

Nan Zhou, Ph.D.

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Education and Training:

Institution	Major	Degree	Year
Xi'an University of Architecture and Technology, Xi'an, China	Engineering in Architecture	Bachelor's	1993
Kyushu University, Fukuoka, Japan	Engineering in Architecture	Master's	1996
Kyushu University, Fukuoka, Japan	Engineering in Architecture	Ph.D.	1999

Research and Professional Experience:

- 2014-present ***Staff Scientist, China Energy Group, Energy Analysis & Environmental Impact Department, Lawrence Berkeley National Laboratory, Berkeley, California.*** Principal investigator and lead of Low Carbon City Program, develop guidebooks and tools for local governments in China and provide trainings on low carbon city and ecocity development; Principle investigator and lead for Long Term Energy and Emission Modeling Program , develop the bottom-up end use model and conduct scenario analysis out to 2050, and develop application of the model to assess the current energy situation and policy evaluation; Principle Investigator and program lead for China Building Policy and Technology Program, conduct building efficiency policy analysis, develop methodologies for assessment of co-benefit of energy efficiency measures, and conduct cost effectiveness analysis of building technologies; Principle Investigator and lead for China Appliance Efficiency Program, provide technical assistance in development, enforcement, and evaluation of the appliance standard and labeling program in China.
- 2012-present ***Director, U.S.-China Clean Energy Research Center (CERC) – Building Energy Efficiency.*** Lead and manage 5-year, \$25-million-dollar intergovernmental program initiated by presidents of U.S. and China; Lead portfolio structuring and development of strategic plans and priorities to meet U.S. Department of Energy goals; manage 14 projects performed by 7 institutions and 8 industry partners in the U.S.; coordinate with key stakeholders including U.S. DOE, Ministry of Housing and Urban-Rural Development in China, an Industrial Advisory Board, and a Technical Advisory Board.
- 2012-present ***Deputy Group Leader, China Energy Group, Energy Analysis & Environmental Impact Department, Lawrence Berkeley National Laboratory, (LBNL) Berkeley, California.*** Work closely with group leader to sustain and promote group growth; assist in managing 15 career staff and an average of 10 visitors each year; help to raise and manage \$5 million budget; perform outreach by actively making presentations and connections outside of the group and LBNL; ensure high-quality group work and satisfaction of funders.
- 2011-present ***Deputy Director, U.S.-China Clean Energy Research Center – Building Energy Efficiency.*** Provided input on strategic planning and marketing activities; advised on resource allocation, budget management, annual management meeting plans, conferences, reports to DOE, and policy and personnel actions; represented CERC at conferences, workshops, research review panels, and other meetings; identified and assigned research reviews; assured excellent performance and timely completion of all CERC program elements.
- 2009-2013 ***Scientist, China Energy Group, Energy Analysis & Environmental Impact Department, Lawrence Berkeley National Laboratory, Berkeley, California.*** Conduct research on energy and emission modeling, energy efficiency for appliances, industry and buildings, microgrid,

- and policy analysis. Developed guidebooks and tools for local governments in China on low carbon city and ecocity development; assessed the current energy situation in China and forecast the energy future outlook to 2050; provided technical assistance in development, enforcement, and evaluation of the appliance standard and labeling program in China
- 2007-
2009 **Staff Research Associate, China Energy Group, Energy Analysis Department, Lawrence Berkeley National Laboratory, Berkeley, California.** Performed research on China's capacity to evaluate, adopt, and implement low-carbon development strategies; analyzed world energy demand scenarios to provide essential demand-side information for energy use and greenhouse gas emissions evaluations. Performed research on appliance energy efficiency, industrial energy efficiency, and policy.
- 2005-
present **Honorable Professor, Department of Architecture, Shenyang University of Architecture and Technology, Liaoning, China.** Instruct graduate students on sustainable building design and energy-efficient building technologies.
- 2004-
2007 **Postdoctoral Fellow, China Energy Group, Energy Analysis Department, Lawrence Berkeley National Laboratory, Berkeley, California.** Performed research to support China's capacity to evaluate, adopt, and implement low-carbon development strategies; created and analyzed world energy demand scenarios to provide essential demand-side information for energy use and greenhouse gas emissions evaluations; collected and analyzed building energy consumption data.
- 2003-
2004 **Visiting Scholar, Energy Analysis Department, Lawrence Berkeley National Laboratory, Berkeley, California.** Researched comparative potential of distributed energy systems in U.S and Japanese buildings.
- 2002-
2004 **Assistant Professor, Department of Environment and Building Design, University of Kitakyushu, Kitakyushu, Japan.** Taught courses in architectural design and building environmental engineering. Research focused on: combined heat and power application in buildings; potential energy savings, emission reductions, thermal environment, and other energy implications of roof-cooling technologies.
- 2001-
2004 **Visiting Researcher, Waseda University, Tokyo, Japan.** Participated in research on energy conservation and the environment. Studied network of existing heat supply businesses in Tokyo Station area.
- 2002 -
2004 **Lecturer, Department of Architecture, Kyushu Sangyo University, Fukuoka, Japan.** Taught courses in architectural design and building environmental engineering.
- 1999-
2002 **Assistant Professor, Department of Architecture, Kyushu Sangyo University, Fukuoka, Japan.** Taught building environmental engineering, including potential for renewable energy and water conservation in residential buildings in Japan, energy savings in passive housing in China, and other building energy conservation topics.
- 1997 -
1999 **Teaching Assistant, Department of Architecture, Kyushu Sangyo University, Fukuoka, Japan.** Taught architectural design.

