THOMPSON AND ASSOCIATES
1149 Executive Circle
Suite D-2
Cary, North Carolina 27511
(919) 465-1566

December 8, 2023

To: Mr. Brian Davis

Re: Bryant Residence
1048 Jackson Road
Fuquay-Varina, North Carolina 27526

Dear Mr. Davis:

As per your request, a field inspection was conducted at 1048 Jackson Road in Fuquay-Varina, North Carolina on December 8, 2023. The purpose of this field inspection was to investigate the pad construction located on the property associated with the construction of a proposed metal out building.

Upon initial inspection, the earthen area of the building pad was excavated. The organic material of the pad area had been stripped from the pad area and placed to the rear, outside of the pad area. The pad area was constructed out of earthen fill material borrowed on site adjacent to the pad area. The fill material, via visual inspection was found to be adequate. The area of the constructed building pad was probed with a 1/2" steel rod. All areas of the constructed building pad were found to be adequate. Based upon this inspection, it has been determined that the building pad area is adequately compacted and is ready to have the concrete slab poured.

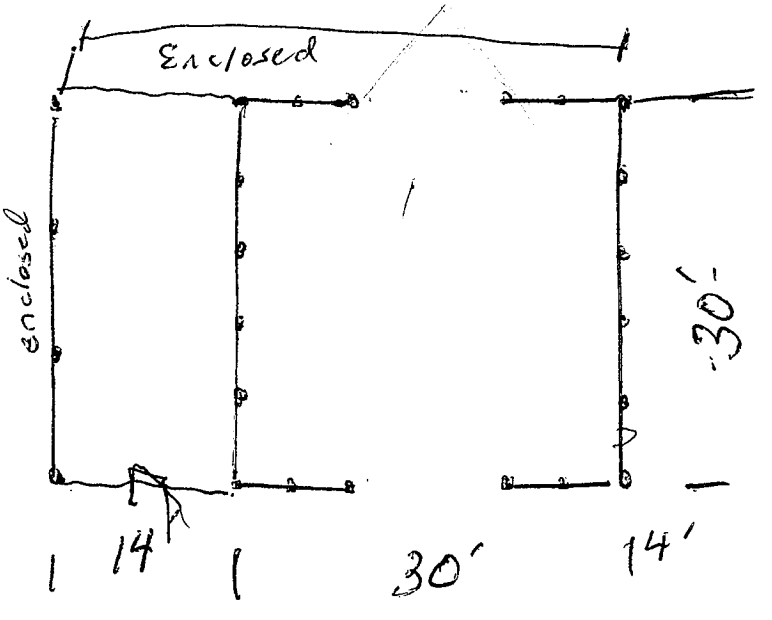
I trust that this information will assist you in the completion of your project. If I can be of any further assistance please feel free to contact me.

Sincerely,

Randall L. Miller, PE 19793
Thompson and Associates, PA
Lisc# C-0343

30x30x12'H BUILDING
WITH 14x30 SIDE SHELTER
RAY BRYANT : BUILDER

6x6 POST : 6' o.c. ON BUILDING
6x6 POST : 10' o.c. ON SHELTER
ALL HOLES 12"x36" DEEP
6" CONMIX FOOTING + BACK FILL
TRUSS 2' o.c.
2x8 SHELTER RAFTERS 2' o.c.
2x4 PURLINS TOP + SIDES
2- 2x10 PLATES ON BUILDING
2- 2x12 PLATES ON SHELTER
THROUGH BOLTS ON PLATES
2.5 HUR. TIES ON TRUSS + RAFTERS
29 GA. METAL TOP + SIDES



ENGINEERING BY
TRENCO
A MiTek Affiliate

RE: T22-11059 - BRYANT

Trenco
818 Soundside Rd
Edenton, NC 27932

Site Information:
Project Customer: Project Name:
Lot/Block: Subdivision:
Model:
Address:
City: State:

General Truss Engineering Criteria & Design Loads (Individual Truss Design Drawings Show Special Loading Conditions):

