



Canada's Forest Sector: Adapting to a New Reality.

*"Technology and innovation
as a catalyst for success"*

September 19 - 21, 2016

Four Seasons Hotel Vancouver, BC

www.demointernational.com

MONDAY September 19, 2016

Preliminary Program

5:00 pm - 7:00 pm

7:30 pm - 9:30 pm

8:00 pm

COFE Executive Meeting

General Registration & 'Meet and Greet' Reception

Quiz Bowl - Student Competition

TUESDAY September 20, 2016

Plenary Session 9:00 am - 12:00 pm

Morning Program

*Join us in
Vancouver
for the
forestry
event of the
year!*

7:30 am

8:30 am - 9:00 am

9:00 am - 12:00 pm

Registration

First Nations Opening: Tsleil-Waututh First Nation

Welcoming Remarks - Peter Robichaud, Executive
Director, Canadian Woodlands Forum

PLENARY SESSION

Moderator: John Innes, Dean, Faculty of Forestry, UBC

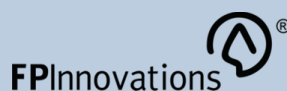
Land Ownership and Business Models

- **1st Nations Perspective.** Maureen Thomas, Elected Chief, Tsleil-Waututh First Nation
- **Provincial Perspective.** Honourable Steve Thomson, BC Minister of Forests, Lands and Natural Resource Operations and Demo International® 2016 Honourary Chairman.
- **Private Landowner Perspective.** Domenico Iannidinardo, Chief Forester and VP Sustainability, Timber West
- **Future-Proofing Innovation Delivery.** Trevor Stuthridge, FPIInnovations

12:00 pm - 1:30 pm

Demo Luncheon

A DEMO International Conference, co-hosted by the Faculty of Forestry, UBC and the Canadian Woodlands Forum in association with the 108th Annual General Meeting of the Canadian Institute of Forestry, FPIInnovations, and the Council on Forest Engineering 2016 Annual General Meeting



TUESDAY September 20, 2016

Concurrent Sessions A to D2 1:30 pm - 5:00 pm

Afternoon Program

Session A

*Sponsored by Canadian Journal
of Forest Research*

New Silviculture Practices

Moderator: Ken Day, Director of Alex Fraser Research Forest

- **Technology in the Tree Planters' World.** John Betts, Western Silviculture Contractors' Association.
- **International Silviculture.** Lars Eliasson, Skogforsk
- **Ash and Biosolid Spreading as Waste Disposal and a Soil Amendment Tool.** Dirk Brinkman, Domtar-Windsor.
- **Adapting to Climate Change Through Assisted Migration.** Dr. Sally Aitken. UBC
- **Are We Ready to Rehabilitate Fire as a Regeneration Tool?** Dana Hicks, Fire Management Specialist, BC MFLNRO

Session B

Logistics & Transportation

Moderator: Woodam Chung, OSU, Stewart Professor of Forest Operations

- **When is Real-time Data Required for Truck Scheduling?** Tom Gallagher, Auburn.
- **Logistics to Fit Wood Supply Situation.** Luc LeBel, Laval.
- **Process Design in Forest Biomass Procurement Chains.** Johannes Windisch, Technical University, Munich.
- **Latest Developments in More Productive Truck Configurations and Designs.** James Sinnett, FPIInnovations
- **Title TBC.** Ian McIver, Ledcor

Session C

Sponsored by BC Forest Safety Council

Adapting to Steep Slopes

Moderator: TBD

- **Where Do Tethered Machines Fit In?** Rien Visser, New Zealand
- **Austrian Perspective.** Karl Stampfer, BOKU
- **Opportunities for Improving Cable Machines.** Tyson Lambert, T-Mar
- **Safety Perspective.** John Garland, UW
- **Equipment Design, Challenges and Opportunities on Steep Slopes.** TBC, Cat

TUESDAY September 20, 2016

Concurrent Sessions A to D2 1:30 pm - 5:00 pm

Afternoon Program

Sponsored by:



Session D1

Forests and Trucking

Moderator: Charles Blinn, Forest Roads and Trucking

- A Literature Review on Trucking Problems in Maine. *Anil Koirala*
- Utilization Of Phone Application Technology to Record Log Truck Movements in the South Eastern US. *Marrisa Daniel*
- Follow That Tractor: What Truck-Mounted GPS Tells Us About Log Truck Performance. *Shawn Baker*
- Fuel Tax and Road Use. *Dana Mitchell*
- Increased Utilization of Fly Ash - Value Addition Through Forest Road Rehabilitation. *Tomi Kaakkurivaara*

