

SEBASTIAN RENNER

CONTACT INFORMATION	University of Hamburg Department of Economics Von-Melle-Park 5 20146 Hamburg, Germany <i>E-mail:</i> sebastian.renner@uni-hamburg.de Website: https://sebastian-renner.github.io
RESEARCH INTERESTS	Environmental and Development Economics & Policy, Science-Policy Interface, Sustainability Transformations, Climate Economics, Causal Inference, Replication Studies
EDUCATION	University of Goettingen <i>Ph.D. Economics (Summa cum laude), 2017</i> Poverty, Inequality and the Decarbonization of Economic Development Free University Berlin <i>M.A. / Diplom in Economics, 2010</i> University of California, San Diego <i>Visiting Student, 2007/2008</i>
CURRENT POSITION	University of Hamburg <i>Research Associate, since 04/2023</i> Principal Investigator: Multiple Impacts of Energy Efficiency School Rehabilitation in Georgia (MultEER); with KfW and EBRD, funded by BMZ
PREVIOUS POSITIONS	University of Hamburg <i>Visiting Professor (Vertretungsprofessor), 10/2024-03/2025</i> Teaching: Sustainability Economics, Empirical Environmental Economics, Economics of Climate Change Mercator Research Institute on Global Commons and Climate Change (MCC) <i>Researcher, 2020-2023</i> Mobilizing Domestic Resources for Sustainable Development in Indonesia, funded by BMZ Carbon Pricing Design, Economic and Distributional Impact Analysis for the Fiscal Policy Unit (BKF), Ministry of Finance of Indonesia University of Goettingen/GIGA <i>Postdoctoral Researcher, 2016-2020</i> DFG Collaborative Research Center: Ecological and Socioeconomic Functions of Tropical Lowland Rainforest Transformation Systems (Sumatra, Indonesia) German Institute for Global and Area Studies (GIGA) <i>Research Fellow, 2011-2020</i> Climate Change Mitigation and Poverty Reduction, funded by Volkswagen Stiftung, with University of Cape Town (South Africa), National Institute of Development Administration (Thailand), Chiang Mai University (Thailand), Monterrey Institute of Technology and Higher Education (Mexico) and Fondazione Eni Enrico Mattei (Italy)

Decarbonization in Low- and Middle Income Countries, funded by BMBF, with PIK and University of Goettingen

AFFILIATIONS

Environment for Development (EfD)

International Associate, since 05/2020

Emission Pricing for Development (EPFD)

German Institute for Global and Area Studies (GIGA)

Associate Research Fellow , since 05/2020

WORKING PAPERS

Coal-fired Power Plants and Industrial Development, R&R at Journal of Development Economics

with Leonard Missbach, Jan Steckel and Sebastian Kraus

Energy Subsidy Reform and Manufacturing Firm Performance: Evidence from Indonesia

with Krisztina Kis-Katos

Energy Prices, Generators, and the Performance of Manufacturing Firms, with Hannes Greve and Krisztina Kis-Katos

Data Gaps, Targeting Transfers and the Incidence of Carbon Pricing in Indonesia, with Djoni Hartono, Jan Steckel and Arief A. Yusuf

WORK IN PROGRESS

Shock Propagation in Global Supply Chains; with Bastian Westbrock and Maarten Bosker

Land Use Change, Land Markets and Ecosystem Services in Indonesia, with Sebastian Fiedler, Kerstin Wiegand and Jann Lay

JOURNAL PUBLICATIONS

Renner, S., Ruml, A., Lakemann, T., Nuryartono, N., Tjoa, A., Corre, M. D., & Lay, J. (2024). Smallholder RSPO certification, economic benefits and agrochemical use. *Environmental Research Letters*, 19(11), 114093. <https://doi.org/10.1088/1748-9326/ad8367>

Pavanello, F., De Cian, E., Davide, M., Mistry, M., Cruz, T., Bezerra, P., Jagu, D., Renner, S., Schaeffer, R., & Lucena, A. F. P. (2021). Air-conditioning and the adaptation cooling deficit in emerging economies. *Nature Communications*, 12(1), 6460. <https://doi.org/10.1038/s41467-021-26592-2>

Steckel, J. C., Dorband, I. I., Montrone, L., Ward, H., Missbach, L., Hafner, F., Jakob, M., & Renner, S. (2021a). Distributional impacts of carbon pricing in developing Asia. *Nature Sustainability*, 4(11), 1005–1014. <https://doi.org/10.1038/s41893-021-00758-8>

