Spring 2024

Point Blue Quarterly

Conservation science for a healthy planet.

Conservation Impact at Scale

Big Ideas and Real-World Solutions

FROM THE CEO
Conservation at Scale

When I joined Point Blue as CEO five years ago, the organization had just embarked on a new strategic plan. The theme of the plan was "Increasing the pace, scale, and impact of climate-smart conservation." Driven by a sense of urgency as the dual threats of climate change and biodiversity loss loomed large, we knew we had to step up and meet the moment.

Now, five years later, there are so many clear examples of just how we've been able to scale up our work to achieve greater conservation impact than ever before. In choosing stories to highlight for this issue of the *Point Blue Quarterly*, we wanted to share programs with our community that showcased just what "conservation at scale" looks like.

On the coming pages, you can read about our expanded role across a much larger geographic scale, via the grantmaking work we're doing across 13 countries to support local shorebird conservation groups in North, Central, and South America. You can read about the dramatically scaled impact of our mountain meadow restoration work, through which we plan to conserve or restore 30,000 acres of meadows by 2030. You can read about how we're supporting 65 new restoration projects on farms, ranches, and other working lands, covering all corners of California with new and more diverse partners. And you can read about how our data management platforms and science protocols are helping the Department of Defense manage ecological observations across 27 million acres of land.

While the numbers are one way of telling the story—and are certainly impressive—there's a lot more to all of these projects. When I look across these (and many other Point Blue programs), what I see is the future of conservation, and the future of Point Blue. I see us continuing to grow into an organization that's always taking steps to be more inclusive and grow the diversity of the partners and communities we work with and learn from. I see our dedicated scientists, educators, and restoration practitioners taking the lessons they learn from their work and continuing to share them with the peers and partners in the field, increasing the reach of our impact. And I see the number of people who care about what we care about—wildlife, resilient human communities, conservation science, and magic moments in nature—increasing as we continue to grow the Point Blue community.

At this thrilling moment in Point Blue's nearly 60-year history, I'm so grateful to be part of this amazing organization and excited for the impact we are having together to heal our planet.

Sincerely,

Manuel Oliva
Chief Executive Officer

Avian Conservation Across Borders
Catherine Hickey on Launching an International Grants Program

Tell me about MSP+. What does the program do?

MSP+ Science to Action is a new program to support shorebird and wetland conservation in Latin America. The program builds on the 12+ years of the Migratory Shorebird Project, which is the largest coordinated survey of wintering shorebirds on the Pacific Coast of the Americas. Point Blue offers MSP+ partners technical support in data management, quantitative analysis, and modeling. We also provide input on proposals and grant writing. We try to recognize when it would be mutually beneficial to make connections between different grantees and with other partners, so we often identify, create, and support the avenues for interchange of resources, expertise, and learnings.

You have been involved in this work for a while now! After establishing Point Blue's 13-country conservation science program, why is this regranting program a major milestone for you and for Point Blue?

First, this has been a team effort—within Point Blue and with our incredible international collaborators. We were able to dream big only because we have been dreaming together. We spent nearly 15 years building out MSP's incredible network, and as we've built MSP+, we were affirmed that the MSP network is the ideal foundation to build and grow because it is rooted in local communities, but has a global perspective.

MSP+ was designed with Diversity, Equity, and Inclusion (DEI) principles at its core. We talked to a number of partners and DEI consultants about the barriers to accessing conservation funding in Latin America, and knew we needed to make every decision with the aim of reducing those barriers. For example, language barriers can be a constraint. We make sure to translate all of our documentation, communications, and convenings. Bureaucracy and complex reporting can also be a barrier. We focus on outcomes rather than laborious and lengthy reporting so grantees can focus on the work.

Tell me more about what the Pacific Flyway is. Why is this migratory route important?

The Pacific Americas Flyway is one of the major migratory routes for birds across the globe. There are serious threats throughout the Flyway, which is why we need to take urgent action. But there is reason for hope.

There are dedicated, passionate people who are committing their lives so that the birds, communities, and ecosystems of the Flyway can thrive.

