

Attitudes of Rural Westerners on the Environment and Conservation

Robert Bonnie, Drew Bennett, Emily Pechar Diamond, and Elizabeth Rowe



Attitudes of Rural Westerners on the Environment and Conservation

CONTENTS

Executive Summary	2
Introduction	3
The Importance of the Environment	4
Economy versus the Environment	5
Government Oversight of the Environment	6
Rural Western Voters and Climate Change	8
Case Study: Wildlife Migration in Wyoming	9
Communicating with Rural Western Voters	11
Recommendations	13
Conclusion	14

Executive Summary

When it comes to the environment and environmental policy, rural Americans matter a great deal. This is particularly true in the West¹ which has been a focus of environmental and conservation policy since President Lincoln acted to protect what would later become Yosemite National Park and four decades hence when President Theodore Roosevelt established the U.S. Forest Service, designated the first National Monuments, and made conservation of natural resources a centerpiece of his presidency.

Western rural voters have an outsized impact on the management of federal lands, most of which are located in the West. And, on western private lands, farmers, ranchers, and forest owners manage not only critical lands but control important water resources as well. Rural westerners have an outsized impact on national policy too. While rural western voters and rural Americans more broadly express support for natural resource conservation, they and their elected officials often voice less support for existing federal environmental policies and laws.

This report builds on the Nicholas Institute for Environmental Policy Solutions' (NIEPS) report *Understanding Rural Attitudes Toward the Environment and Conservation in America*. Using the same polling, focus groups, and rural stakeholder leader interviews data from this earlier report, we focus here on the attitudes of rural western voters by taking a deeper look at data from western rural voters.

Consistent with our findings in *Understanding Rural Attitudes*, western rural voters express strong support for environmental protection—even if doing so entails some cost to economic growth. But, while they recognize a role for regulations, they are deeply

1. For purposes of this report, we define the West as Arizona, California, Colorado, Idaho, Montana, New Mexico, Nevada, Oregon, Utah, Washington, and Wyoming.

ambivalent about government oversight of the environment, especially by the federal government. Interestingly, western rural voters are more inclined to support action on climate change than rural voters elsewhere.

We offer other insights and recommendations for how to engage rural voters. As we argued in *Understanding Rural Attitudes*, there is no quick fix to resolving the urban/rural divide on the environment. Building support for environmental policy among rural voters will require engagement with rural stakeholders, new policy approaches, making it easier for rural voters to access science from trusted sources, and highlighting and promoting policy approaches that have been shown to work for the environment and rural interests.

INTRODUCTION

In February 2020, the Nicholas Institute for Environmental Policy Solutions published *Understanding Rural Attitudes Toward the Environment and Conservation in America*. Drawing on polling of rural and urban suburban voters,² focus groups with rural voters,³ and interviews with rural leaders, that study sought to examine the rural/urban divide on the environment and to better understand how rural Americans view the environment, environmental policy, climate change, and a host of related issues. In conducting this research, NIEPS partnered with two polling firms, Hart Research Associates and New Bridge Strategy, as well as the University of Rhode Island and the University of Wyoming.

In *Understanding Rural Attitudes*, we found that there is indeed a rural/urban divide on the environment, but that it is characterized neither by how much people care about the environment nor perceived economic trade-offs around environmental protection. We found instead that attitudes toward government oversight of environmental and conservation issues are a clear cleavage point; rural voters, regardless of party, are less supportive of such oversight relative to urban and suburban voters. Views of governmental oversight are particularly predictive of whether voters support federal action to address climate change. We also gained important insights on who rural voters trust with respect to environmental issues and what messages are most appealing to rural voters.

For more than a century, conservation and environmental issues have been of paramount concern in the western United States. Rural resistance to federal conservation and environmental policy has been prominent over the last several decades and is important to understanding the opposition of many western policymakers to federal environmental laws. Hence, we believe a deeper dive into the attitudes of rural western Americans may have interest among individuals, organizations, and policymakers involved in western conservation and environmental policy.

Understanding Rural Attitudes was designed to provide some insight as to how rural attitudes vary across different regions. Much of the work from that study allows for a deeper look into the

2. In August and September of 2019, we surveyed over 1,800 voters nationwide using a 12–15-minute telephone interview of 1,000+ rural voters and 800+ urban/suburban voters. We excluded Alaska and Hawaii from the poll. One hundred and sixty-one voters from western states were included in the poll.

3. In the spring and summer of 2019, we conducted telephone and online focus groups, both of which allow us to interview more rural voters as face-to-face focus groups are more difficult to assemble large groups in rural areas.

