COMPONENTS AND CLADDING TABLE

COMPONENT	EFFECTIVE AREA (S.F.) TABLE	EFFECTIVE AREA (S.F.) ACTUAL	ZONE	WIND SPEED (FASTEST 3-SECOND GUST IN M.P.H.) * 150		
WINDOWS	10	7 – 9	4	50		
			5	50		
ENTRANCE DOORS	50	21 (3x7)	4	50		
			5	50		
GARAGE DOORS	120	INTERPOLATED (18x7)	4	33.8		
			5	40.8		
	70	INTERPOLATED (9x11)	4	37.0		
			5	41.0		
	100	112 (16x11)	4	34.4		
			5	38.3		

*WINDLOAD x 1.5 x Tw

NOTES:
- REFERENCES TO TABLES ARE PER FBC CURRENT EDITION.

VALUES ARE FROM FBC CURRENT EDITION TABLE
- 1609.6B (WALL), AND ARE MULTIPLIED BY 1.5 & 0.77 TO COMPLY WITH SECTION 1714 EXTERIOR DOOR ASSEMBLIES AND IMPORTANCE FACTOR (Tw) OF TABLE 1604.5. EXPOSURE ADJUSTMENT FACTOR IS 1.0.

ZONE 4:
- REPRESENTS WALL AREAS NOT COVERED IN ZONE 5, SEE FIGURE 1609.6C OF FBC CURRENT EDITION.

ZONE 5:
- REPRESENTS WALL AREAS WHERE 10% OF LEAST HORIZONTAL DIMENSION OR 0.4h, WHICH EVER IS SMALLER, BUT NOT LESS THAN EITHER 4% OF LEAST HORIZONTAL DIMENSION OR 3 FT. (1.0 M).

LOAD VALUES
- ASSOCIATED WITH LOWER EFFECTIVE AREAS WERE USED WHERE APPLICABLE.

SHEAR WALL TABLE

MAXIMUM ALLOWABLE SHEAR END WALL
GARAGE DOOR OPENINGS
(30 FT. MAX.)

DOORS	TOTAL SHEAR WALL SEGMENT LENGTH	FRACTION SHEATHED	SHEAR REQUIRED PLF	SHEAR PROVIDED PLF
2–8' 1–16'	14	0.47	446 (1) 558 (2)	495 (3) 150# (4) 400# 585#
2–8' 1–16'	28 (5)	0.93	149 (6) 186 (7)	495 (3)
2–10'	20 (5)	0.67	285 (8) 356 (9)	495 (3)
2–12'	12 (5)	0.40	660 (10) 824 (11)	495 (3) 150# (4) 400# 585#

SHEAR WALLS REQUIRE HOLD DOWNS AT THE CORNER OF SHEAR WALL SEGMENTS.

FOR 10' & 12' HIGH WALLS THE MINIMUM SHEARWALL SEGMENT IS AS FOLLOWS:
0.3(10') = 2.4' FOR 10' WALLS
0.3(12') = 3.0' FOR 12' WALLS

DOUBLE SHEATHING MAY MEET MINIMUM SHEARWALL SEGMENT LENGTH PROVIDED IT IS >= 2'.

THE FULL PERIMETER OF THE STRUCTURE SHALL BE SHEATHED WITH STRUCTURAL SHEATHING.

1 NOTES: (AS ALLOWED BY FBC CURRENT EDITION R301)

(1) TABLES 305P2, 305P3
L/W=2, 8' WALL, 5H/6, SINGLE SHEATHING
150 MPH

310 PLF x 0.8 (EAVE REDUCTION) x 1.8 (ADJ FACTOR)

(2) TABLES 305P2, 305P3
L/W = 2, 10' WALL, 5H/6, SINGLE SHEATHING
150 MPH

310 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.8 (ADJ FACTOR)

(3) TABLE 305N1
STRUCTURAL 1 SHEATHING, 15/32 THICKNESS, 8d NAIL SIZE, 4" PANEL EDGE NAIL SPACING

(4) 150# PER SIMPSON H2.5 CLIP
400# PER SIMPSON H-7Z
585# PER SIMPSON H-10

(5) DOUBLE SHEATHING

(6) TABLES 305P2, 305P3
L/W = 2, 8' WALL, DOUBLE SHEATHING
150 MPH

169 PLF x 0.8 (EAVE REDUCTION) x 1.1 (ADJ FACTOR)

(7) L/W = 2, 10' WALL, DOUBLE SHEATHING
150 MPH

169 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.1 (ADJ FACTOR)