Renner, S., Lay, J., & Schleicher, M. (2019). The effects of energy price changes: Heterogeneous welfare impacts and energy poverty in Indonesia. *Environment and Development Economics*, 24(2), 180–200. <https://doi.org/10.1017/S1355770X18000402>

Renner, S. (2018). Poverty and distributional effects of a carbon tax in Mexico. *Energy Policy*, 112, 98–110. <https://doi.org/10.1016/j.enpol.2017.10.011>

Renner, S., Lay, J., & Greve, H. (2018). Household welfare and CO2 emission impacts of energy and carbon taxes in Mexico. *Energy Economics*, 72, 222–235. <https://doi.org/10.1016/j.eneco.2018.04.009>

Jakob, M., Steckel, J. C., Klasen, S., Lay, J., Grunewald, N., Martínez-Zarzoso, I., Renner, S., & Edenhofer, O. (2014). Feasible mitigation actions in developing countries. *Nature Climate Change*, 4(11), 961–968. <https://doi.org/10.1038/nclimate2370>

BOOK CHAPTERS

Neff, D., Haasnoot, C. W., Renner, S., & Sen, K. (2019). The social and economic situation of Scheduled Tribes in India. In *Routledge Handbook of Indigenous Wellbeing* (pp. 194–208). Routledge. <https://doi.org/10.4324/9781351051262>

NON-REFEREED PUBLICATIONS & POLICY BRIEFS

Steckel, J. C., Renner, S., & Missbach, L. (2021b). Distributional Impacts of Carbon Pricing in Low-and Middle-Income Countries. *CESifo Forum*, 22(05), 26–32.

Lay, J., & Renner, S. (2016). Not on the “Paris Track”: Climate Protection Efforts in Developing Countries. *GIGA Focus Global*, 8, 14.

Renner, S., & Lay, J. (2012). Brasilien und Mexiko: Entwicklung auf Kosten des Klimawandels? *GIGA Focus Lateinamerika*, 6, 9.

PROFESSIONAL EXPERIENCE

United Nations University World Institute for Development Economics Research (UNU-WIDER)

Investigator, 2026

Taxes, subsidies, and the environment project, part of UNU-WIDER Domestic Revenue Mobilization (DRM) programme

RWI / Institute for Replication

Investigator/Replicator, 2024/2025/2026

Robustness and Reproducibility in Economics (R2E)

KfW Development Bank

Short Term Consultant, 2020

Ex-post Evaluation of Energy Efficiency Infrastructure Project in Bangladesh

Agence Française de Développement (AFD)

Short Term Consultant, 2019

Managing Distributional Impacts of Carbon Taxes in Colombia

Euro-Mediterranean Center on Climate Change (CMCC) and Ca'Foscari University of Venice

Consultant, 2018-2020

ENERGYA - Energy Use For Adaptation

World Bank

Short Term Consultant, April - June 2013

Development Economics Prospects Group

Short Term Consultant, June 2012

Economic Policy Group, Latin America and the Caribbean Region

Short Term Consultant, February - April 2012
Development Economics Prospects Group

BC3 Basque Centre for Climate Change
Visiting Researcher, September - November 2012

RECENT
TEACHING

Sustainability Economics
University of Hamburg – Winter 2024/25

Empirical Environmental Economics
University of Hamburg – Winter 2024/25

Economics of Climate Change
University of Hamburg – Winter 2024/25

RESEARCH
GRANTS

DEval Rigorous Impact Evaluation / Federal Ministry for Economic Cooperation and Development (BMZ), Multiple impacts of energy efficiency school rehabilitation in Georgia (MultEER)

Federal Ministry of Education and Research Germany (BMBF), De-Carbonizing Economic Development in Sub-Saharan Africa (DeCaDe), 2018, with Jan Steckel, Michael Jakob, Jann Lay, Joerg Peters

PROFESSIONAL
ACTIVITIES

Referee: Journal of Development Economics, Journal of Environmental Economics and Management, Nature Climate Change, Nature Sustainability, Review of Income and Wealth, Energy Economics, Nature Aging, Environment and Development Economics, Energy Policy, Climate Policy, Energy Research & Social Science, Agricultural and Food Economics, One Earth, Energy Efficiency, Technological Forecasting & Social Change, Inter-American Development Bank Working Paper Series, Utilities Policy

Thesis supervision: Master theses in MSc Development Economics and MSc International Economics (12x), University of Göttingen; Bachelor and Master theses at University of Hamburg, integrated into ongoing research projects