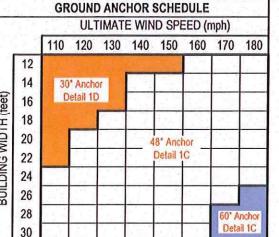
	FBC API	PROVED PRODUCTS LIST			M	AXIMUM ALLO WIND SPE		RAF	ER FRAME,	END POST,	T, GROUND AN	
PRODUCT CATEGORY	SUB CATEGORY	MANUFACTURER	APPROVAL No. & DATE	QA EXPIRATION DATE	OPEN	ENCLOSED	PARTIALLY ENCLOSED					
STRUCTURAL COMPONENTS	ROOF DECK	CAROLINA CARPORTS, INC. 26 Gauge AG Panel	FL6596.1-R6 12/15/20	04/05/27	180	180	180	RISK	WIND			
STRUCTURAL COMPONENTS	STRUCTURAL WALL	CAROLINA CARPORTS, INC. 26 Gauge AG Panel	FL6702.1-R6 12/15/20	03/14/27	180	180	180	CATEGORY CATEGORY (MF			, I	
STRUCTURAL COMPONENTS	STRUCTURAL WALL	CAROLINA CARPORTS, INC. 26 Gauge Dutch Lap Wall Panel	FL6702.3-R6 12/15/20 **	03/14/27	N/A	164	143		С	110 TC		117
STRUCTURAL COMPONENTS	FLOOD VENT	CRAWL SPACE DOOR SYSTEMS, INC. 16x8 Flood Vent	FL29622.1-R1 02/28/21	09/30/22	N/A	N/A	N/A	NOTES: 1. Specifications applicable to 26 gauge metal roc gauge hat channel roof purlins.				
EXTERIOR DOORS	SWINGING	ELIXIR DOOR AND METAL COMPANY Series 402-14	FL17996.3-R2 02/28/21	08/26/25	N/A	139	139	Specifications applicable only for mean roof heir requirements for other roof heights and/or slope				
EXTERIOR DOORS	SWINGING	ELIXIR DOOR AND METAL COMPANY Series 407	FL17996.5-R2 02/28/21	08/19/25	N/A	174	155	GROUND ANCHOR SCHEDULE  ULTIMATE WIND SPEED (mph)				
EXTERIOR DOORS	ROLL-UP	ASTA INDUSTRIES INC. Model 203 (12' Max. Width)	FL8888.1-R6 02/09/21	12/31/24	N/A	180	174	12	120 130	140 150 1	160 170	) 18
EXTERIOR DOORS	ROLL-UP	CAROLINA CARPORTS, INC. Steel Roll Up Sheet Door (8' Max. Width)	FL16806.2-R5 12/16/20	04/05/27	N/A	180	180	(teg) 16	0° Anchor Detail 1D			
EXTERIOR DOORS	ROLL-UP	CAROLINA CARPORTS, INC. Steel Roll-Up Sheet Door - (10' Max. Width)	FL16806.4-R5 12/16/20	04/05/27	N/A	180	172	18 20 HLQIM		48" Anchor		
EXTERIOR DOORS	ROLL-UP	CAROLINA CARPORTS, INC. Steel Roll-Up Sheet Door - (12' Max. Width)	FL16806.4-R5 12/16/20	04/05/27	N/A	179	154	22 24 26		Detail 1C		
EXTERIOR DOORS	ROLL-UP	CAROLINA CARPORTS, INC. Steel Roll-Up Sheet Door - (16' Max. Width)	FL4133.5 06/07/22	04/05/27	N/A	163	142	26 28			60°	* Ancho
WINDOWS	SINGLE HUNG	CGI WINDOWS AND DOORS Model SH 4000A	FL23358.2 12/16/20	02/28/33	N/A	174	156	30	IC AND 1D SH		De	etail 1C

#### TABLE 1 RAFTER FRAME, END POST, GROUND ANCHOR AND PANEL FASTENER SPACING SPECIFICATIONS

		WIND	ULTIMATE	NOMINAL	MAXIMUM POST / RAFTER	ON-CENTERS AL PURLINS, AND	TENER SPACING ONG RAFTERS OR POSTS OR GIRTS CHES)
100	RISK CATEGORY	EXPOSURE CATEGORY	WIND SPEED (MPH)	WIND SPEED (MPH)		INTERIOR POSTS/RAFTERS	END POSTS/RAFTERS
		0	110 TO 150	89 TO 116	5.0	6	6
			151 TO 180	117 TO 139	4.0	6	6

