

TYPICAL HEADER STRAPING DETAIL

**OUTSIDE CORNER** 

OSB-

INSIDE CORNER

(TYP.) CORNER FRAMING

-8d 6" OC @ PANEL EDGES

8d 12" OC NOT @ PANEL EDGES

.131"X3 1/4" NAILS 12" OC-

8d 6" OC @ PANEL EDGES -

2X\_FULL HEIGHT STUDS (TYP.)-

8d 12" OC NOT @ PANEL EDGES -

2X\_FULL HEIGHT STUDS (TYP.)-

.131"X3 1/4" NAILS 12" OC -

-8d 6" OC @ PANEL EDGES 8d 12" OC NOT @ PANEL EDGES

-EXTERIOR WALL

-8d 6" OC THIS STUD FOR SHEAR TRANSFER

-8d 6" OC @ PANEL EDGES

8d 12" OC NOT @ PANEL EDGES

-2X\_FULL HEIGHT STUDS (TYP.)

--- 8d 6" OC @ PANEL EDGES 8d 12" OC NOT @ PANEL EDGES

8d 6" OC @ PANEL EDGES-

.131"X3 1/4" NAILS 6" OC -

INTERIOR SHEARWALL -

.131"X3 1/4" NAILS 12" OC ---

1/2" GWB UNBLOCKED ---

7" OC EDGE 10" OC FIELD

5d COOLER NAILS

WOOD FRAME

- 8d 12" OC NOT @ PANEL EDGES

OSB-

(TYP.) INTERSECTING WALL FRAMING

1/2" GWIB UNBLOCKED

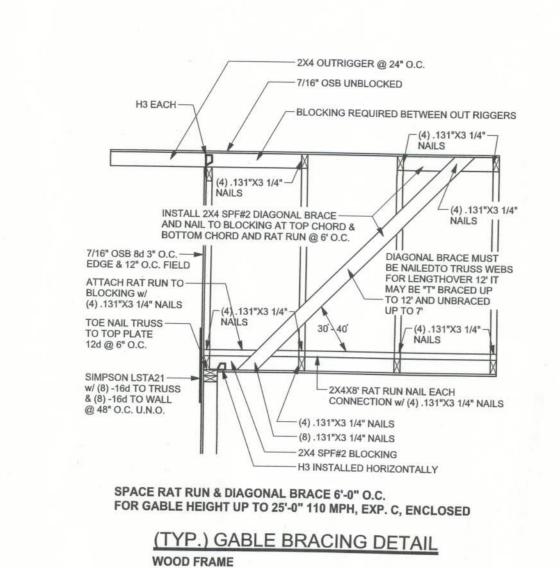
7" OC EDGE 10" OC FIELD

5d COOLER NAILS

1/2" GWB UNBLOCKED d COOLER NAILS

7" OC EDIGE 10" OC FIELD

## (TYP.) GABLE WALL w/ VAULTED CEILING WOOD FRAME



### **GENERAL NOTES:**

OPTION: 2 (POCKETED)

POCKETED

TOP PLATE

(DROPPED BEAM)

ALLOWABLE UPLIFT:

Fb (psi) E (10<sup>6</sup>psi)

1.6

1.6

1.6

1.8

1.7

1.9

2.0

1200

1050

975

2400

1600

2900

2x6 SYIP #2GARAGE DOOR BUCK ATTACHMENT

DOOR: WIDTH 3/8" x 4" LAG 16d (2) ROWS OF 131 x 3 1/4" GN

5" O.C.

4" O.C.

3" O.C.

5" O.C.

4" O.C.

3" O.C.

ATTACH GARAGE DOOR BUCK TO STUD PACK AT

EACH SIIDE OF DOOR OPENING WITH 3/8"x4" LAG SCREWS w/ 1" WASHER LAG SCREWS MAY BE

COUNTERSUNK. HORIZONTAL JAMBS DO NOT

TRANSFIER LOAD. CENTER LAG SCREWS OR

GN PER TABLE BELOW:

8' -- 10'

11' -- 15'

16' -- 18'

2x6SYP #2 DOOR BUCK -

SCALE: N.T.S.