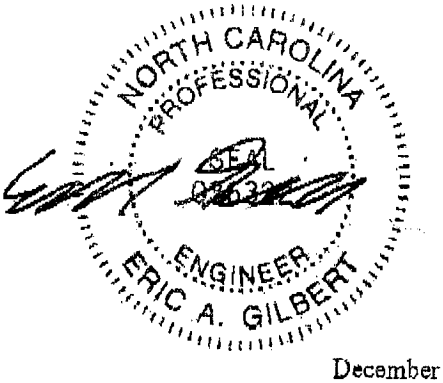
Design Code: IRC2018/TPI2014
Design Program: MiTek 20/20 8.3
Wind Code: ASCE 7-16 [All Heights] Wind Speed: 130 mph
Design Method: MWFRS (Directional) ASCE 7-16 [All Heights]
Roof Load: 40.0 psf
Floor Load: N/A psf
Mean Roof Height (feet): 12
Exposure Category: B

No.	Seal#	Truss Name	Date
1	I55500986	T01	12/1/22

The truss drawing(s) referenced above have been prepared by Truss Engineering Co. under my direct supervision based on the parameters provided by Longleaf Truss Company.

Truss Design Engineer's Name: Gilbert, Eric
My license renewal date for the state of North Carolina is December 31, 2022.

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 or TRENCO. Any project specific information included is for MiTek's or TRENCO's customers file reference purpose only, and was not taken into account in the preparation of these designs. MiTek or TRENCO 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.



December 1,2022

Gilbert, Eric

Job	Truss	Truss Type	Qty	Ply	BRYANT
T22-11069	T01	HOWE	16	1	I55500986

Job Reference (optional)

Longleaf Truss Company, West End, NC - 27376, 8.430 s Jan 6 2022 MiTek Industries, Inc. Wed Nov 30 12:24:11 2022 Page 1
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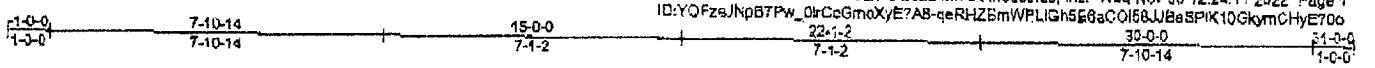

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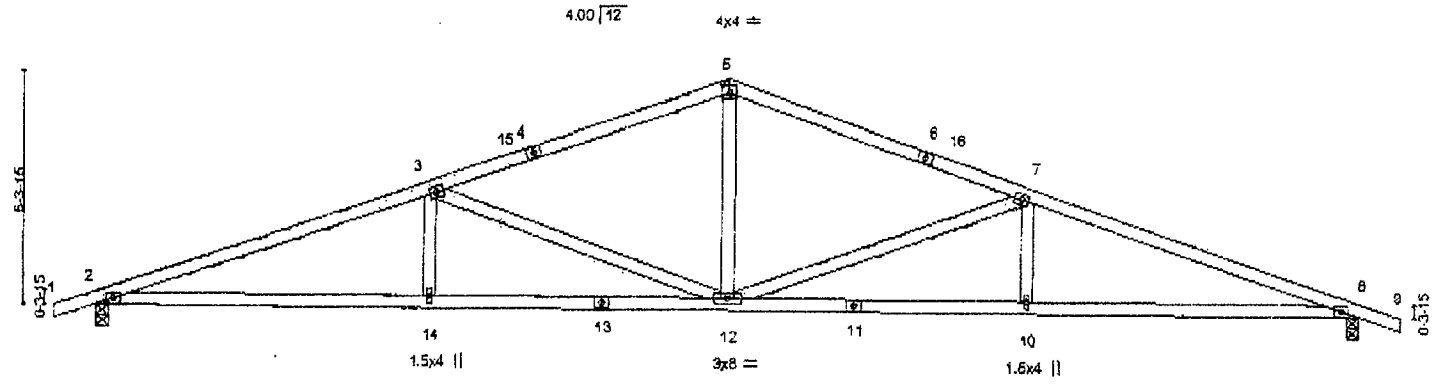


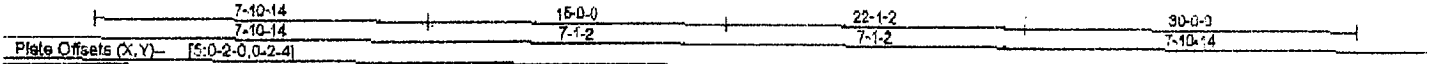


Plate Offsets (X,Y)— [5:0-2-0,0-2-4]