What have you learned from the impressive grantees with whom you collaborate?

Our partnership is built on mutual respect and valuing each others' contributions. How we work with each partner depends on their desires and needs. We try our best to listen and support them and we are also always learning. We have learned the importance of deep connection within communities—this cannot be overemphasized. In international conservation, we can speak in grandiose terms and set ambitious goals, but when it comes down to it, people have to find value, benefit, or purpose in necessary action in their everyday lives. Ultimately, that is sustainable conservation.

What has been the most rewarding part of bringing this new program to life?

Seeing our partners shine and dig deep within their communities and their local and national governments to carry the universal flag of wetlands conservation. We need individuals and decision-makers at all levels to care about wetlands, and we need them to understand that healthy wetlands support healthy communities. I sincerely believe shorebirds can be ambassadors of this message and that our partners have a crucial role in hosting, caring for, and helping speak for these global ambassadors.

Do you have any memorable moments to share about working with shorebirds in Latin America?

On my most recent trip to Panama, we arrived at a wetland site—El Agallito and El Retén Beaches in Chitre—for a designation ceremony as a site of International Importance for the Western Hemisphere Shorebird Reserve Network, and the tide line seemed so far off in the distance. Majestic Whimbrels were leisurely foraging along the mudflats. After brief conversations with community members and the Mayor of Chitre, I looked back at the wetlands and the tide had rushed to cover the entire mudflat and waves were breaking against the seawall. I had never experienced such a radical shift in tide and conditions for the shorebirds. It made me keenly aware of the pressing importance of coastal resilience in the face of climate change, both for birds and for communities.

What motivates and inspires you to do this important work?

I'm constantly inspired by the mind-bending journeys these delicate yet resilient creatures make each year, again and again, throughout their lives. They have no choice but to face the perils. And I feel I have no choice but to reduce any dangers that I might have the slightest influence over. If we can each, as partners along the flyway, reduce these collective threats, we can piece together a path to recovery.

It is critical to appreciate that as we invest in biodiversity conservation and ecosystem health here in California, for migratory birds, our only real chance at success depends on conservation throughout the birds' life cycles and geographic ranges. Because birds know no political borders, so we need to reach diverse communities to do this work well. I'm honored to be part of this global community.

Diana Esse, Program Officer, Coordination and Partner Support for MSP+.

"Many of our MSP+ grantees partners have advanced the conservation of shorebirds and their habitats with creative actions that have brought new stakeholders to the table. MSP+, which builds on the great work of the Migratory Shorebird Project, has allowed us to scale our work. For example, it can be difficult for scientists to share their findings and reach diverse audiences, but MSP+ has helped us address those challenges.

My favorite part of the program is getting to understand and highlight each country's and partner's unique conservation's context. I've learned so much about the different realities of each partner, and the challenges each one faces. It has been an honor to see how different partners are innovating and applying new conservation tools to conserve nature."

Diana Esse, MSP+

Left: A flock of Hudsonian Godwits, or Zarapitos de pico recto, in Chile. Photo by Daniela Díaz, ROC. Right: Nelson Contardo, a shorebird surveyor in Chile, who is a partner on a project that set out to reduce data accessibility gaps, increase analysis and reporting capabilities, and standardize results to promote more and better evidence-based conservation decisions. The project is led by Network of Bird and Wildlife Observers of Chile aka Red de Observadores de Aves y Vida Silvestre de Chile (ROC). Photo by ROC.

27 Million Acres

Increasing the reach of the Avian Knowledge Network (AKN)

Point Blue made a name for itself by helping partners in Northern California implement standardized bird monitoring and using their data to answer conservation questions. Now, through the AKN, we are using best-in-class data management systems to scale up this super power to partners across the country and beyond. “Historically, many scientists would go out in the field and record their observations with pen and paper, and that’s where it ended,” says Sam Veloz, PhD, Ecoinformatics and Climate Solutions Director at Point Blue. “People would put that data into a binder and shove it into a filing cabinet. When there was staff turnover, new employees wouldn’t understand what the data meant or why it was even collected in the first place.”