ITES: 1. Specifications applicable to 26 gauge metal roof and wall panels fastened directly to 12 or 14 gauge steel tube framing, or 18 gauge hat channel roof purlins

2. Specifications applicable only for mean roof height of 20 feet or less, and roof slopes of 7° to 27° (1.5:12 to 6:12 pitch). Spacing requirements for other roof heights and/or slopes may vary.



**FASTENER SPECIFICATIONS** 

FOR CONSTRUCTION IN THE STATE OF FLORIDA

METAL CARPORT INSTALLATION PLANS AND DETAILS AND FRAMING AND

> PREPARED FOR: CAROLINA CARPORTS, INC. P.O. BOX 1263 DOBSON, NORTH CAROLINA 27017

PREPARED BY: BECHTOL ENGINEERING AND TESTING, INC. 605 WEST NEW YORK AVENUE DELAND, FLORIDA 32720 Certificate of Authorization No. 00005492

Buildin

Reviewed

for Code

Compliance

late of Floric

1/1/2024

G24001

SHEET 1 OF 6

NTS

1. DOORS AND WINDOWS SHOWN MAY BE SUBSTITUTED FOR DIFFERENT PRODUCT LINES AND/OR MODELS, PROVIDED THE FOLLOWING CONDITIONS ARE MET

A. PRODUCT SHALL HAVE A VALID FBC PRODUCT APPROVAL B. COMPONENTS ARE INSTALLED ACCORDING TO MANUFACTURER'S INSTALLATION REQUIREMENTS

2. FRAMING CONNECTIONS FOR DOOR AND WINDOW FRAMES REMAIN THE SAME FOR SUBSTITUTED PRODUCTS. HEADERS AND WINDOW RAILS MAY BE RAISED OR LOWERED AS NECESSARY TO ACCOMODATE SUBSTITUTED PRODUCT.