BRACKET.-

STAGGE:R 16( NAILS OR (2) ROWS OF .131 x 3 1/4"

24" O.C.

18" O.C.

16" O.C.

GARAGE DOOR BUCK INSTALLATION DETAIL

BENEATH

IF TRUSS TO BEAN

TO BEAM SPH

-(2) 2X\_ SYP#2 TOP PLATE

10-10d TO JOIST 3" NOTCH-

- BEAM TO BEAR ON -

(2) 2X\_SPF#2 JACKS

-2X\_PT SYP#2 PLATE -

WITHIN 3" OF STUD PACK

**GRADE & SPECIES TABLE** 

SYP#2

SYP#2

SYP#2

24F-V3 SP

MICROLAM

PARALAM

LSL TIMBERSTRAND | 1700

GLB

1/2" ANCHOR

2" WASHER

(2) MTS20-

-HUC410

18-16d TO FACE

TRUSSES: TRUSSES SHALL BE DESIGNED BY A FLORIDA LICENSED ENGINEER IN ACCORDANCE WITH THE FBCR 2007. TRUSS ENGINEERING SHALL INCLUDE TRUSS DESIGN, PLACEMENT PLANS, TEMPORARY AND PERMANENT BRACING DETAILS, TRUSS-TO-TRUSS CONNECTIONS, AND UPLIFT AND REACTION LOADS FOR ILL BEARING LOCATIONS. TRUSS ENGINEERING IS THE RESPONSIBILITY OF THE TRUSS MANUFACTURER AND SHALL BE SIGNED & SEALED BY THE MANUFACTURER'S DESIGN ENGINEER. IT IS THE BUILDER'S RESPONSIBILITY VERIFY THE TRUSS DESIGNER FULLY SATISFIED ALL THE ABOVE REQUIREMENTS AND TO SELECT UPLIFT CONNECTIONS BASED ON TRUSS ENGINEERING UPLIFT AND PROVIDE FOOTINGS FOR INTERIOR BEARING WALLS. BUILDER IS TO FURNISH TRUSS ENGINEERING TO WIND LOAD ENGINEER FOR STRAPS ARE NAILED REVIEW OF TRUSS REACTIONS ON THE BUILDING STRUCTURE. STRAP 2X6 RAFTERS WITH MIN UPLIFT CONNECTION 415LB EACH END; 2X8 RAFTERS 700 LB EACH END. ARE NOT REQUIRED

> SITE PREPARATION: SITE ANALYSIS AND PREPARATION IS NOT PART OF THIS PLAN FOUNDATION: CONFIRM THAT THE FOUNDATION DESIGN & SITE CONDITIONS MEET GRAVITY LOAD REQUIREMENTS (ASSUME 1000 PSF BEARING CAPACITY UNLESS

VISUAL OBSERVATION OR SOILS TEST PROVES OTHERWISE CONCRETE: MINIMUM COMPRESSIVE STRENGTH OF CONCRETE AT 28 DAYS, F'c = 3000 PSI.

WELDED WIRE REINFORCED SLAB: 6" x 6" W1.4 x W1.4, FB = 85KSI, WELDED WIRE REINFORCEMENT FABRIC (W.W.M.) CONFORMING TO ASTM A185; LOCATED IN MIDDLE OF THE SLAB; SUPPORTED WITH APPROVED MATERIALS OR SUPPORTS AT SPACINGS NOT TO EXCEED 3'.

FIBER CONCRETE SLAB: CONCRETE SLABS ON GROUND CONTAINING SYNTHETIC FIBER REINFORCEMENT. FIBER LENGTH 1/2 INCH TO 2 INCHES. DOSAGE AMOUNTS FROM 0.75 TO 1.5 POUNDS PER CUBIC YARD PER THE MANUFACTURER'S RECOMMENDATIONS. FIBERS TO COMPLY WITH ASTM C 1116. SUPPLIER TO PROVIDE ASTM C 1116 CERTIFICATION OF COMPLIANCE WHEN REQUESTED BY BUILDING OFFICIAL.