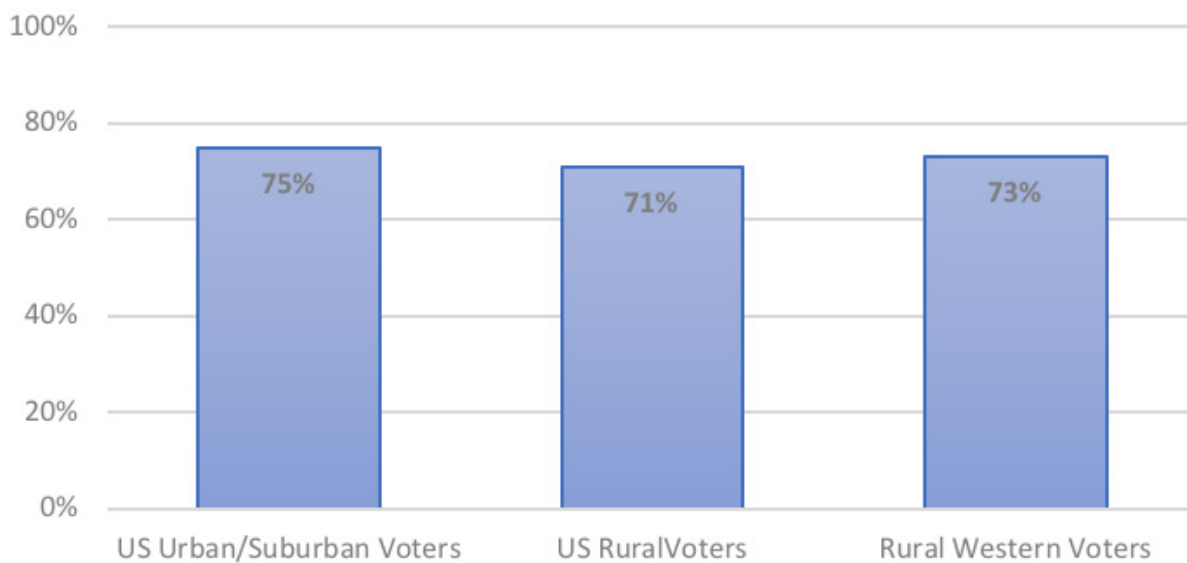
West. We held focus groups with 53 western rural voters in Arizona, Colorado, Idaho, Montana, New Mexico, Nevada, Utah, and Wyoming, and partnered with the University of Wyoming on a study of attitudes toward wildlife migration corridor conservation in that state that included a statewide poll and a focus group with 18 state residents. We also interviewed rural stakeholder leaders in agriculture, forestry, government, labor, and other areas, as well as tribal leaders, from across the country including in most western states. This report also draws on our national poll and provides data from rural western voters in the text and graphs. We would note, however, that our sample size for western voters is small (161 voters out of 1,000+ rural voters) and so the polling results should be viewed with some caution.

What follows is a report that provides more detail on the attitudes of rural westerners toward conservation and the environment. As will be evident, many of the conclusions we found in the national study pertain here, but, there are important differences and nuances with rural westerners that we believe are meaningful.

THE IMPORTANCE OF THE ENVIRONMENT

In the national study, we asked voters how important environmental and conservation issues are to them personally. We found no meaningful difference between urban/suburban voters and rural voters. The same is true for rural western voters, 73% of whom said environmental and conservation issues were very or pretty important to them personally (Fig. 1).

Figure 1. Importance of Environmental and Conservation Issues to Survey Respondents



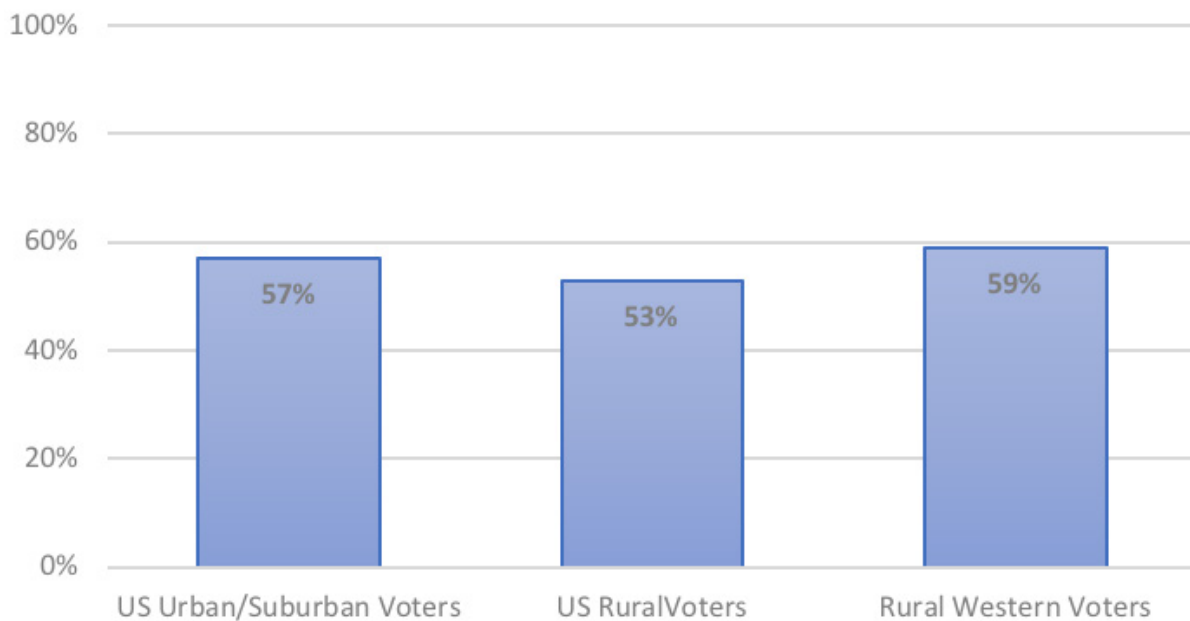
In focus groups, environmental issues were not a top-of-mind priority for most rural western voters. Still, we were struck by the passion many rural western voters expressed, unprompted by the focus group facilitator, for clean water, wildlife, and open space. They often noted that these were important benefits of living in rural America. These voters noted the importance of the environment for agriculture, outdoor recreation, and other economically important industries in the West. We also found many rural western voters to be relatively sophisticated about environmental and conservation issues. For example, some rural voters in Nevada understood the challenges of water scarcity in that state while others in Montana were reasonably well-versed in the growing threat of wildland fire there.

