

Commentary-Dave Pasolli-Western Wood Truss Association of Alberta

Is a Reliable Source of Wood From British Columbia in Jeopardy?

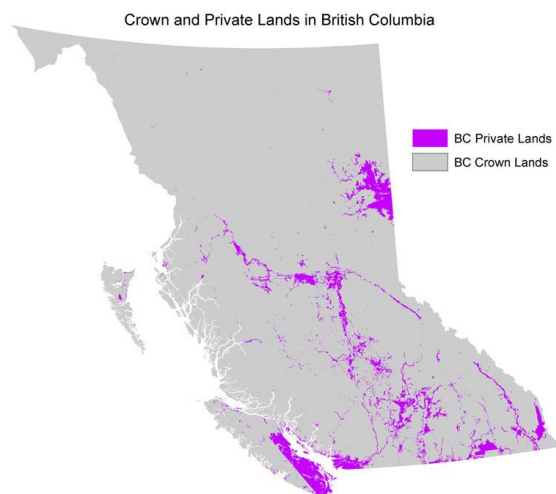
Industries like ours may have to prepare for a big shock if large chunks of Crown Land in B.C. are recognized as owned and controlled by Indigenous Nations.

Unlike the rest of Canada, the land claims situation in B.C. is unique since there were only a few claims actually addressed in the 1850's. For a variety of reasons, it was not until the early 1990s that First Nations, the province, and the federal government began a process to deal with treaties.

“Over the next generation, we're going to see a replacement of ownership of large parts of the province. It is going to be a big shock and a big change and a big adjustment for the system to get used to. There's going to be a different landlord — not for the entire province ... but fairly large chunks of it.” Says Jack Woodward, a lawyer who won the case that resulted in the first declaration of Aboriginal title in B.C. and who is taking another title case to court next year.

Woodward represents the Nuchatlahat First Nation which is asserting title over Nootka Island on the west of Vancouver Island that is headed for the B.C. Supreme Court in March 2022. The Nuchatlaht case is a direct application of the precedent-setting 2014 Tsilhqot'in decision, where the Supreme Court of Canada granted declaration of aboriginal title to more than 1,700 square kilometers of land in British Columbia to the First Nation. Nuchatlaht's case was also the first land title to be tested against the backdrop of United Nations Declaration on the Rights of Indigenous Peoples (UNDRIP) that B.C. passed as legislation – DRIPA/ Bill 41 – in 2019.

It is estimated that the title of up to 95% of Crown Land could be contested.



The SCC decision means the Tsilhqot'in-speaking Xeni Gwet'in First Nation “effectively own the land — they have the right and responsibility to manage and control how it is used,” is the response for the incoming B.C. minister should he be asked about the case. “Similar to private property, the Aboriginal title means the Nation owns the lands and resources in the declared title area” — i.e., the 1,700 square kilometers recognized by the court.”

So the province would no longer issues Tree Farm Licenses (TFL) if the title of the land is transferred from the Crown to the First Nation. Some of these TFL's were issued decades ago and could essentially be cancelled by the new title owner. Even if the transfer of title is not complete any current court ruling would no doubt contain a requirement of complete consultation with any indigenous groups.

While the province would like the transfer of title to go smoothly and encourages First Nations to buy out or work with tenure-holders to support fair market value, Woodward suggests that where Aboriginal title is recognized, a Crown tenure is “a worthless piece of paper.” The province will probably have to provide some sort of compensation for tenure-holders. The end result, says Woodward, will be local control by First Nations, as opposed to forestry and other tenures being held by multinational corporations.

It certainly appears that the current B.C. government would not oppose or launch appeals to these court decisions in their effort to support reconciliation efforts. As we saw in Alberta, NDP governments are not really all that concerned about the loss of revenue to the provincial coffers when they can simply pay their expenses by borrowing money.

As demonstrated recently in the decision to defer tree harvesting in the Fairy Creek area by the B.C. government the political climate is such that environmentalist have the upper hand when working with indigenous groups.