\* MAXIMUM POST SPACING FOR DUTCH LAP IS 4.0

#### **GENERAL NOTES:**

- THESE PLANS PERTAIN ONLY TO THE STRUCTURE, INCLUDING MAIN WIND FORCE RESISTING SYSTEM, COMPONENTS AND CLADDING, AND BASE RAIL ANCHORAGE. OTHER DESIGN ISSUES, INCLUDING BUT NOT LIMITED TO PLUMBING, ELECTRICAL, INGRESS/EGRESS, PROPERTY SET-BACKS, FINISH FLOOR ELEVATION AND SLOPE, OR OTHER LOCAL ZONING REQUIREMENTS ARE THE RESPONSIBILITY OF OTHERS.
- 2. THESE STRUCTURES ARE DESIGNED AS NON-HABITABLE UTILITY/STORAGE BUILDINGS (RISK CATEGORY I) CAPABLE OF SUPPORTING DEAD LOAD OF THE STRUCTURE AND APPLICABLE LIVE AND WIND LOADS. IMPROVEMENTS NOT SPECIFICALLY ADDRESSED HEREIN, INCLUDING DOORS, WINDOWS, OR OTHER COMPONENTS NOT LISTED IN THE FBC APPROVED PRODUCTS LIST (THIS SHEET), AND NOT PROVIDED AND INSTALLED BY CAROLINA CARPORTS. INC., WHICH EXERT ADDITIONAL LOADS ON THE STRUCTURE SHALL BE AT THE OWNER'S RISK. BECHTOL ENGINEERING AND TESTING, INC., SHALL NOT BE RESPONSIBLE FOR STRUCTURAL DAMAGE OR FAILURE DUE TO THE APPLICATION OF ADDITIONAL LOADS.
- 3. ALL STEEL TUBING SHALL BE 50 KSI GALVANIZED STEEL. ALL FASTENERS SHALL BE GALVANIZED OR STAINLESS STEEL OR ZINC PLATED.
- ALL COMPONENTS AND CLADDING SHALL BE INSTALLED ACCORDING TO MANUFACTURER'S INSTALLATION INSTRUCTIONS, AND SHALL MEET THE DESIGN PRESSURES REQUIRED BY THE FLORIDA BUILDING CODE (FBC) AT THE LOCATION OF THE BUILDING WITHIN THE STATE OF FLORIDA.
- 5. ALL FIELD FRAMING CONNECTIONS SHALL BE #12-14 x 3/4" SELF DRILLING SCREWS WITHOUT CONTROL SEAL WASHER. ALL SHOP FRAMING CONNECTIONS SHALL BE WELDED.
- CONCRETE SHALL HAVE A MINIMUM COMPRESSIVE STRENGTH OF 2500 PSI AT 28 DAYS. THE REINFORCING STEEL SHALL BE MINIMUM GRADE 40. CONCRETE SLAB FOUNDATIONS SHALL BE REINFORCED WITH 6X6-W1.4XW1.4 WELDED WIRE FABRIC COMPLYING WITH ASTM A 185, OR WITH SYNTHETIC FIBER REINFORCEMENT COMPLYING WITH ASTM C1116.
- BASE RAIL GROUND ANCHOR REQUIREMENTS: ONE WITHIN 6" OF EVERY POST LOCATION, AND BOTH SIDES OF OPENINGS WHERE BASE RAIL IS ABSENT. GROUND ANCHORS ARE NOT REQUIRED FOR CONCRETE FOOTING AND/OR CONCRETE SLAB CONSTRUCTION. SEE GROUND ANCHOR SCHEDULE (THIS SHEET) FOR SPECIFIC GROUND ANCHOR SIZE REQUIREMENTS.
- CONCRETE ANCHORS SHALL BE TAPCON REDHEAD LDT 1/2" x 5" OR EQUIVALENT OR WEJ-IT ANKR-TITE MODEL AT1252, OR SLEEVE ANCHOR MODEL HSA 1260, OR EQUIVALENT.
- POST/RAFTER BRACING: BRACE ON EVERY POST/RAFTER CONNECTION, EXCEPT FOR END WALLS.
- SLAB FOUNDATION SUBGRADE SOILS SHALL BE TERMITE TREATED AND COVERED WITH 6 MIL VAPOR RETARDER PER SECTION R318.1 OF THE FBC EIGHTH EDITION (2023) RESIDENTIAL, AND SECTION 1816.1 OF THE FBC EIGHTH EDITION (2023) - BUILDING. MINIMUM ALLOWABLE FOUNDATION SOIL CONTACT BEARING PRESSURE OF 2,000 PSF IS ASSUMED.
- 11. 14 GA FRAMING: 2-1/2" x 2-1/2" TUBE STEEL (TS) WITH 2-1/4" x 2-1/4" TS NIPPLES. 12 GA FRAMING: 2-1/4" x 2-1/4" TS WITH 2" x 2" TS NIPPLES.
- 12. ENCLOSED AREAS REQUIRING FLOOD OPENINGS MUST HAVE A MINIMUM OF TWO (2) OPENINGS ON EXTERIOR WALLS. OPENINGS SHOULD BE INSTALLED ON AT LEAST TWO (2) SIDES OF ENCLOSED AREA, WITH BASE OF OPENINGS SET WITHIN 1-FOOT OF THE HIGHER OF INTERIOR OR EXTERIOR GRADE. REQUIRED TOTAL NUMBER OF FLOOD VENTS NOTED IN THE FBC APPROVED PRODUCTS LIST SHALL BE BASED ON ONE (1) FLOOD VENT PER EVERY 305 SQUARE FEET OF ENCLOSED AREA. SEE TYPICAL FLOOD VENT FRAMING PLAN, SHEET 5 OF 6.

