



Cargill Report on Forests

Building sustainable supply chains
so the world can *thrive*

January 2017



Taking a stand against deforestation

Today, we are at a critical crossroads as we consider the role of business in curbing climate change. Global food and agriculture can and must chart a path forward that advances our two linked priorities – nourishing the world and protecting the planet.

Cargill has made a series of bold commitments to end deforestation and create a more sustainable, food-secure world. The implications for Cargill and the markets we serve are significant. We know that forests support plant and animal life while providing food, water, fuel, medicine and livelihoods for billions of people.

Forests are also intrinsically linked to climate, with some estimates suggesting that about 12 percent of global greenhouse gas emissions result from tropical deforestation¹.

This report tracks our progress against Cargill's commitment to end deforestation – where we have made advances and where we need to strengthen our efforts to ensure a lasting impact. This is complex work, but we are committed to collaborating with customers, NGOs, governments, farmers and communities to end deforestation.

In 2014, we endorsed the New York Declaration on Forests at the United Nations Climate Summit. We joined organizations from around the world

to pledge to protect forests and end deforestation across our supply chains. We also continue working with customers to meet their 2020 commitments.

In 2015, we established a [Global Policy on Forests](#) and a series of [Forest Protection Action Plans](#) for priority supply chains.

We have seen marked progress:

- We delivered against our action plans for palm oil globally, soy in Brazil and Paraguay, cotton and maize in Zambia, and strategic sourcing of fiber-based packaging.
- We engaged suppliers and supply chain partners to deepen the implementation of our sustainable sourcing commitments.



- We added our cocoa supply chain to the group of businesses that are assessing deforestation risk.
- We partnered with World Resources Institute’s Global Forest Watch to map 1,918 Cargill sourcing areas for cocoa, palm and soy across 14 countries to establish a baseline for tree cover loss as of 2014 that we can use to help measure and track our progress against our implementation plans.

There are many other accomplishments described in this report, but we know

we have more work to do. There is no one-size-fits-all approach to eliminating deforestation linked to agricultural supply chains.

This first report demonstrates our progress and clearly outlines the work ahead. We invite further dialogue and look forward to working with all our partners to end deforestation.

David MacLennan

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Chairman and Chief Executive Officer

¹ Source: Intergovernmental Panel on Climate Change Report on Agriculture, Forestry and Other Land Use