<https://www.theglobeandmail.com/canada/british-columbia/article-bc-defers-old-growth-logging-in-fairy-creek/>

Six sawmills in B.C. already closed in 2019 and map of North American sawmill closures and curtailments from 2019 shows that British Columbia has experienced a disproportionately high number of closures and curtailments compared with other states and provinces partly due to the government's political policies. If you follow the lumber companies that have typically worked in B.C. most of their announcements of new projects are not in the province.

Are forestry companies going to be too excited about dealing with the nearly 200 indigenous tribes in the province and are they willing to invest in the harvest of wood with such uncertainty? While I am sure that some First Nations would take the

opportunity to prosper, others would no doubt be influenced by outside sources and could be subject to fluctuations in internal policy with their own governance.

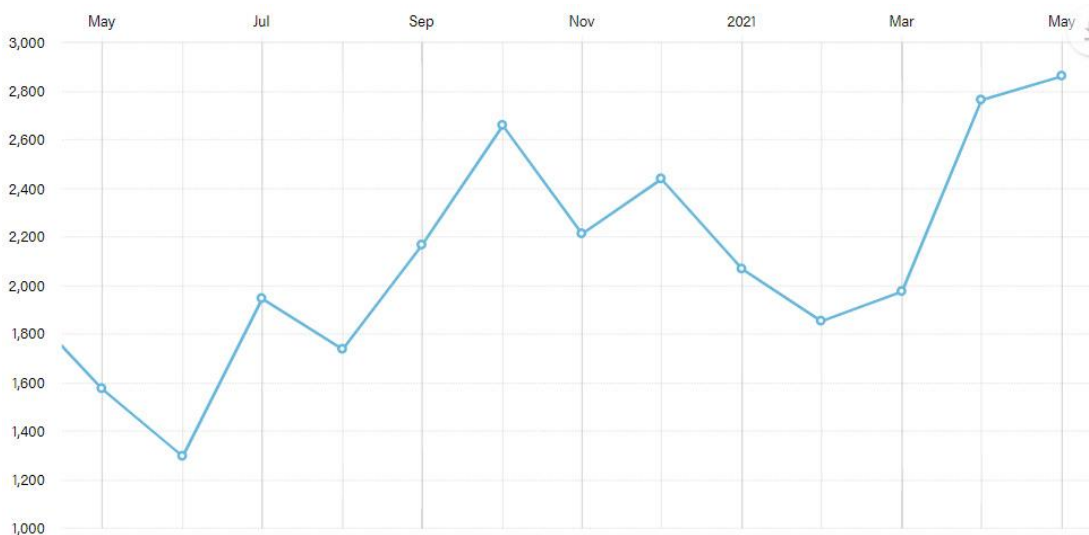
We have seen how quickly capital investment in the Alberta Oil Sands moved to other “friendlier” areas in the world when we elected a Socialist government in 2015 and how environmentalist groups have continued to exert pressure for them not to invest here.

As we have seen this year with lumber prices, the whole supply chain of wood can be very precarious and uncertainty only results in volatility.

If you have an idea for a commentary or would like to submit your own commentary for a future newsletter please let me know at dave@wwta.ab.ca

Economic Update

Housing starts in Alberta were up 82% compared to May 2020, not much of a surprise considering the state of affairs last May, but still a pretty solid number of 2859 starts for the month. A better comparison is that in May 2019 starts were 1798 and in 2018 starts were 2875. Total starts for the year are 11,513 up 34% from 2020.