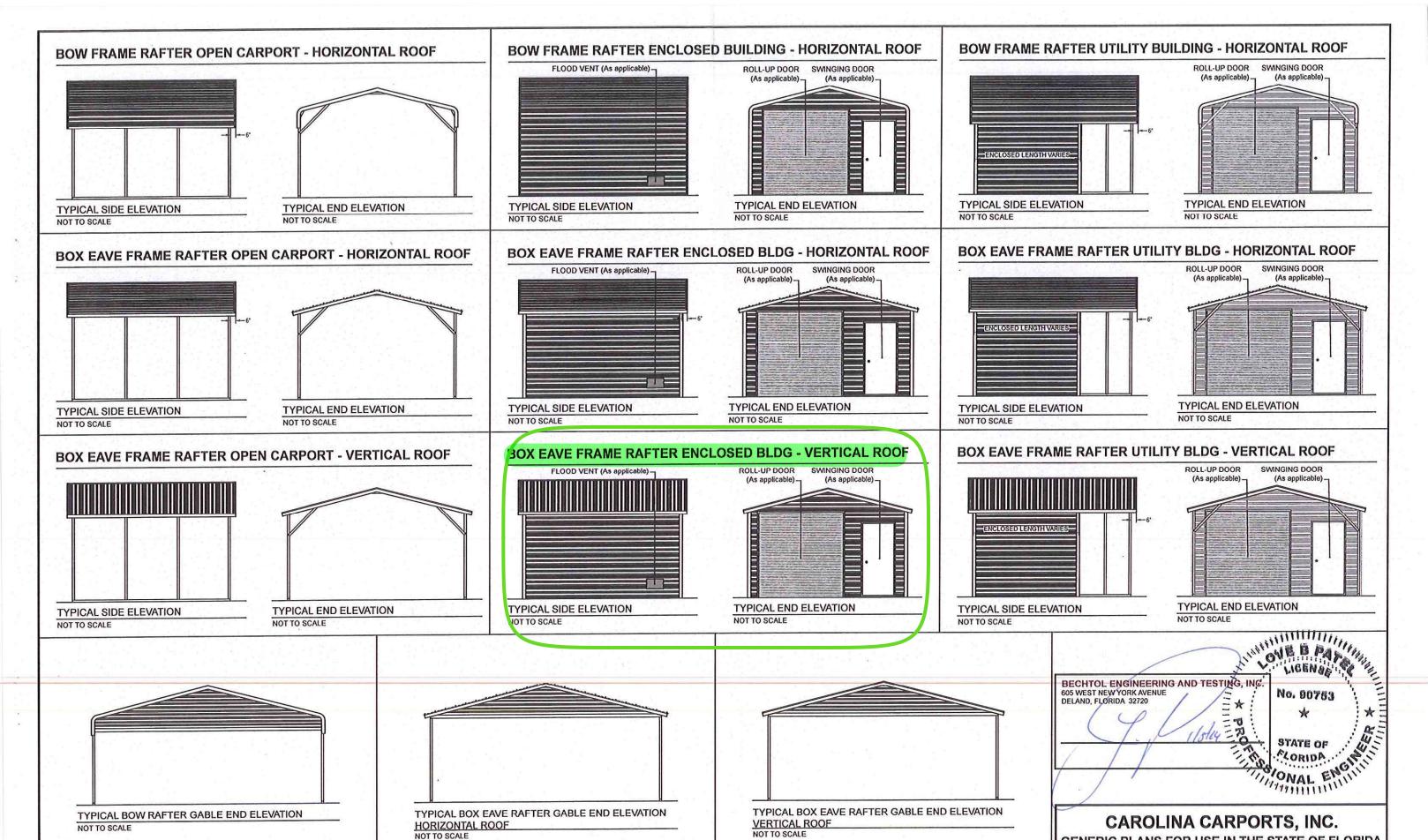
THIS IS TO CERTIFY THAT THE CALCULATIONS AND SPECIFICATIONS HEREIN HAVE BEEN PREPARED BY THE UNDERSIGNED PROFESSIONAL ENGINEER, AND ARE IN ACCORDANCE WITH THE REQUIREMENTS OF SECTION 1609 OF

