City of Puyallup
Development & Permitting Services
ISSUED PERMIT
Building | Planning
Engineering | Public Works
Fire | Traffic

VP Buildings

3200 Players Club Circle
Memphis, TN 38125-8843

STRUCTURAL DESIGN DATA

Project: Cimco Sales Warehouse
Name: 23-013974-01
Builder PO #: 23033
Jobsite: 2315 Inter Avenue

City, State: Puyallup, Washington 98372
County: Pierce
Country: United States

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04/24/2023 LARN Reviewed

Letter of Certification

Contact: Ryan Grouws
Name: CHG BUILDING SYSTEMS, INC.
Address: PO Box 78448

City, State: Seattle, Washington 98178
Country: United States

Project: Cimco Sales Warehouse
Builder PO #: 23033
Jobsite: 2315 Inter Avenue

City, State: Puyallup, Washington 98372
County, Country: Pierce, United States

This is to certify that the above referenced project has been designed in accordance with the applicable portions of the Building Code specified below. All loading and building design criteria shown below have been specified by contract and applied in accordance with the building code.

Overall Building Description

Shape	Overall Width	Overall Length	Floor Area (sq. ft.)	Wall Area (sq. ft.)	Roof Area (sq. ft.)	Max. Eave Height	Min. Eave Height 2	Max. Roof Pitch	Min. Roof Pitch	Peak Height
Building - Warehouse	58/6/0	85/0/0	4973	5811	4977	20/0/0	20/0/0	0.5000:12	0.5000:12	21/2/10

Loads and Codes - Shape: Building - Warehouse

City: Puyallup **County:** Pierce **State:** Washington **Country:** United States
Building Code: 2018 Washington State Building Code
Based on Building Code: 2018 International Building Code
Building Risk/Occupancy Category: II (Standard Occupancy Structure)
Structural: 16AISC - ASD
Cold Form: 16AISI - ASD
Rainfall: I: 4.00 inches per hour
f'c: 3000.00 psi Concrete

Dead and Collateral Loads
Collateral Gravity:5.00 psf
Collateral Uplift: 0.00 psf
Roof Covering + Second. Dead Load: 2.28 psf
Frame Weight (assumed for seismic):2.50 psf

Roof Live Load
Roof Live Load: 20.00 psf Reducible

Wind Load
Wind Speed: Vult: 110.00 (Vasd: 85.21) mph

The 'Envelope Procedure' is Used
Primaries Wind Exposure: B - Kz: 0.701
Parts Wind Exposure Factor: 0.624
Wind Enclosure: Enclosed
Topographic Factor: Kzt: 1.0000
Ground Elevation Factor: Ke: 0.9978

NOT Windborne Debris Region
Base Elevation: 0/0/0
Site Elevation: 61.3 ft
Primary Zone Strip Width: 2a: 11/8/6
Parts / Portions Zone Strip Width:
Walls, a: 5/10/3
Roof(s), 0.6h: 12/0/0
Velocity Pressure: qz: 18.41, (C&C) 16.39 psf

Snow Load
Ground Snow Load: pg: 25.00 psf

Flat Roof Snow: pf: 15.75 psf
Design Snow (Sloped): ps: 15.75 psf
Rain Surcharge: 0.00
Specified Minimum Roof Snow: 25.00 psf (USR)
Exposure Factor: 1 Fully Exposed - Ce: 0.90
Snow Importance: Is: 1.000
Thermal Factor: Heated - Ct: 1.00
Ground / Roof Conversion: 0.70
Obstructed or Not Slippery

Seismic Load
Lateral Force Resisting Systems using Equivalent Force Procedure
Mapped MCE Acceleration: Ss: 125.90 %g
Mapped MCE Acceleration: S1: 43.30 %g
Site Class: Stiff soil (D) - Default
Seismic Importance: Ie: 1.000
Design Acceleration Parameter: Sds: 1.0072
Design Acceleration Parameter: Sd1: 0.5389
Seismic Design Category: D
Seismic Snow Load: 0.00 psf
% Snow Used in Seismic: 0.00
Diaphragm Condition: Flexible
Fundamental Period Height Used: 20/7/5

Transverse Direction Parameters
Ordinary Steel Moment Frames
Redundancy Factor: Rho: 1.30
Fundamental Period: Ta: 0.3151
R-Factor: 3.50
Overstrength Factor: Omega: 2.50
Deflection Amplification Factor: Cd: 3.00
Base Shear: V: 0.2878 x W

Longitudinal Direction Parameters
Ordinary Steel Concentric Braced Frames
Redundancy Factor: Rho: 1.30
Fundamental Period: Ta: 0.1935
R-Factor: 3.25
Overstrength Factor: Omega: 2.00
Deflection Amplification Factor: Cd: 3.25
Base Shear: V: 0.3099 x W

Load Notes
Application of Specified Minimum Uniform Roof Snow loads, “SMS”:
-The specified minimum roof snow (SMS) will be applied as a separate roof load check, combined with dead loads only.
-The SMS is considered the net sloped roof load, i.e., none of the other snow load related factors such as Importance, Thermal, Unobstructed Slippery, Exposure, etc., will apply.
-The SMS is not considered in conjunction with the bracing second order effects.

04/24/2023 LARN Reviewed

Building design loads and governing building code is provided by the Builder and is not validated by Varco Pruden Buildings, a division of BlueScope Buildings North America, Inc. The Builder is responsible for contacting the local Building Official or project Design Professional to obtain all code and loading information for this specific building site.

The design of this building is in accordance with Varco Pruden Buildings, a division of BlueScope Buildings North America, Inc. design practices which have been established based upon pertinent procedures and recommendations of the Standards listed in the Building Code or later editions.

This certification DOES NOT apply to the design of the foundation or other on-site structures or components not supplied by Varco Pruden Buildings, a division of BlueScope Buildings North America, Inc., nor does it apply to unauthorized modifications to building components. Furthermore, it is understood that certification is based upon the premise that all components will be erected or constructed in strict compliance with pertinent documents for this project. Varco Pruden Buildings, a division of BlueScope Buildings North America, Inc. DOES NOT provide general review of erection during or after building construction unless specifically agreed to in the contract documents.

The undersigned engineer in responsible charge certifies that this building has been designed in accordance with the contract documents as indicated in this letter.

Derrick Wessel
Engineer in responsible charge

Date: 5/24/23

Engineer's Seal:

05/24/2023

This document has been electronically signed and sealed by Derrick Wessel, PE. The seal and signature applied are mine and I approve this document.
2023.05.24
13:36:05-07'00'

04/24/2023 LARN Reviewed

Reactions - Summary Report w/Controlling Load Comb

Shape: Building - Warehouse

Builder Contact: Ryan Grouws
Name: CHG BUILDING SYSTEMS, INC.
Address: PO Box 78448

City, State Zip: Seattle, Washington 98178
Country: United States

Project: Cimco Sales Warehouse
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Jobsite: 2315 Inter Avenue

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Ground Snow Load: pg: 25.00 psf

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Design Snow (Sloped): ps: 15.75 psf
Rain Surcharge: 0.00
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Exposure Factor: 1 Fully Exposed - Ce: 0.90
Snow Importance: Is: 1.000
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Obstructed or Not Slippery

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Lateral Force Resisting Systems using Equivalent Force Procedure
Mapped MCE Acceleration: Ss: 125.90 %g
Mapped MCE Acceleration: S1: 43.30 %g
Site Class: Stiff soil (D) - Default
Seismic Importance: Ie: 1.000
Design Acceleration Parameter: Sds: 1.0072
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Seismic Design Category: D
Seismic Snow Load: 0.00 psf
% Snow Used in Seismic: 0.00
Diaphragm Condition: Flexible
Fundamental Period Height Used: 20/7/5

