

**WRITTEN TESTIMONY
OF
BRIAN LUOMA OF THE WESTERVELT COMPANY
BEFORE THE UNITED STATES HOUSE AGRICULTURE COMMITTEE
SEPTEMBER 23, 2021**

Chairman Scott, Ranking Member Thompson, and distinguished Members of the House Agriculture Committee, on behalf of The Westervelt Company, thank you for the opportunity to testify on private working forests and the important role they can play as a natural climate solution, including through voluntary carbon markets.

Introduction

I am the President & CEO of The Westervelt Company, a privately held company headquartered in Tuscaloosa, Alabama. The Westervelt Company was founded in 1884 and is currently under the fourth generation of family leadership. Westervelt is an industry leader in land management, wood products manufacturing, and environmental mitigation. We own and manage more than half a million acres of land – growing trees and producing high quality Southern yellow pine lumber is the foundation of our business.

At The Westervelt Company, we are stewards of the land. We believe that sustainability is both our responsibility and our legacy. Our company is recognized for excellence in sustainable forest management, responsibly sourced forest products and services, natural resource stewardship, and ecosystem conservation.

Private working forests provide clean air and water, wildlife habitat, and jobs through market demand for forest products. Today, I'd like to focus on how forestry businesses like Westervelt can use this formula to support climate objectives by the nature of what we do – growing trees that sequester and store carbon and making long-lived wood products that store carbon and displace more carbon intensive alternatives. With the right market signals, we can do even more. Voluntary carbon markets for forests are increasingly important to our sector and are poised to grow significantly.

Importance of Private Working Forests & Wood Products to the Climate

Climate mitigation from our nation's forests includes two important elements: forest carbon sequestration and storage, and carbon storage in long-lived wood products. Together, sustainably managed working forests and the forest products they produce are already one of our nation's greatest assets for achieving our climate goals: U.S. forests and forest products offset 15% of U.S. industrial carbon emissions every year.

More than one-third of the United States is covered by forests, and 47% of U.S. forests are privately owned working forests – forests owned by families, businesses, and investors. These forests are sustainably managed to supply a steady, renewable supply of wood for lumber,

energy, paper, and packaging, providing more than 5,000 items that consumers use every day. They are the source of 2.5 million well-paying American jobs, mainly in rural communities.

Approximately 90% of the wood and fiber used to make forest products in the U.S. comes from private working forests. At the same time, these forests account for 72% of our gross forest carbon sequestration, enough to offset greenhouse gas emissions from all passenger vehicles in the U.S. each year. Private working forests in the U.S. also store an additional 82 billion metric tons of carbon. That amount is more than all other forest types combined. By providing a continuing cycle of growing, harvesting, and replanting, sustainable forest management optimizes the capacity of private working forests to sequester and store carbon and improves their health and resilience.

Because wood is fifty percent stored carbon by weight, long-lived wood products also store vast amounts of carbon. Each year, wood products add an additional 100 million metric tons of carbon to the nearly 10 billion tons of carbon stored in wood products – that’s nearly three times the carbon stored in all national parks combined. Advanced engineered wood products like mass timber present an enormous opportunity to lower the carbon footprint in the built environment.

Sustainably managed private working forests are more than capable of meeting any additional demand for wood in the built environment. Each year we harvest about 2% of our working forest land base; we also reforest 2% of our working forests land base each year through planting or natural regeneration. [According to the USDA](#), from 1953 to 2011, in a time of expanding population and increasing demand for homes, paper products, and energy, the total volume of trees grown in the U.S. increased by [60%](#). Today, private forest owners [are growing 43% more wood than they remove](#).

In addition to climate mitigation, there are other important environmental benefits to keeping working forests working. Water supplies for communities around the country come through forested watersheds, where forests act as a natural filtration system for [nearly 30% of the water we drink](#). Private working forests also play an important role in conserving at-risk and declining species. Access to these forests is vital to wildlife conservation, as 60% of our nation’s at-risk species rely on private forestland for survival. Collaborative conservation efforts such as the National Alliance of Forest Owners’ [Wildlife Conservation Initiative](#) can benefit species while keeping private working forests intact.

I am proud that private working forest owners like Westervelt are leading the way in pursuing natural climate solutions. Recently, I joined the CEOs of 42 other leading U.S. forest-owning companies, the National Alliance of Forest Owners, The Nature Conservancy, the Environmental Defense Fund, American Forests, and the American Forest Foundation to adopt a unique set of [Principles on Private Working Forests as a Natural Climate Solution](#). These “CEO Principles” express our common vision for increasing the climate mitigation of sustainably managed private working forests and sustainably produced solid wood products through market and incentive-based approaches.

Over the past few years, the National Alliance of Forest Owners has worked closely with a broad community of stakeholder organizations to advance the climate mitigation benefits of

private working forests and solid wood products. One of these is the Forest-Climate Working Group, which provides a unified voice within the forestry community for advancing forest climate policy. NAFO is also a founding member of the Food and Agriculture Climate Alliance, which works across the working lands community to advance broader climate mitigation solutions. These collaborations are helping us find common ground that can pave the way for smart, impactful policy.

