakage test shall not be required where the ducts and air handlers are located entirely within the building thermal envelope.
2. Duct testing is not mandatory for buildings complying by Section 405 of this code.

A written report of the results of the test shall be signed by the party conducting the test and provided to the code official.

☐ **R403.3.5 Building cavities (Mandatory).** Building framing cavities shall not be used as ducts or plenums.

☐ **R403.4 Mechanical system piping insulation (Mandatory).** Mechanical system piping capable of carrying fluids above 105°F (41°C) or below 55°F (13°C) shall be insulated to a minimum of R-3.

☐ **R403.4.1 Protection of piping insulation.** Piping insulation exposed to weather shall be protected from damage, including that caused by sunlight, moisture, equipment maintenance and wind, and shall provide shielding from solar radiation that can cause degradation of the material. Adhesive tape shall not be permitted.

☐ **R403.5.1 Heated water circulation and temperature maintenance systems (Mandatory)**Heated water circulation systems shall be in accordance with Section R403.5.1.1. Heat trace temperature maintenance systems shall be in accordance with Section R403.5.1.2. Automatic controls, temperature sensors and pumps shall be accessible. Manual controls shall be readily accessible.

☐ **R403.5.1.1 Circulation systems.** Heated water circulation systems shall be provided with a circulation pump. The system return pipe shall be a dedicated return pipe or a cold water supply pipe. Gravity and thermosiphon circulation systems shall be prohibited. Controls for circulating hot water system pumps shall start the pump based on the identification of a demand for hot water within the occupancy. The controls shall automatically turn off the pump when the water in the circulation loop is at the desired temperature and when there is no demand for hot water.

☐ **R403.5.1.2 Heat trace systems.** Electric heat trace systems shall comply with IEEE 515.1 or UL 515. Controls for such systems shall automatically adjust the energy input to the heat tracing to maintain the desired water temperature in the piping in accordance with the times when heated water is used in the occupancy.

MANDATORY REQUIREMENTS - (Continued)

☐ **R403.5.5 Heat traps (Mandatory).** Storage water heaters not equipped with integral heat traps and having vertical pipe risers shall have heat traps installed on both the inlets and outlets. External heat traps shall consist of either a commercially available heat trap or a downward and upward bend of at least 3 ½ inches (89 mm) in the hot water distribution line and cold water line located as close as possible to the storage tank.

R403.5.6 Water heater efficiencies (Mandatory).

☐ **R403.5.6.1.1 Automatic controls.** Service water-heating systems shall be equipped with automatic temperature controls capable of adjustment from the lowest to the highest acceptable temperature settings for the intended use. The minimum temperature setting range shall be from 100°F to 140°F (38°C to 60°C).

☐ **R403.5.6.1.2 Shut down.** A separate switch or a clearly marked circuit breaker shall be provided to permit the power supplied to electric service systems to be turned off. A separate valve shall be provided to permit the energy supplied to the main burner(s) of combustion types of service water-heating systems to be turned off.

☐ **R403.5.6.2 Water-heating equipment.** Water-heating equipment installed in residential units shall meet the minimum efficiencies of Table C404.2 in Chapter 4 of the Florida Building Code, Energy Conservation, Commercial Provisions, for the type of equipment installed. Equipment used to provide heating functions as part of a combination system shall satisfy all stated requirements for the appropriate water-heating category. Solar water heaters shall meet the criteria of Section R403.5.6.2.1.

☐ **R403.5.6.2.1 Solar water-heating systems.** Solar systems for domestic hot water production are rated by the annual solar energy factor of the system. The solar energy factor of a system shall be determined from the Florida Solar Energy Center Directory of Certified Solar Systems. Solar collectors shall be tested in accordance with ISO Standard 9806, Test Methods for Solar Collectors, and SRCC Standard TM-1, Solar Domestic Hot Water System and Component Test Protocol. Collectors in installed solar water-heating systems should meet the following criteria:

1. Be installed with a tilt angle between 10 degrees and 40 degrees of the horizontal; and
2. Be installed at an orientation within 45 degrees of true south.

☐ **R403.6 Mechanical ventilation (Mandatory).** The building shall be provided with ventilation that meets the requirements of the Florida Building Code, Residential, or Florida Building Code, Mechanical, as applicable, or with other approved means of ventilation including: Natural, Infiltration or Mechanical means. Outdoor air intakes and exhausts shall have automatic or gravity dampers that close when the ventilation system is not operating.

☐ **R403.6.1 Whole-house mechanical ventilation system fan efficacy.** When installed to function as a whole-house mechanical ventilation system, fans shall meet the efficacy requirements of Table R403.6.1.

Exception: Where whole-house mechanical ventilation fans are integral to tested and listed HVAC equipment, they shall be powered by an electronically commutated motor.

☐ **R403.6.2 Ventilation air.** Residential buildings designed to be operated at a positive indoor pressure or for mechanical ventilation shall meet the following criteria:

1. The design air change per hour minimums for residential buildings in ASHRAE 62.2, Ventilation for Acceptable Indoor Air Quality, shall be the maximum rates allowed for residential applications.
2. No ventilation or air-conditioning system make-up air shall be provided to conditioned space from attics, crawlspaces, attached enclosed garages or outdoor spaces adjacent to swimming pools or spas.
3. If ventilation air is drawn from enclosed space(s), then the walls of the space(s) from which air is drawn shall be insulated to a minimum of R-11 and the ceiling shall be insulated to a minimum of R-19, space permitting, or R-10 otherwise.

R403.7 Heating and cooling equipment (Mandatory).

☐ **R403.7.1 Equipment sizing.** Heating and cooling equipment shall be sized in accordance with ACCA Manual S based on the equipment loads calculated in accordance with ACCA Manual J or other approved heating and cooling calculation methodologies, based on building loads for the directional orientation of the building. The manufacturer and model number of the outdoor and indoor units (if split system) shall be submitted along with the sensible and total cooling capacities at the design conditions described in Section R302.1. This Code does not allow designer safety factors, provisions for future expansion or other factors that affect equipment sizing. System sizing calculations shall not include loads created by local intermittent mechanical ventilation such as standard kitchen and bathroom exhaust systems. New or replacement heating and cooling equipment shall have an efficiency rating equal to or greater than the minimum required by federal law for the geographic location where the equipment is installed.

TABLE R403.6.1
WHOLE-HOUSE MECHANICAL VENTILATION SYSTEM FAN EFFICACY

FAN LOCATION	AIRFLOW RATE MINIMUM (CFM)	MINIMUM EFFICACY [a] (CFM/WATT)	AIRFLOW RATE MAXIMUM (CFM)
Range hoods	Any	2.8 cfm/watt	Any
In-line fan	Any	2.8 cfm/watt	Any
Bathroom, utility room	10	1.4 cfm/watt	<90
Bathroom, utility room	90	2.8 cfm/watt	Any

For SI: 1 cfm = 28.3 L/min. a. When tested in accordance with HVI Standard 916

MANDATORY REQUIREMENTS - (Continued)

☐ **R403.7.1.1 Cooling equipment capacity.** Cooling only equipment shall be selected so that its total capacity is not less than the calculated total load but not more than 1.15 times greater than the total load calculated according to the procedure selected in Section 403.7, or the closest available size provided by the manufacturer's product lines. The corresponding latent capacity of the equipment shall not be less than the calculated latent load.

The published value for AHRI total capacity is a nominal, rating-test value and shall not be used for equipment sizing. Manufacturer's expanded performance data shall be used to select cooling-only equipment. This selection shall be based on the outdoor design dry-bulb temperature for the load calculation (or entering water temperature for water-source equipment), the blower CFM provided by the expanded performance data, the design value for entering wet-bulb temperature and the design value for entering dry-bulb temperature.

Design values for entering wet-bulb and dry-bulb temperatures shall be for the indoor dry bulb and relative humidity used for the load calculation and shall be adjusted for return side gains if the return duct(s) is installed in an unconditioned space.

Exceptions:

1. Attached single- and multiple-family residential equipment sizing may be selected so that its cooling capacity is less than the calculated total sensible load but not less than 80 percent of that load.
2. When signed and sealed by a Florida-registered engineer, in attached single- and multiple-family units, the capacity of equipment may be sized in accordance with good design practice.

R403.7.1.2 Heating equipment capacity.

☐ **R403.7.1.2.1 Heat pumps.** Heat pump sizing shall be based on the cooling requirements as calculated according to Section R403.7.1.1, and the heat pump total cooling capacity shall not be more than 1.15 times greater than the design cooling load even if the design heating load is 1.15 times greater than the design cooling load.

☐ **R403.7.1.2.2 Electric resistance furnaces.** Electric resistance furnaces shall be sized within 4 kW of the design requirements calculated according to the procedure selected in Section R403.7.1.

☐ **R403.7.1.2.3 Fossil fuel heating equipment.** The capacity of fossil fuel heating equipment with natural draft atmospheric burners shall not be less than the design load calculated in accordance with Section R403.7.1.

☐ **R403.7.1.3 Extra capacity required for special occasions.** Residences requiring excess cooling or heating equipment capacity on an intermittent basis, such as anticipated additional loads caused by major entertainment events, shall have equipment sized or controlled to prevent continuous space cooling or heating within that space by one or more of the following options:

1. A separate cooling or heating system is utilized to provide cooling or heating to the major entertainment areas.
2. A variable capacity system sized for optimum performance during base load periods is utilized.

☐ **R403.8 Systems serving multiple dwelling units (Mandatory).** Systems serving multiple dwelling units shall comply with Sections C403 and C404 of the IECC—Commercial Provisions in lieu of Section R403.

☐ **R403.9 Snow melt and ice system controls (Mandatory)** Snow- and ice-melting systems, supplied through energy service to the building, shall include automatic controls capable of shutting off the system when the pavement temperature is above 50°F (10°C), and no precipitation is falling and an automatic or manual control that will allow shutoff when the outdoor temperature is above 40°F (4.8°C).

☐ **R403.10 Pools and permanent spa energy consumption (Mandatory).** The energy consumption of pools and permanent spas shall be in accordance with Sections R403.10.1 through R403.10.5.

☐ **R403.10.1 Heaters.** The electric power to heaters shall be controlled by a readily accessible on-off switch that is an integral part of the heater mounted on the exterior of the heater, or external to and within 3 feet (914 mm) of the heater. Operation of such switch shall not change the setting of the heater thermostat. Such switches shall be in addition to a circuit breaker for the power to the heater. Gas-fired heaters shall not be equipped with continuously burning ignition pilots.

☐ **R403.10.2 Time switches.** Time switches or other control methods that can automatically turn off and on according to a preset schedule shall be installed for heaters and pump motors. Heaters and pump motors that have built-in time switches shall be in compliance with this section.

Exceptions:

1. Where public health standards require 24-hour pump operation.
2. Pumps that operate solar- and waste-heat-recovery pool heating systems.
3. Where pumps are powered exclusively from on-site renewable generation.

☐ **R403.10.3 Covers.** Outdoor heated swimming pools and outdoor permanent spas shall be equipped with a vapor-retardant cover on or at the water surface or a liquid cover or other means proven to reduce heat loss.

Exception: Where more than 70 percent of the energy for heating, computed over an operation season, is from site-recovered energy, such as from a heat pump or solar energy source, covers or other vapor-retardant means shall not be required.

☐ **R403.10.4 Gas- and oil-fired pool and spa heaters.** All gas- and oil-fired pool and spa heaters shall have a minimum thermal efficiency of 82 percent for heaters manufactured on or after April 16, 2013, when tested in accordance with ANSI Z 21.56. Pool heaters fired by natural or LP gas shall not have continuously burning pilot lights.

☐ **R403.10.5 Heat pump pool heaters.** Heat pump pool heaters shall have a minimum COP of 4.0 when tested in accordance with AHRI 1160, Table 2, Standard Rating Conditions-Low Air Temperature. A test report from an independent laboratory is required to verify procedure compliance. Geothermal swimming pool heat pumps are not required to meet this standard.

☐ **R403.11 Portable spas (Mandatory).** The energy consumption of electric-powered portable spas shall be controlled by the requirements of APSP-14.

SECTION R404

ELECTRICAL POWER AND LIGHTING SYSTEMS

☐ **R404.1 Lighting equipment (Mandatory).** Not less than 75 percent of the lamps in permanently installed lighting fixtures shall be high-efficacy lamps or not less than 75 percent of the permanently installed lighting fixtures shall contain only high-efficacy lamps.

Exception: Low-voltage lighting.

R404.1.1 Lighting equipment (Mandatory). Fuel gas lighting systems shall not have continuously burning pilot lights.

2017 - AIR BARRIER AND INSULATION INSPECTION COMPONENT CRITERIA

TABLE 402.4.1.1
AIR BARRIER AND INSULATION INSPECTION COMPONENT CRITERIA

				CHECK
Project Name:	200001 Parnell Res	Builder Name:	Bryan Zecher	
Street:		Permit Office:		
City, State, Zip:	, FL ,	Permit Number:		
Owner:	Parnell Res	Jurisdiction:		
Design Location:	FL, Gainesville			

COMPONENT	AIR BARRIER CRITERIA	INSULATION INSTALLATION CRITERIA	CHECK
General requirements	A continuous air barrier shall be installed in the building envelope. The exterior thermal envelope contains a continuous air barrier. Breaks or joints in the air barrier shall be sealed.	Air-permeable insulation shall not be used as a sealing material.	
Ceiling/attic	The air barrier in any dropped ceiling/soffit shall be aligned with the insulation and any gaps in the air barrier shall be sealed. Access openings, drop down stairs or knee wall doors to unconditioned attic spaces shall be sealed.	The insulation in any dropped ceiling/soffit shall be aligned with the air barrier.	
Walls	The junction of the foundation and sill plate shall be sealed. The junction of the top plate and the top of exterior walls shall be sealed. Knee walls shall be sealed.	Cavities within corners and headers of frame walls shall be insulated by completely filling the cavity with a material having a thermal resistance of R-3 per inch minimum. Exterior thermal envelope insulation for framed walls shall be installed in substantial contact and continuous alignment with the air barrier.	
Windows, skylights and doors	The space between window/door jambs and framing, and skylights and framing shall be sealed.		
Rim joists	Rim joists shall include the air barrier.	Rim joists shall be insulated.	
Floors (including above-garage and cantilevered floors)	The air barrier shall be installed at any exposed edge of insulation.	Floor framing cavity insulation shall be installed to maintain permanent contact with the underside of subfloor decking, or floor framing cavity insulation shall be permitted to be in contact with the top side of sheathing, or continuous insulation installed on the underside of floor framing and extends from the bottom to the top of all perimeter floor framing members.	
Crawl space walls	Exposed earth in unvented crawl spaces shall be covered with a Class I vapor retarder with overlapping joints taped.	Where provided instead of floor insulation, insulation shall be permanently attached to the crawlspace	
Shafts, penetrations	Duct shafts, utility penetrations, and flue shafts opening to exterior or unconditioned space shall be sealed.		
Narrow cavities		Batts in narrow cavities shall be cut to fit, or narrow cavities shall be filled by insulation that on installation readily conforms to the available cavity spaces.	
Garage separation	Air sealing shall be provided between the garage and conditioned spaces.		
Recessed lighting	Recessed light fixtures installed in the building thermal envelope shall be sealed to the drywall.	Recessed light fixtures installed in the building thermal envelope shall be air tight and IC rated.	
Plumbing and wiring		Batt insulation shall be cut neatly to fit around wiring and plumbing in exterior walls, or insulation that on installation readily conforms to available space shall extend behind piping and wiring.	
Shower/tub on exterior wall	The air barrier installed at exterior walls adjacent to showers and tubs shall separate them from the showers and tubs.	Exterior walls adjacent to showers and tubs shall be insulated.	
Electrical/phone box on exterior walls	The air barrier shall be installed behind electrical or communication boxes or air-sealed boxes shall be installed.		
HVAC register boots	HVAC register boots that penetrate building thermal envelope shall be sealed to the sub-floor or drywall.		
Concealed sprinklers	When required to be sealed, concealed fire sprinklers shall only be sealed in a manner that is recommended by the manufacturer. Caulking or other adhesive sealants shall not be used to fill voids between fire sprinkler cover plates and walls or ceilings.		

a. In addition, inspection of log walls shall be in accordance with the provisions of ICC-400.

Envelope Leakage Test Report (Blower Door Test)

Residential Prescriptive, Performance or ERI Method Compliance

2017 Florida Building Code, Energy Conservation, 6th Edition

Jurisdiction:	Permit #:

Job Information

Builder:	Bryan Zecher	Community:		Lot:	NA
Address:					
City:		State:	FL	Zip:	

Air Leakage Test Results *Passing results must meet either the Performance, Prescriptive, or ERI Method*

○ **PRESCRIPTIVE METHOD**-The building or dwelling unit shall be tested and verified as having an air leakage rate of not exceeding 7 air changes per hour at a pressure of 0.2 inch w.g. (50 Pascals) in Climate Zones 1 and 2.

○ **PERFORMANCE or ERI METHOD**-The building or dwelling unit shall be tested and verified as having an air leakage rate of not exceeding the selected ACH(50) value, as shown on Form R405-2017 (Performance) or R406-2017 (ERI), section labeled as infiltration, sub-section ACH50.

ACH(50) specified on Form R405-2017-Energy Calc (Performance) or R406-2017 (ERI): 7.000

_____ x 60 + 25380 = _____
CFM(50) Building Volume ACH(50)

☐ **PASS**

☐ When ACH(50) is less than 3, Mechanical Ventilation installation must be verified by building department.

Method for calculating building volume:

○ Retrieved from architectural plans

● Code software calculated

○ Field measured and calculated

R402.4.1.2 Testing. Testing shall be conducted in accordance with ANSI/RESNET/ICC 380 and reported at a pressure of 0.2 inch w.g. (50 Pascals). Testing shall be conducted by either individuals as defined in Section 553.993(5) or (7), *Florida Statues*.or individuals licensed as set forth in Section 489.105(3)(f), (g), or (i) or an approved third party. A written report of the results of the test shall be signed by the party conducting the test and provided to the*code official.* Testing shall be performed at any time after creation of all penetrations of the *building thermal envelope.*

During testing:
1. Exterior windows and doors, fireplace and stove doors shall be closed, but not sealed, beyond the intended weatherstripping or other infiltration control measures.
2. Dampers including exhaust, intake, makeup air, back draft and flue dampers shall be closed, but not sealed beyond intended infiltration control measures.
3. Interior doors, if installed at the time of the test, shall be open.
4. Exterior doors for continuous ventilation systems and heat recovery ventilators shall be closed and sealed.
5. Heating and cooling systems, if installed at the time of the test, shall be turned off.
6. Supply and return registers, if installed at the time of the test, shall be fully open.

Testing Company

Company Name: _____ Phone: _____

I hereby verify that the above Air Leakage results are in accordance with the 2017 6th Edition Florida Building Code Energy Conservation requirements according to the compliance method selected above.

Signature of Tester: _____ Date of Test: _____

Printed Name of Tester: _____

License/Certification #: _____ Issuing Authority: _____

Residential System Sizing Calculation

Summary

Parnell Res

Project Title:
200001 Parnell Res

, FL

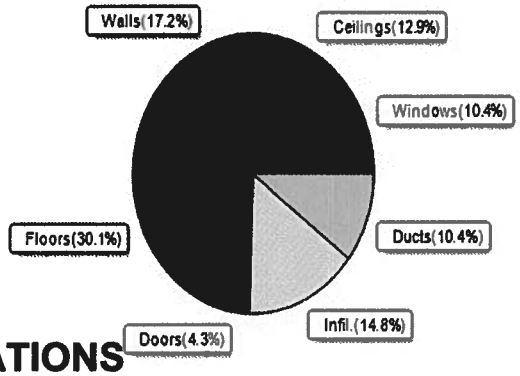
2020-01-03

Location for weather data: Gainesville, FL - Defaults: Latitude(29.7) Altitude(152 ft.) Temp Range(M)					
Humidity data: Interior RH (50%) Outdoor wet bulb (77F) Humidity difference(51gr.)					
Winter design temperature(TMY3 99%)	30	F	Summer design temperature(TMY3 99%)	94	F
Winter setpoint	70	F	Summer setpoint	75	F
Winter temperature difference	40	F	Summer temperature difference	19	F
Total heating load calculation	**36739**	**Btuh**	**Total cooling load calculation**	**30188**	**Btuh**
Submitted heating capacity	% of calc	Btuh	Submitted cooling capacity	% of calc	Btuh
Total (Electric Heat Pump)	117.0	43000	Sensible (SHR = 0.75)	134.8	32250
Heat Pump + Auxiliary(0.0kW)	117.0	43000	Latent	171.4	10750
			Total (Electric Heat Pump)	142.4	43000

WINTER CALCULATIONS

Winter Heating Load (for 2538 sqft)

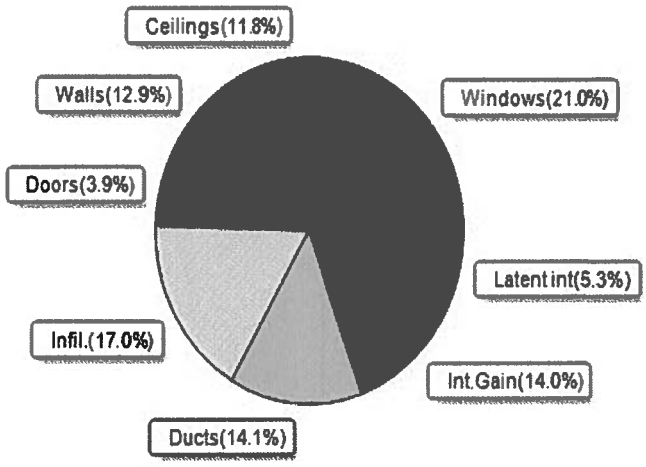
Load component			Load	
Window total	318	sqft	3820	Btuh
Wall total	1782	sqft	6325	Btuh
Door total	98	sqft	1568	Btuh
Ceiling total	2711	sqft	4735	Btuh
Floor total	2538	sqft	11045	Btuh
Infiltration	124	cfm	5423	Btuh
Duct loss			3823	Btuh
Subtotal			**36739**	**Btuh**
Ventilation	0	cfm	0	Btuh
TOTAL HEAT LOSS			**36739**	**Btuh**



SUMMER CALCULATIONS

Summer Cooling Load (for 2538 sqft)

Load component			Load	
Window total	318	sqft	6327	Btuh
Wall total	1782	sqft	3904	Btuh
Door total	98	sqft	1176	Btuh
Ceiling total	2711	sqft	3552	Btuh
Floor total			0	Btuh
Infiltration	93	cfm	1932	Btuh
Internal gain			4240	Btuh
Duct gain			2786	Btuh
Sens. Ventilation	0	cfm	0	Btuh
Blower Load			0	Btuh
Total sensible gain			**23916**	**Btuh**
Latent gain(ducts)			1467	Btuh
Latent gain(infiltration)			3205	Btuh
Latent gain(ventilation)			0	Btuh
Latent gain(internal/occupants/other)			1600	Btuh
Total latent gain			**6272**	**Btuh**
TOTAL HEAT GAIN			**30188**	**Btuh**



8th Edition

EnergyGauge® System Sizing
PREPARED BY: Evan Beamsley
DATE: 2020-01-03

System Sizing Calculations - Winter

Residential Load - Whole House Component Details

Parnell Res

, FL

Project Title:
200001 Parnell Res
Building Type: User

2020-01-03

Reference City: Gainesville, FL (Defaults) Winter Temperature Difference: 40.0 F (TMY3 99%)
This calculation is for Worst Case. The house has been rotated 270 degrees.

Component Loads for Whole House

Window	Panes/Type	Frame	U	Orientation	Area(sqft) X	HTM=	Load
1	2, NFRC 0.20	Metal	0.30	W	36.0	12.0	432 Btuh
2	2, NFRC 0.20	Metal	0.30	NW	13.3	12.0	160 Btuh
3	2, NFRC 0.20	Metal	0.30	W	108.0	12.0	1296 Btuh
4	2, NFRC 0.20	Metal	0.30	W	36.0	12.0	432 Btuh
5	2, NFRC 0.20	Metal	0.30	N	15.0	12.0	180 Btuh
6	2, NFRC 0.20	Metal	0.30	N	6.0	12.0	72 Btuh
7	2, NFRC 0.20	Metal	0.30	E	4.0	12.0	48 Btuh
8	2, NFRC 0.20	Metal	0.30	E	15.0	12.0	180 Btuh
9	2, NFRC 0.20	Metal	0.30	E	32.0	12.0	384 Btuh
10	2, NFRC 0.20	Metal	0.30	E	15.0	12.0	180 Btuh
11	2, NFRC 0.20	Metal	0.30	S	30.0	12.0	360 Btuh
12	2, NFRC 0.20	Metal	0.30	S	4.0	12.0	48 Btuh
13	2, NFRC 0.20	Metal	0.30	S	4.0	12.0	48 Btuh
	Window Total				318.3(sqft)		3820 Btuh

Walls	Type	Ornt.	Ueff.	R-Value (Cav/Sh)	Area X	HTM=	Load
1	Frame - Wood	- Ext	(0.089)	13.0/0.0	90	3.55	320 Btuh
2	Frame - Wood	- Ext	(0.089)	13.0/0.0	35	3.55	122 Btuh
3	Frame - Wood	- Ext	(0.089)	13.0/0.0	30	3.55	105 Btuh
4	Frame - Wood	- Ext	(0.089)	13.0/0.0	121	3.55	430 Btuh
5	Frame - Wood	- Ext	(0.089)	13.0/0.0	130	3.55	462 Btuh
6	Frame - Wood	- Ext	(0.089)	13.0/0.0	83	3.55	293 Btuh
7	Frame - Wood	- Ext	(0.089)	13.0/0.0	300	3.55	1065 Btuh
8	Frame - Wood	- Ext	(0.089)	13.0/0.0	116	3.55	412 Btuh
9	Frame - Wood	- Ext	(0.089)	13.0/0.0	42	3.55	149 Btuh
10	Frame - Wood	- Ext	(0.089)	13.0/0.0	40	3.55	142 Btuh
11	Frame - Wood	- Ext	(0.089)	13.0/0.0	77	3.55	272 Btuh
12	Frame - Wood	- Adj	(0.089)	13.0/0.0	48	3.55	169 Btuh
13	Frame - Wood	- Adj	(0.089)	13.0/0.0	32	3.55	112 Btuh
14	Frame - Wood	- Adj	(0.089)	13.0/0.0	144	3.55	511 Btuh
15	Frame - Wood	- Ext	(0.089)	13.0/0.0	259	3.55	918 Btuh
16	Frame - Wood	- Ext	(0.089)	13.0/0.0	20	3.55	69 Btuh
17	Frame - Wood	- Ext	(0.089)	13.0/0.0	50	3.55	178 Btuh
18	Frame - Wood	- Ext	(0.089)	13.0/0.0	20	3.55	69 Btuh
19	Frame - Wood	- Ext	(0.089)	13.0/0.0	149	3.55	527 Btuh
	Wall Total				1782(sqft)		6325 Btuh

Doors	Type	Storm	Ueff.	Area X	HTM=	Load
1	Insulated - Exterior,	n	(0.400)	8	16.0	128 Btuh
2	Insulated - Exterior,	n	(0.400)	54	16.0	864 Btuh
3	Insulated - Garage,	n	(0.400)	20	16.0	320 Btuh
4	Insulated - Exterior,	n	(0.400)	16	16.0	256 Btuh
	Door Total			98(sqft)		1568Btuh

Manual J Winter Calculations

Residential Load - Component Details (continued)

Parnell Res
, FL

Project Title:
200001 Parnell Res
Building Type: User

2020-01-03

Ceilings	Type/Color/Surface	Ueff.	R-Value	Area X	HTM=	Load
1	Unvent Attic/D/Shing	(0.044)	0.0/22.0	2711	1.7	4735 Btuh
	Ceiling Total			2711(sqft)		4735Btuh
Floors	Type	Ueff.	R-Value	Size X	HTM=	Load
1	Slab On Grade	(1.180)	0.0	234.0 ft(perim.)	47.2	11045 Btuh
	Floor Total			2538 sqft		11045 Btuh
				Envelope Subtotal:		27493 Btuh
Infiltration	Type	Wholehouse ACH	Volume(cuft)	Wall Ratio	CFM=	
	Natural	0.29	25380	1.00	123.8	5423 Btuh
Duct load	Average sealed, R6.0, Supply(Att), Return(Att)			(DLM of 0.116)		3823 Btuh
All Zones			**Sensible Subtotal All Zones**			**36739 Btuh**

WHOLE HOUSE TOTALS

Totals for Heating	Subtotal Sensible Heat Loss	36739 Btuh
	Ventilation Sensible Heat Loss	0 Btuh
	Total Heat Loss	36739 Btuh

EQUIPMENT

1. Electric Heat Pump	#	43000 Btuh

Key: Window types - NFRC (Requires U-Factor and Shading coefficient(SHGC) of glass as numerical values)
or - Glass as 'Clear' or 'Tint' (Uses U-Factor and SHGC defaults)
U - (Window U-Factor)
HTM - (ManualJ Heat Transfer Multiplier)

Version 8

System Sizing Calculations - Summer

Residential Load - Whole House Component Details

Parnell Res

Project Title:
200001 Parnell Res

, FL

2020-01-03

Reference City: Gainesville, FL Temperature Difference: 19.0F(TMY3 99%) Humidity difference: 51gr.
This calculation is for Worst Case. The house has been rotated 270 degrees.

Component Loads for Whole House

Window	Type* Panes	SHGC	U	InSh	IS	Ornt	Overhang Len	Hgt	Window Area(sqft) Gross	Shaded	Unshaded	HTM Shaded	Unshaded	Load
1	2 NFRC	0.20, 0.30		No	No	W	1.5ft.	1.0ft.	36.0	1.5	34.5	10	25	877 Btuh
2	2 NFRC	0.20, 0.30		No	No	NW	24.0f	2.0ft.	13.3	0.0	13.3	10	19	255 Btuh
3	2 NFRC	0.20, 0.30		No	No	W	15.7f	0.0ft.	108.0	108.0	0.0	10	25	1070 Btuh
4	2 NFRC	0.20, 0.30		No	No	W	1.5ft.	1.0ft.	36.0	1.5	34.5	10	25	877 Btuh
5	2 NFRC	0.20, 0.30		No	No	N	1.5ft.	1.0ft.	15.0	0.0	15.0	10	10	149 Btuh
6	2 NFRC	0.20, 0.30		No	No	N	1.5ft.	1.0ft.	6.0	0.0	6.0	10	10	59 Btuh
7	2 NFRC	0.20, 0.30		No	No	E	1.5ft.	1.0ft.	4.0	0.5	3.5	10	25	93 Btuh
8	2 NFRC	0.20, 0.30		No	No	E	1.5ft.	1.0ft.	15.0	0.7	14.3	10	25	364 Btuh
9	2 NFRC	0.20, 0.30		No	No	E	8.8ft.	1.0ft.	32.0	25.3	6.7	10	25	418 Btuh
10	2 NFRC	0.20, 0.30		No	No	E	6.5ft.	1.2ft.	15.0	12.7	2.3	10	25	184 Btuh
11	2 NFRC	0.20, 0.30		No	No	S	1.5ft.	1.0ft.	30.0	30.0	0.0	10	11	297 Btuh
12	2 NFRC	0.20, 0.30		No	No	S	1.5ft.	1.0ft.	4.0	4.0	0.0	10	11	40 Btuh
13	2 NFRC	0.20, 0.30		No	No	S	1.5ft.	1.0ft.	4.0	4.0	0.0	10	11	40 Btuh
	Excursion													1606 Btuh
	Window Total								318 (sqft)					6327 Btuh

Walls	Type	U-Value	R-Value Cav/Sheath	Area(sqft)	HTM	Load
1	Frame - Wood - Ext	0.09	13.0/0.0	90.0	2.3	204 Btuh
2	Frame - Wood - Ext	0.09	13.0/0.0	34.5	2.3	78 Btuh
3	Frame - Wood - Ext	0.09	13.0/0.0	29.7	2.3	67 Btuh
4	Frame - Wood - Ext	0.09	13.0/0.0	121.3	2.3	274 Btuh
5	Frame - Wood - Ext	0.09	13.0/0.0	130.2	2.3	295 Btuh
6	Frame - Wood - Ext	0.09	13.0/0.0	82.5	2.3	187 Btuh
7	Frame - Wood - Ext	0.09	13.0/0.0	300.0	2.3	679 Btuh
8	Frame - Wood - Ext	0.09	13.0/0.0	116.0	2.3	263 Btuh
9	Frame - Wood - Ext	0.09	13.0/0.0	42.0	2.3	95 Btuh
10	Frame - Wood - Ext	0.09	13.0/0.0	40.0	2.3	91 Btuh
11	Frame - Wood - Ext	0.09	13.0/0.0	76.5	2.3	173 Btuh
12	Frame - Wood - Adj	0.09	13.0/0.0	47.5	1.7	80 Btuh
13	Frame - Wood - Adj	0.09	13.0/0.0	31.5	1.7	53 Btuh
14	Frame - Wood - Adj	0.09	13.0/0.0	144.0	1.7	243 Btuh
15	Frame - Wood - Ext	0.09	13.0/0.0	258.5	2.3	585 Btuh
16	Frame - Wood - Ext	0.09	13.0/0.0	19.5	2.3	44 Btuh
17	Frame - Wood - Ext	0.09	13.0/0.0	50.0	2.3	113 Btuh
18	Frame - Wood - Ext	0.09	13.0/0.0	19.5	2.3	44 Btuh
19	Frame - Wood - Ext	0.09	13.0/0.0	148.5	2.3	336 Btuh
	Wall Total			1782 (sqft)		3904 Btuh

Doors	Type	Area (sqft)	HTM	Load
1	Insulated - Exterior	8.0	12.0	96 Btuh
2	Insulated - Exterior	54.0	12.0	648 Btuh
3	Insulated - Garage	20.0	12.0	240 Btuh
4	Insulated - Exterior	16.0	12.0	192 Btuh
	Door Total	98 (sqft)		1176 Btuh

Ceilings	Type/Color/Surface	U-Value	R-Value	Area(sqft)	HTM	Load
1	Unvented Attic/DarkShingle	0.044	0.0/22.0	2711.0	1.31	3552 Btuh
	Ceiling Total			2711 (sqft)		3552 Btuh

Manual J Summer Calculations

Residential Load - Component Details (continued)

Parnell Res
, FL

Project Title: 200001 Parnell Res
Climate:FL_GAINESVILLE_REGIONAL_A

2020-01-03

Floors	Type	R-Value	Size	HTM	Load
1	Slab On Grade	0.0	2538 (ft-perimeter)	0.0	0 Btuh
	Floor Total		2538.0 (sqft)		0 Btuh
			Envelope Subtotal:		14958 Btuh

Infiltration	Type	Average ACH	Volume(cuft)	Wall Ratio	CFM=	Load
	Natural	0.22	25380	1	92.9	1932 Btuh
Internal gain		Occupants	Btuh/occupant		Appliance	Load
		8	X 230	+	2400	4240 Btuh
				Sensible Envelope Load:		21130 Btuh
Duct load	Average sealed, Supply(R6.0-Attic), Return(R6.0-Attic)			(DGM of 0.132)		2786 Btuh
				Sensible Load All Zones		**23916 Btuh**

Manual J Summer Calculations

Residential Load - Component Details (continued)

Parnell Res
, FL

Project Title: 200001 Parnell Res
Climate:FL_GAINESVILLE_REGIONAL_A

2020-01-03

WHOLE HOUSE TOTALS

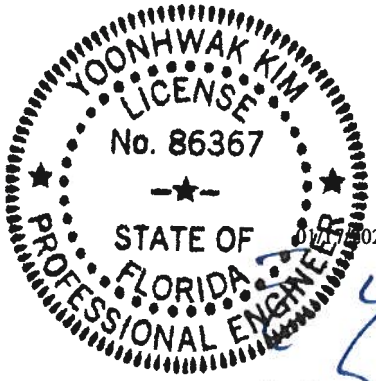
Whole House Totals for Cooling	**Sensible Envelope Load All Zones**	**21130 Btuh**
	Sensible Duct Load	2786 Btuh
	Total Sensible Zone Loads	**23916 Btuh**
	Sensible ventilation	0 Btuh
	Blower	0 Btuh
	Total sensible gain	**23916 Btuh**
	Latent infiltration gain (for 51 gr. humidity difference)	3205 Btuh
	Latent ventilation gain	0 Btuh
	Latent duct gain	1467 Btuh
	Latent occupant gain (8.0 people @ 200 Btuh per person)	1600 Btuh
	Latent other gain	0 Btuh
	Latent total gain	**6272 Btuh**
	TOTAL GAIN	**30188 Btuh**

EQUIPMENT

1. Central Unit	#	43000 Btuh

*Key: Window types (Panes - Number and type of panes of glass)
(SHGC - Shading coefficient of glass as SHGC numerical value)
(U - Window U-Factor)
(InSh - Interior shading device: none(No), Blinds(B), Draperies(D) or Roller Shades(R))
- For Blinds: Assume medium color, half closed
For Draperies: Assume medium weave, half closed
For Roller shades: Assume translucent, half closed
(IS - Insect screen: none(N), Full(F) or Half(½))
(Ornt - compass orientation)

Version 8



1/17/2020

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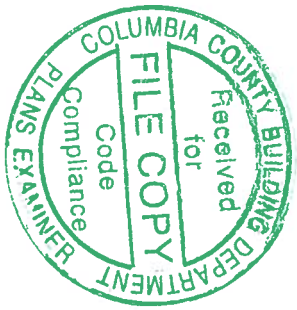
ALPINE
AN ITW COMPANY

FL REG# 278, Yoonhwak Kim, FL PE #86367

Alpine, an ITW Company
6750 Forum Drive, Suite 305
Orlando, FL 32821
Phone: (800)755-6001
www.alpineitw.com



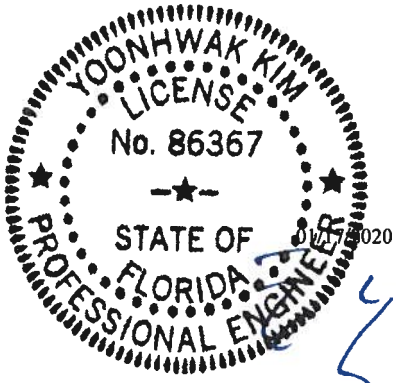
Site Information:	Page 1:
Customer: W. B. Howland Company, Inc.	*Job Number:* 19-3769
Job Description: /Parnell /ZECHER CONSTRUCTION	
Address:	

Job Engineering Criteria:	
Design Code: FBC 2017 RES	*IntelliVIEW Version:* 18.02.01B *JRef #:* 1WRZ2150004
Wind Standard: ASCE 7-10 *Wind Speed (mph):* 130 *Building Type:* Closed	*Roof Load (psf):* 20.00-10.00- 0.00-10.00 *Floor Load (psf):* None

This package contains general notes pages, 67 truss drawing(s) and 6 detail(s).

Item	Drawing Number	Truss
1	017.20.1126.19865	A01
3	017.20.1126.19694	A03
5	017.20.1126.19693	A05
7	017.20.1126.19787	A07
9	017.20.1126.19926	A09
11	017.20.1126.19631	A11
13	017.20.1126.18680	A8A
15	017.20.1126.19366	B02
17	017.20.1126.19568	B04
19	017.20.1126.19131	C02
21	017.20.1126.18725	C04
23	017.20.1126.19226	D02
25	017.20.1126.19396	D04
27	017.20.1126.19256	G01
29	017.20.1126.18944	G03
31	017.20.1126.18648	G05
33	017.20.1126.18898	H01
35	017.20.1126.19507	J01
37	017.20.1126.19225	J03
39	017.20.1126.19070	J05
41	017.20.1126.18758	J07
43	017.20.1126.18726	J09
45	017.20.1126.18585	J11
47	017.20.1126.18804	J13
49	017.20.1126.18803	J15
51	017.20.1126.19069	J18

Item	Drawing Number	Truss
2	017.20.1126.19757	A02
4	017.20.1126.19786	A04
6	017.20.1126.19755	A06
8	017.20.1126.19709	A08
10	017.20.1126.19692	A10
12	017.20.1126.19552	A12
14	017.20.1126.19506	B01
16	017.20.1126.19146	B03
18	017.20.1126.18555	C01
20	017.20.1126.19600	C03
22	017.20.1126.19477	D01
24	017.20.1126.19476	D03
26	017.20.1129.59417	D05
28	017.20.1126.19178	G02
30	017.20.1126.18897	G04
32	017.20.1126.18835	G06
34	017.20.1126.19085	H02
36	017.20.1126.19615	J02
38	017.20.1126.18679	J04
40	017.20.1126.19319	J06
42	017.20.1126.18913	J08
44	017.20.1126.19194	J10
46	017.20.1126.19522	J12
48	017.20.1126.18899	J14
50	017.20.1126.19320	J16
52	017.20.1126.19100	J19



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Site Information:	Page 2:
Customer: W. B. Howland Company, Inc.	*Job Number:* 19-3769
Job Description: /Parnell /ZECHER CONSTRUCTION	
Address:	

Item	Drawing Number	Truss
53	017.20.1126.18929	J1A
55	017.20.1126.19288	J1C
57	017.20.1126.18756	J21
59	017.20.1126.19380	J23
61	017.20.1126.19054	K01
63	017.20.1126.18975	M01
65	017.20.1126.19850	P02
67	017.20.1126.19801	P04
69	A14030ENC101014	
71	GBLLETIN0118	
73	CNNAILSP1014	

Item	Drawing Number	Truss
54	017.20.1126.19038	J1B
56	017.20.1126.19475	J20
58	017.20.1126.19273	J22
60	017.20.1126.18695	J24
62	017.20.1126.19272	K02
64	017.20.1126.19849	P01
66	017.20.1126.19662	P03
68	A14015ENC101014	
70	BRCLBSUB0119	
72	PB160101014	

General Notes

Truss Design Engineer Scope of Work, Design Assumptions and Design Responsibilities:
The design responsibilities assumed in the preparation of these design drawings are those specified in ANSI/TPI 1, Chapter 2; and the National Design Standard for Metal Plate Connected Wood Truss Construction, by the Truss Plate Institute. The truss component designs conform to the applicable provisions of ANSI/TPI 1 and NDS, the National Design Specification for Wood Construction by AF&PA. The truss component designs are based on the specified loading and dimension information furnished by others to the Truss Design Engineer. The Truss Design Engineer has no duty to independently verify the accuracy or completeness of the information provided by others and may rely on that information without liability. The responsibility for verification of that information remains with others neither employed nor controlled by the Truss Design Engineer. The Truss Design Engineer's seal and signature on the attached drawings, or cover page listing these drawings, indicates acceptance of professional engineering responsibility solely for the truss component designs and not for the technical information furnished by others which technical information and consequences thereof remain their sole responsibility.