Procurement, Productivity And Costs: Part 1

- Rethinking Road Planning and Design Workflows: Unlocking the Potential of LiDar with New Optimization Technology. *Craig Speirs*
- Timber Procurement Practices in Wisconsin: Responding to Seasonal Variation in Timber Availability. *Joseph Conrad*
- Skidding Performance When Operated Remotely. *Kevin Xue*
- Wildland Fire Suppression Operations with Heavy Equipment In Spain. *Juan Bautista*
- A Productivity and Cost Comparison of Two Beetle-Killed Stand Harvesting Methods. *Hee Han*

Sponsored by:



Session D2

Human Factors and Safety

Moderator: Patrick Hiesl

- Are Logging Rates a Driver of Logging Employment? *Shawn Baker*
- The Effects on Innovations in Ride Suspension on WBV Exposure for Skidder Operators. *Mathew Smidt*
- Hazard in Motion: Development of Mobile Geofences for Use in Logging Safety and Logistics. *Eloise Zimbelman*
- Increase Professional Know-How in Steep-Terrain Conditions: Experience from the Regional Learning Lab in Massif Central. *Paul Magaud*
- Assessment for Improvement: Safety in Forest Operations on Thai Highland. *Nopparat Kaakkurivaara*

Procurement, Productivity And Costs: Part 2

- Cost, Production, and Effectiveness of Masticated Fireline. *Elizabeth Dodson*
- Private Forest Landowners Interaction with Timber Harvesting. *Patrick Hiesl*
- Supply Chain Evaluation of Cintoc, a Two-Crane Bundling Small-Tree Harvester. *Mauricio Acuna, Örjan Grönlund and Ryer M. Becker*

5:00 pm - 7:00 pm

Alumni Reception

7:00 pm - 9:00 pm

CIF Awards Banquet

7:00 pm - 9:00 pm

COFE Awards Banquet and Annual Meeting

WEDNESDAY September 21, 2016

Morning Program

7:00 am - 11:00 am Registration
7:00 am - 8:00 am Breakfast
8:00 am - 10:00 am CIF AGM

Concurrent Sessions E to G 10:30 am - 12:00 pm

Session E

Ground Based Systems

Moderator: TBC

- Differences in Operator Training Europe and North America. *Bruce Talbot*
- Maximizing Logging Equipment Productivity Through Advanced Coaching. *Carl Tingley, Forest Liaison Inc.*
- Better Use of Information Technology in Harvesting Equipment. *Martin Castonguay, & Jean-François Gingras, FPInnovations*
- Cut to Length Harvesting; Why and What are the Challenges? *Dan Fuhrer, Ponsse*

Session F

Forest Biomass Production & Handling

Moderator: John Sessions, OSU Strachan Chair of Forest Operations Management

- The Ontario Experience. *Loni Pierce, OMNRF*
- Integrated Log and Biomass Harvesting – Reducing Overall Costs. *Dominik Roser, FPInnovations*
- First Commercial Pyrolysis Plant in Finland. *Lauri Sikanen, Luke Finland*
- Chipping vs. Grinding - Experiences from Sweden. *Lars Eliasson, Skogforsk*

Session G

New Technology in Forest Management

Innovative tools in forest management. UAV's, remote sensing. Industry needs, future outlook.

Moderator: TBD

- UAVs for Forestry Applications. *Denis Cormier, FPInnovations*
- LiDAR - Where Are We and Where Are We Going - Experiences From Alberta, Quebec and Nova Scotia. *Joan Luther, Natural Resources Canada*
- How Technology is Used in the Industry. *Jon Lok, Strategic Forest Management Consultants*
- Future Outlook for Technology Use in Forestry. *Nicholas Coops, UBC*

WEDNESDAY September 21, 2016

Concurrent Sessions H1 to H2 8:00 am - 12:00 pm

Morning Program

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COUNCIL
ON FOREST
ENGINEERING

Session H1

Biomass Harvesting and Forest Residues: Part 1

Moderator: *Tom Gallagher*

- A Characterization of Timber Salvage Operations on Public Forests in Minnesota and Wisconsin. *Mathew Russell*
- Analysis of Chipping Operation and Chip Quality in Mixed Hardwood Forest. *John Vance*
- Biomass Harvesting on the George Washington and Jefferson National Forests in Virginia. *John Klepac*

