FORM R405-2017

FLORIDA ENERGY EFFICIENCY CODE FOR BUILDING CONSTRUCTION

Florida Department of Business and Professional Regulation - Residential Performance Method

Project Name:	New Project TODD	Builder Name:	Stanley Crawford Const. Inc.
Street:	7131 SE CR 245	Permit Office:	
City, State, Zip:	LAKECITY , FL ,	Permit Number:	
Owner:		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	5
5. Is this a worst case?	No
6. Conditioned floor area above grade (ft²)	2718
Conditioned floor area below grade (ft²)	0

7. Windows(356.3 sqft.)	Description	Area
a. U-Factor:	Dbl, U=0.33	356.33 ft²
SHGC:	SHGC=0.22	
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:		2.000 ft.
Area Weighted Average SHGC:		0.220

8. Floor Types (1080.0 sqft.)	Insulation	Area
a. Slab-On-Grade Edge Insulation	R=0.0	1080.00 ft²
b. N/A	R=	ft²
c. N/A	R=	ft²

9. Wall Types (2801.3 sqft.)	Insulation	Area
a. Frame - Wood, Exterior	R=13.0	2801.30 ft²
b. N/A	R=	ft²
c. N/A	R=	ft²
d. N/A	R=	ft²

10. Ceiling Types (1080.0 sqft.)	Insulation	Area
a. Under Attic (Vented)	R=30.0	1080.00 ft²
b. N/A	R=	ft²
c. N/A	R=	ft²

11. Ducts	R	ft²
a. Sup: Attic, Ret: Attic, AH: Main	6	543.6

12. Cooling systems	kBtu/hr	Efficiency
a. Central Unit	60.9	SEER:14.00

13. Heating systems	kBtu/hr	Efficiency
a. Electric Heat Pump	61.2	HSPF:8.42

14. Hot water systems		
a. Propane	Tankless	Cap: 1 gallons EF: 0.860
b. Conservation features		
None		

15. Credits — Pstat

COLUMBIA COUNTY BUILDING DEPARTMENT Received for FILE COPY Code Compliance EXAMINER

Glass/Floor Area: 0.131

Total Proposed Modified Loads: 66.87

Total Baseline Loads: 76.11

PASS

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

SUNCOAST INSULATORS
825 NW 253rd Terrace
Newberry, FL 32669
(352) 472-8595
Fax (352) 472-2633

PREPARED BY: _____
DATE: 5-3-19

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

OWNER/AGENT: Stanley Crawford
DATE: 05-03-2019

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.

GREAT SEAL OF THE STATE OF FLORIDA * IN GOD WE TRUST *

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 5.00 ACH50 (R402.4.1.2).**

FORM R405-2017

INPUT SUMMARY CHECKLIST REPORT

PROJECT

Title:	New Project TODD	Bedrooms:	5	Address Type:	Street Address
Building Type:	User	Conditioned Area:	2629	Lot #	
Owner Name:		Total Stories:	3	Block/Subdivision:	
# of Units:	1	Worst Case:	No	PlatBook:	
Builder Name:	Stanley Crawford Const. Inc.	Rotate Angle:	0	Street:	7131 SE CR 245
Permit Office:		Cross Ventilation:		County:	Columbia
Jurisdiction:		Whole House Fan:		City, State, Zip:	LAKECITY , FL ,
Family Type:	Single-family				
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	2718	24462

SPACES

Number	Name	Area	Volume	Kitchen	Occupants	Bedrooms	Infil ID	Finished	Cooled	Heated
1	Main	2718	24462	Yes	4	5	1	Yes	Yes	Yes

FLOORS

√	#	Floor Type	Space	Perimeter	R-Value	Area		Tile	Wood	Carpet
_____	1	Slab-On-Grade Edge Insulatio	Main	134 ft	0	1080 ft²	----	0	0	1

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	1170 ft²	0 ft²	Medium	N	0.96	No	0.9	No	0	22.6

ATTIC

√	#	Type	Ventilation	Vent Ratio (1 in)	Area	RBS	IRCC
_____	1	Full attic	Vented	150	1080 ft²	N	N

CEILING

√	#	Ceiling Type	Space	R-Value	Ins Type	Area	Framing Frac	Truss Type
_____	1	Under Attic (Vented)	Main	30	Blown	1080 ft²	0.11	Wood

FORM R405-2017

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	S	Exterior	Frame - Wood	Main	13	40		9		360.0 ft²		0.23	0.75	0
____	2	S	Exterior	Frame - Wood	Main	13	40		9		360.0 ft²		0.23	0.75	0
____	3	S	Exterior	Frame - Wood	Main	13	12		8		96.0 ft²		0.23	0.75	0
____	4	W	Exterior	Frame - Wood	Main	13	27		9		243.0 ft²		0.23	0.75	0
____	5	W	Exterior	Frame - Wood	Main	13	27		9		243.0 ft²		0.23	0.75	0
____	6	W	Exterior	Frame - Wood	Main	13	12	8	8		101.3 ft²		0.23	0.75	0
____	7	N	Exterior	Frame - Wood	Main	13	40		9		360.0 ft²		0.23	0.75	0
____	8	N	Exterior	Frame - Wood	Main	13	40		9		360.0 ft²		0.23	0.75	0
____	9	N	Exterior	Frame - Wood	Main	13	11	4	8		90.7 ft²		0.23	0.75	0
____	10	E	Exterior	Frame - Wood	Main	13	27		9		243.0 ft²		0.23	0.75	0
____	11	E	Exterior	Frame - Wood	Main	13	27		9		243.0 ft²		0.23	0.75	0
____	12	E	Exterior	Frame - Wood	Main	13	12	8	8		101.3 ft²		0.23	0.75	0

DOORS

√	#	Ornt	Door Type	Space	Storms	U-Value	Width Ft	Width In	Height Ft	Height In	Area
_____	1	S	Insulated	Main	None	.46	3		6	8	20 ft²
_____	2	W	Insulated	Main	None	.46	3		6	8	20 ft²
_____	3	N	Insulated	Main	None	.46	3		6	8	20 ft²

WINDOWS

Orientation shown is the entered, Proposed orientation.

√	#	Ornt	Wall ID	Frame	Panes	NFRC	U-Factor	SHGC	Imp	Area	Overhang Depth	Overhang Separation	Int Shade	Screening
_____	1	S	1	Vinyl	Double (Clear)	Yes	0.33	0.22	N	72.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	2	S	1	Vinyl	Double (Clear)	Yes	0.33	0.22	N	13.3 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	3	S	2	Vinyl	Double (Clear)	Yes	0.33	0.22	N	75.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	4	S	3	Vinyl	Double (Clear)	Yes	0.33	0.22	N	24.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	5	W	5	Vinyl	Double (Clear)	Yes	0.33	0.22	N	30.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	6	W	5	Vinyl	Double (Clear)	Yes	0.33	0.22	N	4.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	7	W	6	Vinyl	Double (Clear)	Yes	0.33	0.22	N	15.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	8	N	7	Vinyl	Double (Clear)	Yes	0.33	0.22	N	24.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	9	N	7	Vinyl	Double (Clear)	Yes	0.33	0.22	N	36.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	10	N	8	Vinyl	Double (Clear)	Yes	0.33	0.22	N	4.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	11	N	8	Vinyl	Double (Clear)	Yes	0.33	0.22	N	8.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	12	N	8	Vinyl	Double (Clear)	Yes	0.33	0.22	N	30.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	13	N	9	Vinyl	Double (Clear)	Yes	0.33	0.22	N	6.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5
_____	14	E	12	Vinyl	Double (Clear)	Yes	0.33	0.22	N	15.0 ft²	2 ft 0 in	1 ft 0 in	Drapes/blinds	Exterior 5

FORM R405-2017

INPUT SUMMARY CHECKLIST REPORT

INFILTRATION

#	Scope	Method	SLA	CFM 50	ELA	EqLA	ACH	ACH 50
1	Wholehouse	Proposed ACH(50)	.000286	2038.5	111.91	210.46	.175	5

HEATING SYSTEM

√	#	System Type	Subtype	Efficiency	Capacity	Block	Ducts
_____	1 A	Electric Heat Pump/	None	HSPF:8.5	47 kBtu/hr	1	sys#1
_____	1 B	Electric Heat Pump/	None	HSPF:8.2	17.2 kBtu/hr	1	sys#1

COOLING SYSTEM

√	#	System Type	Subtype	Efficiency	Capacity	Air Flow	SHR	Block	Ducts
_____	1 A	Central Unit/	None	SEER: 14	44.5 kBtu/hr	1335 cfm	0.5	1	sys#1
_____	1 B	Central Unit/	None	SEER: 14	16.4 kBtu/hr	492 cfm	0.5	1	sys#1

HOT WATER SYSTEM

√	#	System Type	SubType	Location	EF	Cap	Use	SetPnt	Conservation
_____	1	Propane	Tankless	Exterior	0.86	1 gal	80 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	R-Value	Area	— Return — Location	Area	Leakage Type	Air Handler	CFM 25 TOT	CFM25 OUT	QN	RLF	HVAC # Heat	Cool
_____	1	Attic	6	543.6 ft	Attic	135.9 ft	Default Leakage	Main	(Default)	(Default)			1	1

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]	[X]	[X]
Venting	[ ]	[ ]	[X]	[X]	[ ]	[ ]	[ ]	[ ]	[ ]	[X]	[X]	[ ]

INPUT SUMMARY CHECKLIST REPORT

Thermostat Schedule: HERS 2006 Reference		Hours											
Schedule Type		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

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)*

ENERGY PERFORMANCE LEVEL (EPL) DISPLAY CARD

ESTIMATED ENERGY PERFORMANCE INDEX* = 88

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. 5
5. Is this a worst case? (yes/no)	5. No
6. Conditioned floor area (sq. ft.)	6. 2718
7. Windows, type and area	
a) U-factor:(weighted average)	7a. 0.330
b) Solar Heat Gain Coefficient (SHGC)	7b. 0.220
c) Area	7c. 356.3
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.
2. Masonry (Insulation R-value)	10B2.
11. Ceiling type and insulation level	
a) Under attic	11a. 30.0
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 60.9
a) Split system	SEER
b) Single package	SEER
c) Ground/water source	SEER/COP
d) Room unit/PTAC	EER
e) Other	14.0
14. Heating system:	Capacity 64.2
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	8.42
15. Water heating system	
a) Electric resistance	EF
b) Gas fired, natural gas	EF
c) Gas fired, LPG	EF 0.86
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: Stanley Canford Date: 05-03-2019

Address of New Home: 7131 SE CR 245 City/FL Zip: LAKECITY , FL

☐ **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:	New Project TODD	Builder Name:	Stanley Crawford Const. Inc.	
Street:	7131 SE CR 245	Permit Office:		
City, State, Zip:	LAKECITY , FL ,	Permit Number:		
Owner:		Jurisdiction:		
Design Location:	FL, Gainesville			

COMPONENT	AIR BARRIER CRITERIA	INSULATION INSTALLATION CRITERIA	
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.