The suitability and use of these drawings for any particular structure is the responsibility of the Building Designer in accordance with ANSI/TPI 1 Chapter 2. The Building Designer is responsible for determining that the dimensions and loads for each truss component match those required by the plans and by the actual use of the individual component, and for ascertaining that the loads shown on the drawings meet or exceed applicable building code requirements and any additional factors required in the particular application. Truss components using metal connector plates with integral teeth shall not be placed in environments that will cause the moisture content of the wood in which plates are embedded to exceed 19% and/or cause corrosion of connector plates and other metal fasteners.

The Truss Design Engineer shall not be responsible for items beyond the specific scope of the agreed contracted work set forth herein, including but not limited to: verifying the dimensions of the truss component, calculation of any of the truss component design loads, inspection of the truss components before or after installation, the design of temporary or permanent bracing and their attachment required in the roof and/or floor systems, the design of diaphragms or shear walls, the design of load transfer connections to and from diaphragms and shear walls, the design of load transfer to the foundation, the design of connections for truss components to their bearing supports, the design of the bearing supports, installation of the truss components, observation of the truss component installation process, review of truss assembly procedures, sequencing of the truss component installation, construction means and methods, site and/or worker safety in the installation of the truss components and/or its connections.

This document may be a high quality facsimile of the original engineering document which is a digitally signed electronic file with third party authentication. A wet or embossed seal copy of this engineering document is available upon request.

Temporary Lateral Restraint and Bracing:
Temporary lateral restraint and diagonal bracing shall be installed according to the provisions of BCSI chapters B1, B2, B7 and/or B10 (Building Component Safety Information, by TPI and SBCA), or as specified by the Building Designer or other Registered Design Professional. The required locations for lateral restraint and/or bracing depicted on these drawings are only for the permanent lateral support of the truss members to reduce buckling lengths, and do not apply to and may not be relied upon for the temporary stability of the truss components during their installation.

Permanent Lateral Restraint and Bracing:
The required locations for lateral restraint or bracing depicted on these drawings are for the permanent lateral support of the truss members to reduce buckling lengths. Permanent lateral support shall be installed according to the provisions of BCSI chapters B3, B7 and/or B10, or as specified by the Building Designer or other Registered Design Professional. These drawings do not depict or specify installation/erection bracing, wind bracing, portal bracing or similar building stability bracing which are parts of the overall building design to be specified, designed and detailed by the Building Designer.

Connector Plate Information:
Alpine connector plates are made of ASTM A653 or ASTM A1063 galvanized steel with the following designations, gauges and grades: W=Wave, 20ga, grade 40; H=High Strength, 20ga, grade 60; S=Super Strength, 18ga, grade 60. Information on model code compliance is contained in the ICC Evaluation Service report ESR-1118, available on-line at www.icc-es.org.

General Notes (continued)

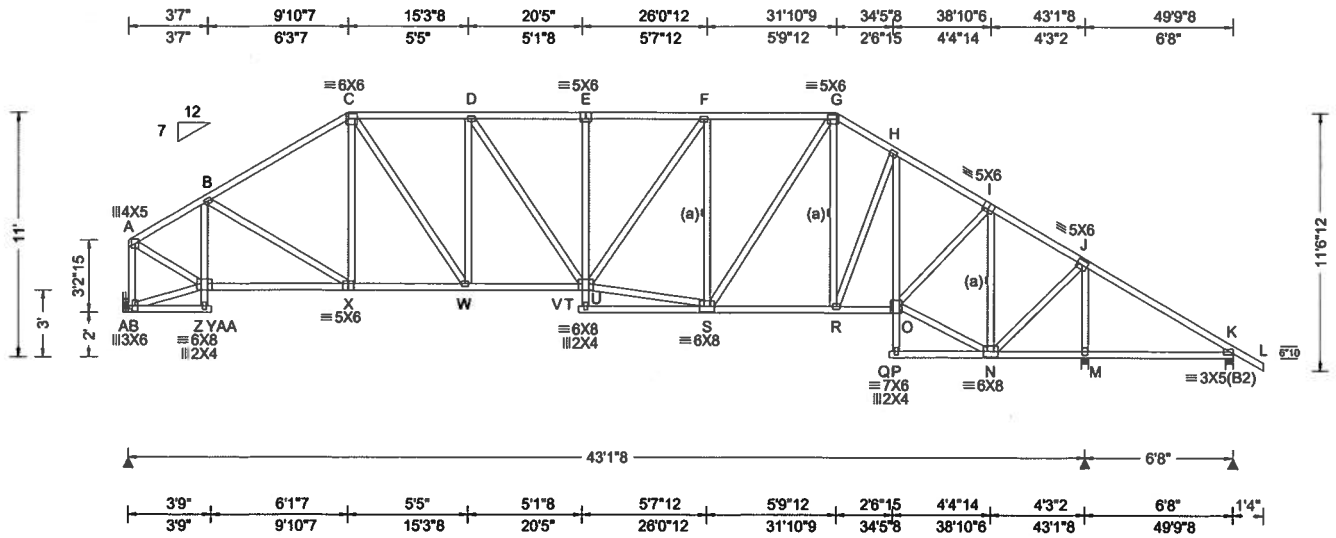
Key to Terms:
Information provided on drawings reflects a summary of the pertinent information required for the truss design. Detailed information on load cases, reactions, member lengths, forces and members requiring permanent lateral support may be found in calculation sheets available upon written request.

BCDL = Bottom Chord standard design Dead Load in pounds per square foot.
BCLL = Bottom Chord standard design Live Load in pounds per square foot.
Des Ld = total of TCLL, TCDL, BCLL and BCDL Design Load in pounds per square foot.
HORZ(LL) = maximum Horizontal panel point deflection due to Live Load, in inches.
HORZ(TL) = maximum Horizontal panel point long term deflection in inches, due to Total Load, including creep adjustment.
HPL = additional Horizontal Load added to a truss Piece in pounds per linear foot or pounds.
L/# = user specified divisor for limiting span/deflection ratio for evaluation of actual L/defl value.
L/defl = ratio of Length between bearings, in inches, divided by the immediate vertical Deflection, in inches, at the referenced panel point. Reported as 999 if greater than or equal to 999.
Loc = Location, starting location of left end of bearing or panel point (joint) location of deflection.
Max BC CSI = Maximum bending and axial Combined Stress Index for Bottom Chords for of all load cases.
Max TC CSI = Maximum bending and axial Combined Stress Index for Top Chords for of all load cases.
Max Web CSI= Maximum bending and axial Combined Stress Index for Webs for of all load cases.
NCBCLL = Non-Concurrent Bottom Chord design Live Load in pounds per square foot.
PL = additional Load applied at a user specified angle on a truss Piece in pounds per linear foot or pounds.
PLB = additional vertical load added to a Bottom chord Piece of a truss in pounds per linear foot or pounds
PLT = additional vertical load added to a Top chord Piece of a truss in pounds per linear foot or pounds.
PP = Panel Point.
R = maximum downward design Reaction, in pounds, from all specified gravity load cases, at the indicated location (Loc).
-R = maximum upward design Reaction, in pounds, from all specified gravity load cases, at the identified location (Loc).
Rh = maximum horizontal design Reaction in either direction, in pounds, from all specified gravity load cases, at the indicated location (Loc).
RL = maximum horizontal design Reaction in either direction, in pounds, from all specified non-gravity (wind or seismic) load cases, at the indicated location (Loc).
Rw = maximum downward design Reaction, in pounds, from all specified non-gravity (wind or seismic) load cases, at the identified location (Loc).
TCDL = Top Chord standard design Dead Load in pounds per square foot.
TCLL = Top Chord standard design Live Load in pounds per square foot.
U = maximum Upward design reaction, in pounds, from all specified non-gravity (wind or seismic) load cases, at the indicated location (Loc).
VERT(CL) = maximum Vertical panel point deflection in inches due to Live Load and Creep Component of Dead Load in inches.
VERT(LL) = maximum Vertical panel point deflection in inches due to Live Load.
VERT(TL) = maximum Vertical panel point long term deflection in inches due to Total load, including creep adjustment.
W = Width of non-hanger bearing, in inches.

Refer to ASCE-7 for Wind and Seismic abbreviations.
Uppercase Acronyms not explained above are as defined in TPI 1.

References:
1. AF&PA: American Forest & Paper Association, 1111 19th Street, NW, Suite 800, Washington, DC 20036; www.afandpa.org.
2. ICC: International Code Council; www.iccsafe.org.
3. Alpine, a division of ITW Building Components Group Inc.: 13723 Riverport Drive, Suite 200, Maryland Heights, MO 63043; www.alpineitw.com.
4. TPI: Truss Plate Institute, 218 North Lee Street, Suite 312, Alexandria, VA 22314; www.tpinst.org.
5. SBCA: Wood Truss Council of America, 6300 Enterprise Lane, Madison, WI 53719; www.sbcindustry.co

SEQN: 299568 / HIPS FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A01	Cust: R 215 JRef: 1WRZ2150004 T42 / DrwNo: 017.20.1126.19865 / YK 01/17/2020



Loading Criteria (psf)	Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria
TCLL: 20.00 TCDL: 10.00 BCLL: 0.00 BCDL: 10.00 Des Ld: 40.00 NCBCLL: 0.00 Soffit: 2.00 Load Duration: 1.25 Spacing: 24.0 "	Wind Std: ASCE 7-10 Speed: 130 mph Enclosure: Closed Risk Category: II EXP: C Kzt: NA Mean Height: 15.00 ft TCDL: 5.0 psf BCDL: 5.0 psf MWFRS Parallel Dist: h/2 to h C&C Dist a: 4.98 ft Loc. from endwall: not in 13.00 ft GCpi: 0.18 Wind Duration: 1.60	Pg: NA Ct: NA CAT: NA Pf: NA Ce: NA Lu: NA Cs: NA Snow Duration: NA **Code / Misc Criteria** Bldg Code: FBC 2017 RES TPI Std: 2014 Rep Fac: Yes FT/RT:20(0)/10(0) Plate Type(s): WAVE	PP Deflection in loc L/defl L/# VERT(LL): 0.148 E 999 240 VERT(CL): 0.305 E 999 240 HORZ(LL): 0.086 N - - HORZ(TL): 0.178 N - - Creep Factor: 2.0 Max TC CSI: 0.773 Max BC CSI: 0.593 Max Web CSI: 0.825 VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

Loc	Gravity R+	Gravity / R-	Gravity / Rh	Non-Gravity / Rw	Non-Gravity / U	Non-Gravity / RL
AB	1743	/-	/-	/972	/311	/265
M	2433	/-	/-	/1377	/384	/-
K	54	/-	/-	/150	/103	/-

Wind reactions based on MWFRS
AB Brg Width = - Min Req = -
M Brg Width = 4.0 Min Req = 2.5
K Brg Width = 4.0 Min Req = 1.5
Bearings M & K are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	420	-1767	F - G	650	-2000
B - C	593	-2118	G - H	599	-1829
C - D	676	-2207	H - I	541	-1831
D - E	728	-2431	I - J	350	-967
E - F	727	-2426	J - K	619	-85

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
Z - X	1516	-200	R - O	1532	-205
X - W	1741	-195	N - M	141	-390
W - T	2232	-328	M - K	150	-429
S - R	1548	-182			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AB	398	-1705	F - S	251	-960
A - Z	1681	-367	S - G	811	-210
Z - B	235	-643	O - I	1101	-157
C - W	824	-220	O - N	850	-106
W - D	208	-628	I - N	286	-1470
T - F	710	-127	N - J	1616	-307
T - S	2014	-295	J - M	533	-2257

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 3X4 except as noted.

Wind

Wind loads based on MWFRS with additional C&C member design.

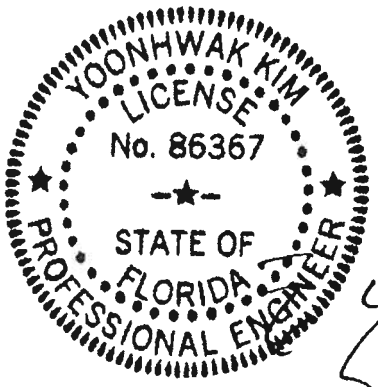
Left end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss excluding overhang is 9-0-0.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

****WARNING**** READ AND FOLLOW ALL NOTES ON THIS DRAWING!
****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

Trusses require extreme care in fabricating, handling, shipping, installing and bracing. Refer to and follow the latest edition of BCSI (Building Component Safety Information, by TPI and SBCA) for safety practices prior to performing these functions. Installers shall provide temporary bracing per BCSI. Unless noted otherwise,top chord shall have properly attached structural sheathing and bottom chord shall have a properly attached rigid ceiling. Locations shown for permanent lateral restraint of webs shall have bracing installed per BCSI sections B3, B7, or B10, as applicable. Apply plates to each face of truss and position as shown above and on the Joint Details, unless noted otherwise. Refer to drawings 160A-Z for standard plate positions.

Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
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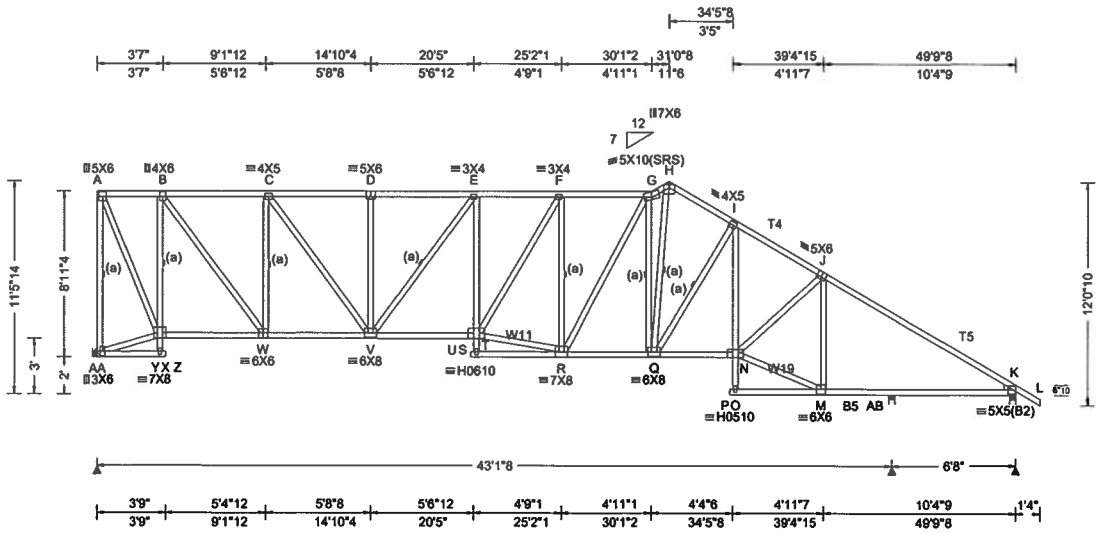
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573045 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** A02	Cust: R 215 JRef: 1WRZ2150004 T43 / DrwNo: 017.20.1126.19757 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.303	F	999	240
VERT(CL): 0.631	F	820	240
HORZ(LL): 0.143	M	-	-
HORZ(TL): 0.308	M	-	-

Creep Factor: 2.0
Max TC CSI: 0.708
Max BC CSI: 0.820
Max Web CSI: 0.957

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AA	2033	/-	/-	/1056	/349	/228
AB	314	/-	/-	/225	/2	/-
K	1952	/-	/-	/1165	/193	/-

Wind reactions based on MWFRS
AA Brg Width = - Min Req = -
AB Brg Width = 4.0 Min Req = 1.5
K Brg Width = 4.0 Min Req = 1.6
Bearings AB & K are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	187	-885	F - G	780	-2892
B - C	474	-1975	G - H	827	-2977
C - D	687	-2778	H - I	769	-2887
D - E	687	-2778	I - J	870	-3545
E - F	812	-3240	J - K	715	-3075

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
Y - W	921	-46	R - Q	2725	-398
W - V	2028	-138	Q - N	2954	-471
V - S	3241	-461	M - K	5007	-950

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AA	444	-1993	S - R	2944	-435
A - Y	2111	-446	F - R	186	-907
AA- Y	397	-150	G - Q	499	-1701
Y - B	541	-1815	Q - H	2486	-668
B - W	1827	-485	Q - I	267	-913
W - C	410	-1396	I - N	972	-232
C - V	1274	-338	N - M	2715	-515
V - E	213	-784	N - J	690	-13
S - F	653	-69	M - J	266	-1218

Lumber

Top chord: 2x4 SP #2; T4,T5 2x4 SP M-31;
Bot chord: 2x4 SP #2; B5 2x4 SP M-31;
Webs: 2x4 SP #3; W11,W19 2x4 SP #2;
Rt Wedge: 2x4 SP #3;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 2X4 except as noted.

Wind

Wind loads based on MWFRS with additional C&C member design.

Left end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss excluding overhang is 9-5-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

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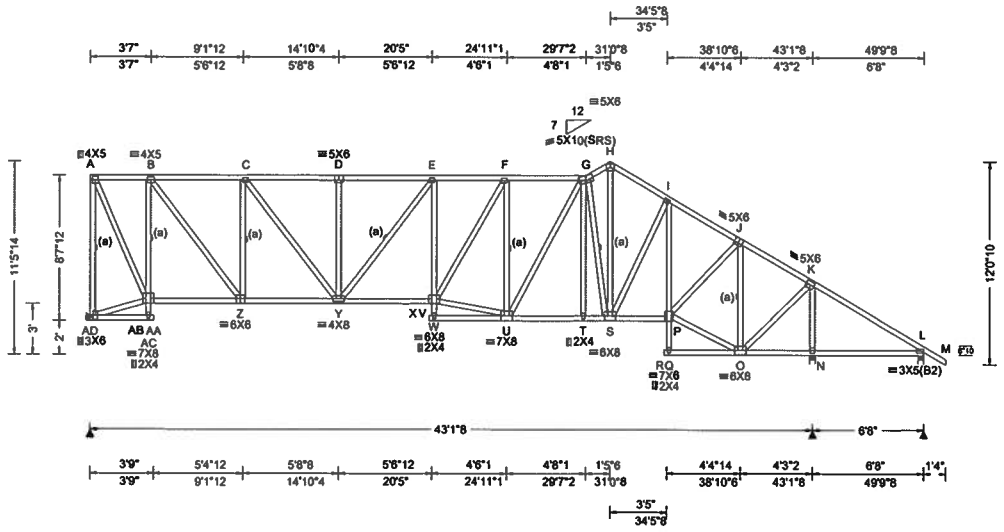
Suite 305
Orlando FL, 32821

SEQN: 573049 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** A03	Cust: R 215 JRef: 1WRZ2150004 T14 / DrwNo: 017.20.1126.19694 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.181	X	999	240
VERT(CL): 0.371	X	999	240
HORZ(LL): 0.090	O	-	-
HORZ(TL): 0.187	O	-	-

Creep Factor: 2.0
Max TC CSI: 0.867
Max BC CSI: 0.711
Max Web CSI: 0.887

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AD	1719	/-	/-	/885	/311	/230
N	2614	/-	/-	/1506	/247	/-
L	183	/-351	/-	/112	/157	/-

Wind reactions based on MWFRS
AD Brg Width = - Min Req = -
N Brg Width = 4.0 Min Req = 2.7
L Brg Width = 4.0 Min Req = 1.5
Bearings N & L are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	163	- 771	G - H	546	- 1687
B - C	410	- 1669	H - I	538	- 1747
C - D	576	- 2254	I - J	471	- 1693
D - E	576	- 2254	J - K	294	- 805
E - F	649	- 2477	K - L	970	- 139
F - G	600	- 2055			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
AB- Z	802	- 75	T - S	1735	- 194
Z - Y	1712	- 82	S - P	1413	- 146
Y - V	2483	- 309	O - N	193	- 746
U - T	1735	- 194	N - L	202	- 787

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AD	379	- 1680	F - U	204	- 997
A -AB	1780	- 377	U - G	664	- 147
AD-AB	384	- 154	G - S	459	- 1584
AB- B	472	- 1505	H - S	1484	- 472
B - Z	1465	- 408	I - P	87	- 413
Z - C	343	- 1082	P - J	1139	- 142
C - Y	898	- 258	P - O	693	- 52
Y - E	126	- 377	J - O	262	- 1546
V - F	800	- 93	O - K	1854	- 305
V - U	2103	- 263	K - N	534	- 2426

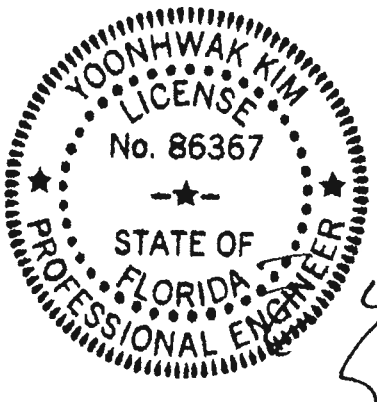
Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 3X4 except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.
Left end vertical not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
Negative reaction(s) of -351# MAX. from a non-wind load case requires uplift connection. See Maximum Reactions.
WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.
The overall height of this truss excluding overhang is 9-5-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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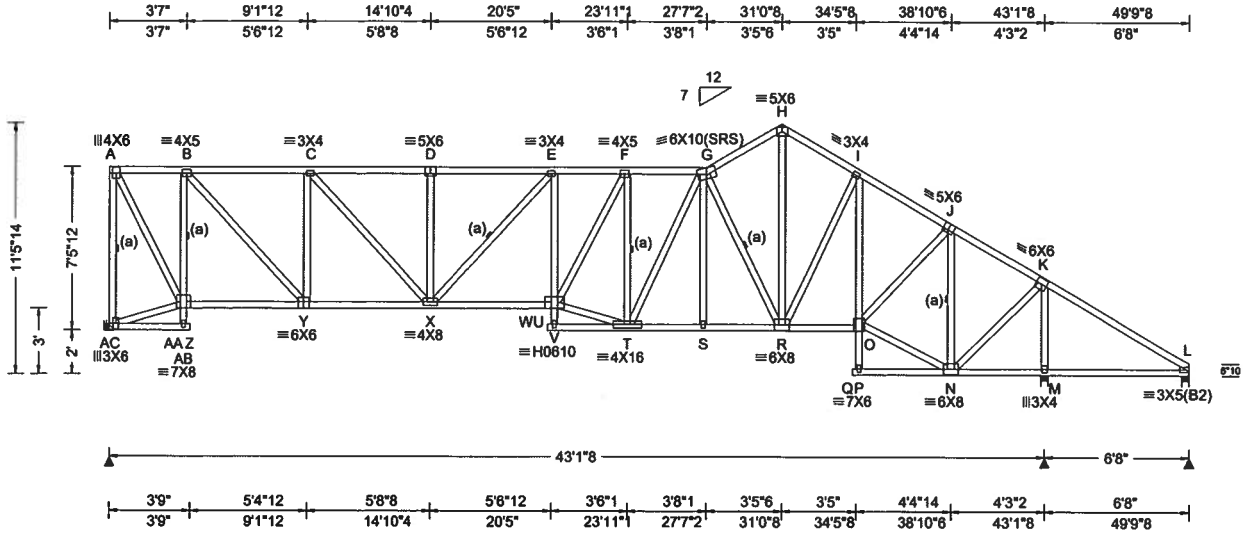
Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
ANITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573052 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** A04	Cust: R 215 JRef:1WRZ2150004 T44 / DrwNo: 017.20.1126.19786 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.02 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.212	W	999	240
VERT(CL): 0.435	W	999	240
HORZ(LL): 0.103	N	-	-
HORZ(TL): 0.215	N	-	-

Creep Factor: 2.0
Max TC CSI: 0.951
Max BC CSI: 0.774
Max Web CSI: 0.950

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AC	1707	/-	/-	/878	/294	/226
M	2717	/-	/-	/1537	/223	/-
L	54	/-489	/-	/48	/220	/-

Wind reactions based on MWFRS
AC Brg Width = - Min Req = -
M Brg Width = 4.0 Min Req = 2.8
L Brg Width = 4.0 Min Req = 1.5
Bearings M & L are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	202	-914	G - H	539	-1690
B - C	484	-1966	H - I	545	-1699
C - D	678	-2650	I - J	479	-1622
D - E	678	-2650	J - K	288	-723
E - F	769	-2914	K - L	1145	-189
F - G	684	-2380			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
AA- Y	950	-57	S - R	2157	-360
Y - X	2016	-225	R - O	1354	-169
X - U	2923	-496	N - M	188	-892
T - S	2158	-360	M - L	198	-935

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AC	391	-1668	T - G	499	-118
A -AA	1836	-406	G - R	499	-1704
AA- B	460	-1488	H - R	1423	-456
B - Y	1545	-425	I - O	97	-472
Y - C	338	-1069	O - J	1161	-166
C - X	947	-271	O - N	611	-58
X - E	137	-405	J - N	288	-1564
U - F	1079	-173	N - K	1936	-336
U - T	2494	-428	K - M	575	-2515
F - T	248	-1158			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 2X4 except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.
Left end vertical not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
Negative reaction(s) of -489# MAX. from a non-wind load case requires uplift connection. See Maximum Reactions.
WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.
The overall height of this truss excluding overhang is 9-5-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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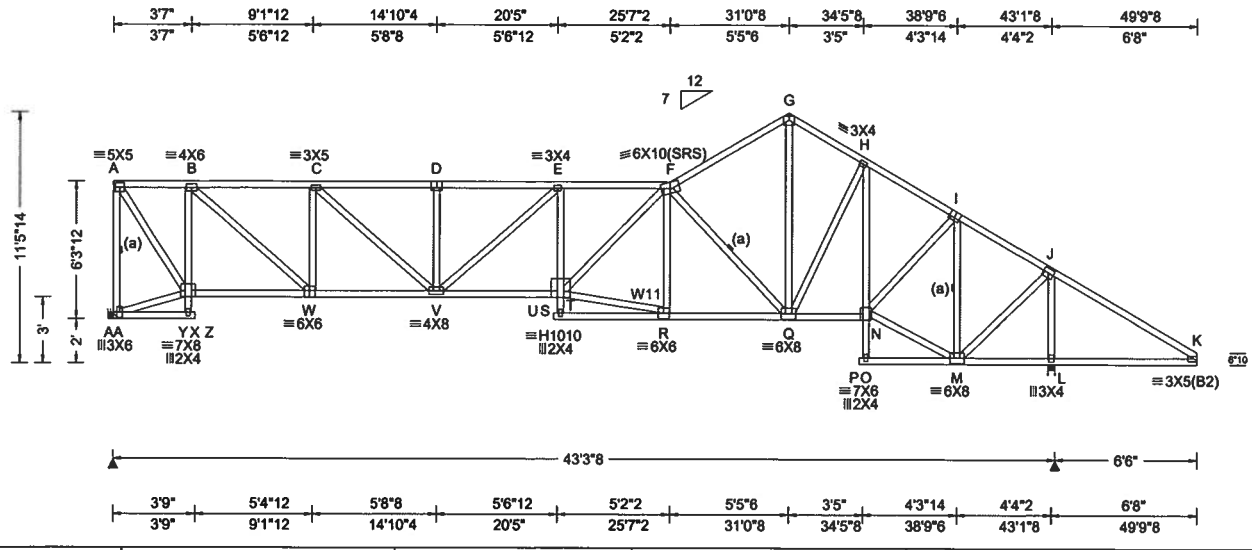
Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573055 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A05	Cust: R 215 JRef: 1WRZ2150004 T53 / DrwNo: 017.20.1126.19693 / YK 01/17/2020	



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.02 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.279	U	999	240
VERT(CL): 0.592	U	873	240
HORZ(LL): 0.132	M	-	-
HORZ(TL): 0.282	M	-	-

Creep Factor: 2.0
Max TC CSI: 0.751
Max BC CSI: 0.950
Max Web CSI: 0.811

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AA	1771	/-	/-	/875	/284	/237
L	2390	/-	/-	/1570	/97	/-

Wind reactions based on MWFRS
AA Brg Width = - Min Req = -
L Brg Width = 4.0 Min Req = 2.4
Bearing L is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	269	- 1179	F - G	601	- 1986
B - C	623	- 2536	G - H	614	- 1946
C - D	867	- 3451	H - I	574	- 1995
D - E	867	- 3451	I - J	379	- 1158
E - F	988	- 3878	J - K	548	- 281

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
Y - W	1224	- 87	R - Q	3033	- 601
W - V	2602	- 411	Q - N	1668	- 257
V - S	3891	- 759			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AA	416	- 1730	R - F	160	- 597
A - Y	2032	- 463	F - Q	572	- 2070
Y - B	467	- 1544	G - Q	1606	- 476
B - W	1791	- 467	N - I	1091	- 162
W - C	340	- 1134	N - M	1057	- 176
C - V	1144	- 302	I - M	276	- 1472
V - E	166	- 589	M - J	1582	- 322
S - R	3017	- 594	J - L	591	- 2219
S - F	1210	- 242			

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3; W11 2x4 SP #2;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 5X6 except as noted.

Wind

Wind loads based on MWFRS with additional C&C member design.

Left end vertical not exposed to wind pressure.

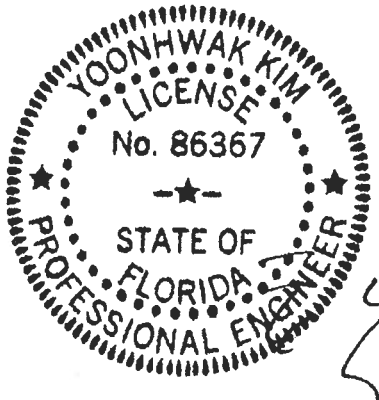
Right cantilever is exposed to wind

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss excluding overhang is 9-5-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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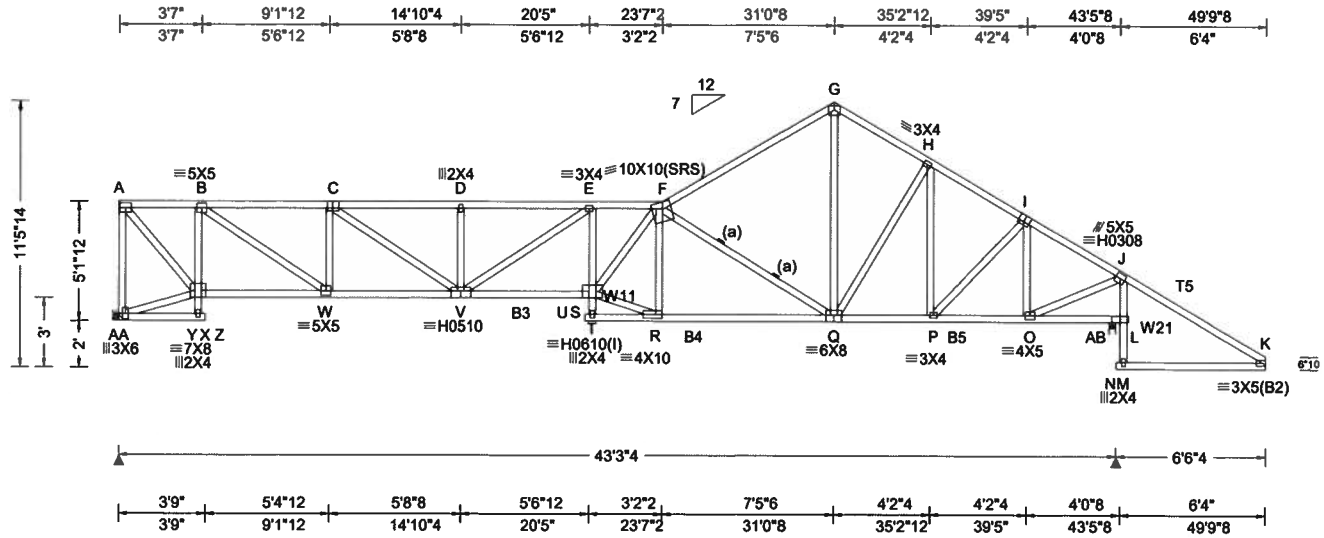
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573060 / SPEC	Ply: 1	**Job Number:** 19-3769	Cust: R 215 JRef: 1WRZ2150004 T55 /
FROM: CDM	Qty: 1	/Parnell /ZECHER CONSTRUCTION	DrwNo: 017.20.1126.19755
		Truss Label: A06	/ YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.02 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.401	U	999	240
VERT(CL): 0.845	U	612	240
HORZ(LL): 0.130	A	-	-
HORZ(TL): 0.275	A	-	-

Creep Factor: 2.0
Max TC CSI: 0.868
Max BC CSI: 0.817
Max Web CSI: 0.911

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AA	1771	/-	/-	/879	/263	/247
AB	2390	/-	/-	/1555	/71	/-

Wind reactions based on MWFRS
AA Brg Width = - Min Req = -
AB Brg Width = 3.5 Min Req = 2.0
Bearing AB is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	359	-1554	F - G	590	-2033
B - C	803	-3299	G - H	602	-1962
C - D	1115	-4497	H - I	550	-1932
D - E	1115	-4497	I - J	401	-1408
E - F	1268	-5092	J - K	522	-268

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
Y - W	1611	-177	Q - P	1619	-248
W - V	3385	-631	P - O	1201	-194
V - S	5110	-1075	O - L	1044	-1330
R - Q	3897	-834			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AA	421	-1728	R - F	356	-1434
A - Y	2269	-524	F - Q	737	-2671
Y - B	457	-1534	G - Q	1515	-430
B - W	2074	-527	H - P	161	-395
W - C	332	-1129	P - I	744	-200
C - V	1353	-348	I - O	304	-1055
V - E	191	-742	O - J	1771	-406
S - R	4037	-858	J - L	523	-1972
S - F	2001	-404			

Lumber

Top chord: 2x4 SP #2; T5 2x4 SP M-31;
Bot chord: 2x4 SP #2; B3,B4,B5 2x4 SP M-31;
Webs: 2x4 SP #3; W11 2x4 SP #2; W21 2x4 SP M-31;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 5X6 except as noted.

(I) - plates so marked were sized using 0% Fabrication Tolerance, 0 degrees Rotational Tolerance, and/or zero Positioning Tolerance.

Wind

Wind loads based on MWFRS with additional C&C member design.

Left end vertical not exposed to wind pressure.

Right cantilever is exposed to wind

Additional Notes

Refer to General Notes for additional information

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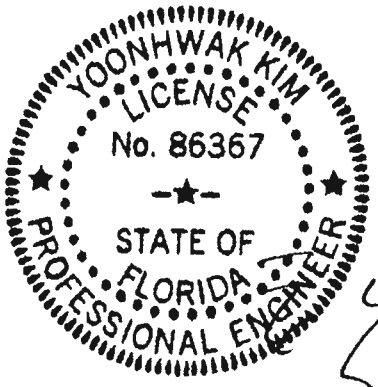
The overall height of this truss excluding overhang is 9-5-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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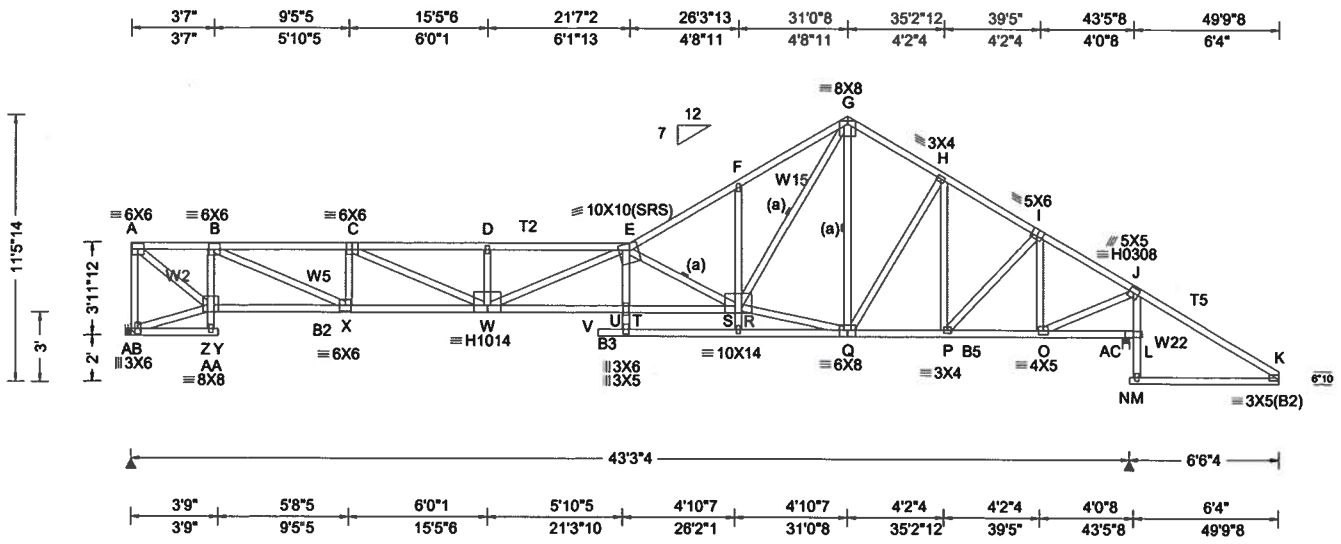
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573068 / SPEC	Ply: 1	Job Number: 19-3769	Cust: R 215 JRef: 1WRZ2150004 T56 /
FROM: CDM	Qty: 1	/Parnell /ZECHER CONSTRUCTION	DrwNo: 017.20.1126.19787
		Truss Label: A07	/ YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.02 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.650	V	795	240
VERT(CL): 1.374	V	376	240
HORZ(LL): 0.164	A	-	-
HORZ(TL): 0.346	O	-	-

Creep Factor: 2.0
Max TC CSI: 0.751
Max BC CSI: 0.717
Max Web CSI: 0.967

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
AB	1771	/-	/-	/895	/239	/258
AC	2390	/-	/-	/1542	/46	/-

Wind reactions based on MWFRS
AB Brg Width = - Min Req = -
AC Brg Width = 3.5 Min Req = 2.0
Bearing AC is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	533	-2276	F - G	1102	-3944
B - C	1170	-4836	G - H	599	-1964
C - D	1604	-6564	H - I	544	-1933
D - E	1604	-6564	I - J	397	-1406
E - F	995	-3955	J - K	521	-268

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
Z - X	2359	-393	Q - P	1625	-246
X - W	4956	-1043	P - O	1198	-189
W - T	7056	-1575	O - L	1043	-1329
T - R	6979	-1561			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AB	425	-1723	E - R	1071	-4215
A - Z	2808	-658	R - G	3359	-848
Z - B	444	-1511	R - Q	1537	-178
B - X	2740	-680	H - P	176	-398
X - C	326	-1116	P - I	758	-203
C - W	1768	-439	I - O	300	-1055
W - E	145	-537	O - J	1767	-401
D - W	166	-384	J - L	520	-1971

Lumber

Top chord: 2x4 SP #2; T2,T5 2x4 SP M-31;
Bot chord: 2x4 SP #2; B2,B3,B5 2x4 SP M-31;
Webs: 2x4 SP #3; W2,W5,W15 2x4 SP #2;
W22 2x4 SP M-31;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 2X4 except as noted.

Wind

Wind loads based on MWFRS with additional C&C member design.

Left end vertical not exposed to wind pressure.