Silvicultural and In-Woods Harvesting Systems

- A Multi-Criteria Decision Making Approach to Locate a Terminal in Bioenergy Supply Chains. *Shuva Gautam*
- The Future of Industrial Plantation Forestry and its Effects on Timber Harvesting Technology and Systems. *Andrew McEwan*
- Coppicing Evaluation in the Southeast US to Determine Harvesting Methods. *Rafael Santiago*
- Benefits of Novel Mechanized Forest Fuel Treatments for Increasing Landscape Fire Resiliency. *Ricky Satomi*
- Achieving the Outcomes of Irregular Shelterwood Systems in Mechanized Operations Without Tree Marking; A Case Study in New Brunswick Hardwood Stands. *Gaetan Pelletier*
- Standing Vs. Downed Tree Harvesting In Beetle-Killed Stands. *Yaejun Kim*
- Evaluation of a Modified Centrifugal Spreader to Apply Nutrient-Rich Fine Fractions from Woodchips as a Fertilizer to Cutover Areas in Steep Terrain. *Christoph Huber*

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COUNCIL
ON FOREST
ENGINEERING

Session H2

Biomass Harvesting and Forest Residues: Part 2

Moderator: *Shawn Baker*

- Biomass Chipping for Eastern Redcedar Control. *Mathew Smidt*
- Assessing the Emissions and Costs of Disposing Forest Residues Using Air Curtain Burners. *Eunjai Lee*
- Unprocessed Whole Tree Delivery System for Log Processing and Sorting Yards. *John Lancaster*

Modeling and New Technologies

- Stochastic Simulation of Harvesting System Alternatives. *Ji She*
- A Machine Vision System for Forest Harvesting Equipment. *Lucas Wells*
- Technological Developments In Cable Logging. *Hunter Harill*
- Mechanised Pine Thinning Harvesting Simulation: Productivity and Cost Improvements as a Result of Changes in Planting Geometry. *Simon Ackerman*
- Skyline Tension Behaviour of Rigging Configurations Used in New Zealand Cable Logging. *Hunter Harill*
- Benefits And Challenges of Shifting from Manual Approach to Using Optimization Procedures in Wood Procurement Planning. *Maxime Auger*
- Impact of Bucking Automation on Productivity and Log Specifications Compliance Rate. *Mathieu Bouchard*

WEDNESDAY September 21, 2016

Afternoon and Evening Program 12:00 pm - 10:00 pm

12:00 pm - 1:30 pm

Luncheon

1:30 pm - 3:30 pm

Final Plenary Session with Panel Discussion

Moderator: *Peter Lister, FPIInnovations*

Looking Forward:

- **Business Models in the Future.** *Ken Shields, Conifex Timber Inc.*
- **Future of Equipment Development.** *Richard Lawler, John Deere*
- **First Nations Going Forward.** *Matt Wealick, Ts'elxwéyeqw Forestry Limited Partnership, Tzeachten First Nation*
- **Forest Stewardship - What Does the Future Hold?**
Tim Ryan, Forest Practices Board

3:30 pm - 3:45 pm

Final Closing Remarks

5:00 pm - 10:00 pm

Musqueam First Nation Salmon BBQ & Cultural Performance.

(Bus leaves at 4:45 pm, delegates will return at 10pm on bus)

Conference Venue



FOUR SEASONS HOTEL
Vancouver

The Four Seasons Hotel Vancouver is honored to welcome delegates to the DEMO International® 2016 Conference.

The Four Seasons Hotel Vancouver is truly at the centre of it all. Situated in the heart of downtown, connected at the lower lobby level to more than 100 shops and services of Pacific Centre, and located just minutes from world famous Stanley Park, art galleries, theatres, sporting venues and night clubs. It also features an underground connection to the Canada Line Rapid Transit System that travels directly from the Vancouver International Airport to downtown Vancouver.

Four Seasons Hotel Vancouver provides a preferred address for both business and leisure travellers and the highly personalized, anticipatory service that Four Seasons guests expect and value around the world.

791 West Georgia St., Vancouver, BC Canada V6C 2T4

Toll Free: 1 866 223-9333 • Fax: (604) 844-6744

Accommodations

A block of guestrooms has been set aside for delegates at The Four Seasons Hotel Vancouver.