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

ADDRESS:	7131 SE CR 245 LAKECITY , FL ,	Permit Number:

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)

☐ **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

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: Stanley Crawford Const. Inc. Community: Lot: NA

Address: 7131 SE CR 245

City: LAKECITY 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): 5.000

_____ x 60 ÷ 24462 = _____
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: _____

wrightsoft

Load Short Form
AH1

Job:
Date: Apr 16, 2019
By: Donna Brackeen

Project Information

For: Todd Residence, Stanley Crawford Construction
Lake City, FL

Design Information

	Htg	Clg
Outside db (°F)	33	92
Inside db (°F)	70	75
Design TD (°F)	37	17
Daily range	-	M
Inside humidity (%)	50	50
Moisture difference (gr/lb)	32	47

Infiltration

Method	Simplified
Construction quality	Average
Fireplaces	0

HEATING EQUIPMENT

Make	Goodman Mfg.
Trade	GOODMAN; JANITROL; AMANA DISTI...
Model	GSZ140491K
AHRI ref	7995031

Efficiency	8.5 HSPF
Heating input	
Heating output	47000 Btuh @ 47°F
Temperature rise	0 °F
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0.50 in H2O
Space thermostat	
Capacity balance point = 21 °F	

COOLING EQUIPMENT

Make	Goodman Mfg.
Trade	GOODMAN; JANITROL; AMANA DISTI...
Cond	GSZ140491K
Coil	ARUF61D14A
AHRI ref	7995031

Efficiency	12.0 EER, 14 SEER
Sensible cooling	31150 Btuh
Latent cooling	13350 Btuh
Total cooling	44500 Btuh
Actual air flow	1483 cfm
Air flow factor	0.044 cfm/Btuh
Static pressure	0.50 in H2O
Load sensible heat ratio	0.87

ROOM NAME	Area (ft²)	Htg load (Btuh)	Clg load (Btuh)	Htg AVF (cfm)	Clg AVF (cfm)
Level 1	1080	17742	19669	0	874
Level 2	1033	9937	16090	0	715
AH1	2113	27679	33356	0	1483
Other equip loads		0	0		
Equip. @ 1.00 RSM			33356		
Latent cooling			4891		
TOTALS	2113	27679	38247	0	1483

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

wrightsoft

Load Short Form
AH2

Job:
Date: Apr 16, 2019
By: Donna Brackeen

Project Information

For: Todd Residence, Stanley Crawford Construction
Lake City, FL

Design Information

	Htg	Clg
Outside db (°F)	33	92
Inside db (°F)	70	75
Design TD (°F)	37	17
Daily range	-	M
Inside humidity (%)	50	50
Moisture difference (gr/lb)	32	47

Infiltration

Method	Simplified
Construction quality	Average
Fireplaces	0

HEATING EQUIPMENT

Make	Goodman Mfg.
Trade	
Model	GSZ140181K*
AHRI ref	8566978

Efficiency	8.2 HSPF	
Heating input		
Heating output	17200	Btuh @ 47°F
Temperature rise	29	°F
Actual air flow	547	cfm
Air flow factor	0.064	cfm/Btuh
Static pressure	0.50	in H2O
Space thermostat		
Capacity balance point = 17 °F		

COOLING EQUIPMENT

Make	Goodman Mfg.
Trade	
Cond	GSZ140181K*
Coil	CF035SGEB++TXV+TDR
AHRI ref	8566978

Efficiency	11.0 EER, 14 SEER	
Sensible cooling	11480	Btuh
Latent cooling	4920	Btuh
Total cooling	16400	Btuh
Actual air flow	547	cfm
Air flow factor	0.052	cfm/Btuh
Static pressure	0.50	in H2O
Load sensible heat ratio	0.86	

ROOM NAME	Area (ft²)	Htg load (Btuh)	Clg load (Btuh)	Htg AVF (cfm)	Clg AVF (cfm)
Level 3	605	8532	10931	547	568
AH2	605	8532	10530	547	547
Other equip loads		0	0		
Equip. @ 1.00 RSM			10530		
Latent cooling			1748		
TOTALS	605	8532	12279	547	547

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

wrightsoft

Load Short Form
Level 1

Job:
Date: Apr 16, 2019
By: Donna Brackeen

Project Information

For: Todd Residence, Stanley Crawford Construction
Lake City, FL

Design Information

	Htg	Clg
Outside db (°F)	33	92
Inside db (°F)	70	75
Design TD (°F)	37	17
Daily range	-	M
Inside humidity (%)	50	50
Moisture difference (gr/lb)	32	47

Infiltration

Method	Simplified
Construction quality	Average
Fireplaces	0

HEATING EQUIPMENT

Make	n/a
Trade	n/a
Model	n/a
AHRI ref	n/a
Efficiency	n/a
Heating input	
Heating output	0 Btuh
Temperature rise	0 °F
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Space thermostat	n/a

COOLING EQUIPMENT

Make	n/a
Trade	n/a
Cond	n/a
Coil	n/a
AHRI ref	n/a
Efficiency	n/a
Sensible cooling	0 Btuh
Latent cooling	0 Btuh
Total cooling	0 Btuh
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Load sensible heat ratio	0

ROOM NAME	Area (ft²)	Htg load (Btuh)	Clg load (Btuh)	Htg AVF (cfm)	Clg AVF (cfm)
G RM	268	4149	4815	0	214
Study	189	3551	4115	0	183
Bath	63	667	191	0	8
CC	19	0	0	0	0
Utility	26	0	0	0	0
Foyer	77	1820	1822	0	81
Laund	63	1933	1337	0	59
Kit	196	2283	3638	0	162
Dining	125	3338	3752	0	167
Up	55	0	0	0	0

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

Level 1	1080	17742	19669	0	874
Other equip loads		0	0		
Equip. @ 1.00 RSM			19669		
Latent cooling			2122		
TOTALS	1080	17742	21791	0	874

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

Project Information

For: Todd Residence, Stanley Crawford Construction
Lake City, FL

Design Information

	Htg	Clg
Outside db (°F)	33	92
Inside db (°F)	70	75
Design TD (°F)	37	17
Daily range	-	M
Inside humidity (%)	50	50
Moisture difference (gr/lb)	32	47

Infiltration	
Method	Simplified
Construction quality	Average
Fireplaces	0

HEATING EQUIPMENT

Make	n/a
Trade	n/a
Model	n/a
AHRI ref	n/a
Efficiency	n/a
Heating input	
Heating output	0 Btuh
Temperature rise	0 °F
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Space thermostat	n/a

COOLING EQUIPMENT

Make	n/a
Trade	n/a
Cond	n/a
Coil	n/a
AHRI ref	n/a
Efficiency	n/a
Sensible cooling	0 Btuh
Latent cooling	0 Btuh
Total cooling	0 Btuh
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Load sensible heat ratio	0

ROOM NAME	Area (ft²)	Htg load (Btuh)	Clg load (Btuh)	Htg AVF (cfm)	Clg AVF (cfm)
bd2	167	2211	3611	0	161
WIC	44	0	0	0	0
Mbd	235	2593	4651	0	207
m bth	76	1430	1289	0	57
Pwdr	63	168	496	0	22
c2	39	0	0	0	0
ln	5	0	0	0	0
wc	41	658	786	0	35
W I C	25	0	0	0	0
c	17	0	0	0	0
bd3	157	2044	3708	0	165
C3	16	0	0	0	0
hall	138	834	1549	0	69
ch	11	0	0	0	0

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

Level 2	1033	9937	16090	0	715
Other equip loads		0	0		
Equip. @ 1.00 RSM			16090		
Latent cooling			3245		
TOTALS	1033	9937	19335	0	715

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

wrightsoft

Load Short Form
Level 3

Job:
Date: Apr 16, 2019
By: Donna Brackeen

Project Information

For: Todd Residence, Stanley Crawford Construction
Lake City, FL

Design Information

	Htg	Clg
Outside db (°F)	33	92
Inside db (°F)	70	75
Design TD (°F)	37	17
Daily range	-	M
Inside humidity (%)	50	50
Moisture difference (gr/lb)	32	47

Infiltration

Method	Simplified
Construction quality	Average
Fireplaces	0

HEATING EQUIPMENT

Make	n/a
Trade	n/a
Model	n/a
AHRI ref	n/a
Efficiency	n/a
Heating input	
Heating output	0 Btuh
Temperature rise	0 °F
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Space thermostat	n/a

COOLING EQUIPMENT

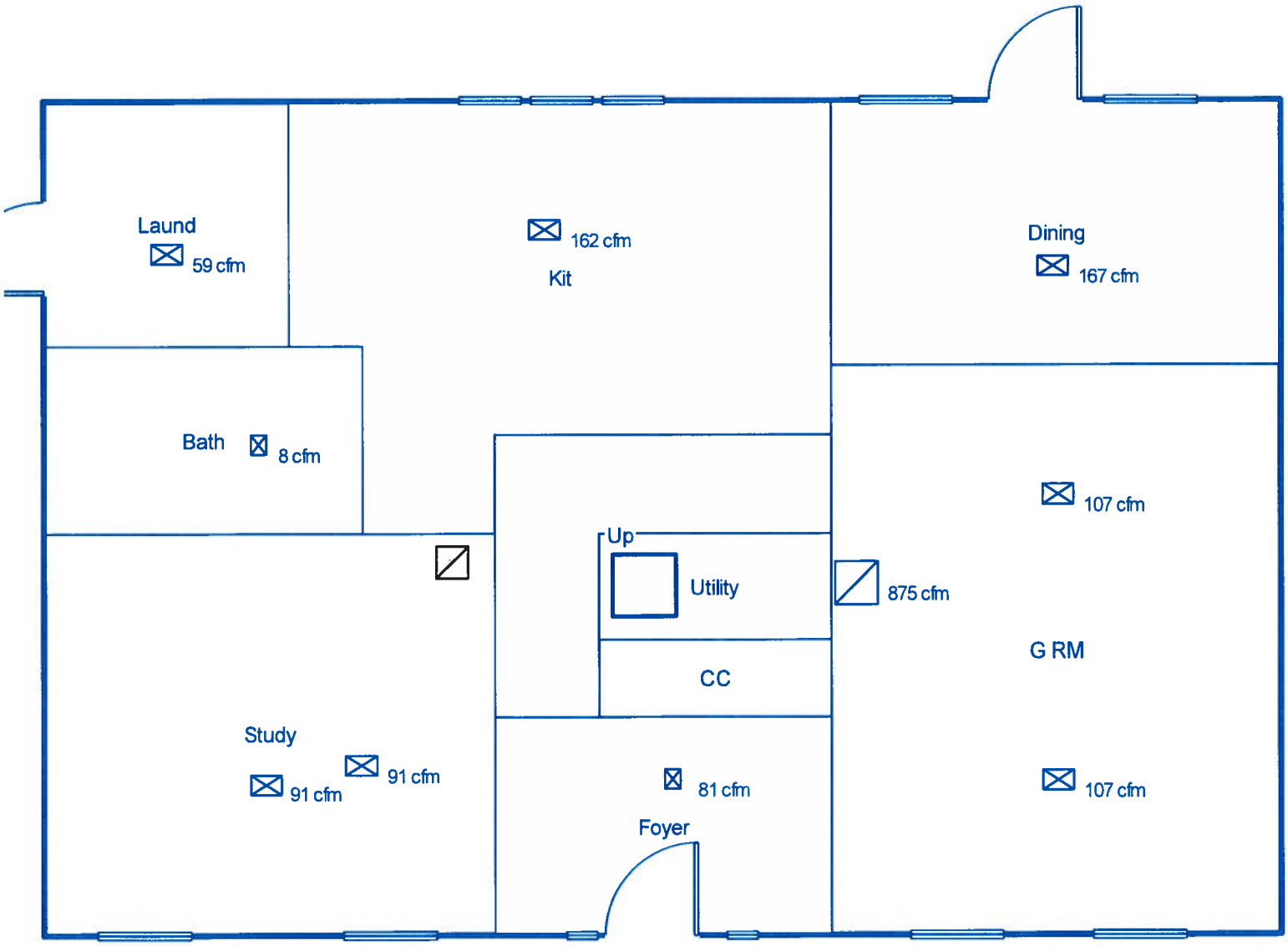
Make	n/a
Trade	n/a
Cond	n/a
Coil	n/a
AHRI ref	n/a
Efficiency	n/a
Sensible cooling	0 Btuh
Latent cooling	0 Btuh
Total cooling	0 Btuh
Actual air flow	0 cfm
Air flow factor	0 cfm/Btuh
Static pressure	0 in H2O
Load sensible heat ratio	0