Transverse Direction Parameters
Ordinary Steel Moment Frames
Redundancy Factor: Rho: 1.30
Fundamental Period: Ta: 0.3151
R-Factor: 3.50
Overstrength Factor: Omega: 2.50
Deflection Amplification Factor: Cd: 3.00
Base Shear: V: 0.2878 x W

Longitudinal Direction Parameters
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R-Factor: 3.25
Overstrength Factor: Omega: 2.00
Deflection Amplification Factor: Cd: 3.25
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Load Notes
Application of Specified Minimum Uniform Roof Snow loads, “SMS”:
-The specified minimum roof snow (SMS) will be applied as a separate roof load check, combined with dead loads only.
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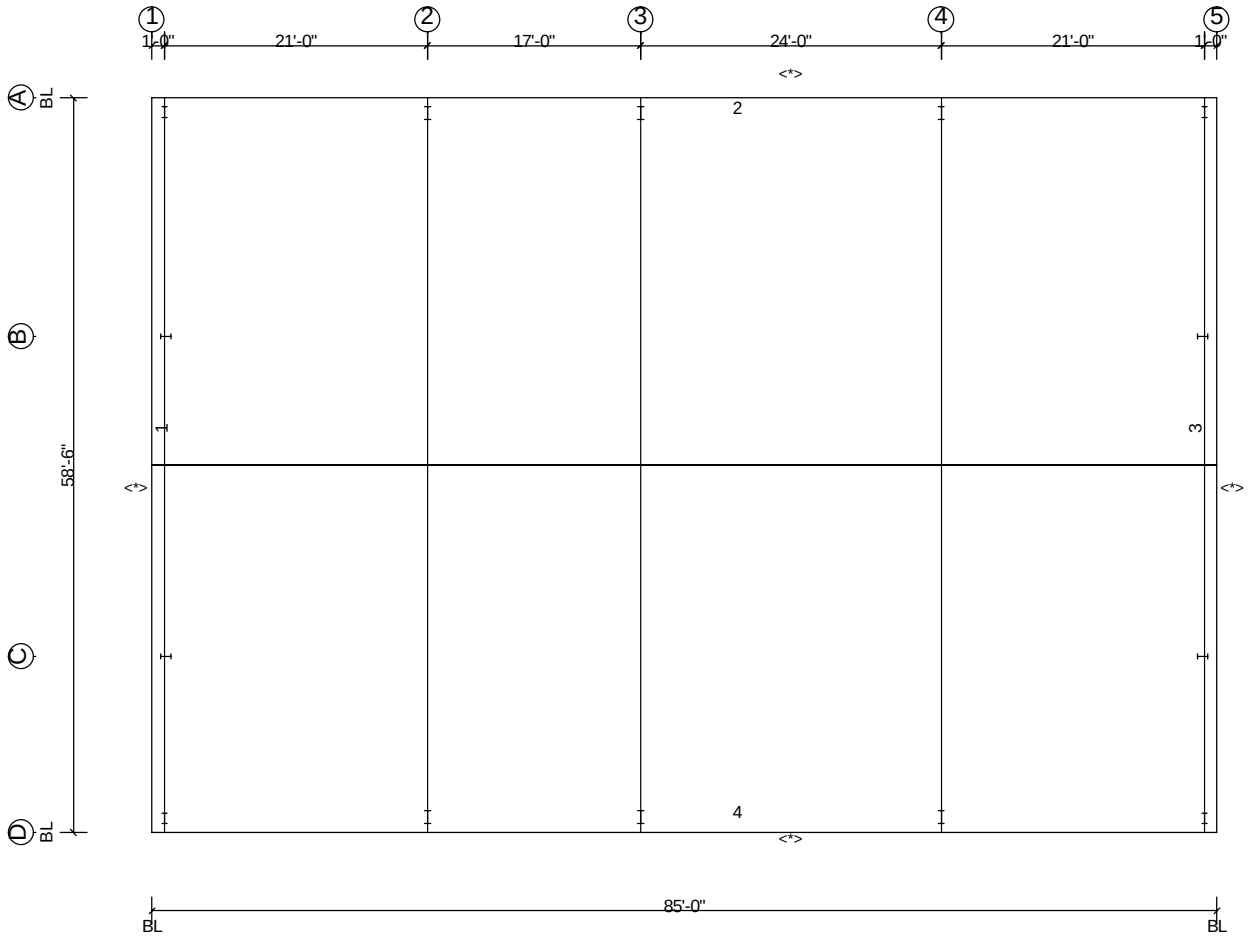
04/24/2023 LARN Reviewed

Overall Building Description

Shape	Overall Width	Overall Length	Floor Area (sq. ft.)	Wall Area (sq. ft.)	Roof Area (sq. ft.)	Max. Eave Height	Min. Eave Height 2	Max. Roof Pitch	Min. Roof Pitch	Peak Height
Building - Warehouse	58/6/0	85/0/0	4973	5811	4977	20/0/0	20/0/0	0.5000:12	0.5000:12	21/2/10

Overall Shape Description

Roof 1	Roof 2	From Grid	To Grid	Width	Length	Eave Ht.	Eave Ht. 2	Pitch	Pitch 2	Dist. to Ridge	Peak Height
A	B	1-A	1-D	58/6/0	85/0/0	20/0/0	20/0/0	0.5000:12	0.5000:12	29/3/0	21/2/10



<*> The building is designed with bracing diagonals in the designated bays. Column base reactions, base plates and anchor rods are affected by this bracing and diagonals may not be relocated without consulting the building supplier's engineer.

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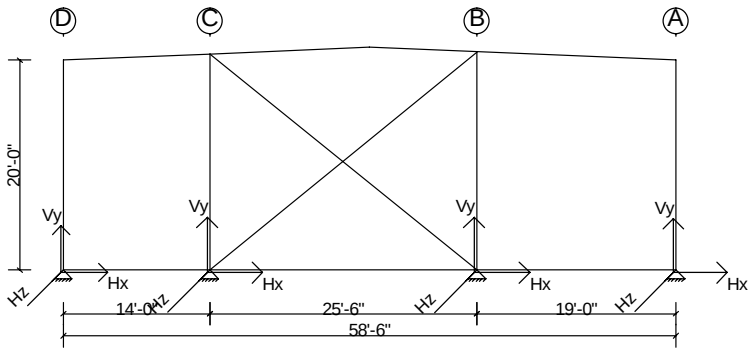
Wall: 4, Frame at: 1/0/0

Frame ID:Post & Beam

Frame Type:Post & Beam



Values shown are resisting forces of the foundation.
Base Connection Design is Based on 3000.00 (psi) Concrete