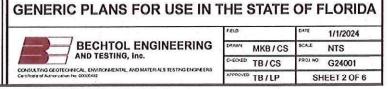


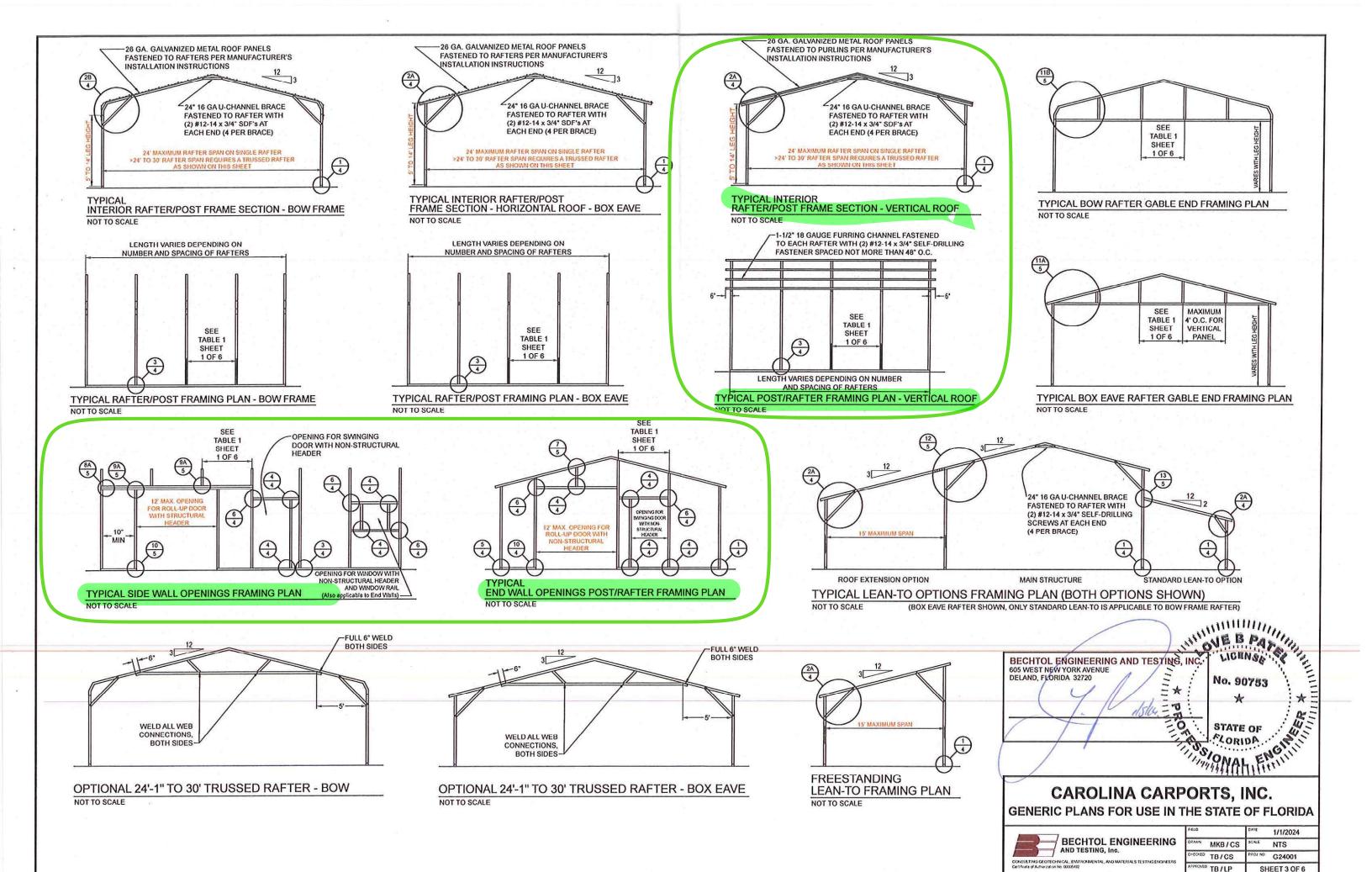
## CAROLINA CARPORTS, INC.