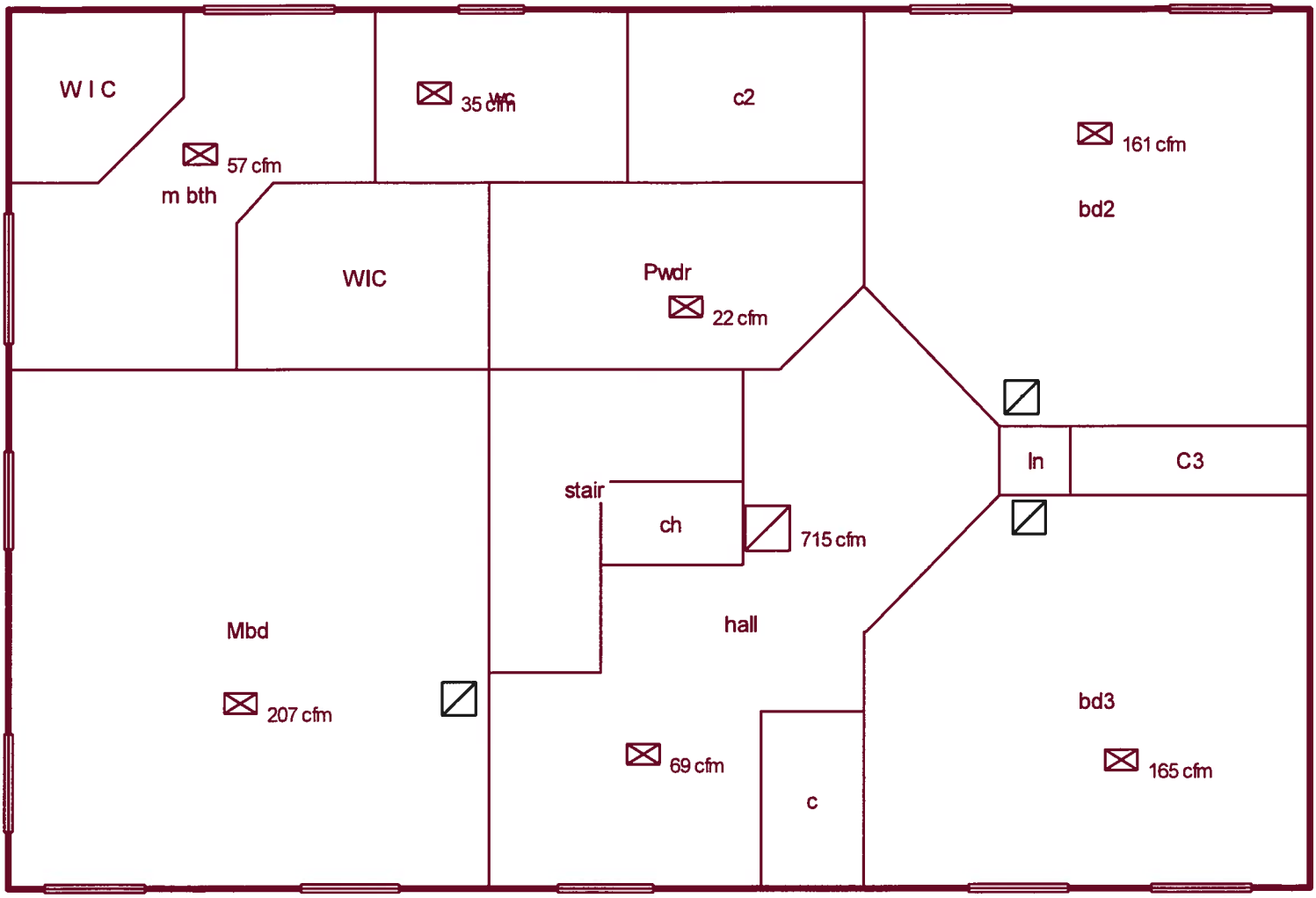
ROOM NAME	Area (ft²)	Htg load (Btuh)	Clg load (Btuh)	Htg AVF (cfm)	Clg AVF (cfm)
bath 3	61	1276	1481	82	77
hall 3	126	1326	1681	85	87
c4	18	0	0	0	0
Bd4	184	3026	3934	194	204
ac	11	0	0	0	0
c5	18	0	0	0	0
Bd5	187	2904	3835	186	199

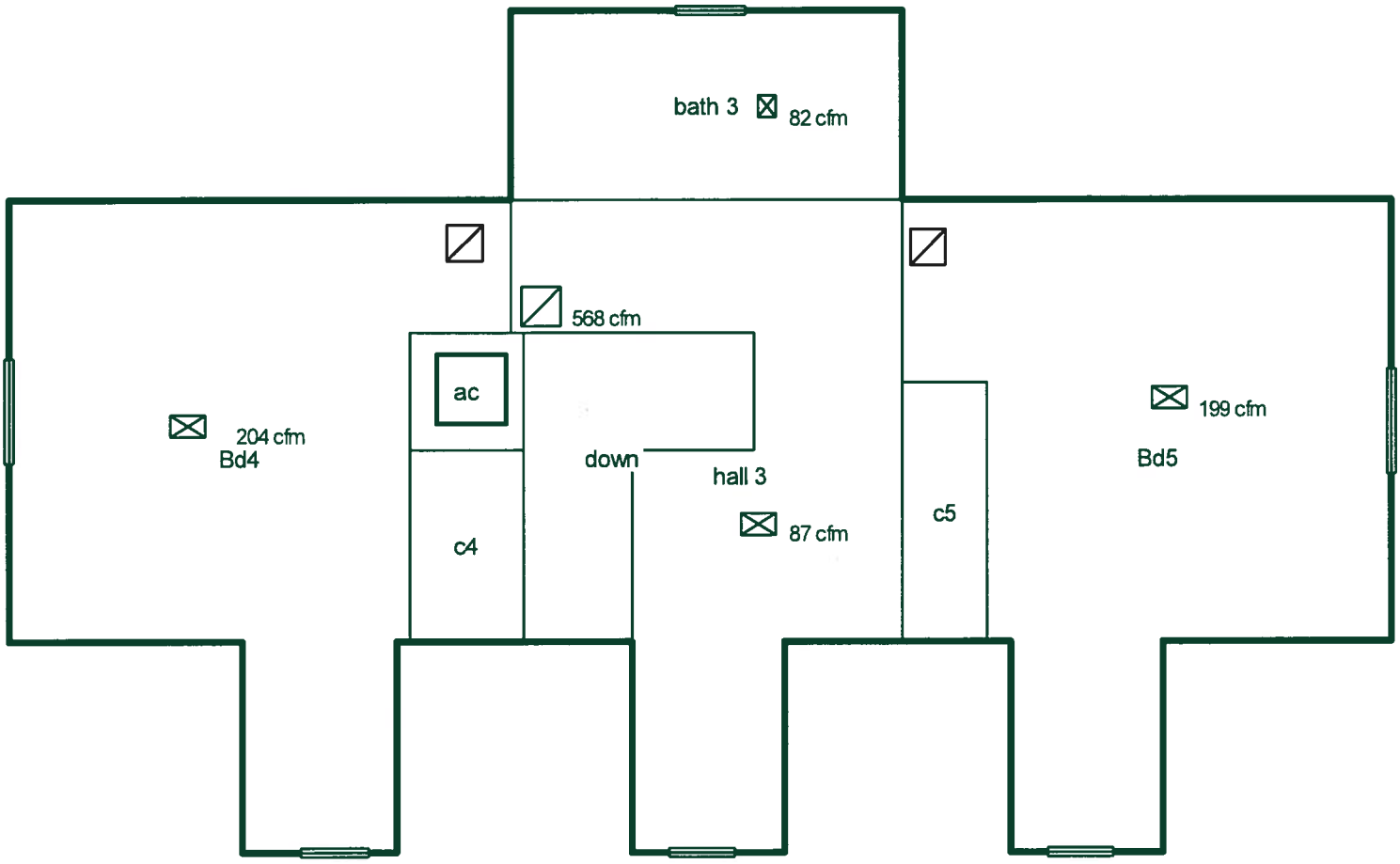
Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.

Level 3	605	8532	10931	547	568
Other equip loads		0	0		
Equip. @ 1.00 RSM			10931		
Latent cooling			1748		
TOTALS	605	8532	12679	547	568

Calculations approved by ACCA to meet all requirements of Manual J 8th Ed.


Laund
59 cfm
162 cfm
Kit
Dining
167 cfm
Bath
8 cfm
107 cfm
Up
Utility
875 cfm
G RM
CC
Study
91 cfm
91 cfm
81 cfm
107 cfm
Foyer


W I C
57 cfm
m bth
35 cfm
c2
161 cfm
bd2
WIC
Pwdr
22 cfm
ln
C3
stair
ch
715 cfm
Mbd
207 cfm
hall
69 cfm
c
bd3
165 cfm


bath 3
82 cfm
568 cfm
ac
204 cfm
Bd4
down
hall 3
87 cfm
c4
c5
199 cfm
Bd5

Lumber design values are in accordance with ANSI/TPI 1 section 6.3
These truss designs rely on lumber values established by others.

RE: Todd - Todd

MiTek USA, Inc.
6904 Parke East Blvd.
Tampa, FL 33610-4115

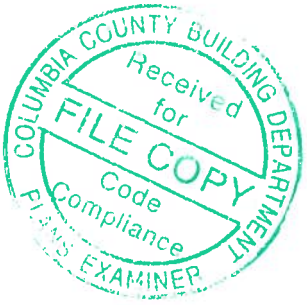
Site Information:
Customer Info: SCCI Project Name: . Model: .
Lot/Block: . Subdivision: .
Address: ., .
City: Lake City State: FL

Name Address and License # of Structural Engineer of Record, If there is one, for the building.
Name: License #:
Address:
City: State:

General Truss Engineering Criteria & Design Loads (Individual Truss Design Drawings Show Special Loading Conditions):
Design Code: FBC2017/TPI2014 Design Program: MiTek 20/20 8.2
Wind Code: N/A Wind Speed: N/A mph
Roof Load: N/A psf Floor Load: 55.0 psf

This package includes 12 individual, Truss Design Drawings and 0 Additional Drawings.
With my seal affixed to this sheet, I hereby certify that I am the Truss Design Engineer and this index sheet conforms to 61G15-31.003, section 5 of the Florida Board of Professional Engineers Rules.

No.	Seal#	Truss Name	Date
1	T16998237	A1GE1	5/8/19
2	T16998238	A2	5/8/19
3	T16998239	A3	5/8/19
4	T16998240	A4	5/8/19
5	T16998241	A5	5/8/19
6	T16998242	F01	5/8/19
7	T16998243	F02	5/8/19
8	T16998244	F03	5/8/19
9	T16998245	F04	5/8/19
10	T16998246	F05	5/8/19
11	T16998247	F06	5/8/19
12	T16998248	F07	5/8/19



The truss drawing(s) referenced above have been prepared by MiTek USA, Inc. under my direct supervision based on the parameters provided by Mayo Truss Company, Inc..

Truss Design Engineer's Name: Lee, Julius
My license renewal date for the state of Florida is February 28, 2021.

IMPORTANT NOTE: The seal on these truss component designs is a certification that the engineer named is licensed in the jurisdiction(s) identified and that the designs comply with ANSI/TPI 1. These designs are based upon parameters shown (e.g., loads, supports, dimensions, shapes and design codes), which were given to MiTek. Any project specific information included is for MiTek's customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek has not independently verified the applicability of the design parameters or the designs for any particular building. Before use, the building designer should verify applicability of design parameters and properly incorporate these designs into the overall building design per ANSI/TPI 1, Chapter 2.