Economy versus the Environment

The West has a long history of environmental disputes around the management of public lands, the Endangered Species Act, wolf reintroduction, oil, gas and hard-rock mining on public lands, and many others. Given those debates, one would assume that rural voters in the West might prioritize economic concerns over the environment. We found the opposite.

Our national polling found that 57% of urban/suburban voters across the country said that protection of the environment should be given priority, even at the risk of curbing economic growth. Fifty-three percent of national rural voters agreed while 59% of rural western voters agreed (Fig. 2).

Figure 2. Percentage of Voters Who Believe Environmental Protection Should Be Given Priority over Economic Growth



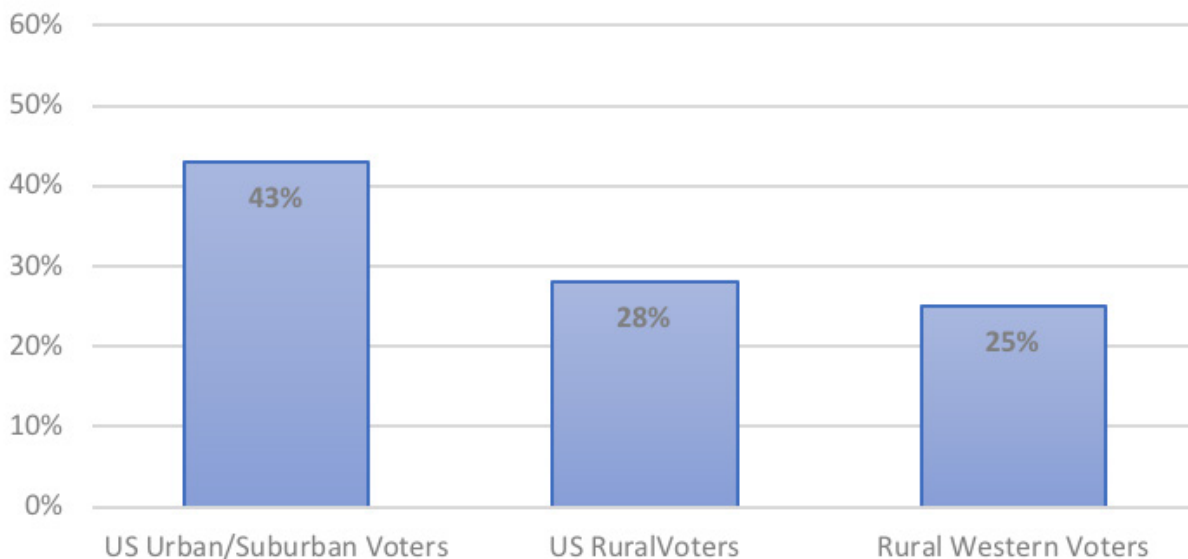
We found similar sentiment from focus group participants. Said one rural Utah voter: “In our small rural community, hunting and agriculture and tourism is what funds our community. It is still a very important connection to us.” One Washington agricultural leader told us: “If we don’t take care of the resources that we have, [we’re] not going to be able to continue farming where [we] live.”

Government Oversight of the Environment

Understanding Rural Attitudes found that rural voters—regardless of political party—are less comfortable with government oversight and regulation of the environment than their urban and suburban counterparts. Specifically, in the national poll we asked voters: “In general when it comes to issues of the environment and conservation, do you think we need more government oversight, less government oversight, or do we have the right amount of oversight?” For voters that answered we need more or less government oversight, we then asked them: “And do you think we need much (more/less) oversight or somewhat (more/less) government oversight when it comes to issues of the environment and conservation?”

Figure 3 below shows a clear difference between urban/suburban and rural voters on the question of government oversight of the environment. Rural western voters’ views with respect to government oversight are in line with rural voters across the country.

Figure 3. Voters Who Want to See More Government Oversight of the Environment



Many rural voters in the U.S. consider themselves strongly supportive of environmental protection and yet are deeply ambivalent about governmental—particularly federal—environmental policies. The attitude described by this New Mexico focus group participant was shared by many in our focus groups: “I tend to be cautious about making new laws because I think we are greatly overregulated as it is. The government has its fingers in every aspect of American life.” Said one rural Nevada focus group member: “You know, the government has been known to be totally ineffective, totally more expensive than required. And, you know, they don’t use common sense in their approach to land management.”