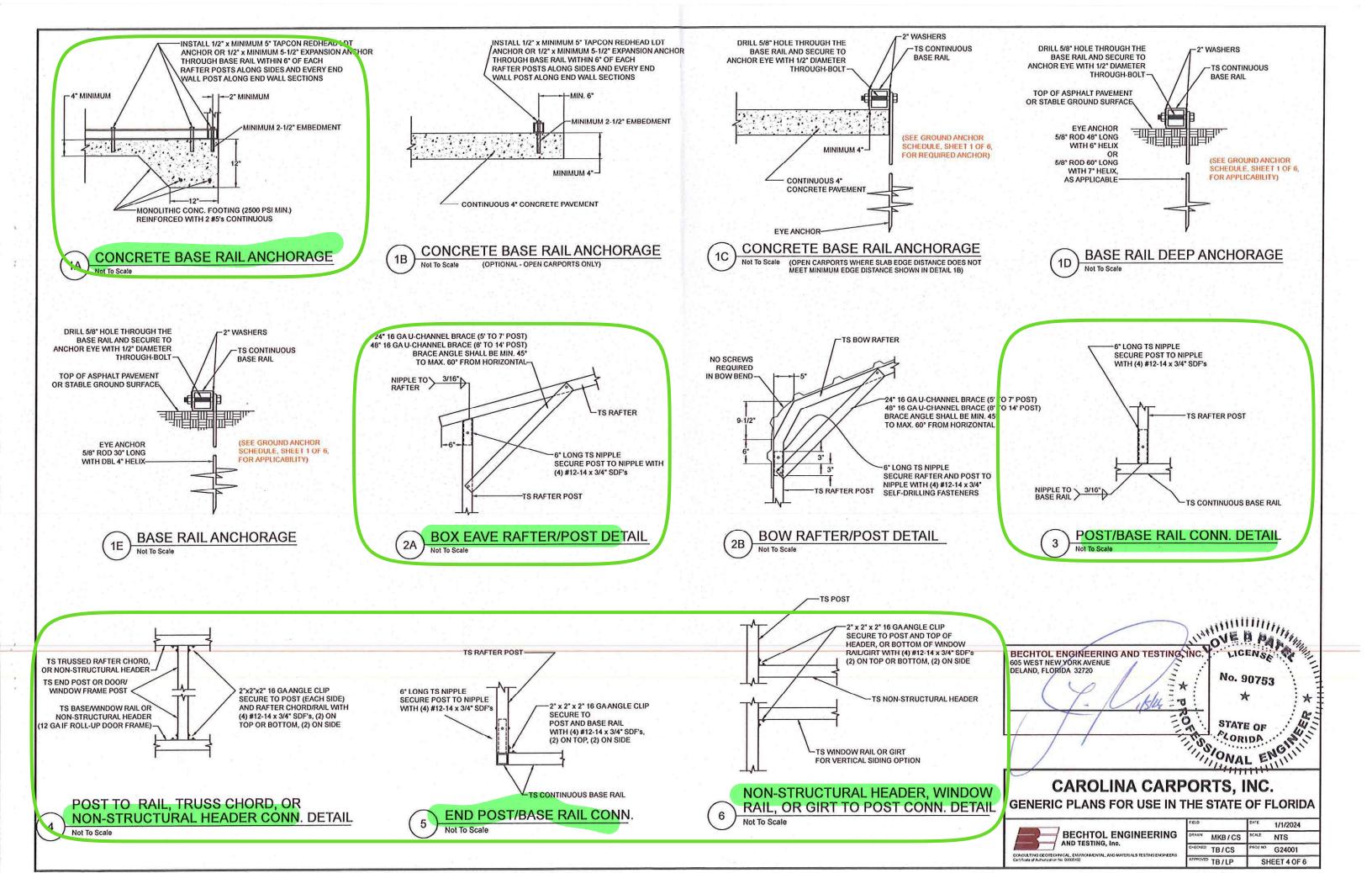
	FELD	
BECHTOL ENGINEERING	DRAWN M	KB/CS
OCASILATING GEOTECHNICAL ENVIRONMENTAL AND MATERIALS TESTING ENGINEERS	O-ECIED T	B/CS
Certificate of Authorization for 00005492	APPROVED T	B/LP

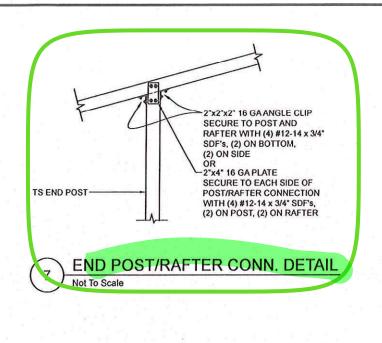
GENERIC PLANS FOR USE IN THE STATE OF FLORIDA











DBL TS STRUCTURAL HEADER WITH 7" SPACERS WELDED BOTH SIDES

TS POST

(4) #12-14 x 3/4"

