

Wall Selection and Anchorage Classification:
BALLOON-FRAMING APPLICATION

Equivalent Wall-Bracing Length (ft)	Top Plate Height	Bottom-Wall Model	Top-Wall Model	Stacked Height	Base Material Under Wall		
					Concrete	CMU	Wood Floor
2.5	14'-8 1/4" – 15'-8 1/4"	SSW15x8-STK	SSW15x7	14'-5 1/4"	D	D	D
	15'-9 1/2" – 16'-9 1/2"		SSW15x8	15'-6 1/2"	D	NS	D
	16'-8 1/4" – 17'-8 1/4"	SSW15x10-STK	SSW15x7	16'-5 1/4"	D	NS	D
	17'-9 1/2" – 18'-9 1/2"		SSW15x8	17'-6 1/2"	D	NS	E
	18'-9 1/2" – 19'-9 1/2"		SSW15x9	18'-6 1/2"	D	NS	E
	19'-9 1/2" – 20'-9 1/2"		SSW15x10	19'-6 1/2"	E	NS	E
	14'-8 1/4" – 15'-8 1/4"	SSW18x8-STK	SSW18x7	14'-5 1/4"	C	C	C
	15'-9 1/2" – 16'-9 1/2"		SSW18x8	15'-6 1/2"	C	C	C
	16'-8 1/4" – 17'-8 1/4"	SSW18x10-STK	SSW18x7	16'-5 1/4"	C	D	D
	17'-9 1/2" – 18'-9 1/2"		SSW18x8	17'-6 1/2"	C	D	D
	18'-9 1/2" – 19'-9 1/2"		SSW18x9	18'-6 1/2"	D	D	D
	19'-9 1/2" – 20'-9 1/2"		SSW18x10	19'-6 1/2"	D	D	D
	14'-8 1/4" – 15'-8 1/4"	SSW21x8-STK	SSW21x7	14'-5 1/4"	B	B	C
	15'-9 1/2" – 16'-9 1/2"		SSW21x8	15'-6 1/2"	B	C	C
	16'-8 1/4" – 17'-8 1/4"	SSW21x10-STK	SSW21x7	16'-5 1/4"	C	C	C
	17'-9 1/2" – 18'-9 1/2"		SSW21x8	17'-6 1/2"	C	C	C
	18'-9 1/2" – 19'-9 1/2"		SSW21x9	18'-6 1/2"	C	C	C
	19'-9 1/2" – 20'-9 1/2"		SSW21x10	19'-6 1/2"	C	C	C
	14'-8 1/4" – 15'-8 1/4"	SSW24x8-STK	SSW24x7	14'-5 1/4"	B	B	B
	15'-9 1/2" – 16'-9 1/2"		SSW24x8	15'-6 1/2"	B	B	B
16'-8 1/4" – 17'-8 1/4"	SSW24x10-STK	SSW24x7	16'-5 1/4"	B	B	B	
17'-9 1/2" – 18'-9 1/2"		SSW24x8	17'-6 1/2"	B	C	C	
18'-9 1/2" – 19'-9 1/2"		SSW24x9	18'-6 1/2"	B	C	C	
19'-9 1/2" – 20'-9 1/2"		SSW24x10	19'-6 1/2"	C	C	C	
4	14'-8 1/4" – 15'-8 1/4"	SSW15x8-STK	SSW15x7	14'-5 1/4"	E	NS	NS
	14'-8 1/4" – 15'-8 1/4"	SSW18x8-STK	SSW18x7	14'-5 1/4"	D	NS	E
	15'-9 1/2" – 16'-9 1/2"		SSW18x8	15'-6 1/2"	E	NS	E
	16'-8 1/4" – 17'-8 1/4"	SSW18x10-STK	SSW18x7	16'-5 1/4"	E	NS	NS
	17'-9 1/2" – 18'-9 1/2"		SSW18x8	17'-6 1/2"	E	NS	NS
	18'-9 1/2" – 19'-9 1/2"		SSW18x9	18'-6 1/2"	E	NS	NS
	19'-9 1/2" – 20'-9 1/2"		SSW18x10	19'-6 1/2"	E	NS	NS
	14'-8 1/4" – 15'-8 1/4"	SSW21x8-STK	SSW21x7	14'-5 1/4"	D	D	D
	15'-9 1/2" – 16'-9 1/2"		SSW21x8	15'-6 1/2"	D	D	D
	16'-8 1/4" – 17'-8 1/4"	SSW21x10-STK	SSW21x7	16'-5 1/4"	D	E	D
	17'-9 1/2" – 18'-9 1/2"		SSW21x8	17'-6 1/2"	D	E	D
	18'-9 1/2" – 19'-9 1/2"		SSW21x9	18'-6 1/2"	D	E	E
	19'-9 1/2" – 20'-9 1/2"		SSW21x10	19'-6 1/2"	E	E	E
	14'-8 1/4" – 15'-8 1/4"	SSW24x8-STK	SSW24x7	14'-5 1/4"	C	C	C
	15'-9 1/2" – 16'-9 1/2"		SSW24x8	15'-6 1/2"	C	D	D
	16'-8 1/4" – 17'-8 1/4"	SSW24x10-STK	SSW24x7	16'-5 1/4"	D	D	D
	17'-9 1/2" – 18'-9 1/2"		SSW24x8	17'-6 1/2"	D	D	D
	18'-9 1/2" – 19'-9 1/2"		SSW24x9	18'-6 1/2"	D	D	D
19'-9 1/2" – 20'-9 1/2"	SSW24x10		19'-6 1/2"	D	D	D	

- See pages 46-69 for anchorage solutions.
- Required length of braced wall panels for balloon-frame applications should be based on the length required for the bottom story assuming the balloon-framed wall counts as two stories.
- Maximum floor-joist depth for wood-floor applications is 16" for SSW.
- Maximum shim block height above top SSW shall be 12". Shim block height = (Plate Height) – (Stacked SSW Height) – (3" Top Plate Depth).
- A minimum of two full-height 2x6 studs shall be placed on each side of balloon-framed wall and fastened together with 10d common nails at 16" o.c. Design for out-of-plane wind requirements by others.
- SSW balloon-framing wall models require 3' end distance from corner to accommodate additional full-height studs.
- SSW models installed on wood floor require a wood first-floor connection kit depending on wall model width as follows: SSW15-1KT, SSW18-1KT, SSW21-1KT, or SSW24-1KT.
- Balloon-framing wall connection kit (SSWBF-KT) required for all installations.
- NS = No solution available.
- See general notes for additional information.