Reactions - Unfactored Load Type at Frame Cross Section: 1

Type			Exterior Column			Interior Column			Interior Column			Exterior Column	
X-Loc			0/0/0			14/0/0			39/6/0			58/6/0	
Grid1 - Grid2			1-D			1-C			1-B			1-A	
Base Plate W x L (in.)			8 X 11			8 X 11			8 X 11			8 X 11	
Base Plate Thickness (in.)			0.375			0.375			0.375			0.375	
Anchor Rod Qty/Diam. (in.)			4 - 0.750			4 - 0.750			4 - 0.750			4 - 0.750	
Column Base Elev.			100'-0"			100'-0"			100'-0"			100'-0"	
Load Type	Load Description	Desc.	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Vy
D	Material Dead Weight	Frm	-	-	0.40	-	-	1.00	-	-	1.14	-	0.43
CG	Collateral Load for Gravity Cases	Frm	-	-	0.31	-	-	1.28	-	-	1.43	-	0.42
L>	Live - Notional Right	Frm	-	-	1.03	-	-	4.82	-	-	5.43	-	1.69
<L	Live - Notional Left	Frm	-	-	1.03	-	-	4.82	-	-	5.43	-	1.69
ASL^	Alternate Span Live Load, Shifted Right	Frm	-	-	-0.69	-	-	3.45	-	-	3.07	-	-0.42
^ASL	Alternate Span Live Load, Shifted Left	Frm	-	-	1.72	-	-	1.37	-	-	2.36	-	2.10
SMS>	Specified Min. Roof Snow - Notional Right	Frm	-	-	1.22	-	-	6.40	-	-	7.15	-	2.08
<SMS	Specified Min. Roof Snow - Notional Left	Frm	-	-	1.22	-	-	6.40	-	-	7.15	-	2.08
US1*	Unbalanced Snow Load 1, Shifted Right	Frm	-	-	0.15	-	-	1.48	-	-	5.24	-	1.60
*US1	Unbalanced Snow Load 1, Shifted Left	Frm	-	-	0.76	-	-	5.23	-	-	2.28	-	0.21
W1>	Wind Load, Case 1, Right	Frm	-0.77	-	-1.05	-	3.07	-5.36	-	3.50	-4.04	-1.16	-0.98
<W1	Wind Load, Case 1, Left	Frm	1.16	-	-0.61	-	-3.07	-3.32	-	-3.50	-5.65	0.77	-1.85
W2>	Wind Load, Case 2, Right	Frm	-1.49	-	-0.69	-	-	-3.69	-	-	-2.18	-0.44	-0.40
<W2	Wind Load, Case 2, Left	Frm	0.44	-	-0.25	-	-	-1.65	-	-	-3.80	1.49	-1.26
WPL	Wind Load, || Ridge, Left	Frm	1.30	1.01	-0.64	-	-	-3.26	-	-	-5.58	-1.31	-1.95
WPR	Wind Load, || Ridge, Right	Frm	1.32	-1.01	-1.15	-	-	-5.31	-	-	-3.96	-1.31	-1.00
MW	Minimum Wind Load - Wall: 1	Frm	-	-	-	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 2	Frm	-	-	0.01	-	-	-0.05	-	-	-0.05	1.74	0.09
MW	Minimum Wind Load - Wall: 3	Frm	-	-	-	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 4	Frm	-1.74	-	0.09	-	-	-0.04	-	-	-0.06	-	0.01
CU	Collateral Load for Wind Cases	Frm	-	-	-	-	-	-	-	-	-	-	-
L	Roof Live Load	Frm	-	-	1.03	-	-	4.82	-	-	5.43	-	1.69
S	Snow Load	Frm	-	-	0.77	-	-	4.03	-	-	4.50	-	1.31
E>	Seismic Load, Right	Frm	-0.06	-	-	-	0.10	-	-	0.12	-	-0.06	-
EG+	Vertical Seismic Effect, Additive	Frm	-	-	0.11	-	-	0.50	-	-	0.56	-	0.16
<E	Seismic Load, Left	Frm	0.06	-	-	-	-0.10	-	-	-0.12	-	0.06	-
EG-	Vertical Seismic Effect, Subtractive	Frm	-	-	-0.11	-	-	-0.50	-	-	-0.56	-	-0.16
WB1>	Wind Brace Reaction, Case 1, Right	Brc	-	-	-	-1.97	-	-1.59	-	-	1.59	-	-
<WB1	Wind Brace Reaction, Case 1, Left	Brc	-	-	-	-	-	1.57	1.97	-	-1.57	-	-
WB2>	Wind Brace Reaction, Case 2, Right	Brc	-	-	-	-1.97	-	-1.59	-	-	1.59	-	-
<WB2	Wind Brace Reaction, Case 2, Left	Brc	-	-	-	-	-	1.57	1.97	-	-1.57	-	-

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WB3>	Wind Brace Reaction, Case 3, Right	Brc	-	-	-	-1.97	-	-1.59	-	-	1.59	-	-
<WB3	Wind Brace Reaction, Case 3, Left	Brc	-	-	-	-	-	1.57	1.97	-	-1.57	-	-
WB4>	Wind Brace Reaction, Case 4, Right	Brc	-	-	-	-1.97	-	-1.59	-	-	1.59	-	-
<WB4	Wind Brace Reaction, Case 4, Left	Brc	-	-	-	-	-	1.57	1.97	-	-1.57	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 1	Brc	-	-	-	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 2	Brc	-	-	-	-	-	1.50	1.88	-	-1.50	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 3	Brc	-	-	-	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 4	Brc	-	-	-	-1.88	-	-1.52	-	-	1.52	-	-
EB>	Seismic Brace Reaction, Right	Brc	-	-	-	-2.08	-	-1.68	-	-	1.68	-	-
<EB	Seismic Brace Reaction, Left	Brc	-	-	-	-	-	1.66	2.08	-	-1.66	-	-
SMS	Specified Min. Roof Snow	Frm	-	-	1.22	-	-	6.40	-	-	7.15	-	2.08

Maximum Combined Reactions Summary with Factored Loads - Framing

Note: All reactions are based on 1st order structural analysis.

Appropriate Load Factors must be applied for design of foundations.

X-Loc	Grid	Hrz left (-Hx) (k)	Load Case	Hrz Right (Hx) (k)	Load Case	Hrz In (-Hz) (k)	Load Case	Hrz Out (Hz) (k)	Load Case	Uplift (-Vy) (k)	Load Case	Vrt Down (Vy) (k)	Load Case	Mom cw (-Mzz) (in-k)	Load Case	Mom ccw (Mzz) (in-k)	Load Case
0/0/0	1-D	1.05	25	0.79	21	0.61	21	0.61	20	0.45	31	2.43	4	-	-	-	-
14/0/0	1-C	1.87	92	-	-	1.84	17	1.84	16	3.54	57	8.68	7	-	-	-	-
39/6/0	1-B	-	-	1.87	102	2.10	17	2.10	16	3.61	77	9.72	7	-	-	-	-
58/6/0	1-A	0.79	20	1.05	23	-	-	-	-	0.91	30	2.95	4	-	-	-	-

Maximum Frame Reactions - Factored Load Cases at Frame Cross Section: 1

Note: All reactions are based on 1st order structural analysis.

X-Loc		0/0/0			14/0/0			39/6/0			58/6/0		
Grid1 - Grid2		1-D			1-C			1-B			1-A		
Ld	Description	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Vy	
Cs	(application factor not shown)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	
4	D + CG + ^ASL	-	-	2.43	-	-	3.66	-	-	4.93	-	2.95	-
7	D + CG + SMS>	-	-	1.93	-	-	8.68	-	-	9.72	-	2.93	-
16	D + CG + W1>	-0.46	-	0.08	-	1.84	-0.93	-	2.10	0.15	-0.70	0.26	-
17	D + CG + <W1	0.70	-	0.34	-	-1.84	0.29	-	-2.10	-0.82	0.46	-0.26	-
20	D + CG + WPL	0.78	0.61	0.33	-	-	0.33	-	-	-0.78	-0.79	-0.32	-
21	D + CG + WPR	0.79	-0.61	0.02	-	-	-0.91	-	-	0.19	-0.79	0.25	-
23	MW - Wall: 2	-	-	0.01	-	-	-0.03	-	-	-0.03	1.05	0.05	-
25	MW - Wall: 4	-1.05	-	0.05	-	-	-0.02	-	-	-0.04	-	0.01	-
30	D + CU + WPL	0.78	0.61	-0.14	-	-	-1.35	-	-	-2.67	-0.79	-0.91	-
31	D + CU + WPR	0.79	-0.61	-0.45	-	-	-2.59	-	-	-1.69	-0.79	-0.34	-
57	D + CU + WPR + WB1>	0.79	-0.61	-0.45	-1.17	-0.01	-3.54	-	-	-0.74	-0.79	-0.34	-
77	D + CU + WPL + <WB3	0.78	0.61	-0.14	-	-	-0.41	1.17	0.01	-3.61	-0.79	-0.91	-
92	D + CG + E> + EG+ + EB>	-0.02	-	0.79	-1.87	0.01	1.11	-	0.03	4.49	-0.02	0.97	-
102	D + CG + E> + EG+ + <EB	-0.02	-	0.79	-	0.03	4.14	1.87	0.05	1.45	-0.02	0.97	-