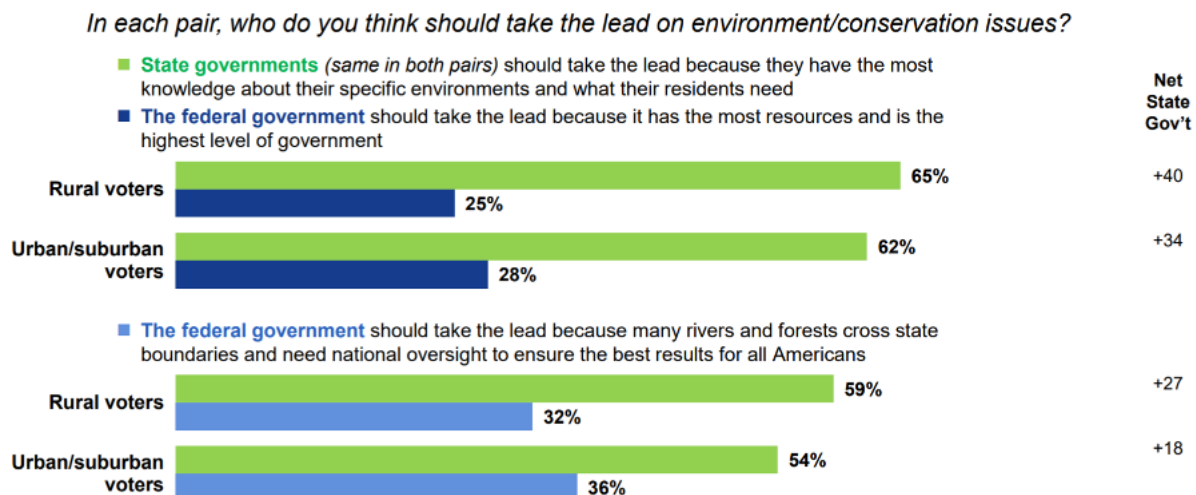
In one online focus group with rural voters, we asked them about regulations under the Clean Water Act. We found rural western voters generally to be very supportive of clean water, yet when we described the current debate around the extent of the Clean Water Act as it applies to agriculture, forestry and development, rural voters voiced skepticism on expanding the Act’s reach. “I have mixed feelings because it could be good for water conservation; but may be bad for the development of housing and farming, which is needed in order to live. I would think that making compromises would be important,” said an Arizona rural voter. Likewise, during a focus group an Idaho voter said, “I have concerns about the government’s ability to design a program with enough flexibility to accommodate situations already in play.”

For rural voters and particularly rural western voters, it’s as if attitudes toward the federal government operate as a kill-switch that overrides otherwise strong support for the environment. For many of these voters, it is not a contradiction to be both pro-environment and anti-environmental policy. And, it suggests that by appealing to rural voters’ anti-federal government sentiments, critics of environmental laws can build opposition to those policies even among rural voters who otherwise support environmental protection.

Yet, in what may seem paradoxical, we found broad agreement among rural voters that regulation was necessary. In particular, many rural voters, including in the West, worry about what corporations will do without some form of regulation. One Nevada voter spoke for many of our focus group participants in saying, “Can you imagine what it would be like if we didn’t have rules and some laws? ... It would be crazy, wild.”

Notably, many rural voters in all our focus groups appeared far more comfortable with state and local government. Said one rural government leader from California, “The United States is a very big country with a lot of different kinds of topography, different kinds of soils, different kinds of water issues. Much of what happens [in federal policy] is very much a one size fits all, which actually is the one size [that] may not actually fit anyone.” Indeed, perhaps what’s most interesting about rural voters’ support for state government is that it’s shared by urban/suburban voters. Figure 4 is from the national poll.