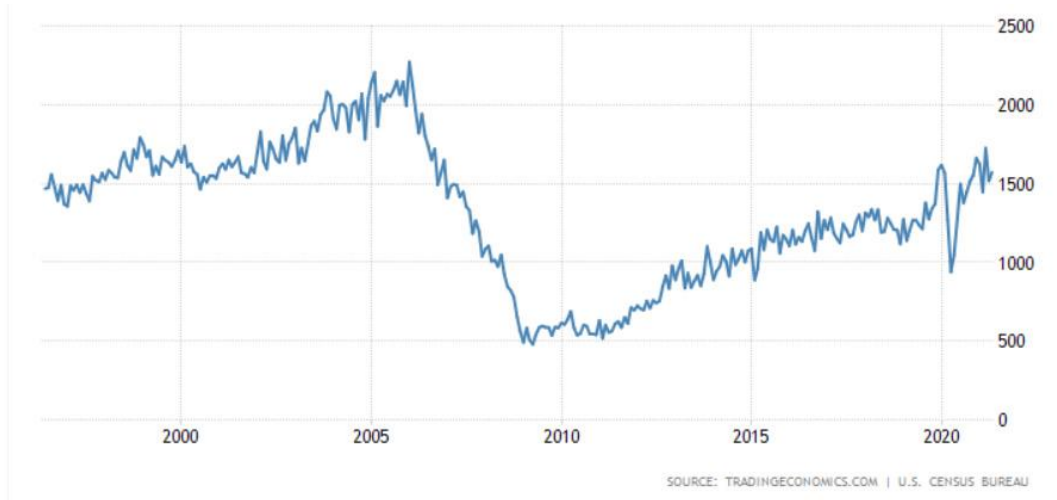


1 year housing starts in Alberta

In the past month lumber futures have dropped drastically as buyers outweigh suppliers hoping for lower prices ahead. Housing starts in the US continue to be strong as the summer building season begins and some projects have been delayed waiting for better pricing.

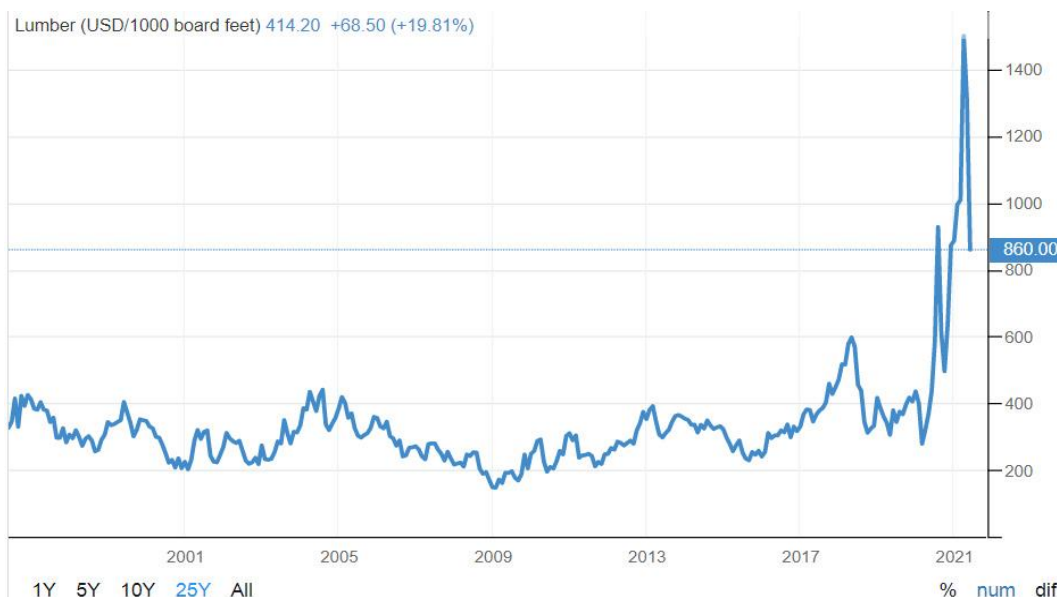
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While U.S. housing starts hit 1.57 million units in May (annualized) they are still a long way from the 2.4 million record that was hit in 2006 prior to the financial collapse.



25 year housing starts in the United States

It is interesting to compare the price of lumber over that same 25 years. During the housing peak in 2006 lumber was \$340 and after the financial crisis in 2009 it dipped below \$200. That is only a 79% difference in price compared to a 500% drop in demand.



25 year lumber pricing

The above 25 year graph of lumber prices show just how special a year 2021 was.

Quality Control

This month I would like to touch on a quality issue that may not be too understood and sometimes overlooked-**Slope of grain**.

Lumber is strongest when the grain is straight and runs parallel to the length of the board, and this is especially important in determining the grip value of connector plates. The more it deviates from parallel, the weaker it becomes.

Sloping of grain can sometimes be tricky to detect by eye, because the growth rings often run down the length of the board and make you think that the grain is doing the same thing. But remember the growth rings are the alternation of early wood and late wood, and they form different patterns on the face of a board depending on the way it's been cut from the log. The grain, on the other hand is the direction of the wood fibres, and it may or may not run in line with the growth rings.