SECURE EACH WITH

MINIMUM 6" LONG TS NIPPLE

SELF-DRILLING FASTENERS

7" TS SPACER

WITH 7" SPACERS

STRUCTURAL HEADER TO

POST CONNECTION DETAIL

\_WELDED BOTH SIDES

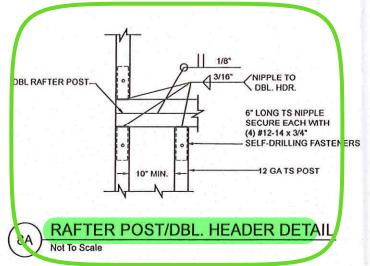
MAXIMUM 2' O.C.

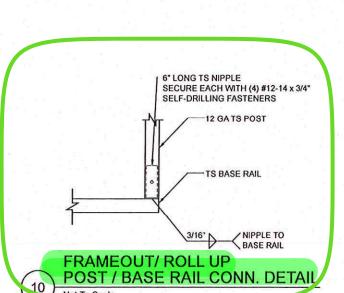
DBL TS STRUCTURAL HEADER

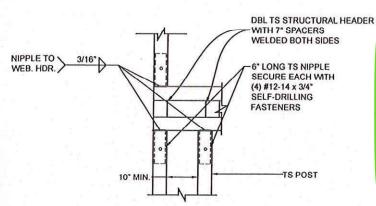
NIPPLE TO 3/16" WEB HEADER

9B

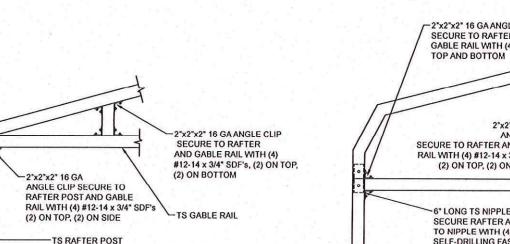
Not To Scale





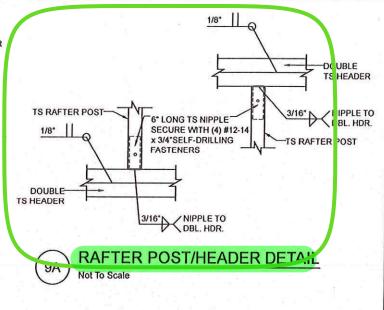


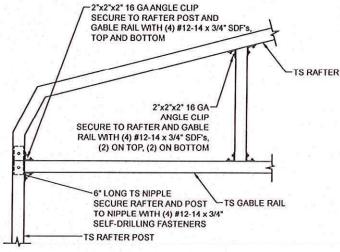
8B RAFTER POST/WEB HEADER DETAIL
Not To Scale

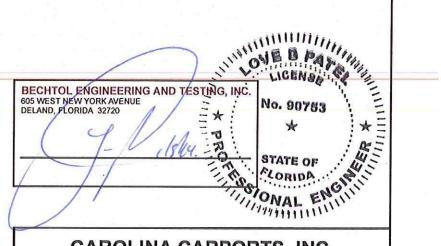


GABLE RAIL TO RAFTER POST
CONNECTION DETAIL

Not To Scale



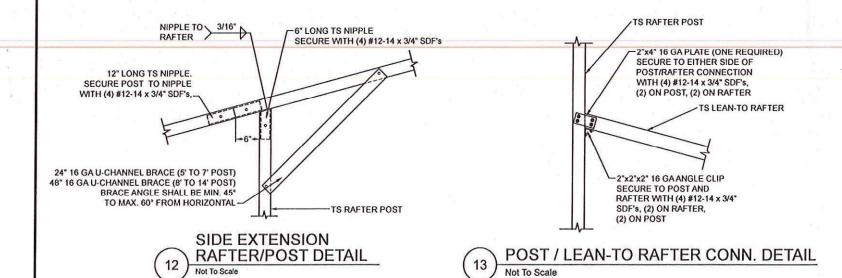




GABLE RAIL TO RAFTER POST

CONNECTION DETAIL

11B

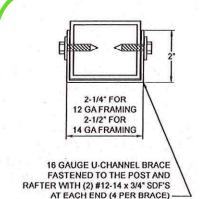


7" TS SPACER MAXIMUM 2" O.C.

