

PNREC 2025

59th Pacific Northwest Regional Economic Conference

May 19-21, 2025 Bellingham, WA

Event Program
Four Points Sheraton
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Bellingham, WA 98229
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About the Pacific Northwest Regional Economic Conference

The Pacific Northwest Regional Economic Conference (PNREC) is a non-profit organization established to promote research and education on the economy of the Northwest states and western Canada. The objectives of the Conference are:

- To present a program of professional papers, panels and symposia that relate to regional economics.
- To enable distinguished regional scientists and policy analysts from elsewhere to play a featured role at the conference.
- To provide a forum for those from academia, business and government to meet and interact professionally.
- To introduce and share current regional economic research with students, business and community leaders.

The idea of PNREC came to Charles Tiebout, the noted and highly respected Professor of Urban and Regional Economics at the University of Washington, in 1966. He had observed that economic organizations in other parts of the U.S. — the New England Council, for example, and the Southern Economic Association — were undertaking studies that turned the spotlight on their regional economies. These suggested additional reports, possible policy responses, and governmental grants, both to research the problems further and to propose remedies. Professor Tiebout thought that the Pacific Northwest should also initiate an organization, forum or publication that examined its economy, discovered problem areas and suggested remedial action.

To this end, Tiebout asked business and government economists, and academic colleagues concerned with the regional economy to organize a start-up conference at the University of Washington in early May of 1967. The first PNREC was held in 1967 at the Benson Hotel in downtown Portland. The inaugural conference lasted two days and was a great success. The program covered many topics, though it concentrated on the theory and practice of building input-output models that were then under construction in most states of the region. At the end of that first conference, it was agreed that a second one should be convened a year later.

The plan for PNREC had been to have the annual conferences alternate between Seattle and Portland. In 1968, however, Dr. John Guthrie, Chair of the Department of Agricultural Economics at Washington State University, volunteered to organize the next one at his institution. Since that time, PNREC has been staged at sites throughout the Pacific Northwest and western Canada, including Missoula, Spokane, Olympia, Boise, Bellingham, Tacoma, Richland, Vancouver and Victoria B.C.



The 2025 PNREC will be the second held in Bellingham, Washington. PNREC first met in Bellingham in 2015. The conference has received strong interest that has supported an expanded program. While the conference has experienced highs and lows over the past 59 years, it has survived and will continue to bring the region's economists together each year to share research, maintain connections and build our understanding of the economic issues facing our region.

Conference Sponsors







To all our partners, speakers, paper presenters, chairs and volunteers: Thank You!



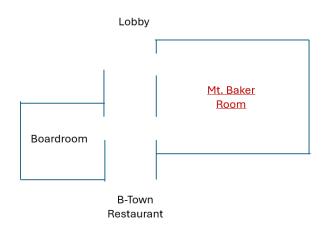
Notes and Logistics

When looking at the hotel map on the next page – please note

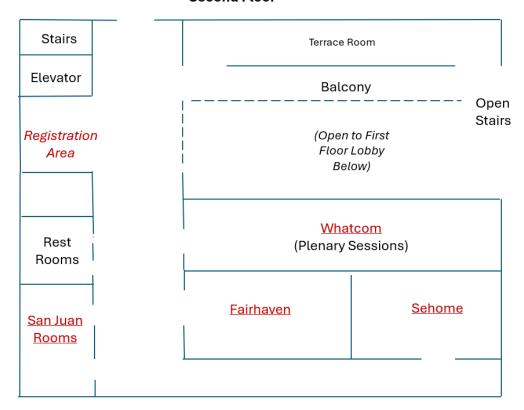
- Meals and plenary sessions will take place in the Whatcom room (on the 2nd floor; conference area)
- Breakout sessions will take place in the following rooms
 - Fairhaven (2^{ne} floor)
 - Sehome (2^{ne} floor)
 - o San Juan Rooms (2^{ne}floor)
 - Mt. Baker (1st floor)
- Our welcome reception on the 19th will take place on the patio outside the B-Town Restaurant, on the ground floor.
- Beverages and snacks will be available between the second floor meeting rooms and registration area during networking breaks
- You are on your own for dinner, but we'll have information at the registration desk for restaurants, breweries, etc.