To reserve your hotel room and obtain the room rate of \$199 (plus tax), **call 1-866-223-9333**. Individuals must indicate their group affiliations when making reservations or the applicable group rate may not be extended. The group affiliation to quote for the reservation is: *Canadian Woodlands Forum-2016 Demo International and Conference*. You can also register online at reservations.vcr@fourseasons.com

Direct reservations must be made prior to August 22, 2016 in order to get the group rate. The hotel will continue to accept reservations after this date on a space available basis at current available rates. **Refer to the conference website for further details. www.demointernational.com/**

**For more
information contact:**

Tara Croft: 902 897-6961 or Email: tcroft@cwfcf.org
Virginia Hudson: 604-224-3221 (ext.5351)
or Email: Virginia.Hudson@fpinnovations.ca

Rate Descriptions

Basic-Member (CIF/CWF/COFE/FPIInnovations/UBC), Non-Member, Retired and Students Includes all conference plenary and technical sessions, a DEMO International equipment show pass, 4 refreshments during breaks, 2 lunches, 1 breakfast, and entrance to the Student Quiz Bowl tournament, the "Meet and Greet" reception and Tuesday night reception.

Day Pass (Tuesday OR Wednesday only) - Includes either Tuesday or Wednesday's plenary and technical sessions, 2 refreshment breaks, and 1 lunch. This also includes entrance to a reception for Tuesday registrants, or breakfast for Wednesday registrants.

Banquet & Special Event Registration

- **CIF Awards Banquet Dinner and COFE Awards Banquet Dinner** - Includes a formal dinner and awards presentation at the Four Seasons Hotel.
- **Musqueam First Nation Salmon BBQ & Cultural Performance** - Includes a traditional Salmon BBQ Dinner and Cultural Performance at the Musqueam First Nation Community Centre and entrance to Musqueam museum. Registration also includes bus transportation.
- **DEMO Equipment Show Pass** - Includes entrance to the DEMO International® Equipment show in Maple Ridge, BC from September 22-24, 2016. This pass is included in the basic conference registration. For more information about the Demo International Equipment Show, visit: www.demointernational.com

Pre and Post-Conference Tour Registration

Note: Tours may be cancelled if attendance is low, and an alternative tour may be offered. Your spot on the tour will not be confirmed until we receive your payment. If the tour you requested is full, you will be offered another tour.

Tour A: Vancouver Island Pre-Conference Tour - Includes a 3-day trip exploring southern Vancouver Island. Stops on the first day include a forest nursery, seed orchard, the world famous Butchart Gardens, Goldstream Provincial Park, and a night at the Cowichan Lake Research Station. Stops on the second day include the Schenstrom thinning trials, the BC Forest Discovery Centre, and a large wood sawmill tour. On the final day we will check out the towering old growth forest giants at Cathedral Grove before returning to Vancouver. Capacity of 20. **Note-the fee does NOT include BC Ferry cost (both ways), Nanaimo hotel, 2 breakfasts, lunches, or dinners. Delegates must book their own room at the Coast Bastion Hotel for the night of Sept 18 by calling 250-753-6601 and quoting "CBI-GFC15616" by August 19 at the latest.

Tour B: Fraser Valley & Ts'elxweyeqw Forestry Ltd. - Includes travel and a tour of the Ts'elxweyeqw Forestry Ltd. Partnership's operations in the Fraser Valley as well as morning coffee, snacks, and a field lunch. Capacity of 26.

Tour C: Mission Tree Farm - Includes travel and a tour of the Mission Municipal Forest (TFL26), morning coffee & snacks, field lunch, and a visit to Andersen Pacific Forest Products Ltd. (a high value specialty-cut saw mill) in Maple Ridge, BC. Capacity of 26.

Tour D: Sea to Sky - Includes travel along the Sea-to-Sky Highway corridor, morning coffee & snacks, a ride up the Sea-to-Sky Gondola, and lunch overlooking Howe Sound in Squamish, BC. This tour also includes a visit to a coastal log sorting and scaling ground as well as visits to both the Brew Creek Community Forest & Cheakamus Community Forest. Capacity of 55.

Tour E: Stanley Park - Includes travel and a morning tour of Stanley Park with forestry experts involved in the making of the Stanley Park Forest Management Plan that was implemented following a major storm in 2006. Capacity of 23.

Tour F: Urban Forestry - Includes travel, morning coffee & snacks, field lunch, and a tour of both the City of Surrey's urban forestry initiatives, and recent urban forestry projects on UBC campus affiliated with the brand new Bachelor of Urban Forestry (BUF) program. Capacity of 54.