CONTROL JOINTS: WHERE SPECIFIED, SAWN CONTROL JOINTS IN SLAB-ON-GRADE SHALL BE CUT IN ACCORDANCE WITH ACI 302. JOINTS SHALL BE CUT WITHIN 12 HOURS OF SLAB PLACEMENT. THE LENGTH / WIDTH RATIOS OF SLAB AREAS SHALL NOT EXCEED 1.5 AND TYPICAL SPACING OF CUTS TO BE 12FT. DO NOT CUT WWM OR REINFORCING STEEL. (RECOMMENDED LOCATION OF CONTROL JOINTS IS SUBJECT TO OWNER AND CONTRACTOR'S APPROVAL. THE CONTROL JOINTS ARE NOT INTENDED TO PREVENT CRACKS BUT RATHER TO ENCOURAGE THE SLAB TO CRACK ON A GIVEN LINE.)

REBAR: ASTM A 615, GRADE 60, DEFORMED BARS, FY = 60 KSI. ALL LAP SPLICES 40 \* DB (25" FOR #5 BARS); UNO. ALL REINFORCEMENT SHALL BE DETAILED AND PLACED IN ACCORDANCE WITH ACI 315-96, U.N.O.

GLULAM BEAMS: GLULAM BEAM, GLB, 24F-V3SP, Fb = 2.4ksi, E = 1800ksi; UNO. SUPPLIER MAY SUPPLY AN ALTERNATE BEAM WITH EQUAL PROPERTIES OR MAY SUBMIT THEIR OWN SIZING CALCS.

ROOF SHEATHING: ALL ROOFS ARE HORIZONTAL DIAPHRAGMS; 7/16" OSB SHEATHING, UNBLOCKED, APPLIED PERPENDICULAR TO FRAMING, OVER A MINIMUM OF 3 FRAMING MEMBERS, WITH PANEL EDGES STAGGERED, FASTENED WITH 8d COMMON NAILS (.131), 6"OC PANEL EDGES, 12"OC INTERMEDIATE MEMBERS, GABLE ENDS AND DIAPHRAGM BOUNDARY; 4"OC, UNO.

STRUCTURAL CONNECTORS: MANUFACTURERS AND PRODUCT NUMBER FOR CONNECTORS, ANCHORS, AND REINFORCEMENT ARE LISTED FOR EXAMPLE NOT ENDORSEMENT. AN EQUIVALENT DEVICE OF THE SAME OR OTHER MANUFACTURER CAN BE SUBSTITUTED FOR ANY DEVICES LISTED IN THE EXAMPLE ABLES AS LONG AS IT MEETS THE REQUIRED LOAD CAPACITIES, MANUFACTURER'S INSTALLATION INSTRUCTIONS MUST BE FOLLOWED TO ACHIEVE RATED LOADS.

ANCHOR BOLTS: A-307 ANCHOR BOLTS WITH MINIMUM EMBEDMENT AS SPECIFIED IN DRAWINGS BUT NO LESS THAN 7" IN CONCRETE OR REINFORCED BOND BEAM OR 15" IN GROUTED CMU.

**WASHERS:** WASHERS USED WITH 1/2" BOLTS TO BE 2"  $\times$  2"  $\times$  9/64"; WITH 5/8" BOLTS TO BE 3"  $\times$  3"  $\times$  9/64"; WITH 3/4" BOLTS TO BE 3"  $\times$  3"  $\times$  9/64"; WITH 7/8" BOLTS TO BE 3"  $\times$  3"  $\times$  5/16"; UNO. NAILS: ALL NAILS ARE COMMON NAILS UNLESS OTHERWISE SPECIFIED OR ACCEPTED BY FBC TEST REPORTS AS HAVING EQUAL STRUCTURAL VALUES.