(8) TABLES 305P2, 305P3
L/W = 2, 8' WALL, DOUBLE SHEATHING
150 MPH

239 PLF x 0.8 (EAVE REDUCTION) x 1.49 (ADJ FACTOR)

(9) TABLES 305P2, 305P3
L/W = 2, 10' WALL, DOUBLE SHEATHING
150 MPH

239 PLF x 1.25 (10' WALL) x .08 (EAVE REDUCTION) x 1.49 (ADJ FACTOR)

(10) TABLES 305P2, 305P3
L/W = 2, 8' WALL, 150 MPH

434 PLF x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

(11) TABLES 305P2, 305P3
L/W = 2, 10' WALL, 150 MPH

434 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

CONNECTION SCHEDULE

FOR UP TO 32' WIDTH AND 80' LENGTH
150 MPH (FASTEST 3-SECOND GUST)
PER FBC CURRENT EDITION R 301.2.1.1

LOCATION	CONNECTION TYPE & MODEL #	FASTENER SCHEDULE STUD	FASTENER SCHEDULE PLATE	REQUIRED UPLIFT	PROVIDED UPLIFT
BOTTOM PLATE TO FOUNDATION	KINGPIN 1/2"x4 1/4" WEDGE ANCHORS	N/A	AT CORNERS AND 4' O.C. OTHERWISE	418#/l.f. * 293#/l.f. **	446#/l.f. @ 3' o.c. 334#/l.f. @ 4' o.c.
STUDS TO TOP OR BOTTOM PLATE	SIMPSON H2.5A	5–8d	5–8d	556#/STUD 389#/STUD	415 from H2.5 474#/from sheathing ***
TRUSS TO TOP PLATE	SIMPSON H7Z	8–8d	6–8d	832#/TRUSS 582#/TRUSS	H7Z=985# +16d double toenail
	SIMPSON H2.5A	5–8d	5–8d		H2.5A=415#(830dbl.)
	SIMPSON H–10A	12–10d	8–8d		H10=990# +16d double toenail
GABLE TRUSS TO TOP PLATE (SHEAR)	SIMPSON LSTA12 & KNEE BRACES	MIN. 5–10d	MIN. 5–10d	90#/l.f.	1170#
WALL SHEATHING	1/2" OSB STRUCTURAL GRADE	8d x 2 3/8" (0.113) @ 4" edge & 12" int.	8d x 2 3/8" (0.113) @ 4" edge & 12" int.	418#/l.f. 293#/l.f.	474#/l.f.
HEADER STUDS CRIPPLE STUDS	SIMPSON LSTA9 OR H2.5A	4–10d 5–8d	4–10d 5–8d	418#/l.f. 293#/l.f.	725#/l.f. 415#/l.f.
DOOR HEADERS	SIMPSON LSTA9 OR H2.5A	4–10d 5–8d	4–10d 5–8d	418#/l.f. 293#/l.f.	725#/l.f. 415#/l.f.
ROOF SHEATHING	1/2" OSB STRUCTURAL GRADE	8d x 2 3/8" (0.113) r.s. 4" edge & 6"int	8d x 2 3/8" (0.113) r.s. 4" edge & 6"int	418#/l.f. 293#/l.f.	474#/l.f.

FOR RANGE OF VALUES IN CONNECTION SCHEDULE:

* HIGHER VALUES WITHIN 6' OF CORNERS, AND

** LOWER VALUES GREATER THAN 6' FROM CORNER.

*** USE 4" ALTERNATE DOUBLE ROW NAIL SPACING @TOP AND BOTTOM PANEL EDGES

FOR CONNECTION SPACING SEE SHEET 1 OF 3

EQUILAVENT BY OTHER MFG'S ARE ACCEPTABLE

WALL SHEATHING MUST BE NAILED WITH 8dx 2 3/8" (.113) NAILS @ 4" EDGE AND 8d NAILS @ 6" INTERMEDIATE WITH 4" ALT. DOUBLE ROW SPACING

COMPARABLE AUTOMATIC GUN NAILS ARE ACCEPTABLE SUBSTITUTES FOR COMMON NAILS

STUDS @ 16" O.C. TRUSSES @ 24" O.C. EAVE HEIGHTS 12' OR LESS

16d TOENAIL PROVIDES 26 # WITHDRAWAL VALUE PER INCH OF PENETRATION.

ROOF SHEATHING MUST BE NAILED WITH 8D X 2 3/8" (.113) RING SHANK NAILS @ 4" EDGE & 6" INTERMEDIATE

SHEAR WALL TABLE

MAXIMUM ALLOWABLE SHEAR SIDE WALL
GARAGE DOOR OPENINGS
(32' X 80' BUILDING)

DOORS	TOTAL SHEAR WALL SEGMENT LENGTH	FRACTION SHEATHED	SHEAR REQUIRED PLF	SHEAR PROVIDED PLF
2–8' 1–16'	14	0.47	396 (1) 495 (2)	495 (3)
2–8' 1–16'	28 (4)	0.93	126 (5) 157 (6)	495 (3)
2–10'	20 (4)	0.67	239 (7) 301 (8)	495 (3)
2–12'	12 (4)	0.40	553 (9) 692 (10)	495 (3) 150# (11) 400# 585#