The AKN has dramatically changed conservation data collection, bringing bird conservation into the digital age. The AKN is a collaborative effort between scientists, natural resource managers, and other stakeholders across the Western Hemisphere, creates a standardized approach to collecting and entering bird data, and it is now the leading repository for scientific bird data in North America. And the AKN is just one of the many data management platforms that live on Point Blue’s Science Cloud.

“We have developed a system that accommodates and differentiates the ways people collect bird data,” says Sam. “That has been a game changer. By bringing together partners and the various protocols people use, we now have a vast amount of data that is informing conservation science at an incredible scale. Before coming up with a standard way of capturing information, a lot of data just wasn’t being used, and it had completely lost its value. This was a big loss for conservation.”

One of the AKN’s key partners is the Department of Defense, which manages 27 million acres of land, making it the fourth largest landowner in the country. DoD, like any other federal agency, is required to follow federal regulations including the Endangered Species Act and the Migratory Bird Treaty Act. But before they joined the AKN partnership, they were having challenges capturing and storing data. They recognized there were straightforward ways to solve the issues they were experiencing. They needed partners to help them make those changes so the DoD (led by Elizabeth Neipert with the US Army Engineer Research & Development Center) joined up with Point Blue and the Klamath Bird Observatory (led by John Alexander). “Our partnership with DoD has been invaluable and they have been a true leader,” says Sam. “They are now using the AKN for all of the avian data they collect and they have put a huge amount of resources behind the system, providing the field with access to a vast amount of data that was previously inaccessible.”

The DoD has also helped bring other partners on board. “The Kalamazoo Nature

Above, left: Laysan Albatross, Pacific Missile Range Facility. Photo by Oster Lund. Above, right: White-tailed Kite. Photo by Van Tassel. Next page: Laysan Albatross, Pacific Missile Range Facility. Photo by Paul Block.

Center / Kalamazoo Valley Bird Observatory has been conducting bird banding, surveys, and monitoring for over 50 years," says Jessica Simons, Vice President for Conservation Stewardship at the Kalamazoo Nature Center. "Some of our surveys have over half a million historic records, with much of this data sitting on internal servers at our nature center. For years, our team has struggled to find the best approach for protecting and sharing this wealth of historical data. In the last year, thanks to a recent DoD AKN training, our team successfully uploaded thirty years' worth of point count data from our partnership with Fort Custer Training Center into AKN. We're thrilled that this data will be safe and widely accessible to military and scientific partners. While we wish this opportunity had existed in the early days of our survey programs, we're looking forward to moving ALL of our data archives into AKN where they can make a powerful contribution to avian conservation."

Because consistency is critical for good data collection, we spend a significant amount of time training staff across organizations that use the AKN so that they are properly compiling and entering data. "We work closely with teams to walk through how the system works, and we troubleshoot common issues," says Sam. "Doing this right takes a lot of time, but this coordination is critical. Bird species don't stop at our borders, so our conservation efforts shouldn't either. The more we can coordinate efforts and train people to collect data in the same way, the better our conservation management decisions will be."

While this type of data analysis can seem abstract or cerebral, it has had real-life impacts across the country. In Massachusetts, a staff biologist was leaving the Army National Guard after eight years. During their tenure, they had collected over 35,000 bird observations, which were at risk of being entirely lost once they left. The biologist took an AKN training, and after a few quick emails with the DoD AKN team, they learned how the AKN worked and were able to bulk upload their data to the AKN database. In a world before this system existed, this valuable research would likely have completely disappeared.

For another example of how high-quality data about biodiversity can influence regulatory and policy decisions, you can look at how the AKN has helped advance the conservation of California Ridgway's rail. This highly secretive, olive brown, chicken-sized marsh bird was added to the federal Endangered Species List in 1970. Now, thanks in part to conservation efforts, and our ability to track the Ridgway's population size over time through data stored in the AKN, the San Francisco Bay population is responding to restoration and slowly recovering.