Right cantilever is exposed to wind

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss excluding overhang is 9-5-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

****WARNING**** READ AND FOLLOW ALL NOTES ON THIS DRAWING!
****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

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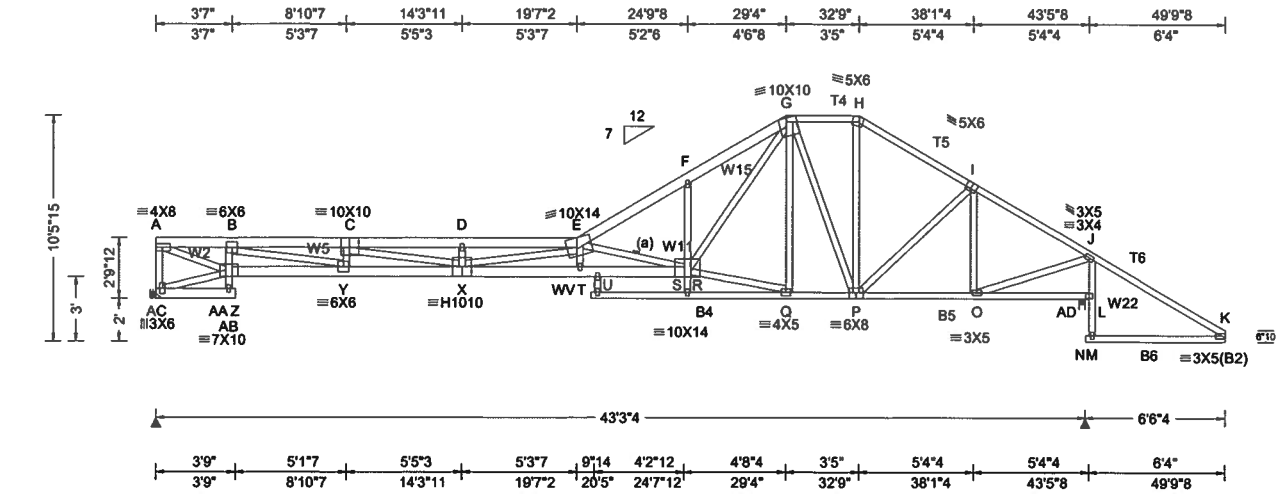
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573072 / SPEC	Ply: 2	**Job Number:** 19-3769	Cust: R 215 JRef: 1WRZ2150004 T58 /
FROM: CDM	Qty: 1	/Pamell /ZECHER CONSTRUCTION	DrwNo: 017.20.1126.19709
		Truss Label: A08	/ YK 01/17/2020

2 Complete Trusses Required



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 4.98 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: No
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.859	E	602	240
VERT(CL): 1.778	E	291	240
HORZ(LL): 0.175	N	-	-
HORZ(TL): 0.379	N	-	-

Creep Factor: 2.0
Max TC CSI: 0.591
Max BC CSI: 0.735
Max Web CSI: 0.938

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity		Non-Gravity		
Loc	R+ / R-	/ Rh	/ Rw	/ U	/ RL
AC	2678 / -	/ -	/ -	/442	/ -
AD	2636 / -	/ -	/ -	/482	/ -

Wind reactions based on MWFRS
AC Brg Width = - Min Req = -
AD Brg Width = 3.5 Min Req = 1.5
Bearing AD is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	549	-3230	F - G	573	-3206
B - C	1124	-6561	G - H	173	-996
C - D	1511	-8640	H - I	216	-1187
D - E	1511	-8640	I - J	169	-977
E - F	564	-3153			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
AA- Y	3379	-576	T - R	8393	-1474
Y - X	6743	-1162	Q - P	1207	-211
X - W	8465	-1490	P - O	824	-134
W - T	8428	-1480	O - L	104	-676

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A -AC	223	-1264	E - R	1025	-5848
A -AA	3434	-584	R - G	2740	-484
AA- B	201	-1050	R - Q	1154	-203
B - Y	3291	-568	G - P	103	-573
Y - C	177	-864	P - H	448	-45
C - X	1959	-360	I - O	125	-473
X - E	510	-21	O - J	1115	-192
D - X	105	-379	J - L	241	-1132

Lumber
Top chord: 2x6 SP 2400f-2.0E; T4,T5,
T6 2x4 SP #2;
Bot chord: 2x6 SP 2400f-2.0E; B4,B6 2x4 SP #2;
B5 2x4 SP M-31;
Webs: 2x4 SP #3; W2,W5,W11,W15,W22 2x4 SP #2;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Nailnote
Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 1 Row @12.00" o.c.
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads
-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	32 plf at	0.00 to	32 plf at	12.23
TC: From	63 plf at	12.23 to	63 plf at	49.79
BC: From	10 plf at	0.00 to	10 plf at	14.31
BC: From	20 plf at	14.31 to	20 plf at	49.79

TC: 102 lb Conc. Load at 0.48, 2.48
TC: 114 lb Conc. Load at 4.48, 6.48, 8.48,10.48
TC: 650 lb Conc. Load at 12.23
BC: 73 lb Conc. Load at 0.48, 2.48
BC: 35 lb Conc. Load at 4.48, 6.48, 8.48,10.48
BC: 86 lb Conc. Load at 12.23

Plating Notes
All plates are 2X4 except as noted.

Wind
Wind loads and reactions based on MWFRS.
Left end vertical not exposed to wind pressure.
Right cantilever is exposed to wind

Additional Notes
Refer to General Notes for additional information
WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.
The overall height of this truss excluding overhang is 8-5-15.

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Laterally brace top chord below filler and bottom chord above filler at 24" o.c., including a lateral brace at chord ends (If no rigid diaphragm exists at that point).

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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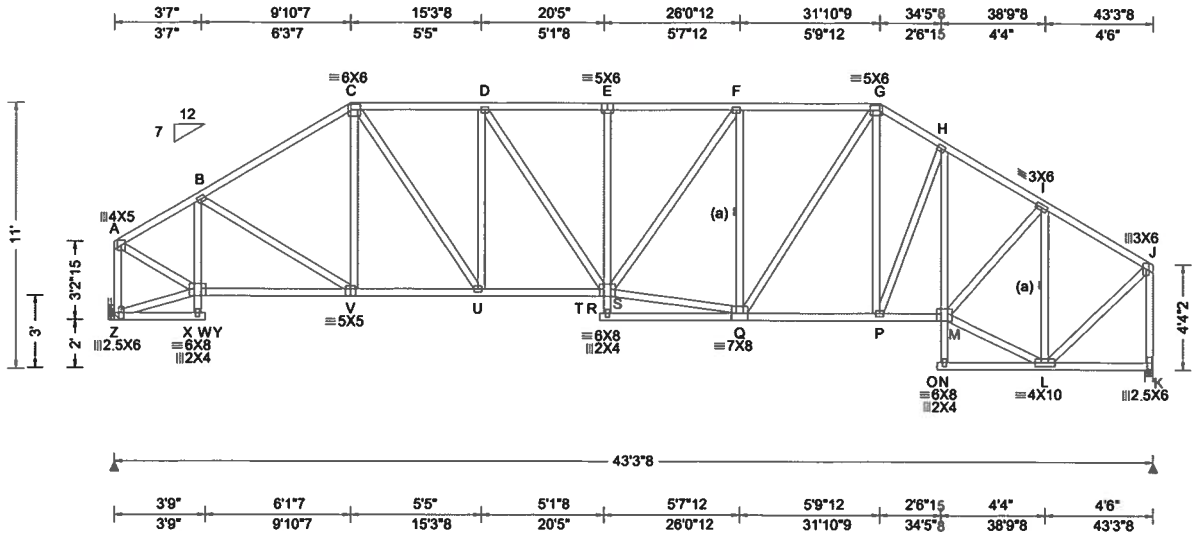
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 299570 / HIPS FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A09	Cust: R 215 JRef:1WRZ2150004 T23 / DrwNo: 017.20.1126.19926 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 4.33 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.155	E	999	240
VERT(CL): 0.323	E	999	240
HORZ(LL): 0.094	L	-	-
HORZ(TL): 0.195	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.482
Max BC CSI: 0.618
Max Web CSI: 0.832

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
Z	1800	/-	/-	/1001	/317	/175
K	1800	/-	/-	/1026	/312	/-

Wind reactions based on MWFRS
Z Brg Width = - Min Req = -
K Brg Width = 4.0 Min Req = 2.1
Bearing K is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	469	- 1827	F - G	675	- 2170
B - C	618	- 2202	G - H	633	- 2065
C - D	703	- 2319	H - I	614	- 2171
D - E	766	- 2585	I - J	357	- 1349
E - F	765	- 2580			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
X - V	1568	- 347	Q - P	1757	- 353
V - U	1814	- 357	P - M	1814	- 389
U - R	2346	- 495			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - Z	445	- 1761	F - Q	274	- 937
A - X	1739	- 414	Q - G	741	- 190
X - B	206	- 669	M - I	1003	- 195
C - U	892	- 229	M - L	1258	- 290
U - D	220	- 687	I - L	380	- 1472
D - R	429	- 110	L - J	1496	- 343
R - F	684	- 154	J - K	446	- 1764
R - Q	2184	- 462			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 3X4 except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.
End verticals not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 9-0-0.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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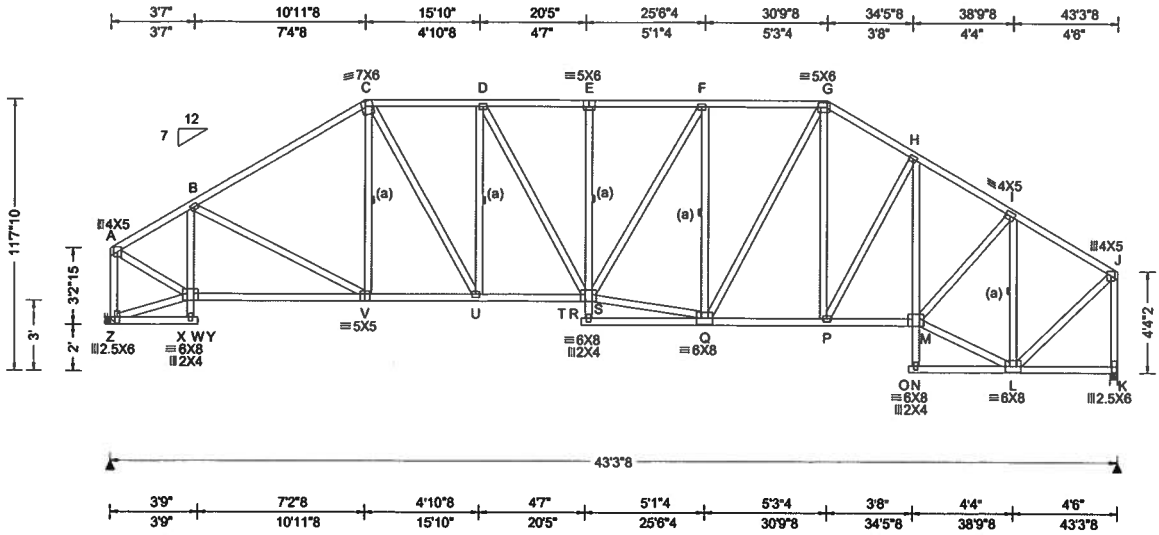
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573023 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A10	Cust: R 215 JRef: 1WRZ2150004 T12 / DrwNo: 017.20.1126.19692 / YK 01/17/2020



Loading Criteria (psf)

TCLL:	20.00
TCDL:	10.00
BCLL:	0.00
BCDL:	10.00
Des Ld:	40.00
NCBCLL:	10.00
Soffit:	2.00

Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 16.99 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.33 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.143	E	999	240
VERT(CL): 0.296	E	999	240
HORZ(LL): 0.090	L	-	-
HORZ(TL): 0.188	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.763
Max BC CSI: 0.746
Max Web CSI: 0.786

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
Z	1800	/-	/-	/1007	/100	/194
K	1800	/-	/-	/1031	/111	/-

Wind reactions based on MWFRS
Z Brg Width = - Min Req = -
K Brg Width = 4.0 Min Req = 2.1
Bearing K is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	491	- 1839	F - G	679	- 2037
B - C	644	- 2211	G - H	657	- 2059
C - D	703	- 2169	H - I	636	- 2171
D - E	756	- 2382	I - J	370	- 1349
E - F	755	- 2379			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
X - V	1588	- 370	Q - P	1731	- 354
V - U	1805	- 362	P - M	1817	- 406
U - R	2193	- 468			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - Z	462	- 1762	F - Q	267	- 896
A - X	1763	- 441	Q - G	623	- 171
X - B	220	- 673	M - I	1009	- 208
C - U	737	- 201	M - L	1258	- 301
U - D	203	- 616	I - L	394	- 1472
D - R	393	- 105	L - J	1495	- 357
R - F	647	- 148	J - K	464	- 1764
R - Q	2064	- 443			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 3X4 except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.
End verticals not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 9-7-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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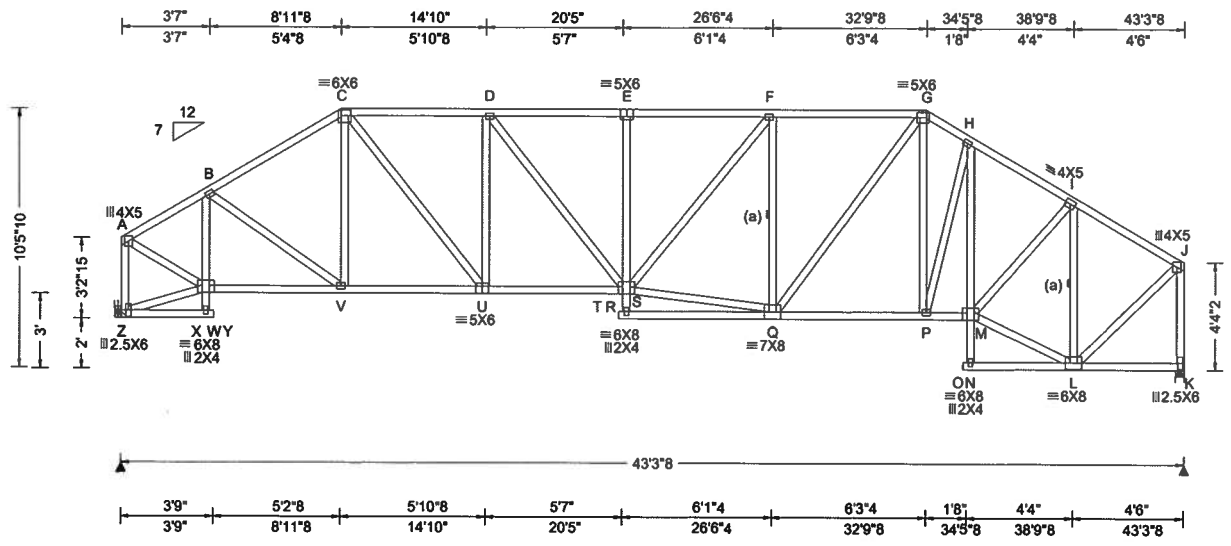
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573020 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A11	Cust: R 215 JRef: 1WRZ2150004 T59 / DrwNo: 017.20.1126.19631 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 16.41 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.33 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.169	E	999	240
VERT(CL): 0.352	E	999	240
HORZ(LL): 0.098	L	-	-
HORZ(TL): 0.203	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.487
Max BC CSI: 0.710
Max Web CSI: 0.875

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
Z	1800	/-	/-	/993	/110	/161
K	1800	/-	/-	/1018	/119	/-

Wind reactions based on MWFRS
Z Brg Width = - Min Req = -
K Brg Width = 4.0 Min Req = 2.1
Bearing K is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	488	-1819	F - G	725	-2294
B - C	640	-2186	G - H	656	-2059
C - D	759	-2461	H - I	642	-2171
D - E	839	-2784	I - J	373	-1349
E - F	838	-2778			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
X - V	1554	-360	Q - P	1777	-384
V - U	1815	-384	P - M	1816	-409
U - R	2492	-564			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - Z	467	-1761	F - Q	298	-973
A - X	1722	-428	Q - G	848	-222
X - B	208	-666	M - I	1001	-203
C - U	1033	-273	M - L	1257	-305
U - D	247	-743	I - L	399	-1473
D - R	471	-126	L - J	1496	-361
R - F	733	-176	J - K	468	-1764
R - Q	2298	-521			

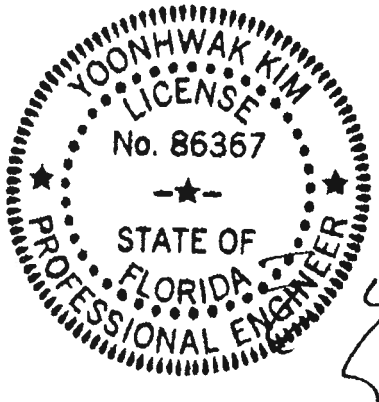
Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 3X4 except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.
End verticals not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 8-5-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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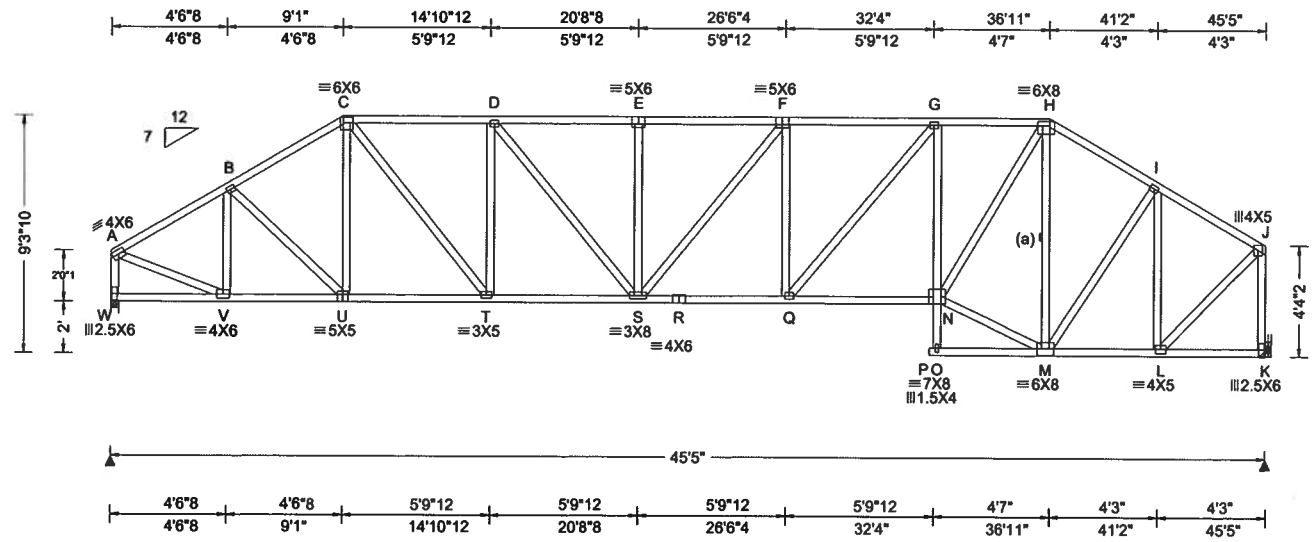
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571150 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** A12	Cust: R 215 JRef: 1WRZ2150004 T63 / DrwNo: 017.20.1126.19552 / FV 01/17/2020



Loading Criteria (psf)

TCLL:	20.00
TCDL:	10.00
BCLL:	0.00
BCDL:	10.00
Des Ld:	40.00
NCBCLL:	10.00
Soffit:	2.00

Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.65 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 4.54 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.209	E	999	240
VERT(CL): 0.435	E	999	240
HORZ(LL): 0.093	L	-	-
HORZ(TL): 0.194	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.444
Max BC CSI: 0.810
Max Web CSI: 0.843

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
W	1888	/-	/-	/1052	/124	/144
K	1888	/-	/-	/1043	/121	/-

Wind reactions based on MWFRS
W Brg Width = 3.7 Min Req = 2.2
K Brg Width = - Min Req = -
Bearing W is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	566	-2132	F - G	878	-2992
B - C	693	-2370	G - H	781	-2577
C - D	813	-2710	H - I	556	-1776
D - E	896	-3062	I - J	375	-1346
E - F	896	-3062			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
V - U	1816	-453	R - Q	3010	-716
U - T	1985	-457	Q - N	2597	-618
T - S	2742	-655	M - L	1149	-283
S - R	3010	-716			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - W	491	-1847	G - N	261	-831
A - V	1894	-456	N - M	1607	-365
V - B	182	-590	N - H	2051	-515
C - T	1152	-298	M - H	256	-1108
T - D	251	-777	M - I	581	-92
D - S	509	-130	I - L	285	-1005
F - Q	163	-442	L - J	1563	-384
Q - G	633	-160	J - K	494	-1854

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

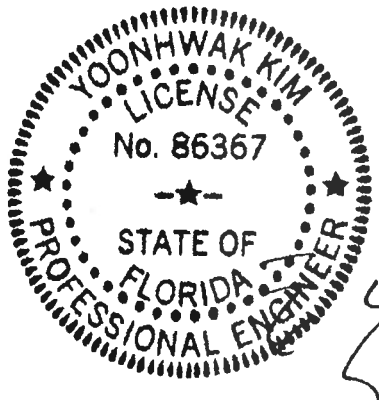
Bracing
(a) Continuous lateral restraint equally spaced on member.

Plating Notes
All plates are 3X4 except as noted.

Hangers / Ties
(J) Hanger Support Required, by others

Wind
Wind loads based on MWFRS with additional C&C member design.
End verticals not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.
The overall height of this truss excluding overhang is 7-3-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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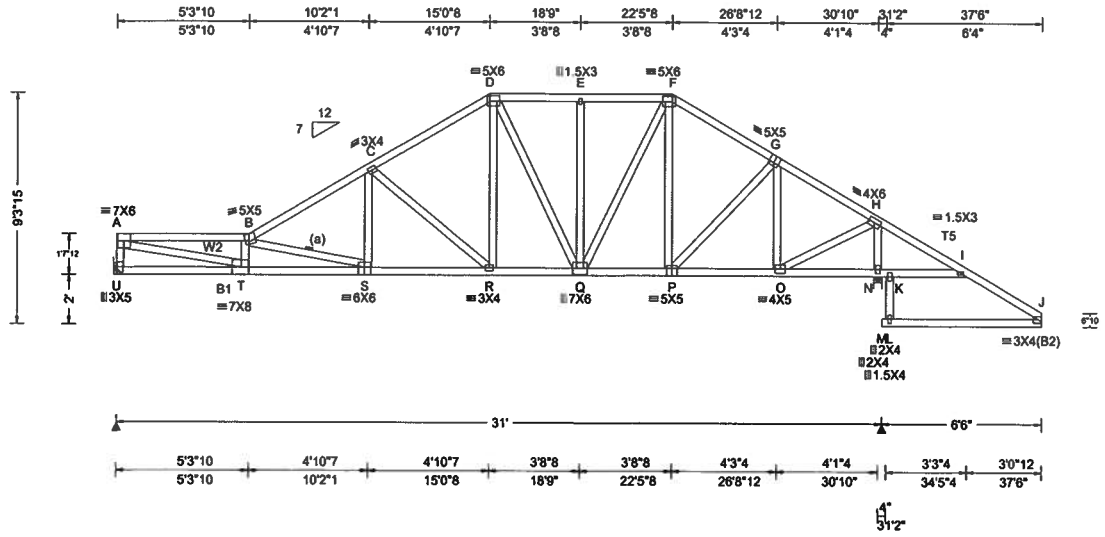
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571173 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** A8A	Cust: R 215 JRef: 1WRZ2150004 T20 / DrwNo: 017.20.1126.18680 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.75 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.193	B	999	240
VERT(CL): 0.446	K	179	240
HORZ(LL): -0.103	M	-	-
HORZ(TL): 0.261	M	-	-

Creep Factor: 2.0
Max TC CSI: 0.861
Max BC CSI: 0.558
Max Web CSI: 0.883

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
U	1251	/-	/-	/-	/226	/-
N	1896	/-	/-	/-	/351	/-

Wind reactions based on MWFRS
U Brg Width = - Min Req = -
N Brg Width = 4.0 Min Req = 1.9
Bearing N is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	678	-3825	E - F	221	-1268
B - C	460	-2481	F - G	228	-1262
C - D	310	-1653	G - H	164	-1015
D - E	221	-1268	H - I	965	-194

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
T - S	4036	-731	P - O	856	-128
S - R	2049	-369	O - N	135	-800
R - Q	1355	-239	N - K	148	-838
Q - P	1028	-173	K - I	143	-799

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - U	241	-1177	D - R	694	-68
A - T	3913	-691	Q - F	546	-102
T - B	254	-996	G - O	189	-726
B - S	374	-2028	O - H	1618	-291
S - C	691	-59	H - N	394	-1762
C - R	173	-925			

Lumber

Top chord: 2x4 SP #2; T5 2x4 SP M-31;
Bot chord: 2x4 SP #2; B1 2x4 SP M-31;
Webs: 2x4 SP #3; W2 2x4 SP #2;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Wind

Wind loads and reactions based on MWFRS.

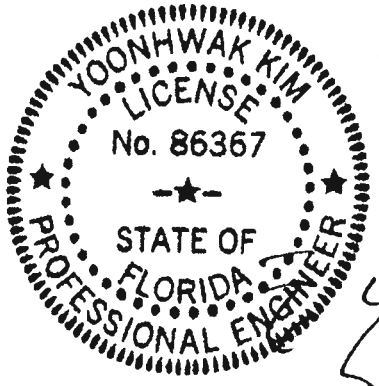
Right cantilever is exposed to wind

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 7-3-15.

Laterally brace chord above/below filler at 24" OC (or as designed) including a lateral brace on chord directly above/ below both ends of filler (if no rigid diaphragm exists at that point)



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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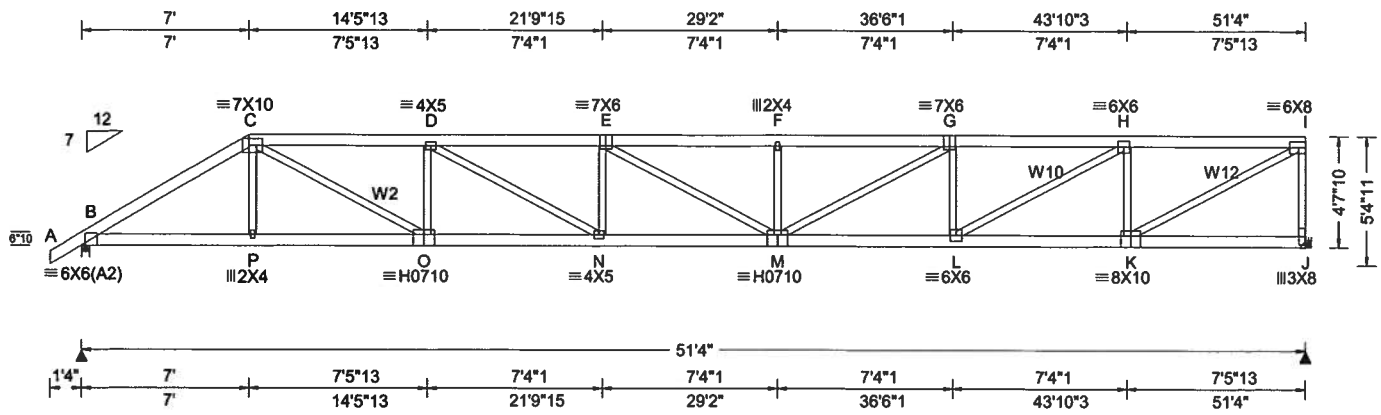
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569342 / HIPM FROM: CDM	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** B01	Cust: R 215 JRef:1WRZ2150004 T25 / DrwNo: 017.20.1126.19506 / FV 01/17/2020

2 Complete Trusses Required



Loading Criteria (psf)
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TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 5.13 ft
Loc. from endwall: NA
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: No
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.511	F	999	240
VERT(CL): 1.029	F	596	240
HORZ(LL): 0.103	C	-	-
HORZ(TL): 0.207	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.339
Max BC CSI: 0.513
Max Web CSI: 0.859

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	5182	/-	/-	/-	/1083	/-
J	5476	/-	/-	/-	/1209	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 2.1
J Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	977	-4672	F - G	1717	-8162
C - D	1372	-6740	G - H	1454	-6780
D - E	1640	-8117	H - I	900	-4133
E - F	1717	-8162			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - P	3978	-825	N - M	8151	-1652
P - O	3991	-825	M - L	6864	-1477
O - N	6828	-1395	L - K	4275	-938

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
C - O	3159	-628	G - L	328	-1210
O - D	333	-1268	L - H	2911	-600
D - N	1499	-285	H - K	539	-2044
N - E	173	-482	K - I	4755	-1036
F - M	200	-474	I - J	612	-2594
M - G	1501	-277			

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3; W2,W10 2x4 SP #2;
W12 2x4 SP M-31;

Nailnote

Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 1 Row @12.00" o.c.
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads

-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at -1.33 to 63 plf at 7.00
TC: From 32 plf at 7.00 to 32 plf at 51.33
BC: From 5 plf at -1.33 to 5 plf at 0.00
BC: From 20 plf at 0.00 to 20 plf at 7.03
BC: From 10 plf at 7.03 to 10 plf at 51.33
TC: 294 lb Conc. Load at 7.03
TC: 199 lb Conc. Load at 9.06,11.06,13.06,15.06 25.06,27.06,29.06,31.06,33.06,35.06,37.06,39.06 41.06,43.06,45.06,47.06,49.06,51.06
TC: 205 lb Conc. Load at 17.06,19.06,21.06,23.06
BC: 503 lb Conc. Load at 7.03
BC: 134 lb Conc. Load at 9.06,11.06,13.06,15.06 25.06,27.06,29.06,31.06,33.06,35.06,37.06,39.06 41.06,43.06,45.06,47.06,49.06,51.06
BC: 135 lb Conc. Load at 17.06,19.06,21.06,23.06

Hangers / Ties

(J) Hanger Support Required, by others

Wind

Wind loads and reactions based on MWFRS.

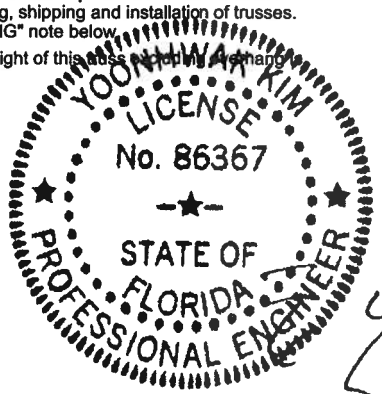
Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss is 4-7-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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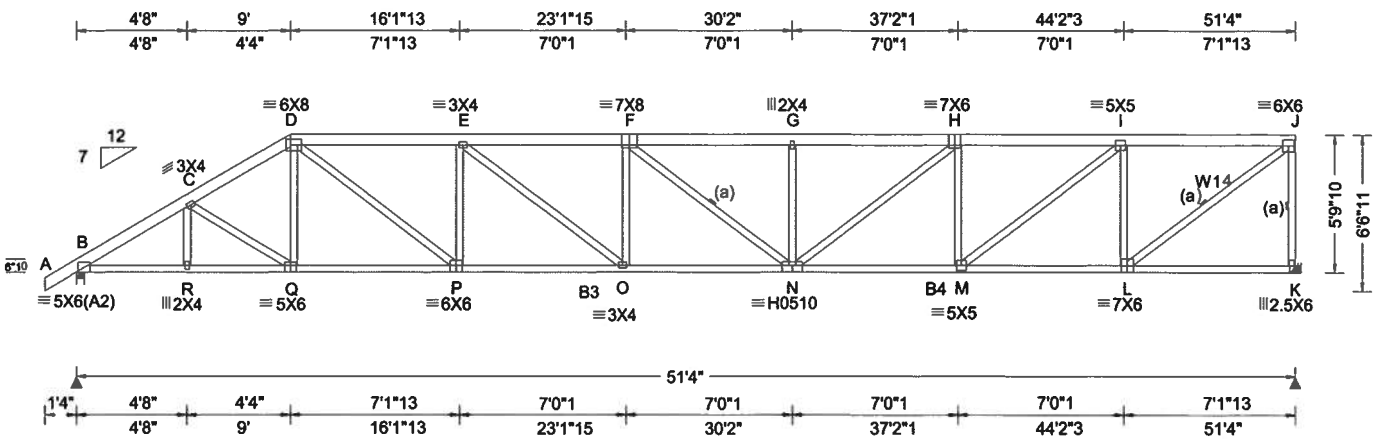
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569345 / HIPM FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** B02	Cust: R 215 JRef: 1WRZ2150004 T66 / DrwNo: 017.20.1126.19366 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 5.13 ft
Loc. from endwall: not in 6.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE, HS

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.320	F	999	240
VERT(CL): 0.662	F	928	240
HORZ(LL): 0.103	L	-	-
HORZ(TL): 0.212	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.203
Max BC CSI: 0.999
Max Web CSI: 0.973

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	2232	/-	/-	/1279	/395	/171
K	2127	/-	/-	/1065	/401	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 2.6
K Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	867	-3572	F - G	1261	-4915
C - D	893	-3413	G - H	1261	-4915
D - E	1153	-4327	H - I	1027	-4022
E - F	1295	-4990	I - J	628	-2429

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - R	2956	-858	O - N	5009	-1302
R - Q	2956	-858	N - M	4080	-1045
Q - P	2927	-810	M - L	2522	-656
P - O	4377	-1168			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - P	1767	-432	H - M	331	-1077
P - E	289	-941	M - I	1928	-491
E - O	789	-176	I - L	513	-1726
G - N	166	-441	L - J	3073	-794
N - H	1065	-282	J - K	579	-2070

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x4 SP #2; B3,B4 2x4 SP M-31;
Webs: 2x4 SP #3; W14 2x4 SP #2;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Wind

Wind loads based on MWFRS with additional C&C member design.

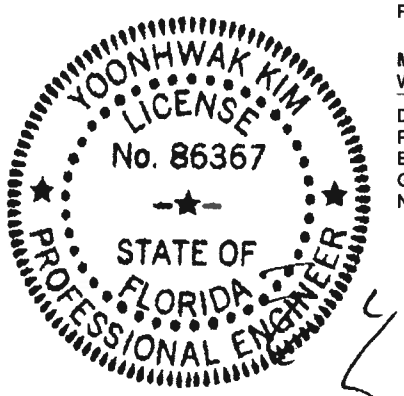
Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

WARNING: Furnish a copy of this DWG to the installation contractor. Special care must be taken during handling, shipping and installation of trusses. See "WARNING" note below.

The overall height of this truss excluding overhang is 5-9-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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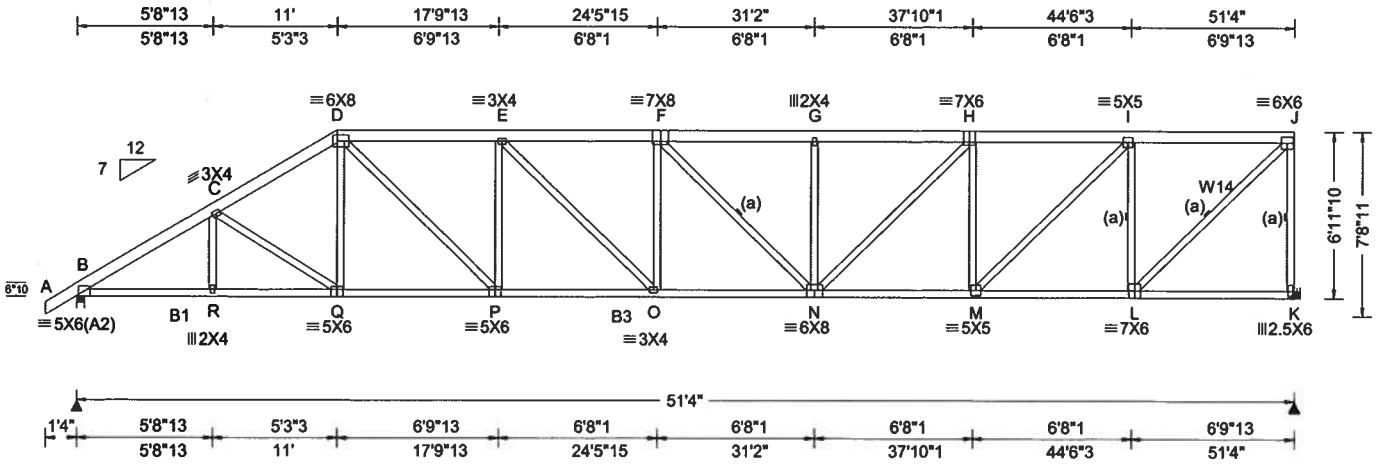
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569348 / HIPM FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** B03	Cust: R 215 JRef:1WRZ2150004 T21 / DrwNo: 017.20.1126.19146 / FV 01/17/2020



Loading Criteria (psf)		Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria
TCLL:	20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in loc L/defl L/#
TCDL:	10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): 0.247 F 999 240
BCLL:	0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): 0.510 F 999 240
BCDL:	10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.093 L - -
Des Ld:	40.00	EXP: C Kzt: NA		HORZ(TL): 0.192 L - -
NCBCLL:	10.00	Mean Height: 15.00 ft	**Code / Misc Criteria**	Creep Factor: 2.0
Soffit:	2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.261
Load Duration:	1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.893
Spacing:	24.0 "	MWFRS Parallel Dist: h/2 to h	Rep Fac: Yes	Max Web CSI: 0.927
		C&C Dist a: 5.13 ft	FT/RT:20(0)/10(0)	
		Loc. from endwall: not in 13.00 ft	Plate Type(s):	VIEW Ver: 18.02.01B.0321.08
		GCpi: 0.18	WAVE	
		Wind Duration: 1.60		

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	2232	/-	/-	/1307	/389	/205
K	2127	/-	/-	/1073	/404	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.8
K Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	854	-3602	F - G	1033	-3981
C - D	860	-3307	G - H	1033	-3981
D - E	1009	-3746	H - I	828	-3208
E - F	1086	-4141	I - J	500	-1916

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - R	2992	-877	O - N	4152	-1090
R - Q	2991	-877	N - M	3258	-843
Q - P	2806	-785	M - L	1993	-523
P - O	3781	-1019			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - P	1319	-319	H - M	344	-1125
P - E	247	-795	M - I	1747	-448
E - O	519	-120	I - L	519	-1746
G - N	158	-420	L - J	2693	-703
N - H	1028	-275	J - K	583	-2073

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x4 SP #2; B1,B3 2x4 SP M-31;
Webs: 2x4 SP #3; W14 2x4 SP #2;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Wind

Wind loads based on MWFRS with additional C&C member design.

Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

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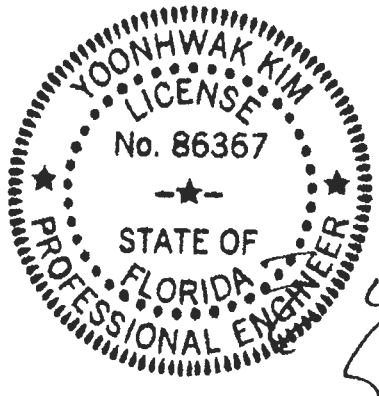
The overall height of this truss excluding overhang is 6-11-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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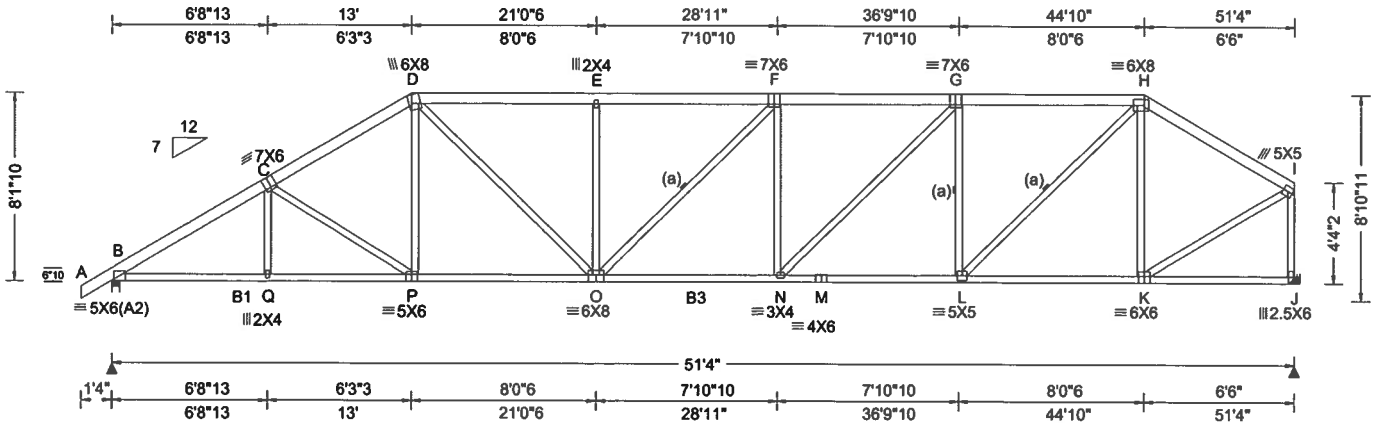
ALPINE
ANITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569351 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** B04	Cust: R 215 JRef:1WRZ2150004 T22 / DrwNo: 017.20.1126.19568 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 5.13 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.189	F	999	240
VERT(CL): 0.390	F	999	240
HORZ(LL): 0.083	J	-	-
HORZ(TL): 0.172	J	-	-

Creep Factor: 2.0
Max TC CSI: 0.200
Max BC CSI: 0.979
Max Web CSI: 0.998

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	2232	/-	/-	/1321	/158	/193
J	2127	/-	/-	/1127	/176	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.8
J Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	871	-3602	F - G	992	-3486
C - D	856	-3195	G - H	847	-2877
D - E	978	-3438	H - I	546	-1948
E - F	978	-3437			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - Q	2991	-784	N - M	2917	-725
Q - P	2990	-784	M - L	2917	-725
P - O	2689	-660	L - K	1611	-398
O - N	3502	-864			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - P	450	-61	G - L	335	-1086
D - O	1039	-265	L - H	1773	-441
E - O	205	-496	H - K	265	-814
F - N	180	-422	K - I	1875	-463
N - G	813	-203	I - J	568	-2075

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x4 SP #2; B1,B3 2x4 SP M-31;
Webs: 2x4 SP #3;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Wind

Wind loads based on MWFRS with additional C&C member design.

Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

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The overall height of this truss excluding overhang is 8-1-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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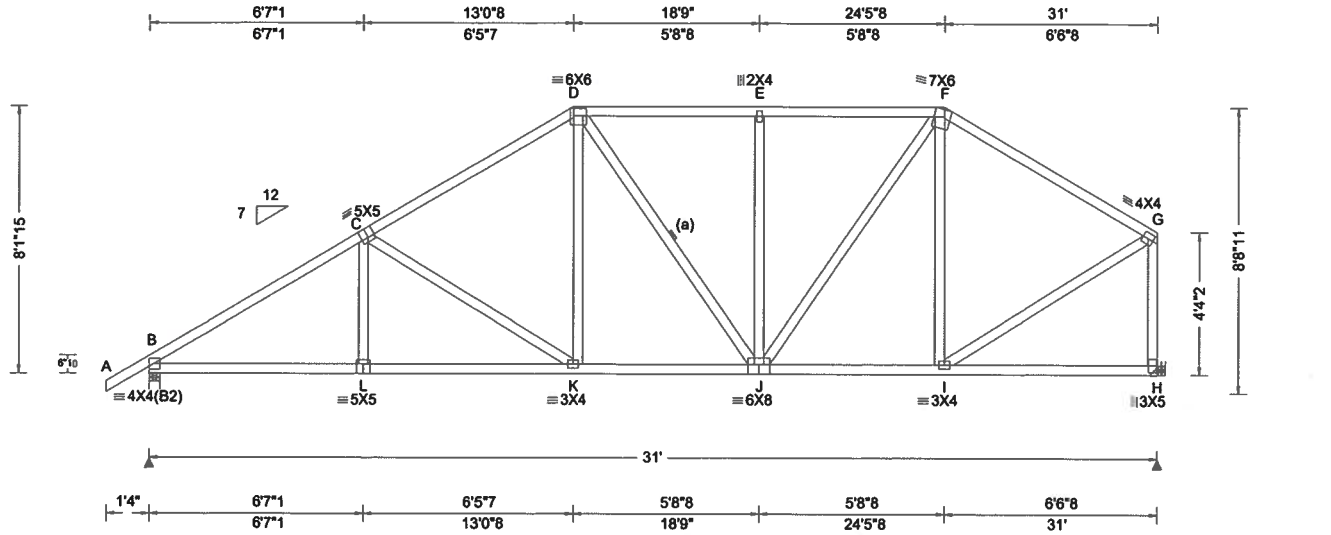
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569305 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** C01	Cust: R 215 JRef: 1WRZ2150004 T35 / DrwNo: 017.20.1126.18555 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 3.10 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.076	K	999	240
VERT(CL): 0.157	K	999	240
HORZ(LL): 0.030	I	-	-
HORZ(TL): 0.062	I	-	-

Creep Factor: 2.0
Max TC CSI: 0.737
Max BC CSI: 0.845
Max Web CSI: 0.533

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	1384	/-	/-	/846	/236	/185
H	1284	/-	/-	/674	/229	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.6
H Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	448	-2030	E - F	409	-1230
C - D	428	-1563	F - G	315	-1109
D - E	409	-1230			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - L	1654	-427	K - J	1261	-291
L - K	1652	-427	J - I	883	-197

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
C - K	162	-466	F - I	151	-400
D - K	449	-71	I - G	1037	-231
J - F	589	-144	G - H	333	-1231

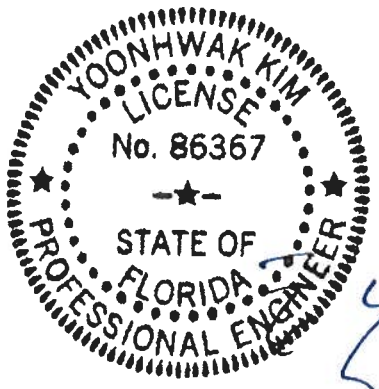
Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing
(a) Continuous lateral restraint equally spaced on member.

Hangers / Ties
(J) Hanger Support Required, by others

Wind
Wind loads based on MWFRS with additional C&C member design.
Right end vertical not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 8-1-15.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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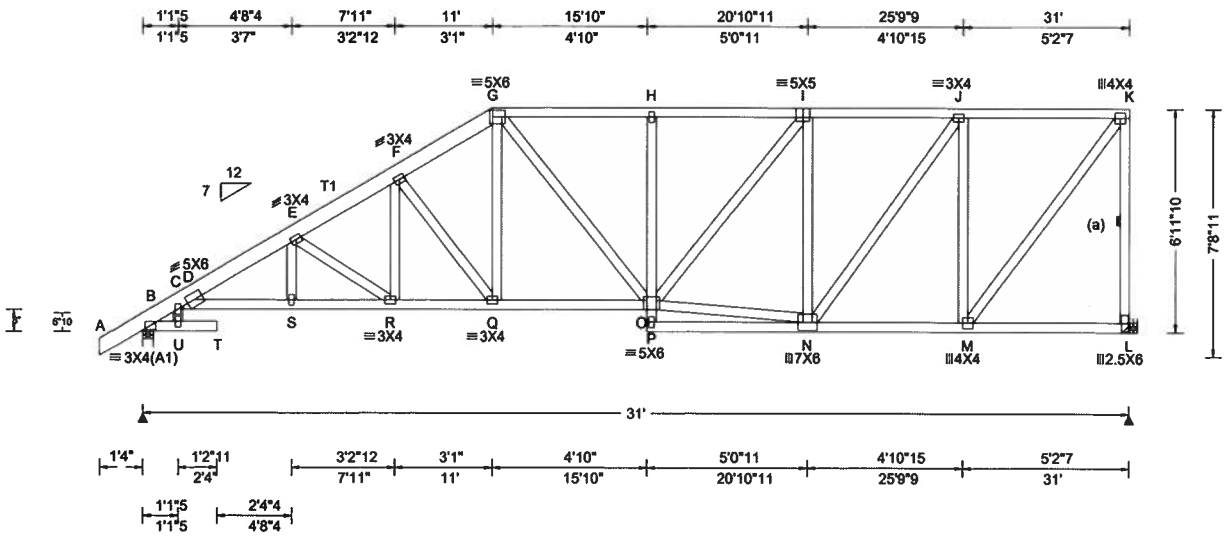
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569302 / HIPM FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** C02	Cust: R 215 JRef: 1WRZ2150004 T33 / DrwNo: 017.20.1126.19131 / FV 01/17/2020



Loading Criteria (psf)		Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria				▲Maximum Reactions (lbs)						
TCLL:	20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in	loc	L/defl	L/#		Gravity			Non-Gravity		
TCDL:	10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): 0.148	T	999	240	Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
BCLL:	0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): 0.306	T	999	240	B	1388	/-	/-	/850	/226	/205
BCDL:	10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.086	M	-	-	L	1280	/-	/-	/665	/253	/-
Des Ld:	40.00	EXP: C Kzt: NA		HORZ(TL): 0.177	M	-	-	Wind reactions based on MWFRS						
NCBCLL:	10.00	Mean Height: 15.00 ft	**Code / Misc Criteria**	Creep Factor: 2.0				B Brg Width = 4.0 Min Req = 1.6						
Soffit:	2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.460				L Brg Width = - Min Req = -						
Load Duration:	1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.580				Bearing B is a rigid surface.						
Spacing:	24.0 "	MWFRS Parallel Dist: h/2 to h	Rep Fac: Yes	Max Web CSI: 0.860				Members not listed have forces less than 375#						
		C&C Dist a: 3.10 ft	FT/RT:20(0)/10(0)					**Maximum Top Chord Forces Per Ply (lbs)**						
		Loc. from endwall: not in 9.00 ft	Plate Type(s):					Chords	Tens.	Comp.		Chords	Tens.	Comp.
		GCpi: 0.18	WAVE					B - C	0	-654		G - H	474	-1703
		Wind Duration: 1.60		VIEW Ver: 18.02.01B.0321.08				C - D	0	-599		H - I	472	-1696
								D - E	572	-2511		I - J	356	-1320
								E - F	540	-2190		J - K	225	-836
								F - G	482	-1817				

Lumber

Top chord: 2x4 SP #2; T1 2x6 SP 2400f-2.0E;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Plating Notes

All plates are 2X4 except as noted.

Hangers / Ties

(J) Hanger Support Required, by others

Wind

Wind loads based on MWFRS with additional C&C member design.

Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

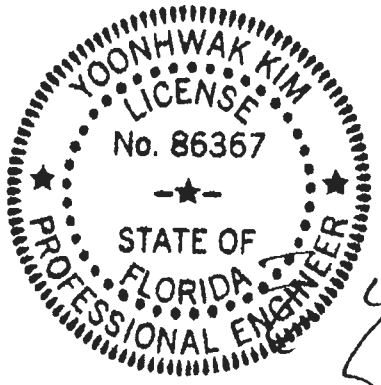
The overall height of this truss excluding overhang is 6-11-10.

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
D - S	2309	-701	Q - O	1536	-445
S - R	2306	-700	N - M	879	-239
R - Q	1797	-539			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
E - R	194	-608	I - N	242	-727
R - F	411	-107	N - J	760	-205
F - Q	157	-441	J - M	316	-993
G - Q	432	-98	M - K	1384	-372
O - I	570	-176	K - L	363	-1239
O - N	1299	-351			



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01/17/2020

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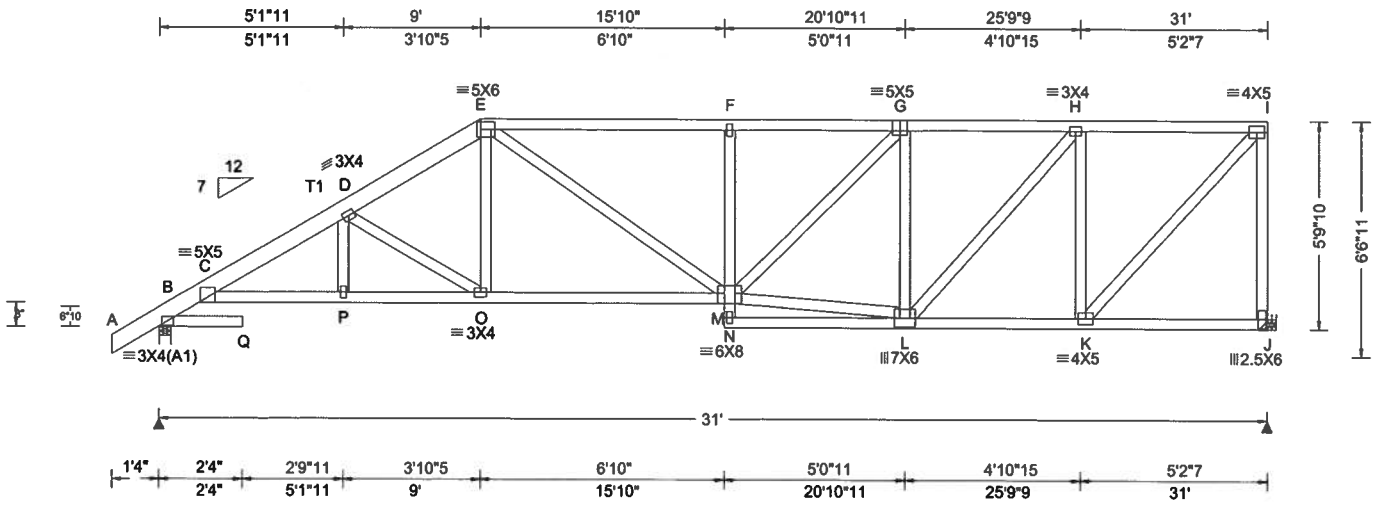
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569298 / HIPM FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** C03	Cust: R 215 JRef: 1WRZ2150004 T32 / DrwNo: 017.20.1126.19600 / FV 01/17/2020



Loading Criteria (psf)		Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria	▲Maximum Reactions (lbs)
TCLL:	20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in loc L/defl L/#	Gravity / Non-Gravity
TCDL:	10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): 0.174 Q 999 240	Loc R+ / R- / Rh / Rw / U / RL
BCLL:	0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): 0.358 Q 999 240	B 1388 /- /- /831 /234 /172
BCDL:	10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.094 K - -	J 1280 /- /- /653 /248 /-
Des Ld:	40.00	EXP: C Kzt: NA		HORZ(TL): 0.193 K - -	Wind reactions based on MWFRS
NCBCLL:	10.00	Mean Height: 15.00 ft	**Code / Misc Criteria**	Creep Factor: 2.0	B Brg Width = 4.0 Min Req = 1.6
Soffit:	2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.526	J Brg Width = - Min Req = -
Load Duration:	1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.778	Bearing B is a rigid surface.
Spacing:	24.0 "	MWFRS Parallel Dist: h/2 to h	Rep Fac: Yes	Max Web CSI: 0.740	Members not listed have forces less than 375#
		C&C Dist a: 3.10 ft	FT/RT:20(0)/10(0)		
		Loc. from endwall: not in 9.00 ft	Plate Type(s):	VIEW Ver: 18.02.01B.0321.08	
		GCpi: 0.18	WAVE		
		Wind Duration: 1.60			

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	16	-619	F - G	578	-2132
C - D	588	-2446	G - H	421	-1596
D - E	541	-2095	H - I	268	-1013
E - F	581	-2144			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
C - P	2225	-667	O - M	1747	-497
P - O	2222	-666	L - K	1065	-284

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - O	202	-568	G - L	245	-767
E - O	484	-80	L - H	812	-212
E - M	477	-106	H - K	311	-994
F - M	152	-377	K - I	1498	-396
M - G	724	-213	I - J	357	-1239
M - L	1571	-410			

Lumber

Top chord: 2x4 SP #2; T1 2x6 SP 2400f-2.0E;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes

All plates are 2X4 except as noted.

Hangers / Ties

(J) Hanger Support Required, by others

Wind

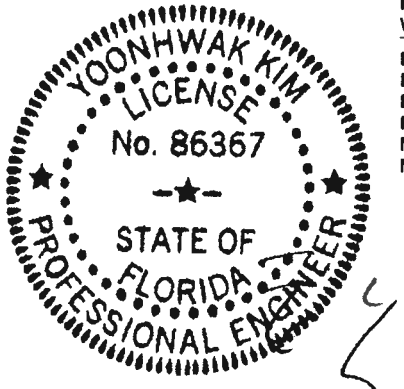
Wind loads based on MWFRS with additional C&C member design.

Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 5-9-10.



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01/17/2020

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ALPINE
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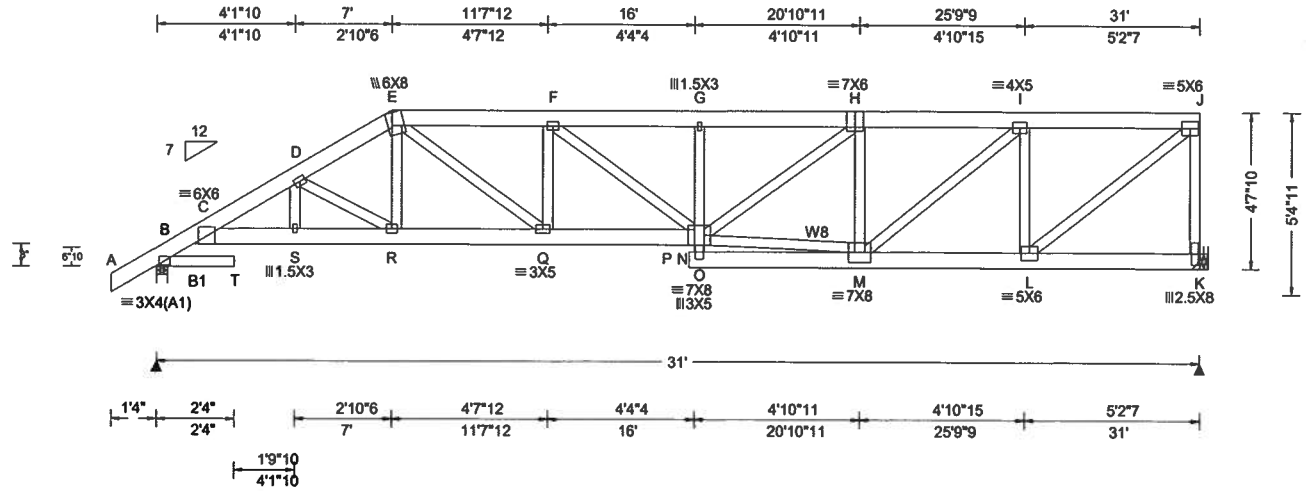
SEQN: 571161 / HIPM FROM: CDM	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** C04	Cust: R215 JRef:1WRZ2150004 T57 / DrwNo: 017.20.1126.18725 / FV 01/17/2020

2 Complete Trusses Required



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.10 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: No
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.190	T	999	240
VERT(CL): 0.383	T	965	240
HORZ(LL): 0.104	L	-	-
HORZ(TL): 0.209	L	-	-

Creep Factor: 2.0
Max TC CSI: 0.741
Max BC CSI: 0.270
Max Web CSI: 0.850

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	3143	/-	/-	/-	/793	/-
K	3161	/-	/-	/-	/771	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.9
K Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	195	-752	F - G	988	-3894
C - D	850	-3364	G - H	982	-3871
D - E	822	-3207	H - I	684	-2759
E - F	919	-3577	I - J	421	-1719

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
C - S	3172	-798	Q - N	3617	-927
S - R	3170	-797	M - L	1804	-446
R - Q	2728	-696			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - R	120	-525	H - M	341	-1097
E - R	674	-184	M - I	1270	-316
E - Q	1073	-282	I - L	366	-1216
Q - F	70	-435	L - J	2230	-546
N - H	1330	-354	J - K	389	-1524
N - M	2667	-665			

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x6 SP 2400f-2.0E; B1 2x4 SP #2;
Webs: 2x4 SP #3; W8 2x4 SP #2;

Nailnote

Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 1 Row @12.00" o.c.
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads

-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at -1.33 to 63 plf at 7.00
TC: From 32 plf at 7.00 to 32 plf at 31.00
BC: From 5 plf at -1.33 to 5 plf at 0.00
BC: From 20 plf at 0.00 to 20 plf at 7.03
BC: From 10 plf at 7.03 to 10 plf at 31.00
TC: 329 lb Conc. Load at 7.03
TC: 136 lb Conc. Load at 9.06,11.06,13.06,15.06
TC: 199 lb Conc. Load at 17.06,19.06,21.06,23.06 25.06,27.06,29.06
BC: 464 lb Conc. Load at 7.03
BC: 243 lb Conc. Load at 9.06,11.06,13.06,15.06
BC: 134 lb Conc. Load at 17.06,19.06,21.06,23.06 25.06,27.06,29.06

Plating Notes

All plates are 3X4 except as noted.

Hangers / Ties

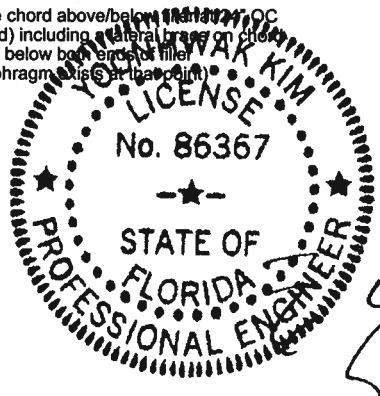
(J) Hanger Support Required, by others

Wind

Wind loads and reactions based on MWFRS.
Right end vertical not exposed to wind pressure.

Additional Notes

Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-10.
Laterally brace chord above/below filler at 24" OC (or as designed) including lateral brace on chord directly above/ below both ends of filler (if no rigid diaphragm exists at that point)



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01/17/2020

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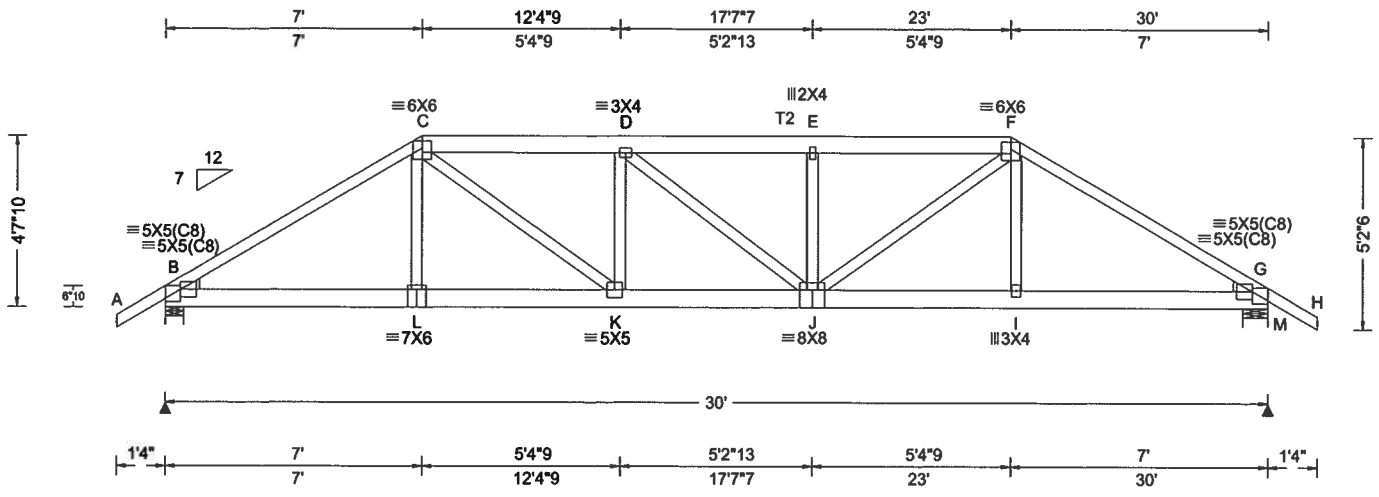
SEQN: 569407 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** D01	Cust: R 215 JRef:1WRZ2150004 T45 / DrwNo: 017.20.1126.19477 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.176	E	999	240
VERT(CL): 0.353	E	999	240
HORZ(LL): 0.056	I	-	-
HORZ(TL): 0.113	I	-	-

Creep Factor: 2.0
Max TC CSI: 0.454
Max BC CSI: 0.527
Max Web CSI: 0.756

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	2981	/-	/-	/-	/671	/-
M	2971	/-	/-	/-	/671	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 2.5
M Brg Width = 8.0 Min Req = 2.5
Bearings B & G are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	1128	-4989	E - F	1301	-5743
C - D	1291	-5715	F - G	1128	-4973
D - E	1301	-5741			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - L	4210	-937	J - I	4177	-937
L - K	4192	-938	I - G	4196	-936
K - J	5765	-1311			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
L - C	541	0	E - J	296	-726
C - K	1952	-452	J - F	1985	-461
K - D	301	-739	F - I	536	0

Lumber

Top chord: 2x4 SP M-31; T2 2x6 SP 2400f-2.0E;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3;
Lt Wedge: 2x4 SP #3;Rt Wedge: 2x4 SP #3;

Special Loads

-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at -1.33 to 63 plf at 7.00
TC: From 32 plf at 7.00 to 32 plf at 23.00
TC: From 63 plf at 23.00 to 63 plf at 31.33
BC: From 5 plf at -1.33 to 5 plf at 0.00
BC: From 20 plf at 0.00 to 20 plf at 7.03
BC: From 10 plf at 7.03 to 10 plf at 22.97
BC: From 20 plf at 22.97 to 20 plf at 30.00
BC: From 5 plf at 30.00 to 5 plf at 31.33
TC: 293 lb Conc. Load at 7.03,22.97
TC: 199 lb Conc. Load at 9.06,11.06,13.06,15.00 16.94,18.94,20.94
BC: 524 lb Conc. Load at 7.03
BC: 134 lb Conc. Load at 9.06,11.06,13.06,15.00 16.94,18.94,20.94
BC: 503 lb Conc. Load at 22.97

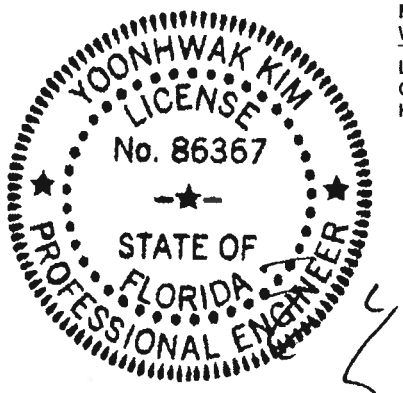
Wind

Wind loads and reactions based on MWFRS.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 4-7-10.



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01/17/2020

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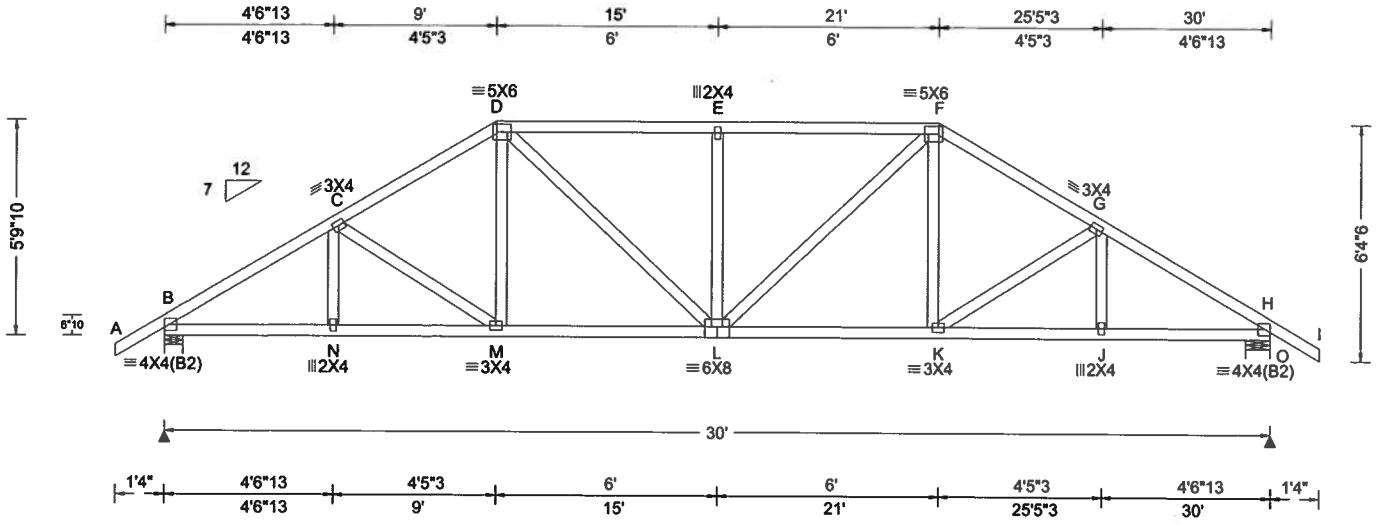
Suite 305
Orlando FL, 32821

SEQN: 569410 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** D02	Cust: R 215 JRef: 1WRZ2150004 T40 / DrwNo: 017.20.1126.19226 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.104	E	999	240
VERT(CL): 0.213	E	999	240
HORZ(LL): 0.048	J	-	-
HORZ(TL): 0.098	J	-	-

Creep Factor: 2.0
Max TC CSI: 0.581
Max BC CSI: 0.883
Max Web CSI: 0.236

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	1338	/-	/-	/782	/238	/174
O	1338	/-	/-	/782	/238	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.6
O Brg Width = 8.0 Min Req = 1.6
Bearings B & O are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	462	-1955	E - F	506	-1717
C - D	464	-1724	F - G	465	-1724
D - E	506	-1717	G - H	461	-1955

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - N	1601	-297	L - K	1438	-245
N - M	1601	-298	K - J	1601	-321
M - L	1438	-239	J - H	1601	-320

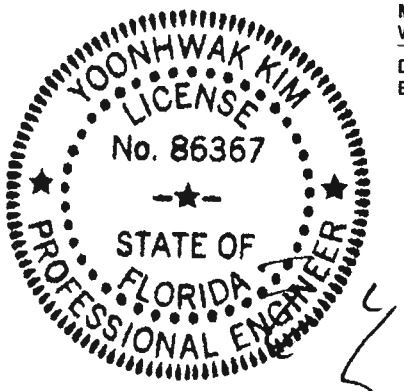
Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
D - L	378	-101	L - F	378	-101
E - L	157	-396			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 5-9-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

****WARNING**** READ AND FOLLOW ALL NOTES ON THIS DRAWING!
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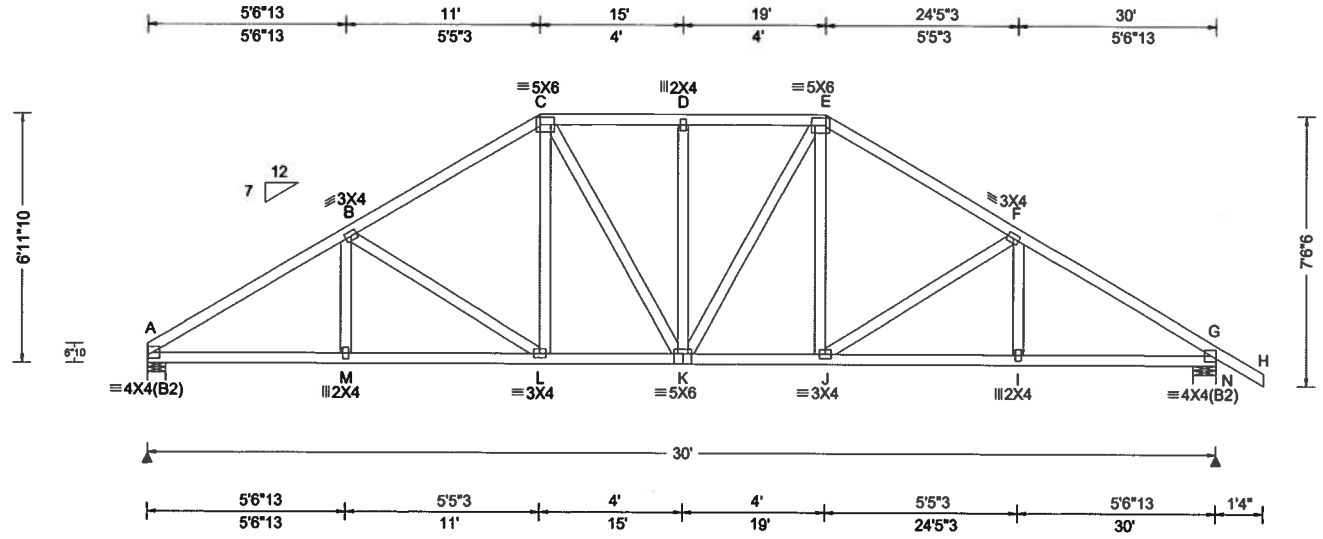
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569413 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** D03	Cust: R 215 JRef: 1WRZ2150004 T41 / DrwNo: 017.20.1126.19476 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.092	D	999	240
VERT(CL): 0.190	D	999	240
HORZ(LL): 0.048	I	-	-
HORZ(TL): 0.100	I	-	-

Creep Factor: 2.0
Max TC CSI: 0.602
Max BC CSI: 0.862
Max Web CSI: 0.304

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	1245	/-	/-	/714	/211	/189
N	1340	/-	/-	/790	/235	/-

Wind reactions based on MWFRS
A Brg Width = 6.0 Min Req = 1.5
N Brg Width = 8.0 Min Req = 1.6
Bearings A & N are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	466	-1980	D - E	441	-1395
B - C	448	-1608	E - F	440	-1604
C - D	441	-1395	F - G	452	-1965

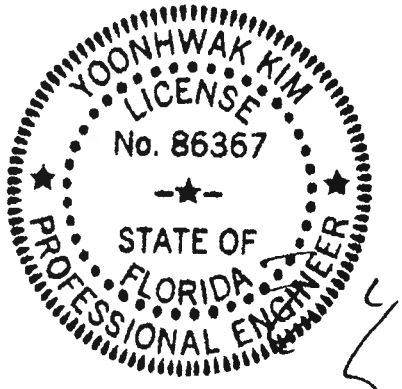
Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - M	1623	-307	K - J	1311	-193
M - L	1622	-308	J - I	1605	-304
L - K	1313	-189	I - G	1606	-304

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 6-11-10.



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01/17/2020

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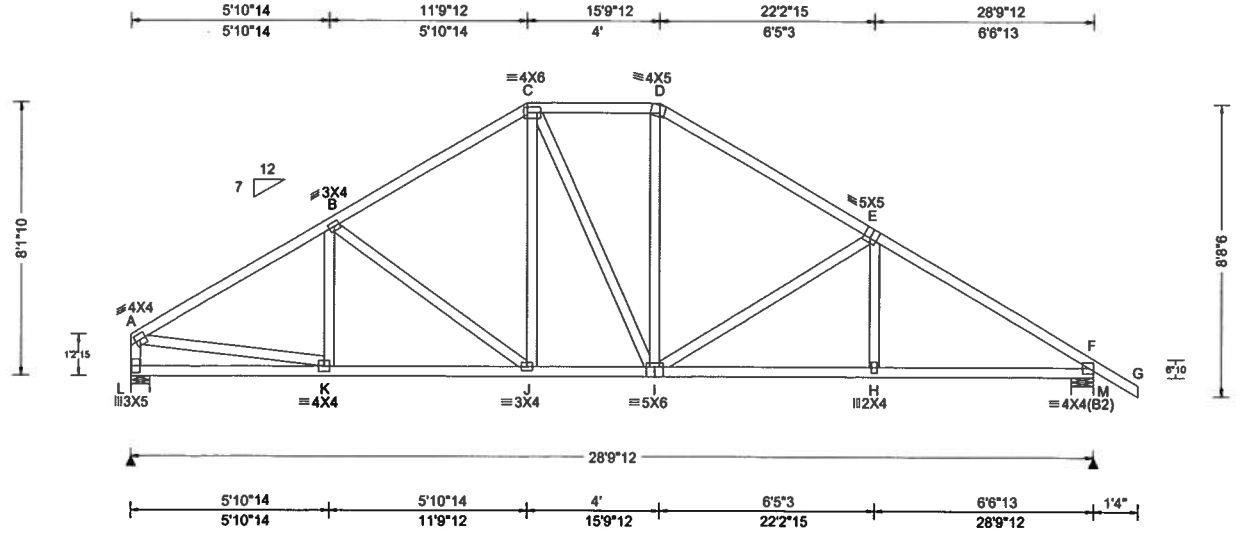
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569416 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** D04	Cust: R 215 JRef:1WRZ2150004 T16 / DrwNo: 017.20.1126.19396 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.068	H	999	240
VERT(CL): 0.141	H	999	240
HORZ(LL): 0.033	H	-	-
HORZ(TL): 0.069	H	-	-

Creep Factor: 2.0
Max TC CSI: 0.607
Max BC CSI: 0.769
Max Web CSI: 0.555

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
L	1193	/-	/-	/677	/200	/205
M	1293	/-	/-	/771	/224	/-

Wind reactions based on MWFRS
L Brg Width = 7.0 Min Req = 1.5
M Brg Width = 8.0 Min Req = 1.5
Bearings L & M are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	378	-1626	D - E	387	-1381
B - C	393	-1350	E - F	414	-1868
C - D	382	-1107			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
K - J	1340	-218	I - H	1514	-262
J - I	1075	-108	H - F	1516	-262

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - L	277	-1143	I - E	169	-488
A - K	1297	-243			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 8-1-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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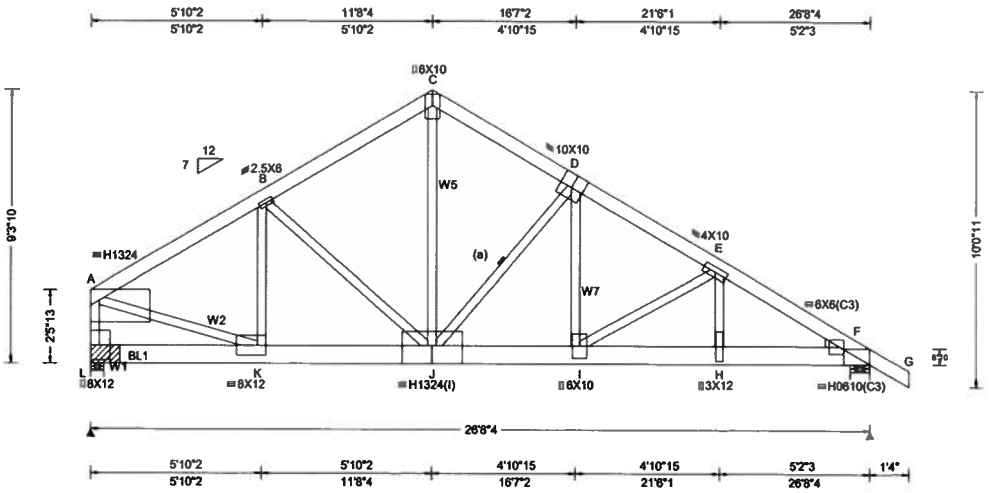
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 299664 SPEC FROM: CDM Page 1 of 2	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** D05	Cust: R 215 JRef: 1WRZ2150004 T60 DrwNo: 017.20.1129.59417 / YK 01/17/2020	

2 Complete Trusses Required



Loading Criteria (psf)	Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria
TCLL: 20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in loc L/defl L/#
TCDL: 10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): 0.178 I 999 240
BCLL: 0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): 0.355 I 896 240
BCDL: 10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.051 B - -
Des Ld: 40.00	EXP: C Kzt: NA		HORZ(TL): 0.103 B - -
NCBCLL: 0.00	Mean Height: 15.54 ft	**Code / Misc Criteria**	Creep Factor: 2.0
Soffit: 2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.354
Load Duration: 1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.706
Spacing: 24.0 "	MWFRS Parallel Dist: 0 to h/2	Rep Fac: No	Max Web CSI: 0.928
	C&C Dist a: 3.00 ft	FT/RT:20(0)/10(0)	
	Loc. from endwall: not in 13.00 ft	Plate Type(s):	
	GCpi: 0.18	HS, WAVE	VIEW Ver: 18.02.01B.0321.08
	Wind Duration: 1.60		

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity	
Loc	R+ / R-	/ Rh	/ Rw	/ U	/ RL
L	14155 /-	/-	/-	/2876	/-
F	11739 /-	/-	/-	/2373	/-

Wind reactions based on MWFRS
L Brg Width = 5.5 Min Req = -
F Brg Width = 8.0 Min Req = 4.9
Bearings L & F are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	1432	-6996	D - E	1724	-8515
B - C	1279	-6262	E - F	2120	-10494
C - D	1266	-6228			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
K - J	5969	-1217	I - H	8990	-1811
J - I	7248	-1464	H - F	9010	-1815

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
A - L	1158	-5617	J - D	582	-2908
A - K	6295	-1282	D - I	3349	-657
K - B	771	-126	I - E	388	-1948
B - J	168	-782	E - H	2012	-383
C - J	6038	-1201			

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x8 SP 2400f-2.0E;
Webs: 2x4 SP #3; W1,W7 2x4 SP #2; W2, W5 2x4 SP M-31;
Rt Wedge: 2x4 SP #3;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Nailnote

Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 2 Rows @ 3.50" o.c. (Each Row)
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads

——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	63 plf at	0.00 to	63 plf at	11.69
TC: From	32 plf at	11.69 to	32 plf at	22.69
TC: From	63 plf at	22.69 to	63 plf at	28.02
BC: From	20 plf at	0.00 to	20 plf at	2.25
BC: From	10 plf at	2.25 to	10 plf at	22.69
BC: From	20 plf at	22.69 to	20 plf at	26.69
BC: From	5 plf at	26.69 to	5 plf at	28.02

BC: 1800 lb Conc. Load at 0.25, 2.25, 4.25, 6.25
BC: 1743 lb Conc. Load at 8.25,10.25
BC: 2033 lb Conc. Load at 12.25
BC: 1719 lb Conc. Load at 12.75
BC: 1707 lb Conc. Load at 14.75
BC: 1771 lb Conc. Load at 16.75,18.75,20.75
BC: 2678 lb Conc. Load at 22.69

Plating Notes

(I) - plates so marked were sized using 0% Fabrication Tolerance, 0 degrees Rotational Tolerance, and/or zero Positioning Tolerance.