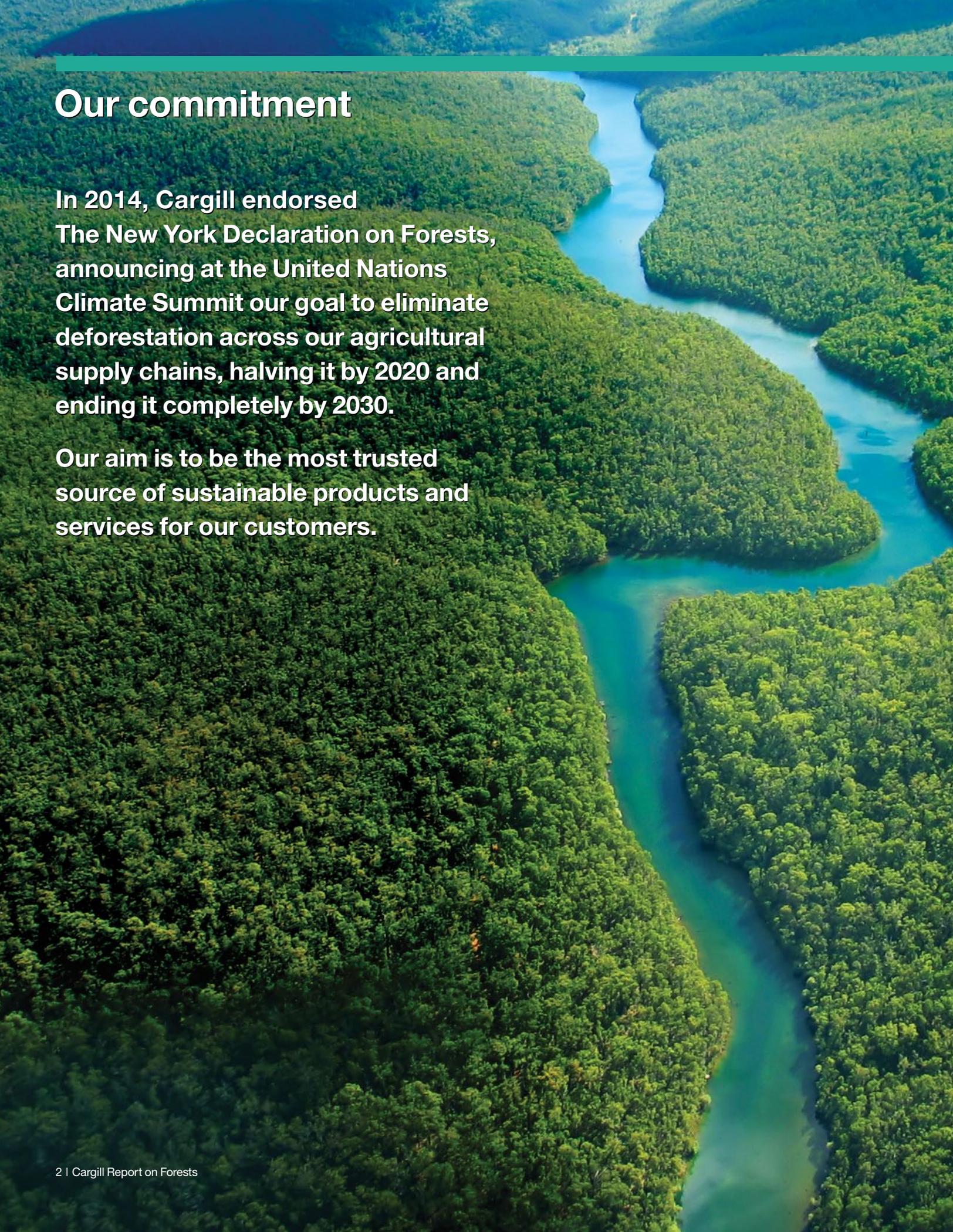


David MacLennan

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An aerial photograph of a dense, vibrant green forest. A winding river, with a light blue-green hue, meanders through the landscape, creating several sharp turns and loops. The forest appears thick and healthy, with varying shades of green indicating different tree species or canopy heights. The lighting is bright, suggesting a sunny day, and the overall scene conveys a sense of natural beauty and environmental stewardship.

Our commitment

In 2014, Cargill endorsed The New York Declaration on Forests, announcing at the United Nations Climate Summit our goal to eliminate deforestation across our agricultural supply chains, halving it by 2020 and ending it completely by 2030.

Our aim is to be the most trusted source of sustainable products and services for our customers.

The challenges and opportunities

When businesses, governments and civil society groups committed to the New York Declaration, there was not a clear road map on how to reach the ambitious goal of ending deforestation by 2030.

Over the last two years, Cargill and others have been working to develop new policies and practices to protect forests.

Today, we know we cannot do this one company at a time, or one supply chain at a time. We need to focus on the areas of highest risk. And we need to focus on approaches that can succeed at scale to achieve the greatest impact.

Addressing the existing gaps in any approach to forest conservation is critical to creating alignment and driving progress. We are working with other stakeholders to bridge these gaps.

- **Building consensus around definitions and standards of measurement.**

Currently, there are overlapping definitions of deforestation, complicating efforts to align stakeholders on a common approach and develop methodologies to better monitor and measure progress.

- **Encouraging government action.**

Engagement and active participation from local and national governments is critical to advancing more effective institutional frameworks and jurisdictional approaches to govern land use and protect forests. This includes rigorous enforcement of existing public policies.

- **Improving collective action at the landscape level.**

Weak forest governance hinders cooperation among actors at the local or regional level to protect forests and improve agricultural practices. By promoting forest and land use laws, we can help



governments more effectively advance sustainable economic development while also protecting forests in valuable landscapes and jurisdictions.

- **Engaging suppliers to implement changes.**

We operate across complex supply chains and work with thousands of farmers, producers, cooperatives, suppliers and brokers, as well as our customers to deliver sustainable products. In our business, we rely on both direct and third-party supplier relationships. In circumstances where we do not have direct relationships with supply chain partners, we are working to develop new avenues to engage our third-party suppliers to raise awareness about our forest policy commitments, and to ensure alignment with our agenda to protect forests.

With a clear view of our goal to eliminate deforestation, we are working to address these challenges. We recognize that global supply chains are interconnected. Cargill is uniquely positioned to work across geographies and supply chains to have a meaningful impact.

Our focus: A more sustainable future

Cargill's purpose is to be the leader in nourishing the world in a safe, responsible and sustainable way. Our position within the global food system provides both the opportunity and the responsibility to create lasting change. We are working at the intersection of sustainability, food security and nutrition to find practical and scalable solutions.