# **BUILDER'S RESPONSIBILITY**

SPECIF	ILDER AND OWNER ARE RESPONSIBLE FOR THE FOLLOWING, WHICH ARE ICALLY NOT PART OF THE WIND LOAD ENGINEER'S SCOPE OF WORK.
CONFIRM	SITE CONDITIONS, FOUNDATION BEARING CAPACITY, GRADE AND HEIGHT, WIND SPEED AND DEBRIS ZONE, AND FLOOD ZONE.
PROVIDE	MATERIALS AND CONSTRUCTION TECHNIQUES, WHICH COMPLY WITH FBCR 2007 MENTS FOR THE STATED WIND VELOCITY AND DESIGN PRESSURES.
DELIEVE	A CONTINUOUS LOAD PATH FROM TRUSSES TO FOUNDATION. IF YOU THE PLAN OMITS A CONTINUOUS LOAD PATH CONNECTION, CALL LOAD ENGINEER IMMEDIATELY.
TRUSS-TO	HE TRUSS MANUFACTURER'S SEALED ENGINEERING INCLUDES TRUSS PLACEMENT PLANS, TEMPORARY AND PERMANENT BRACING DETAILS, -TRUSS CONNECTIONS, AND UPLIFT AND REACTION LOADS FOR ALL LOCATIONS.

#### ANCHOR TABLE

OBTAIN UPLIFT REQUIREMENTS FROM TRUSS MANUFACTURER'S ENGINEERING

UPLIFT LBS. SYP	UPLIFT LBS. SPF	TRUSS CONNECTOR*	TO PLATES	TO RAFTER/TRUSS	TO STUDS
< 420	< 245	H5A	3-8d	3-8d	1001003
< 455	< 265	H5	4-8d	4-8d	
< 360	< 235	H4	4-8d	4-8d	
< 455	< 320	H3	4-8d	4-8d	
< 415	< 365	H2.5	5-8d	5-8d	
< 600	< 535	H2.5A	5-8d	5-8d	
< 950	< 820	H6	8-8d	8-8d	
< 745	< 565	H8	5-10d, 1 1/2"	5-10d, 1 1/2"	
< 1465	< 1050	H14-1	13-8d	12-8d, 1 1/2"	
< 1465	< 1050	H14-2	15-8d	12-8d, 1 1/2"	
< 990	< 850	H10-1	8-8d, 1 1/2"	8-8d, 1 1/2"	
< 760	< 655	H10-2	6-10d	6-10d	
< 1470	< 1265	H16-1	10-10d, 1 1/2"	2-10d, 1 1/2"	
< 1470	< 1265	H16-2	10-10d, 1 1/2"	2-10d, 1 1/2"	
< 1000	< 860	MTS24C	7-10d 1 1/2"	7-10d 1 1/2"	
< 1450	< 1245	HTS24	12-10d 1 1/2"		
< 2900	< 2490	2 - HTS24	12 100 1 1/2	12-10d 1 1/2"	,
< 2050	< 1785	LGT2	14 -16d	14 404	
		BACKER (2001)		14 -16d	
		HEAVY GIRDER TIEDOWNS*			TO FOUNDATION
< 3965	< 3330	MGT		22 -10d	1-5/8" THREADED ROD 12" EMBEDMENT
< 10980	< 6485	HGT-2		16 -10d	2-5/8" THREADED ROD 12" EMBEDMENT
< 10530	< 9035	HGT-3		16 -10d	2-5/8" THREADED ROD 12" EMBEDMENT
< 9250	< 9250	HGT-4		16 -10d	2-5/8" THREADED ROD 12" EMBEDMENT
10.5		STUD STRAP CONNECTOR*			TO STUDS
< 435	< 435	SSP DOUBLE TOP PLATE	3 -10d		4 -10d
< 455	< 420	SSP SINGLE SILL PLATE	1 -10d		4 -10d
< 825	< 825	DSP DOUBLE TOP PLATE	6 -10d		8 -10d
< 825	< 600	DSP SINGLE SILL PLATE	2 -10d		8 -10d
< 885	< 760	SP4			6-10d, 1 1/2"
< 1240	< 1065	SPH4			10-10d, 1 1/2"
< 885	< 760	SP6			6-10d, 1 1/2"
< 1240	< 1065	SPH6			10-10d, 1 1/2"
< 1235	< 1165	LSTA18	14-10d		100, 1112
< 1235	< 1235	LSTA21	16-10d		
< 1030	< 1030	CS20	18-8d		
< 1705	< 1705	CS16	28-8d		
		STUD ANCHORS*	TO STUDS		TO FOUNDATION
< 1350	< 1305	LTT19	8-16d		1/2" AB
< 2310	< 2310	LTTI31	18-10d, 1 1/2"		7000
< 2775	< 2570	HD2A	2-5/8" BOLTS		1/2" AB
< 4175	< 3695	HTT16	18 - 16d		5/8" AB
< 1400	< 1400	PAHD42	16-16d		5/8" AB
< 3335	< 3335	HPAHD22	16-16d		
< 2200	< 2200	ABU44	12-16d		41000
< 2300	< 2300	ABU66	12-16d		1/2" AB
< 2320	< 2320	ABU88	18 - 16d		1/2" AB 2-5/8" AB

