



Advanced Wood Product Manufacturing Study for Cross-Laminated Timber Acceleration in Oregon & SW Washington, 2017

<https://research.thinkwood.com/en/permalink/catalogue715>

Organization: Oregon BEST
Year of Publication: 2017
Country of Publication: United States
Resource Type: Report
Material: CLT (Cross-Laminated Timber)
Application: General Application
Topic: Market and Adoption
Keywords: Market
US
Economic Impact
Language: English
Online Access: Free

Resource Link

http://oregonbest.org/fileadmin/media/Mass_Timber/Accelerating_CLT_Manufacturing_in_Oregon__SW_Washington__2017__Oregon_BEST_.pdf



An Approach to CLT Diaphragm Modeling for Seismic Design with Application to a U.S. High Rise Project

<https://research.thinkwood.com/en/permalink/catalogue1671>

Author: Scott Breneman
Eric McDonnell
Reid Zimmerman

Year of Publication: 2016

Country of Publication: Austria

Resource Type: Conference Paper

Material: CLT (Cross-Laminated Timber)

Application: Floors
Wood Building Systems

Topic: Seismic
Design and Systems

Keywords: US
Diaphragm
Model
High-Rise

Language: English

Conference / Proceeding: World Conference on Timber Engineering

Notes: August 22-25, 2016, Vienna, Austria
p. 3844-3852

Abstract:

A candidate CLT diaphragm analysis model approach is presented and evaluated as an engineering design tool motivated by the needs of seismic design in the United States. The modeling approach consists of explicitly modeling CLT panels as discrete orthotropic shell elements with connections between panels and connections from panels to...

Online Access: Free

Resource Link

<http://repositum.tuwien.ac.at/obvutwoa/content/pageview/1649389>



An Approach to CLT Diaphragm Modeling for Seismic Design with Application to a U.S. High-Rise Project

<https://research.thinkwood.com/en/permalink/catalogue1710>

Author: Scott Breneman
Eric McDonnell
Reid Zimmerman

Organization: WoodWorks

Year of Publication: 2017

Country of Publication: United States

Resource Type: Report

Material: CLT (Cross-Laminated Timber)

Application: Wood Building Systems
Floors

Topic: Design and Systems
Seismic

Keywords: US
Model
Diaphragm
High-Rise

Language: English

Online Access: Free

Resource Link

<http://www.woodworks.org/wp-content/uploads/Approach-to-CLT-Diaphragm-Modeling-for-Seismic-WoodWorks-Jan-2017.pdf>



Approximate R-Factor for Cross-Laminated Timber Walls in Multistory Buildings

<https://research.thinkwood.com/en/permalink/catalogue414>

Author: Shiling Pei
John van de Lindt
Marjan Popovski

Publisher: American Society of Civil Engineers

Year of Publication: 2012

Country of Publication: United States

Resource Type: Journal Article

Material: CLT (Cross-Laminated Timber)

Application: Wood Building Systems
Shear Walls

Topic: Seismic

Keywords: Maximum Credible Earthquake
North America
US
Construction Market
seismic behaviour
R-factor
Load resistance
Reverse Cyclic Test

Language: English

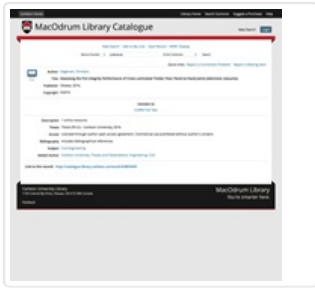
Series: Journal of Architectural Engineering

Abstract:
Cross-laminated timber (CLT) is a wood construction technology that has been utilized in Europe for several decades and has become even more popular recently. Although the technology has been in existence for approximately 20 years, its seismic performan...

Online Access: Payment Required

Resource Link

[http://dx.doi.org/10.1061/\(ASCE\)AE.1943-5568.0000117](http://dx.doi.org/10.1061/(ASCE)AE.1943-5568.0000117)



Assessing the Fire Integrity Performance of Cross-Laminated Timber Floor Panel-To-Panel Joints

<https://research.thinkwood.com/en/permalink/catalogue185>

Author: Christian Dagenais
Organization: Carleton University
Year of Publication: 2016
Country of Publication: Canada
Publication:
Resource Type: Thesis
Material: CLT (Cross-Laminated Timber)
Application: Floors
Topic: Connections
Fire
Keywords: Finite Element Model
Thickness
Codes
Panel-to-Panel
Joints
Canada
US
Fire Resistance
Language: English

Abstract:

During the past few years, a relatively new technology has emerged in North America and changed the way professionals design and build wood structures: Cross-laminated Timber (CLT). CLT panels are manufactured in width ranging from 600 mm to 3 m. As such...