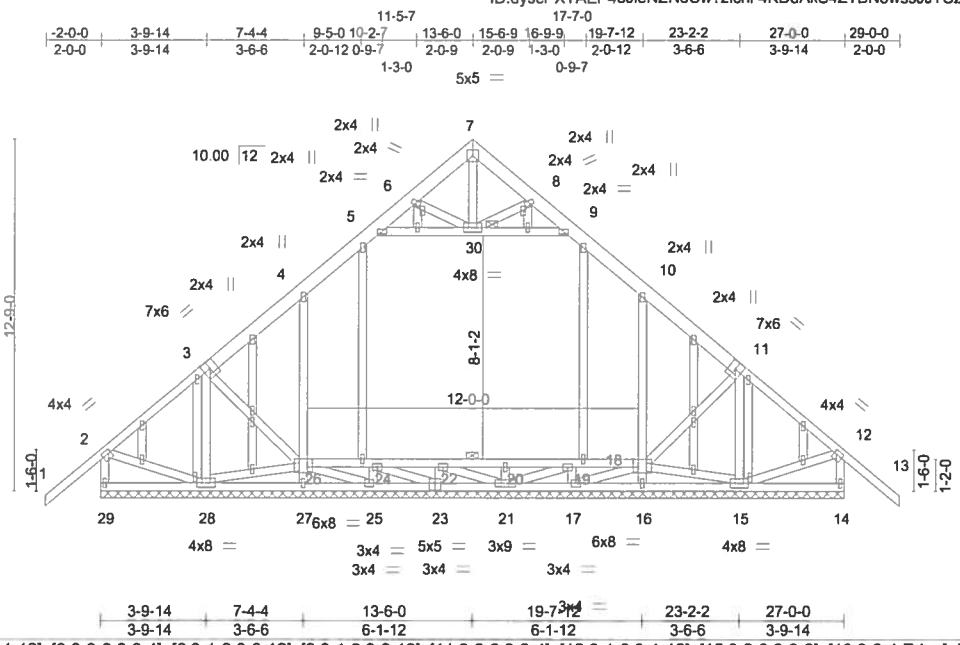
Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

Job	Truss	Truss Type	Qty	Ply	Todd	T16998237
Todd	A1GE1	GABLE	2	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:45 2019 Page 1
ID:dyscPXTAEP48JleNZN3Cw?zlcnl-4KDdAkS4ZTBN3wssJJTCzCVA4bqtWYP2?WqwtszIaSy



Scale = 1:80.6

Plate Offsets (X,Y)-- [2:0-1-0,0-1-12], [3:0-3-0,0-3-4], [6:0-1-9,0-0-12], [8:0-1-9,0-0-12], [11:0-3-0,0-3-4], [12:0-1-0,0-1-12], [15:0-2-0,0-0-2], [18:0-2-4,Edge], [23:0-2-8,0-3-0], [26:0-2-4,Edge], [28:0-2-0,0-0-2]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.32	Vert(LL)	-0.03	13	n/r	120	MT20	244/190
TCDL	10.0	Lumber DOL	1.25	BC	0.11	Vert(CT)	-0.05	13	n/r	120		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.13	Horz(CT)	0.01	14	n/a	n/a		
BCDL	10.0	Code FBC2017/TPI2014		Matrix-S							Weight: 305 lb	FT = 0%

LUMBER-

TOP CHORD	2x6 SP No.2 *Except* 1-3,11-13: 2x4 SP No.2
BOT CHORD	2x4 SP No.2
WEBS	2x4 SP No.2
OTHERS	2x4 SP No.2

BRACING-

TOP CHORD	Structural wood sheathing directly applied or 6-0-0 oc purlins, except end verticals.
BOT CHORD	Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 6-0-0 oc bracing: 28-29,14-15. 10-0-0 oc bracing: 18-26
JOINTS	1 Brace at Jt(s): 30

REACTIONS. All bearings 27-0-0.
(lb) - Max Horz 29=-295(LC 10)
Max Uplift All uplift 100 lb or less at joint(s) 29, 27, 14
Max Grav All reactions 250 lb or less at joint(s) 23, 25, 21, 17 except 29=551(LC 1), 16=379(LC 19), 15=390(LC 1), 27=402(LC 18), 28=390(LC 1), 14=551(LC 1)

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

TOP CHORD	2-3=-374/9, 3-4=-516/39, 4-5=-543/153, 5-6=-368/94, 6-7=-271/82, 7-8=-271/82, 8-9=-368/93, 9-10=-543/152, 10-11=-515/39, 11-12=-364/11, 2-29=-519/114, 12-14=-519/112
BOT CHORD	28-29=-270/272
WEBS	16-18=-338/104, 10-18=-355/134, 11-15=-423/30, 26-27=-347/110, 4-26=-360/134, 3-28=-423/27, 2-28=-4/284, 12-15=0/270

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=101mph; TCDL=6.0psf; BCDL=6.0psf; h=15ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (directional) and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) Truss designed for wind loads in the plane of the truss only. For studs exposed to wind (normal to the face), see Standard Industry Gable End Details as applicable, or consult qualified building designer as per ANSI/TPI 1.
4) All plates are 1.5x4 MT20 unless otherwise indicated.
5) Gable requires continuous bottom chord bearing.
6) Gable studs spaced at 2-0-0 oc.
7) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
8) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
9) Ceiling dead load (5.0 psf) on member(s). 4-5, 9-10, 5-30, 9-30; Wall dead load (5.0psf) on member(s).10-18, 4-26
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) 29, 27, 14.
11) Attic room checked for L/360 deflection.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	T16998238
Todd	A2	ATTIC	8	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:46 2019 Page 1
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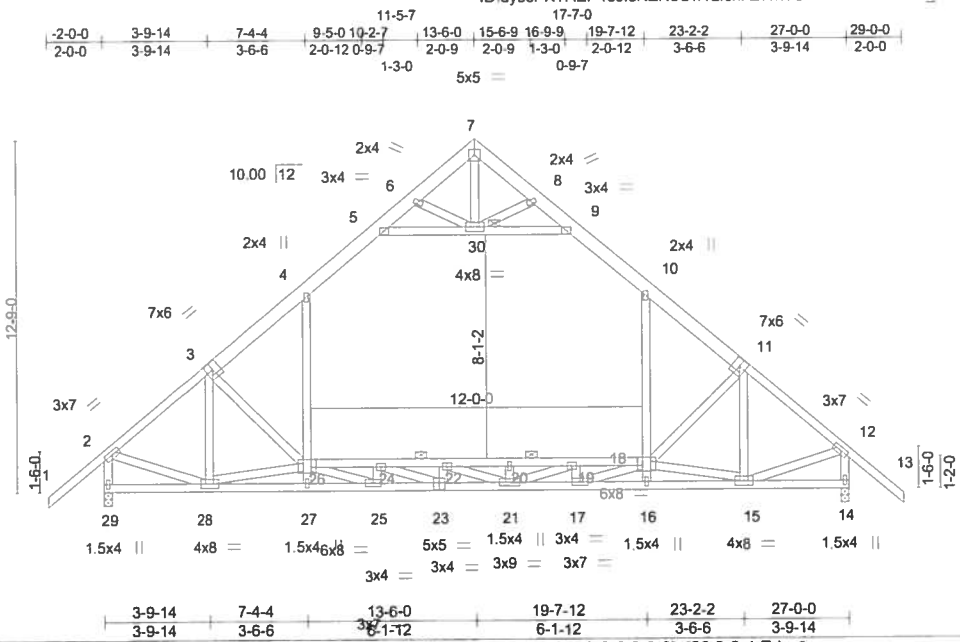

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.59	Vert(LL)	-0.20	20-22	>999	240	MT20	244/190
TCDL	10.0	Lumber DOL	1.25	BC	0.97	Vert(CT)	-0.37	20-22	>860	180		
BCLL	0.0 *	Rep Stress Incr	YES	WB	0.50	Horz(CT)	0.04	14	n/a	n/a		
BCDL	10.0	Code FBC2017/TPI2014		Matrix-MS		Attic	-0.09	18-26	1576	360	Weight: 251 lb	FT = 0%

LUMBER-
TOP CHORD 2x6 SP SS *Except*
1-3,11-13: 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.2

BRACING-
TOP CHORD Structural wood sheathing directly applied or 4-5-1 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 28-29,14-15.
4-4-0 oc bracing: 18-26
JOINTS 1 Brace at Jt(s): 30

REACTIONS. (lb/size) 29=1502/0-3-8, 14=1502/0-3-8
Max Horz 29=-295(LC 10)
Max Grav 29=1744(LC 18), 14=1744(LC 19)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1662/0, 3-4=-1975/0, 4-5=-1286/101, 5-6=0/571, 6-7=0/354, 7-8=0/354, 8-9=0/572, 9-10=-1295/101, 10-11=-1990/0, 11-12=-1662/0, 2-29=-1708/76, 12-14=-1707/76
BOT CHORD 28-29=-271/267, 27-28=-159/962, 25-27=-193/945, 23-25=0/2214, 21-23=0/2768, 17-21=0/2083, 16-17=-70/927, 15-16=-50/929, 24-26=-840/18, 22-24=-1564/0, 20-22=-1642/0, 19-20=-1642/0, 18-19=-879/61
WEBS 10-18=0/998, 11-15=-646/0, 5-30=-2094/0, 9-30=-2115/0, 4-26=0/1000, 3-28=-627/0, 7-30=-468/0, 2-28=0/1349, 12-15=0/1352, 24-25=-590/0, 22-23=-266/0, 20-21=-264/0, 17-19=-593/0, 25-26=0/1761, 23-24=0/846, 19-21=0/931, 17-18=0/1757, 26-28=-5/954, 15-18=-97/1014, 6-30=0/633, 8-30=0/642

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=101mph; TCDL=6.0psf; BCDL=6.0psf; h=15ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (directional) and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
3) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
4) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
5) Ceiling dead load (5.0 psf) on member(s). 4-5, 9-10, 5-30, 9-30; Wall dead load (5.0psf) on member(s).10-18, 4-26
6) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 24-26, 22-24, 20-22, 19-20, 18-19
7) Attic room checked for L/360 deflection.

LOAD CASE(S) Standard

JULIUS LEE LICENSE No 34869 STATE OF FLORIDA PROFESSIONAL ENGINEER

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date: May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd
Todd	A3	ATTIC	4	2	T16998239

Job Reference (optional)

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:49 2019 Page 1
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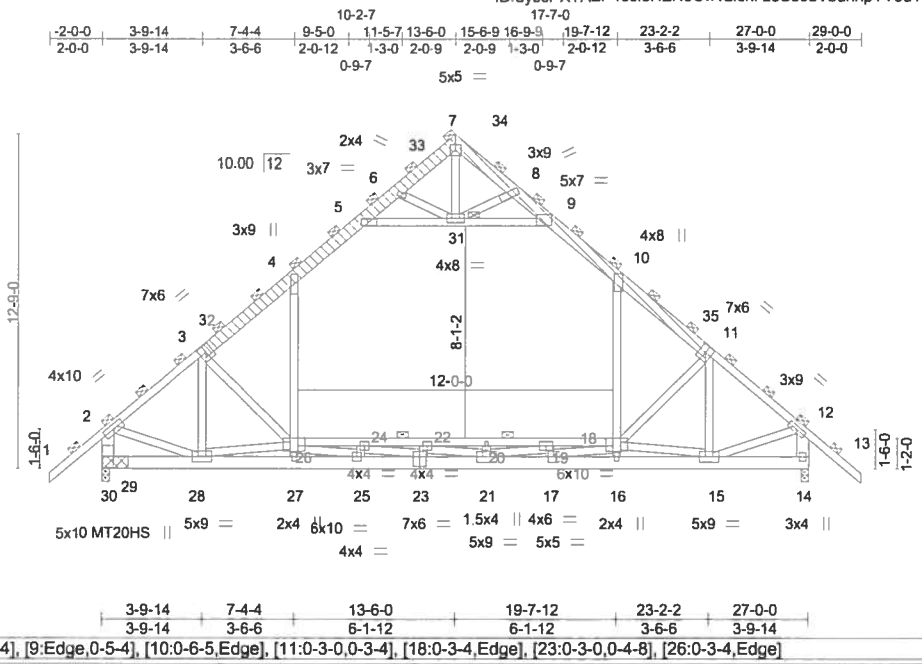

Plate Offsets (X,Y)-- [3:0-3-0,0-3-4], [9:Edge,0-5-4], [10:0-6-5,Edge], [11:0-3-0,0-3-4], [18:0-3-4,Edge], [23:0-3-0,0-4-8], [26:0-3-4,Edge]

LOADING (psf)		SPACING-	4-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.92	Vert(LL)	-0.26	22-24	>999	240	MT20	244/190
TCDL	10.0	Lumber DOL	1.25	BC	0.60	Vert(CT)	-0.43	22-24	>732	180	MT20HS	187/143
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.67	Horz(CT)	0.03	14	n/a	n/a		
BCDL	10.0	Code FBC2017/TPI2014		Matrix-MS		Attic	-0.13	18-26	1119	360	Weight: 672 lb	FT = 0%

LUMBER-

TOP CHORD	2x6 SP SS *Except* 1-3,11-13: 2x4 SP No.2
BOT CHORD	2x6 SP SS *Except* 18-26: 2x4 SP No.2
WEBS	2x4 SP No.2 *Except* 2-30,12-14: 2x6 SP No.2
OTHERS	2x6 SP SS
LBR SCAB	3-7 2x6 SP SS one side 7-11 2x6 SP SS one side

BRACING-

TOP CHORD	2-0-0 oc purlins (3-8-13 max.), except end verticals (Switched from sheeted: Spacing > 2-8-0).
BOT CHORD	Rigid ceiling directly applied or 6-0-0 oc bracing. Except: 5-6-0 oc bracing: 18-26
JOINTS	1 Brace at Jt(s): 7, 31, 2, 12