#### **ROOF SYSTEM DESIGN**

THE SEAL ON THESE PLANS FOR COMPLIANCE WITH FBCR 2007, SECTION R301.2.1 IS BASED ON REACTIONS, UPLIFTS, AND BEARING LOCATIONS IN TRUSS ENGINEERING SUBMITTED TO THE WIND LOAD ENGINEER. IT IS THE RESPONSIBILITY OF THE BUILDER TO CHECK ALL DETAILS OF THE COMPLETE ROOF SYSTEM DESIGN SUBMITTED BY THE TRUSS MANUFACTURER AND HAVE IT SIGNED, AND SEALED BY A DESIGN PROFESSIONAL FOR CORRECT APPLICATION OF FBCR 2007 REQUIRED LOADS AND ANY SPECIAL LOADS. THE BUILDER IS RESPONSIBLE TO REVIEW EACH INDIVIDUAL TRUSS MEMBER AND THE TRUSS ROOF SYSTEM AS A WHOLE AND TO PROVIDE RESTRAINT FOR ANY LATERAL BRACING. THE BUILDER SHOULD USE CARE CHECKING THE ROOF DESIGN BECAUSE THE WIND LOAD ENGINEER IS SPECIFICALLY NOT RESPONSIBLE FOR THE TRUSS LAYOUT WHICH WAS CREATED BY THE TRUSS MANUFACTURER AND THE TRUSS DESIGNER ALSO DENIES RESPONSIBILITY FOR THE LAYOUT PER NOTES ON THEIR SEALED TRUSS SHEETS.

#### **MASONRY NOTES:**

MASONRY CONSTRUCTION AND MATERIALS FOR THIS PROJECT SHALL CONFORM TO ALL REQUIREMENTS OF "SPECIFICATION FOR MASONRY STRUCTURES" (ACI 530.1/ASCE 6/TMS 602). THE CONTRACTOR AND MASON MUST IMMEDIATELY, BEFORE PROCEDING, NOTIFY THE ENGINEER OF ANY CONFLICTS BETWEEN ACI 530.1-02 AND THESE DESIGN DRAWINGS. ANY EXCEPTIONS TO ACI 530.1-02 MUST BE APPROVED BY THE ENGINEER IN WRITING.

	ACI530.1-02 Section	Specific Requirements				
1.4A	Compressive strength	8" block bearing walls F'm = 1500 psi				
2.1	Mortar	ASTM C 270, Type N, UNO				
2.2	Grout	ASTM C 476, admixtures require approva				
2.3	CMU standard	ASTM C 90-02, Normal weight, Hollow, medium surface finish, 8"x8"x16" running bond and 12"x12" or 16"x16" column block				
2.3	Clay brick standard	ASTM C 216-02, Grade SW, Type FBS, 5.5"x2.75"x11.5"				
2.4	Reinforcing bars, #3 - #11	ASTM 615, Grade 60, Fy = 60 ksi, Lap splices min 48 bar dia. (30" for #5)				
2.4F	Coating for corrosion protection	Anchors, sheet metal ties completely embedded in mortar or grout, ASTM A525, Class G60, 0.60 oz/ft2 or 304SS				
2.4F	Coating for corrosion protection	Joint reinforcement in walls exposed to moisture or wire ties, anchors, sheet metaties not completely embedded in mortar or grout, ASTM A153, Class B2, 1.50 oz/ft2 or 304SS				
3.3.E.2	Pipes, conduits, and accessories	Any not shown on the project drawings require engineering approval.				
3.3.E.7	Movement joints	Contractor assumes responsibility for type and location of movement joints if not detailed on project drawings.				

