City of Grandview's
Pole Building Engineering Checklist

(Please complete the entire form)

Building Width (ft): _____ Building Length (ft) _____ Eave Height _____

Snow Ground Load (psf): 30

Wind Speed (mph): 70

Wind Exposure: C

Seismic Zone: 2b

Soil Bearing Capacity (psf): 1500

Is there at least one wet stamped set of plans for this building?

Yes No

All permitted post frame buildings should be submitted with wet stamped plans.

Is there at least one wet stamped set of calculations for this building?

Yes No

All permitted post frame buildings should be submitted with wet stamped calcs.

Which engineering method was used for this building?

Simple Cantilevered Propped Cantilevered (Diaphragmed)

Will the building be constructed with a concrete floor slab?

Yes No

Slab Thickness (in): _____

Posthole Backfill?

Concrete Granular Compacted Sand

Simple Cantilevered (No Diaphragm)

Pole Building Engineering Checklist

Are the truss posts designed using combined bending and axial loading per NDS Section 3.9?

Yes_____ (Note: This is a UBC requirement)

Truss Post Size:____x_____ Species:_____ Grade:_____

Corner Post Size:___x_____ Species:_____ Grade:_____

Gable Wall Post Size:_____x_____ Species:_____ Grade:_____

Posts Constrained (UBC Eqn 6-2) / Posts Non – Constrained (UBC Eqn 6-2)

Calculated Posthole Depth:_____ Calculated Posthole Diameter:_____

Method of Constraint (leeward side): Nails / Rebar / Other ( ) / N/A

Girts: 2 x _____ @ _____" o.c. Flat / Commercial

Species/Grade: HEM-FIR / DOUG – FIR / #1 #2 SS

Purlins: 2 x _____ @ _____" o.c. Stacked / Joist Hung

Species/Grade: HEM-FIR / DOUG – FIR / #1 #2 SS

Corbel Block: 2 x _____

Corbel Bolts (Number/Size): _____ 5/8" / _____¾" / _____ _____

Propped Cantilevered (Diaphragmed)

Pole Building Engineering Checklist

Are the truss posts designed using combined bending and axial loading per NDS Section 3.9?

Yes_____ (Note: This is a UBC requirement.)

Has the deflection of the roof diaphragm been accounted for in the calculation?

Yes_____ (Note: This is a NFBA design manual requirement.)

Total Width of : Eave Wall Openings (ft):_____ Gable Wall Openings (ft):_____

Truss Post Size: _____x_____ Species: _____ Grade: _____

Corner Post Size: _____x_____ Species: _____ Grade: _____

Gable Wall Post Size: _____x_____ Species: _____ Grade: _____

Posts Constrained (UBC Eqn 6-2) or Posts Non – Constrained (UBC Eqn 6-2)

Calculated Posthole Depth: _____ Calculated Posthole Diameter: _____

Method of Constraint (leeward side): Nails / Rebar / Other ( ) / N/A

Diaphragm screw size _____ Spacing_____ Length_____

Diaphragm metal gauge_____

Maximum Roof Diaphragm Loading (calculated plf): _____ Allowable:_____

Maximum Gable Wall Diaphragm Loading (calculated plf): _____ Allowable: _____

Maximum Eave Wall Diaphragm Loading (calculated plf): _____ Allowable:_____

Girts: 2 x _____ @ _____" o.c. Flat or Commercial

Species/Grade: HEM – FIR / DOUG – FIR / #1 #2 SS

Purlins: 2 x _____ @ _____" o.c. Stacked or Joist Hung
Species/Grade: HEM – FIR / DOUG – FIR / #1 #2 SS

Corbel Block: 2 x_____

Corbel Bolts (Number / Size): _____5/8" / _____¾" / _____ _____