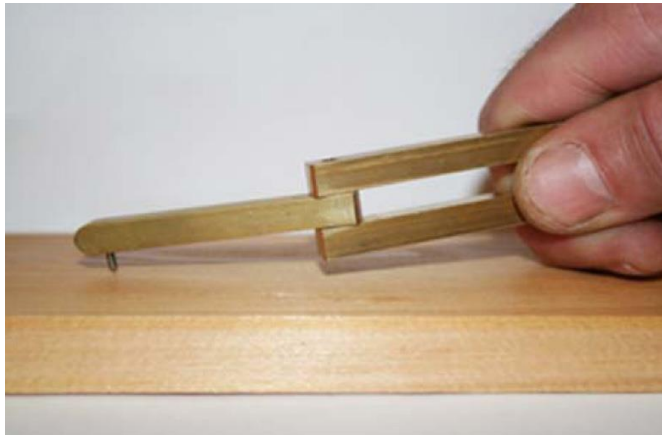


Measuring slope of grain

If you are in doubt about what the grain is doing in a particular area of the board, you can find out using one of the following methods:

1. **Look for surface checks**- these always follow the grain, because they're caused by the fibres pulling away from each other as the timber dries.

2. **Split a small portion of wood off the board**, or pry a sliver away from the surface-again, you will be separating the fibres, so you will know exactly where the grain is going.
3. **Use a scribe**- this is also called a “sloping grain detector”, and it is basically a gramophone needle on the end of a rod that tracks along the grain as you pull the detector down the board. Probably not something that you would have handy, but it could become part of your Q.C. toolbox.

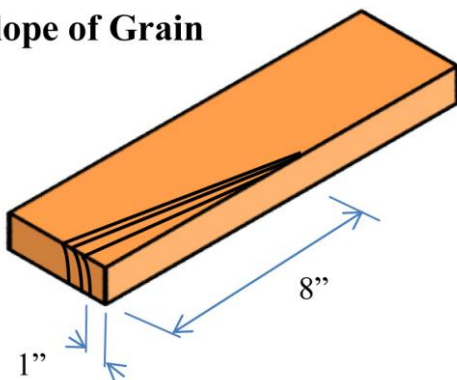


Scribe for slope of grain

Measuring slope of grain

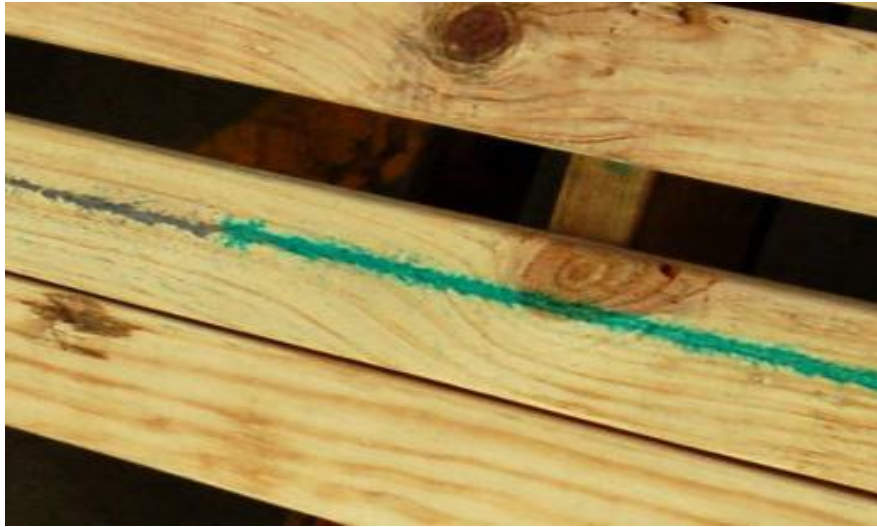
The slope of grain is expressed as a ration of the rise to run similar to roof slope. For example if the grain rises 1 inch over a run of 8 inches, the slope of grain is 1 in 8. 1 in 8 is the maximum allowed in #2 lumber and the maximum that we allow in trusses. The higher the second number the better.

