

A Call for Social Justice-Related Research in Agricultural, Environmental, and Natural Resource Economics

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We all want to live in a just society. Justice comprises not just questions of distribution but also elements such as participation and recognition (Schlosberg, 2004). Many academic and government economists have worked toward this goal by bringing their expertise to bear on topics related to fairness and inequality. For example, agricultural economists have made important contributions to understanding poverty, hunger, public health, and rural wellbeing. Many of these contributions have been documented in this magazine (Pender, Weber, and Fawbush, 2012; Rupasingha, 2014; Ahearn, 2016). However, injustice continues to persist, and certain groups—including low-income communities, people of color, and some people from immigrant backgrounds—face unfair barriers and historical burdens that demand more scholarly attention (Advani et al., 2021; Darity, Mullen, and Slaughter, 2022; Logan and Myers, 2022).

The social justice movement of 2020 saw many people spurred into action by the unjust killing of George Floyd and other Black Americans; many scholars felt the imperative and ripple effects of this call to action as well (Kolodinsky and Tobin, 2021; Spriggs, 2020; Ando et al., 2024). Issues of social justice (i.e., of the fair treatment of all members of society) remain just as urgent today, although they may be less salient as the news items of 2020 fade from public focus. We demonstrate in this article that agricultural, environmental, and natural resource economists are positioned to help right the wrongs that make our societies less just, and we offer some practical suggestions to help economists pursue this work in a way that is rigorous and that gives attention to the justice implications of the process of scholarly work itself.

The ideas we present here are an outgrowth of a convening inspired by the social justice movement of 2020. In 2021, one of the authors of the current article (Miesha Williams) co-guest edited (with Angelino

Viceisza) a special issue of the *Agricultural and Resource Economics Review* (Volume 50, Issue 3, December 2021) titled “Social Justice in Agricultural and Environmental Economics” (Viceisza and Williams, 2021), featuring seven thought-provoking articles about issues as wide-ranging as the impact of violent conflict on farm labor, access to grocery stores in urban settings, and how local demographics affect reporting on Superfund sites. At the 2022 annual meeting of the Northeastern Agricultural and Resource Economics Association (NAREA), the editors and several of the authors participated in sessions centered around research on social justice issues in agricultural, natural resource, and environmental economics and related fields. There was a tremendous amount of interest from attendees who wished to get involved with research on topics of this type, including at a packed-room plenary session.

We use four articles from the special issue as case studies that can be instructive to scholars considering this kind of work: Ware et al. (2021) on food justice, Odozi and Oyelere (2021) on conflict and farm labor, Durfee et al. (2021) on impacts of the minimum wage on racial differences in obesity, and Mohr et al. (2021) on Superfund sites. We use these four studies to provide examples of how social justice issues are embedded in topics economists already study and draw lessons from each about the challenges and opportunities presented by justice-centered research. We then discuss limitations in and sources of funding for research agendas in these areas.

Lessons from Four Studies

Study 1: Access to Food in Seattle

A trip to the grocery store is one of the most basic functions of modern life, and food access is essential to ensuring good health. However, for many, especially those in disadvantaged communities, buying food is a

major chore, involving traffic or public transportation, long lines, sporadic service, unsanitary conditions, and poor food selection. Because of limited access to grocery stores, many households in racially diverse areas lack access to healthful food and must rely on inexpensive processed food with low nutritional value. This is a social justice issue because geographic separation between communities of color and the resources they need can compound existing disadvantages, especially when limited public infrastructure further increases barriers. Finding the socioeconomic factors that affect access at a fine-grained geographic level is difficult. Ware et al. (2021) address this issue in Seattle, Washington, carefully measuring locations of both families and stores and focusing on differences in access across non-White racial groups. They find that different racial and income groups face different degrees and types of barriers to access to healthy food suppliers.

One key lesson from this work is the importance of precise spatial data for justice-related analysis, although this data may not always be available off the shelf. Another is that the experiences of different people from different identity groups vary tremendously, so it is important to disaggregate impacts across subgroups whenever possible. This study also informs needs for future food economics research informed by a lens of social justice. There is a critical link between social justice and broad-based economic growth in communities that are at high risk of gentrification, which may fuel displacement of vulnerable families and further drive disparities in access to healthful food and wellbeing. However, little is known about how different types of food retailers respond as gentrification progresses. This study shows that the composition of racial and income subgroups matters for policy insights. Surprisingly, the inflated costs facing those subgroups are seldom questioned when a gentrification plan begins. Therefore, policies should be more responsive, as well as proactive, in providing a guiding principle to addressing social justice issues (e.g., food costs, housing shortages, housing affordability, economic and political power) that are created from gentrification.