REACTIONS. (lb/size) 30=5040/(0-3-8 + bearing block) (req. 0-4-11), 14=3454/0-3-8
Max Horz 30=-589(LC 10)
Max Grav 30=7958(LC 18), 14=4389(LC 19)

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

TOP CHORD	2-3=-7562/217, 3-32=-6389/29, 4-32=-5547/21, 4-5=-4163/289, 5-6=0/1276, 6-33=0/922, 7-33=0/974, 7-34=0/992, 8-34=0/940, 8-9=0/1706, 9-10=-3827/295, 10-35=-5643/25, 11-35=-5839/0, 11-12=-4165/29, 2-30=-7477/472, 12-14=-4163/233
BOT CHORD	29-30=-338/851, 28-29=-338/851, 27-28=-515/8390, 25-27=-573/8434, 23-25=0/9130, 21-23=0/8339, 17-21=0/2961, 16-17=-2182/641, 15-16=-1871/710, 14-15=-43/325, 24-26=-4848/221, 22-24=-4351/0, 20-22=-2629/0, 19-20=-2629/0, 18-19=-565/1878
WEBS	16-18=0/1003, 10-18=0/2931, 11-18=-20/1168, 11-15=-2604/5, 5-31=-5550/60, 9-31=-6671/143, 26-27=0/624, 4-26=0/2297, 3-26=-2093/482, 3-28=-610/0, 7-31=-1096/0, 2-28=-26/5230, 12-15=0/3265, 24-25=-541/86, 22-23=-140/283, 20-21=-489/0, 17-19=-1786/0, 25-26=0/1602, 23-24=-784/599, 21-22=-2250/177, 19-21=0/4000, 17-18=0/4741, 26-28=-2687/656, 15-18=-15/5154, 6-31=0/961, 8-31=0/2097

NOTES-

1) 2-ply truss to be connected together with 10d (0.131"x3") nails as follows:
   Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc, 2x6 - 2 rows staggered at 0-9-0 oc.
   Bottom chords connected as follows: 2x6 - 2 rows staggered at 0-9-0 oc, 2x4 - 1 row at 0-9-0 oc.
   Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Attached 12-7-13 scab 3 to 7, front face(s) 2x6 SP SS with 2 row(s) of 10d (0.148"x3") nails spaced 9" o.c.except : starting at 0-0-0 from end at joint 3, nail 2 row(s) at 4" o.c. for 2-0-0; starting at 3-5-8 from end at joint 3, nail 2 row(s) at 4" o.c. for 2-0-0; starting at 6-9-0 from end at joint 3, nail 3 row(s) at 4" o.c. for 5-8-8.
4) Attached 12-7-13 scab 7 to 11, front face(s) 2x6 SP SS with 2 row(s) of 10d (0.148"x3") nails spaced 9" o.c.except : starting at 0-0-0 from end at joint 7, nail 3 row(s) at 4" o.c. for 5-8-8; starting at 7-0-0 from end at joint 7, nail 2 row(s) at 4" o.c. for 2-0-0; starting at 10-5-8 from end at joint 7, nail 2 row(s) at 7" o.c. for 2-0-0.
5) 2x6 SP SS bearing block 12" long at jt. 30 attached to each face with 3 rows of 10d (0.131"x3") nails spaced 3" o.c. 12 Total

Continued on page 2.

JULIUS LEE LICENSE No 34869 STATE OF FLORIDA PROFESSIONAL ENGINEER

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date: May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

NOTES-

6) Unbalanced roof live loads have been considered for this design.
7) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=101mph; TCDL=6.0psf; BCDL=6.0psf; h=15ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (directional) and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
8) All plates are MT20 plates unless otherwise indicated.
9) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
10) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
11) Ceiling dead load (5.0 psf) on member(s). 4-5, 9-10, 5-31, 9-31; Wall dead load (5.0psf) on member(s).10-18, 4-26
12) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 24-26, 22-24, 20-22, 19-20, 18-19
13) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.
14) Attic room checked for L/360 deflection.

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25
   Uniform Loads (plf)
      Vert: 1-2=-120, 6-7=-120, 7-9=-120, 9-10=-140, 10-12=-120, 12-13=-120, 27-30=-100, 14-27=-40, 18-26=-60, 5-9=-20
      Drag: 10-18=-20, 4-26=-20
   Trapezoidal Loads (plf)
      Vert: 2=-349(F=-135)-to-4=-296(F=-135), 4=-316(F=-135)-to-5=-297(F=-135), 5=-277(F=-135)-to-6=-267(F=-135)

Job	Truss	Truss Type	Qty	Ply	Todd	
Todd	A4	ATTIC	1	3	Job Reference (optional)	T16998240

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:50 2019 Page 1
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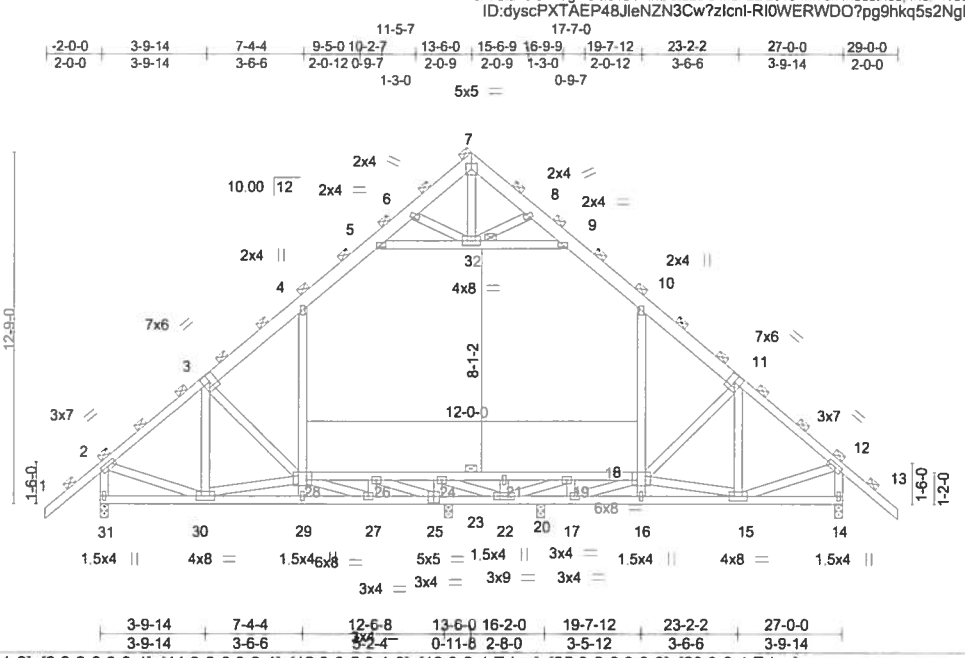

Plate Offsets (X,Y)-- [2:0-3-5,0-1-8], [3:0-3-0,0-3-4], [11:0-3-0,0-3-4], [12:0-3-5,0-1-8], [18:0-2-4,Edge], [25:0-2-8,0-3-0], [28:0-2-4,Edge]

LOADING (psf)		SPACING-	5-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.31	Vert(LL)	-0.04	28	>999	240	MT20	244/190
TCDL	10.0	Lumber DOL	1.25	BC	0.68	Vert(CT)	-0.08	29	>999	180		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.16	Horz(CT)	0.02	14	n/a	n/a		
BCDL	10.0	Code FBC2017/TPI2014		Matrix-MS		Attic	0.02	18-28	6576	360	Weight: 752 lb	FT = 0%

LUMBER-
TOP CHORD 2x6 SP No.2 *Except* 1-3,11-13: 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.2

BRACING-
TOP CHORD 2-0-0 oc purlins (6-0-0 max.), except end verticals (Switched from sheeted: Spacing > 2-8-0).
BOT CHORD Rigid ceiling directly applied or 6-0-0 oc bracing. Except: 6-0-0 oc bracing: 18-28
JOINTS 1 Brace at Jt(s): 7, 32, 2, 12

REACTIONS. All bearings 0-3-8.
(lb) - Max Horz 31=-737(LC 10)
Max Grav All reactions 250 lb or less at joint(s) except 31=3002(LC 18), 14=2828(LC 19), 23=2554(LC 18), 20=1684(LC 19)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-2703/184, 3-4=-2660/197, 4-5=-2300/461, 5-6=-1172/275, 6-7=-1044/256, 7-8=-1057/256, 8-9=-1143/277, 9-10=-2380/462, 10-11=-2730/194, 11-12=-2612/188, 2-31=-2937/409, 12-14=-2752/413
BOT CHORD 30-31=-676/671, 29-30=-70/3843, 27-29=-99/3910, 25-27=0/2460, 23-25=-1347/429, 22-23=-1347/429, 20-22=-99/598, 17-20=-99/598, 16-17=-87/2653, 15-16=-57/2643, 26-28=-621/411, 24-26=0/3187, 21-24=0/2944, 19-21=0/2944, 18-19=0/1495
WEBS 16-18=0/360, 10-18=-508/308, 11-18=-504/370, 11-15=-590/142, 5-32=-1300/295, 9-32=-1387/298, 28-29=0/253, 4-28=-426/313, 3-28=-633/363, 3-30=-385/167, 2-30=0/2169, 12-15=0/2096, 26-27=-110/876, 24-25=-734/0, 21-22=-655/0, 17-19=-231/319, 27-28=-1628/533, 25-26=-3813/0, 22-24=-276/198, 19-22=-1686/137, 17-18=-2389/504, 28-30=-1502/303, 15-18=-1085/463, 6-32=-175/294, 8-32=-174/361

NOTES-
1) 3-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc, 2x6 - 2 rows staggered at 0-9-0 oc.
Bottom chords connected as follows: 2x4 - 1 row at 0-9-0 oc.
Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Unbalanced roof live loads have been considered for this design.
4) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=101mph; TCDL=6.0psf; BCDL=6.0psf; h=15ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (directional) and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Ceiling dead load (5.0 psf) on member(s). 4-5, 9-10, 5-32, 9-32; Wall dead load (5.0psf) on member(s).10-18, 4-28
8) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 26-28, 24-26, 21-24, 19-21, 18-19
9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

Continued on page 2

JULIUS LEE LICENSE No 34869 STATE OF FLORIDA PROFESSIONAL ENGINEER

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date: May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

NOTES-

10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 915 lb down and 78 lb up at 13-6-0 on top chord. The design/selection of such connection device(s) is the responsibility of others.
11) Attic room checked for L/360 deflection.

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25
   Uniform Loads (plf)
   Vert: 1-2=-150, 2-4=-150, 4-5=-175, 5-7=-150, 7-9=-150, 9-10=-175, 10-12=-150, 12-13=-150, 14-31=-50, 18-28=-75, 5-9=-25
   Drag: 10-18=-25, 4-28=-25
   Concentrated Loads (lb)
   Vert: 7=-500(F)

Job	Truss	Truss Type	Qty	Ply	Todd	
Todd	A5	ATTIC	1	3	Job Reference (optional)	T16998241

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:52 2019 Page 1
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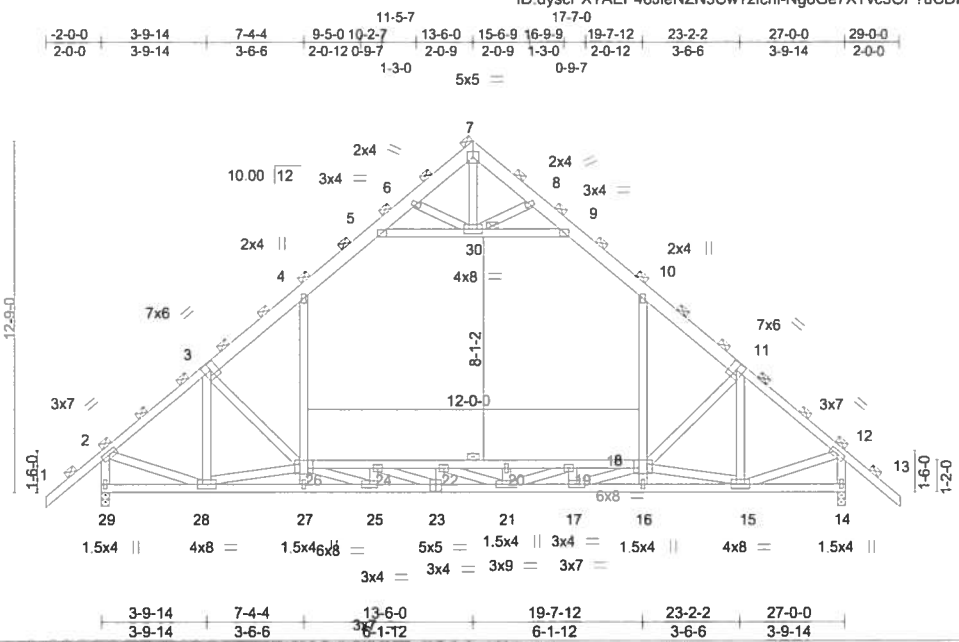

