OLIVER ROMAN BROWNE

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SUMMARY

Dr. Oliver R. Browne is an Associate Director in the Economics and Damages Practice at Berkeley Research Group. Oliver is an economist with over ten years of experience. As an expert consultant, Oliver applies economic theory and econometric data analysis to answer clients' questions on environmental, water and energy economics, natural resource damages, and industrial organization.

In his consulting work, Oliver's clients have included public and private utilities, municipalities, state and federal agencies and international institutions. Oliver also advises counsel and parties involved in complex litigation. Oliver's research has covered various sectors, including water, wastewater, electricity, gas, agriculture, and environmental remediation.

Oliver applies a diverse set of economic tools as is appropriate to the client's context and situation. Oliver's approaches frequently include demand estimation, market equilibrium, econometric modeling and forecasting, agent-based simulation, survey methods, and experimental design. Oliver has assisted experts in preparing reports and testimony for regulatory proceedings, litigation, and arbitration in local, state and federal venues.

Before joining BRG, Oliver was a Senior Associate at The Brattle Group, an economic and financial consulting firm in San Francisco. Oliver has taught water resource economics as a lecturer at The University of California, Berkeley, and he has taught computational methods for economists as a lecturer at The University of Chicago. Oliver has published academic papers in outlets including Energy Economics, Energy Policy, and Environmental and Energy Policy and the Economy.

Oliver has a Ph.D. in economics from The University of Chicago and conjoint undergraduate degrees from The University of Auckland with first-class honours in engineering science and economics.

PRESENT EMPLOYMENT

Berkeley Research Group, LLC, Emeryville, CA. Associate Director, 2022 – Present

PREVIOUS POSITIONS

The Brattle Group, San Francisco, CA. Senior Associate, 2022

Curriculum Vitae



Associate, 2018 – 2022

The University of California, Berkeley,

Lecturer

EEP 162 The Economics of Water Resources, Spring 2020

The University of Chicago,

Researcher, Urban Labs - Energy and Environment Lab, 2015 – 2018

Researcher, UChicago Center in Delhi, EPIC-India, 2014

Lecturer, Department of Economics, 2016

ECON 21410 Computational Method in Economics, 2016

Teaching Assistant, 2013 - 2018

Various classes in The Department of Economics and The Booth School of Business

The University of Auckland,

Researcher, The Energy Center, 2010 – 2013

Intern Researcher, Electric Power Optimization Center, 2010

Teaching Assistant, 2010 - 2012

Various classes in The Business School and The School of Engineering

Motu Economic and Public Policy Research

Intern Researcher, 2011 – 2012

Mighty River Power Limited, Hamilton

Intern Water Resource Engineer, 2008 – 2009

EDUCATION

The University of Chicago

Ph.D. in Economics, 2018

Dissertation: Essays on the Economics of Agricultural and Residential Water

Management

Supervisors: Michael Greenstone; Thomas Covert; Richard Hornbeck; Koichiro Ito.

Fields: Applied Microeconomics; Industrial Organization; Environment and Resource

Economics

M.A. in Economics, 2018

The University of Auckland

B.A. (Honours) with First Class Honours in Economics, 2011

Thesis: Optimal Emissions of Greenhouse Gasses Under Stochastic Catastrophe Risk

B.A./B.E. (Honours) with First Class Honours in Engineering Science, 2010

Thesis: Simulating the Hydraulic Stimulation of Geothermal Wells.

Senior Prize in Economics.

The University of Hong Kong

Exchange Student, 2010



PUBLICATIONS

ARTICLES

- (1) "Do Conservation Policies Work? Evidence from Residential Water Use." (2021) Environmental and Energy Policy and the Economy. Vol 2. University of Chicago Press. with Gazze, L and Greenstone, M.
- (2) "ICT Use in the Context of Electricity Access in a Developing Country: A Choice Framework Analysis." (2019) *International Conference on Social Implications of Computers in Developing Countries.* Springer. with Bailey, A., Henry-Lee, A., Johnson-Coke, Y., Leach, R., Clayton, A. and Gee, M.
- (3) "How Does Market Power Affect the Impact of Large-Scale Wind Investment in Energy-Only Wholesale Electricity Markets?". (2015) Energy Policy. with Poletti, S., and Young, D.
- (4) "Can Agent-Based Models Forecast Spot Prices in Electricity Markets? Evidence From the New Zealand Electricity Market". (2014) *Energy Economics*. with Poletti, S., and Young, D.
- (5) "Simulating Market Power in the New Zealand Electricity Market." (2012) New Zealand Economic Papers. with Poletti, S., and Young, D.
- (6) "A Critique of Wolak's Evaluation of the NZ Electricity Market Afterword: A Rejoinder." (2012) New Zealand Economic Papers. with Poletti, S., and Young, D.

