# ROBERT FONNER robby.fonner@noaa.gov

#### **CURRENT POSITION**

Research Economist (August 2015 – present) NOAA Fisheries Northwest Fisheries Science Center Conservation Biology Division

#### **EDUCATION**

Ph.D. – Economics, University of New Mexico (July 2014)

M.S. – Natural Resource Economics, Water Resources minor, Oregon State University (March 2008)

B.A. – Environmental Studies, Economics, University of Colorado (August 2004)

#### **RESEARCH & PROFESSIONAL EXPERIENCE**

Senior Economist – Oregon Public Utility Commission, Salem, OR, June 2014 – July 2015

**Research Assistant** – University College, University of New Mexico, Albuquerque, NM, January 2012 – May 2012

**Research Assistant** – Science Impact Laboratory for Policy and Economics, University of New Mexico, Albuquerque, NM, August 2010 – August 2011

Economist – Cardno ENTRIX Environmental Consultants, Vancouver, WA, January 2007 – August 2009

**Research Assistant** – Coastal Oregon Marine Experiment Station, Oregon State University, Newport, OR, September 2004 – December 2006

Field Scientist - Colorado Division of Wildlife, Denver, CO, June 2003 - August 2003

### **RESEARCH INTERESTS**

Environmental and natural resource economics,

Protected resources management, Habitat restoration planning, Salmon recovery,

Ecosystem services valuation, Outdoor Recreation, Seafood Marketing

#### **Peer-reviewed articles**

- **R. Fonner,** G.M. Izón, B.E. Feist, and K. Barnas. In press. "Capitalization of reduced flood risk into housing values following a floodplain restoration investment" *Journal of Environmental Economics and Policy*. https://doi.org/10.1080/21606544.2022.2136765.
- B. Van Deynze, **R. Fonner**, B.E. Feist, S.L. Jardine, and D.S. Holland. 2022. What influences spatial variability in restoration costs? Econometric cost models for inference and prediction in restoration planning. *Biological Conservation*, 274, 109710.
- **R. Fonner,** J. Honea, J.C. Jorgensen, M. Plummer, and M. McClure. 2021. "Considering intervention intensity in habitat restoration planning: An application to Pacific salmon" *Journal of Environmental Management*, 229, 113536.
- M. Bellanger, R. Fonner, D.S. Holland, G.D. Libecap, D.W. Lipton, P. Scemama, C. Speir, and O. Thébaud. 2021. "Cross-sectoral Externalities Related to Natural Resources and Ecosystem Services" *Ecological Economics*, 184, 106990.
- **R. Fonner,** M. Bellanger, and A. Warlick, 2020. "Economic analysis for marine protected resources management: Challenges, tools, and opportunities" *Ocean & Coastal Management*, 194, 105222.
- S.H. Munsch, K.S. Andrews, L.G. Crozier, **R. Fonner,** J.L. Gosselin, C.M. Greene, C.J. Harvey, J.I. Lundin, G.R. Pess, J.F. Samhouri, and W.H. Satterthwaite, 2020. "Potential for ecological nonlinearities and thresholds to inform Pacific salmon management" *Ecosphere*, 11(12), e03302.
- M. Bellanger, C. Speir, F. Blanchard, K. Brooks, J.R. Butler, S. Crosson, R. Fonner, S. Gourguet, D.S. Holland, S. Kuikka, B. Le Gallic, R. Lent, G.D. Libecap, D.W. Lipton, P.K. Nayak, D. Reid, P. Scemama, R. Stephenson, O. Thébaud, and J.C. Young. 2020. "Addressing marine and coastal governance conflicts at the interface of multiple sectors and jurisdictions" *Frontiers in Marine Science*, 7, 743.
- **R. Fonner,** A.K. Bohara, and S. Archambault. 2018. "Migration Choices during Conflict in Nepal: Pull forces and landscape interactions" *International Journal of Development and Conflict*, 8(2), 46-61.
- **R. Fonner** and A.K. Bohara. 2017. "Optimal population control of wild horse populations with non-lethal methods" *Land Economics*, 93(3), 390-412.
- J.T. Thorson, **R. Fonner**, M. A. Haltuch, K. Ono, and H. Winker. 2017. "Accounting for spatio-temporal variation and fisher targeting when estimating abundances from multispecies fishery data" *Canadian Journal of Fisheries and Aquatic Sciences*, 74(11), 1794-1807.
- **R. Fonner** and G. Sylvia. 2015. "Willingness to pay for multiple seafood labels in a niche market" *Marine Resource Economics*, 30(1), 51-70.
- **R. Fonner** and R. Berrens. 2014. "A hedonic pricing model of lift tickets for US alpine ski areas: Examining the influence of crowding" *Tourism Economics*, 20(6), 1215-1233.