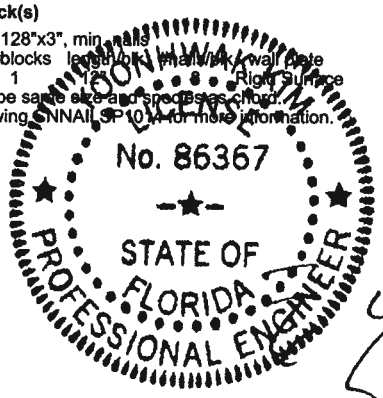
Wind

Wind loads and reactions based on MWFRS.

Left end vertical not exposed to wind pressure.

Bearing Block(s)

Brg blocks:0.128"x3", min. nails
brg x-loc #blocks length/blk thickness/blk wall plate
1 0.000' 1 12" 5.5" Rigid Surface
Brg block to be same size and species as chord.
Refer to drawing CNNAIL_SP101A for more information.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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Suite 305
Orlando FL, 32821

SEQN: 299664 SPEC FROM: CDM Page 2 of 2	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** D05	Cust: R 215 JRef: 1WRZ2150004 T60 DrwNo: 017.20.1129.59417 / YK 01/17/2020

Blocking

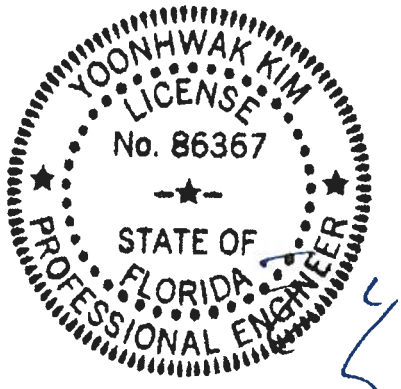
Full Height Blocking reinforcement required to prevent buckling of members over the bearings:
bearing 1 located at 0.0'

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 9-3-10.

It is the responsibility of the Building Designer and Truss Fabricator to review this drawing prior to cutting lumber to verify that all data, including dimensions and loads, conform to the architectural plans/specifications and fabricators truss layout.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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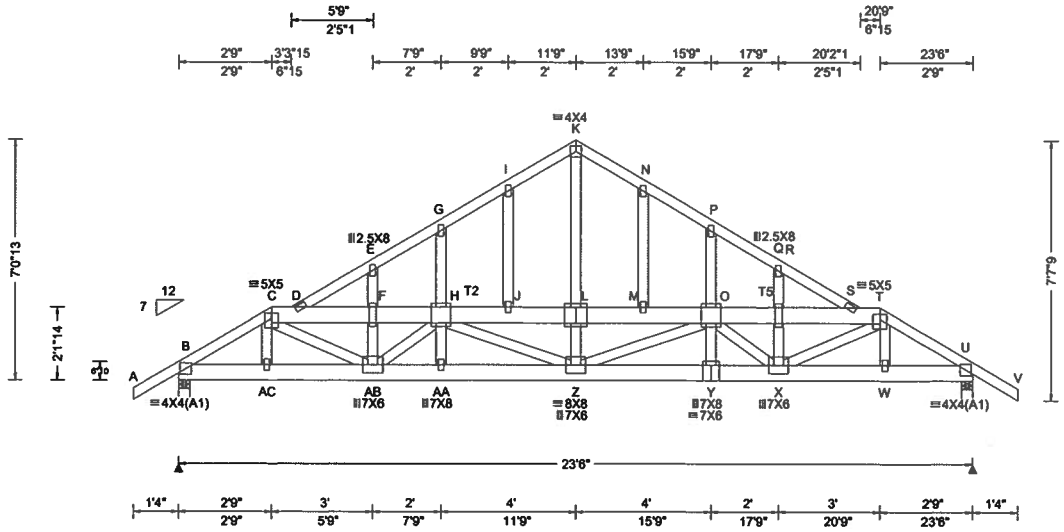
Suite 305
Orlando FL, 32821

SEQN: 569315 / COMN FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** G01	Cust: R 215 JRef: 1WRZ2150004 T6 / DrwNo: 017.20.1126.19256 / FV 01/17/2020



Loading Criteria (psf)

TCLL:	20.00
TCDL:	10.00
BCLL:	0.00
BCDL:	10.00
Des Ld:	40.00
NCBCLL:	10.00
Soffit:	2.00
Load Duration:	1.25
Spacing:	24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.062	N	999	240
VERT(CL): 0.123	N	999	240
HORZ(LL): 0.016	W	-	-
HORZ(TL): 0.032	W	-	-

Creep Factor: 2.0
Max TC CSI: 0.319
Max BC CSI: 0.215
Max Web CSI: 0.320

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	1361	/-	/-	/-	/307	/-
U	1361	/-	/-	/-	/307	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
U Brg Width = 4.0 Min Req = 1.5
Bearings B & U are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	410	-1908	K - N	224	-988
C - D	496	-2297	L - M	203	-936
D - E	241	-1054	M - O	202	-934
D - F	311	-1465	N - P	229	-1006
E - G	230	-1011	O - Q	313	-1468
F - H	313	-1468	P - R	230	-1011
G - I	229	-1006	Q - S	311	-1465
H - J	202	-934	R - S	241	-1054
I - K	224	-989	S - T	496	-2297
J - L	203	-936	T - U	410	-1908

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B -AC	1604	-338	Z - Y	2219	-486
AC-AB	1608	-344	Y - X	2219	-486
AB-AA	2218	-485	X - W	1608	-344
AA- Z	2218	-485	W - U	1604	-338

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
C -AB	839	-180	K - L	792	-142
H - Z	106	-534	Z - O	107	-536
L - Z	602	-72	X - T	813	-180

Lumber

Top chord: 2x4 SP #2; T2,T5 2x6 SP 2400f-2.0E;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3;

Laterally brace chord above/below filler at 24" OC (or as designed) including a lateral brace on chord directly above/ below both ends of filler (if no rigid diaphragm exists at that point)

Special Loads

-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	63 plf at	-1.33 to	63 plf at	2.75
TC: From	32 plf at	2.75 to	32 plf at	20.75
TC: From	63 plf at	20.75 to	63 plf at	24.83
BC: From	5 plf at	-1.33 to	5 plf at	0.00
BC: From	20 plf at	0.00 to	20 plf at	2.78
BC: From	10 plf at	2.78 to	10 plf at	20.72
BC: From	20 plf at	20.72 to	20 plf at	23.50
BC: From	5 plf at	23.50 to	5 plf at	24.83

TC: 96 lb Conc. Load at 2.78,20.72
TC: 63 lb Conc. Load at 4.81, 6.81, 8.81,10.81 12.69,14.69,16.69,18.69
BC: 120 lb Conc. Load at 2.78,20.72
BC: 50 lb Conc. Load at 4.81, 6.81, 8.81,10.81 12.69,14.69,16.69,18.69

Plating Notes

All plates are 2X4 except as noted.

Wind

Wind loads and reactions based on MWFRS.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 7-0-13.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

****WARNING**** READ AND FOLLOW ALL NOTES ON THIS DRAWING!
****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

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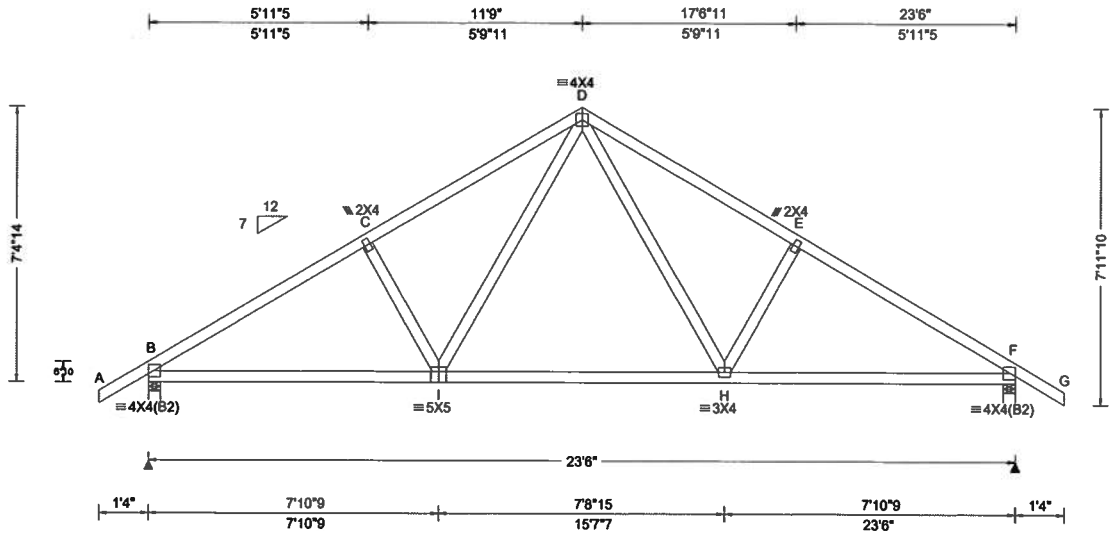
Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE ANITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569330 / COMN FROM: CDM	Ply: 1 Qty: 10	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** G02	Cust: R 215 JRef: 1WRZ2150004 T2 / DrwNo: 017.20.1126.19178 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.070	H	999	240
VERT(CL): 0.134	H	999	240
HORZ(LL): 0.035	H	-	-
HORZ(TL): 0.066	H	-	-

Creep Factor: 2.0
Max TC CSI: 0.540
Max BC CSI: 0.708
Max Web CSI: 0.209

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	1136	/-	/-	/637	/183	/215
F	1136	/-	/-	/637	/183	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
F Brg Width = 4.0 Min Req = 1.5
Bearings B & F are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	304	- 1602	D - E	342	- 1427
C - D	342	- 1425	E - F	304	- 1604

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - I	1294	- 160	H - F	1296	- 173
I - H	891	- 40			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
I - D	546	- 123	D - H	550	- 122

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Loading

Truss passed check for 20 psf additional bottom chord live load in areas with 42"-high x 24"-wide clearance.

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 7-4-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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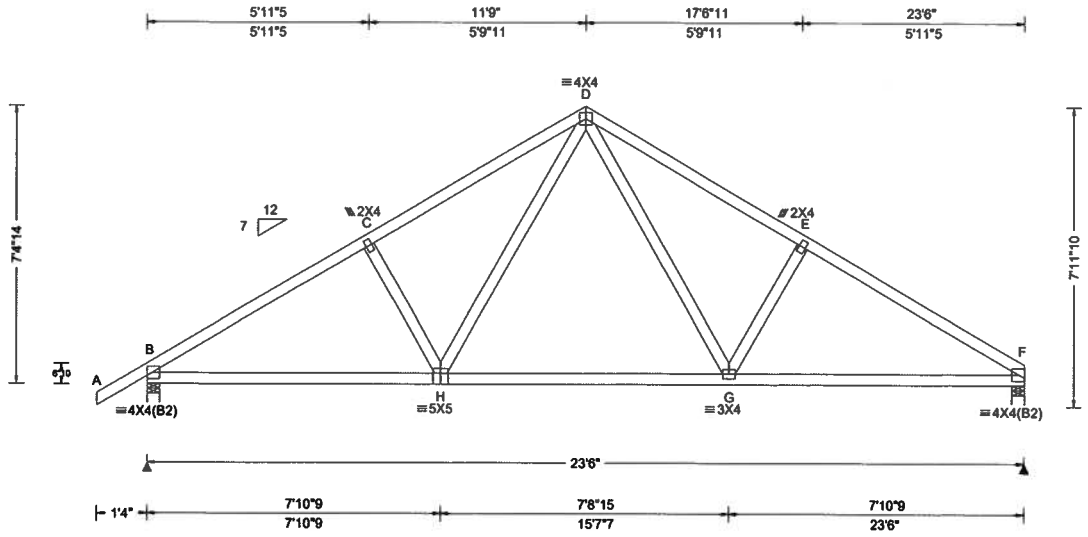
Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569333 / COMN FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** G03	Cust: R 215 JRef:1WRZ2150004 T3 / DrwNo: 017.20.1126.18944 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.068	H	999	240
VERT(CL): 0.132	H	999	240
HORZ(LL): 0.033	G	-	-
HORZ(TL): 0.063	G	-	-

Creep Factor: 2.0
Max TC CSI: 0.538
Max BC CSI: 0.706
Max Web CSI: 0.215

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	1138	/-	/-	/637	/17	/200
F	1043	/-	/-	/560	/11	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
F Brg Width = 4.0 Min Req = 1.5
Bearings B & F are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	308	- 1607	D - E	361	- 1442
C - D	347	- 1430	E - F	323	- 1619

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - H	1299	- 202	G - F	1313	- 206
H - G	896	- 70			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
H - D	545	- 121	D - G	565	- 127

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Loading

Truss passed check for 20 psf additional bottom chord live load in areas with 42"-high x 24"-wide clearance.

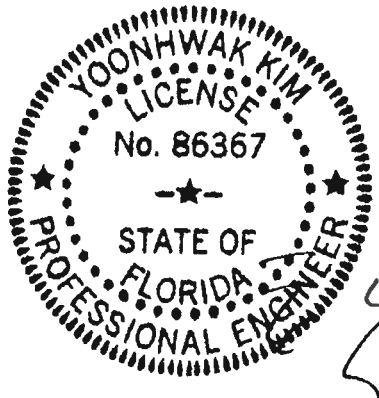
Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 7-4-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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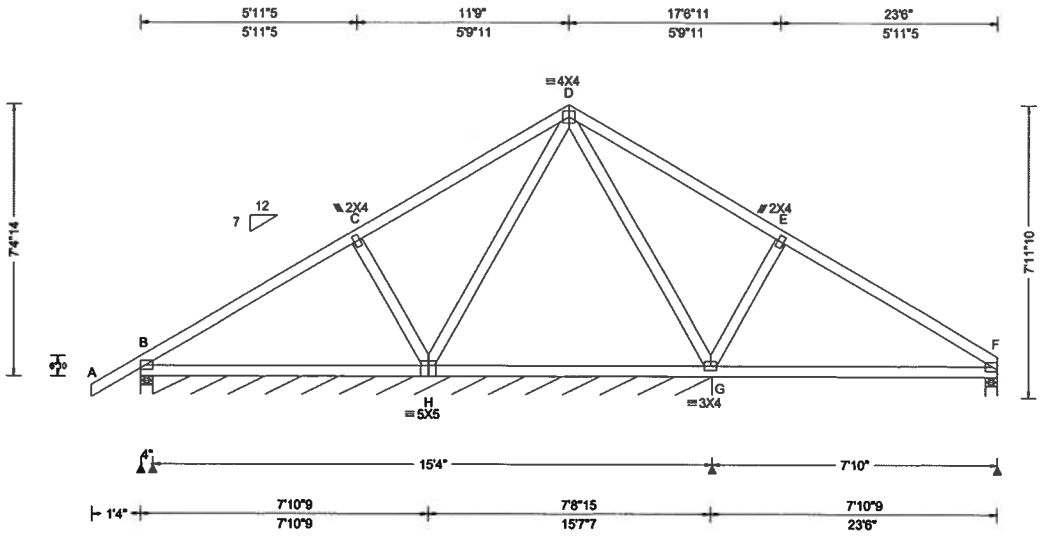
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569336 / COMN FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** G04	Cust: R 215 JRef: 1WRZ2150004 T4 / DrwNo: 017.20.1126.18897 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: > 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.001	C	999	240
VERT(CL): 0.004	G	999	240
HORZ(LL): -0.004	G	-	-
HORZ(TL): 0.009	G	-	-

Creep Factor: 2.0
Max TC CSI: 0.490
Max BC CSI: 0.619
Max Web CSI: 0.200

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs), or *=PLF

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	475	/-	/-	/303	/3	/200
B*	78	/-	/-	/40	/-	/-
F	386	/-	/-	/279	/11	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
B Brg Width = 184 Min Req = -
F Brg Width = 4.0 Min Req = 1.5
Bearings B, B, & F are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
E - F	119	-404

Maximum Web Forces Per Ply (lbs)

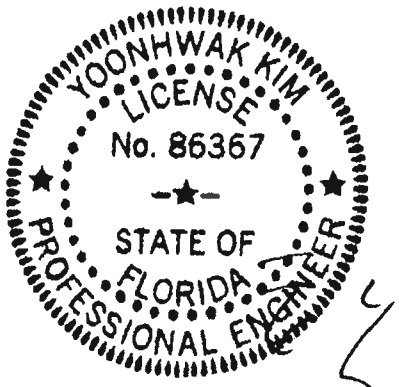
Webs	Tens.	Comp.	Webs	Tens.	Comp.
C - H	180	-377	G - E	183	-386

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes
All plates are 3X4(B2) except as noted.

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 7-4-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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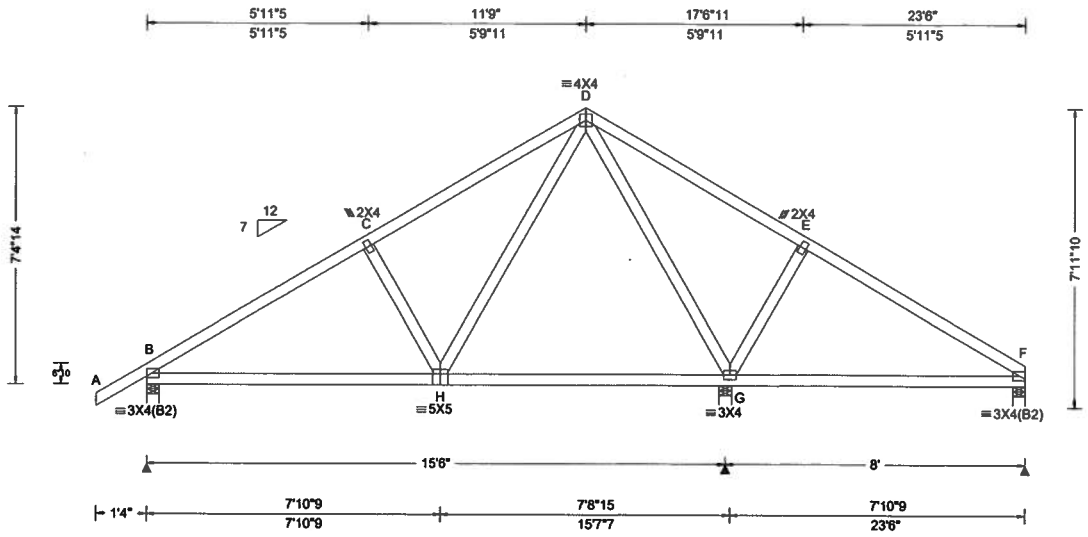
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569339 / COMN FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** G05	Cust: R 215 JRef:1WRZ2150004 T5 / DrwNo: 017.20.1126.18648 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: > 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.019	C	999	240
VERT(CL): 0.038	C	999	240
HORZ(LL): 0.007	G	-	-
HORZ(TL): 0.014	G	-	-

Creep Factor: 2.0
Max TC CSI: 0.499
Max BC CSI: 0.633
Max Web CSI: 0.746

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	736	/-	/-	/470	/14	/200
G	1000	/-	/-	/498	/-	/-
F	360	/-	/-	/253	/31	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
G Brg Width = 4.0 Min Req = 1.5
F Brg Width = 4.0 Min Req = 1.5
Bearings B, G, & F are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	191	-858	C - D	230	-682

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - H	666	-104

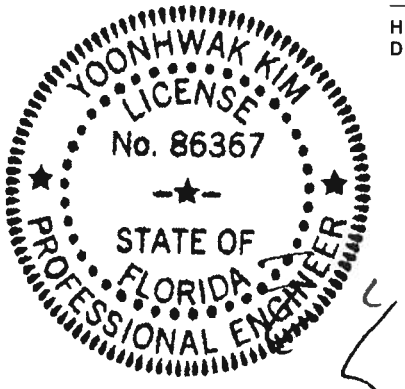
Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
H - D	531	-143	G - E	184	-391
D - G	84	-587			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 7-4-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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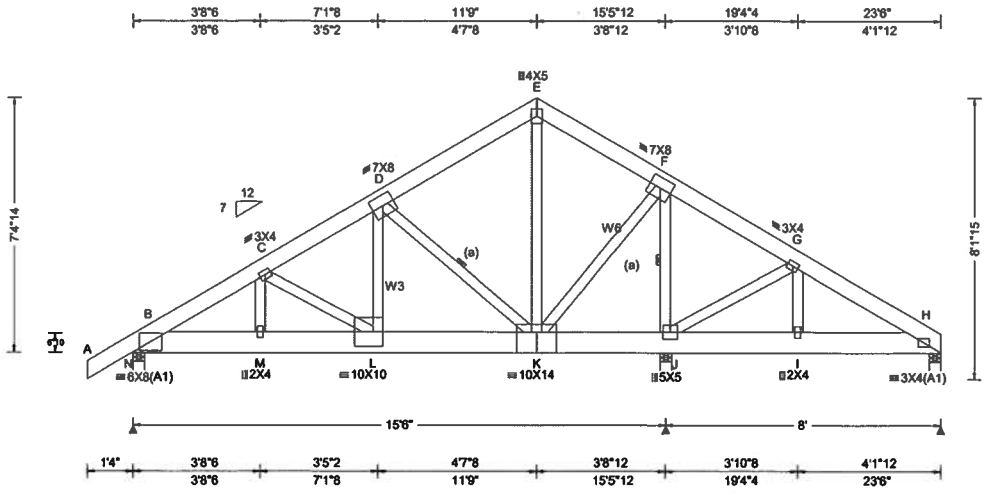
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569404 / COMN FROM: CDM Page 1 of 2	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** G06	Cust: R 215 JRef:1WRZ2150004 T54 / DrwNo: 017.20.1126.18835 / FV 01/17/2020

2 Complete Trusses Required



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: No
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.072	L	999	240
VERT(CL): 0.144	L	999	240
HORZ(LL): 0.021	C	-	-
HORZ(TL): 0.042	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.153
Max BC CSI: 0.541
Max Web CSI: 0.777

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
N	5416	/-	/-	/-	/1095	/-
J	10254	/-	/-	/-	/1615	/-
H	-	/-244	/-	/15	/-	/-

Wind reactions based on MWFRS
N Brg Width = 4.0 Min Req = 2.2
J Brg Width = 4.0 Min Req = 3.9
H Brg Width = 4.0 Min Req = 1.5
Bearings N, J, & H are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	946	-4733	D - E	399	-2187
C - D	997	-4969	E - F	405	-2204

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - M	4038	-803	L - K	4133	-824
M - L	4042	-804			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
L - D	3360	-703	K - F	3133	-578
D - K	650	-3025	F - J	717	-3735
E - K	2040	-344			

Lumber

Top chord: 2x6 SP 2400f-2.0E;
Bot chord: 2x8 SP 2400f-2.0E;
Webs: 2x4 SP #3; W3,W6 2x4 SP #2;

Bracing

(a) Continuous lateral restraint equally spaced on member.

Nailnote

Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 2 Rows @ 5.00" o.c. (Each Row)
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads

——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	63 plf at	-1.33 to	63 plf at	7.13
TC: From	32 plf at	7.13 to	32 plf at	11.75
TC: From	63 plf at	11.75 to	63 plf at	23.50
BC: From	5 plf at	-1.33 to	5 plf at	0.00
BC: From	20 plf at	0.00 to	20 plf at	7.13
BC: From	10 plf at	7.13 to	10 plf at	15.06
BC: From	20 plf at	15.06 to	20 plf at	23.50

BC: 5476 lb Conc. Load at 7.13
BC: 2127 lb Conc. Load at 9.06,11.06,13.06
BC: 1888 lb Conc. Load at 15.06

Wind

Wind loads and reactions based on MWFRS.

Blocking

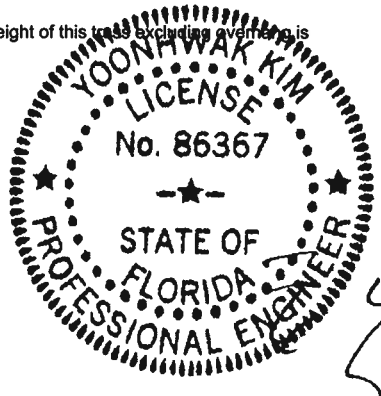
Full Height Blocking reinforcement required to prevent buckling of members over the bearings: bearing 2 located at 15.3'

Additional Notes

Refer to General Notes for additional information

Negative reaction(s) of -244# MAX. from a non-wind load case requires uplift connection. See Maximum Reactions.

The overall height of this truss excluding overhang is 7-4-14.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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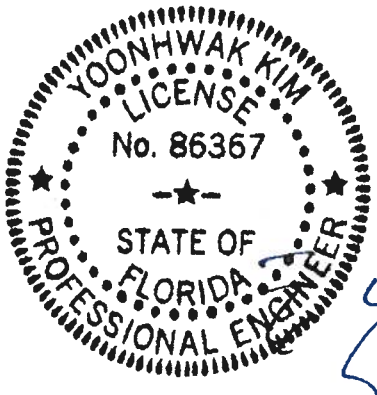
6750 Forum Drive
Suite 305
Orlando FL, 32821

WARNING! This truss is not symmetric, but its exterior geometry makes erection error more probable. It is imperative that this truss be installed properly.

It is the responsibility of the Building Designer and Truss Fabricator to review this drawing prior to cutting lumber to verify that all data, including dimensions and loads, conform to the architectural plans/specifications and fabricators truss layout.



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01/17/2020

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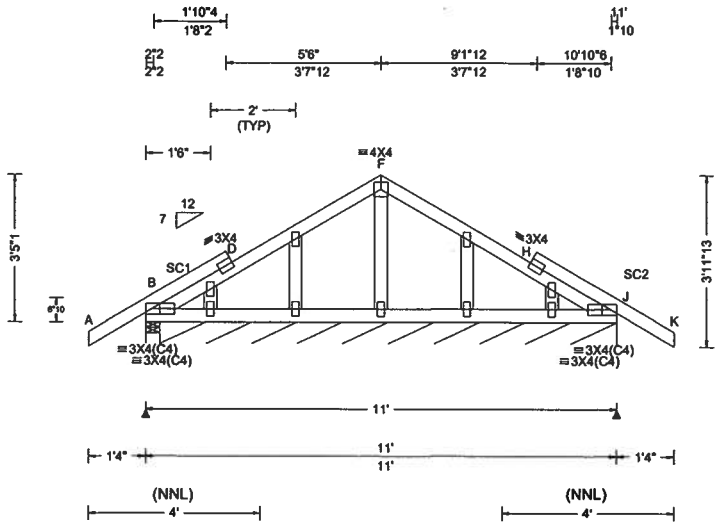
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569396 / GABL FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** H01	Cust: R 215 JRef: 1WRZ2150004 T10 / DrwNo: 017.20.1126.18898 / FV 01/17/2020



Loading Criteria (psf)	Wind Criteria	Snow Criteria (Pg,Pf in PSF)	Defl/CSI Criteria	▲Maximum Reactions (lbs), or *=PLF
TCLL: 20.00 TCDL: 10.00 BCLL: 0.00 BCDL: 10.00 Des Ld: 40.00 NCBCLL: 10.00 Soffit: 2.00 Load Duration: 1.25 Spacing: 24.0 "	Wind Std: ASCE 7-10 Speed: 130 mph Enclosure: Closed Risk Category: II EXP: C Kzt: NA Mean Height: 15.00 ft TCDL: 5.0 psf BCDL: 5.0 psf MWFRS Parallel Dist: 0 to h/2 C&C Dist a: 3.00 ft Loc. from endwall: Any GCpi: 0.18 Wind Duration: 1.60	Pg: NA Ct: NA CAT: NA Pf: NA Ce: NA Lu: NA Cs: NA Snow Duration: NA **Code / Misc Criteria** Bldg Code: FBC 2017 RES TPI Std: 2014 Rep Fac: Yes FT/RT:20(0)/10(0) Plate Type(s): WAVE	PP Deflection in loc L/defl L/# VERT(LL): 0.001 L 999 240 VERT(CL): 0.002 L 999 240 HORZ(LL): 0.001 H - - HORZ(TL): 0.001 H - - Creep Factor: 2.0 Max TC CSI: 0.163 Max BC CSI: 0.056 Max Web CSI: 0.030 VIEW Ver: 18.02.01B.0321.08	Gravity / Non-Gravity Loc R+ / R- / Rh / Rw / U / RL B 204 /- /- /135 /41 /119 J* 84 /- /- /47 /14 /- Wind reactions based on MWFRS B Brg Width = 4.0 Min Req = 1.5 J Brg Width = 127 Min Req = - Bearings B & B are a rigid surface. Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;
Stack Chord: SC1 2x4 SP #2;
Stack Chord: SC2 2x4 SP #2;

Plating Notes

All plates are 2X4 except as noted.

Wind

Wind loads based on MWFRS with additional C&C member design.

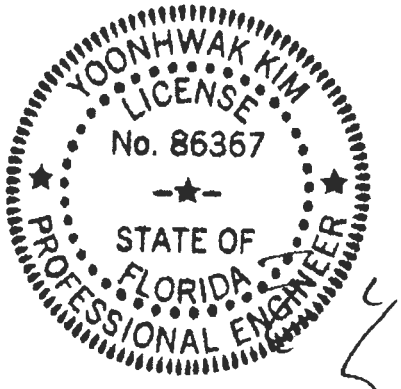
Additional Notes

Refer to General Notes for additional information

See DWGS A14015ENC101014 & GBLLETIN0118 for gable wind bracing and other requirements.

Stacked top chord must NOT be notched or cut in area (NNL). Attach stacked top chord (SC) to dropped top chord in notchable area using 3x4 tie-plates 24" oc. Center plate on stacked/dropped chord interface, plate length perpendicular to chord length. Splice top chord in notchable area using 3x6.

The overall height of this truss excluding overhang is 3-5-1.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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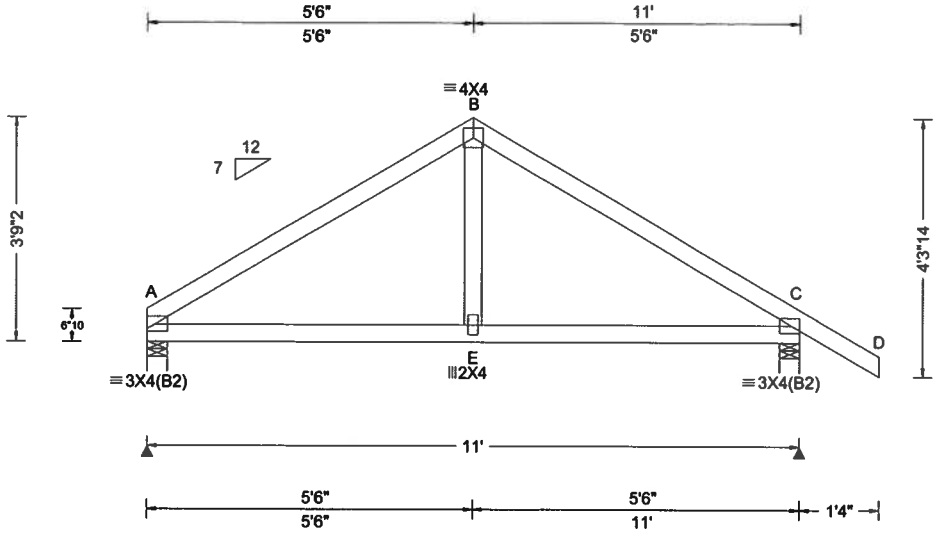
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569398 / COMN FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** H02	Cust: R 215 JRef: 1WRZ2150004 T1 / DrwNo: 017.20.1126.19085 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.007	E	999	240
VERT(CL): 0.013	E	999	240
HORZ(LL): 0.003	E	-	-
HORZ(TL): 0.007	E	-	-

Creep Factor: 2.0
Max TC CSI: 0.300
Max BC CSI: 0.304
Max Web CSI: 0.091

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	451	/-	/-	/261	/72	/106
C	554	/-	/-	/341	/98	/-

Wind reactions based on MWFRS
A Brg Width = 4.0 Min Req = 1.5
C Brg Width = 4.0 Min Req = 1.5
Bearings A & C are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	175	-550	B - C	177	-554

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - E	404	-47	E - C	404	-47

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 3-9-2.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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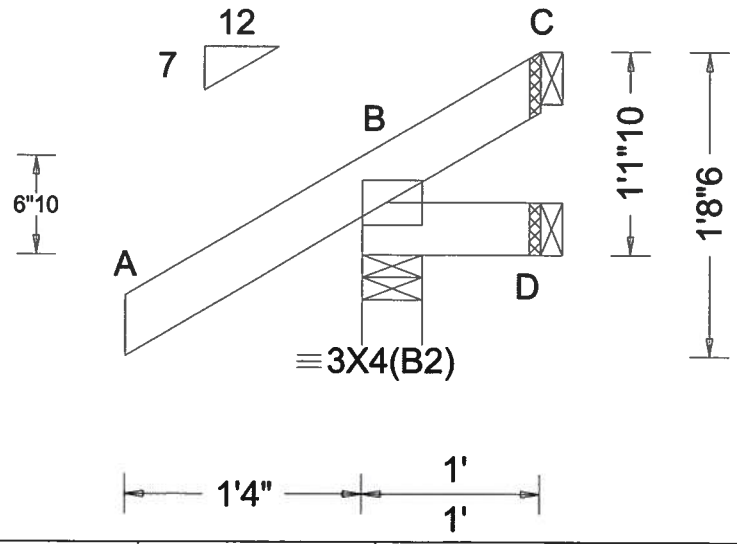
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569251 / JACK FROM: CDM	Ply: 1 Qty: 15	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J01	Cust: R 215 JRef: 1WRZ2150004 T7 / DrwNo: 017.20.1126.19507 / FV 01/17/2020



Loading Criteria (psf)	**Wind Criteria**	**Snow Criteria** (Pg,Pf in PSF)	**Defl/CSI Criteria**
TCLL: 20.00 TCDL: 10.00 BCLL: 0.00 BCDL: 10.00 Des Ld: 40.00 NCBCLL: 10.00 Soffit: 2.00 Load Duration: 1.25 Spacing: 24.0 "	Wind Std: ASCE 7-10 Speed: 130 mph Enclosure: Closed Risk Category: II EXP: C Kzt: NA Mean Height: 15.00 ft TCDL: 5.0 psf BCDL: 5.0 psf MWFRS Parallel Dist: 0 to h/2 C&C Dist a: 3.00 ft Loc. from endwall: Any GCpi: 0.18 Wind Duration: 1.60	Pg: NA Ct: NA CAT: NA Pf: NA Ce: NA Lu: NA Cs: NA Snow Duration: NA **Code / Misc Criteria** Bldg Code: FBC 2017 RES TPI Std: 2014 Rep Fac: Yes FT/RT:20(0)/10(0) Plate Type(s): WAVE	PP Deflection in loc L/defl L/# VERT(LL): NA VERT(CL): NA HORZ(LL): -0.001 C - - HORZ(TL): 0.001 C - - Creep Factor: 2.0 Max TC CSI: 0.142 Max BC CSI: 0.022 Max Web CSI: 0.000 VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	206	/-	/-	/163	/45	/38
D	13	/-2	/-	/14	/6	/-
C	-	/-30	/-	/22	/36	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

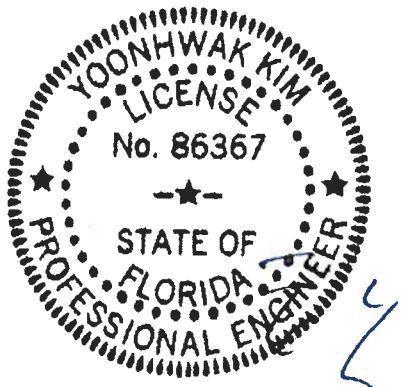
Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 1-1-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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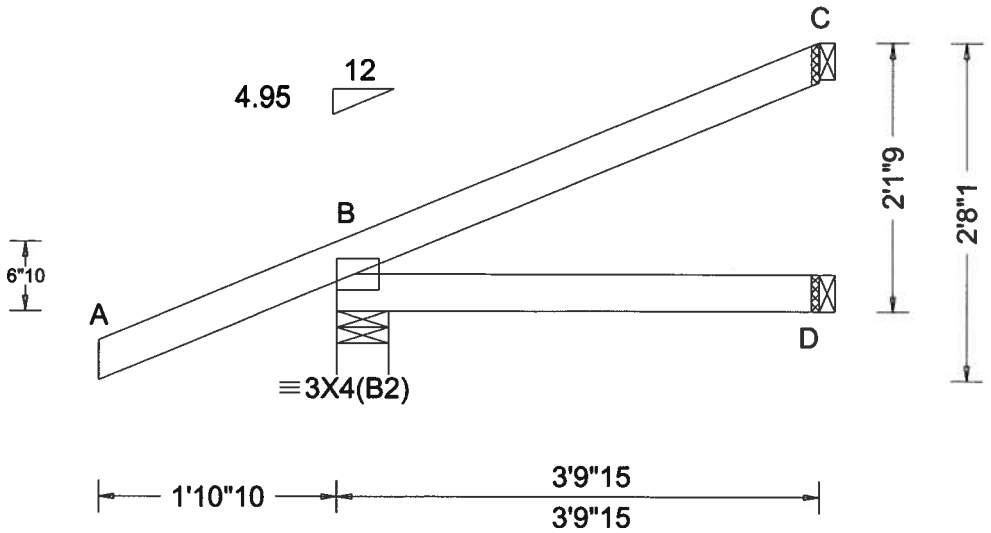
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569269 / HIP_ FROM: CDM	Ply: 1 Qty: 3	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J02	Cust: R215 JRef:1WRZ2150004 T9 / DrwNo: 017.20.1126.19615 / FV 01/17/2020



Loading Criteria (psf)
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TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): -0.001 C - -
HORZ(TL): 0.002 C - -
Creep Factor: 2.0
Max TC CSI: 0.118
Max BC CSI: 0.149
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	182	/-	/-	/-	/75	/-
D	69	/-	/-	/-	/2	/-
C	33	/-11	/-	/-	/16	/-

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Special Loads
------(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 0 plf at -1.89 to 62 plf at 0.00
TC: From 2 plf at 0.00 to 2 plf at 3.83
BC: From 0 plf at -1.89 to 4 plf at 0.00
BC: From 2 plf at 0.00 to 2 plf at 3.83
TC: -26 lb Conc. Load at 1.41
BC: 27 lb Conc. Load at 1.41

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-1-9.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

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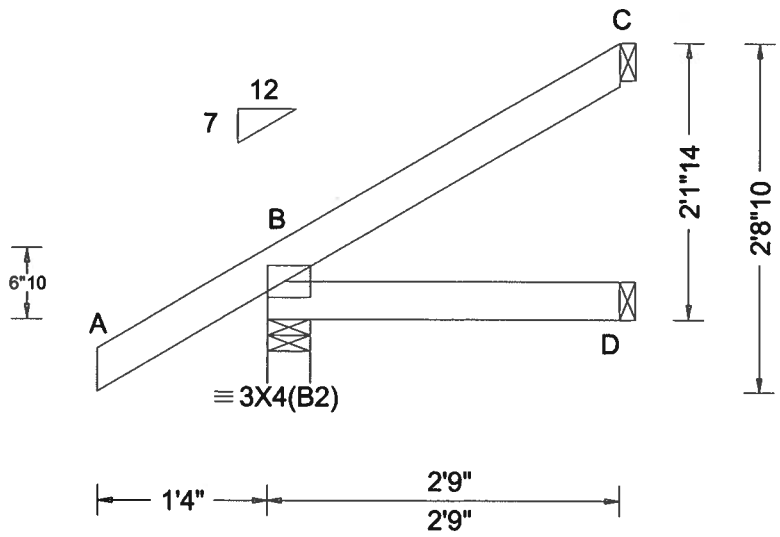
Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing,any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation and bracing of trusses**A seal on this drawing or cover page listing this drawing, indicates acceptance of professional engineering responsibility solely for the design shown. The suitability and use of this drawing for any structure is the responsibility of the Building Designer per ANSI/TPI 1 Sec.2.**