Online Access: Free

Resource Link

<http://catalogue.library.carleton.ca/record=b3859439>



Awareness, Perceptions and Willingness to Adopt Cross-Laminated Timber by the Architecture Community in the United States

<https://research.thinkwood.com/en/permalink/catalogue506>

Author: Maria Fernanda Laguarda Mallo
Omar Espinoza

Publisher: ScienceDirect

Year of Publication: 2015

Country of Publication: Netherlands

Resource Type: Journal Article

Material: CLT (Cross-Laminated Timber)

Application: General Application

Topic: Market and Adoption

Keywords: US
Market Potential
Barriers to Adoption
Architects

Language: English

Series: Journal of Cleaner Production

Online Access: Payment Required

Resource Link

<http://dx.doi.org/10.1016/j.jclepro.2015.01.090>



Awareness, Perceptions and Willingness to Adopt Cross-Laminated Timber in the United States

<https://research.thinkwood.com/en/permalink/catalogue1435>

Author: Maria Fernanda Laguarda Mallo
Organization: University of Minnesota
Year of Publication: 2014
Country of Publication: United States
Resource Type: Thesis
Material: CLT (Cross-Laminated Timber)
Application: General Application
Topic: Market and Adoption
Keywords: US
Awareness
Perceptions
Language: English
Online Access: Free

Resource Link

<http://hdl.handle.net/11299/165560>



Bending and Rolling Shear Capacities of Southern Pine Cross Laminated Timber (CLT)

<https://research.thinkwood.com/en/permalink/catalogue1596>

Author: Mengzhe Gu
Weichiang Pang
Michael Stoner

Year of Publication: 2016

Country of Publication: Austria

Resource Type: Conference Paper

Material: CLT (Cross-Laminated Timber)

Application: General Application

Topic: Mechanical Properties

Keywords: Southern Pine
US
Manufacturing
Rolling Shear
Bending
Three Point Bending Test

Language: English

Conference / Proceeding: World Conference on Timber Engineering

Notes: August 22-25, 2016, Vienna, Austria
p. 1899-1906

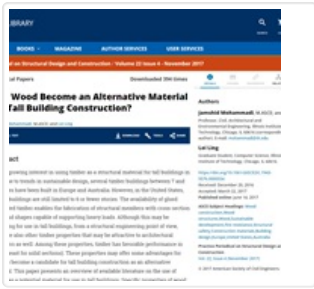
Abstract:

Southern Pine (SP) is one of the fastest growing softwood species in the Southern Forest of United States. With its high strength to weight ratio, SP becomes an ideal candidate for manufacturing engineered wood products such as cross laminated timber (CLT). Two batches of CLT panels were manufactured using visually graded SP lumbars in...

Online Access: Free

Resource Link

<http://repositum.tuwien.ac.at/obvutwoa/content/pageview/1607755>



Can Wood Become an Alternative Material for Tall Building Construction?

<https://research.thinkwood.com/en/permalink/catalogue1240>

Author: Jamshid Mohammadi
Lei Ling

Publisher: American Society of Civil Engineers

Year of Publication: 2017

Country of Publication: United States

Resource Type: Journal Article

Material: Glulam (Glue-Laminated Timber)

Application: Wood Building Systems

Topic: Market and Adoption
Mechanical Properties
Fire

Keywords: US
Renewable Materials
Fire Resistance
Strength-to-Density Ratio

Language: English

Series: Practice Periodical on Structural Design and Construction

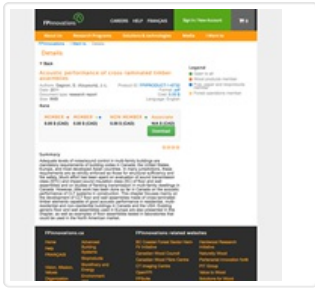
Abstract:

With a growing interest in using timber as a structural material for tall buildings in response to trends in sustainable design, several timber buildings between 7 and 10 stories have been built in Europe and Australia. However, in the United States, timber buildings are still limited to 6 or fewer stories...

Online Access: Payment Required

Resource Link

[https://doi.org/10.1061/\(ASCE\)SC.1943-5576.0000334](https://doi.org/10.1061/(ASCE)SC.1943-5576.0000334)



Chapter 9: Acoustic Performance of Cross-Laminated Timber Assemblies

<https://research.thinkwood.com/en/permalink/catalogue815>

Author: Sylvain Gagnon
Jean-Luc Kouyoumji

Organization: FPInnovations

Year of Publication: 2011

Country of Publication: Canada

Resource Type: Book Section

Material: CLT (Cross-Laminated Timber)

Application: Walls
Floors

Topic: Acoustics and Vibration

Keywords: North America
Residential
Sound Transmission Class
Impact Sound Insulation Class
Acoustic Performance
Multi-Residential
Non-Residential
US

Language: English

Series: CLT Handbook - Canadian Edition

Abstract:

Adequate levels of noise/sound control in multi-family buildings are mandatory requirements of building codes in Canada, the United States, Europe, and most developed Asian countries. In many jurisdictions, these requirements are as strictly enforced as ...

Online Access: Free

Resource Link

<https://fpinnovations.ca/Extranet/Pages/AssetDetails.aspx?item=/Extranet/Assets/ResearchReportsWP/E4848.pdf#.WmtrkHanGUK>