#### **DESIGN DATA**

BUILD	DING IS NOT IN THE	CTED UPWIND FOR	LIDDIC	ANE 701	III.	*****	OHEVE	K IS L
		WIND-BORNE DEB			VE.			
	BASIC WIND SPEED		KIS K	EGION				
	VIND EXPOSURE =							
_	VIND IMPORTANCE							
	UILDING CATEGOR							
_	OOF ANGLE = 10-4	200						
	IEAN ROOF HEIGH							
		RE COEFFICIENT = I						
0., 0	OMI ONLINTS AND	CLADDING DESIGN	WIND	PRESSL	IRES (1	TABLE	R301.2	(2))
	*			Zone	Effec	tive W	ind Ar	ea (ft
	The same of the sa				_	10	100	
	2			1	27.8	-30.5	25.3	-25.
ſ	7			2	27.8	-35.7	25.3	-30.
	12	2 2 1	2	2 O'hg		-56.8		-56.
3	1	2 5		3 2 O'ba	27.8	-35.7	25.3	-30.
		1	-	3 O'hg	30.5	-95.6 -33.0	25.0	-59.
	*	55	1	5	30.5	-40.7	25.9 25.9	-28. -31.
	PHO	2×2					20.3	-01.
	[3]		Doors & Windows Worst Case				30.5	-40.
6				(Zone				
5	2			8x7 Gara			27.3	-32.
2	4	/2/ , 5		16x7 Ga			25.9	-29.4
		55 22	-					
		7.7.7	-					
DESIGN	LOADS	L'	L					
FLOOR		IED DIAMEL						
LOUR		IER DWELLING ROO	OMS)					
	30 PSF (SLEEPIN							
	30 PSF (ATTICS )							
2005		WITHOUT STORAGE	Ξ, <3:1	2)				
ROOF	20 PSF (FLAT OR							
	16 PSF (4:12 TO <	5 A.						
	12 PSF (12:12 AN							
TAIDO		CARALL V PARIET LIA						
	40 PSF (ONE & TW ARING CAPACITY		iGS)					

WIND LOADS PER FLORIDA BUILDING CODE 2007 RESIDENTIAL, SECTION R301.2.1

(ENCLOSED SIMPLE DIAPHRAGM BUILDINGS WITH FLAT, HIPPED, OR GABLE ROOFS;

SOFTPLAN

REVISIONS

WINDLOAD ENGINEER: Mark Disosway, PE No.53915, POB 868, Lake City, FL 2056, 386-754-5419 DIMENSIONS: Stated dimensions supercede scaled dimensions. Refer all questions to Mark Disosway, P.E. for resolution. Do not proceed without clarification. COPYRIGHTS AND PROPERTY RIGHTS: Mark Disosway, P.E. hereby expressly reserved its common law copyrights and property right in these instruments of service. This document is not to be reproduced, altered or copied in any form or manner without first the express writter permission and consent of Mark Disosway. CERTIFICATION: I hereby certify that I have examined this plan, and that the applicable portions of the plan, relating to wind engineerin comply with section R301.2.1, florida building code residential 2007, to the best of my knowledge. LIMITATION: This design is valid for one building, at specified location. MARK DISOSWAY P.E. 53915

Blake Construction Bryan & Summer **Buckles Addition** ADDRESS: Columbia County, Florida Mark Disosway P.E. P.O. Box 868 Lake City, Florida 32056 Phone: (386) 754 - 5419 Fax: (386) 269 - 4871 PRINTED DATE: March 08, 2010 DRAWN BY STRUCTURAL B David Disosway FINALS DATE: 15Dec09 JOB NUMBER: 912021 DRAWING NUMBER S-1 OF 3 SHEETS