Slope of Grain



Slope of grain maximum 1 in 8

It is common for grain to deviate around knots. As long as this is limited to local deviation, it doesn't need to be separately assessed because the knot rules make allowance for it.



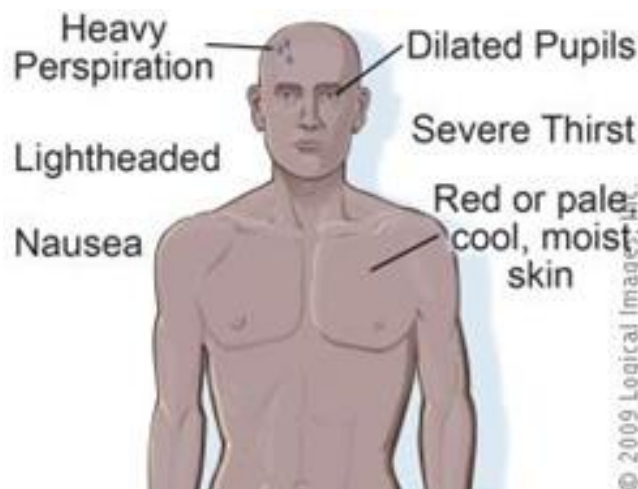
Grain deviating around a localized knot

If you have any suggestions for ideas that you would like to see on quality control in the newsletter, please drop me an e-mail.

Health and Safety Toolbox

Similarly to the Quality topic the WWTA would like to give you a monthly item you can discuss when doing your Safety Toolbox meeting. As it appears that our 6th winter for the year is over and warm weather happens once in a while, this month's topic will be **working in the heat**.

It is important the workers and employers review the hazards of working in heat and be able to recognize the symptoms of heat stroke.



What are the warning signs of heat stroke?

In a very hot environment, the most serious health and safety concern is heat stroke. Heat stroke can be fatal if medical attention is not available immediately. Heat exhaustion and fainting (syncope) are also types of heat related illnesses which are not fatal but can interfere with a person's ability to work.

The victims of heat stroke are unable to notice the symptoms when they are happening to themselves, and therefore, their survival depends on co-workers' ability to identify symptoms in others, and to get medical help.

While symptoms can vary from person to person, the warning signs of heat stroke can include complaints of sudden and severe fatigue, nausea, dizziness, lightheadedness, and may or may not include sweating. If a co-worker appears to be disorientated or confused (including euphoria), or has unaccountable irritability, malaise or flu-like symptoms, the worker should be moved to a cool location and get medical help immediately.

What should be done when it is very hot?

Employers have a duty to take every reasonable precaution to ensure the workplace is safe for the worker. This duty includes taking effective measures to protect workers from heat stress disorders if it is not reasonably practicable to control indoor conditions adequately, or where work is done outdoors.

Certain steps can be taken to reduce discomfort. These include:

- using fans or air conditioning
- wearing light, loose fitting clothing
- taking more frequent rest breaks
- drinking cold beverages (ones that do not have caffeine or alcohol)
- allowing flexibility to permit less physically demanding activities during peak temperature periods.
- using screens or umbrellas to create shade.

OHS Alberta has a very extensive publication on working in heat and cold and it can be viewed and downloaded at:

<https://ohs-pubstore.labour.alberta.ca/gs006>

The Alberta Government has a new format OHS eNews you can subscribe to with all kinds of good material at: <https://ohs-pubstore.labour.alberta.ca/>

News and Events

Truss Plate Institute of Canada.

The TPIC meets twice annually and your representative at the meeting is currently David Klassen, P.Eng from Star Building Materials in Calgary. Their most recent meeting was in May we would like to give you an idea of what they are working on below.

The information is for informational purposes only and should not be construed as professional advice or opinion. The writer has made reasonable efforts to ensure that the information provided is accurate at the time of writing. The content is provided "as is" and the writer makes no representations, warranties (express or implied), guarantees or assurances of any kind as to the accuracy, currency or completeness of the information provided. Use of the content is at your own risk.