## **Reports**

- L. Anderson and R. Fonner. 2021. "Economic Survey of Recreational Steelhead Fishers in Washington: Methodology and Survey Results" U.S. Department of Commerce, NOAA Technical Memorandum NMFS-NWFSC-167. https://doi.org/10.25923/gn14-f110
- R. Fonner and A. Warlick. 2018. "Marine Protected Resources on the West Coast of the United States: current management and opportunities for applying economic analysis" U.S. Department of Commerce, NOAA Technical Memorandum NMFS-NWFSC-144. https://doi.org/10.25923/vprp-1507

## Works in progress

- L. Anderson and **R. Fonner**. "Accounting for baseline individual and site characteristics when estimating recreational demand for specialized activities" Resubmitted to *Marine Resource Economics*.
- B. King and **R. Fonner**. "Ecological and social characteristics explain where conservation occurs: Evidence from habitat restoration for Pacific salmon in Puget Sound, USA" Submitted to *Ecology & Society*.

# ACADEMIC CONFERENCE PRESENTATIONS

- **R. Fonner** and L. Anderson. "The effect of management changes on fishing site choice, trip frequency, and angler welfare in a recreational steelhead fishery" oral presentation, North American Association of Fisheries Economists, May 25, 2023.
- B. King (presenter) and **R. Fonner**. "Exploring past salmon habitat restoration efforts in Puget Sound through an equity lens" oral presentation, NWFSC Monster Jam Weekly Seminar Series. April 27, 2023. Virtual.
- **R. Fonner** and M. Bond. "Planning floodplain restoration investments to promote salmon recovery" virtual presentation, American Fisheries Society Annual Meeting. Spokane, Washington, July 21-25, 2022.
- **R. Fonner** and L. Anderson. "Accounting for baselines in recreational demand for steelhead fishing" oral presentation, International Institute of Fisheries Economics and Trade Conference, Vigo, Spain. July 18-22, 2022.
- **R. Fonner.** "Economic concepts and tools for salmon recovery planning" The Workshop on Economic Research for Management of West Coast Salmon, Portland, Oregon, June 15-16, 2022.

**R. Fonner.** "Planning floodplain restoration investments to promote salmon recovery" The Workshop on Economic Research for Management of West Coast Salmon, Portland, Oregon, June 15-16, 2022.

L. Anderson (presenter) and **R. Fonner**. "Assessing dimensions of recreational angling value for hatchery and wild Steelhead in Washington State" The Workshop on Economic Research for Management of West Coast Salmon, Portland, Oregon, June 15-16, 2022.

B. Van Deynze (presenter), S. Jardine, R. Fonner, D. Holland, and M. Scheuerell. "Incorporating cost information and portfolio optimization methods into fish passage planning across Western Washington" The Workshop on Economic Research for Management of West Coast Salmon, Portland, Oregon, June 15-16, 2022.

## ACADEMIC CONFERENCE PRESENTATIONS (cont.)

- B. Van Deynze (presenter), R. Fonner, B. Feist, S. Jardine, and D. Holland. "Econometric Cost Models for Restoration Planning: An Application to Fish Passage Barriers in the Pacific Northwest" Association of Environmental and Resource Economists Summer Conference, June 2-4, 2021. Virtual.
- B. Van Deynze (presenter), **R. Fonner**, B. Feist, S. Jardine, and D. Holland. "The Right Tool for the Job: Evaluating and Enhancing Fish Passage Prioritization Schemes with Geospatial Cost Models" Salmon Recovery Conference, April 27-30, 2021. Virtual.
- B. King (presenter) and R. Fonner. "Ecological and Social Predictors of Salmon Habitat Restoration Efforts in Puget Sound" Nearshore Restoration Summit and Synthesis: Beaches, March 10-11, 2021. Virtual.
- **R. Fonner**, G. Izon, B. Feist (presenter), and K. Barnas. "Are the co-benefits of habitat restoration capitalized into local housing values? Preliminary evidence from large-scale floodplain projects in the Pacific Northwest" oral presentation, Ecological Society of America Annual Meeting, Louisville, Kentucky, August 11-16, 2019.
- **R. Fonner**, G. Izon, B. Feist, and K. Barnas. "The co-benefits of habitat restoration: hedonic models for valuing local ecosystem service benefits" oral presentation, Conference of the International Society for Ecological Economics, Puebla, Mexico, September 10-12, 2018.
- **R. Fonner** and M. Bellanger. "Integrating institutions for marine Protected resources management: The Pacific Northwest salmon context" oral presentation, International Institute of Fisheries Economics and Trade Conference, Seattle, Washington, July 16-20, 2018.
- **R. Fonner**. "Prioritizing habitat restoration for salmon recovery: Cost-effectiveness and beyond" oral presentation, Upper Columbia Science Conference 2018, Wenatchee, Washington, January 24-25, 2018.
- A. Warlick and R. Fonner. "Policy and Management Conflicts Arising from Protected Species Interactions on the US West Coast: A Role for Ecosystem-Based Fisheries Management" poster presentation, Biennial Conference on the Biology of Marine Mammals, Halifax, Nova Scotia, October 23-26, 2017.
- **R. Fonner**. "Targeting ability in west coast groundfisheries" oral presentation, North American Association of Fisheries Economists Forum 2017, La Paz, Mexico, March 22-24, 2017.
- **R. Fonner**. "Emerging issues in marine protected resources management: A role for economics" oral presentation, North American Association of Fisheries Economists Forum 2017, La Paz, Mexico, March 22-24, 2017.
- **R. Fonner** and A.K. Bohara. "Optimal control of wild horse populations with nonlethal methods" oral presentation, Agricultural & Applied Economics Association Annual Meeting, Boston, Massachusetts, July 31-August 2, 2016.
- **R. Fonner**, J. Honea, J. Jorgensen, M. McClure, and M. Plummer. "Prioritizing habitat restoration for endangered salmon: Getting the most bang for your buck" oral presentation, International Institute of Fisheries Economics and Trade Conference, Aberdeen, Scotland, July 11-15, 2016.