Study 2: Conflict and Smallholder Agriculture in Nigeria

Nigeria is a world away from Seattle but also faces challenges scholars from our field can study. The country is often called the “Giant of Africa” because of its massive population, but it struggles with both poverty and internal violent conflict. Indeed, over 70 million Nigerians live below the poverty line, and that number has grown in recent years. Nigeria relies heavily on its agricultural sector, which employs an estimated 38% of its labor force (International Labour Organization, 2024). Smallholder farm households are vulnerable to shocks that can plunge them into poverty; at the same time, many of these farmers live in rural areas subject to significant sporadic violence. This is a justice issue

because these violent conflicts have disparate and heterogeneous effects on disadvantaged rural communities. Odozi and Oyelere (2021) study the impact of violent conflicts on labor supply by these smallholder farm households in Nigeria, showing that violence causes significant reduction in family labor supply in agriculture. They also note heterogeneous effects across household members, with household heads being most negatively impacted.

This study offers additional lessons for scholars who do social justice research. First, while field work in Nigeria was essential for the collection of the data used in the study, the authors encountered significant challenges in completing the research because of basic infrastructure issues such as consistent power supply and access to affordable and reliable high-speed internet for the local scholar. The lack of these services hampers communication, which is pivotal for collaborative research efforts. Second, for a study like this to be done in a respectful and inclusive way, which is key to embodying social justice in the work itself, government buy-in must be obtained. Sometimes that can be challenging, especially when research findings have political ramifications. The study also informs future work that could contribute to social justice in the region: There is a need for more comprehensive research on the evolution of poverty and economic inequality in Nigeria and the potential heterogeneity of burdens across gender and region. The findings from this study have implications for policy. First, there is a need for targeted labor market policy initiatives geared toward household heads in agricultural households, given the noted heterogeneous effects of conflict on labor supply. Further, since the effects of violent conflict are long-lasting, creating injustice for years after the event, there is a need for creative solutions that start with a recognition of the preexisting harm that must be mitigated.

Study 3: Contextual Factors in Health Disparities in Minneapolis

Returning to the United States, we find another setting in which careful analysis reveals concerning disparities. In 2017, the Minneapolis City Council became the 40th local jurisdiction in the country to raise the minimum wage above state levels. Local policy evaluation can offer evidence of impact that could support identification and broader adoption of policies that contribute to social policy goals. An interdisciplinary team seeks to study whether the Minneapolis Minimum Wage Ordinance has impacts on the community’s health, treating the policy change as a natural experiment. These scholars collect a detailed panel dataset to understand heterogeneous impacts and causal mechanisms of the minimum wage increase on obesity and other health-related outcomes. However, Durfee et al. (2021) dig into startling patterns in the baseline data to analyze the degree to which race and gender disparities are explainable by contextual factors. The need to attend to contextual factors became

even more salient in subsequent waves of this data, which spanned a time period in which the COVID pandemic started to unfold and the murder of George Floyd by Minneapolis police officers sparked widespread protests and had long-lasting effects.

A key lesson from this study is the importance of baseline data collection for causal analysis in policy evaluations, especially given the complicated environment in which policies and social dynamics often unfold. This requires ongoing attention to local policy, the nimble assembly of a research team, and sufficient funding. Like the two studies we described in the preceding subsections, this research shows the importance of primary data collection, without which these disparities and their drivers could not have been studied. Moreover, subsequent analyses in this particular study have demonstrated unexpected trends in study measures, such as a decline in food insecurity, that cannot be attributed solely to minimum wage policy but are more likely driven by the events that unfolded during the ensuing period (Caspi et al., 2023). The policy implications are that a range of economic supports at both the federal and local levels, including food assistance program expansion and housing assistance, were necessary for people to weather such a profound crisis. This further demonstrates the need for advanced analytical methods and broad interpretive lenses that incorporate the larger social context into social justice research.