04/24/2023 LARN Reviewed

ASD Load Combinations - Framing

No.	Origin	Factor	Application	Description
4	System	1.000	1.0 D + 1.0 CG + 1.0 ^ASL	D + CG + ^ASL
7	System	1.000	1.0 D + 1.0 CG + 1.0 SMS>	D + CG + SMS>
16	System	1.000	1.0 D + 1.0 CG + 0.6 W1>	D + CG + W1>
17	System	1.000	1.0 D + 1.0 CG + 0.6 <W1	D + CG + <W1
20	System	1.000	1.0 D + 1.0 CG + 0.6 WPL	D + CG + WPL
21	System	1.000	1.0 D + 1.0 CG + 0.6 WPR	D + CG + WPR
23	System	1.000	0.6 MW	MW - Wall: 2
25	System	1.000	0.6 MW	MW - Wall: 4
30	System	1.000	0.6 D + 0.6 CU + 0.6 WPL	D + CU + WPL
31	System	1.000	0.6 D + 0.6 CU + 0.6 WPR	D + CU + WPR
57	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPR + 0.6 WB1>	D + CU + WPR + WB1>
77	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPL + 0.6 <WB3	D + CU + WPL + <WB3
92	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 EB>	D + CG + E> + EG+ + EB>
102	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 <EB	D + CG + E> + EG+ + <EB

Bracing

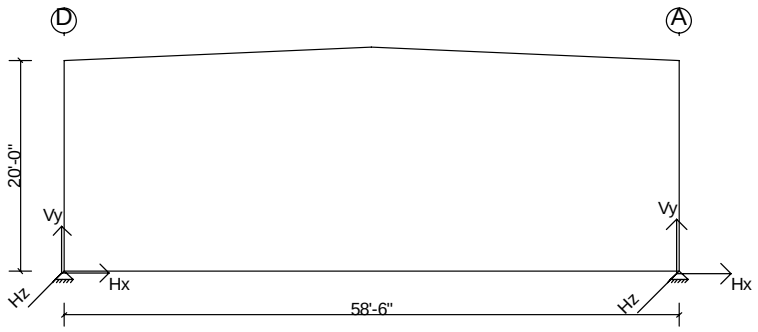
X-Loc	Grid	Description
14/0/0	1-C	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.
39/6/0	1-B	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.

04/24/2023 LARN Reviewed

Wall: 4, Frame at: 22/0/0

Frame ID:Rigid Frame

Frame Type:Rigid Frame



Values shown are resisting forces of the foundation.
Base Connection Design is Based on 3000.00 (psi) Concrete

Reactions - Unfactored Load Type at Frame Cross Section: 2

Type			Exterior Column		Exterior Column			
X-Loc			0/0/0		58/6/0			
Grid1 - Grid2			2-D		2-A			
Base Plate W x L (in.)			8 X 13		8 X 13			
Base Plate Thickness (in.)			0.375		0.375			
Anchor Rod Qty/Diam. (in.)			4 - 0.750		4 - 0.750			
Column Base Elev.			100'-0"		100'-0"			
Load Type	Load Description	Desc.	Hx	Vy	Hx	Vy		
D	Material Dead Weight	Frm	0.83	2.22	-0.83	2.22	-	-
CG	Collateral Load for Gravity Cases	Frm	1.26	2.89	-1.26	2.78	-	-
SMS>	Specified Min. Roof Snow - Notional Right	Frm	6.32	13.89	-6.32	13.89	-	-
<SMS	Specified Min. Roof Snow - Notional Left	Frm	6.32	13.89	-6.32	13.89	-	-
US1*	Unbalanced Snow Load 1, Shifted Right	Frm	3.31	4.87	-3.31	9.10	-	-
*US1	Unbalanced Snow Load 1, Shifted Left	Frm	3.31	9.10	-3.31	4.87	-	-
W1>	Wind Load, Case 1, Right	Frm	-5.62	-9.47	0.59	-5.86	-	-
<W1	Wind Load, Case 1, Left	Frm	-0.59	-5.86	5.62	-9.47	-	-
W2>	Wind Load, Case 2, Right	Frm	-5.10	-5.79	0.07	-2.17	-	-
<W2	Wind Load, Case 2, Left	Frm	-0.07	-2.17	5.10	-5.79	-	-
WPL	Wind Load, || Ridge, Left	Frm	-1.53	-6.78	1.38	-8.55	-	-
WPR	Wind Load, || Ridge, Right	Frm	-1.38	-8.55	1.53	-6.78	-	-
MW	Minimum Wind Load - Wall: 1	Frm	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 2	Frm	1.73	1.14	4.54	-1.14	-	-
MW	Minimum Wind Load - Wall: 3	Frm	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 4	Frm	-4.54	-1.14	-1.73	1.14	-	-
CU	Collateral Load for Wind Cases	Frm	-	-	-	-	-	-
S	Snow Load	Frm	3.98	8.75	-3.98	8.75	-	-
E>	Seismic Load, Right	Frm	-1.79	-1.17	-1.78	1.17	-	-
EG+	Vertical Seismic Effect, Additive	Frm	0.50	1.12	-0.50	1.10	-	-
<E	Seismic Load, Left	Frm	1.79	1.17	1.78	-1.17	-	-
EG-	Vertical Seismic Effect, Subtractive	Frm	-0.50	-1.12	0.50	-1.10	-	-
SMS	Specified Min. Roof Snow	Frm	6.32	13.89	-6.32	13.89	-	-

04/24/2023 LARN Reviewed

Maximum Combined Reactions Summary with Factored Loads - Framing
Note: All reactions are based on 1st order structural analysis.
Appropriate Load Factors must be applied for design of foundations.

X-Loc	Grid	Hrz left (-Hx) (k)	Load Case	Hrz Right (Hx) (k)	Load Case	Hrz In (-Hz) (k)	Load Case	Hrz Out (Hz) (k)	Load Case	Uplift (-Vy) (k)	Load Case	Vrt Down (Vy) (k)	Load Case	Mom cw (-Mzz) (in-k)	Load Case	Mom ccw (Mzz) (in-k)	Load Case
0/0/0	2-D	2.87	15	8.41	1	-	-	-	-	4.35	15	19.00	1	-	-	-	-
58/6/0	2-A	8.41	1	2.87	16	-	-	-	-	4.35	16	18.89	1	-	-	-	-

Maximum Frame Reactions - Factored Load Cases at Frame Cross Section: 2
Note: All reactions are based on 1st order structural analysis.