Figure 4. Preference for Federal Regulation as Impacted by Framing

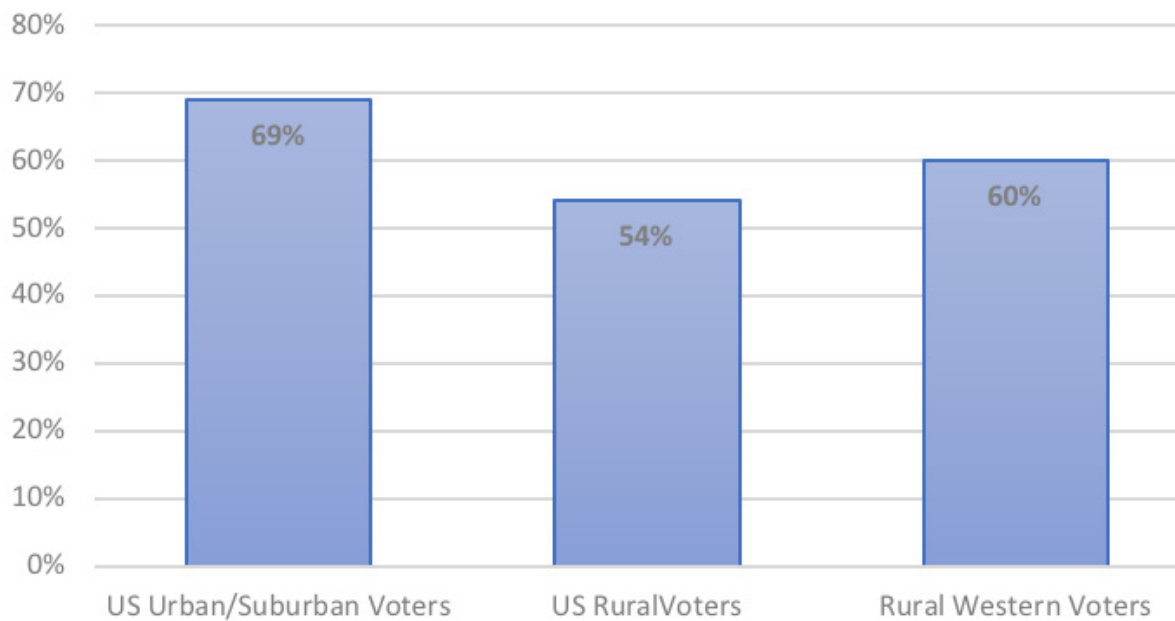


Rural Western Voters and Climate Change

Climate change is polarizing for many rural voters; we found deep divisions among rural western voters in focus groups. Many argued that climate change wasn't real or that it was part of a natural cycle. For example, a rural Montana voter said, "I think it's just too diverse and Mother Nature and the earth will self-regulate." At the same time, many rural western voters supported renewable energy. Similarly, in a separate poll of the Midwestern rural voters, we found strong support for environmental policies—such as reducing power plant emissions, improving vehicle energy efficiency, or helping farmers implement carbon soil activities that sequester carbon—that also benefitted the climate.

In our national poll, we asked voters, "How important would you say it is that the United States take action to reduce climate change—is this very important, pretty important, somewhat important, not that important, or not important at all?" Figure 5 shows that rural western voters are more supportive of taking action on climate change than rural voters nationally, however, we caution against placing too much emphasis on this result given the sample size. Further, in *Understanding Rural Attitudes* we found a strong link between concern about government oversight and attitudes toward climate change. We suspect that the same is true for rural western voters.

Figure 5. Voters Who Want the U.S. to Take Action on Climate Change



Case Study: Wildlife Migration in Wyoming

As part of Understanding Rural Attitudes, we conducted an in-depth case analysis of attitudes toward policies to conserve big-game migration corridors in Wyoming.⁴ In addition to the study’s relevance for looking at attitudes toward a specific conservation issue, the study is also of significant interest given that the state has among the most developed policies on wildlife migration in the country. A key part of the state’s strategy is to officially designate migration corridors and consider management actions, analyze threats, and comment on energy and other projects that might impact migration in designated areas. As of May 2020, the state had designated three corridors with two others under consideration.

We found that wildlife is very important to voters’ quality of life and are perceived as important to the state’s economy. Focus group participants identified migratory big game as among the most important species to Wyoming while 52 percent of voters perceived the decline in big game populations as an extremely or very serious problem. Notably, when asked about the potential threats to wildlife, climate change was the most politically polarizing; 77 percent of registered Democrats perceived climate change as a major threat to migration while only 14 percent of Republicans had similar perceptions.

4. For this case study, we conducted an online focus group of 18 registered voters, a telephone survey of 400 registered voters, and interviews with 18 landowners with property in designated corridors. Full results from the case analysis can be found in *Public Opinion on Wildlife and Migration Corridors in Wyoming*. (available at http://www.uwyo.edu/haub/_files/_docs/ruckelshaus/open-spaces/2019-migration-corridor-research-brief-final.pdf) and *Landowner perspectives on big game migration corridor conservation in Wyoming* (available at http://www.uwyo.edu/haub/_files/_docs/ruckelshaus/private-lands-stewardship/2019-landowner-pers-report-online-accessible.pdf).

Voters generally supported the concept of conserving migration corridors, but support varied significantly among policy options and across voters’ political affiliations. Support was strongest for policies perceived to protect human safety, like constructing over- or underpasses to allow migrating animals to safely cross highways, and for voluntary actions. Policies perceived to negatively impact the economy or result in new taxes had the lowest level of support. For example, only 36 percent of voters strongly supported (66 percent strongly and somewhat supported) seasonal limits on drilling activity to mitigate impacts to migrating wildlife.

Voters perceived differences in credibility among eight types of people and agencies, as shown in Figure 6. Voters viewed the Wyoming Game and Fish Department and wildlife biologists with the University of Wyoming to be the most credible, while the U.S. Fish and Wildlife Services and the Bureau of Land Management ranked fourth and sixth (Fig. 6). Voters considered conservation organizations and oil and gas workers as the least credible on migration issues.

In interviews with landowners with property in designated corridors, we heard support for and opposition to formal designations of migration corridors. Although Wyoming’s policies do not address management of private land, landowners raised concerns about the potential for increasing land-use restrictions overtime or that state wildlife designations could be used to challenge grazing leases on federal lands. Other landowners viewed the designations as opportunities to receive funding for voluntary conservation actions aligned with their management goals, such as selling conservation easements on their properties or implementing range improvement projects. Landowners frequently noted the importance of relationships with state agency staff in influencing their support for wildlife policies and emphasized their desire for a seat at the table in developing conservation efforts in their areas.