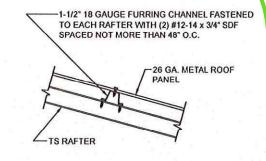
TS POST

## CAROLINA CARPORTS, INC. GENERIC PLANS FOR USE IN THE STATE OF FLORIDA

	FELD		1/1/2024		
BECHTOL ENGINEERING	DEANN	MKB/CS	SCALE	NTS	
AND TESTING, Inc.	O-EO/ED	TB/CS	PROJ NO	G24001	
Mode of Americation No. 00005492		APPROVED TB/LP		SHEET 5 OF 6	

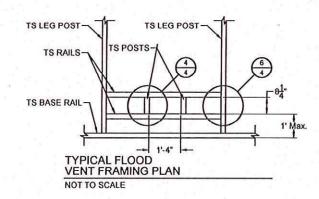


**BRACE SECTION** 

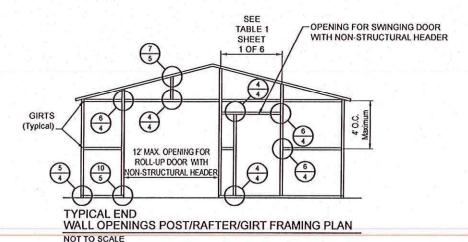


#### ROOF PANEL ATTACHMENT

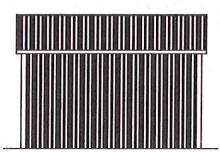
(ALTERNATE FOR VERTICAL ROOF PANELS) Not To Scale



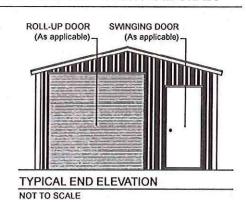
#### SEE GENERAL NOTE No. 12, SHEET 1 OF 6.



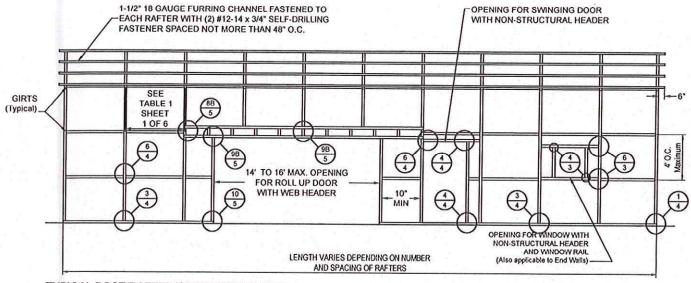
#### **BOX EAVE FRAME RAFTER ENCLOSED BLDG - VERTICAL SIDES**



TYPICAL SIDE ELEVATION NOT TO SCALE



# **VERTICAL SIDE OPTION**

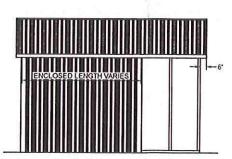


TYPICAL POST/RAFTER/GIRT FRAMING PLAN

OPENING FOR SWINGING DOOR 1-1/2" 18 GAUGE FURRING CHANNEL FASTENED TO WITH NON-STRUCTURAL HEADER EACH RAFTER WITH (2) #12-14 x 3/4" SELF-DRILLING FASTENER SPACED NOT MORE THAN 48" O.C. GIRTS TARIF (PA) SHEET (F) 1 OF 6 12' MAX. OPENING FOR ROLL-UP DOOR WITH (3) STRUCTURAL HEADER OPENING FOR WINDOW WITH NON-STRUCTURAL HEADER LENGTH VARIES DEPENDING ON NUMBER

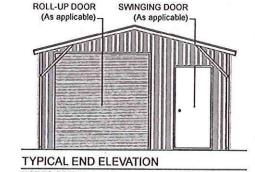
TYPICAL POST/RAFTER/GIRT FRAMING PLAN NOT TO SCALE

#### **BOX EAVE FRAME RAFTER UTILITY BLDG - VERTICAL SIDES**



TYPICAL SIDE ELEVATION

NOT TO SCALE





### CAROLINA CARPORTS, INC. GENERIC PLANS FOR USE IN THE STATE OF FLORIDA



1/1/2024 MKB/CS NTS TB/CS G24001 TB/LP SHEET 6 OF 6