Tour G: Steveston & Fraser Estuary - Includes travel, morning coffee & snacks and a tour of the Reifel Migratory Bird Sanctuary, the Gulf of Georgia Cannery, and the Britannia Heritage Shipyard. For lunch we will stop in the historic Village of Steveston where you can grab your own lunch at one of the many west coast-inspired café's or restaurants! Capacity of 54.

Tour H: Coast-Interior Circle - Includes a 2-day trip exploring BC's diverse ecological zones from Vancouver to Squamish, Whistler, Lillooet, Cache Creek, Hell's Gate, and back to Vancouver again via the Fraser Valley. Includes field lunch both days. Capacity of 22. **Note-this fee does NOT include Hotel, breakfasts, or dinners. Delegates must book their own rooms at the Retasket Lodge in Lillooet, BC on Sept 22.

Please call: 1-866-456-2090. Quote "DEMO Conference" when booking."

Demo Conference Registration Form

Last Name															First Name														
Company																													
Address																													
City															Province / State										Postal / Zip Code				
Telephone															Fax														
E-mail																													

Registration Fees *(All fees include applicable tax)*

	Early Bird Before Aug. 15, 2016	Regular/on-site After Aug. 15, 2016	
<input type="checkbox"/> Basic-member	\$450.00	\$530.00	\$ _____
<input type="checkbox"/> Basic-(non) member	\$550.00	\$630.00	\$ _____
<input type="checkbox"/> Retired	\$350.00	\$430.00	\$ _____
<input type="checkbox"/> Student	\$300.00	\$380.00	\$ _____
<input type="checkbox"/> Daily (Tues. only)	\$275.00	\$355.00	\$ _____
<input type="checkbox"/> Daily (Wed. only)	\$275.00	\$355.00	\$ _____
<input type="checkbox"/> CIF Awards Banquet (Tues.)	\$ 80.00	\$ 80.00	\$ _____
<input type="checkbox"/> COFE Awards Banquet (Tues.)	\$ 80.00	\$ 80.00	\$ _____
<input type="checkbox"/> CIF BBQ Dinner (Wed.)	\$ 85.00	\$ 85.00	\$ _____
<input type="checkbox"/> DEMO Pass	\$ 25.00	\$ 25.00	\$ _____

TOUR PRICES

Pre-registration is required before August 26. Space is limited.

<input type="checkbox"/> Tour A - Sept. 17-19 - Vancouver Island	\$145.00	\$ _____
<input type="checkbox"/> Tour B - Sept. 22 - Ts'elxweyeqw Forestry Ltd.	\$ 80.00	\$ _____
<input type="checkbox"/> Tour C - Sept. 22 - Mission TFL	\$ 80.00	\$ _____
<input type="checkbox"/> Tour D - Sept. 22 - Sea to Sky	\$125.00	\$ _____
<input type="checkbox"/> Tour E - Sept. 22 - Stanley Park	\$ 45.00	\$ _____
<input type="checkbox"/> Tour F - Sept. 22 - Urban	\$ 80.00	\$ _____
<input type="checkbox"/> Tour G - Sept. 22 - Steveston	\$ 65.00	\$ _____
<input type="checkbox"/> Tour H - Sept. 22 -23 - Coast-Interior Circle Tour	\$170.00	\$ _____

***Please see previous page for full registration descriptions.**

TOTAL

\$

Please check your Membership Affiliation:

- ☐ CWF ☐ CIF ☐ COFE
☐ FPIInnovations ☐ UBC, Faculty of Forestry

Payment options

☐ **Credit Card** *(Visa and MasterCard accepted)*

Card Number

Expiration

Name on card *(please print)*

Cardholders Signature

☐ **Cheque** - Please make payable to:
Canadian Woodlands Forum

Mail to: 20 Coupar Terrace, Truro, NS B2N 5L3

☐ **Invoice** - Please invoice me for payment.

Fax completed form to:

Canadian Woodlands Forum

(902) 897-6976 or Email: tcroft@cwfcf.org

Please note:

- Pre-registration will end on August 15, 2016. After that date, regular registration fees will apply.
- You are not registered until payment is received.
- Receipts will be issued on-site at the conference.
- Refunds will not be granted after August 26, 2016. A \$50 administration fee per request will be deducted from all refunds.
- Alternate delegates may be sent without penalty.
- Please advise the registration contact of any substitution to allow for a change in delegate registration package.