Figure 6. Trusted Sources of Information on Wildlife Migration Issues: Voters Were Asked whether They Found the Eight Agencies and Organizations to Be Very Believable, Somewhat Believable, Not Very Believable, or Not at All Believable

<i>People and Organizations: Ranked by Very Believable</i>	Very Believable	Total Believable
Wyoming Game and Fish	67%	95%
Wildlife biologists from University of Wyoming	54%	89%
Hunters [^]	51%	88%
U.S. Fish and Wildlife Service ^{^^}	50%	88%
Ranchers and farmers ^{^^}	45%	89%
Bureau of Land Management [^]	31%	78%
Conservation organizations	22%	67%
Oil and gas workers	15%	56%

The following list is a number of types of people and organizations that might discuss issues related to wildlife migration. Please tell me whether or not you would consider that person or organization to be a believable source of information about that issue. If you have never heard of that type of person or organization, or have no opinion about it, please tell me that instead.

[^]Split Sample A, N=194
^{^^}Split Sample B, N=206

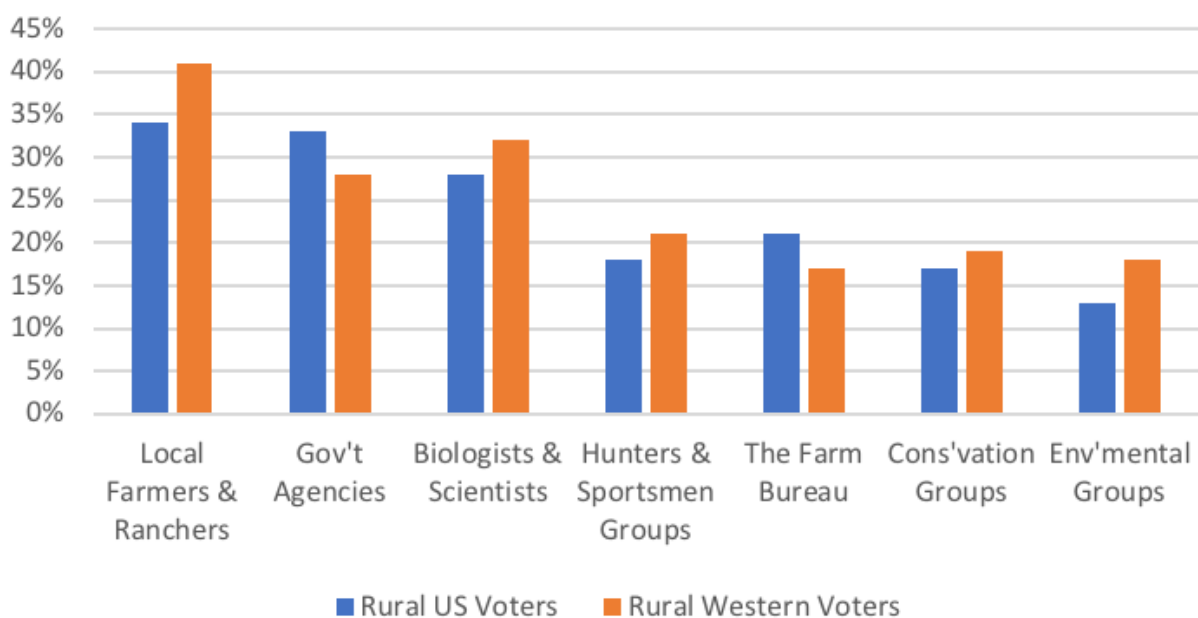
Findings from the migration corridor conservation case study reinforce conclusions from the broader national study of rural attitudes toward the environment and conservation and the more in-depth analysis herein of rural westerners. In particular, the need to engage and collaborate with landowners and other stakeholders was underscored by Wyoming’s experience implementing its corridor conservation strategy. While there was a general preference for locally led conservation efforts and voters tended to trust state agencies, landowners and other stakeholders raised concerns about the potential for state wildlife policies to influence the management of federal lands in unintended ways. Some landowners also felt that local insights were not incorporated or existing science on migration did not reflect their experiences on the landscape. Building support among landowners and other rural stakeholders for conservation of migration corridors will likely require collaborative approaches that minimize perceived regulatory burdens and supporting locally generated solutions.

Communicating with Rural Western Voters

We concluded in *Understanding Rural Attitudes* that the urban/rural divide would not be solved with better talking points. The divide is deeper and will require engaging rural stakeholders, rethinking policy in many cases, improving the delivery of scientific information through trusted sources, and other steps. Still, as part of our work, we examined both who rural voters trust and what messages are most appealing to rural voters.

In our national poll, we asked rural voters to select the two most trusted sources of information from a list of farmers and ranchers, biologists and scientists, government agencies, the Farm Bureau, hunter and sportsmen groups, conservation groups, and environmental groups. Figure 7 shows that western rural voters selected farmers and ranchers most often and followed by agencies and university biologists and scientists. This was consistent with what we heard in focus groups with rural western voters.