Forest Carbon Markets

Strong forest product markets are the economic force behind our nation's private working forests and the many public benefits they provide. These markets will remain the bedrock of our sector. At the same time, new carbon mitigation opportunities are creating options for private working forest owners to increase climate benefits. Among these, voluntary forest carbon markets are a rapidly growing catalyst to scale natural climate solutions while providing important income potential for forest landowners. While there are compliance carbon markets in places like California, today I will focus on voluntary markets.

How they work

There are three main types of forest carbon projects. Afforestation and reforestation involve converting non-forest land to forestland. Avoided conversion protects forestland at high risk of being turned into other land uses. Improved forest management leverages proven forest management techniques to increase carbon sequestration on existing forest land.

Each project type is underpinned by three critical requirements: 1) additionality, meaning increased carbon sequestration above a baseline; 2) permanence, ensuring the carbon is stored for an appropriate duration, often 40, 60 or 100 years; and 3) preventing "leakage," which occurs when increasing sequestration or storage in one location causes a corresponding reduction in sequestration or storage in another location.

Significant investment is required to participate in forest carbon markets. A forest owner must establish a carbon baseline for their land and then ensure the additional carbon sequestered or stored on their land is appropriately measured and verified. Forest owners typically use sophisticated models to project the amount of additional carbon they can sequester on their land over time to determine how much additional carbon they can sell. This process must comply with the protocols of one of several available carbon registries for a landowner's carbon to be viable in the marketplace. Once that carbon enters the marketplace, the landowner must be able to measure and verify that they achieve the projected level of sequestration over time. The registries track which carbon has been purchased, what remains available, and so on. It is a time consuming, complex, and expensive process.

The opportunity: Scaling up natural climate solutions in private working forests

Voluntary carbon markets are a valuable tool for increasing carbon sequestration and storage in privately owned working forests. The customers for these markets are primarily companies seeking to reduce their carbon footprints in a variety of ways, including by investing in natural carbon removals, like forest carbon sequestration. Demand for carbon sequestration via the

voluntary market is growing rapidly, with forest carbon experiencing the highest increase in demand. According to [Ecosystem Marketplace](#), the volume of forest credits purchased grew over 30% worldwide between 2019 and 2020, and by over 240% between 2020 and 2021, year to date. Yet, the U.S. occupies a relatively small portion of these markets: Asia comprises most of the market, while North America, with its significant forest resources, is only beginning to emerge. We have a once-in-a-generation opportunity to change that dynamic.

The challenge: Increasing participation and confidence in forest carbon markets

The urgency of climate change and the need to scale natural climate solutions is driving unprecedented investor interest in carbon markets at a time when those markets are still maturing. The first generation of forest carbon projects has taught us much that we can use to improve market dynamics and the quality of carbon outcomes. I want to emphasize that this first generation has delivered significant carbon value – but we can and should take the opportunity to make real improvements for even better outcomes for the climate.

Today, forest carbon markets face two key challenges which we must address to harness their potential to deliver scalable carbon mitigation: removing barriers to participation and increasing confidence in the quality of delivered carbon.

First, participating as a landowner in carbon markets is a lengthy and expensive process. Collecting the data and following the protocols to enroll lands in registries costs, at minimum, several hundred thousand dollars in addition to the cost of ongoing forest management activities for enrolled land. There is also a high degree of variability, unpredictability, and complexity in the requirements of voluntary and compliance protocols, which adds additional and often unnecessary costs and inefficiencies to carbon projects. These unintended barriers to entry in forest carbon protocols keep private working forest participation too low, leaving a large amount of climate mitigation potential untapped.

Second, concerns among purchasers about the integrity of delivered carbon exist because of shortcomings in data and analysis, the design of some first-generation projects, and the requirements of existing protocols. These concerns will undermine investor confidence and sideline significant amounts of capital until they are addressed.

The solution: Improvements to data and protocol design can increase confidence and participation

These challenges reveal two clear needs: improved data collection, analysis, and information transfer, and improved protocol design to increase efficiency and reduce cost.

First, robust carbon data and analysis are the foundation of high-quality carbon projects and underpin the scalability of forest carbon mitigation strategies. We need more and better data. USDA operates the Forest Inventory & Analysis (FIA) program, the world's premiere forest data collection and reporting system. FIA is used for an increasing number of public and private sector purposes, including carbon projects in voluntary carbon markets. USDA's carbon data collection is advanced in the forestry space compared to agricultural lands and soil carbon, but

across the board, there is room for improvement. We need comprehensive, nationwide data that is more useful to end users.