CSA O86-24 (reported by TPIC rep on CSA committees)

- Planning to introduce new provisions for I-Joist diaphragms.
- New vibration criteria in annex continues to be a concern as there is no provision for strong backs. Will run test designs and request exclusion if impact is too severe.
- Task group created to review US lumber equivalencies to provide alternate species / grade options.
- Task group created to review connections of built up posts, hope to incorporate shorter nails

Task Groups

There are many task groups formed for different issues that are continued to be worked on including:

- Group Tear-out
 - Work in progress, no update to report.
- Moment Splices
 - Work in progress, no update to report.
- Web Bracing
 - Reviewing US calculations for buckling, plan to complete by fall of 2023 for TPIC 2024.
- Non-Structural Members
 - Discussed research to date and decided to retire this task group.
- Vibration
 - Work in progress, no update to report.
- Appendix C & (6.7.4.2(3)) - BOLTED LAMINATIONS
 - Work in progress, no update to report.
- Canadian National Master Specs
 - No activity from NRC to report.
- Website
 - Uploading approved documents.

- Technical Bulletins
 - Reviewing content to ensure relevancy and current code references.
- Plating Sliders to eliminate CLB
 - Final review underway for approval.
- TPIC 2014 Manual translation
 - Awaiting final approval.
- TPIC 2019 Manual translation
 - Work in progress.
- Compression perp to grain at joints
 - Work in progress, no update to report.
- Bottom chord bracing with drywall
 - Work in progress, no update to report.
- HDG of truss after manufacturing
 - Work in progress, no update to report.
- Plate in Breeze
 - Discussed research findings from testing and ANS-TPI.
 - 3 square inches seems to be the limit before joint loses ultimate capacity in testing.
 - Formula seems conservative for floor truss design so will modify if possible.
 - Working towards incorporating into TPIC 2024.
- Design responsibilities
 - Reviewed information gathered from several sources.
 - When draft completed will request CSA O86 technical committee to review.
 - Will incorporate in TPIC manual.
- Truss design drawings for website
 - Work in progress, no update to report.
- Bracing Party walls in the attic space
 - Reviewed several bracing details for party wall gables and discussed design considerations to eliminate bracing requirements.
 - Becoming a common question for sealing engineers.
 - Task group created to develop a Technical bulletin.
- Commentary for TPIC Manual
 - Work in progress, no update to report.
- Design considerations of long cantilevers
 - Task group is working on a technical bulletin to address:
 - Bracing.
 - Wind for Part 9.
 - Load conditions.
- Connection details
 - Minimum chord size for nailing of open jacks to top chord.
 - Task group working on a nailing chart based on chord size and roof slope.
- Review ANSI/TPI 3
 - Bracing of top chords under piggyback trusses.
 - Task group reviewing details to make recommendations.
- Leg Down Extensions

- Created a task group to develop a technical bulletin.

You can see that they are very busy and on behalf of the WWTA I would like to thank David for his commitment to represent your association at TPIC.

If you have any questions or input about the items above please send me an e-mail and we will pass your comments on to the group.

The link to the TPIC website is: www.tpik.ca

You should all be aware of the technical bulletins and clarification letters that can be found on the website.

Virtual Meetings

One day we will get back to meeting in a room I hope, but in the meantime if you have any topics you would like the WWTA to hold a virtual meeting on please let me know.

WWTA Online Training

If you have not yet taken a look at the WWTA online training program I would encourage you to, as no doubt you will be hiring new workers in the near future and it is a good method to get them productive earlier and safer. If you want an overview of the program go to the WWTA website at: <http://www.wwta.ab.ca/truss-training-online.html>

Did You Know?

The Western Wood Truss Association was fortunate enough to be invited to a presentation hosted by Alberta Labour and Immigration June 3, 2021.

During the session, Dr. Deena Hinshaw, Alberta's Chief Medical Officer of Health, and Trish Merrithew-Mercredi, Assistant Deputy Minister, Public Health and Compliance Division, Alberta Health, provided an overview of Alberta's vaccination approach, program goals, and roll out. The aim is to ensure as leaders in workplace health and safety have the most up-to-date information and understanding of the overall priorities and processes for vaccination of Albertans and are able to share that with your membership.

An edited video of the presentation can be seen on the WWTA website at:

<http://www.wwta.ab.ca/health-and-safety.html>