For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569260 / EJAC FROM: CDM	Ply: 1 Qty: 15	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J03	Cust: R 215 JRef: 1WRZ2150004 T8 / DrwNo: 017.20.1126.19225 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.000	D	-	-
HORZ(TL): 0.001	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.142
Max BC CSI: 0.075
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	232	/-	/-	/170	/32	/67
D	50	/-	/-	/36	/-	/-
C	63	/-	/-	/27	/30	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-1-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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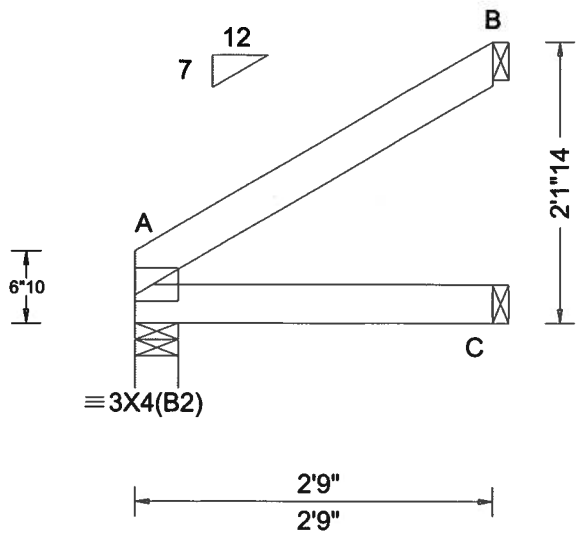
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569261 / EJAC FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J04	Cust: R 215 JRef: 1WRZ2150004 T13 / DrwNo: 017.20.1126.18679 / FV 01/17/2020



Loading Criteria (psf)	**Wind Criteria**	**Snow Criteria** (Pg,Pf in PSF)	**Defl/CSI Criteria**
TCLL: 20.00 TCDL: 10.00 BCLL: 0.00 BCDL: 10.00 Des Ld: 40.00 NCBCLL: 10.00 Soffit: 2.00 Load Duration: 1.25 Spacing: 24.0 "	Wind Std: ASCE 7-10 Speed: 130 mph Enclosure: Closed Risk Category: II EXP: C Kzt: NA Mean Height: 15.00 ft TCDL: 5.0 psf BCDL: 5.0 psf MWFRS Parallel Dist: h/2 to h C&C Dist a: 3.00 ft Loc. from endwall: not in 9.00 ft GCpi: 0.18 Wind Duration: 1.60	Pg: NA Ct: NA CAT: NA Pf: NA Ce: NA Lu: NA Cs: NA Snow Duration: NA **Code / Misc Criteria** Bldg Code: FBC 2017 RES TPI Std: 2014 Rep Fac: Yes FT/RT:20(0)/10(0) Plate Type(s): WAVE	PP Deflection in loc L/defl L/# VERT(LL): NA VERT(CL): NA HORZ(LL): 0.001 C - - HORZ(TL): 0.002 C - - Creep Factor: 2.0 Max TC CSI: 0.115 Max BC CSI: 0.083 Max Web CSI: 0.000 VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	117	/-	/-	/75	/1	/45
C	53	/-	/-	/37	/-	/-
B	81	/-	/-	/43	/36	/-

Wind reactions based on MWFRS
A Brg Width = 4.0 Min Req = 1.5
C Brg Width = 1.5 Min Req = -
B Brg Width = 1.5 Min Req = -
Bearing A is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 2-1-14.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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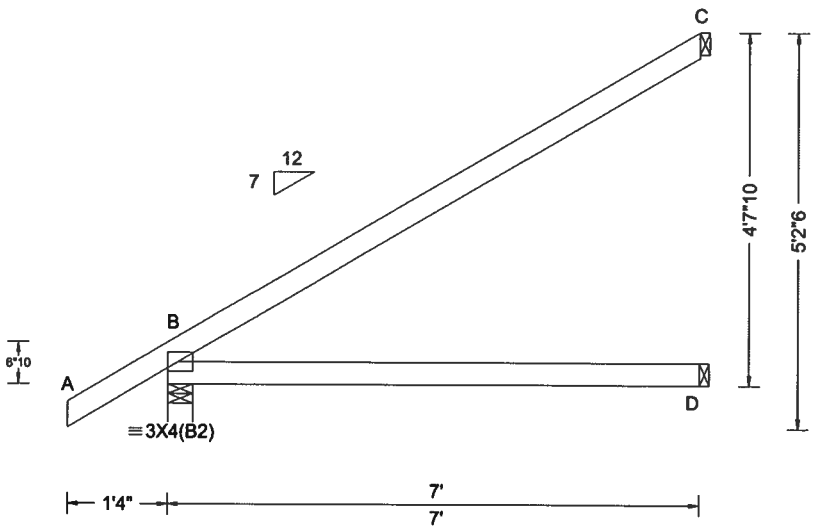
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569255 / EJAC FROM: CDM	Ply: 1 Qty: 35	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J05	Cust: R 215 JRef: 1WRZ2150004 T28 / DrwNo: 017.20.1126.19070 / FV 01/17/2020



Loading Criteria (psf)	**Wind Criteria**	**Snow Criteria** (Pg,Pf in PSF)	**Defl/CSI Criteria**
TCLL: 20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in loc L/defl L/#
TCDL: 10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): NA
BCLL: 0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): NA
BCDL: 10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.012 D - -
Des Ld: 40.00	EXP: C Kzt: NA		HORZ(TL): 0.023 D - -
NCBCLL: 10.00	Mean Height: 15.00 ft	**Code / Misc Criteria**	Creep Factor: 2.0
Soffit: 2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.807
Load Duration: 1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.553
Spacing: 24.0 "	MWFRS Parallel Dist: 0 to h/2	Rep Fac: Yes	Max Web CSI: 0.000
	C&C Dist a: 3.00 ft	FT/RT:20(0)/10(0)	
	Loc. from endwall: not in 4.50 ft	Plate Type(s):	
	GCpi: 0.18	WAVE	VIEW Ver: 18.02.01B.0321.08
	Wind Duration: 1.60		

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	394	/-	/-	/272	/36	/138
D	134	/-	/-	/93	/-	/-
C	199	/-	/-	/103	/84	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

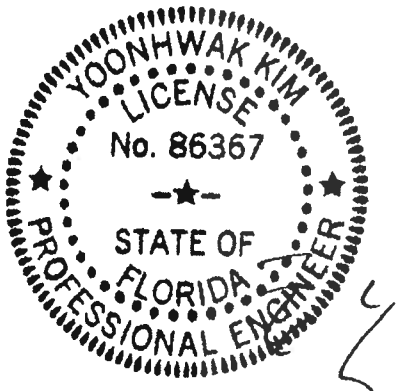
Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 4-7-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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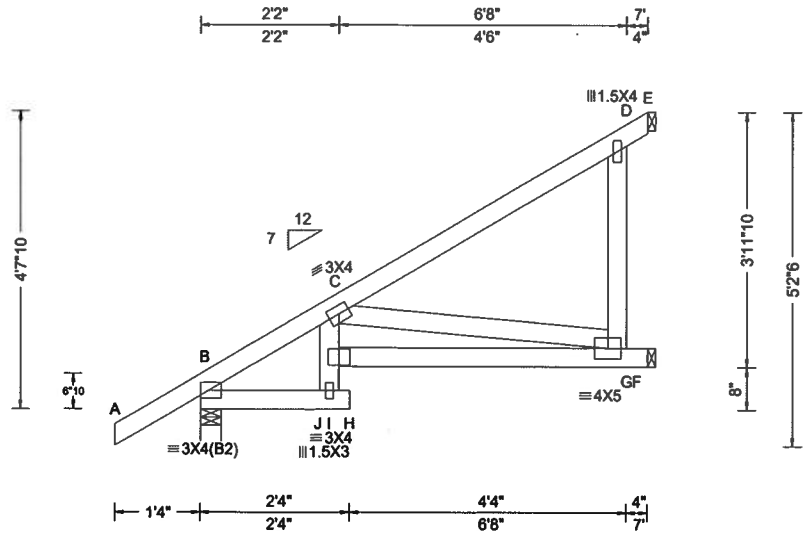
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571157 / EJAC FROM: CDM	Ply: 1 Qty: 5	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J06	Cust: R 215 JRef:1WRZ2150004 T38 / DrwNo: 017.20.1126.19319 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.031	H	999	240
VERT(CL): 0.061	H	999	240
HORZ(LL): 0.016	G	-	-
HORZ(TL): 0.032	G	-	-

Creep Factor: 2.0
Max TC CSI: 0.322
Max BC CSI: 0.349
Max Web CSI: 0.918

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	394	/-	/-	/272	/36	/138
F	243	/-	/-	/121	/111	/-
E	136	/-	/-	/107	/2	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
F Brg Width = 1.5 Min Req = -
E Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - C	18	-376

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
I - G	521	-270

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.
C - G	268	-517

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 4-7-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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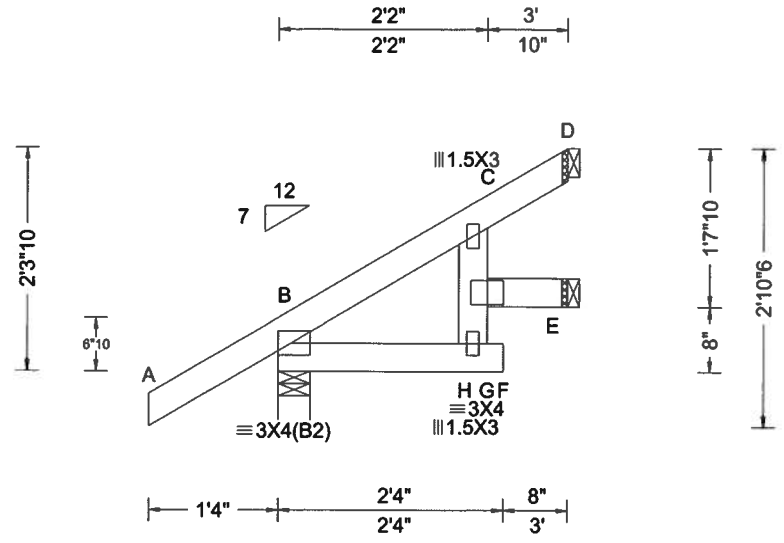
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571152 / JACK FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J07	Cust: R 215 JRef: 1WRZ2150004 T37 / DrwNo: 017.20.1126.18758 / FV 01/17/2020



Loading Criteria (psf)		**Wind Criteria**	**Snow Criteria** (Pg,Pf in PSF)	**Defl/CSI Criteria**				
TCLL:	20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in	loc	L/defl	L/#	
TCDL:	10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): 0.005	F	999	240	
BCLL:	0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): 0.010	F	999	240	
BCDL:	10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.003	C	-	-	
Des Ld:	40.00	EXP: C Kzt: NA	**Code / Misc Criteria**	HORZ(TL): 0.005	C	-	-	
NCBCLL:	10.00	Mean Height: 15.00 ft	Bldg Code: FBC 2017 RES	Creep Factor: 2.0				
Soffit:	2.00	TCDL: 5.0 psf	TPI Std: 2014	Max TC CSI: 0.149				
Load Duration:	1.25	BCDL: 5.0 psf	Rep Fac: Yes	Max BC CSI: 0.044				
Spacing:	24.0 "	MWFRS Parallel Dist: 0 to h/2	FT/RT:20(0)/10(0)	Max Web CSI: 0.033				
		C&C Dist a: 3.00 ft	Plate Type(s):					
		Loc. from endwall: Any	WAVE	VIEW Ver: 18.02.01B.0321.08				
		GCpi: 0.18						
		Wind Duration: 1.60						

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	241	/-	/-	/175	/31	/71
E	23	/-	/-	/18	/2	/-
D	83	/-	/-	/51	/28	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

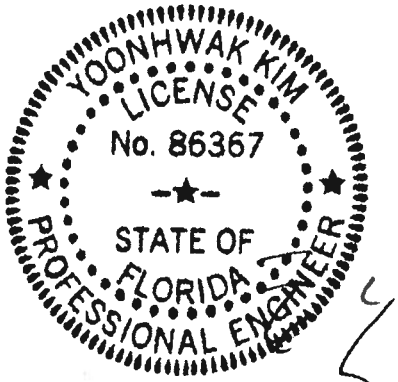
Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 2-3-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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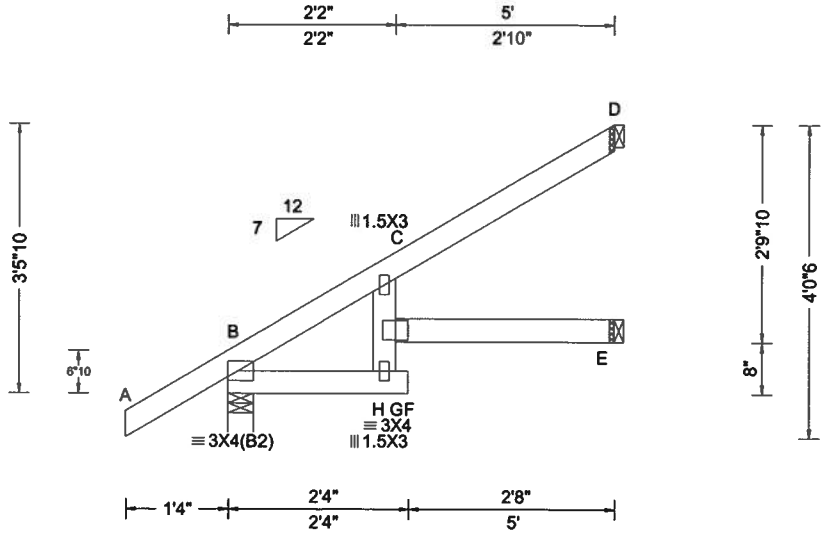
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
ANITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571154 / JACK FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J08	Cust: R 215 JRef: 1WRZ2150004 T36 / DrwNo: 017.20.1126.18913 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.060	F	987	240
VERT(CL): 0.120	F	494	240
HORZ(LL): 0.037	C	-	-
HORZ(TL): 0.073	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.456
Max BC CSI: 0.136
Max Web CSI: 0.124

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	315	/-	/-	/222	/33	/105
E	66	/-	/-	/46	/1	/-
D	149	/-	/-	/87	/56	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 3-5-10.

YOONHWAK KIM
LICENSE
No. 86367
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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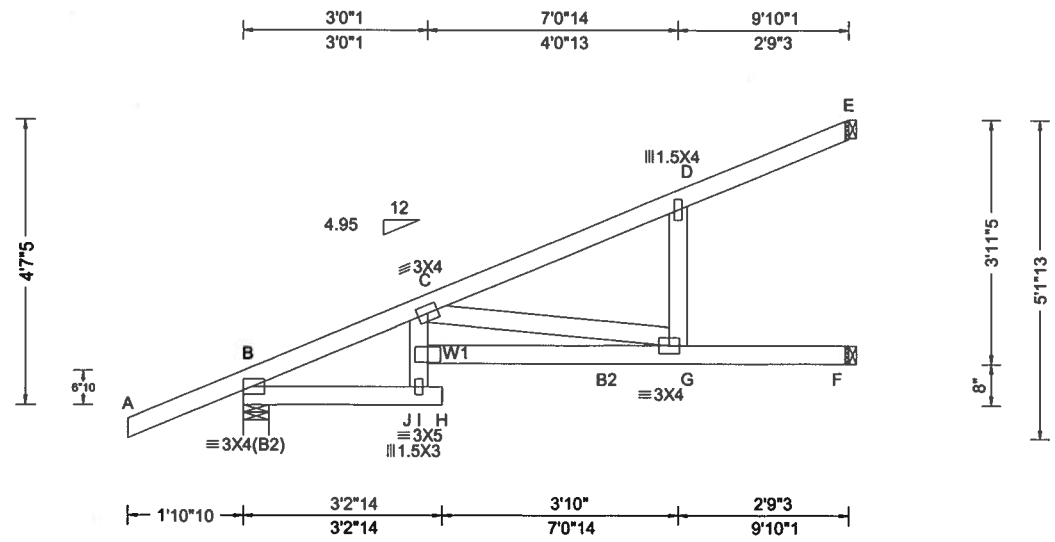
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571159 / HIP_ FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J09	Cust: R 215 JRef:1WRZ2150004 T39 / DrwNo: 017.20.1126.18726 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.238	D	492	240
VERT(CL): 0.476	D	246	240
HORZ(LL): 0.102	D	-	-
HORZ(TL): 0.203	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.565
Max BC CSI: 0.660
Max Web CSI: 0.422

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity		Non-Gravity		
Loc	R+ / R-	/ Rh	/ Rw	/ U	/ RL
B	359 /-	/-	/-	/147	/-
F	221 /-	/-	/-	/55	/-
E	194 /-	/-	/-	/44	/-

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
F Brg Width = 1.5 Min Req = -
E Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - C	204	-591

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - J	540	-174	I - G	999	-318

Maximum Web Forces Per Ply (lbs)

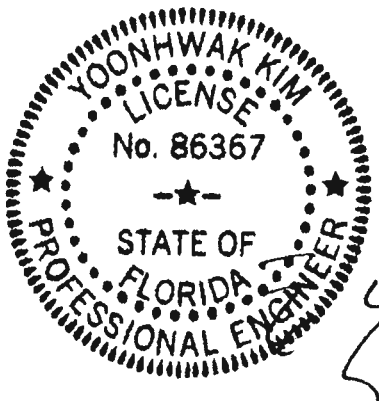
Webs	Tens.	Comp.
C - G	310	-965

Lumber
Top chord: 2x4 SP M-31;
Bot chord: 2x4 SP #2; B2 2x4 SP M-31;
Webs: 2x4 SP #3; W1 2x4 SP M-31;

Special Loads
-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 0 plf at -1.89 to 62 plf at 0.00
TC: From 2 plf at 0.00 to 2 plf at 9.84
BC: From 0 plf at -1.89 to 4 plf at 0.00
BC: From 2 plf at 0.00 to 2 plf at 9.84
TC: -26 lb Conc. Load at 1.41
TC: 165 lb Conc. Load at 4.24
TC: 299 lb Conc. Load at 7.07
BC: 27 lb Conc. Load at 1.41
BC: 47 lb Conc. Load at 4.24
BC: 133 lb Conc. Load at 7.07

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-5.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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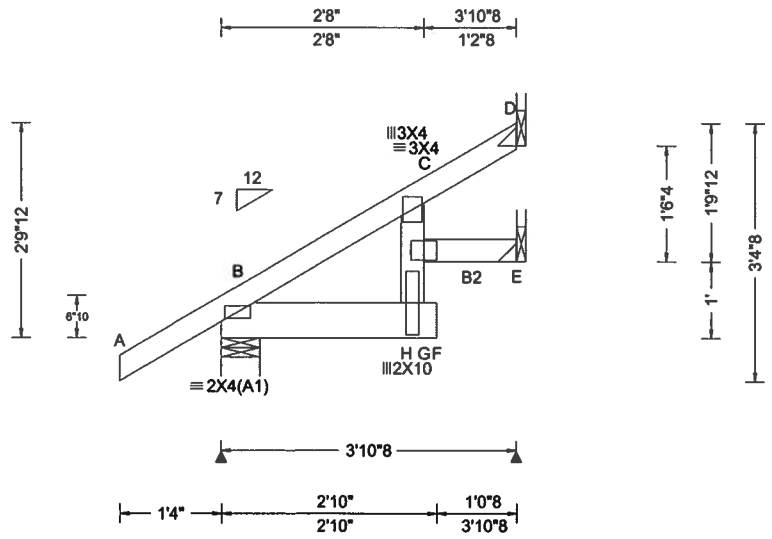
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571175 / JACK FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J10	Cust: R 215 JRef: 1WRZ2150004 T67 / DrwNo: 017.20.1126.19194 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.080	F	556	240
VERT(CL): 0.160	F	278	240
HORZ(LL): 0.049	C	-	-
HORZ(TL): 0.098	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.653
Max BC CSI: 0.317
Max Web CSI: 0.374

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	927	/-	/-	/-	/190	/-
E	86	/-	/-	/-	/8	/-
D	650	/-	/-	/-	/122	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
E Brg Width = - Min Req = -
D Brg Width = - Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Web Forces Per Ply (lbs)

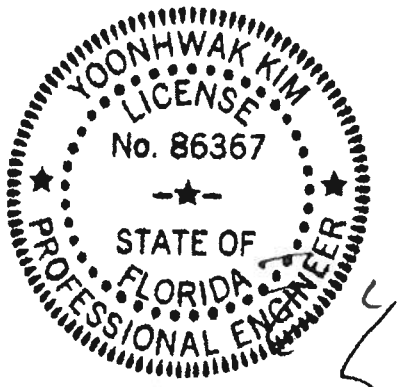
Webs	Tens.	Comp.	Webs	Tens.	Comp.
H - C	887	- 135	H - G	953	- 153

Lumber
Top chord: 2x4 SP M-31;
Bot chord: 2x6 SP 2400f-2.0E; B2 2x4 SP #2;
Webs: 2x4 SP #2;

Special Loads
——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at -1.33 to 63 plf at 3.87
BC: From 5 plf at -1.33 to 5 plf at 0.00
BC: From 20 plf at 0.00 to 20 plf at 3.87
BC: 1251 lb Conc. Load at 1.94

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-9-12.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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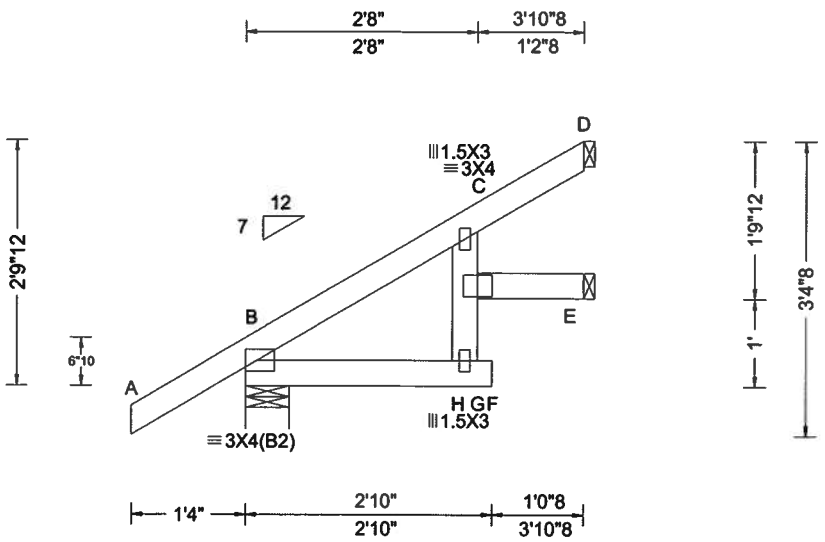
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571115 / JACK FROM: CDM	Ply: 1 Qty: 4	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J11	Cust: R 215 JRef: 1WRZ2150004 T24 / DrwNo: 017.20.1126.18585 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.017	F	999	240
VERT(CL): 0.033	F	999	240
HORZ(LL): 0.010	C	-	-
HORZ(TL): 0.020	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.218
Max BC CSI: 0.075
Max Web CSI: 0.069

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	272	/-	/-	/194	/11	/57
E	35	/-	/-	/25	/1	/-
D	114	/-	/-	/72	/19	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 2-9-12.

YOONHWAK KIM
LICENSE
No. 86367
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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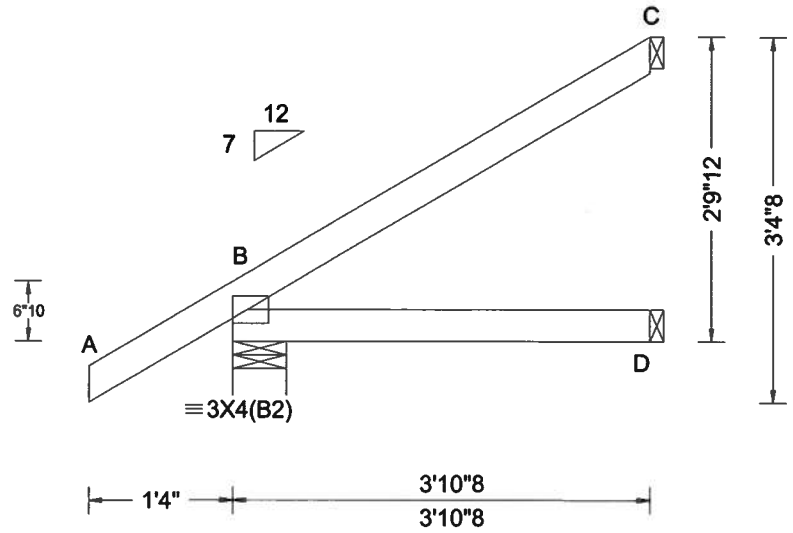
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569223 / JACK FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J12	Cust: R 215 JRef: 1WRZ2150004 T62 / DrwNo: 017.20.1126.19522 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.001	D	-	-
HORZ(TL): 0.002	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.192
Max BC CSI: 0.163
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	272	/-	/-	/194	/11	/57
D	73	/-	/-	/50	/-	/-
C	102	/-	/-	/49	/24	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-9-12.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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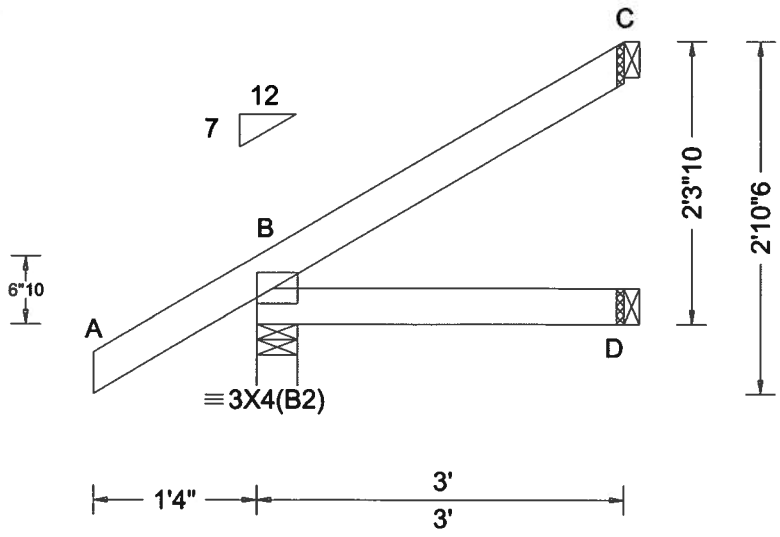
Suite 305
Orlando FL, 32821

SEQN: 569252 / JACK FROM: CDM	Ply: 1 Qty: 5	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J13	Cust: R 215 JRef: 1WRZ2150004 T27 / DrwNo: 017.20.1126.18804 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.001	D	-	-
HORZ(TL): 0.001	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.142
Max BC CSI: 0.092
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	241	/-	/-	/175	/31	/71
D	55	/-	/-	/39	/-	/-
C	72	/-	/-	/32	/34	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 2-3-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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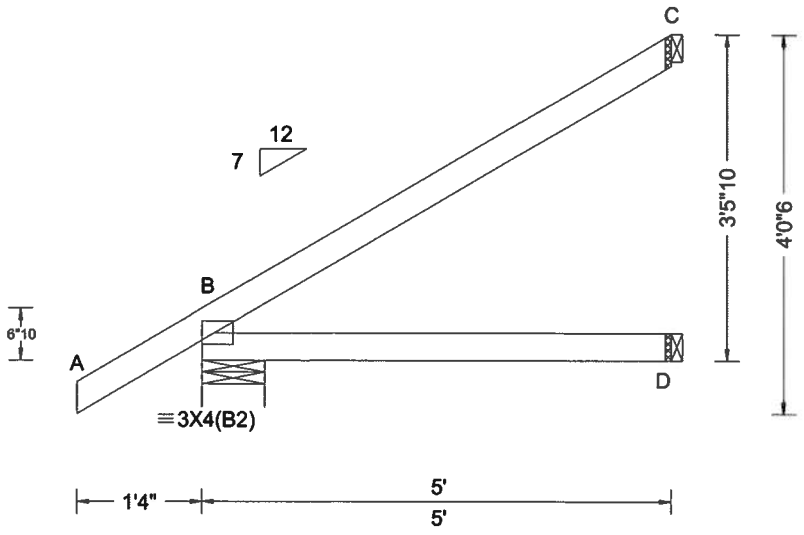
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569256 / JACK FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J14	Cust: R 215 JRef: 1WRZ2150004 T49 / DrwNo: 017.20.1126.18899 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): 0.004 D - -
HORZ(TL): 0.007 D - -
Creep Factor: 2.0
Max TC CSI: 0.367
Max BC CSI: 0.277
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

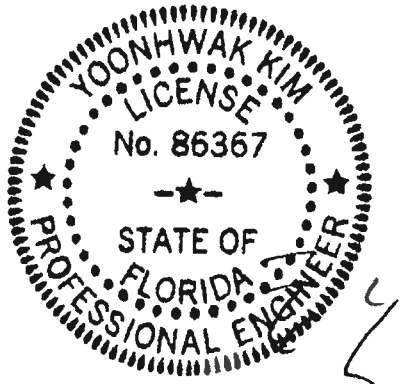
	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	315	/-	/-	/222	/33	/105
D	95	/-	/-	/65	/-	/-
C	138	/-	/-	/70	/60	/-

Wind reactions based on MWFRS
B Brg Width = 8.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 3-5-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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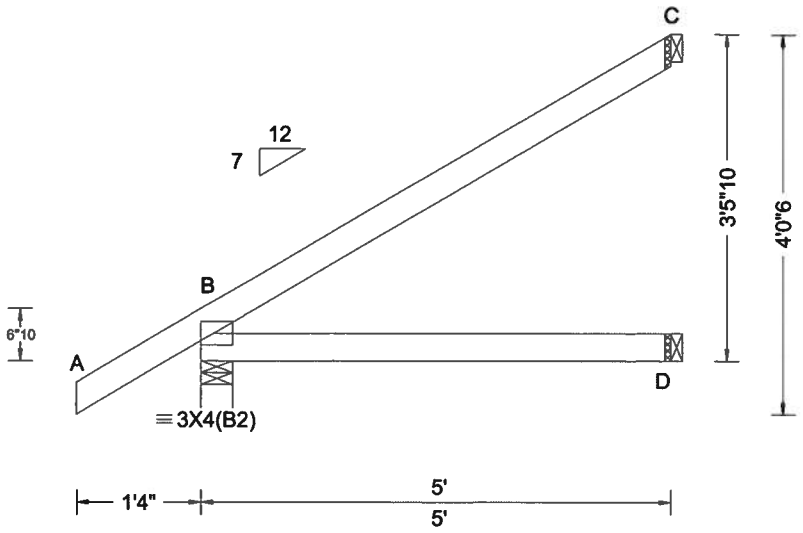
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569253 / JACK FROM: CDM	Ply: 1 Qty: 4	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J15	Cust: R 215 JRef:1WRZ2150004 T26 / DrwNo: 017.20.1126.18803 / FV 01/17/2020



Loading Criteria (psf)	**Wind Criteria**	**Snow Criteria** (Pg,Pf in PSF)	**Defl/CSI Criteria**
TCLL: 20.00	Wind Std: ASCE 7-10	Pg: NA Ct: NA CAT: NA	PP Deflection in loc L/defl L/#
TCDL: 10.00	Speed: 130 mph	Pf: NA Ce: NA	VERT(LL): NA
BCLL: 0.00	Enclosure: Closed	Lu: NA Cs: NA	VERT(CL): NA
BCDL: 10.00	Risk Category: II	Snow Duration: NA	HORZ(LL): 0.004 D - -
Des Ld: 40.00	EXP: C Kzt: NA		HORZ(TL): 0.007 D - -
NCBCLL: 10.00	Mean Height: 15.00 ft	**Code / Misc Criteria**	Creep Factor: 2.0
Soffit: 2.00	TCDL: 5.0 psf	Bldg Code: FBC 2017 RES	Max TC CSI: 0.367
Load Duration: 1.25	BCDL: 5.0 psf	TPI Std: 2014	Max BC CSI: 0.277
Spacing: 24.0 "	MWFRS Parallel Dist: 0 to h/2	Rep Fac: Yes	Max Web CSI: 0.000
	C&C Dist a: 3.00 ft	FT/RT:20(0)/10(0)	
	Loc. from endwall: not in 4.50 ft	Plate Type(s):	
	GCpi: 0.18	WAVE	VIEW Ver: 18.02.01B.0321.08
	Wind Duration: 1.60		

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	315	/-	/-	/222	/33	/105
D	95	/-	/-	/65	/-	/-
C	138	/-	/-	/70	/60	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber

Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind

Wind loads based on MWFRS with additional C&C member design.

Additional Notes

Refer to General Notes for additional information

The overall height of this truss excluding overhang is 3-5-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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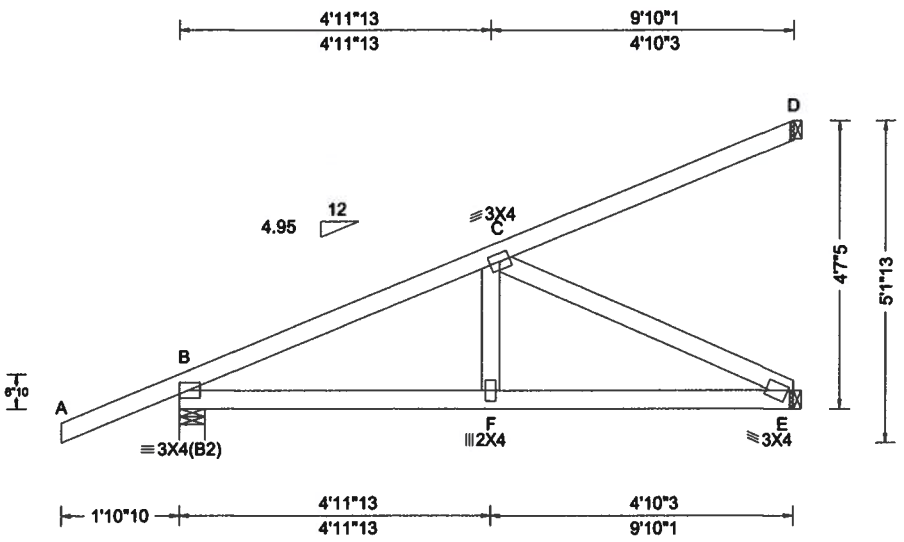
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569267 / HIP_ FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J16	Cust: R 215 JRef:1WRZ2150004 T50 / DrwNo: 017.20.1126.19320 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.019	F	999	240
VERT(CL): 0.039	F	999	240
HORZ(LL): -0.007	D	-	-
HORZ(TL): 0.015	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.704
Max BC CSI: 0.645
Max Web CSI: 0.379

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity	
Loc	R+ / R-	/ Rh	/ Rw	/ U	/ RL
B	357 / -	/ -	/ -	/146	/ -
E	370 / -	/ -	/ -	/72	/ -
D	95 / -	/ -	/ -	/29	/ -

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - C	179	-639

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - F	590	-147	F - E	581	-148

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.
C - E	166	-653

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Special Loads
-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	0 plf at	-1.89 to	62 plf at	0.00
TC: From	2 plf at	0.00 to	2 plf at	9.84
BC: From	0 plf at	-1.89 to	4 plf at	0.00
BC: From	2 plf at	0.00 to	2 plf at	9.84

TC: -26 lb Conc. Load at 1.41
TC: 144 lb Conc. Load at 4.24
TC: 276 lb Conc. Load at 7.07
BC: 27 lb Conc. Load at 1.41
BC: 110 lb Conc. Load at 4.24
BC: 189 lb Conc. Load at 7.07

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-5.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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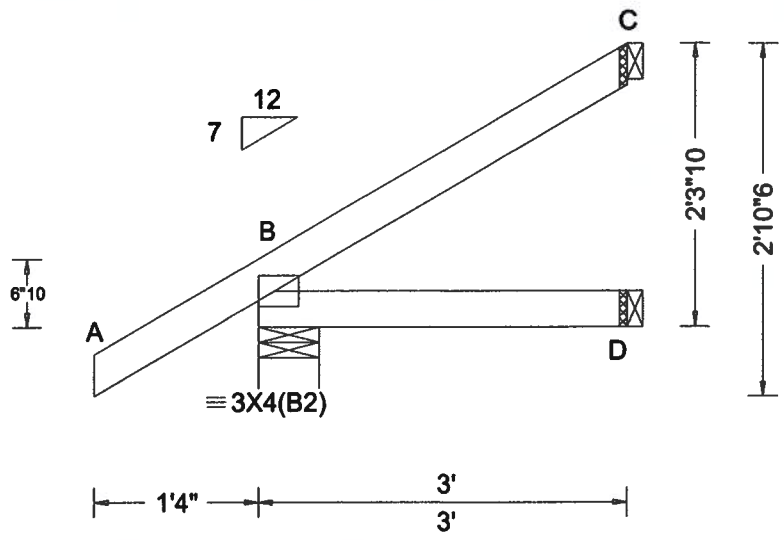
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569250 / JACK FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J18	Cust: R 215 JRef:1WRZ2150004 T47 / DrwNo: 017.20.1126.19069 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.001	D	-	-
HORZ(TL): 0.001	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.142
Max BC CSI: 0.092
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	241	/-	/-	/175	/31	/71
D	55	/-	/-	/39	/-	/-
C	72	/-	/-	/32	/34	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-3-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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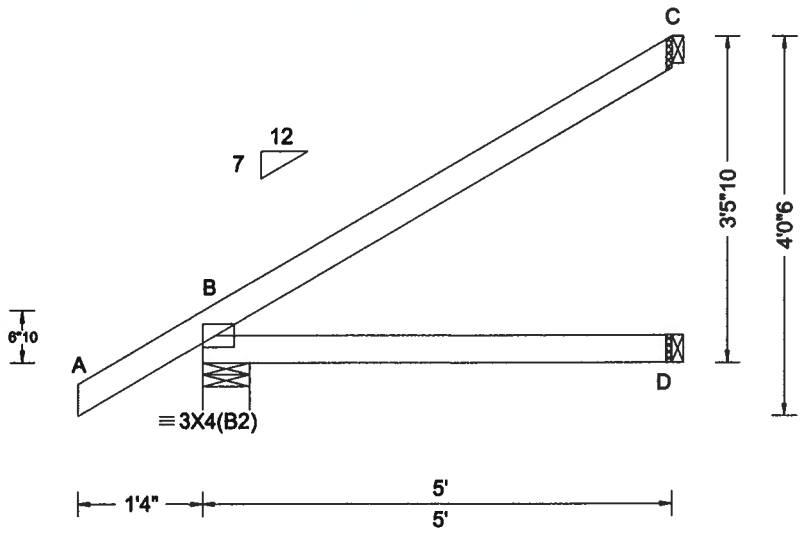
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569254 / JACK FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J19	Cust: R 215 JRef: 1WRZ2150004 T46 / DrwNo: 017.20.1126.19100 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 4.50 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.004	D	-	-
HORZ(TL): 0.007	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.367
Max BC CSI: 0.277
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

		Gravity		Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	315	/-	/-	/222	/33	/105
D	95	/-	/-	/65	/-	/-
C	138	/-	/-	/70	/60	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 3-5-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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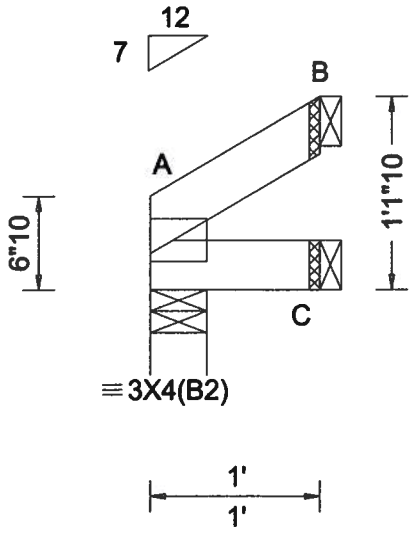
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569262 / JACK FROM: CDM	Pty: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J1A	Cust: R 215 JRef: 1WRZ2150004 T17 / DrwNo: 017.20.1126.18929 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): -0.000 B - -
HORZ(TL): 0.000 B - -
Creep Factor: 2.0
Max TC CSI: 0.012
Max BC CSI: 0.008
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	45	/-	/-	/28	/-	/15
C	18	/-	/-	/13	/-	/-
B	29	/-	/-	/15	/14	/-

Wind reactions based on MWFRS
A Brg Width = 4.0 Min Req = 1.5
C Brg Width = 1.5 Min Req = -
B Brg Width = 1.5 Min Req = -
Bearing A is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-1-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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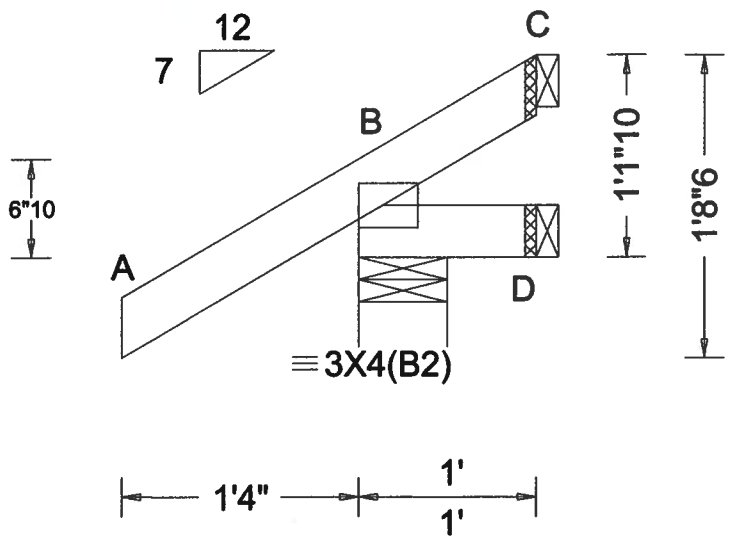
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569249 / JACK FROM: CDM	Pty: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J1B	Cust: R 215 JRef: 1WRZ2150004 T48 / DrwNo: 017.20.1126.19038 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: Any
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): -0.001 C - -
HORZ(TL): 0.001 C - -
Creep Factor: 2.0
Max TC CSI: 0.142
Max BC CSI: 0.022
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