First Floor



Second Floor





PNREC 2025 AGENDA AT A GLANCE

May 19, 2025			
5:00 PM – 7:00 PM	Registration		
6:00 PM – 8:00 PM	Meet and Greet Reception (Appetizers and Drink Ticket), No Host Bar		
May 20, 2025	May 20, 2025		
7:30 AM – 5:00 PM	Registration		
8:30 AM – 9:15 AM	Breakfast and Welcome	Hart Hodges PNREC President; WWU Consul General Craig Weichel, Consulate General of Canada, Seattle	
9:15 AM – 10:15 AM	North American Economic Outlook	Tony Stillo, Oxford Economics	
Networking Break, Bevera	Networking Break, Beverages and Snacks		
10:30 AM – 11:45 AM Breakout Session 1			
Networking Break			
12:00 PM – 1:30 PM	Lunch and Keynote Address	Emilie Jackson, Michigan State University, The Impacts of Privatization: Evidence from the Hospital Sector	
Networking Break, Beverages and Snacks			
1:45 PM – 3:00 PM	Breakout Session 2		
Networking Break	Networking Break		
3:15 PM – 5:30 PM	Paul Storer Memorial Lecture and Reception	Matt Roelofs, Dept. Economics, WWU Sylvain Leduc, FRBSF, Global Trade in Uncertain Times	



PNREC 2025 AGENDA AT A GLANCE

May 21, 2025		
7:00 AM – 3:00 PM	Registration	
7:30 AM – 8:30 AM	Breakfast	
8:30 AM – 9:15 AM	Panel Discussion – US/Canada Relations: Is it the End of an Era? Welcome by Deanna Kennedy, Dean of the College of Business and Economics, WWU	
Networking Break		
9:30 AM – 10:45 AM	Breakout Session 3	
Networking Break, Beverages and Snacks		
11:00 AM – 12:15 PM	Breakout Session 4	
Networking Break		
12:15 PM – 1:40 PM	Lunch and Keynote Address	Robert McLeman, Wilfrid Laurier University – Climate Migration
Networking Break		
1:45 PM – 3:00 PM	Breakout Session 5	
Networking Break, Beverag	Networking Break, Beverages and Snacks	
3:15 PM – 4:30 PM	Regional Outlook Session	
4:30 PM – 4:45 PM	Closing Ceremonies	



PNREC 2025 DETAILED AGENDA

May 19, 2025	
5:00 PM – 7:00 PM	Registration
6:00 PM – 8:00 PM	Meet and Greet Reception (Appetizers and Drink Ticket), No Host Bar Four Points Sheraton hotel - "B-town Kitchen and Raw Bar"

May 20, 2025		
7:00 AM – 5:00 PM	Registration	
8:30 AM – 9:15 AM	Breakfast and Economic Outlook	
	Welcome	Dr. Hart Hodges PNREC President Consul General Craig Weichel, Consulate General of Canada, Seattle
9:15 AM – 10:15 AM	North American Economic Outlook	Tony Stillo, Oxford Economics
10:15 AM – 10:30 AM	Networking Break	

10:30 AM - 11:45 AM CONCURRENT SESSIONS (Session 1)



Panel 1a: Energy in the PNW - Looking Ahead

Room: Fairhaven

Moderator: Massoud Jourabchi

Panelists:

Massoud Jourabchi, Greenway Research, State of Electric Utilities in the PNW

Steve Simmons, Northwest Power and Conservation Council. **Forecasting Long-Range Energy Demand in the Pacific Northwest**

Dr. Mark Weimar, Argonne National Lab, **Does Matching Pumped Storage Hydropower** with Offshore Wind in Southern Oregon Make Economic Sense?

