



**Western Wood Truss Association
(Saskatchewan, Manitoba, Northwest Ontario)
Member Design Guidelines**

Following are guidelines agreed upon by the members of WWTA, based on their collective experience, with the purpose of providing safe, high quality, cost effective trusses.

Recommendation

1. Ground Snow Load (GSL) (S_s) and rain load (S_r) values determined by map region. Maps developed by and for WWTA members in Manitoba, Saskatchewan, and Northwest Ontario. (Est Apr/94)
2. Top chord bearing trusses on edge (2x4) should use only Truss Plate Institute of Canada (TPIC) details 2, 6 & 7 (with a plate over the bearing). (Est Nov/96)
3. Supply drawings for site framed valleys, to prevent point loading on trusses. (Est Nov/96, Amended Feb/21)
4. Minimum chord sizes for single ply farm trusses, based on truss span. (Est Nov/96, Amended Feb/21)

Up to 44' span	Two 2x4 chords
Up to 48' span	One 2x4 and one 2x6 chord
Up to 64' span	Two 2x6 chords
Over 64' span	One 2x6 and one 2x8 chord
5. For farm buildings over 7500 square feet in size, and farm trusses over 60' clear span, use a wind exposure factor (C_w) of 1.0, even if exposed to wind. (Est Mar/97)
6. Maximum deflection for 4x2 open web floor trusses. (Est Nov/00)

Up to 20' span	Maximum live load deflection = L/360 up to 1/2"
Over 20' up to 30' span	Maximum live load deflection = L/480 up to 3/4"
Over 30' span	Maximum live load deflection = 3/4"

Align vertical webs to allow for continuous bridging.
7. It is recommended to use TPIC details 3, 6, 9 & 10 (with a plate over the bearing) (Table E.2 – Top Chord Bearing Joist Guidelines for Lumber on Flat). (Est Nov/08, Amended Nov/21)

8. All trusses for use in Canada must meet or exceed the minimum design requirements of the National Building Code of Canada (NBCC), or the National Farm Building Code of Canada (NFBCC). (Est Nov/09)
9. As per the NBCC (9.23.10.4) a truss manufacturer shall advise that either wall studs to be framed to U/S of a vaulted gable truss or walls shall be balloon framed to U/S of ladder or roof decking where vaulted trusses are adjacent to exterior walls. (Est Apr/17)
10. Any element supplied by other supporting a Part 4, member to flag size and location of load affecting any supporting member. Similar to TPIC Technical Bulletin #3. (Est Nov/18, Amended Feb/21)
11. If the Engineer of Record (EOR) has not specified Bottom Chord (BC) live load requirements, association member to follow NBCC live load minimums. (Est Apr/19)
12. New Saskatchewan GSL map with changes to NBCC2015 adopted by members. (Est Apr/19)