# ACADEMIC CONFERENCE PRESENTATIONS (cont.)

- **R. Fonner**, J. Honea, J. Jorgensen, M. McClure, and M. Plummer. "Prioritizing habitat restoration for endangered salmon: Getting the most bang for your buck" oral presentation, Western Forest Economists 2016 Meeting, Seattle, Washington, May 3-4, 2016.
- **R. Fonner** and R. Berrens (presenter). "A hedonic pricing model of lift tickets for US alpine ski areas: Examining the influences of crowding and public land ownership" oral presentation, Southwestern Society of Economists Annual Meeting, Albuquerque, New Mexico. March 12-16, 2013.
- **R. Fonner** and G. Sylvia. "Consumer preferences for seafood information attributes" oral presentation, American Fisheries Society 138th Annual Meeting, Ottawa Canada. August 17-21, 2008.
- **R. Fonner** and G. Sylvia. "Consumer preferences for seafood information attributes" oral presentation, International Institute of Fisheries Economics and Trade Conference, Nha Trang, Vietnam. July 22-25, 2008.

## **ADVISEMENT & HOSTING**

- Mentor, Sydney Schmitter, Hollings Scholar Jun. 2022 Aug. 2022, Co-advised with Lisa Pheiffer and Braeden Van Deynze
- Mentor, Braeden Van Deynze, University of Washington / NWFSC postdoc, Jan. 2020 Feb. 2022, Co-advised with Dan Holland and Sunny Jardine
- Mentor, Brittany King, Oregon State University Ph.D. candidate, NERTO Internship, Sep. 2020 Dec. 2020
- o Host Researcher, Manuel Bellanger, Ifremer, June 2018 June 2019
- o Mentor, Casey Lilley, Middlebury undergraduate, NOAA Summer Internship, June 2017 Aug. 2017

## **GRANT FUNDING**

S. Jardine, **R. Fonner** (Co-PI), D. Holland, M. Scheuerell, B. Van Deynze. "Maximizing returns of investing in barrier culvert removal in Washington State". Feb. 2022 to Jan 2024. Awarded \$385K as part of Washington Sea Grant 2021 Request for Proposals.

## **TEACHING EXPERIENCE**

University of Washington, Seattle, WA **Guest Lecturer** 

- o Stream and Watershed Restoration(FSH 428), Spring 2017, Spring 2019, Spring 2023
- o Applied Microeconomics for Marine Affairs(SMEA 536), Winter 2018

## **TEACHING EXPERIENCE (cont.)**

University of New Mexico, Albuquerque, NM Instructor

- The Economics of Regulation(ECON 332), Spring 2013 (30 students)
- Introduction to Macroeconomics(ECON 105), Fall 2012 (250)
- o Introduction to Microeconomics(ECON 106), Spring 2011(117), Fall 2011 (91), Spring 2012 (59)

#### **Teaching Assistant**

- American Economic Association Summer Training Program, Intermediate Applied Econometrics(ECON 409), Summer 2012
- o Economic Forecasting Methods(ECON 408), Fall 2012
- Statistics and Introduction to Econometrics(ECON 508), Fall 2010
- o Introduction to Microeconomics(ECON 106), Fall 2009, Spring 2013(online)
- o Introduction to Macroeconomics(ECON 105), Spring 2010

#### **ACTIVITIES & AWARDS**

- o Social Sciences Advisory Council to Puget Sound Partnership, 2018 present
- Journal referee service: Aquaculture Economics & Management, Coastal Management, Ecological Economics, Economic Inquiry, Fisheries Research, ICES Journal of Marine Science, Journal of the Association of Environmental and Resource Economists, Land Economics, Leisure Sciences, Marine Policy, Marine Resource Economics, Ocean and Coastal Management, Tourism Economics.
- o Dissertation defense passed with distinction, University of New Mexico, 2014
- o Graduate School Scholarship, University of New Mexico, 2009-2013
- o Alumni Scholarship, University of Colorado, 2000-2003
- o Upper-division coursework in ecology at the University of Otago, New Zealand, 2002