WORKING PAPERS

- (1) "Man vs. Machine: Technological Promise and Political Limits of Automated Regulation Enforcement." (2022) with Gazze, L., Greenstone, M. and Rostapshova, O.
 - R&R at Review of Economics and Statistics
- (2) "The Economic Value of Clarifying Property Rights: Evidence from Water in Idaho's Snake River Basin." (2021) with Ji, J.
 - R&R at the Journal of Environmental Economics and Management
- (3) "A Revealed Preference Approach for Estimating the Value of Improved Water Quality." (2021) with Sunding, D. and Razavian, N.
- (4) "Climate Change and the Value of High-Frequency Flood Risk on Agricultural Land." (2021) with Dunkle-Werner, K., Neidhardt, N. and Sunding, D.
- (5) "Synergies Between Regulating Interdependent Pollutants: A Simulation of Concurrent Environmental Markets in New Zealand." (2022) *Environmental Defense Fund Working Paper*. with Yeo, B.L., Anastasiadis, S. and Kerr, S.
- (6) "Optimal Emissions of Greenhouse Gasses Under Stochastic Catastrophe Risk." (2011) University of Auckland Honours Thesis.

REPRESENTATIVE CONSULTING ENGAGEMENTS

- Authored report that estimated the value of water supply reliability to residential, commercial, and industrial customers in Orange County (Municipal Water District of Orange County, 2022).
- Authored report on the economic impact of water shortages in the East Bay Municipal Utility District service area (East Bay Municipal Utility District, 2021).

Curriculum Vitae



- Authored report forecasting water demand in the City and County of San Francisco (San Francisco Public Utility District, 2021).
- Authored memo recommending assumptions to forecast water demand in Southern California under different planning scenarios (Metropolitan Water District of Southern California, 2021).
- Advised counsel on the valuation of a right-of-way of an electrical transmission line.
- Advised counsel on damages from the sale of grapevine rootstock inflected with red blotch.
- Advised counsel on the changes in gas composition within a pipeline network and the associated economic costs to customers.
- Supported an expert through multiple reports and depositions in multiple matters regarding the costs and benefits to cities of complying with Clean Water Act standards.
- Supported an expert through multiple reports and depositions in multiple matters concerning the impacts of PFAS contamination on property values, health, and amenity values.
- Supported an expert through multiple reports and depositions in multiple matters concerning the impacts of PCB contamination on fish consumption rates.
- Supported an expert through multiple reports and depositions concerning impacts on the State of Texas of New Mexico's non-compliance with the Rio Grande Compact.
- Supported an expert through multiple reports and depositions in multiple matters on the economic impacts of the use of soil fumigants in the agricultural sector.
- Supported an expert in producing a rebuttal report and trial testimony on the impact of changes in federal flood control operations on the value of land adjacent to the Missouri River.
- Supported an expert in producing a report and oral testimony on the economics of groundwater recharge in the Tulare Lakebed.
- Supported an expert through report and deposition damages resulting from breach of federal water supply contracts.
- Supported an expert in authoring report analyzing the economic impacts of the Sustainable Groundwater Management Act.
- Developed and implemented a pilot program to evaluate the impact of using smart meters to enforce outdoor water-use restrictions (City of Fresno, 2017).
- Evaluated the impact of water conservation programs based on a statistical analysis of household-level water meter data (City of Fresno, 2016).
- Developed and implemented a baseline survey of electricity use in low-income neighborhoods in Kingston, Jamaica (World Bank and Jamaica Public Service Company, 2015).

PROFESSIONAL AWARDS, RECOGNITION, AND PRIZES

- Energy Policy Institute at Chicago / Fuel Freedom Foundation Doctoral Fellowship, 2017-2018
- Francis W. Immasche Endowment Fund Dissertation Fellowship, 2017-2018
- University of Chicago Social Science Fellowship, 2012-2017
- University of Auckland Senior Prize in Economics, 2010
- Energy Education Trust of New Zealand Honours Scholarship, 2010

Curriculum Vitae



BECA Engineering in Society Scholarship, 2006

ACADEMIC PEER REVIEW

- Economic Modelling
- Energy Economics
- Journal of Environmental Economics and Management
- Journal of Public Economics
- Water Resources and Economics

PROFESSIONAL SERVICE

 Water Demand Study Stakeholder Working Group Member (Bay Area Water Supply and Conservation Agency, 2022)

PROFESSIONAL ASSOCIATIONS

- Association of Environmental and Resource Economics
- New Zealand Association of Economists
- Water Education Foundation Water Leaders Program (Class of 2021)
- American Bar Association Environment, Energy and Resources Section (Affiliated Professional)