To help improve the credibility of forest carbon outcomes, data must be accessible, accurate, current, and relevant. This requires an ever-improving combination of field data collection, financial accountability, technology, and user-driven analysis to increase the scope, quality, and usefulness of data. Increased investments in FIA will help improve field work and the use of technology to collect and analyze forest carbon data. USDA is also well positioned to improve the use of technology and reporting methods to make carbon data more accessible and more useful for carbon projects and aggregate carbon reporting. As the needs and uses of carbon expand, we must expand FIA's carbon capability while maintaining existing program delivery that is vital to forest management decisions.

Second, protocols can be improved to be even more reliable, high-quality, and predictable. Innovation in the voluntary marketplace provides a wealth of new ideas and new approaches but can lead to inconsistencies or problems in protocols, project design, and project execution. We need to bolster confidence among carbon purchasers, financial institutions, government, landowners, and other stakeholders that voluntary markets have addressed these challenges and are truly, and with great consistency, removing additional carbon from the atmosphere. This could be addressed in a variety of ways, but it's clear that the lack of a common approach to what "good" looks like in this space is a gap we must fill.

These challenges are interwoven, and they are well within our ability to address. More available data and analysis makes carbon markets more accessible *and* creates confidence in the marketplace. Having a common approach to what "good" looks like shores up stakeholder buy-in and makes investment in carbon markets less risky from a landowner perspective. We can improve protocols to make them more accessible while maintaining and even improving credibility.

Congress is already addressing some of these challenges. The Growing Climate Solutions Act, recently passed by the Senate, would help private forest owners of all sizes deliver carbon mitigation benefits at scale. The National Alliance of Forest Owners supports working with USDA to address cost and technology barriers to participation in forest carbon markets while maintaining the rigor needed for high quality carbon outcomes.

Wood Products Markets

Increased demand for wood in the built environment is another significant climate mitigation opportunity that is as important as forest carbon markets. Increased market demand for wood utilization coupled with increased demand for forest carbon can optimize mitigation outcomes.

The opportunity: Reducing the carbon footprint of the built environment through mass timber and other advanced engineered wood products

The United Nations reports that 10% of global greenhouse gas emissions come from building construction materials. Advanced engineered wood products, like mass timber, require significantly less energy to produce than alternative building products. Wood used for

construction also stores significant amounts of carbon (typically referred to as “embedded carbon”) for long periods of time, further expanding the mitigation benefit. With the introduction of mass timber in the nation’s preeminent model building code, wood is now approved as a structural material for buildings up to [18 stories tall](#), a height that encompasses the vast majority of buildings in the U.S.

The solution: Improving life cycle assessment (LCA) data and analysis and setting the tone for reducing the carbon footprint of the built environment

Improved data and analysis are fundamental to capturing the carbon benefits of increased wood utilization in the built environment. The USDA Forest Products Lab is engaged in life cycle assessment research on building materials, such as mass timber. Increased funding for such research can inform and foster more vigorous marketplace innovation by enabling project developers to more easily compare the embodied and embedded carbon of mass timber with that of alternative building products.

Federal infrastructure and procurement policies can set the tone for private sector investment by establishing a preference for reduced carbon building materials that help transform the built environment from an emissions source into an emissions reduction tool. Federal policy can also foster marketplace innovation through significantly increased investments in the Wood Innovation Grant program, with increased emphasis on advanced engineered wood products and technology transfer.

Conclusion

The true scale of our forests’ climate impact is hard to fathom. My colleagues at the National Alliance of Forest Owners have put together a forest carbon data visualization – available at ForestCarbonDataViz.org – that uses publicly available EPA and USDA’s Forest Service data to demonstrate the enormous carbon contributions of private working forests and solid wood products.

In the data visualization, you will see the scale of the opportunity for carbon sequestration and storage in U.S. forests. For perspective, you may have seen a [recent story](#) heralding the opening of the new largest direct-air carbon capture (DCC) plant in the world earlier this month. Located in Iceland, the new plant is expected to sequester up to 4,000 tons of CO₂ per year. For that technology to match the annual gross sequestering power of U.S. forests, they would need to build almost 400,000 more of those DCC plants. We need all the negative-emissions technology we can get, but this anecdote underscores how important our forests and forest products are to climate mitigation. Forests and forest products are already the most powerful carbon-capturing technology on earth.

The recommendations given today are designed to provide climate mitigation solutions that support good paying jobs and economic prosperity in rural forested communities across the country. As the Committee considers policy options for natural climate solutions, we urge Committee members to recognize the unmatched mitigation benefits our forests and forest products are already providing and their potential to do even more. Encouraging participation

and increasing confidence in voluntary carbon markets is key to maximizing our forests' ability to deliver the climate solutions our country needs.

Thank you again for conducting this hearing. The right climate solutions can enable private forest owners to invest further in sustainable management that enhances forest carbon sequestration and storage, water quality, wildlife habitat, and good paying rural jobs. The Westervelt Company and the National Alliance of Forest Owners stand ready as a resource to this Committee as it addresses the important challenge of climate change, and the solutions private working forests can offer.