Angela Zeng, Associate

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PROFESSIONAL EXPERIENCE

Synapse Energy Economics, Cambridge, MA. *Associate*, August 2023 - Present.

- Conducts research and provides consulting on energy sector issues as well as conducts analysis to evaluate energy efficiency programs and policies.

Synapse Energy Economics and Climable, Cambridge, MA. *Energy Justice Intern*, May 2022 – Feb 2023.

- Evaluated qualitative survey data to inform technical study on the potential of solar in Massachusetts.
- Analyzed U.S. Census tract data to inform environmental justice analysis.
- Conducted research on renewable portfolio standards (RPS) to validate Excel-based model.
- Supported stakeholder workshops by summarizing discussions and disseminating insights to participants.

Duke University Nicholas School of the Environment, Durham, NC. *Graduate Research Assistant*, September 2021 – April 2022.

- Analyzed the impact of drought on the methane emissions of coastal wetlands.
- Conducted statistical analyses using R (linear models, generalized additive model) to determine relationships between methane flux, precipitation, groundwater table level, and temperature over multiple years.
- Ran random forest regressions in Python to determine importance of explanatory variables in predicting methane flux.

Cornell University Energy and Sustainability, Ithaca, NY. *Energy and Economic Analyst*, January 2021 – July 2021.

- Worked closely with the Associate Vice President of Energy and Sustainability to prepare a lifetime economic analysis of the lake source cooling facility at Cornell University that was published as the cover article in the International District Energy Association's District Energy Magazine in Jan. 2022.
- Assessed 20 years' worth of data, using Excel, on electricity usage and costs and to predict the cost of the business-as-usual case, using conventional chillers.
- Compared energy costs, operating costs, capital expenditures, and debt service between lake source cooling and conventional chillers to determine savings. Results were used to

analyze the accuracy of the initial cost benefit analysis used to inform the decision to build the lake source cooling facility.

Cornell University Dyson School, Ithaca, NY. *Undergraduate Research Assistant*, October 2020 – April 2021.

- Conducted literature review on how the costs of treating drinking water will vary with nitrate and phosphorus concentrations as a part of a larger goal to determine the social cost of nutrient pollution.
- Replicated a predictive model from an empirical paper using Stata, which would be applied on baseline nitrogen data.

EDUCATION

Duke University, Durham, NC
Master of Environmental Management – Specialization in Environmental Economics, 2023

Cornell University, Ithaca, NY
Bachelor of Science in Environment and Sustainability with a concentration in Environmental Economics, 2021

SKILLS

Excel, R, Python, Stata, ArcGIS, Proficient in Mandarin and Cantonese

Resume updated August 2023