X-Loc		0/0/0		58/6/0				
Grid1 - Grid2		2-D		2-A				
Ld	Description	Hx	Vy	Hx	Vy			
Cs	(application factor not shown)	(k)	(k)	(k)	(k)			
1	D + CG + SMS>	8.41	19.00	-8.41	18.89	-	-	-
15	D + CU + W1>	-2.87	-4.35	-0.14	-2.18	-	-	-
16	D + CU + <W1	0.14	-2.18	2.87	-4.35	-	-	-

ASD Load Combinations - Framing

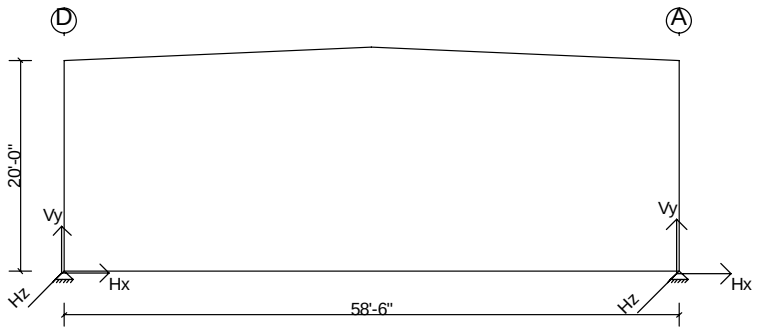
No.	Origin	Factor	Application	Description
1	System	1.000	1.0 D + 1.0 CG + 1.0 SMS>	D + CG + SMS>
15	System	1.000	0.6 D + 0.6 CU + 0.6 W1>	D + CU + W1>
16	System	1.000	0.6 D + 0.6 CU + 0.6 <W1	D + CU + <W1

04/24/2023 LARN Reviewed

Wall: 4, Frame at: 39/0/0

Frame ID:Rigid Frame

Frame Type:Rigid Frame



Values shown are resisting forces of the foundation.
Base Connection Design is Based on 3000.00 (psi) Concrete

Reactions - Unfactored Load Type at Frame Cross Section: 3

Type			Exterior Column			Exterior Column				
X-Loc			0/0/0			58/6/0				
Grid1 - Grid2			3-D			3-A				
Base Plate W x L (in.)			8 X 13			8 X 13				
Base Plate Thickness (in.)			0.375			0.375				
Anchor Rod Qty/Diam. (in.)			4 - 0.750			4 - 0.750				
Column Base Elev.			100'-0"			100'-0"				
Load Type	Load Description	Desc.	Hx	Hz	Vy	Hx	Hz	Vy		
D	Material Dead Weight	Frm	0.94	-	2.37	-0.94	-	2.37	-	-
CG	Collateral Load for Gravity Cases	Frm	1.43	-	3.00	-1.43	-	3.00	-	-
SMS>	Specified Min. Roof Snow - Notional Right	Frm	7.16	-	14.99	-7.16	-	14.99	-	-
<SMS	Specified Min. Roof Snow - Notional Left	Frm	7.16	-	14.99	-7.16	-	14.99	-	-
US1*	Unbalanced Snow Load 1, Shifted Right	Frm	3.76	-	5.25	-3.76	-	9.82	-	-
*US1	Unbalanced Snow Load 1, Shifted Left	Frm	3.76	-	9.82	-3.76	-	5.25	-	-
W1>	Wind Load, Case 1, Right	Frm	-5.85	-	-9.64	0.79	-	-6.05	-	-
<W1	Wind Load, Case 1, Left	Frm	-0.79	-	-6.05	5.85	-	-9.64	-	-
W2>	Wind Load, Case 2, Right	Frm	-5.20	-	-5.66	0.14	-	-2.07	-	-
<W2	Wind Load, Case 2, Left	Frm	-0.14	-	-2.07	5.20	-	-5.66	-	-
WPL	Wind Load, || Ridge, Left	Frm	-1.64	-	-6.98	1.49	-	-8.71	-	-
WPR	Wind Load, || Ridge, Right	Frm	-1.49	-	-8.71	1.64	-	-6.98	-	-
MW	Minimum Wind Load - Wall: 1	Frm	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 2	Frm	1.86	-	1.23	4.90	-	-1.23	-	-
MW	Minimum Wind Load - Wall: 3	Frm	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 4	Frm	-4.90	-	-1.23	-1.86	-	1.23	-	-
CU	Collateral Load for Wind Cases	Frm	-	-	-	-	-	-	-	-
S	Snow Load	Frm	4.51	-	9.44	-4.51	-	9.44	-	-
E>	Seismic Load, Right	Frm	-1.91	-	-1.24	-1.91	-	1.24	-	-
EG+	Vertical Seismic Effect, Additive	Frm	0.56	-	1.18	-0.56	-	1.18	-	-
<E	Seismic Load, Left	Frm	1.91	-	1.24	1.91	-	-1.24	-	-
EG-	Vertical Seismic Effect, Subtractive	Frm	-0.56	-	-1.18	0.56	-	-1.18	-	-
WB1>	Wind Brace Reaction, Case 1, Right	Brc	0.09	-4.27	-3.54	-0.09	-3.76	-3.15	-	-
<WB1	Wind Brace Reaction, Case 1, Left	Brc	-0.08	-	3.57	0.08	-	3.13	-	-
WB2>	Wind Brace Reaction, Case 2, Right	Brc	0.09	-4.27	-3.54	-0.09	-3.76	-3.15	-	-
<WB2	Wind Brace Reaction, Case 2, Left	Brc	-0.08	-	3.57	0.08	-	3.13	-	-
WB3>	Wind Brace Reaction, Case 3, Right	Brc	0.10	-3.98	-3.29	-0.10	-4.06	-3.40	-	-
<WB3	Wind Brace Reaction, Case 3, Left	Brc	-0.08	-	3.31	0.08	-	3.38	-	-
WB4>	Wind Brace Reaction, Case 4, Right	Brc	0.10	-3.98	-3.29	-0.10	-4.06	-3.40	-	-
<WB4	Wind Brace Reaction, Case 4, Left	Brc	-0.08	-	3.31	0.08	-	3.38	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 1	Brc	0.11	-4.96	-4.11	-0.11	-4.68	-3.93	-	-

04/24/2023 LARN Reviewed

MWB	Minimum Wind Bracing Reaction - Wall: 2	Brc	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 3	Brc	-0.10	-	4.14	0.10	-	3.90	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 4	Brc	-	-	-	-	-	-	-	-
EB>	Seismic Brace Reaction, Right	Brc	0.19	-7.89	-6.53	-0.19	-7.93	-6.66	-	-
<EB	Seismic Brace Reaction, Left	Brc	-0.16	-	6.57	0.16	-	6.61	-	-
SMS	Specified Min. Roof Snow	Frm	7.16	-	14.99	-7.16	-	14.99	-	-

Maximum Combined Reactions Summary with Factored Loads - Framing

Note: All reactions are based on 1st order structural analysis.
Appropriate Load Factors must be applied for design of foundations.

X-Loc	Grid	Hrz left (-Hx) (k)	Load Case	Hrz Right (Hx) (k)	Load Case	Hrz In (-Hz) (k)	Load Case	Hrz Out (Hz) (k)	Load Case	Uplift (-Vy) (k)	Load Case	Vrt Down (Vy) (k)	Load Case	Mom cw (-Mzz) (in-k)	Load Case	Mom ccw (Mzz) (in-k)	Load Case
0/0/0	3-D	2.95	15	9.53	1	7.18	67	-	-	5.93	40	20.35	1	-	-	-	-
58/6/0	3-A	9.53	1	2.95	16	7.22	67	-	-	5.85	58	20.35	1	-	-	-	-

Maximum Frame Reactions - Factored Load Cases at Frame Cross Section: 3

Note: All reactions are based on 1st order structural analysis.