We are focusing on areas where we believe our size and market presence can help make a significant impact: land use, climate change, water resources and farmer livelihoods.

We aim to be the most trusted source of sustainable products and services for our customers. To earn that trust, we are working to deliver economic, social and environmental benefits across our value chains.

We believe the private sector has an important role to play in finding solutions to the world's most pressing challenges. But we can't do it alone. That's why we partner with farmers, government, industry groups, customers and consumers to make the future of food more sustainable.

Practices: Promoting sustainable supply chains

Our forest policy and action plans are focused on driving measurable progress where Cargill does business. We are advancing sustainable practices across our supply chains to engage farmers and have a positive impact.

With our partners, we have developed farmer training and engagement programs to address forest protection in Brazil, Indonesia, Paraguay, Zambia, and Côte d'Ivoire and Ghana in West Africa. This is just a part of Cargill's broader farmer training efforts. We are working with more than

148,000 farmers and suppliers in these countries, including:

- 15,000 soy farmers in Brazil
- 21,000 palm oil farmers in Indonesia
- 1,000 soy farmers in Paraguay
- 21,000 farmers in Zambia
- 90,000 cocoa farmers in West Africa
- 90 suppliers who contributed to the development of a new policy on sustainable fiber-based packaging

Advocacy: Advancing long-term solutions

As Cargill advances sustainable supply chains, we advocate for approaches that strengthen policies and practices to end deforestation.

The Brazilian Soy Moratorium and Forest Code

In 2016, Cargill helped secure the extension of the Brazilian Soy Moratorium indefinitely and advocated for the full implementation of the Brazil Forest Code. The Moratorium has helped significantly reduce deforestation in the Amazon. We have also registered more than 60 percent of our Brazilian soy suppliers in the Rural Environmental Registry, or CAR.

Brazil's Rural Environmental Registry (CAR)

Cargill is requesting producers to provide documentation to demonstrate they are in compliance with the CAR. Producers who fail to present the appropriate documentation are required to sign an agreement that they will comply with the CAR legal enrollment deadlines.

High Carbon Stock Standards

Cargill's Policy on Sustainable Palm Oil prohibits deforestation of High Conservation Value (HCV) lands or High Carbon Stock (HCS) areas. With emerging variations to the HCS methodology, we have advocated for a unified approach to minimize carbon emissions from deforestation and development on peat while integrating social considerations.

- Along with a group of other leading palm oil growers, traders and companies, Cargill sponsored the High Carbon Stock Study, known as the Sustainable Palm Oil Manifesto, to define what constitutes forests and high carbon stock land.
- Cargill participated in the HCS Convergence Working Group, a coalition of palm oil industry and civil society groups, which reached an agreement to endorse one integrated standard to meet no-deforestation commitments in palm oil. The agreement has the endorsement of both growers and NGOs, including Greenpeace, Rainforest Action Network, TFT and World Wildlife Fund.



- We led two projects to evaluate the differences between the alternative methodologies, the HCS Approach and HCS+, to advance the debate for a combined approach.
- Conducting the first side-by-side comparisons of the HCS Approach and HCS+ methodologies, we also piloted one of the first assessments to integrate elements from three complementary frameworks: HCS, HCV and Free, Prior and Informed Consent (FPIC). Findings of these pilots inform the ongoing dialogue and promote best practices in the palm oil sector.

Fiber-based packaging policy

In 2016, we partnered with World Wildlife Fund to evaluate our strategic sourcing and procurement of fiber-based packaging. As a result, we reassessed our approach with a preference for recycled or sustainably certified fiber content. We have developed a road map to ensure that 100 percent of the fiber-based packaging Cargill procures will be sourced sustainably with full chain of custody by 2025.

New palm grievance process

In 2015, Cargill introduced a **[grievance process](#)** for our oil palm supply chain to log and respond to issues in a transparent manner. This process has resulted in corrective action with two suppliers and continues to provide new insights into how best to engage our suppliers and hold ourselves to a higher standard.

Transparency: Building trust with stakeholders

Cargill collaborates with partners around the world to drive industry change and prevent deforestation. To protect forests, we work with farmers, customers, government and civil society to succeed. In 2016, we developed two new partnerships to monitor and manage deforestation risk in our supply chains:

United Nations Development Programme's (UNDP) Green Commodities Programme

We joined Green Commodities Programme in Paraguay to improve sustainable production and regulatory compliance.

World Resources Institute (WRI)

Cargill is working with WRI to measure and assess deforestation risk across our supply chains with Global Forest Watch.