Plate Offsets (X,Y)-- [2:0-3-5,0-1-8], [3:0-3-0,0-3-4], [11:0-3-0,0-3-4], [12:0-3-5,0-1-8], [18:0-2-4,Edge], [23:0-2-8,0-3-0], [26:0-2-4,Edge]

LOADING (psf)		SPACING-	5-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	20.0	Plate Grip DOL	1.25	TC	0.56	Vert(LL)	-0.16	20-22	>999	240	MT20	244/190
TCDL	10.0	Lumber DOL	1.25	BC	0.79	Vert(CT)	-0.31	20-22	>999	180		
BCLL	0.0 *	Rep Stress Incr	NO	WB	0.41	Horz(CT)	0.03	14	n/a	n/a		
BCDL	10.0	Code FBC2017/TPI2014		Matrix-MS		Attic	-0.07	18-26	1921	360	Weight: 752 lb	FT = 0%

LUMBER-
TOP CHORD 2x6 SP SS *Except*
1-3,11-13: 2x4 SP No.2
BOT CHORD 2x4 SP No.2
WEBS 2x4 SP No.2

BRACING-
TOP CHORD 2-0-0 oc purlins (6-0-0 max.), except end verticals
(Switched from sheeted: Spacing > 2-8-0).
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except:
6-0-0 oc bracing: 28-29,14-15.
6-0-0 oc bracing: 18-26
JOINTS 1 Brace at Jt(s): 7, 30, 2, 12

REACTIONS. (lb/size) 29=4004/0-3-8, 14=4004/0-3-8
Max Horz 29=-737(LC 10)
Max Grav 29=4817(LC 18), 14=4794(LC 19)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-4648/0, 3-4=-5537/0, 4-5=-3858/310, 5-6=-185/825, 6-7=-318/343, 7-8=-318/343, 8-9=-183/828, 9-10=-3915/311, 10-11=-5606/0, 11-12=-4626/0, 2-29=-4725/229, 12-14=-4699/229
BOT CHORD 28-29=-673/670, 27-28=-332/2632, 25-27=-402/2588, 23-25=0/5767, 21-23=0/7148, 17-21=0/5425, 16-17=-181/2441, 15-16=-142/2447, 24-26=-1863/193, 22-24=-3686/0, 20-22=-3895/0, 19-20=-3895/0, 18-19=-1939/248
WEBS 16-18=0/390, 10-18=0/2434, 11-18=-283/522, 11-15=-1791/0, 5-30=-5160/0, 9-30=-5211/0, 26-27=0/390, 4-26=0/2441, 3-26=-285/483, 3-28=-1734/0, 7-30=-1161/0, 2-28=0/3744, 12-15=0/3773, 24-25=-1476/0, 22-23=-667/0, 20-21=-666/0, 17-19=-1485/0, 25-26=0/4407, 23-24=0/2110, 21-22=-395/561, 19-21=0/2344, 17-18=0/4392, 26-28=0/2532, 15-18=-186/2696, 6-30=0/1567, 8-30=0/1589

NOTES-
1) 3-ply truss to be connected together with 10d (0.131"x3") nails as follows:
Top chords connected as follows: 2x4 - 1 row at 0-9-0 oc, 2x6 - 2 rows staggered at 0-9-0 oc.
Bottom chords connected as follows: 2x4 - 1 row at 0-9-0 oc.
Webs connected as follows: 2x4 - 1 row at 0-9-0 oc.
2) All loads are considered equally applied to all plies, except if noted as front (F) or back (B) face in the LOAD CASE(S) section. Ply to ply connections have been provided to distribute only loads noted as (F) or (B), unless otherwise indicated.
3) Unbalanced roof live loads have been considered for this design.
4) Wind: ASCE 7-10; Vult=130mph (3-second gust) Vasd=101mph; TCDL=6.0psf; BCDL=6.0psf; h=15ft; B=45ft; L=27ft; eave=4ft; Cat. II; Exp B; Encl., GCpi=0.18; MWFRS (directional) and C-C Exterior(2) zone; cantilever left and right exposed ; end vertical left and right exposed;C-C for members and forces & MWFRS for reactions shown; Lumber DOL=1.60 plate grip DOL=1.60
5) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
6) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
7) Ceiling dead load (5.0 psf) on member(s). 4-5, 9-10, 5-30, 9-30; Wall dead load (5.0psf) on member(s).10-18, 4-26
8) Bottom chord live load (40.0 psf) and additional bottom chord dead load (5.0 psf) applied only to room. 24-26, 22-24, 20-22, 19-20, 18-19
9) Graphical purlin representation does not depict the size or the orientation of the purlin along the top and/or bottom chord.

Continued on page 2

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
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Date: May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

NOTES-

10) Hanger(s) or other connection device(s) shall be provided sufficient to support concentrated load(s) 915 lb down and 78 lb up at 13-6-0 on top chord. The design/selection of such connection device(s) is the responsibility of others.
11) Attic room checked for L/360 deflection.

LOAD CASE(S) Standard

1) Dead + Roof Live (balanced): Lumber Increase=1.25, Plate Increase=1.25
   Uniform Loads (plf)
   Vert: 1-2=-150, 2-4=-150, 4-5=-175, 5-7=-150, 7-9=-150, 9-10=-175, 10-12=-150, 12-13=-150, 14-29=-50, 18-26=-75, 5-9=-25
   Drag: 10-18=-25, 4-26=-25
   Concentrated Loads (lb)
   Vert: 7=-500(F)

Job	Truss	Truss Type	Qty	Ply	Todd
Todd	F01	GABLE	2	1	T16998242
					Job Reference (optional)

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:53 2019 Page 1
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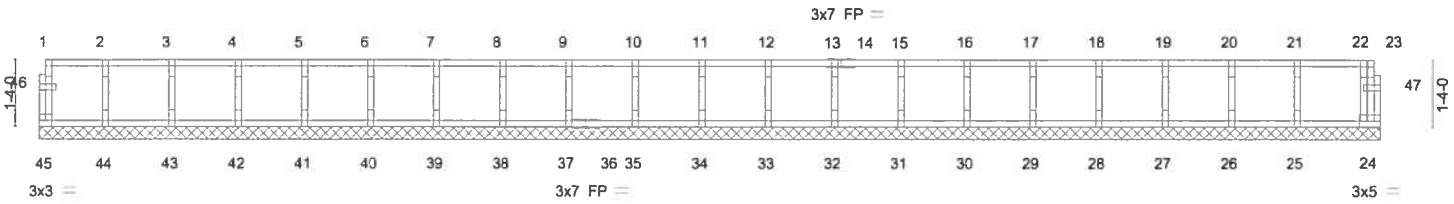

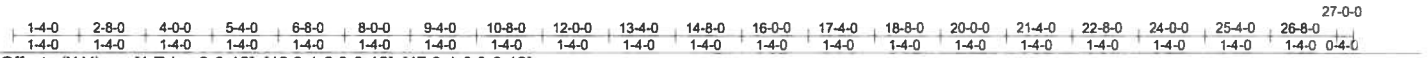

Plate Offsets (X,Y)— [1:Edge,0-0-12], [46:0-1-8,0-0-12], [47:0-1-8,0-0-12]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.09	Vert(LL)	n/a	-	n/a	999	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.02	Vert(CT)	n/a	-	n/a	999		
BCLL	0.0	Rep Stress Incr	YES	WB	0.02	Horz(CT)	0.00	24	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-R							Weight: 118 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)
OTHERS 2x4 SP No.2(flat)

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

REACTIONS. All bearings 27-0-0.
(lb) - Max Grav All reactions 250 lb or less at joint(s) 45, 24, 44, 43, 42, 41, 40, 39, 38, 37, 35, 34, 33, 32, 31, 30, 29, 28, 27, 26, 25

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

NOTES-
1) All plates are 1.5x4 MT20 unless otherwise indicated.
2) Gable requires continuous bottom chord bearing.
3) Truss to be fully sheathed from one face or securely braced against lateral movement (i.e. diagonal web).
4) Gable studs spaced at 1-4-0 oc.
5) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	T16998243
Todd	F02	Floor	21	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:54 2019 Page 1
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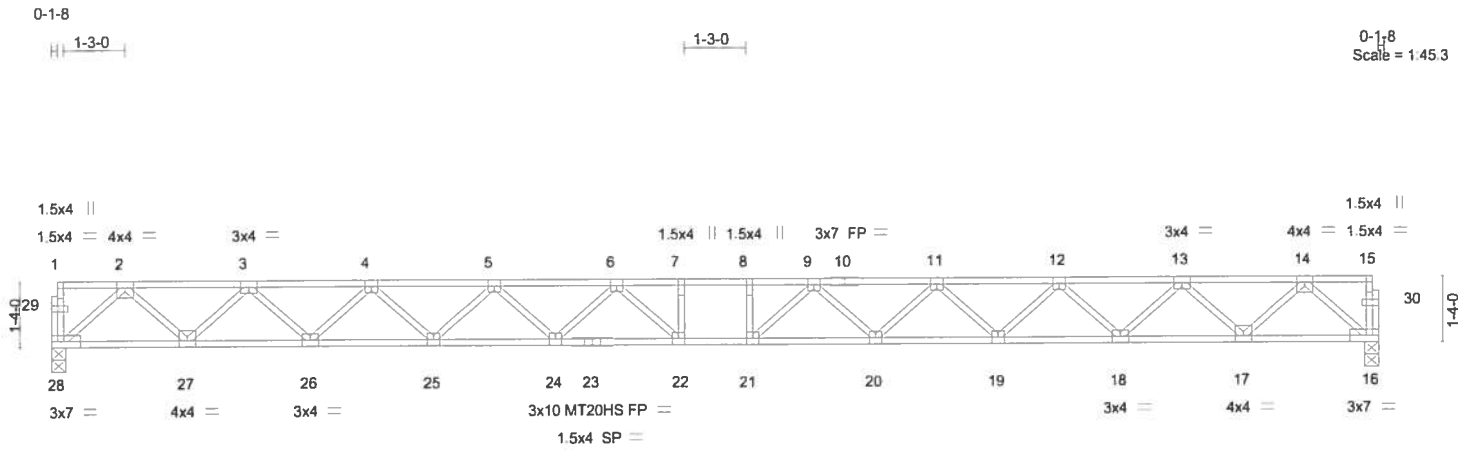

2-9-0	5-3-0	7-9-0	10-3-0	16-9-0	19-3-0	21-9-0	24-3-0	27-0-0
2-9-0	2-6-0	2-6-0	2-6-0	6-6-0	2-6-0	2-6-0	2-6-0	2-9-0

Plate Offsets (X,Y)— [1:Edge,0-0-12], [29:0-1-8,0-0-12], [30:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.82	Vert(LL)	-0.77	21-22	>418	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	1.00	Vert(CT)	-1.06	21-22	>304	240	MT20HS	187/143
BCLL	0.0	Rep Stress Incr	YES	WB	0.32	Horz(CT)	0.14	16	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 138 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.1(flat)
WEBS 2x4 SP No.2(flat)

BRACING-
TOP CHORD Structural wood sheathing directly applied or 2-2-0 oc purlins, except end verticals.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing, Except: 2-2-0 oc bracing: 22-24,21-22,20-21.