X-Loc		0/0/0			58/6/0					
Grid1 - Grid2		3-D			3-A					
Ld	Description	Hx	Hz	Vy	Hx	Hz	Vy			
Cs	(application factor not shown)	(k)	(k)	(k)	(k)	(k)	(k)			
1	D + CG + SMS>	9.53	-	20.35	-9.53	-	20.35	-	-	-
15	D + CU + W1>	-2.95	-	-4.36	-0.09	-	-2.21	-	-	-
16	D + CU + <W1	0.09	-	-2.21	2.95	-	-4.36	-	-	-
40	D + CU + WPR + WB1>	-0.28	-2.56	-5.93	0.36	-2.26	-4.66	-	-	-
58	D + CU + WPL + WB4>	-0.36	-2.39	-4.74	0.27	-2.43	-5.85	-	-	-
67	D + CG + E> + EG+ + EB>	2.41	-7.18	-0.09	-3.46	-7.22	0.47	-	-	-

ASD Load Combinations - Framing

No.	Origin	Factor	Application	Description
1	System	1.000	1.0 D + 1.0 CG + 1.0 SMS>	D + CG + SMS>
15	System	1.000	0.6 D + 0.6 CU + 0.6 W1>	D + CU + W1>
16	System	1.000	0.6 D + 0.6 CU + 0.6 <W1	D + CU + <W1
40	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPR + 0.6 WB1>	D + CU + WPR + WB1>
58	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPL + 0.6 WB4>	D + CU + WPL + WB4>
67	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 EB>	D + CG + E> + EG+ + EB>

Bracing

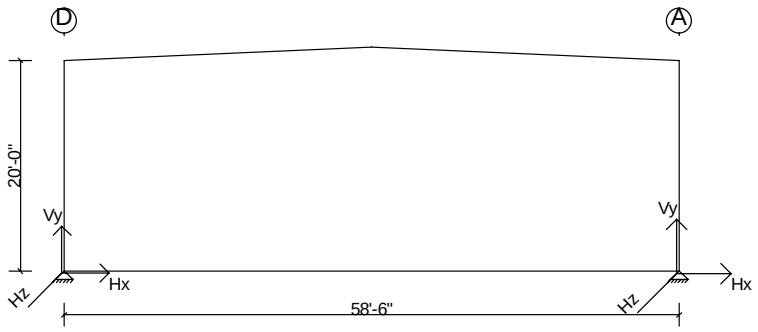
X-Loc	Grid	Description
0/0/0	3-D	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.
58/6/0	3-A	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.

04/24/2023 LARN Reviewed

Wall: 4, Frame at: 63/0/0

Frame ID:Rigid Frame

Frame Type:Rigid Frame



Values shown are resisting forces of the foundation.
Base Connection Design is Based on 3000.00 (psi) Concrete

Reactions - Unfactored Load Type at Frame Cross Section: 4

Type			Exterior Column			Exterior Column				
X-Loc			0/0/0			58/6/0				
Grid1 - Grid2			4-D			4-A				
Base Plate W x L (in.)			8 X 13			8 X 13				
Base Plate Thickness (in.)			0.375			0.375				
Anchor Rod Qty/Diam. (in.)			4 - 0.750			4 - 0.750				
Column Base Elev.			100'-0"			100'-0"				
Load Type	Load Description	Desc.	Hx	Hz	Vy	Hx	Hz	Vy		
D	Material Dead Weight	Frm	1.05	-	2.55	-1.05	-	2.55	-	-
CG	Collateral Load for Gravity Cases	Frm	1.64	-	3.29	-1.64	-	3.29	-	-
SMS>	Specified Min. Roof Snow - Notional Right	Frm	8.22	-	16.45	-8.22	-	16.45	-	-
<SMS	Specified Min. Roof Snow - Notional Left	Frm	8.22	-	16.45	-8.22	-	16.45	-	-
US1*	Unbalanced Snow Load 1, Shifted Right	Frm	4.31	-	5.76	-4.31	-	10.78	-	-
*US1	Unbalanced Snow Load 1, Shifted Left	Frm	4.31	-	10.78	-4.31	-	5.76	-	-
W1>	Wind Load, Case 1, Right	Frm	-6.99	-	-11.12	1.10	-	-6.89	-	-
<W1	Wind Load, Case 1, Left	Frm	-1.10	-	-6.89	6.99	-	-11.12	-	-
W2>	Wind Load, Case 2, Right	Frm	-6.19	-	-6.75	0.30	-	-2.53	-	-
<W2	Wind Load, Case 2, Left	Frm	-0.30	-	-2.53	6.19	-	-6.75	-	-
WPL	Wind Load, || Ridge, Left	Frm	-2.15	-	-7.97	1.98	-	-10.04	-	-
WPR	Wind Load, || Ridge, Right	Frm	-1.98	-	-10.04	2.15	-	-7.97	-	-
MW	Minimum Wind Load - Wall: 1	Frm	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 2	Frm	2.03	-	1.35	5.39	-	-1.35	-	-
MW	Minimum Wind Load - Wall: 3	Frm	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 4	Frm	-5.39	-	-1.35	-2.03	-	1.35	-	-
CU	Collateral Load for Wind Cases	Frm	-	-	-	-	-	-	-	-
S	Snow Load	Frm	5.18	-	10.37	-5.18	-	10.37	-	-
E>	Seismic Load, Right	Frm	-2.09	-	-1.37	-2.09	-	1.37	-	-
EG+	Vertical Seismic Effect, Additive	Frm	0.65	-	1.30	-0.65	-	1.30	-	-
<E	Seismic Load, Left	Frm	2.09	-	1.37	2.09	-	-1.37	-	-
EG-	Vertical Seismic Effect, Subtractive	Frm	-0.65	-	-1.30	0.65	-	-1.30	-	-
WB1>	Wind Brace Reaction, Case 1, Right	Brc	-0.08	-	3.57	0.08	-	3.13	-	-
<WB1	Wind Brace Reaction, Case 1, Left	Brc	0.10	4.27	-3.59	-0.10	3.76	-3.11	-	-
WB2>	Wind Brace Reaction, Case 2, Right	Brc	-0.08	-	3.57	0.08	-	3.13	-	-
<WB2	Wind Brace Reaction, Case 2, Left	Brc	0.10	4.27	-3.59	-0.10	3.76	-3.11	-	-
WB3>	Wind Brace Reaction, Case 3, Right	Brc	-0.08	-	3.31	0.08	-	3.38	-	-
<WB3	Wind Brace Reaction, Case 3, Left	Brc	0.09	3.98	-3.34	-0.09	4.06	-3.36	-	-
WB4>	Wind Brace Reaction, Case 4, Right	Brc	-0.08	-	3.31	0.08	-	3.38	-	-
<WB4	Wind Brace Reaction, Case 4, Left	Brc	0.09	3.98	-3.34	-0.09	4.06	-3.36	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 1	Brc	-0.10	-	4.14	0.10	-	3.90	-	-

04/24/2023 LARN Reviewed

MWB	Minimum Wind Bracing Reaction - Wall: 2	Brc	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 3	Brc	0.11	4.96	-4.17	-0.11	4.68	-3.87	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 4	Brc	-	-	-	-	-	-	-	-
EB>	Seismic Brace Reaction, Right	Brc	-0.16	-	6.57	0.16	-	6.61	-	-
<EB	Seismic Brace Reaction, Left	Brc	0.18	7.89	-6.62	-0.18	7.93	-6.57	-	-
SMS	Specified Min. Roof Snow	Frm	8.22	-	16.45	-8.22	-	16.45	-	-

Maximum Combined Reactions Summary with Factored Loads - Framing

Note: All reactions are based on 1st order structural analysis.
Appropriate Load Factors must be applied for design of foundations.