Panel 1b: Regional Topics - Business Emphasis

Room: Mt. Baker

Moderator: Felicia Mutheardy

Panelists:

Kathiravan Thangavetu, Independent Researcher, Economic Impact of Compliance Burden Faced by Small and Medium Businesses in Northwest USA and the Role of AI in Reducing It

Cole Smith, Amneet Pawar, and Hayden Hobbick, Central Washington University, 1st Security Bank of Washington Case Study

Brittany Tarufelli, PNNL, A Comprehensive Impact Evaluation Framework for EERE's Small Business and Startup Investment

Wilfried Kabre, PNNL, The Value of Innovation: Assessing the Impact and Multiplier Effect of Financial Awards on Advanced Materials and Manufacturing



Panel 1c: Labor Market Topics

Room: Sehome

Moderator: Gail Krumenauer

Panelists:

Scott Bailey, Independent, A Historical Look at Economic Outcomes by Race and Ethnicity in the US Pacific Northwest

Dr. Anneliese Vance-Sherman, Washington State Employment Security Department, **Employment in Clean Energy**

Richard Acquah-Sarpong, Oregon State University, Widening Gaps: Regional Inequality in Credit Defaults under Tiered Minimum Wage Policies

Panel 1d: The Impact of Tariffs

Room: San Juan Rooms Moderator: Tom Potiowsky

Panelists:

Billy Leung, REMI Lewis Lem, Port of Portland Lizbeth Martin-Mahar, Chief Economist – King County

11:45 AM – 12:00 PM	Networking Break
12:00 PM – 1:30 PM	Lunch and Keynote Address Emilie Jackson, Michigan State University – The Impacts of Privatization: Evidence from the Hospital Sector
1:30 PM – 1:45 PM	Networking Break



1:45 PM - 3:00 PM CONCURRENT SESSIONS (Session 2)

Panel 2a: Challenges and Changes in the Energy Sector

Room: Fairhaven

Moderator: Massoud Jourabchi

Panelists:

Mike Brady, Washington State University, Rules versus Discretion in the Management of Multi-purpose Dams

Dr. Mark Weimar, Pacific Northwest National Lab - retired, **Economic and Social Aspects** of a Run of the River Powerhouse on the Nuyakuk River

Brittany Tarufelli, Pacific Northwest National Lab, **EverGreen 2045: An Energy Mix to Decarbonize Washington State**

Panel 2b: Labor Data and Trends

Room: Mt. Baker

Moderator: Scott Bailey

Panelists:

Dr. Anneliese Vance-Sherman, Washington State Employment Security Department, **Washington's Clean Energy Labor Market**

André Bernard and Josée Bégin, Statistics Canada, Changes in the labor market in Canada (virtual)

Anna Johnson, Oregon Employment Department, **Oregon's Job Vacancy Survey of Private Employers**



Panel 2c: Agriculture

Room: San Juan Rooms Moderator: Evan Rogers

Panelists:

Abigail King, PNNL, Idaho National Lab, Quantifying the Scale and Potential Benefits of Modernizing Irrigation Water Conveyance Infrastructure in the Western U.S.

Kenneth Annan, Oregon State University, **The Economic Impacts of Wildfires on Agricultural Land Markets**

Kenneth Stuen, University of Idaho, The Importance of Vintners' Quality

Jeff Lucksteed and **Magda Kondaridze**, WSU and Gonzaga University, **Production Subsidies and Agricultural Trade**

Panel 2d: Benefit - Cost Analysis

Room: Sehome Moderator: Jenny Liu

Panelists:

Dr. Jenny Liu, Portland State University, **Developing a Transportation Benefit-Cost Analysis (BCA) Framework for Oregon: Integrating Economic, Environmental and Equity Considerations**

William Jaeger, Oregon State University, Discounting Future Environmental Values for Benefit-Cost Analysis with Population Change: An Application to Dam Removal