Study 4: Newspaper Coverage of Superfund Sites

The last study we feature highlights how the role of institutions like the media in social justice issues can be studied. The Stringfellow Acid Pits, located in an ethnically diverse area northwest of Riverside, California, was among the first sites to be added to the Superfund National Priority List (NPL) in 1983. Liquid waste disposal ponds at the site overflowed and contaminated ground and surface water over several miles. While the site was mentioned in print media more than any other NPL site of its time, nearly all this attention related to a political scandal rather than the contamination itself. Major newspapers ignored the extent to which pollution affected private drinking wells in a disproportionately Hispanic community. This is in contrast to the experience of the blue-collar town of Times Beach, Missouri, which faced its own environmental catastrophe during the same time period. In Times Beach, dioxin-laced waste oil contaminated soil and groundwater. Like Stringfellow, the site was added to the NPL and received extensive media attention. In this case, however, the plight of individual victims, almost all of whom were White, received coverage in newspaper articles. Mohr et al. (2021) use both quantitative and qualitative methods to study the print media during the period in which Superfund sites like Stringfellow and Times Beach were first designated to the NPL. This work shows that the media can work against social justice by failing to tell the

stories of disadvantaged communities burdened by environmental harms.

One lesson of this study is that qualitative and quantitative approaches can be used in combination to offer insight with regard to social justice issues. Qualitative research, like engaging with textual sources, is outside the expertise of most economists. Additional training, application of machine learning, and cross-disciplinary collaboration are all ways in which economists can apply analysis of textual data to social justice. In terms of policy, this work highlights how the print media disseminates and amplifies information provided by regulators. Prior work finds that newspaper coverage of NPL sites affects housing prices and spurs community mobilization. Mobilization, in turn, affects both cleanup duration and remedy selection, with an increased emphasis on health protective forms of remediation, like source treatment, rather than containment alone (Gayer, Hamilton, and Viscusi, 2000; Daley, 2007; Burda and Harding, 2014). Although policy makers do not have direct influence on the media, they will benefit from a better understanding of the connection between information disclosures, media responses, and the ultimate influence on environmental and social outcomes. Future work can clarify the types of narratives the media form about how communities with different demographics affect, and are affected by, their environments.

Broader Lessons from the Four Studies

The four studies we have discussed vary in scale from a single city to the national level, in location from the United States to Nigeria, and in topical focus from food access to agricultural production, public health, exposure, and toxic pollution. Despite their different focuses, all highlight issues of disparities in access to beneficial resources or in exposure to sources of harm and point to the role of policy, contextual factors, and institutions in promoting or working against justice. Overall, these studies show that issues of social justice, broadly construed, are interwoven through the subjects that scholars in agricultural, natural resource, and environmental economics and related fields already study. Lessons from these studies include the importance of careful and precise data collection, attention to local historical and contextual factors, inclusive research practices, and openness to new techniques.

Funding for Research Related to Social Justice

As evidenced by the studies discussed above, social justice research in agricultural and resource economics can be extremely costly to conduct, especially because researchers must often gather primary data. Moreover, methods in agricultural, natural resource, and environmental economics are often interdisciplinary in

Table 1: List of Potential Funders

	Funding Agencies
United States Federal Funding	National Science Foundation Agricultural Technologies Sustainability Environmental Technologies Environmental Engineering and Sustainability Economics, Sociology, Psychology, Biology, Physics, etc. National Institute of Health National Institute of Environmental Health Sciences National Institute on Minority Health and Health Disparities Community Partnerships to Advance Science for Society Advanced Research Projects Agency for Health National Cancer Institute United States Department of Agriculture National Institute of Food and Agriculture United States Department of Housing and Urban Development United States Environmental Protection Agency
United States Private Funding	Frito Lay Foundation Urban Institute The Environmental Finders Network National Environmental Education Foundation HCL Tech Climate Change Grant Sustainable Agricultural Research and Education Siemens Time-Sensitive Obesity Policy Evaluation
International Funding	International Fund for Agricultural Development Global Agricultural and Food Security United Nations World Bank Organization for Economic Co-operation and Development Gates Foundation Rockefeller Brothers Fund MacArthur Foundation Rockefeller Foundation W. K. Kellogg Foundation General Electric Foundation Coca Cola Foundation Pepsi Co Foundation Chevron Corporation BP Foundation Exxon Mobile

nature since they study issues inextricably related to health, life, and behavioral sciences and often require large collaborative teams. This means that funding is often needed to support this type of research. Junior scholars, or scholars entering a new topic area, may struggle to identify appropriate sources of funding. To make this search easier, we have compiled in Table 1 a list of funders whose interests overlap with these fields and who may have an interest in advancing projects that

consider social justice. Table 1 includes not only U.S. federal grant-making agencies, but also private foundations and international agencies that have an interest in agriculture, natural resources, and the environment. All of these funders have competitive processes, and funding rates are not high, but it is impossible to receive funding if one does not apply.