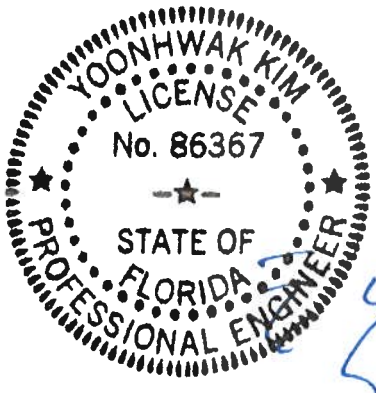
	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	206	/-	/-	/163	/45	/38
D	13	/-2	/-	/14	/6	/-
C	-	/-30	/-	/22	/36	/-

Wind reactions based on MWFRS
B Brg Width = 6.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-1-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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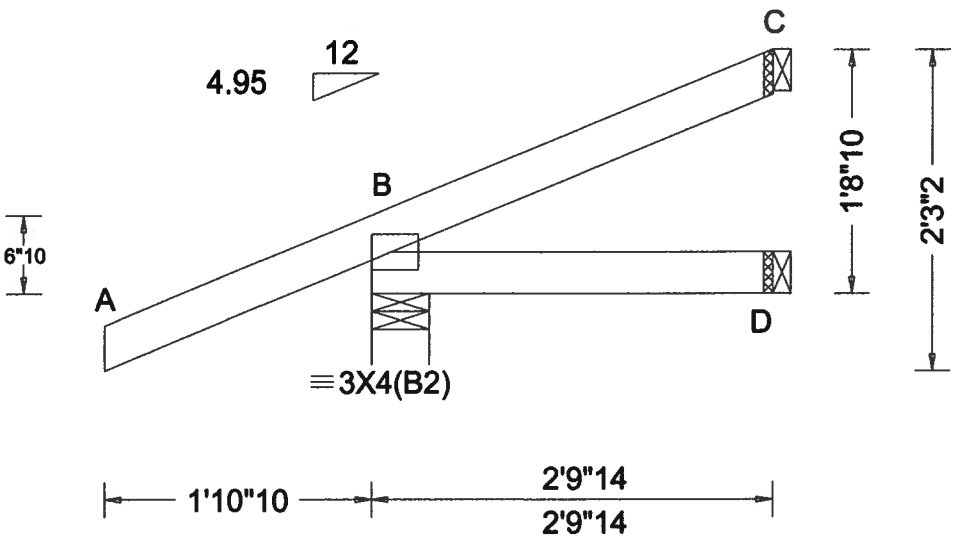
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569270 / HIP_ FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J1C	Cust: R 215 JRef: 1WRZ2150004 T19 / DrwNo: 017.20.1126.19288 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): -0.000 C - -
HORZ(TL): 0.001 C - -
Creep Factor: 2.0
Max TC CSI: 0.110
Max BC CSI: 0.073
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	156	/-	/-	/-	/53	/-
D	49	/-	/-	/-	/0	/-
C	18	/-1	/-	/-	/15	/-

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

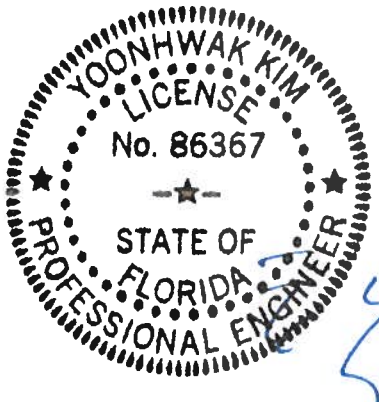
Special Loads
-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	0 plf at	-1.89 to	62 plf at	0.00
TC: From	2 plf at	0.00 to	2 plf at	2.82
BC: From	0 plf at	-1.89 to	4 plf at	0.00
BC: From	2 plf at	0.00 to	2 plf at	2.82

TC: 15 lb Conc. Load at 1.41
BC: 32 lb Conc. Load at 1.41

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-8-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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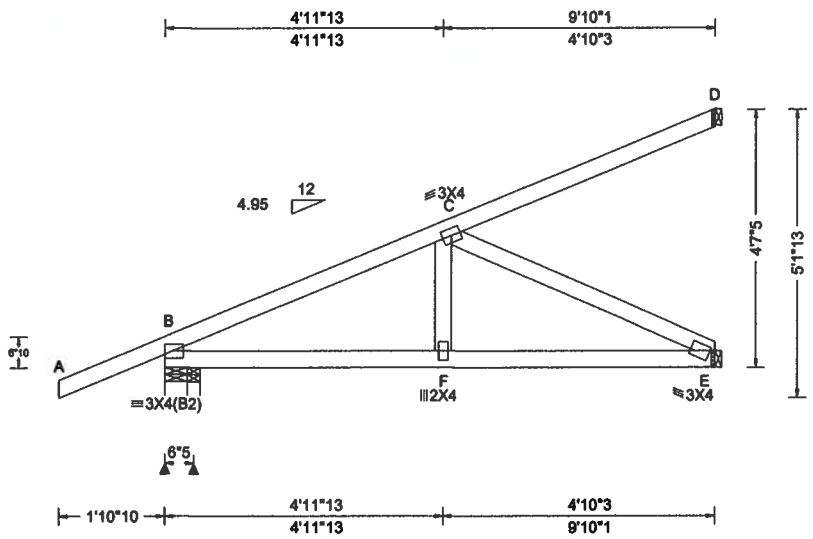
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569266 / HIP_ FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J20	Cust: R 215 JRef: 1WRZ2150004 T51 / DrwNo: 017.20.1126.19475 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.019	F	999	240
VERT(CL): 0.037	F	999	240
HORZ(LL): -0.007	D	-	-
HORZ(TL): 0.014	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.697
Max BC CSI: 0.629
Max Web CSI: 0.409

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

		Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh		/ Rw	/ U	/ RL
B	519	/-	/-		/-	/149	/-
B	94	/-170	/-		/4	/-	/-
E	390	/-	/-		/-	/72	/-
D	94	/-	/-		/-	/29	/-

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
B Brg Width = 2.8 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearings B & B are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - C	180	-697

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - F	1275	-296	F - E	628	-149

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.
C - E	167	-705

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Special Loads
——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	0 plf at	-1.89 to	62 plf at	0.00
TC: From	2 plf at	0.00 to	2 plf at	9.84
BC: From	0 plf at	-1.89 to	4 plf at	0.00
BC: From	2 plf at	0.00 to	2 plf at	9.84

TC: -26 lb Conc. Load at 1.41
TC: 144 lb Conc. Load at 4.24
TC: 276 lb Conc. Load at 7.07
BC: 27 lb Conc. Load at 1.41
BC: 110 lb Conc. Load at 4.24
BC: 189 lb Conc. Load at 7.07

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-5.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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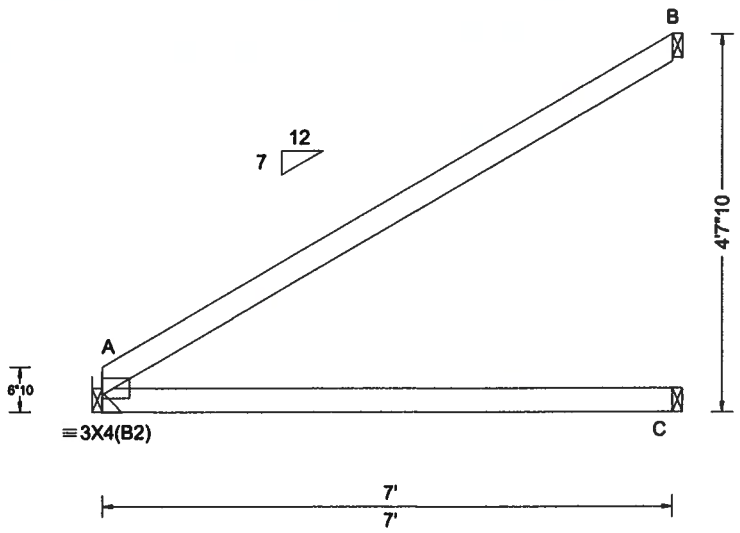
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569264 / EJAC FROM: CDM	Ply: 1 Qty: 3	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J21	Cust: R 215 JRef: 1WRZ2150004 T29 / DrwNo: 017.20.1126.18756 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): NA			
VERT(CL): NA			
HORZ(LL): 0.013	C	-	-
HORZ(TL): 0.028	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.856
Max BC CSI: 0.566
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	294	/-	/-	/190	/-	/77
C	135	/-	/-	/96	/-	/-
B	205	/-	/-	/108	/45	/-

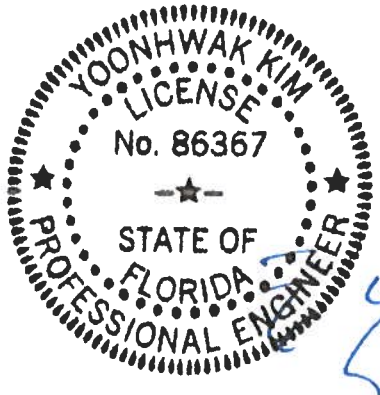
Wind reactions based on MWFRS
A Brg Width = - Min Req = -
C Brg Width = 1.5 Min Req = -
B Brg Width = 1.5 Min Req = -
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Hangers / Ties
(J) Hanger Support Required, by others

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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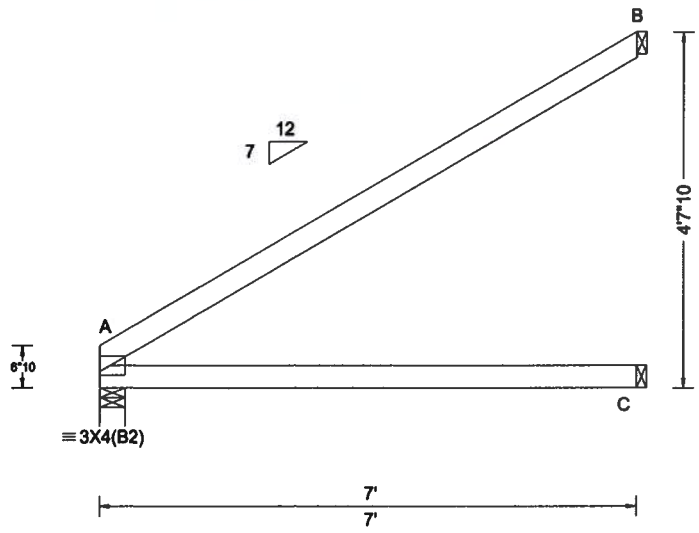
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569327 / EJAC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J22	Cust: R 215 JRef: 1WRZ2150004 T30 / DrwNo: 017.20.1126.19273 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h to 2h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): 0.013 C - -
HORZ(TL): 0.028 C - -
Creep Factor: 2.0
Max TC CSI: 0.856
Max BC CSI: 0.566
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	294	/-	/-	/190	/-	/77
C	135	/-	/-	/96	/-	/-
B	205	/-	/-	/108	/45	/-

Wind reactions based on MWFRS
A Brg Width = 4.0 Min Req = 1.5
C Brg Width = 1.5 Min Req = -
B Brg Width = 1.5 Min Req = -
Bearing A is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

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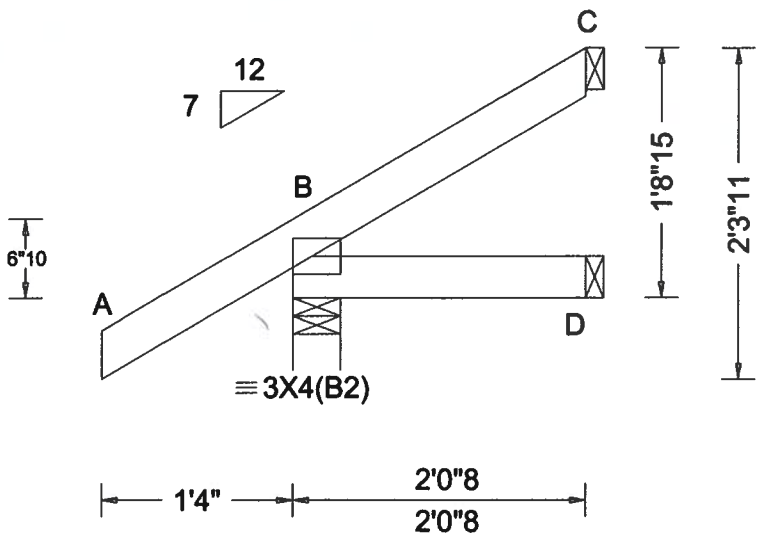
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569263 / EJAC FROM: CDM	Ply: 1 Qty: 2	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** J23	Cust: R 215 JRef:1WRZ2150004 T18 / DrwNo: 017.20.1126.19380 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: h/2 to h
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria
PP Deflection in loc L/defl L/#
VERT(LL): NA
VERT(CL): NA
HORZ(LL): -0.001 C - -
HORZ(TL): 0.001 C - -
Creep Factor: 2.0
Max TC CSI: 0.142
Max BC CSI: 0.036
Max Web CSI: 0.000

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	212	/-	/-	/159	/33	/55
D	36	/-	/-	/27	/1	/-
C	34	/-	/-	/19	/19	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
D Brg Width = 1.5 Min Req = -
C Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;

Wind
Wind loads based on MWFRS with additional C&C member design.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-8-15.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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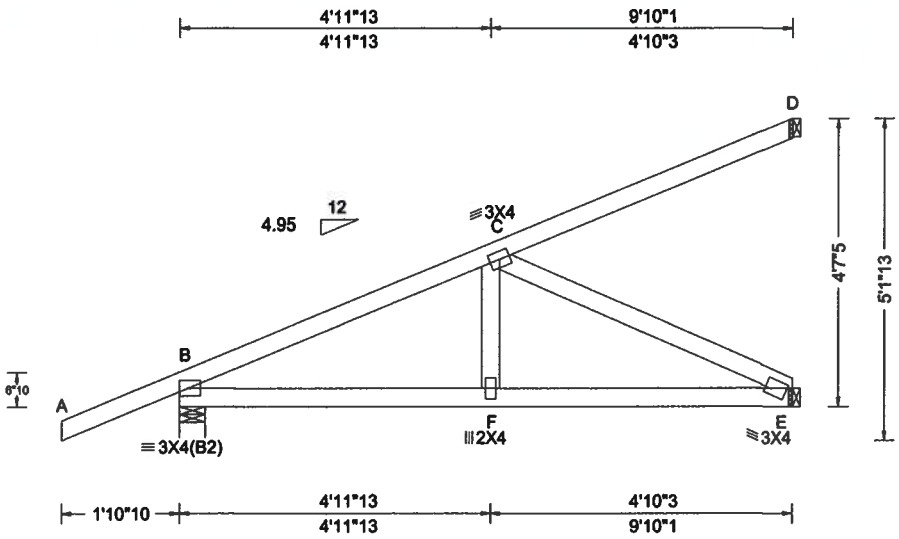
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569265 / HIP_ FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** J24	Cust: R 215 JRef:1WRZ2150004 T31 / DrwNo: 017.20.1126.18695 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.019	F	999	240
VERT(CL): 0.039	F	999	240
HORZ(LL): -0.007	D	-	-
HORZ(TL): 0.015	D	-	-

Creep Factor: 2.0
Max TC CSI: 0.704
Max BC CSI: 0.645
Max Web CSI: 0.379

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	357	/-	/-	/-	/146	/-
E	370	/-	/-	/-	/72	/-
D	95	/-	/-	/-	/29	/-

Wind reactions based on MWFRS
B Brg Width = 4.9 Min Req = 1.5
E Brg Width = 1.5 Min Req = -
D Brg Width = 1.5 Min Req = -
Bearing B is a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.
B - C	179	-639

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - F	590	-147	F - E	581	-148

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.
C - E	166	-653

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Special Loads
------(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 0 plf at -1.89 to 62 plf at 0.00
TC: From 2 plf at 0.00 to 2 plf at 9.84
BC: From 0 plf at -1.89 to 4 plf at 0.00
BC: From 2 plf at 0.00 to 2 plf at 9.84
TC: -26 lb Conc. Load at 1.41
TC: 144 lb Conc. Load at 4.24
TC: 276 lb Conc. Load at 7.07
BC: 27 lb Conc. Load at 1.41
BC: 110 lb Conc. Load at 4.24
BC: 189 lb Conc. Load at 7.07

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 4-7-5.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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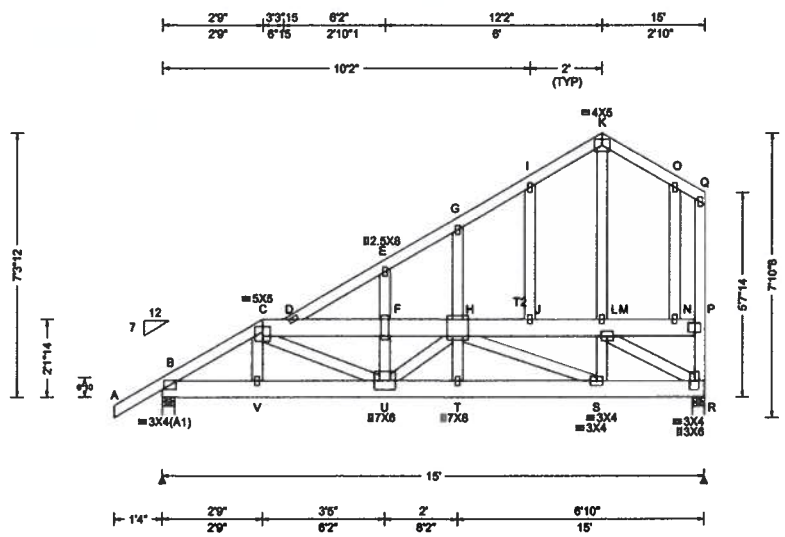
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571240 / SPEC FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** K01	Cust: R 215 JRef:1WRZ2150004 T11 / DrwNo: 017.20.1126.19054 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 13.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.029	G	999	240
VERT(CL): 0.059	G	999	240
HORZ(LL): 0.012	Q	-	-
HORZ(TL): 0.024	Q	-	-

Creep Factor: 2.0
Max TC CSI: 0.232
Max BC CSI: 0.136
Max Web CSI: 0.282

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	933	/-	/-	/-	/213	/-
R	840	/-	/-	/-	/188	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
R Brg Width = 4.0 Min Req = 1.5
Bearings B & R are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	258	-1217	H - J	226	-1041
C - D	344	-1595	J - L	227	-1043
D - F	337	-1576	L - M	227	-1043
F - H	340	-1582			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - V	1007	-206	T - S	1620	-357
V - U	1002	-210	S - R	986	-223
U - T	1620	-357			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
C - U	696	-150	S - M	401	-35
H - S	140	-634	M - R	269	-1186

Lumber
Top chord: 2x4 SP #2; T2 2x6 SP 2400f-2.0E;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3;

Special Loads
-----(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at -1.33 to 63 plf at 2.75
TC: From 32 plf at 2.75 to 32 plf at 14.71
TC: From 63 plf at 14.71 to 63 plf at 15.00
BC: From 5 plf at -1.33 to 5 plf at 0.00
BC: From 20 plf at 0.00 to 20 plf at 2.78
BC: From 10 plf at 2.78 to 10 plf at 15.00
TC: 96 lb Conc. Load at 2.78
TC: 63 lb Conc. Load at 4.81, 6.81, 8.81,10.81
TC: 81 lb Conc. Load at 12.81,14.81
BC: 120 lb Conc. Load at 2.78
BC: 50 lb Conc. Load at 4.81, 6.81, 8.81,10.81
BC: 53 lb Conc. Load at 12.81,14.81

Plating Notes
All plates are 1.5X3 except as noted.

Wind
Wind loads and reactions based on MWFRS.
Right end vertical not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 7-3-12.

Laterally brace chord above/below filler at 24" OC (or as designed) including a lateral brace on chord directly above/ below both ends of filler (if no rigid diaphragm exists at that point)

It is the responsibility of the Building Designer and Truss Fabricator to review this drawing prior to cutting lumber to verify that all data, including dimensions and loads, conform to the architectural plans/specifications and fabricators truss layout.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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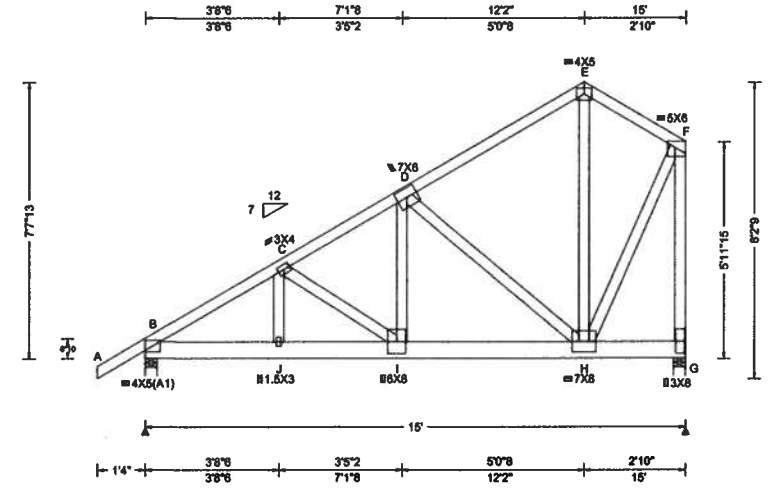
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 571163 / SPEC FROM: CDM	Ply: 2 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** K02	Cust: R 215 JRef: 1WRZ2150004 T34 / DrwNo: 017.20.1126.19272 / FV 01/17/2020

2 Complete Trusses Required



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: No
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.060	I	999	240
VERT(CL): 0.120	I	999	240
HORZ(LL): 0.015	C	-	-
HORZ(TL): 0.030	C	-	-

Creep Factor: 2.0
Max TC CSI: 0.502
Max BC CSI: 0.510
Max Web CSI: 0.938

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
B	3338	/-	/-	/-	/747	/-
G	4768	/-	/-	/-	/1009	/-

Wind reactions based on MWFRS
B Brg Width = 4.0 Min Req = 1.5
G Brg Width = 4.0 Min Req = 2.0
Bearings B & G are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - C	581	-2615	D - E	233	-1080
C - D	645	-2892	E - F	231	-1078

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
B - J	2214	-487	I - H	2378	-527
J - I	2226	-491			

Maximum Web Forces Per Ply (lbs)

Webs	Tens.	Comp.	Webs	Tens.	Comp.
J - C	108	-387	E - H	974	-182
I - D	2088	-457	H - F	2028	-429
D - H	443	-1943	F - G	510	-2378

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3;

Nailnote
Nail Schedule:0.128"x3", min. nails
Top Chord: 1 Row @12.00" o.c.
Bot Chord: 1 Row @ 3.25" o.c.
Webs : 1 Row @ 4" o.c.
Use equal spacing between rows and stagger nails in each row to avoid splitting.

Special Loads
——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)

TC: From	63 plf at	-1.33 to	63 plf at	7.13
TC: From	32 plf at	7.13 to	32 plf at	12.17
TC: From	63 plf at	12.17 to	63 plf at	15.00
BC: From	5 plf at	-1.33 to	5 plf at	0.00
BC: From	20 plf at	0.00 to	20 plf at	7.13
BC: From	10 plf at	7.13 to	10 plf at	15.00

BC: 3161 lb Conc. Load at 7.13
BC: 1280 lb Conc. Load at 9.06,11.06
BC: 1284 lb Conc. Load at 13.10

Wind
Wind loads and reactions based on MWFRS.
Right end vertical not exposed to wind pressure.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 7-7-13.

It is the responsibility of the Building Designer and Truss Fabricator to review this drawing prior to cutting lumber to verify that all data, including dimensions and loads, conform to the architectural plans/specifications and fabricators truss layout.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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****IMPORTANT**** FURNISH THIS DRAWING TO ALL CONTRACTORS INCLUDING THE INSTALLERS

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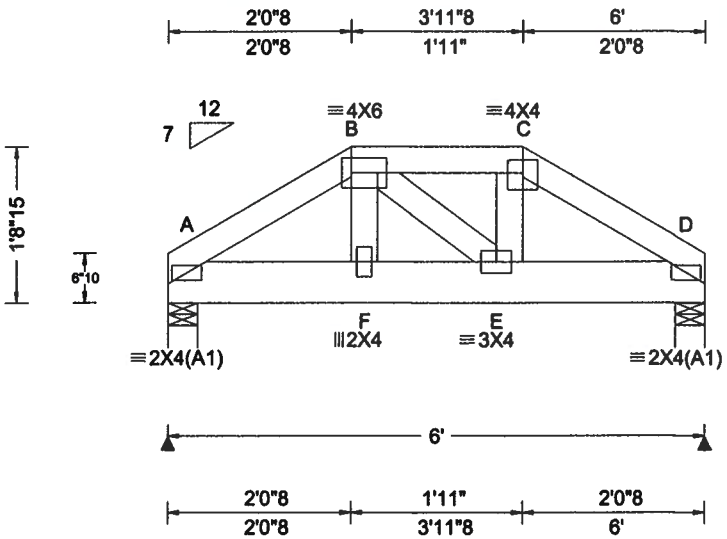
For more information see this job's general notes page and these web sites: ALPINE: www.alpineitw.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.com; ICC: www.iccsafe.org

ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 569274 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** M01	Cust: R 215 JRef:1WRZ2150004 T15 / DrwNo: 017.20.1126.18975 / FV 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 10.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category: II
EXP: C Kzt: NA
Mean Height: 15.00 ft
TCDL: 5.0 psf
BCDL: 5.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: not in 9.00 ft
GCpi: 0.18
Wind Duration: 1.60

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Varies by Ld Case
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.006	E	999	240
VERT(CL): 0.011	E	999	240
HORZ(LL): 0.001	E	-	-
HORZ(TL): 0.002	E	-	-

Creep Factor: 2.0
Max TC CSI: 0.079
Max BC CSI: 0.096
Max Web CSI: 0.111

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs)

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	834	/-	/-	/-	/40	/-
D	699	/-	/-	/-	/46	/-

Wind reactions based on MWFRS
A Brg Width = 4.0 Min Req = 1.5
D Brg Width = 4.0 Min Req = 1.5
Bearings A & D are a rigid surface.
Members not listed have forces less than 375#

Maximum Top Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - B	68	-843	C - D	68	-827
B - C	48	-742			

Maximum Bot Chord Forces Per Ply (lbs)

Chords	Tens.	Comp.	Chords	Tens.	Comp.
A - F	695	-53	E - D	681	-53
F - E	724	-50			

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x6 SP 2400f-2.0E;
Webs: 2x4 SP #3;

Special Loads
——(Lumber Dur.Fac.=1.25 / Plate Dur.Fac.=1.25)
TC: From 63 plf at 0.00 to 63 plf at 2.04
TC: From 32 plf at 2.04 to 32 plf at 3.96
TC: From 63 plf at 3.96 to 63 plf at 6.00
BC: From 10 plf at 0.00 to 10 plf at 6.00
TC: 52 lb Conc. Load at 2.07, 3.93
BC: 294 lb Conc. Load at 0.56, 2.56, 4.56
BC: 85 lb Conc. Load at 2.07, 3.93

Wind
Wind loads and reactions based on MWFRS.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-8-15.

YOONHWAK KIM
LICENSE
No. 86367
STATE OF
FLORIDA
PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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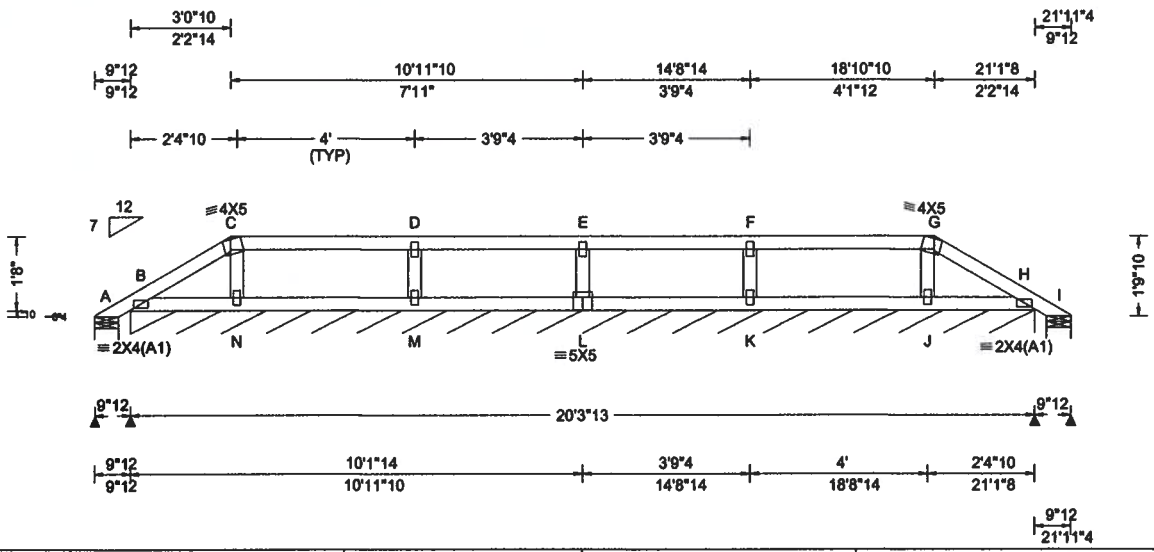
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573032 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** P01	Cust: R 215 JRef: 1WRZ2150004 T79 / DrwNo: 017.20.1126.19849 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category:
EXP: C Kzt: NA
Mean Height: 0.00 ft
TCDL: 5.0 psf
BCDL: 2.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: NA
GCpi: 0.18
Wind Duration: 0.00

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.000	N	999	240
VERT(CL): 0.001	N	999	240
HORZ(LL): 0.000	N	-	-
HORZ(TL): 0.001	N	-	-

Creep Factor: 2.0
Max TC CSI: 0.208
Max BC CSI: 0.024
Max Web CSI: 0.053

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs), or *=PLF

	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	0	/-	/-	/-	/-	/-
B*	71	/-	/-	/-	/-	/-
I	0	/-	/-	/-	/-	/-

Wind reactions based on MWFRS
A Brg Width = 6.5 Min Req = 1.5
B Brg Width = 243 Min Req = -
I Brg Width = 6.5 Min Req = 1.5
Bearings A, B, & I are a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes
All plates are 2X4 except as noted.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-9-10.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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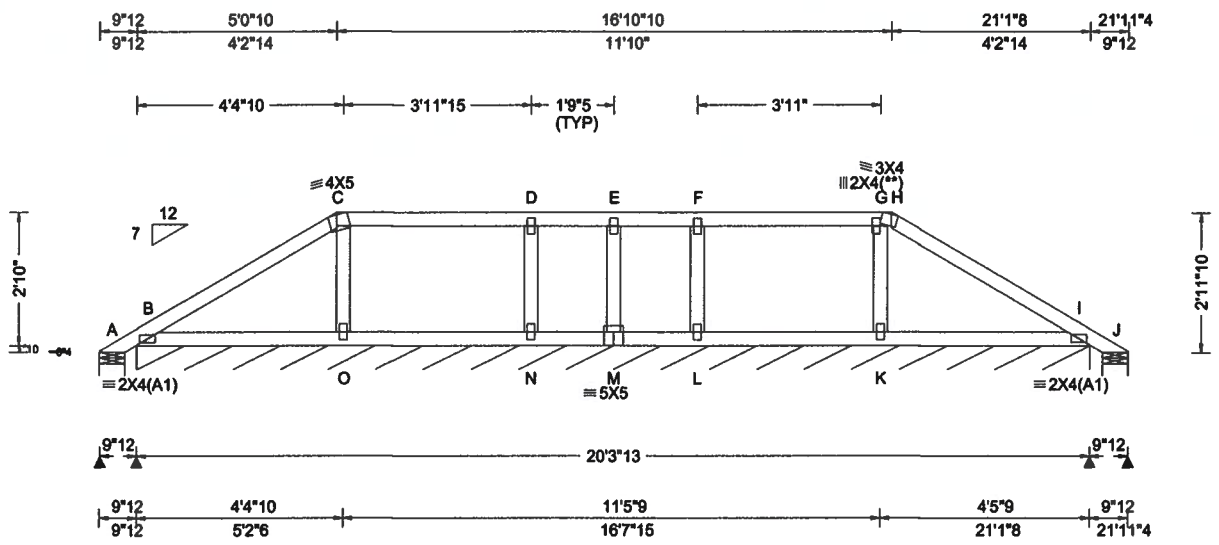
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573035 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** P02	Cust: R 215 JRef:1WRZ2150004 T73 / DrwNo: 017.20.1126.19850 / YK 01/17/2020	



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category:
EXP: C Kzt: NA
Mean Height: 0.00 ft
TCDL: 5.0 psf
BCDL: 2.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: NA
GCpi: 0.18
Wind Duration: 0.00

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.002	O	999	240
VERT(CL): 0.003	O	999	240
HORZ(LL): 0.001	O	-	-
HORZ(TL): 0.002	O	-	-

Creep Factor: 2.0
Max TC CSI: 0.209
Max BC CSI: 0.066
Max Web CSI: 0.056

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs), or *=PLF

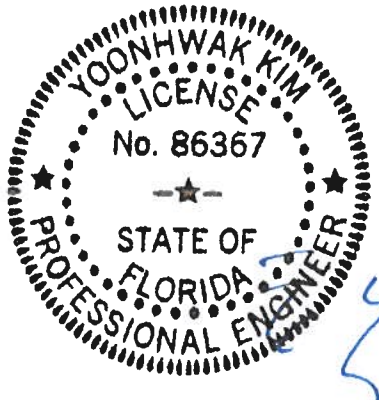
	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	-	/-90	/-	/-	/-	/-
B*	78	/-	/-	/-	/-	/-
J	-	/-68	/-	/-	/-	/-

Wind reactions based on MWFRS
A Brg Width = 6.5 Min Req = 1.9
B Brg Width = 243 Min Req = -
J Brg Width = 6.5 Min Req = 1.5
Bearings A, B, & J are a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes
All plates are 2X4 except as noted.
(**) 1 plate(s) require special positioning. Refer to scaled plate plot details for special positioning requirements.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-11-10.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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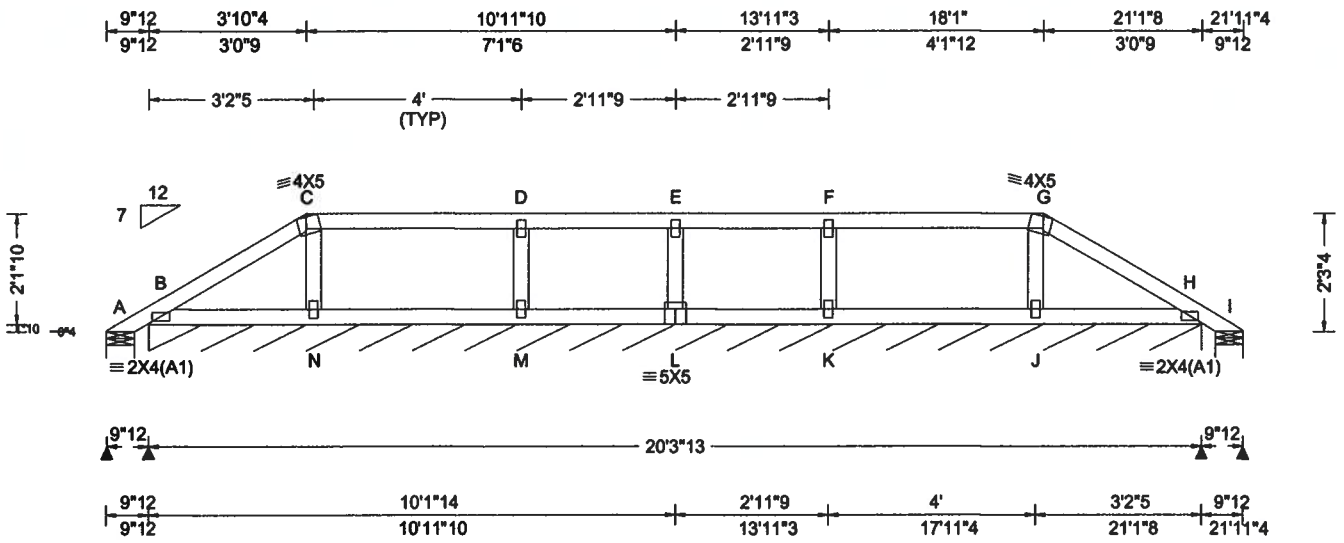
ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573038 / HIPS FROM: CDM	Ply: 1 Qty: 1	**Job Number:** 19-3769 /Pamell /ZECHER CONSTRUCTION **Truss Label:** P03	Cust: R 215 JRef:1WRZ2150004 T80 / DrwNo: 017.20.1126.19662 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category:
EXP: C Kzt: NA
Mean Height: 0.00 ft
TCDL: 5.0 psf
BCDL: 2.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: NA
GCpi: 0.18
Wind Duration: 0.00

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.001	N	999	240
VERT(CL): 0.001	N	999	240
HORZ(LL): 0.001	N	-	-
HORZ(TL): 0.001	N	-	-

Creep Factor: 2.0
Max TC CSI: 0.208
Max BC CSI: 0.039
Max Web CSI: 0.053

VIEW Ver: 18.02.01B.0321.08

▲Maximum Reactions (lbs), or *=PLF

	Gravity		Non-Gravity		
Loc	R+ / R-	/ Rh	/ Rw	/ U	/ RL
A	- /-27	/-	/-	/-	/-
B*	73 /-	/-	/-	/-	/-
I	- /-27	/-	/-	/-	/-

Wind reactions based on MWFRS
A Brg Width = 6.5 Min Req = 1.8
B Brg Width = 243 Min Req = -
I Brg Width = 6.5 Min Req = 1.5
Bearings A, B, & I are a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes
All plates are 2X4 except as noted.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 2-3-4.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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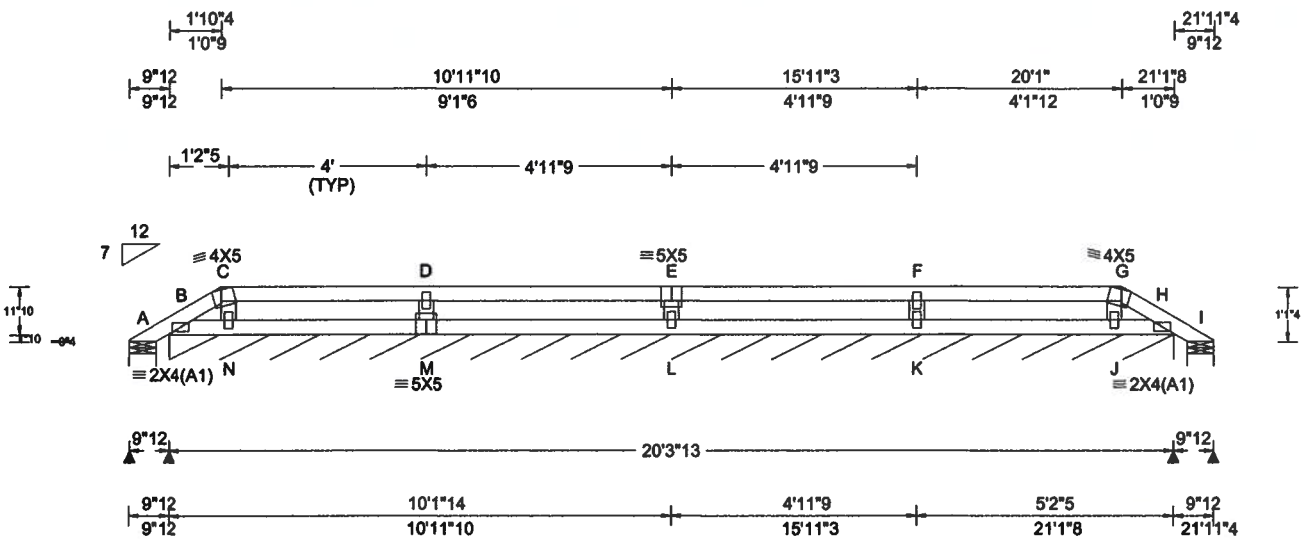
ALPINE AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

SEQN: 573041 / HIPS FROM: CDM	Pty: 1 Qty: 1	**Job Number:** 19-3769 /Parnell /ZECHER CONSTRUCTION **Truss Label:** P04	Cust: R 215 JRef:1WRZ2150004 T77 / DrwNo: 017.20.1126.19801 / YK 01/17/2020



Loading Criteria (psf)
TCLL: 20.00
TCDL: 10.00
BCLL: 0.00
BCDL: 10.00
Des Ld: 40.00
NCBCLL: 0.00
Soffit: 2.00
Load Duration: 1.25
Spacing: 24.0 "

Wind Criteria
Wind Std: ASCE 7-10
Speed: 130 mph
Enclosure: Closed
Risk Category:
EXP: C Kzt: NA
Mean Height: 0.00 ft
TCDL: 5.0 psf
BCDL: 2.0 psf
MWFRS Parallel Dist: 0 to h/2
C&C Dist a: 3.00 ft
Loc. from endwall: NA
GCpi: 0.18
Wind Duration: 0.00

Snow Criteria (Pg,Pf in PSF)
Pg: NA Ct: NA CAT: NA
Pf: NA Ce: NA
Lu: NA Cs: NA
Snow Duration: NA

Code / Misc Criteria
Bldg Code: FBC 2017 RES
TPI Std: 2014
Rep Fac: Yes
FT/RT:20(0)/10(0)
Plate Type(s):
WAVE

Defl/CSI Criteria

PP Deflection in	loc	L/defl	L/#
VERT(LL): 0.000	F	999	240
VERT(CL): 0.000	F	999	240
HORZ(LL): 0.000	N	-	-
HORZ(TL): 0.000	N	-	-

Creep Factor: 2.0
Max TC CSI: 0.263
Max BC CSI: 0.017
Max Web CSI: 0.058

VIEW Ver: 18.02.01B.0321.08

▲ Maximum Reactions (lbs), or *=PLF

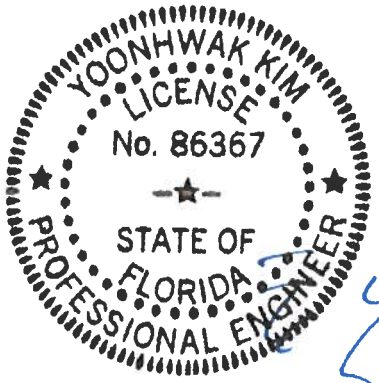
	Gravity			Non-Gravity		
Loc	R+	/ R-	/ Rh	/ Rw	/ U	/ RL
A	19	/-	/-	/-	/-	/-
B*	69	/-	/-	/-	/-	/-
I	19	/-	/-	/-	/-	/-

Wind reactions based on MWFRS
A Brg Width = 6.5 Min Req = 1.5
B Brg Width = 243 Min Req = -
I Brg Width = 6.5 Min Req = 1.5
Bearings A, B, & I are a rigid surface.
Members not listed have forces less than 375#

Lumber
Top chord: 2x4 SP #2;
Bot chord: 2x4 SP #2;
Webs: 2x4 SP #3;

Plating Notes
All plates are 2X4 except as noted.