NOTES: AS ALLOWED BY FBC CURRENT EDITION R301)

(1) TABLES 305P2, 305P3
L/W=1, 8' WALL, 5H/6, SINGLE SHEATHING
150 MPH

291 PLF x 0.8 (EAVE REDUCTION) x 1.7 (ADJ FACTOR)

(2) TABLES 305P2, 305P3
L/W = 1, 10' WALL, 5H/6, SINGLE SHEATHING
150 MPH

291 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.7 (ADJ FACTOR)

(3) TABLE 305N1
STRUCTURAL 1 SHEATHING, 15/32 THICKNESS, 8d NAIL SIZE, 4" PANEL EDGE NAIL SPACING

(4) DOUBLE SHEATHING

(5) TABLES 305P2, 305P3
L/W = 1, 8' WALL, DOUBLE SHEATHING
150 MPH

143 PLF x 0.8 (EAVE REDUCTION) x 1.1 (ADJ FACTOR)

(6) L/W = 1, 12' WALL, DOUBLE SHEATHING
150 MPH

143 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.1 (ADJ FACTOR)

(7) TABLES 305P2, 305P3
L/W = 1, 8' WALL, DOUBLE SHEATHING
150 MPH

202 PLF x 0.8 (EAVE REDUCTION) x 1.49 (ADJ FACTOR)

(8) TABLES 305P2, 305P3
L/W = 1, 12' WALL, DOUBLE SHEATHING
150 MPH

202 PLF x 1.25 (10' WALL) x .08 (EAVE REDUCTION) x 1.49 (ADJ FACTOR)

(9) TABLES 305P2, 305P3
L/W = 1, 8' WALL, 150 MPH

364 PLF x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

(10) TABLES 305P2, 305P3
L/W = 1, 10' WALL, 150 MPH

364 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

(11) 150# PER SIMPSON H2.5A CLIP
400# PER SIMPSON H-7Z
585# PER SIMPSON H-10

SHEAR WALL TABLE

MAXIMUM ALLOWABLE SHEAR SIDE WALL
GARAGE DOOR OPENINGS
(80 FT. MAX.)

DOORS	TOTAL SHEAR WALL SEGMENT LENGTH	FRACTION SHEATHED	SHEAR REQUIRED PLF	SHEAR PROVIDED PLF
4–8 2–16	32	0.53	170 (1) 213 (2)	495 (3)
3–16 4–12	24 (4)	0.40	277 (5) 346 (6)	495 (3)

NOTES: (AS ALLOWED BY FBC CURRENT EDITION R301)

(1) TABLES 305P1, 305P3
L/W=2, 8' WALL, 5H/6, SINGLE SHEATHING
150 MPH
125 PLF x 0.8 (EAVE REDUCTION) x 1.7 (ADJ FACTOR)

(2) L/W=2, 10' WALL, 5H/6, SINGLE SHEATHING
150 MPH
125 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.7 (ADJ FACTOR)

(3) TABLE 305N1
STRUCTURAL 1 SHEATHING, 15/32 THICKNESS, 8d NAIL SIZE, 4" PANEL EDGE NAIL SPACING

(4) DOUBLE SHEATHING

(5) L/W=2, 8' WALL, DOUBLE SHEATHING, 150 MPH
182 PLF x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

(6) L/W=2, 10' WALL, DOUBLE SHEATHED, 150 MPH
182 PLF x 1.25 (10' WALL) x 0.8 (EAVE REDUCTION) x 1.9 (ADJ FACTOR)

Reviewed for Code Compliance
Kevin Powell
BO1814, PX2841, BN4866, RPX329
"Inspection Solutions, LLC hereby certifies
That these plans are in compliance
With applicable codes, and have not
Been changed, altered, or modified
By Inspections Solutions, LLC"

2025.11.20 00:28:5 6-05'00'

STATE OF FLORIDA STEVEN HEPNER AR010620

W D S DESIGN GROUP INC.
DESIGNERS OF QUALITY HOMES
Residential * Light Commercial Engineering
Rev. 07-12 Orlando, Florida 32804
Phone Hepner (407) 298-4679 Fax: (407) 298-8849
e-mail : wshaffer8@cfl.rr.com

THIS SET OF PLANS MEETS OR EXCEEDS 150 MPH WINDLOADS AS PER THE FLORIDA BUILD CODE 2023, 8TH EDITION R-301

STEVEN HEPNER
AR. 0010620

Project Number: 08-012
Preliminary Input
Revision Note:

DRAWING TYPES : Master Garage Builders Inc.
DRAWING TYPES : CHARTS AND NOTES

MURRAY RES

NOV 2025

SHEET: 2 of 4