Publications:

1. Mendes, G., Feng, W., Stadler M., Steinbach, J., Lai J., **Zhou, N.**, Marnay., C., Ding, Y., Zhao, J., Tian., Z., Zhu, N., 2014. Regional Analysis of Building Distributed Energy Costs and CO2 Abatement: A U.S. - China Comparison, *Energy & Buildings* 77C, pp. 112-129
2. Zhao, Y., Ke, J., Ni, C., McNeil, M., Khanna, **N.Z, Zhou, N.**, Fridley, D., Li. Q., 2014. "A comparative study of energy consumption and efficiency of Japanese and Chinese manufacturing industry". *Energy Policy*, vol.70, pp. 45-56.

3. Romankiewicz, J., Marnay C., **Zhou, N.**, and Qu M.. "Lessons from international experience for China's microgrid demonstration program."Energy Policy 67, (2014).
4. **Zhou, N.**, Khanna N.,, Feng, W., Hong L., Fridley D., Crets, J., Franconi, E., Torbert, R., Ke, Y. "Cost-Effective Options for Transforming the Chinese Building Sector", Proceedings of the American Council for an Energy Efficient Economy (ACEEE), Summer Study 2014.
5. Price, L., **Zhou, N.**, D. Fridley, H.Y. Lu, L.X. Hong, C. Fino-Chen, J. Ke, S. Ohshita, H. Min, Y. Zhou. (2014). "Energy-Efficiency and Greenhouse Gas Mitigation Policy Options: Assisting Chinese Cities in Prioritizing and Choosing Strategies." Proceedings of the American Council for an Energy Efficient Economy (ACEEE), Summer Study 2014.
6. Feng, W., Huang, K., Zhang S., Levine, M., **Zhou, N.** "Evaluation of Energy Savings of the New Chinese Commercial Building Energy Standard", Proceedings of the American Council for an Energy Efficient Economy (ACEEE), Summer Study 2014.
7. Hong L., **Zhou N.**, Fridley D., Feng W., and Khanna N., "Modeling China's building floor-area growth and the implications for building materials and energy demand," Proceedings of the American Council for an Energy Efficient Economy (ACEEE), Summer Study 2014.
8. He, G., **Zhou, N.**, Hong, L., Fridley, D., Zhou, Y., 2014. "Is Your City Really Sustainable? A Tale of Jinan City Using Quantitative Low-Carbon Eco-city Tools". Proceedings of the American Council for an Energy Efficient Economy (ACEEE), Summer Study 2014.
9. Ohshita, S.B., **Zhou, N.**, Price, L., Fridley, D., Khanna N.Z., Hong, L., Lu, H., Fino-Chen, C., He. G.. (2014, accepted, in press). "Low Carbon Development for Cities: Methods and Measures." Chapter in Vol. 6 'Sustainability of Energy Systems' in the Handbook of Clean Energy Systems. To be published by Wiley in 2014.
10. Khanna N.Z., Romankiewicz J., Feng W. and **N. Zhou**. 2014. "Comparative Policy Study for Green Buildings in U.S. and China." Berkeley, California: Lawrence Berkeley National Laboratory. LBNL-6609E.

Synergistic Activities:

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| 1. China Green Building Council (China GBC) Committee Member | 2015-present |
| 2. Co-Chair, 2016 Buildings Summer Study of American Council for an Energy Efficient Economy (ACEEE). | 2014-2016 |
| 3. Member, The Balaton Group | 2014- present |
| 4. Committee member of Editorial Committee of Science and Management Journal | 2014-present |
| 5. Committee Member, Architectural Institute of Japan Energy Consumption and Habitats in China's Residences | 2002-present |