In the next five years, Sam would like to see more federal agencies using the system and is hoping the repository can accommodate a greater diversity of species and ecosystem attributes. Point Blue is currently working to develop new applications in the Science Cloud around soil carbon data so that practitioners can track how levels of soil carbon change in response to management practices.

Further, with emerging technologies like artificial intelligence and machine learning, there are even more possibilities to have a greater impact at a larger scale, a prospect that excites and motivates Sam. "The data available on the Point Blue Science Cloud is an incredibly valuable resource to scientists and researchers who can now use artificial intelligence and machine learning to make sense of this information and inform conservation decisions," says Sam. "We're in this place where all of a sudden we have tons of data available. In the past, I had to scrape together a little bit of data here, a little bit of data there. Now, we have an abundance of data. For me, it's a little bit like being a kid in a candy store. It's an exciting moment to be doing this work."

The Magic of Mountain Meadows

Expanding the pace and scale of meadow restoration in the Sierra

When Ryan Burnett, Point Blue's Sierra Nevada Group Director, stands in a healthy meadow in springtime in the California Sierra, he is immediately struck by the smell of willow blossoms. "To me, this is the smell of life," says Ryan. "The most magical thing about willow blossoms is when you pull a willow flower and hold it up to your face, you won't smell a thing. You can only smell this fragrance across a healthy meadow landscape."

One year ago, California's Wildlife Conservation Board (WCB) awarded Point Blue a $24.7 million block grant—$20 million which is dedicated to support and scale up the work of the Sierra Meadows Partnership (SMP), and $4.7 million to execute Point Blue-led work. The SMP, which Point Blue chairs, is a coalition of organizations restoring and protecting Sierra meadows. "This was a natural next step for Point Blue," Ryan said. "This is the largest grant we have ever taken on as an organization, and it represents our goal of increasing the pace and scale of conservation work."

Why is restoring meadows a priority to begin with? "Meadows represent a small fraction of the Sierra cascades—only 2%—but they punch above their weight," Ryan remarked. "They are the emerald jewels of the Sierras, and they're the ecosystem work horses that hold watersheds together. They sequester more carbon than the forests that surround them, they're hotspots for biodiversity, they purify and retain water, which is especially important as California's snowpack shrinks, and when wildfires burn, healthy meadows burn the least and return the fastest."

Unfortunately, of the estimated 280,000 acres of Sierra meadows, half are degraded because of human activity. Generations of overgrazing, logging, and road construction have transformed meadows from the biodiversity hotspots Ryan described to less healthy lands that don't properly retain water. And, climate change and new development continue to threaten the healthy meadows that remain.

Through Point Blue's partnership with the WCB, we are working to restore 6,000 acres of meadow habitat, complete planning to restore an additional 4,000 acres, and identify the next 2,500 acres of meadows for future restoration. These projects are restoring high quality habitat for a wide range of species, including the Willow Flycatcher, the Yellow Warbler, the Greater Sandhill Crane, and amphibians including Cascade Frog and the Sierra Nevada yellow-legged frog.

"One of our highest priorities is to restore habitat across California to protect biodiversity," says Jennifer Norris, Executive Director of the WCB. "Our partnership with Point Blue allows us to reach new partners in new ways. It's incredibly exciting to see mountain meadow restoration being scaled up across so many acres to support wildlife and people."

Increasing authentic engagement and inclusion of indigenous groups, who have historically experienced barriers to accessing restoration and conservation funding, is a cornerstone of this program: the SMP set aside a minimum of $2 million exclusively for indigenous groups. So far, we've awarded $1 million directly to indigenous-led projects, and another $600,000 is going to indigenous groups through grants to other organizations that are supporting indigenous-led conservation work, putting us well on our way to exceed our goal. These partnerships have been one of the most rewarding parts of Ryan's work on the SMP.

"Incorporating indigenous knowledge into meadow restoration will fundamentally make these landscapes more durable," says Ryan. "In the traditional ecological approach to conservation, you are a steward of the land," says Lorena Gorbet, Coordinator of Maidu Stewardship Project for the Maidu Cultural and Development Group. "It's not about extraction or what you can get from the land. Instead, you try to understand what the land needs, you respond, and learn more. Ultimately, if you manage the meadow for what *it* needs, then it will provide for you."