Cortney Cortez, The Balmoral Group, Benefits and Costs in Coastal Community Resilience



3:00 PM – 3:15 PM	Networking Break
3:15 PM – 4:15 PM	Paul Storer Memorial Lecture Welcome – Matt Roelofs, Dept. of Economics, WWU Keynote Address – Sylvain Leduc , FRBSF - Global Trade in Uncertain Times
4:15 PM – 5:00 PM	Reception

DINNER ON YOUR OWN – Information about restaurants and breweries available at the registration area



May 21, 2025		
7:00 AM – 5:00 PM	Registration	
7:30 AM – 9:15 AM	Breakfast and Plenary Panel	
8:30 AM – 9:15 AM	Welcome	Dr. Deanna Kennedy Dean, College of Business and Economics, WWU
	Panel Discussion: The end of an era?	Duane Bratt, Mount Royal University (Calgary, Alberta) Laurie Trautman, WWU Ted Alden, Council on Foreign Relations and WWU
9:15 AM – 9:30 AM	Networking Break	

9:30 AM - 10:45 AM CONCURRENT SESSIONS (Session 3)

Panel 3a: The AI Data Center Energy Dilemma: Policy Issues for the Electric Utility Industry

Room: Fairhaven

Moderator: Massoud Jourabchi

Panelists will discuss current and future demand for data services, discuss data center operations and energy efficiency trends, as well as challenges faced by the electric grid

Panelists:

Robert Young, Managing Director of Economists.com NetApp, the world's largest storage provider Jon Piliaris, VP of Regulation, Puget Sound Energy



Panel 3b: Policy Topics – Environmental Focus

Room: Sehome

Moderator: Dr. Mark Weimar

Panelists:

Hans Radtke, Natural Resource Economist, Oregon State-Owned Hatchery Economic Analysis

Wisnu Sugiarto, Whitman College, Measuring Consumer Demand without 6PPD

Evan Rodgers, Oregon Department of Transportation, **The Resilience of Diesel Use Relative to Gasoline in Post-Pandemic Oregon**

Panel 3c: Electric Vehicles

Room: Mt. Baker

Moderator: Felicia Mutheardy

Panelists:

James Mark Gbeda, Western Washington University, Effects of Charging Infrastructure on Electric Vehicles Adoption and Transportation Emissions in the United States: A Panel Analysis

James Bradley, WSU, Green Transportation Program, **Doing the Math: The Economics of Electric School Bus Adoption**

Jepthah Oppong-Atta, Washington State University, **The effect of temperature on electric vehicle infrastructure and adoption in the US**



Panel 3d: Economics of Education

Room: San Juan Rooms Moderator: Tennicia Dacas

Panelists:

Darius Martin, Department of Economics, Western Washington University, **Hallmates Like Me: Social Network Formation and College Outcomes**

Hayden Hobnick, Central Washington University, **Gaze Aversion – Door Placement and Classroom Attendance**

Emily Trautman, Montana Department of Labor and Industry, **Montana Teacher Compensation Report**

10:45 AM – 11:00 AM	Networking Break, Beverages and Snacks
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11:00 AM - 12:15 PM CONCURRENT SESSIONS (Session 4)

Panel 4a: Labor Markets – Emphasis on Health Care

Room: Sehome

Moderator: Nick Beleiciks

Panelists:

Gail Krumenauer, Oregon Employment Department, Employment in Health Care

Anneliese Vance Sherman, WA Employment Security Department, **LEHD Data and Employment in Health Care**

Rebecca Grady, WA Employment Security Department, Paid Family Leave



Panel 4b: Challenges in the Region

Room: Fairhaven

Moderator: Hart Hodges

Panelists:

William Jaeger, Oregon State University, Advancing Sustainable Groundwater Management with a Hydro-Economic System Model: Investigations in the Harney Basin, Oregon

Chris Collier, Housing Authority of Snohomish County, Snohomish County Housing Discussion