X-Loc	Grid	Hrz left (-Hx) (k)	Load Case	Hrz Right (Hx) (k)	Load Case	Hrz In (-Hz) (k)	Load Case	Hrz Out (Hz) (k)	Load Case	Uplift (-Vy) (k)	Load Case	Vrt Down (Vy) (k)	Load Case	Mom cw (-Mzz) (in-k)	Load Case	Mom ccw (Mzz) (in-k)	Load Case
0/0/0	4-D	3.57	15	10.91	1	-	-	7.18	77	6.64	43	22.30	1	-	-	-	-
58/6/0	4-A	10.91	1	3.57	16	-	-	7.22	77	6.51	61	22.30	1	-	-	-	-

Maximum Frame Reactions - Factored Load Cases at Frame Cross Section: 4

Note: All reactions are based on 1st order structural analysis.

X-Loc		0/0/0			58/6/0					
Grid1 - Grid2		4-D			4-A					
Ld	Description	Hx	Hz	Vy	Hx	Hz	Vy			
Cs	(application factor not shown)	(k)	(k)	(k)	(k)	(k)	(k)			
1	D + CG + SMS>	10.91	-	22.30	-10.91	-	22.30	-	-	-
15	D + CU + W1>	-3.57	-	-5.14	0.03	-	-2.60	-	-	-
16	D + CU + <W1	-0.03	-	-2.60	3.57	-	-5.14	-	-	-
43	D + CU + WPR + <WB1	-0.50	2.56	-6.64	0.61	2.26	-5.12	-	-	-
61	D + CU + WPL + <WB4	-0.61	2.39	-5.26	0.50	2.43	-6.51	-	-	-
77	D + CG + E> + EG+ + <EB	2.74	7.18	0.35	-3.88	7.22	1.15	-	-	-

ASD Load Combinations - Framing

No.	Origin	Factor	Application	Description
1	System	1.000	1.0 D + 1.0 CG + 1.0 SMS>	D + CG + SMS>
15	System	1.000	0.6 D + 0.6 CU + 0.6 W1>	D + CU + W1>
16	System	1.000	0.6 D + 0.6 CU + 0.6 <W1	D + CU + <W1
43	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPR + 0.6 <WB1	D + CU + WPR + <WB1
61	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPL + 0.6 <WB4	D + CU + WPL + <WB4
77	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 <EB	D + CG + E> + EG+ + <EB

Bracing

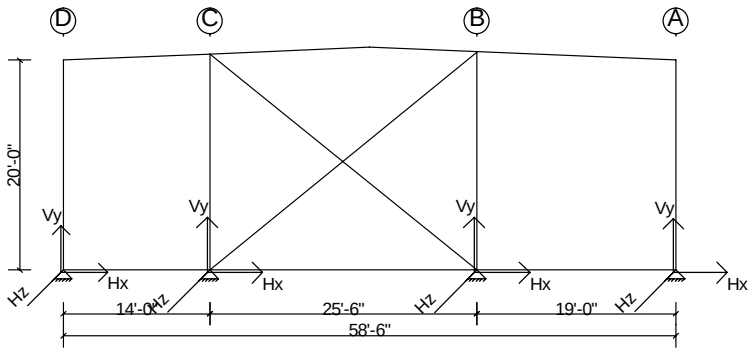
X-Loc	Grid	Description
0/0/0	4-D	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.
58/6/0	4-A	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.

04/24/2023 LARN Reviewed

Wall: 4, Frame at: 84/0/0

Frame ID:Post & Beam

Frame Type:Post & Beam



Values shown are resisting forces of the foundation.
Base Connection Design is Based on 3000.00 (psi) Concrete

Reactions - Unfactored Load Type at Frame Cross Section: 5

Type			Exterior Column		Interior Column			Interior Column			Exterior Column		
X-Loc			0/0/0		14/0/0			39/6/0			58/6/0		
Grid1 - Grid2			5-D		5-C			5-B			5-A		
Base Plate W x L (in.)			8 X 11		8 X 11			8 X 11			8 X 11		
Base Plate Thickness (in.)			0.375		0.375			0.375			0.375		
Anchor Rod Qty/Diam. (in.)			4 - 0.750		4 - 0.750			4 - 0.750			4 - 0.750		
Column Base Elev.			100'-0"		100'-0"			100'-0"			100'-0"		
Load Type	Load Description	Desc.	Hx	Vy	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Hz	Vy
D	Material Dead Weight	Frm	-	0.32	-	-	1.00	-	-	1.14	-	-	0.43
CG	Collateral Load for Gravity Cases	Frm	-	0.24	-	-	1.28	-	-	1.43	-	-	0.42
L>	Live - Notional Right	Frm	-	1.03	-	-	4.82	-	-	5.43	-	-	1.69
<L	Live - Notional Left	Frm	-	1.03	-	-	4.82	-	-	5.43	-	-	1.69
ASL^	Alternate Span Live Load, Shifted Right	Frm	-	-0.69	-	-	3.45	-	-	3.07	-	-	-0.42
^ASL	Alternate Span Live Load, Shifted Left	Frm	-	1.72	-	-	1.38	-	-	2.36	-	-	2.10
SMS>	Specified Min. Roof Snow - Notional Right	Frm	-	1.22	-	-	6.40	-	-	7.15	-	-	2.08
<SMS	Specified Min. Roof Snow - Notional Left	Frm	-	1.22	-	-	6.40	-	-	7.15	-	-	2.08
US1*	Unbalanced Snow Load 1, Shifted Right	Frm	-	0.15	-	-	1.48	-	-	5.24	-	-	1.60
*US1	Unbalanced Snow Load 1, Shifted Left	Frm	-	0.76	-	-	5.23	-	-	2.28	-	-	0.21
W1>	Wind Load, Case 1, Right	Frm	-0.77	-1.05	-	3.07	-5.36	-	3.50	-4.03	-1.16	-	-0.98
<W1	Wind Load, Case 1, Left	Frm	1.16	-0.61	-	-3.07	-3.32	-	-3.50	-5.65	0.77	-	-1.85
W2>	Wind Load, Case 2, Right	Frm	-1.49	-0.69	-	-	-3.69	-	-	-2.18	-0.44	-	-0.40
<W2	Wind Load, Case 2, Left	Frm	0.44	-0.25	-	-	-1.65	-	-	-3.80	1.49	-	-1.26
WPL	Wind Load, || Ridge, Left	Frm	1.31	-0.63	-	-	-3.26	-	-	-5.58	-1.32	0.85	-1.95
WPR	Wind Load, || Ridge, Right	Frm	1.31	-1.15	-	-	-5.32	-	-	-3.96	-1.31	-0.85	-1.00
MW	Minimum Wind Load - Wall: 1	Frm	-	-	-	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 2	Frm	-	0.01	-	-	-0.05	-	-	-0.05	1.74	-	0.09
MW	Minimum Wind Load - Wall: 3	Frm	-	-	-	-	-	-	-	-	-	-	-
MW	Minimum Wind Load - Wall: 4	Frm	-1.74	0.09	-	-	-0.04	-	-	-0.06	-	-	0.01
CU	Collateral Load for Wind Cases	Frm	-	-	-	-	-	-	-	-	-	-	-
L	Roof Live Load	Frm	-	1.03	-	-	4.82	-	-	5.43	-	-	1.69
S	Snow Load	Frm	-	0.77	-	-	4.03	-	-	4.50	-	-	1.31
E>	Seismic Load, Right	Frm	-0.06	-	-	0.10	-	-	0.11	-	-0.06	-	-
EG+	Vertical Seismic Effect, Additive	Frm	-	0.10	-	-	0.50	-	-	0.56	-	-	0.16
<E	Seismic Load, Left	Frm	0.06	-	-	-0.10	-	-	-0.11	-	0.06	-	-
EG-	Vertical Seismic Effect, Subtractive	Frm	-	-0.10	-	-	-0.50	-	-	-0.56	-	-	-0.16
WB1>	Wind Brace Reaction, Case 1, Right	Brc	-	-	1.97	-	-1.59	-	-	1.59	-	-	-
<WB1	Wind Brace Reaction, Case 1, Left	Brc	-	-	-	-	1.57	-1.97	-	-1.57	-	-	-
WB2>	Wind Brace Reaction, Case 2, Right	Brc	-	-	1.97	-	-1.59	-	-	1.59	-	-	-
<WB2	Wind Brace Reaction, Case 2, Left	Brc	-	-	-	-	1.57	-1.97	-	-1.57	-	-	-