Figure 7. Trusted Sources of Environment Information: Voters Were Asked to Pick the Top Two Trusted Sources from the Seven Alternatives

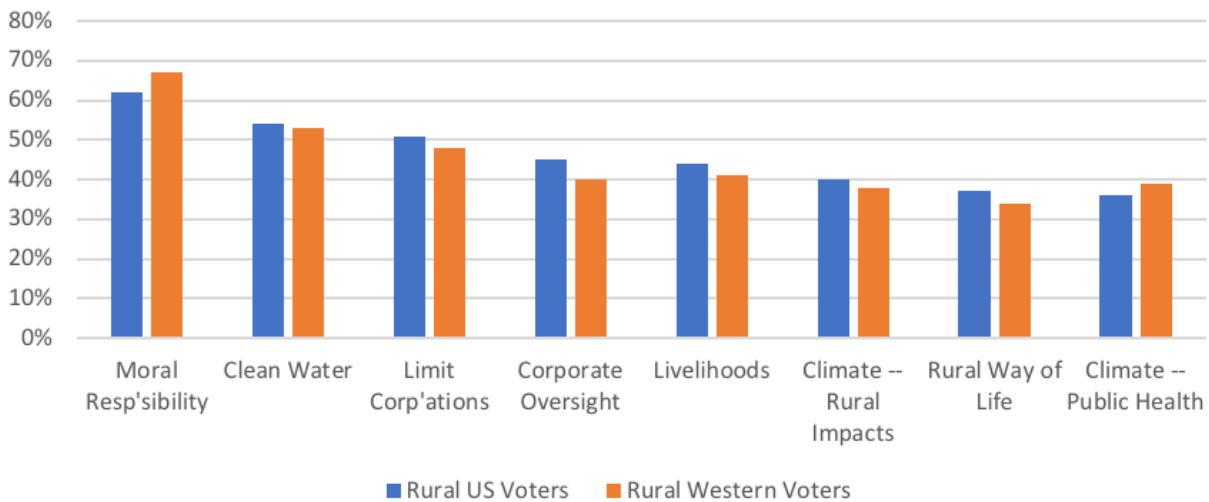


We tested a series of messages with rural voters in both polling and focus groups. In focus groups, we found that messages related to moral responsibility to future generations for protecting the environment, clean water, and rural way of life received the strongest support. In polling, we asked rural voters about which messages were very convincing as a rationale for government regulation and oversight of the environment (Figs. 8 and 9). Both moral responsibility and clean water messages fared best, while rural way of life did not. We suspect that the framing of the “rural way of life” messaging—tying government policies to protecting the rural way of life—didn’t work well in the poll because many rural voters may not view it as government’s responsibility to protect the rural way of life. In addition, with both national rural voters and rural western voters, we tested messages describing the need for government oversight of corporations. Those messages fared relatively well though slightly less so with westerners. On climate change, we tested messages about (1) consequences of extreme weather and (2) impacts on public health. Both messages fared about the same but were among the least convincing reasons for government regulation and oversight of the environment.

Figure 8. Messages Tested in National Polling

CLEAN WATER	Nothing is more important than having clean water to drink. Wetlands, forests, and natural areas act as filters that pull chemicals out of our water supplies, helping to ensure a reliable supply of clean water. We need to conserve these natural areas or else more of our water supplies will be at risk.
MORAL RESPONSIBILITY	It is essential that we have conservation laws so that future generations can enjoy the outdoors and have clean air and water. Our lands, waters, and wildlife are part of America’s heritage. We have a moral obligation to our children and grandchildren to pass along a safe, clean, and healthy natural world.
CORPORATE OVERSIGHT	Corporations are always under pressure to make more money. Many are tempted to cut corners to improve their bottom lines. Someone needs to keep an eye on corporations and set rules on pollution and other conservation issues to keep them accountable. Only the government has the resources to do this.
LIMIT CORPORATIONS	We need to protect our air, land, and water, against corporate greed. While some corporations are responsible, others will cut corners to improve their profits, including polluting our water and air. The only way to hold businesses accountable is for the government to provide oversight.
CLIMATE CHANGE—PUBLIC HEALTH	Climate change worsens severe health problems such as respiratory disease, heart attacks, and asthma attacks. Common-sense policies will protect our health and reduce these health problems, especially among children. Cleaner air and water means healthier families and fewer premature deaths.
CLIMATE CHANGE—RURAL CONSEQUENCES	Climate change is affecting Americans across the country. A recent U.S. government report predicted more extreme weather, including massive storms, flooding, and drought that will make clean water scarcer and have serious effects on agricultural communities. We need to take action to lessen these severe effects of climate change.
LIVELIHOODS	Many families depend on natural areas for their livelihood. Generations have worked in jobs like ranching, farming, fishing, and timber. And outdoor recreation is another vital part of our economy. National Parks alone support many thousands of jobs in communities near the parks. Government protection of land, air, and water ensures that these jobs—from farming to fishing guides and everything in between—remain available.
RURAL WAY OF LIFE	Conservation is a staple of rural life. Many rural Americans grow their own food, hunt, fish, and live near their water source. If government does not conserve land and protect air and water against pollution, these key aspects of rural life will be threatened.