Meanwhile, outside Sierraville, the South Yuba River Citizens League (SYRCL) is restoring five degraded meadows at the headwaters of the North Fork of the Yuba River using beaver dam analogs and post assisted log structures. "Thanks to grants from Point Blue's Sierra Meadows Partnership, our team has completed several projects that will dramatically improve the health of the Haskell Peak Meadows," says Alecia Weisman, Watershed Director at SYRCL. "These projects have helped restore wildlife habitat and created more effective fire breaks in our fire-prone region."

Of the $20 million block grant Point Blue was rewarded, we've regranted $15 million, and we're poised to regrant the final $5 million over the next 12 months. And Ryan? He's looking forward to visiting the meadows Point Blue and our partners have restored to see the transformation firsthand. "It's so gratifying to see these projects when they're complete because the change happens really fast. If you bring the water back to meadows, the landscape transforms quickly. The ecological memory of these places hasn't been totally lost. With a little bit of help, meadows can recover on their own."

Fish survey to monitor mountain meadow health on the Kern Plateau in Tulare County, CA. Photo by Trout Unlimited.

Helping Farms and Ranches Thrive

Increasing wildlife on working lands through restoration projects

One year ago, California's Wildlife Conservation Board awarded Point Blue $26 million over four years to advance wildlife-beneficial conservation practices on farms, ranches, and other working landscapes across the state. Over the last year, our team has been hard at work building partnerships, selecting projects, and implementing restoration projects from Humboldt County in the north to San Diego in the south.

"The Roots Program is a passion project come to life for me," says Liz Chamberlin, PhD, Director of Innovation at Point Blue. "I'm excited by biodiversity conservation and centering people in the conservation process. Humans are a part of nature, and conservation is a human activity that can improve our own existence and the existence of other species on this planet. The Roots Program brings together those interests."

In 2020, California set an ambitious goal of conserving or restoring 30% of its land and waters by 2030 through a movement known as "30×30." Restoring degraded lands across California remains a critical piece of the state's ambitious plans to address the twin threats of climate change and biodiversity loss, and working lands must be a part of the solutions. Working landscapes can be thought of as agricultural lands that people steward for farming or ranching, but also can include community gardens, school campuses, and regional parks.

"Working lands make up more than half of California's land base, so when you think about biodiversity and climate resilience across the state, you must include working lands in the picture," says Liz. "By definition, working lands are managed and stewarded by people, so we see the Roots Program as a major opportunity to support and build conservation buy-in. We are partnering with farmers, ranchers, Resource Conservation Districts, tribes, and others to build trust and bring them into the conservation fold. And in turn, we're learning so much from those partners about what they're doing and how they're already effectively managing lands."

The Roots Program has already kicked off 65 projects across two dozen counties in California. The team has completed conservation projects including planting healthy oak trees, removing hazardous fencing and invasive species from lands, building nest boxes, building pollinator habitats, and more.

In just one example, through a project with Open Field Farms in Sonoma County, The Roots Program will put approximately 800 plants in the ground, including native grasses, sedges, and woody vegetation, along approximately 3,000 feet of stream channel. The project will be implemented by Point Blue's STRAW program, which engages students and teachers from local schools to install the plantings. This project will increase riparian habitat, sequester carbon, reduce erosion, and engage the local community in conservation practices and restoration science. Over four days in December 2023, STRAW engaged over 200 volunteers at Open Field Farms, including students, teachers, and chaperones in the habitat restoration. Next year we will host 18 additional restoration project days, engaging an estimated 1,400 volunteers.

WCB State of California Wildlife Conservation Board

Students helping to restore habitat on a working ranch as part of the Roots Program. Photo by Sam Veloz, Point Blue.