** Please plan on good discussions following each presentation

Panel 4c: Border and Trade

Room: Mt. Baker

Moderator: Chris Lawless

Panelists:

Jennifer Bettis, WWU, and Rosaline Leung UBC, Economic Ties and Cross Border Relationships in Canada

Jennifer Withington, Statistics Canada, Canada-US Trade (virtual)

Codrin Nedita, University of Washington at Bothell, Trade Woes in the Pacific Northwest



Panel 4d: Population and Demographics

Room: San Juan Rooms Moderator: Ethan Sharygin

Panelists:

Ethan Sharygin, Portland State University - Migration in the PNW Region

Benjamin Gurrentz, Branch Chief – Small Area Modeling and Development Branch Social, Economic, and Housing Statistics Division, U.S. Census Bureau, **Community Resilience Explorer** (Virtual)

Alyson Plumb, Team Lead - Business Formation Statistics Program Economic Indicators Division, U.S. Census Bureau, **Business Formation Patterns** (Virtual)

12:15 PM – 12:20 PM	Networking Break
12:20 PM – 1:40 PM	Lunch and Keynote Address
	Robert McLeman, Wilfrid Laurier University, Climate Migration (virtual)
1:40 PM – 1:45 PM	Networking Break

1:45 PM - 3:00 PM CONCURRENT SESSIONS (Session 5)



Panel 5a: Emerging Issues in the Region

Room: Sehome

Moderator: Scott Bailey

Panelists:

Amy Bainbridge, the Balmoral Group, **Cost-effectiveness of Natural Resource Based Adaptation Strategies**

Toni Sipic and **Neven Sipic**, Central Washington University and Zagreb School of Business, **University Sustainability and Student Enrollments in the PNW**

Adam Wilson, Jake Wagner, and **Hanouf Alhunayshill**, Transportation Research Group at Washington State University, **Port Performance in the Pacific Northwest: Insights for the Maritime Freight Economy**

Panel 5b: Student CPI

Room: San Juan Rooms

Moderator: James McCafferty

Panelists:

Amneet Pawar and Cole Smith, Central Washington University – CWU student CPI project

Panel 5c: The New Border

Room: Fairhaven

Moderator: Tom Potiowsky

Panelists (Roundtable Discussion on the Hardening of the CA – US border);

Laurie Trautman, Border Policy Research Institute, Western Washington University Halley French, Cascadia Cross-Border Law Edward Alden, Council on Foreign Relations and Western Washington University Greg Boos, Cascadia Cross-Border Law



3:00 PM – 3:15 PM	Networking Break, Beverages and Snacks	
3:15 PM – 4:30 PM	Regional Outlook Panel	
	Chair: Tom Potiowsky, Portland State University	
	Alaska – Dan Stickel, State of Alaska	
	Alberta – Felicia Mutheardy, City of Edmonton	
	British Columbia – Chris Lawless, Mystic Vale Economics	
	Idaho – John Nordstrom, Boise State University	
	Montana – Emily Trautman, Montana Department of Labor and Industry	
	Oregon – Carl Riccadonna, Chief Economist State of Oregon	
	Washington – Dave Reich, Washington State Economic and	
	Revenue Forecast Council	
4:30 PM – 4:45 PM	Closing Ceremonies	

Mark your calendar for PNREC 2026 MAY 18 to May 20 in the Beautiful City of Portland, OR



PNREC Board of Directors

Dr. Hart Hodges, PNREC President, Center for Economic and Business Research, Western Washington University

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Mr. Chris Lawless, Mystic Vale Economics

Dr. Jenny Liu, Portland State University

Dr. Terry Morlan, formerly with the Northwest Power and Conservation Council

Ms. Felicia Mutheardy, Chief Corporate Economist, City of Edmonton

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Mr. Evan Rogers, Oregon Department of Transportation

Dr. Anneliese Vance-Sherman, Washington State Employment Security Department

Dr. Mark Weimar, Argonne National Laboratory