LOADING (psf)		SPACING-	2-0-0	CSI.		DEFL.	in	(loc)	l/defl	L/d	PLATES	GRIP
TCLL (roof)	20.0	Plate Grip DOL	1.15	TC	0.56	Vert(LL)	-0.17	12	>999	240	MT20	244/190
Snow (Pf/Pg)	11.6/15.0	Lumber DOL	1.15	BC	0.60	Vert(CT)	-0.26	12-14	>999	180		
TCDL	5.0	Rep Stress Incr	YES	WB	0.83	Horz(CT)	0.09	8	n/a	n/a		
BCLL	0.0 *	Code IRC2018/TPI2014		Matrix-S							Weight: 131 lb	FT = 20%
BCDL	5.0											

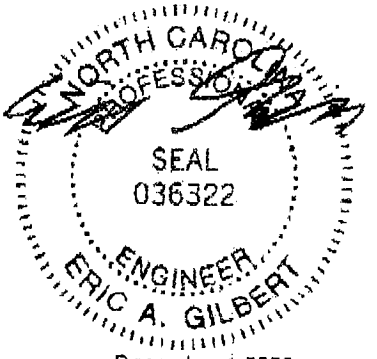
LUMBER-
TOP CHORD 2x4 SP No.1
BOT CHORD 2x4 SP No.1
WEBS 2x4 SP No.3

BRACING-
TOP CHORD Sheathed or 3-5-4 oc purlins.
BOT CHORD Rigid ceiling directly applied or 10-0-0 oc bracing.

REACTIONS. (size) 2=0-3-8, 8=0-3-8
Max Horz 2=58(LC 11)
Max Uplift 2=-154(LC 12), 8=-154(LC 12)
Max Grav 2=949(LC 2), 8=949(LC 2)

FORCES. (lb) - Max. Comp./Max. Ten. - All forces 250 (lb) or less except when shown.
TOP CHORD 2-3=-2196/307, 3-5=-1473/231, 5-7=-1473/231, 7-8=-2198/307
BOT CHORD 2-14=-248/2024, 12-14=-248/2024, 10-12=-248/2024, 8-10=-248/2024
WEBS 5-12=-64/584, 3-12=-757/134, 7-12=-757/134

NOTES-
1) Unbalanced roof live loads have been considered for this design.
2) Wind: ASCE 7-16; Vult=120mph (3-second gust) Vasd=95mph; TCDL=3.0psf; BCDL=3.0psf; h=12ft; B=45ft; L=30ft; eave=4ft; Cat. II; Exp B; Enclosed; MWFRS (directional); cantilever left and right exposed ; end vertical left and right exposed; Lumber DOL=1.60 plate grip DOL=1.60
3) TCLL: ASCE 7-16; Pr=20.0 psf (roof LL: Lum DOL=1.15 Plate DOL=1.15); Pg=15.0 psf; Pf=11.6 psf (Lum DOL=1.15 Plate DOL=1.15); Is=1.0; Rough Cat B; Partially Exp.; Ce=1.0; Cs=1.00; Ct=1.10
4) Unbalanced snow loads have been considered for this design.
5) This truss has been designed for greater of min roof live load of 12.0 psf or 1.00 times flat roof load of 11.6 psf on overhangs non-concurrent with other live loads.
6) Dead loads shown include weight of truss. Top chord dead load of 5.0 psf (or less) is not adequate for a shingle roof. Architect to verify adequacy of top chord dead load.
7) All plates are 3x4 MT20 unless otherwise indicated.
8) This truss has been designed for a 10.0 psf bottom chord live load nonconcurrent with any other live loads.
9) * This truss has been designed for a live load of 20.0psf on the bottom chord in all areas where a rectangle 3-6-0 tall by 2-0-0 wide will fit between the bottom chord and any other members.
10) Provide mechanical connection (by others) of truss to bearing plate capable of withstanding 100 lb uplift at joint(s) except (jt=lb) 2=154, 8=154.
11) This truss is designed in accordance with the 2018 International Residential Code sections R502.11.1 and R802.10.2 and referenced standard ANSI/TPI 1.