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WB3>	Wind Brace Reaction, Case 3, Right	Brc	-	-	1.97	-	-1.59	-	-	1.59	-	-	-
<WB3	Wind Brace Reaction, Case 3, Left	Brc	-	-	-	-	1.57	-1.97	-	-1.57	-	-	-
WB4>	Wind Brace Reaction, Case 4, Right	Brc	-	-	1.97	-	-1.59	-	-	1.59	-	-	-
<WB4	Wind Brace Reaction, Case 4, Left	Brc	-	-	-	-	1.57	-1.97	-	-1.57	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 1	Brc	-	-	-	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 2	Brc	-	-	-	-	1.50	-1.88	-	-1.50	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 3	Brc	-	-	-	-	-	-	-	-	-	-	-
MWB	Minimum Wind Bracing Reaction - Wall: 4	Brc	-	-	1.88	-	-1.52	-	-	1.52	-	-	-
EB>	Seismic Brace Reaction, Right	Brc	-	-	2.10	-	-1.69	-	-	1.69	-	-	-
<EB	Seismic Brace Reaction, Left	Brc	-	-	-	-	1.67	-2.10	-	-1.67	-	-	-
SMS	Specified Min. Roof Snow	Frm	-	1.22	-	-	6.40	-	-	7.15	-	-	2.08

Maximum Combined Reactions Summary with Factored Loads - Framing
Note: All reactions are based on 1st order structural analysis.
Appropriate Load Factors must be applied for design of foundations.

X-Loc	Grid	Hrz left (-Hx) (k)	Load Case	Hrz Right (Hx) (k)	Load Case	Hrz In (-Hz) (k)	Load Case	Hrz Out (Hz) (k)	Load Case	Uplift (-Vy) (k)	Load Case	Vrt Down (Vy) (k)	Load Case	Mom cw (-Mzz) (in-k)	Load Case	Mom ccw (Mzz) (in-k)	Load Case
0/0/0	5-D	1.05	25	0.79	20	-	-	-	-	0.50	31	2.29	4	-	-	-	-
14/0/0	5-C	-	-	1.89	92	1.84	17	1.84	16	3.54	57	8.68	7	-	-	-	-
39/6/0	5-B	1.89	102	-	-	2.10	17	2.10	16	3.61	77	9.72	7	-	-	-	-
58/6/0	5-A	0.79	20	1.05	23	0.51	21	0.51	20	0.91	30	2.95	4	-	-	-	-

Maximum Frame Reactions - Factored Load Cases at Frame Cross Section: 5
Note: All reactions are based on 1st order structural analysis.

X-Loc		0/0/0		14/0/0			39/6/0			58/6/0			
Grid1 - Grid2		5-D		5-C			5-B			5-A			
Ld	Description	Hx	Vy	Hx	Hz	Vy	Hx	Hz	Vy	Hx	Hz	Vy	
Cs	(application factor not shown)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	(k)	
4	D + CG + ^ASL	-	2.29	-	-	3.66	-	-	4.93	-	-	2.95	-
7	D + CG + SMS>	-	1.78	-	-	8.68	-	-	9.72	-	-	2.93	-
16	D + CG + W1>	-0.46	-0.06	-	1.84	-0.93	-	2.10	0.15	-0.70	-	0.26	-
17	D + CG + <W1	0.70	0.20	-	-1.84	0.29	-	-2.10	-0.82	0.46	-	-0.26	-
20	D + CG + WPL	0.79	0.18	-	-	0.33	-	-	-0.78	-0.79	0.51	-0.32	-
21	D + CG + WPR	0.79	-0.12	-	-	-0.91	-	-	0.19	-0.78	-0.51	0.25	-
23	MW - Wall: 2	-	0.01	-	-	-0.03	-	-	-0.03	1.05	-	0.05	-
25	MW - Wall: 4	-1.05	0.05	-	-	-0.02	-	-	-0.04	-	-	0.01	-
30	D + CU + WPL	0.79	-0.19	-	-	-1.35	-	-	-2.67	-0.79	0.51	-0.91	-
31	D + CU + WPR	0.79	-0.50	-	-	-2.59	-	-	-1.69	-0.78	-0.51	-0.34	-
57	D + CU + WPR + WB1>	0.79	-0.50	1.17	0.01	-3.54	-	-	-0.74	-0.78	-0.51	-0.34	-
77	D + CU + WPL + <WB3	0.79	-0.19	-	-	-0.41	-1.17	-0.01	-3.61	-0.79	0.51	-0.91	-
92	D + CG + E> + EG+ + EB>	-0.02	0.63	1.89	0.04	1.10	-	0.03	4.50	-0.02	-	0.97	-
102	D + CG + E> + EG+ + <EB	-0.02	0.63	-	0.03	4.16	-1.89	0.01	1.44	-0.02	-	0.97	-

ASD Load Combinations - Framing

No.	Origin	Factor	Application	Description
4	System	1.000	1.0 D + 1.0 CG + 1.0 ^ASL	D + CG + ^ASL
7	System	1.000	1.0 D + 1.0 CG + 1.0 SMS>	D + CG + SMS>
16	System	1.000	1.0 D + 1.0 CG + 0.6 W1>	D + CG + W1>
17	System	1.000	1.0 D + 1.0 CG + 0.6 <W1	D + CG + <W1
20	System	1.000	1.0 D + 1.0 CG + 0.6 WPL	D + CG + WPL
21	System	1.000	1.0 D + 1.0 CG + 0.6 WPR	D + CG + WPR
23	System	1.000	0.6 MW	MW - Wall: 2
25	System	1.000	0.6 MW	MW - Wall: 4
30	System	1.000	0.6 D + 0.6 CU + 0.6 WPL	D + CU + WPL
31	System	1.000	0.6 D + 0.6 CU + 0.6 WPR	D + CU + WPR
57	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPR + 0.6 WB1>	D + CU + WPR + WB1>
77	System Derived	1.000	0.6 D + 0.6 CU + 0.6 WPL + 0.6 <WB3	D + CU + WPL + <WB3
92	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 EB>	D + CG + E> + EG+ + EB>
102	System Derived	1.000	1.0 D + 1.0 CG + 0.273 E> + 0.7 EG+ + 0.91 <EB	D + CG + E> + EG+ + <EB

Bracing

X-Loc	Grid	Description
14/0/0	5-C	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.
39/6/0	5-B	Diagonal bracing at base is attached to column. Reactions ARE included with frame reactions.

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