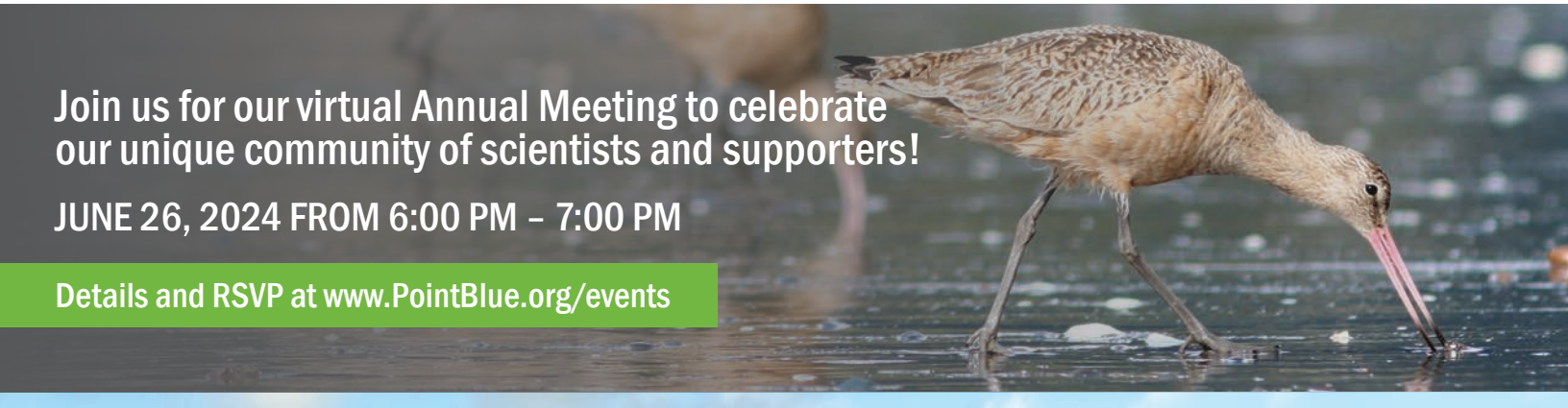
For Liz, one of the most rewarding parts of being involved in Roots is taking a pie in the sky idea and bringing it to life. "Partners will often approach us with these huge ideas for how they want to support wildlife, but they don't know how to access the right funding or they don't know how to get started on the projects," says Liz. "The best part of this work is taking projects from the dream phase to the point where we're actually doing the work on the ground."

Another exciting aspect about the Roots Program is our goal of helping restoration funding reach partners that often have a hard time accessing this funding. Our target over four years is to ensure that at least 50% of project funding is implemented in partnership with Native American tribes, disadvantaged communities, and historically underserved individuals, and we're already on track to exceed that goal.

"This program is the culmination of decades of work with agricultural communities through our partner biologists and our STRAW program," says Liz. "As we thought through what this project could look like, we wanted to make sure the program was filling a real need. Point Blue staff recognized that conservation dollars weren't flowing to everyone. A big part of Roots is addressing those barriers to accessing conservation resources, and building a wider tent for who can participate in conservation actions."

Point Blue
Conservation science
for a healthy planet.

Point Blue Conservation Science
3820 Cypress Drive, Suite 11
Petaluma, CA 94954
707.781.2555 | pointblue@pointblue.org
pointblue.org



Join us for our virtual Annual Meeting to celebrate our unique community of scientists and supporters!

JUNE 26, 2024 FROM 6:00 PM – 7:00 PM

Details and RSVP at www.PointBlue.org/events

Be Part of the Solution

Join the Young Friends of Point Blue today!

Find out more and join today!
www.pointblue.org/YoungFriends

In this growing, inclusive network of young people from 21–39 years old, we turn climate anxiety into action. Through virtual and in-person connections, the Young Friends learn about, visit, and amplify Point Blue's work from the Sierra Nevada to the California Current, and from Alaska to Antarctica.

Your help to expand our network, harness new technologies, push out Point Blue's groundbreaking scientific insights, elevate diverse voices, and raise vital financial support is mission critical.

Above: Young Friends at Stubbs Vineyard. Photo by Julie Chase Baldocchi. Cover: Community members work together to restore a Sierra Nevada meadow. Photo by Garrett Costello, Symbiotic Restoration.