Additional Notes
Refer to General Notes for additional information
The overall height of this truss excluding overhang is 1-1-4.



FL REG# 278, Yoonhwak Kim, FL PE #86367
01/17/2020

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ALPINE
AN ITW COMPANY
6750 Forum Drive
Suite 305
Orlando FL, 32821

Gable Stud Reinforcement Detail

ASCE 7-10: 140 mph Wind Speed, 15' Mean Height, Enclosed, Exposure C, Kzt = 1.00

Or: 120 mph Wind Speed, 15' Mean Height, Partially Enclosed, Exposure C, Kzt = 1.00
Or: 120 mph Wind Speed, 15' Mean Height, Enclosed, Exposure D, Kzt = 1.00
Or: 100 mph Wind Speed, 15' Mean Height, Partially Enclosed, Exposure D, Kzt = 1.00

Max Gable Vertical Length

2x4 Gable Vertical Spacing	2x4 Gable Vertical Species	Brace Grade	No Braces	(1) 1x4 "L" Brace *		(1) 2x4 "L" Brace *		(2) 2x4 "L" Brace **		(1) 2x6 "L" Brace *		(2) 2x6 "L" Brace **	
				Group A	Group B	Group A	Group B	Group A	Group B	Group A	Group B	Group A	Group B
24" o.c.	SPF HF	#1 / #2	4' 3"	7' 3"	7' 7"	8' 7"	8' 11"	10' 3"	10' 8"	13' 6"	14' 0"	14' 0"	14' 0"
		#3	4' 1"	6' 7"	7' 1"	8' 6"	8' 10"	10' 1"	10' 6"	13' 4"	13' 10"	14' 0"	14' 0"
		Stud	4' 1"	6' 7"	7' 0"	8' 6"	8' 10"	10' 1"	10' 6"	13' 4"	13' 10"	14' 0"	14' 0"
		Standard	4' 1"	5' 8"	6' 0"	7' 7"	8' 1"	10' 1"	10' 6"	11' 10"	12' 8"	14' 0"	14' 0"
	SP DFL	#1	4' 6"	7' 4"	7' 8"	8' 8"	9' 0"	10' 4"	10' 9"	13' 8"	14' 0"	14' 0"	14' 0"
		#2	4' 3"	7' 3"	7' 7"	8' 7"	8' 11"	10' 3"	10' 8"	13' 6"	14' 0"	14' 0"	14' 0"
		#3	4' 2"	6' 0"	6' 4"	7' 11"	8' 6"	10' 2"	10' 7"	12' 5"	13' 4"	14' 0"	14' 0"
		Stud	4' 2"	6' 0"	6' 4"	7' 11"	8' 6"	10' 2"	10' 7"	12' 5"	13' 4"	14' 0"	14' 0"
		Standard	4' 0"	5' 3"	5' 7"	7' 0"	7' 6"	9' 6"	10' 2"	11' 0"	11' 10"	14' 0"	14' 0"
16" o.c.	SPF HF	#1 / #2	4' 11"	8' 4"	8' 8"	9' 10"	10' 3"	11' 8"	12' 2"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	4' 8"	8' 1"	8' 8"	9' 8"	10' 1"	11' 7"	12' 1"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	4' 8"	8' 1"	8' 6"	9' 8"	10' 1"	11' 7"	12' 1"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 8"	6' 11"	7' 5"	9' 3"	9' 11"	11' 7"	12' 1"	14' 0"	14' 0"	14' 0"	14' 0"
	SP DFL	#1	5' 1"	8' 5"	8' 9"	9' 11"	10' 4"	11' 10"	12' 4"	14' 0"	14' 0"	14' 0"	14' 0"
		#2	4' 11"	8' 4"	8' 8"	9' 10"	10' 3"	11' 8"	12' 2"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	4' 9"	7' 4"	7' 9"	9' 9"	10' 2"	11' 8"	12' 1"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	4' 9"	7' 4"	7' 9"	9' 9"	10' 2"	11' 8"	12' 1"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 8"	6' 5"	6' 10"	8' 7"	9' 2"	11' 7"	12' 1"	13' 6"	14' 0"	14' 0"	14' 0"
12" o.c.	SPF HF	#1 / #2	5' 5"	9' 2"	9' 6"	10' 10"	11' 3"	11' 8"	13' 5"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	5' 1"	9' 0"	9' 4"	10' 8"	11' 1"	12' 9"	13' 3"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	5' 1"	9' 0"	9' 4"	10' 8"	11' 1"	12' 9"	13' 3"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	5' 1"	8' 0"	8' 6"	10' 8"	11' 1"	12' 9"	13' 3"	14' 0"	14' 0"	14' 0"	14' 0"
	SP DFL	#1	5' 8"	9' 3"	9' 8"	10' 11"	11' 4"	13' 0"	13' 6"	14' 0"	14' 0"	14' 0"	14' 0"
		#2	5' 5"	9' 2"	9' 6"	10' 10"	11' 3"	12' 11"	13' 5"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	5' 3"	8' 5"	9' 0"	10' 9"	11' 2"	12' 10"	13' 4"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	5' 3"	8' 5"	9' 0"	10' 9"	11' 2"	12' 10"	13' 4"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	5' 1"	7' 5"	7' 11"	9' 11"	10' 7"	12' 9"	13' 3"	14' 0"	14' 0"	14' 0"	14' 0"

Bracing Group Species and Grades:

Group A:

Spruce-Pine-Fir	
#1 / #2	Standard
#3	Stud

Hem-Fir	
#2	Stud
#3	Standard

Douglas Fir-Larch
#3
Stud
Standard

Southern Pine**
#3
Stud
Standard

Group B:

Hem-Fir
#1 & Btr
#1

Douglas Fir-Larch
#1
#2

Southern Pine**
#1
#2

1x4 Braces shall be SRB (Stress-Rated Board).

**For 1x4 So. Pine use only Industrial 55 or Industrial 45 Stress-Rated Boards. Group B values may be used with these grades.

Gable Truss Detail Notes:

Wind Load deflection criterion is L/240.

Provide uplift connections for 55 plf over continuous bearing (5 psf TC Dead Load).

Gable end supports load from 4' 0" outlookers with 2' 0" overhang, or 12" plywood overhang.

Attach "L" braces with 10d (0.128"x3.0" min) nails.

* For (1) "L" brace: space nails at 2" o.c. in 18" end zones and 4" o.c. between zones.

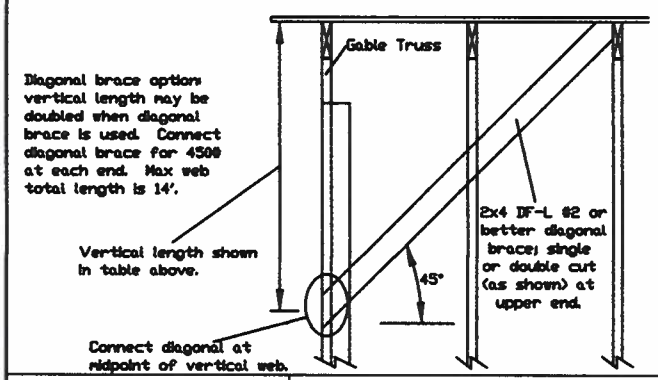
** For (2) "L" braces: space nails at 3" o.c. in 18" end zones and 6" o.c. between zones.

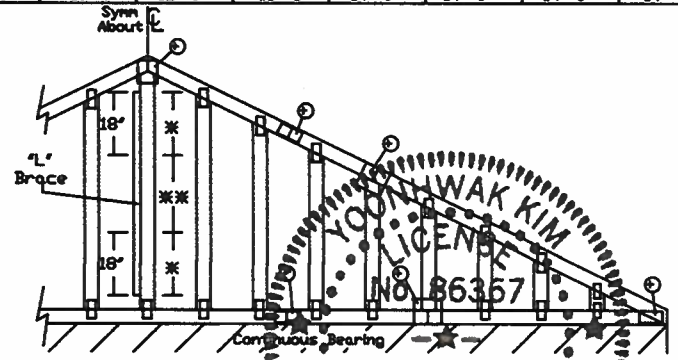
"L" bracing must be a minimum of 80% of web member length.

Gable Vertical Plate Sizes	
Vertical Length	No Splice
Less than 4' 0"	1X4 or 2X3
Greater than 4' 0"	3X4

+ Refer to common truss design for peak, splice, and heel plates.

Refer to the Building Designer for conditions not addressed by this detail.





Refer to chart above for max. gable vertical length.

YOONHWAK KIM LICENSE NO. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

ALPINE AN ITW COMPANY

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Suite 200
Maryland Heights, MO 63043

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Alpine, a division of ITW Building Components Group Inc. shall not be responsible for any deviation from this drawing, any failure to build the truss in conformance with ANSI/TPI 1, or for handling, shipping, installation & bracing of trusses.

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For more information see this job's general notes page and these web sites:
ALPINE: www.alpinetts.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.org; ICC: www.iccsafe.org

MAX. TOT. LD. 60 PSF

MAX. SPACING 24.0"

REF	ASCE7-10-GAB14015
DATE	10/01/14
DRWG	A14015ENC101014

01/17/2020
FL REG# 278, Yoonhwak Kim, FL PE #86367

Gable Stud Reinforcement Detail

ASCE 7-10: 140 mph Wind Speed, 30' Mean Height, Enclosed, Exposure C, Kzt = 1.00

Or: 120 mph Wind Speed, 30' Mean Height, Partially Enclosed, Exposure C, Kzt = 1.00
Or: 120 mph Wind Speed, 30' Mean Height, Enclosed, Exposure D, Kzt = 1.00
Or: 100 mph wind speed, 30' Mean Height, Partially Enclosed, Exposure D, Kzt = 1.00

Max Gable Vertical Length

2x4 Gable Vertical Spacing	Species	Brace Grade	No Braces	(1) 1x4 "L" Brace *		(1) 2x4 "L" Brace *		(2) 2x4 "L" Brace **		(1) 2x6 "L" Brace *		(2) 2x6 "L" Brace **	
				Group A	Group B	Group A	Group B	Group A	Group B	Group A	Group B	Group A	Group B
24" o.c.	SPF HF	#1 / #2	4' 1"	6' 11"	7' 2"	8' 2"	8' 6"	9' 9"	10' 2"	12' 10"	13' 4"	14' 0"	14' 0"
		#3	3' 10"	6' 2"	6' 7"	8' 1"	8' 5"	9' 8"	10' 0"	12' 8"	13' 2"	14' 0"	14' 0"
		Stud	3' 10"	6' 2"	6' 6"	8' 1"	8' 5"	9' 8"	10' 0"	12' 8"	13' 2"	14' 0"	14' 0"
		Standard	3' 10"	5' 3"	5' 7"	7' 0"	7' 6"	9' 6"	10' 0"	11' 0"	11' 10"	14' 0"	14' 0"
	SP DFL	#1	4' 2"	7' 0"	7' 3"	8' 3"	8' 7"	9' 10"	10' 3"	13' 0"	13' 6"	14' 0"	14' 0"
		#2	4' 1"	6' 11"	7' 2"	8' 2"	8' 6"	9' 9"	10' 2"	12' 10"	13' 4"	14' 0"	14' 0"
		#3	4' 0"	5' 7"	5' 11"	7' 5"	7' 11"	9' 8"	10' 1"	11' 7"	12' 5"	14' 0"	14' 0"
		Stud	4' 0"	5' 7"	5' 11"	7' 5"	7' 11"	9' 8"	10' 1"	11' 7"	12' 5"	14' 0"	14' 0"
		Standard	3' 9"	4' 11"	5' 13"	6' 6"	7' 0"	8' 10"	9' 6"	10' 3"	11' 0"	13' 11"	14' 0"
16" o.c.	SPF HF	#1 / #2	4' 8"	7' 11"	8' 3"	9' 4"	9' 9"	11' 2"	11' 7"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	4' 5"	7' 6"	8' 3"	9' 3"	9' 7"	11' 0"	11' 6"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	4' 5"	7' 6"	8' 0"	9' 3"	9' 7"	11' 0"	11' 6"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 5"	6' 5"	6' 10"	8' 7"	9' 2"	11' 0"	11' 6"	13' 6"	14' 0"	14' 0"	14' 0"
	SP DFL	#1	4' 10"	8' 0"	8' 4"	9' 6"	9' 10"	11' 3"	11' 9"	14' 0"	14' 0"	14' 0"	14' 0"
		#2	4' 8"	7' 11"	8' 3"	9' 4"	9' 9"	11' 2"	11' 7"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	4' 7"	6' 10"	7' 3"	9' 1"	9' 8"	11' 1"	11' 6"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	4' 7"	6' 10"	7' 3"	9' 1"	9' 8"	11' 1"	11' 6"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 5"	6' 0"	6' 5"	8' 0"	8' 7"	10' 10"	11' 6"	12' 7"	13' 15"	14' 0"	14' 0"
12" o.c.	SPF HF	#1 / #2	5' 2"	8' 9"	9' 1"	10' 4"	10' 9"	11' 2"	12' 9"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	4' 10"	8' 7"	8' 11"	10' 2"	10' 7"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	4' 10"	8' 7"	8' 11"	10' 2"	10' 7"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 10"	7' 5"	7' 11"	9' 11"	10' 7"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"
	SP DFL	#1	5' 4"	8' 10"	9' 2"	10' 5"	10' 10"	12' 5"	12' 11"	14' 0"	14' 0"	14' 0"	14' 0"
		#2	5' 2"	8' 9"	9' 1"	10' 4"	10' 9"	12' 3"	12' 9"	14' 0"	14' 0"	14' 0"	14' 0"
		#3	5' 0"	7' 10"	8' 4"	10' 3"	10' 8"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"
		Stud	5' 0"	7' 10"	8' 4"	10' 3"	10' 8"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"
		Standard	4' 10"	6' 11"	7' 4"	9' 3"	9' 10"	12' 2"	12' 8"	14' 0"	14' 0"	14' 0"	14' 0"

Bracing Group Species and Grades:

Group A:

Spruce-Pine-Fir	
#1 / #2	Standard
#3	Stud

Hem-Fir	
#2	Stud
#3	Standard

Douglas Fir-Larch
#3
Stud
Standard

Southern Pine***
#3
Stud
Standard

Group B:

Hem-Fir
#1 & Btr
#1

Douglas Fir-Larch
#1
#2

Southern Pine***
#1
#2

1x4 Braces shall be SRB (Stress-Rated Board).
***For 1x4 So. Pine use only Industrial 55 or Industrial 45 Stress-Rated Boards. Group B values may be used with these grades.

Gable Truss Detail Notes:

Wind Load deflection criterion is L/240.

Provide uplift connections for 100 plf over continuous bearing (5 psf TC Dead Load).

Gable end supports load from 4' 0" outlookers with 2' 0" overhang, or 12" plywood overhang.

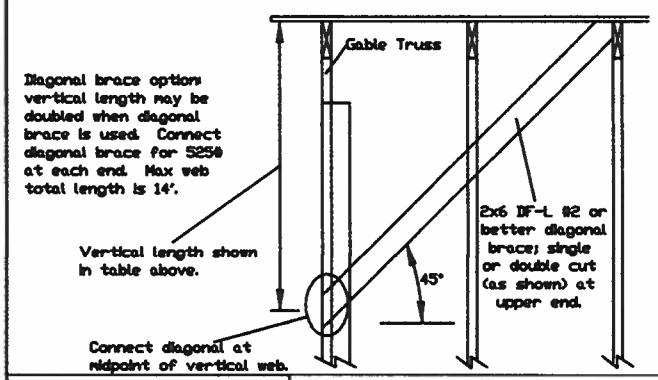
Attach "L" braces with 10d (0.128"x3.0" min) nails.
* For (1) "L" brace: space nails at 2" o.c. in 18" end zones and 4" o.c. between zones.
**For (2) "L" braces: space nails at 3" o.c. in 18" end zones and 6" o.c. between zones.

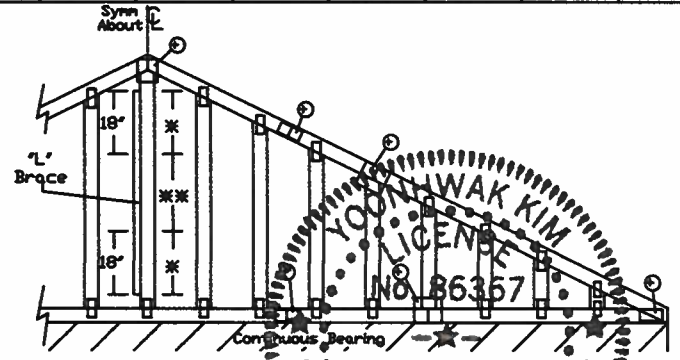
"L" bracing must be a minimum of 90% of web member length.

Gable Vertical Plate Sizes	
Vertical Length	No Splice
Less than 4' 0"	2X4
Greater than 4' 0", but less than 11' 6"	3X4
Greater than 11' 6"	4X4

+ Refer to common truss design for peak, splice, and heel plates.

Refer to the Building Designer for conditions not addressed by this detail.





Refer to chart above for max. gable vertical length.

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For more information see this job's general notes page and these web sites:
ALPINE www.alpinetts.com; TPI www.tpinst.org; SBCA www.sbcindustry.org; ICC www.iccsafe.org

MAX. TOT. LD. 60 PSF

MAX. SPACING 24.0"

REF	ASCE7-10-GAB14030
DATE	10/01/14
DRWG	A14030ENC101014

01/17/2020
FL REG# 278, Yoonhwak Kim, FL PE #86367

CLR Reinforcing Member Substitution

This detail is to be used when a Continuous Lateral Restraint (CLR) is specified on a truss design but an alternative web reinforcement method is desired.

Notes:

This detail is only applicable for changing the specified CLR shown on single ply sealed designs to T-reinforcement or L-reinforecement or scab reinforcement.

Alternative reinforcement specified in chart below may be conservative. For minimum alternative reinforcement, re-run design with appropriate reinforcement type.

Use scabs instead of L- or T- reinforcement on webs with intersecting truss joints, such as K-web joints, that may interfere with proper application along the narrow face of the web.

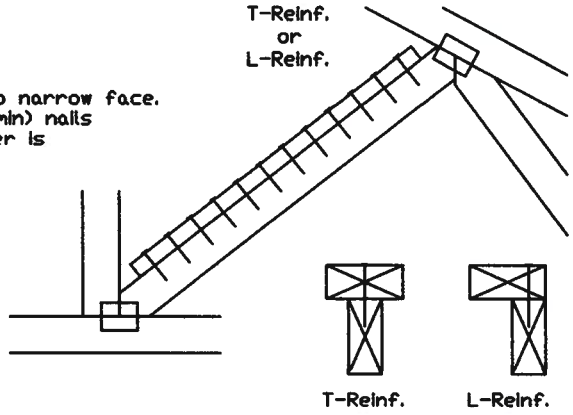
Web Member Size	Specified CLR Restraint	Alternative Reinforecement T- or L- Reinf.	Alternative Reinforecement Scab Reinf.
2x3 or 2x4	1 row	2x4	1-2x4
2x3 or 2x4	2 rows	2x6	2-2x4
2x6	1 row	2x4	1-2x6
2x6	2 rows	2x6	2-2x4 Ⓒ
2x8	1 row	2x6	1-2x8
2x8	2 rows	2x6	2-2x6 Ⓒ

T-reinforcement, L-reinforcement, or scab reinforcement to be same species and grade or better than web member unless specified otherwise on Engineer's sealed design.

Ⓒ Center scab on wide face of web. Apply (1) scab to each face of web.

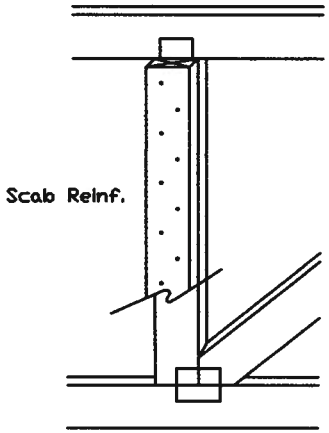
T-Reinforcement or L-Reinforcement:

Apply to either side of web narrow face. Attach with 10d (0.128"x3.0",min) nails at 6" o.c. Reinforcing member is a minimum 80% of web member length.



Scab Reinforcement:

Apply scab(s) to wide face of web. No more than (1) scab per face. Attach with 10d (0.128"x3.0",min) nails at 6" o.c. Reinforcing member is a minimum 80% of web member length.



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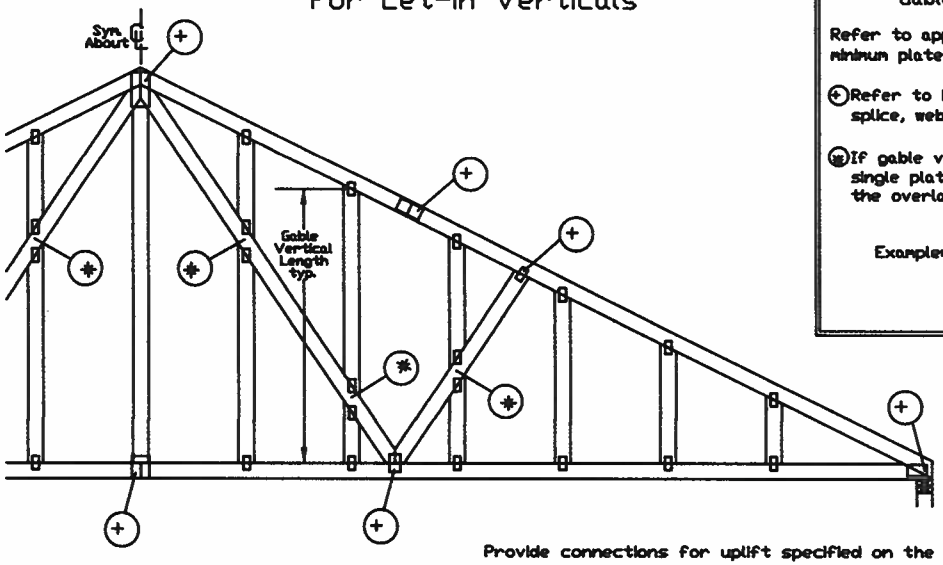
For more information see this job's general notes page and these web sites:
ALPINE www.alpinetta.com TPI www.tpinst.org SBCA www.sbcindustry.org IBC www.iccsafe.org

TC LL	PSF	REF	CLR Subst.
TC DL	PSF	DATE	01/02/19
BC DL	PSF	DRWG	BRCLBSUB0119
BC LL	PSF		
TOT. LD.	PSF		
DUR. FAC.			
SPACING			

01/17/2020
FL REG# 278, Yoonhwak Kim, FL PE #86367

Gable Detail
For Let-In Verticals



Gable Truss Plate Sizes

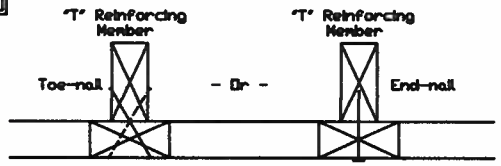
Refer to appropriate Alpine gable detail for minimum plate sizes for vertical studs.

(+) Refer to Engineered truss design for peak, splice, web, and heel plates.

(W) If gable vertical plates overlap, use a single plate that covers the total area of the overlapped plates to span the web.

Example: 2X4 / 2X4 — 2X8

'T' Reinforcement Attachment Detail



Provide connections for uplift specified on the engineered truss design.

Attach each 'T' reinforcing member with

End Driven Nails:
10d Common (0.148"x 3",min) Nails at 4" o.c. plus
(4) nails in the top and bottom chords.

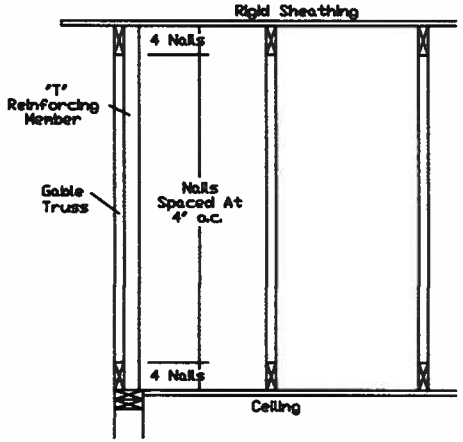
Toenailed Nails:
10d Common (0.148"x3",min) Toenails at 4" o.c. plus
(4) toenails in the top and bottom chords.

This detail to be used with the appropriate Alpine gable detail for ASCE wind load.

ASCE 7-05 Gable Detail Drawings
A13015051014, A12015051014, A11015051014, A10015051014, A14015051014,
A13030051014, A12030051014, A11030051014, A10030051014, A14030051014

ASCE 7-10 & ASCE 7-16 Gable Detail Drawings
A11515ENC100118, A12015ENC100118, A14015ENC100118, A10015ENC100118,
A18015ENC100118, A20015ENC100118, A20015END100118, A20015PED100118,
A11530ENC100118, A12030ENC100118, A14030ENC100118, A10030ENC100118,
A18030ENC100118, A20030ENC100118, A20030END100118, A20030PED100118,
S11515ENC100118, S12015ENC100118, S14015ENC100118, S10015ENC100118,
S18015ENC100118, S20015ENC100118, S20015END100118, S20015PED100118,
S11530ENC100118, S12030ENC100118, S14030ENC100118, S10030ENC100118,
S18030ENC100118, S20030ENC100118, S20030END100118, S20030PED100118

See appropriate Alpine gable detail for maximum unreinforced gable vertical length.



To convert from 'L' to 'T' reinforcing members, multiply 'T' increase by length (based on appropriate Alpine gable detail).

Maximum allowable 'T' reinforced gable vertical length is 14' from top to bottom chord.

'T' reinforcing member material must match size, specie, and grade of the 'L' reinforcing member.

Web Length Increase w/ 'T' Brace

'T' Reinf. Min. Size	'T' Increase
2x4	30 %
2x6	20 %

Example:
ASCE 7-10 Wind Speed = 120 mph
Mean Roof Height = 30 ft, Kzt = 1.00
Gable Vertical = 24"o.c. SP #3
'T' Reinforcing Member Size = 2x4
'T' Brace Increase (From Above) = 30% = 1.30
(1) 2x4 'L' Brace Length = 8' 7"
Maximum 'T' Reinforced Gable Vertical Length
1.30 x 8' 7" = 11' 2"

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For more information see this job's general notes page and these web sites: ALPINE: www.alpinebc.com; TPI: www.tpinst.org; SBCA: www.sbcindustry.org; ICC: www.iccsafe.org

YOONHWAK KIM — LICENSE NUMBER 86367 — STATE OF FLORIDA — PROFESSIONAL ENGINEER

01/17/2020

Job #278, Yoonhwak Kim, FL PE #86367

MAX. TOT. LD. 60 PSF
DUR. FAC. ANY
MAX. SPACING 24.0"

REF	LET-IN VERT
DATE	01/02/2018
DRWG	GBLLETIN0118

Piggyback Detail - ASCE 7-10: 160 mph, 30' Mean Height, Enclosed, Exposure C, Kzt=1.00

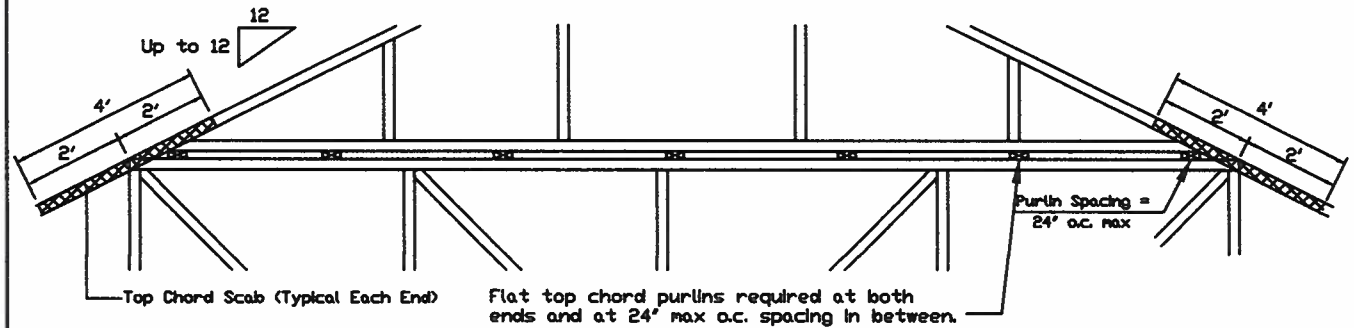
160 mph Wind, 30.00 ft Mean Hgt, ASCE 7-10, Enclosed Bldg. located anywhere in roof, Exp C, Wind DL= 5.0 psf (min), Kzt=1.0.
Or 140 mph wind, 30.00 ft Mean Hgt, ASCE 7-10, Enclosed Bldg. located anywhere in roof, Exp D, wind DL= 5.0 psf (min), Kzt=1.0.

Note: Top chords of trusses supporting piggyback cap trusses must be adequately braced by sheathing or purlins. The building Engineer of Record shall provide diagonal bracing or any other suitable anchorage to permanently restrain purlins, and lateral bracing for out of plane loads over gable ends.

Maximum truss spacing is 24" o.c. detail is not applicable if cap supports additional loads such as cupola, steeple, chimney or drag strut loads.

** Refer to Engineer's sealed truss design drawing for piggyback and base truss specifications.

Detail A : Purlin Spacing = 24" o.c. or less



Piggyback cap truss slant nailed to all top chord purlin bracing with (2) 16d box nails (0.135"x3.5") and secure top chord with 2x4 #3 grade scab (1 side only at each end) attached with 2 rows of 10d box nails (0.128"x3") at 4' o.c.

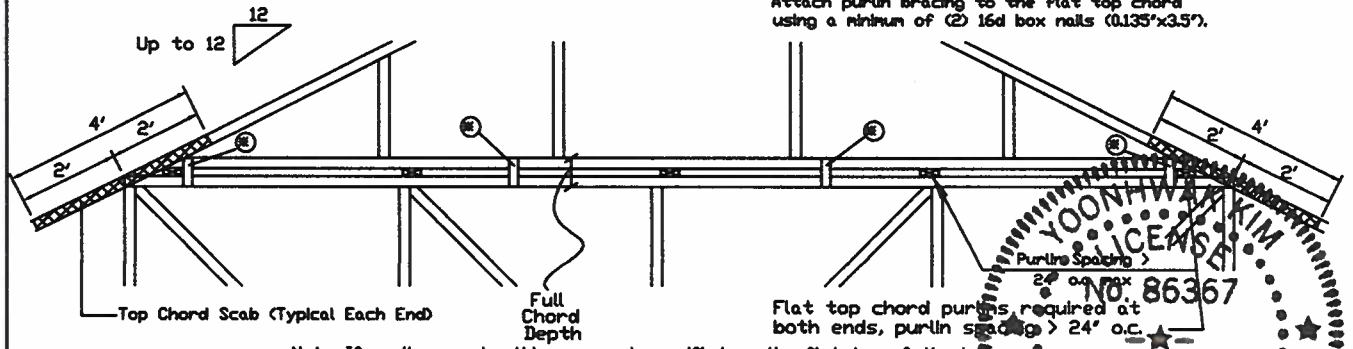
Attach purlin bracing to the flat top chord using (2) 16d box nails (0.135"x3.5").

The top chord #3 grade 2x4 scab may be replaced with either of the following: (1) 3X8 Trulox plate attached with (8) 0.120"x1.375" nails, (4) into cap TC & (4) into base truss TC or (1) 28PB wave piggyback plate plated to the piggyback truss TC and attached to the base truss TC with (4) 0.120"x1.375" nails. Note: Nailing thru holes of wave plate is acceptable.

Detail B : Purlin Spacing > 24" o.c.

Piggyback cap truss slant nailed to all top chord purlin bracing with (2) 16d box nails (0.135"x3.5") and secure top chord with 2x4 #3 grade scab (1 side only at each end) attached with 2 rows of 10d box nails (0.128"x3") at 4' o.c.

Attach purlin bracing to the flat top chord using a minimum of (2) 16d box nails (0.135"x3.5").



Note: If purlins or sheathing are not specified on the flat top of the base truss, purlins must be installed at 24" o.c. max. and use Detail A.

** In addition, provide connection with one of the following methods:

Trulox
Use 3X8 Trulox plates for 2x4 chord member, and 3X10 Trulox plates for 2x6 and larger chord members. Attach to each face @ 8" o.c. with (4) 0.120"x1.375" nails into cap bottom chord and (4) in base truss top chord. Trulox plates may be staggered 4" o.c. front to back faces.

APA Rated Gusset
8"x8"x7/16" (min) APA rated sheathing gussets (each face). Attach @ 8" o.c. with (8) 6d common (0.113"x2") nails per gusset, (4) in cap bottom chord and (4) in base truss top chord. Gussets may be staggered 4" o.c. front to back faces.

2x4 Vertical Scabs
2x4 SPF #2, full chord depth scabs (each face). Attach @ 8" o.c. with (6) 10d box nails (0.128"x3") per scab, (3) in cap bottom chord and (3) in base truss top chord. Scabs may be staggered 4" o.c. front to back faces.

28PB Wave Piggyback Plate
One 28PB wave piggyback plate to each face @ 8" o.c. Attach teeth to piggyback at time of fabrication. Attach to supporting truss with (4) 0.120"x1.375" nails per face per ply. Piggyback plates may be staggered 4" o.c. front to back faces.

YOONHWAK KIM LICENSE No. 86367 STATE OF FLORIDA PROFESSIONAL ENGINEER

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For more information see this job's general notes page and these web sites:
ALPINE) www.alpinebc.com TPI) www.tpinst.org) SBCA) www.sbcindustry.org) ICC) www.iccsafe.org

REF	PIGGYBACK
DATE	10/01/14
DRWG	PB160101014
SPACING	24.0"

01/17/2020
FL REG# 278, Yoonhwak Kim, FL PE #86367

NAIL SPACING DETAIL

MINIMUM SPACING FOR SINGLE BLOCK IS SHOWN. DOUBLE NAIL SPACINGS AND STAGGER NAILING FOR TWO BLOCKS. GREATER SPACING MAY BE REQUIRED TO AVOID SPLITTING.

BLOCK LOCATION, SIZE, LENGTH,GRADE AND TOTAL NUMBER AND TYPE OF NAILS ARE TO BE SPECIFIED ON SEALED DESIGN REFERENCING THIS DETAIL.

LOAD PERPENDICULAR TO GRAIN
A - EDGE DISTANCE AND SPACING BETWEEN STAGGERED ROWS OF NAILS (6 NAIL DIAMETERS)
B - SPACING OF NAILS IN A ROW (12 NAIL DIAMETERS)
C - END DISTANCE (15 NAIL DIAMETERS)

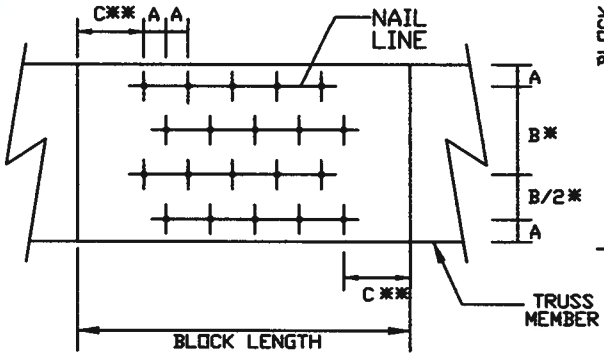
LOAD PARALLEL TO GRAIN
A - EDGE DISTANCE (6 NAIL DIAMETERS)
C - SPACING OF NAILS IN A ROW AND END DISTANCE (15 NAIL DIAMETERS)
D - SPACING BETWEEN STAGGERED ROWS OF NAILS (7 1/2 NAIL DIAMETERS)

IF NAIL HOLES ARE PREBORED, SOME SPACING MAY BE REDUCED BY THE AMOUNTS GIVEN BELOW:
* SPACING MAY BE REDUCED BY 50%
** SPACING MAY BE REDUCED BY 33%

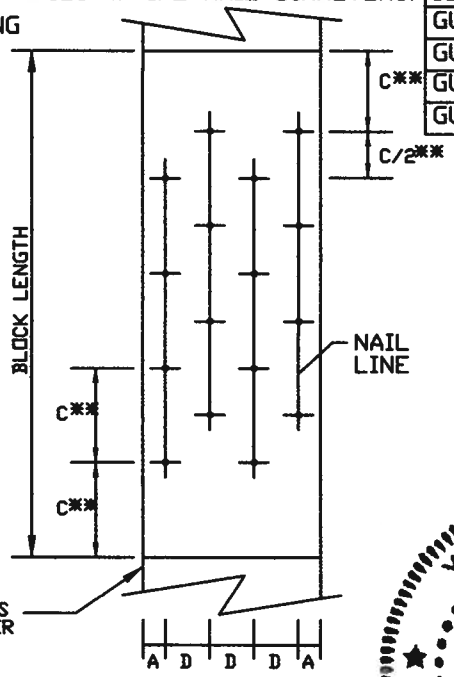
MINIMUM NAIL SPACING DISTANCES

NAIL TYPE	DISTANCES A	B*	C**	D
8d BOX (0.113"X 2.5",MIN)	3/4"	1 3/8"	1 3/4"	7/8"
10d BOX (0.128"X 3.",MIN)	7/8"	1 5/8"	2"	1"
12d BOX (0.128"X 3.25",MIN)	7/8"	1 5/8"	2"	1"
16d BOX (0.135"X 3.5",MIN)	7/8"	1 5/8"	2 1/8"	1 1/8"
20d BOX (0.148"X 4.",MIN)	1"	1 7/8"	2 1/4"	1 1/8"
8d COMMON (0.131"X 2.5",MIN)	7/8"	1 5/8"	2"	1"
10d COMMON (0.148"X 3.",MIN)	1"	1 7/8"	2 1/4"	1 1/8"
12d COMMON (0.148"X 3.25",MIN)	1"	1 7/8"	2 1/4"	1 1/8"
16d COMMON (0.162"X 3.5",MIN)	1'	2"	2 1/2"	1 1/4"
GUN (0.120"X 2.5",MIN)	3/4"	1 1/2"	1 7/8"	1"
GUN (0.131"X 2.5",MIN)	7/8"	1 5/8"	2"	1"
GUN (0.120"X 3.",MIN)	3/4"	1 1/2"	1 7/8"	1"
GUN (0.131"X 3.",MIN)	7/8"	1 5/8"	2"	1"

DIRECTION OF LOAD AND NAIL ROWS



LOAD APPLIED PERPENDICULAR TO GRAIN



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REF	NAIL SPACE
DATE	10/01/14
DRWG	CNNAILSP1014

01/17/2020
FL REG# 278, Yoonhwak Kim, FL PE #86367