Some of these funders have opportunities that explicitly call for social justice work. For example, the National

Institute of Food and Agriculture's (NIFA) 2024 Agriculture and Food Research Initiative (AFRI) prioritizes environmental justice research and extension work in the Bioenergy, Natural Resources, and Environment program area. Others have no explicit focus on social justice, but many list past awards that address justice-related issues.

While funding is finite, some funders, on the margin, prefer to award justice-oriented applications over those with no mention of justice, even if their funding opportunities do not explicitly call for social justice research. For example, National Science Foundation (NSF) reviewers evaluate applications based on Intellectual Merit (ability to advance scientific knowledge) and Broader Impacts (how society will benefit). Grant applicants might do well to elevate the justice implications of their work in the discussion of the Broader Impacts of their proposal. Partnerships can also help academics and non-academics to develop a stronger proposal.

With any grant application, it is often helpful to contact program directors in the granting entity to have conversations about the mission of the organization and how the research under consideration relates to the funders' priorities. Program officers also advise researchers who are rejected on the first application to continue to submit revised proposals that address concerns raised in early rounds.

Conclusion

Carefully planned research conducted with intentionality can address social justice topics that intersect with agricultural, natural resource, and environmental economics and related fields. Ware et al. (2021) highlight the importance of using spatially aware and demographically disaggregated data, which often requires creation of new datasets; researchers should identify data gaps and align with institutions who will support addressing those, and develop partnerships that will lead to new data collection. Odozi and Oyelere (2021) show that inclusive research that fully incorporates the contributions of scholars from the developing world depends on local infrastructure and political conditions, reflecting injustice that can inhibit the diversity of scholars who contribute to this research. Research and development institutions should consider ways to work with governments to address these gaps. Mohr et al. (2021) similarly speak to inclusive research needs with regard to methodologies: Interdisciplinary and mixed qualitative–quantitative research can be extremely valuable in social justice research and should be embraced. Durfee et al. (2021) echo the importance of primary data collection, preferably in multiple rounds, and disaggregation as well as the benefits of interdisciplinarity.

Several of these studies also reflect the dependence of this type of research on funding sources. At the same

time, national and international funding agencies, like those mentioned in the preceding section of this paper, should consider the importance of granular and multiround primary data collection when granting awards for research into socially unjust outcomes, and they should allocate sufficient funding to undergird these efforts.

Correcting injustice requires identifying the problem, working alongside stakeholders and communities to find solutions, and then mobilizing decision makers. Solutions must include recognizing the diversity of experiences and who is participating in political decisions, in addition to allocative adjustments (Schlosberg, 2004). We acknowledge that researchers are an important yet limited part of this process; while we ought to inform policy makers of fact-based discoveries, ultimately policy makers must implement solutions, and citizens alongside media must hold researchers and policy makers accountable. There is an existing continuum of socially unjust circumstances, situations, and conditions, but the studies we highlight in this article can provide a blueprint for scholars to engage in this process and thus address prevalent social justice issues through policy. Based on this article, socially just policy solutions may include, but are not limited to, the following suggestions:

1. Policies should be put in place to ensure that responses to vulnerable communities with limited resources do not contribute to gentrification.
2. Developing economies need policies that support gender equality and infrastructure, which could contribute to additional research and insights into inequities.
3. Federal and state governments should pursue policies that acknowledge the unique circumstances of communities by providing local flexibility. A grassroots approach to policy at various levels could benefit society as a whole.
4. A more careful understanding of formal news media and contemporary social media should enable policy makers to make more informed decisions about community perspectives when developing new policies.

In 2022, attendees of the Agricultural and Applied Economics Association Meeting received an exhortation: Association President Norbert Wilson called on scholars “to explore ways of doing justice work in their research, teaching, extension, and outreach activities” (Wilson, 2023). There is an urgent need for more justice in food access, environmental quality, agricultural production, and other areas in which the readers of this publication are active. Economists have a powerful toolkit, and careful scholarly work can contribute to proffering solutions; ignoring issues of justice, on the other hand, can lead to research that is lower in quality or that does active harm (Ando et al., 2024).

For More Information

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