Figure 9. Messages Rates as Very Convincing by Rural Survey Participants



Recommendations

In *Understanding Rural Attitudes*, we provided a series of recommendations which we believe apply in the West as well.

- **There is no quick fix.** The urban/rural divide on the environment is not a messaging problem that will be solved with better talking points. Bridging the urban/rural divide on the environment will require engagement and new partnerships with rural stakeholders, rethinking the design of environmental policies, and new communication strategies.
- **Engage.** Environmentalists, conservation groups, and policymakers should engage with rural voters and rural stakeholders in developing environmental policies that impact rural communities.
- **Build state and local partnerships into policy.** Policy strategies that partner with states and local government are likely to be more popular with rural voters.
- **Collaborate.** Policies that allow for collaboration with rural constituencies are more likely to be popular among rural voters.
- **Create pathways for science to reach rural communities.** Policymakers should focus on bolstering scientific outreach through universities, cooperative extension, and new ways to connect rural America to the nation's top scientists.
- **Messengers matter.** Policymakers, environmentalists, conservation groups, and others should consider engaging more with local rural stakeholders, including farmers and ranchers, cooperative extension, and others in their local area to convey information about environmental policies.

- **Climate change.** Climate policies that allow for state and local partnerships, position rural stakeholders as part of the solution, and leverage rural voters' interest in clean water, farmland conservation, and other rural priorities are likely to be more popular among rural voters.
- **Economics.** Among forest and farmland conservation, renewable energy development, and incentives for conservation-oriented farming practices, there are ample opportunities to connect environmental policy priorities and rural economies in a way that rural residents will appreciate and support.
- **Who will defend environmental policy?** Environmentalists and many rural voters both voice skepticism about governmental environmental policy. Given that cynicism toward the government is a significant barrier to rural support for environmental policy, environmental advocates should consider strategies that find credible voices in rural communities who can point to successful policy interventions—ones that work for both rural communities and the environment—as a way to diminish skepticism toward the government's actions on the environment.

CONCLUSION

When we began this study, one question we were interested in was whether the attitudes of rural Americans would not only differ from urban/suburban Americans but whether they would vary regionally across the country. For example, would rural western voters have different views shaped by a different set of regional environmental concerns (e.g., public lands management, wildfire, oil and gas development) than, say, rural midwestern voters (e.g., water quality concerns, management of private working lands).

Generally, the attitudes of rural western voters on environmental and conservation issues largely tracks that of rural voters across the country. That is, rural western voters have a strong commitment to the environment yet have serious reservations about governmental oversight of the environment, particularly from the federal government. They trust farmers and ranchers, and like other rural voters, also trust information from university scientists. They also trust information from government agencies. While this may be surprising, we suspect rural voters are making a distinction between federal government officials who live and work in their state and government officials who they view as regulating the environment from Washington, DC.

One interesting finding from this work is the strong support from rural western voters for environmental protection even if it means curbing economic growth. We suspect that this finding is driven by the connection of much of the West's economy to the outdoors through outdoor recreation, agriculture, and tourism, and perhaps even westerners' cultural affinity for the West's "wide open spaces."

Author Affiliations

Robert Bonnie, Executive in Residence, Nicholas Institute for Environmental Policy Solutions, Duke University

Drew Bennett, Whitney MacMillan Professor of Practice, Private Lands Stewardship Program at the University of Wyoming.

Emily Pechar Diamond, Assistant Professor of Communications Studies, University of Rhode Island

Elizabeth Rowe, Master's of Environmental Management candidate, Nicholas School of the Environment, Duke University

Citation

Bonnie, R., D. Bennett, E. Pechar Diamond, and E. Rowe. Attitudes of Rural Westerners on the Environment and Conservation. Nicholas Institute Report 20-07. Durham, NC: Duke University

Acknowledgements

This work would not have been possible without generous support from the William and Flora Hewlett Foundation, Wilburforce Foundation, and the Rubenstein Fellows Academy at Duke University. We also thank the Nicholas Institute's Catalyst Program for initial funding. Polling and focus group research were provided by Hart Research Associates and New Bridge Strategy.

Published by the Nicholas Institute for Environmental Policy Solutions in 2020. All Rights Reserved.

Publication Number: NI R 20-07

Nicholas Institute for Environmental Policy Solutions

The Nicholas Institute for Environmental Policy Solutions at Duke University is a nonpartisan institute founded in 2005 to help decision makers in government, the private sector, and the nonprofit community address critical environmental challenges. The Nicholas Institute responds to the demand for high-quality and timely data and acts as an “honest broker” in policy debates by convening and fostering open, ongoing dialogue between stakeholders on all sides of the issues and providing policy-relevant analysis based on academic research. The Nicholas Institute's leadership and staff leverage the broad expertise of Duke University as well as public and private partners worldwide. Since its inception, the Nicholas Institute has earned a distinguished reputation for its innovative approach to developing multilateral, nonpartisan, and economically viable solutions to pressing environmental challenges.

Contact

Nicholas Institute
Duke University
P.O. Box 90335
Durham, NC 27708

1201 Pennsylvania
Avenue NW
Suite 500
Washington, DC 20004

919.613.8709
nicholasinstitute@duke.edu