REACTIONS. (lb/size) 28=977/0-3-8, 16=977/0-3-8

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-1901/0, 3-4=-3339/0, 4-5=-4398/0, 5-6=-5075/0, 6-7=-5401/0, 7-8=-5401/0, 8-9=-5401/0, 9-10=-5075/0, 10-11=-5075/0, 11-12=-4398/0, 12-13=-3339/0, 13-14=-1901/0
BOT CHORD 27-28=0/1074, 26-27=0/2709, 25-26=0/3953, 24-25=0/4826, 23-24=0/5307, 22-23=0/5307, 21-22=0/5401, 20-21=0/5307, 19-20=0/4826, 18-19=0/3953, 17-18=0/2709, 16-17=0/1074
WEBS 14-16=-1428/0, 2-28=-1428/0, 14-17=0/1151, 2-27=0/1151, 13-17=-1124/0, 3-27=-1124/0, 13-18=0/876, 3-26=0/876, 12-18=-854/0, 4-26=-854/0, 12-19=0/618, 4-25=0/618, 11-19=-595/0, 5-25=-595/0, 11-20=0/369, 5-24=0/369, 9-20=-386/0, 6-24=-386/0, 9-21=-226/454, 6-22=-226/454

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) All plates are MT20 plates unless otherwise indicated.
3) All plates are 3x3 MT20 unless otherwise indicated.
4) Required 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	T16998244
Todd	F03	Floor	3	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

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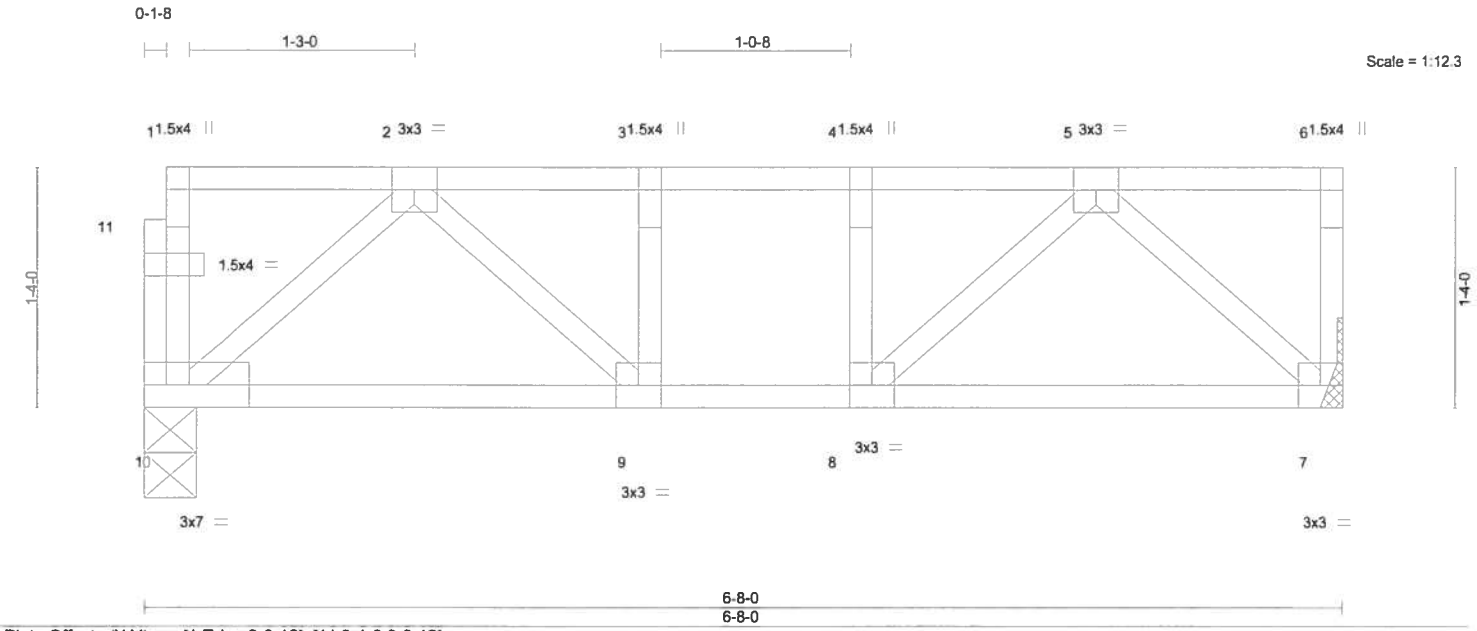

Plate Offsets (X,Y)— [1:Edge,0-0-12], [11:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.10	Vert(LL)	-0.01	9-10	>999	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.12	Vert(CT)	-0.01	9-10	>999	240		
BCLL	0.0	Rep Stress Incr	YES	WB	0.05	Horz(CT)	0.00	7	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 37 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)

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

REACTIONS. (lb/size) 10=233/0-3-8, 7=238/Mechanical

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-316/0, 3-4=-316/0, 4-5=-316/0
BOT CHORD 8-9=0/316
WEBS 5-7=-288/0, 2-10=-289/0

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) Refer to girder(s) for truss to truss connections.
3) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.
4) CAUTION, Do not erect truss backwards.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date: May 8,2019

WARNING - Verify design parameters and READ NOTES ON THIS AND INCLUDED MITEK REFERENCE PAGE MII-7473 rev. 10/03/2015 BEFORE USE.
Design valid for use only with MiTek® connectors. This design is based only upon parameters shown, and is for an individual building component, not a truss system. Before use, the building designer must verify the applicability of design parameters and properly incorporate this design into the overall building design. Bracing indicated is to prevent buckling of individual truss web and/or chord members only. Additional temporary and permanent bracing is always required for stability and to prevent collapse with possible personal injury and property damage. For general guidance regarding the fabrication, storage, delivery, erection and bracing of trusses and truss systems, see ***ANSI/TPI1 Quality Criteria, DSB-89 and BCSI Building Component Safety Information*** available from Truss Plate Institute, 218 N. Lee Street, Suite 312, Alexandria, VA 22314.

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	T16998245
Todd	F04	Floor	9	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

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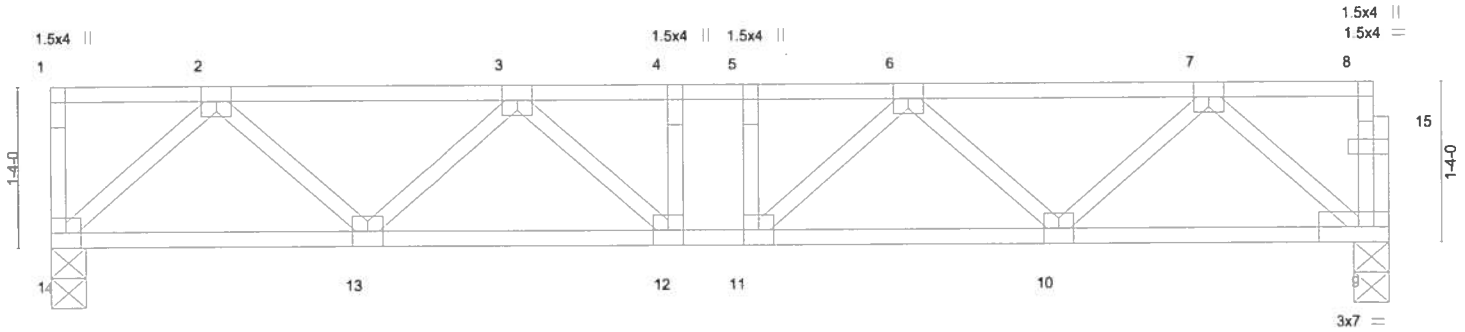

2-7-8 | 8-4-8 | 11-1-8
2-7-8 | 5-9-0 | 2-9-0

Plate Offsets (X,Y)— [1:Edge,0-0-12], [15:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.17	Vert(LL)	-0.03	12	>999	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.25	Vert(CT)	-0.04	11	>999	240		
BCLL	0.0	Rep Stress Incr	YES	WB	0.09	Horz(CT)	0.01	9	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 60 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)

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

REACTIONS. (lb/size) 9=397/0-3-8, 14=401/0-3-8

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-633/0, 3-4=-903/0, 4-5=-903/0, 5-6=-903/0, 6-7=-644/0
BOT CHORD 13-14=0/403, 12-13=0/844, 11-12=0/903, 10-11=0/850, 9-10=0/419
WEBS 7-9=-556/0, 2-14=-548/0, 7-10=0/314, 2-13=0/320, 6-10=-285/0, 3-13=-292/0

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) All plates are 3x3 MT20 unless otherwise indicated.
3) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.
4) CAUTION, Do not erect truss backwards.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	
Todd	F05	Floor	6	1	Job Reference (optional)	T16998246

Mayo Truss, Mayo, Fl

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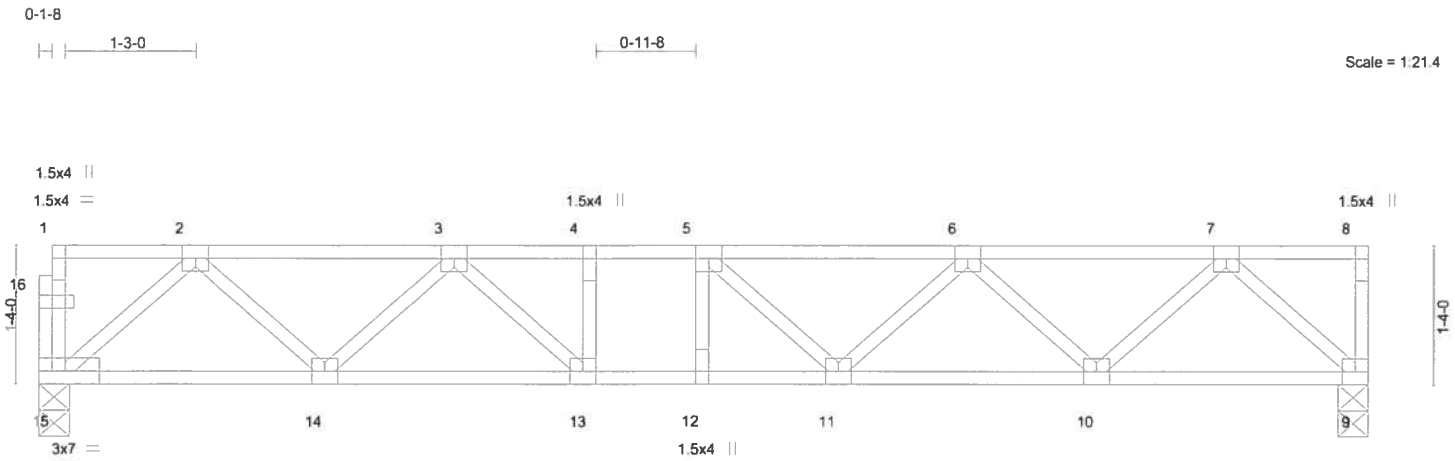

Plate Offsets (X,Y)— [1:Edge,0-0-12], [16:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.26	Vert(LL)	-0.05	11-12	>999	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.48	Vert(CT)	-0.07	11-12	>999	240		
BCLL	0.0	Rep Stress Incr	YES	WB	0.12	Horz(CT)	0.02	9	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 68 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)

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

REACTIONS. (lb/size) 15=460/0-3-8, 9=464/0-3-8

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-776/0, 3-4=-1200/0, 4-5=-1200/0, 5-6=-1144/0, 6-7=-769/0
BOT CHORD 14-15=0/489, 13-14=0/1052, 12-13=0/1200, 11-12=0/1200, 10-11=0/1054, 9-10=0/467
WEBS 7-9=-634/0, 2-15=-649/0, 7-10=0/421, 2-14=0/399, 6-10=-397/0, 3-14=-384/0, 3-13=0/293

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) All plates are 3x3 MT20 unless otherwise indicated.
3) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.
4) CAUTION, Do not erect truss backwards.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

Job	Truss	Truss Type	Qty	Ply	Todd
Todd	F06	Floor	6	1	T16998247

Job Reference (optional)