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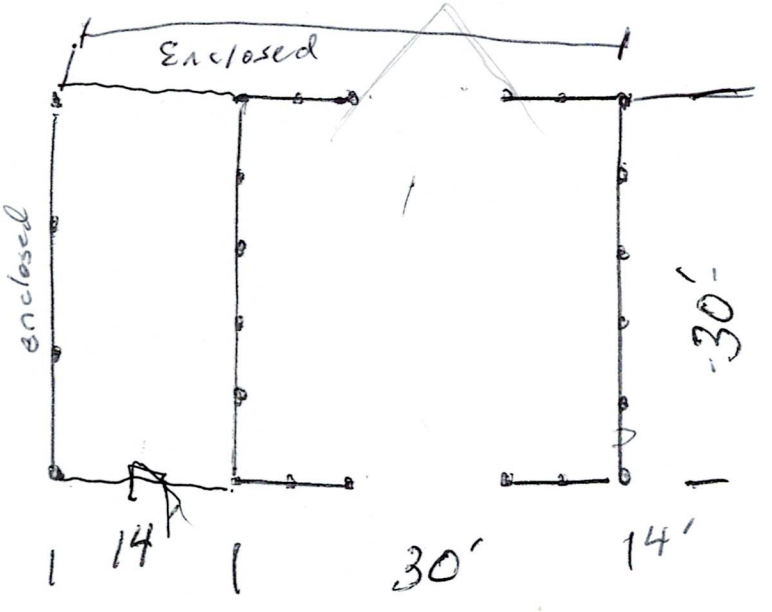

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NORTH CAROLINA PROFESSIONAL SEAL 036322 ENGINEER ERIC A. GILBERT

December 1,2022

Gilbert, Eric

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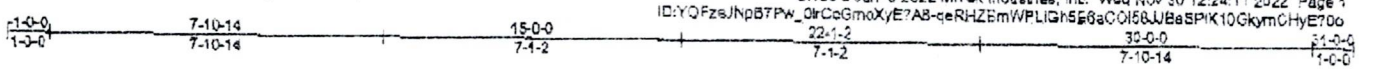

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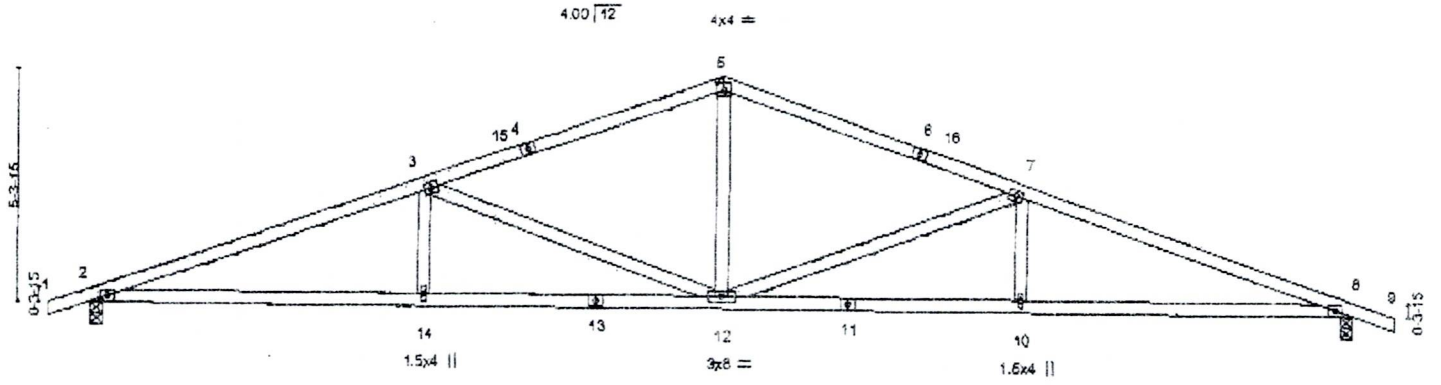

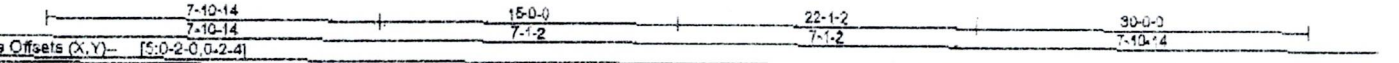

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