Mayo Truss, Mayo, Fl

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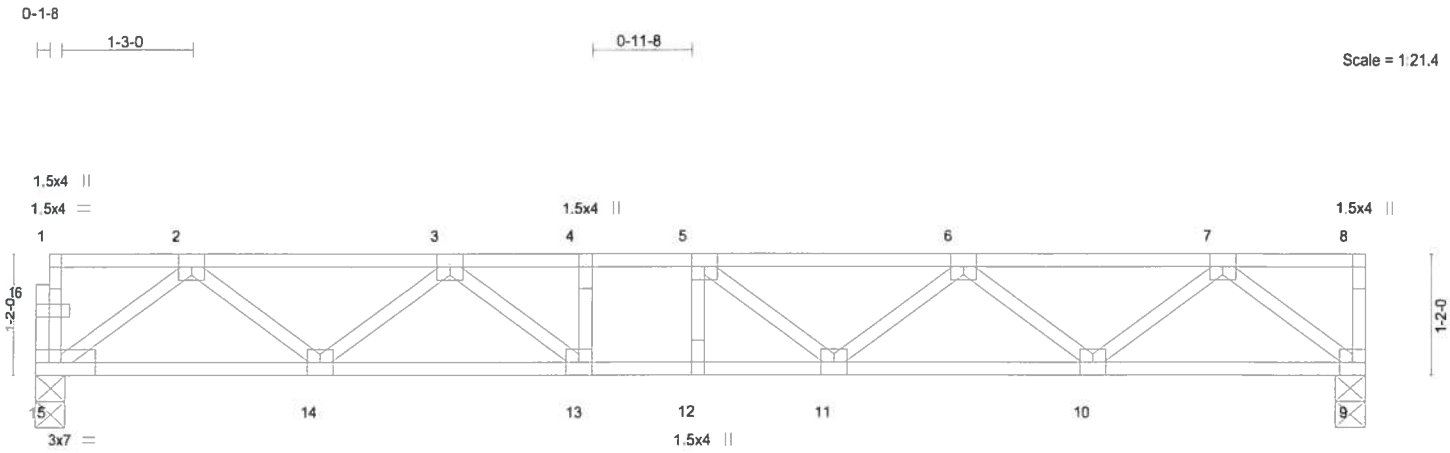

	2-9-0	7-8-8	10-2-8	12-10-0
	2-9-0	4-11-8	2-6-0	2-7-8

Plate Offsets (X,Y)— [1:Edge,0-0-12], [16:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.26	Vert(LL)	-0.07	11-12	>999	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.52	Vert(CT)	-0.09	11-12	>999	240		
BCLL	0.0	Rep Stress Incr	YES	WB	0.13	Horz(CT)	0.02	9	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 65 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)

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

REACTIONS. (lb/size) 15=460/0-3-8, 9=464/0-3-8

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-899/0, 3-4=-1390/0, 4-5=-1390/0, 5-6=-1325/0, 6-7=-891/0
BOT CHORD 14-15=0/566, 13-14=0/1219, 12-13=0/1390, 11-12=0/1390, 10-11=0/1221, 9-10=0/541
WEBS 7-9=-690/0, 2-15=-709/0, 7-10=0/456, 2-14=0/433, 6-10=-430/0, 3-14=-416/0, 3-13=0/318

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) All plates are 3x3 MT20 unless otherwise indicated.
3) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.
4) CAUTION, Do not erect truss backwards.

LOAD CASE(S) Standard

Julius Lee PE No.34869
MiTek USA, Inc. FL Cert 6634
6904 Parke East Blvd. Tampa FL 33610
Date:

May 8,2019

MiTek
6904 Parke East Blvd.
Tampa, FL 36610

Job	Truss	Truss Type	Qty	Ply	Todd	T16998248
Todd	F07	Floor	8	1	Job Reference (optional)	

Mayo Truss, Mayo, Fl

Run: 8.220 s Aug 13 2018 Print: 8.220 s Mar 22 2019 MiTek Industries, Inc. Wed May 8 12:11:56 2019 Page 1
ID:dyscPXTAEP48JleNZN3Cw?zIcnI-GRNnUUa_zrapucC_S69nwWS5i1XmbXgfXk_0mjzIaSn

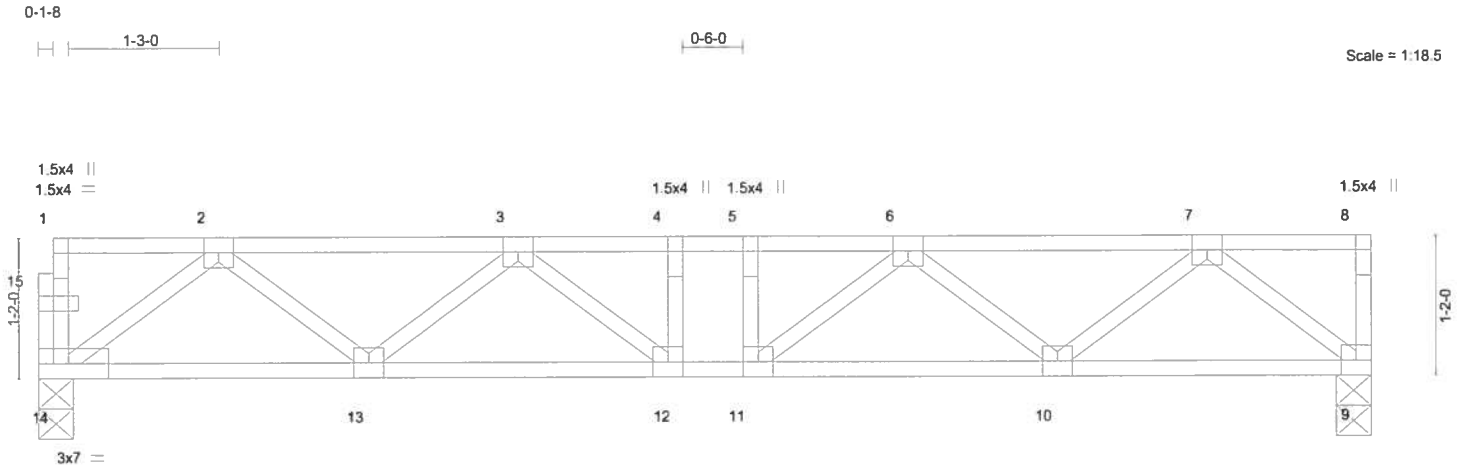

Plate Offsets (X,Y)-- [1:Edge,0-0-12], [15:0-1-8,0-0-12]

LOADING (psf)		SPACING-	1-4-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL	40.0	Plate Grip DOL	1.00	TC	0.17	Vert(LL)	-0.03	12	>999	360	MT20	244/190
TCDL	10.0	Lumber DOL	1.00	BC	0.29	Vert(CT)	-0.05	12	>999	240		
BCLL	0.0	Rep Stress Incr	YES	WB	0.10	Horz(CT)	0.01	9	n/a	n/a		
BCDL	5.0	Code FBC2017/TPI2014		Matrix-S							Weight: 58 lb	FT = 0%F, 0%E

LUMBER-
TOP CHORD 2x4 SP No.2(flat)
BOT CHORD 2x4 SP No.2(flat)
WEBS 2x4 SP No.2(flat)

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

REACTIONS. (lb/size) 14=397/0-3-8, 9=401/0-3-8

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-747/0, 3-4=-1046/0, 4-5=-1046/0, 5-6=-1046/0, 6-7=-734/0
BOT CHORD 13-14=0/485, 12-13=0/984, 11-12=0/1046, 10-11=0/977, 9-10=0/467
WEBS 7-9=-597/0, 2-14=-607/0, 7-10=0/347, 2-13=0/340, 6-10=-317/0, 3-13=-310/0

NOTES-
1) Unbalanced floor live loads have been considered for this design.
2) All plates are 3x3 MT20 unless otherwise indicated.
3) Recommend 2x6 strongbacks, on edge, spaced at 10-0-0 oc and fastened to each truss with 3-10d (0.131" X 3") nails. Strongbacks to be attached to walls at their outer ends or restrained by other means.
4) CAUTION, Do not erect truss backwards.

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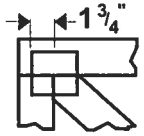
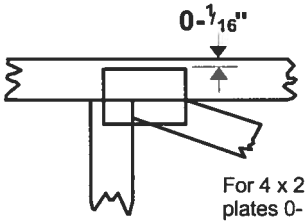
Symbols

PLATE LOCATION AND ORIENTATION



Center plate on joint unless x, y offsets are indicated. Dimensions are in ft-in-sixteenths. Apply plates to both sides of truss and fully embed teeth.



For 4 x 2 orientation, locate plates 0- 1/16" from outside edge of truss.

This symbol indicates the required direction of slots in connector plates.

*** Plate location details available in MiTek 20/20 software or upon request.**

PLATE SIZE

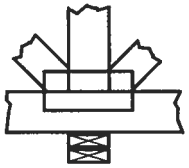
4 x 4

The first dimension is the plate width measured perpendicular to slots. Second dimension is the length parallel to slots.

LATERAL BRACING LOCATION

Indicated by symbol shown and/or by text in the bracing section of the output. Use T or I bracing if indicated.

BEARING

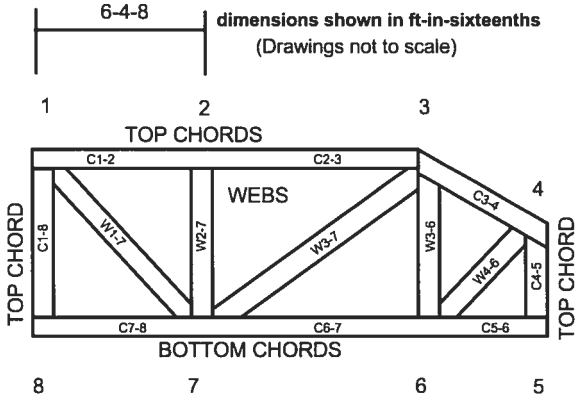


Indicates location where bearings (supports) occur. Icons vary but reaction section indicates joint number where bearings occur. Min size shown is for crushing only.

Industry Standards:

ANSI/TPI1: National Design Specification for Metal Plate Connected Wood Truss Construction.
DSB-89: Design Standard for Bracing.
BCSI: Building Component Safety Information, Guide to Good Practice for Handling, Installing & Bracing of Metal Plate Connected Wood Trusses.

Numbering System



JOINTS ARE GENERALLY NUMBERED/LETTERED CLOCKWISE AROUND THE TRUSS STARTING AT THE JOINT FARTHEST TO THE LEFT.

CHORDS AND WEBS ARE IDENTIFIED BY END JOINT NUMBERS/LETTERS.

PRODUCT CODE APPROVALS

ICC-ES Reports:

ESR-1311, ESR-1352, ESR1988
ER-3907, ESR-2362, ESR-1397, ESR-3282

Trusses are designed for wind loads in the plane of the truss unless otherwise shown.

Lumber design values are in accordance with ANSI/TPI 1 section 6.3 These truss designs rely on lumber values established by others.

MiTek

General Safety Notes

Failure to Follow Could Cause Property Damage or Personal Injury

1. Additional stability bracing for truss system, e.g. diagonal or X-bracing, is always required. See BCSI.
2. Truss bracing must be designed by an engineer. For wide truss spacing, individual lateral braces themselves may require bracing, or alternative Tor I bracing should be considered.
3. Never exceed the design loading shown and never stack materials on inadequately braced trusses.
4. Provide copies of this truss design to the building designer, erection supervisor, property owner and all other interested parties.
5. Cut members to bear tightly against each other.
6. Place plates on each face of truss at each joint and embed fully. Knots and wane at joint locations are regulated by ANSI/TPI 1.
7. Design assumes trusses will be suitably protected from the environment in accord with ANSI/TPI 1.
8. Unless otherwise noted, moisture content of lumber shall not exceed 19% at time of fabrication.
9. Unless expressly noted, this design is not applicable for use with fire retardant, preservative treated, or green lumber.
10. Camber is a non-structural consideration and is the responsibility of truss fabricator. General practice is to camber for dead load deflection.
11. Plate type, size, orientation and location dimensions indicated are minimum plating requirements.
12. Lumber used shall be of the species and size, and in all respects, equal to or better than that specified.
13. Top chords must be sheathed or purlins provided at spacing indicated on design.
14. Bottom chords require lateral bracing at 10 ft. spacing, or less, if no ceiling is installed, unless otherwise noted.
15. Connections not shown are the responsibility of others.
16. Do not cut or alter truss member or plate without prior approval of an engineer.
17. Install and load vertically unless indicated otherwise.
18. Use of green or treated lumber may pose unacceptable environmental, health or performance risks. Consult with project engineer before use.
19. Review all portions of this design (front, back, words and pictures) before use. Reviewing pictures alone is not sufficient.
20. Design assumes manufacture in accordance with ANSI/TPI 1 Quality Criteria.