Cargill also continues to deepen existing relationships with a number of long-standing partners:

Brazilian sustainable soy partners

We work with the Brazilian Association of Vegetable Oil Industries, *Coalizão Brasil Clima, Florestas e Agricultura*, *Imaflora*, the Soya Plus Program and others to promote a sustainable soy sector in Brazil.

The Nature Conservancy

We are advancing several joint projects that simultaneously boost agricultural outputs and strengthen conservation efforts in Brazil, Paraguay and the United States. This includes efforts to expand sustainable cocoa production in the Amazon.

Proforest and TFT

We work with these partners in our palm oil supply chain to advance traceability, supplier engagement, smallholder programs and sustainable plantations.

Tropical Forest Alliance 2020 (TFA 2020)

Founded in 2012 by the Consumer Goods Forum and the U.S. Government, TFA 2020 brings together government, business and civil society actors committed to curbing tropical deforestation linked to major commodities such as palm oil, soy, beef, and pulp and paper.

“Cargill has shown serious intent to reduce the deforestation footprint and steer sourcing away from areas perceived as high deforestation risk. The company has shown a willingness to engage in specific regions around specific commodities and pull other companies in those regions towards a higher performance bar on deforestation.”

David Cleary, *Agriculture Lead,*
The Nature Conservancy

Transparency: Building trust with stakeholders

Transparency is critical to building trust. Strengthening tracking systems and increasing global coordination is a priority – and an area we know we need to improve.

To advance transparency, we are:

Establishing a baseline

Partnering with WRI, we are developing a baseline for measuring and managing deforestation across high-risk sourcing areas. Once the baseline is established, we will have the necessary framework to develop key performance indicators to measure and report our progress.

Engaging NGOs

Across supply chains we interact with a number of NGOs. Some serve as implementation partners while others challenge us to do better in applying the highest standards to our direct and indirect suppliers to verify compliance and increase transparency.

Palm reporting

We develop quarterly updates on our palm oil progress to build a 100-percent transparent, traceable and sustainable supply chain by 2020.

Cargill Cocoa Promise reporting

We deliver annual reports on our work to ensure a thriving cocoa sector for future generations.

Sustainability reporting in Brazil

Annually, we develop a sustainability report on our operations in Brazil that highlights our efforts to advance economic, social and environmental progress.

Reporting through the Carbon Disclosure Project (CDP)

Cargill has submitted responses to the CDP Forests questionnaire since 2014 for palm and soy.

Building an advisory council

We committed to building an advisory council comprised of independent, third-party stakeholders to provide counsel on our deforestation activities. We have engaged leaders and will launch our advisory council in 2017.



How to measure progress toward no-deforestation targets: Setting a baseline

In 2015, Cargill began discussions with World Resources Institute (WRI) to develop a global baseline for four regions of its priority deforestation-risk commodities: soybeans in Brazil and Paraguay, palm oil globally, and cocoa globally. Early in 2016, the WRI team began working in earnest with Cargill commodity teams in the key geographies. Using data from Global Forest Watch (GFW) – a cutting-edge, free and independent forest monitoring tool developed in part by WRI – the team worked with Cargill to develop a cross-commodity methodology to assess forest loss in priority sourcing areas and establish a baseline against which Cargill will be able to measure progress towards 2020 and 2030 no-deforestation goals.

The GFW team worked with Cargill to conduct field visits, identify region-specific forest loss trends, better understand Cargill's geospatial capabilities to facilitate integration with WRI data, and assess the utility of a global platform that could be deployed by other companies operating in a multi-commodity context.

Setting 2014 as the baseline year (the same year Cargill pledged to eliminate deforestation from its supply chains globally) with past forest loss as background, WRI used GFW data to measure forest change around the points from which Cargill originates these commodities. This multi-commodity baseline assessment illustrates the landscape context of land use change around the sourcing locations. The results will help Cargill compare the scale of deforestation and prioritize among different geographies, measure progress towards deforestation goals, and will provide a quantitative background for further analyses.

The analyses were based around 1,918 separate infrastructure points that Cargill owns, manages, or buys from, and include soy silos, palm oil processing mills, and cocoa collection points across 14 countries. For each point, an estimated sourcing radius (e.g., 30 km, 50 km, or variable) was used to approximate the “draw area” from which that point may collect, and the area within each radius was analyzed for tree cover loss², including any within overlapping protected areas.

² Tree cover loss is defined by [Global Forest Change](#) by Hansen, Potapov, Moore, Hancher et al. and published in the journal [Science](#), vol. 342, no. 6160, 2013, pp. 850-853.

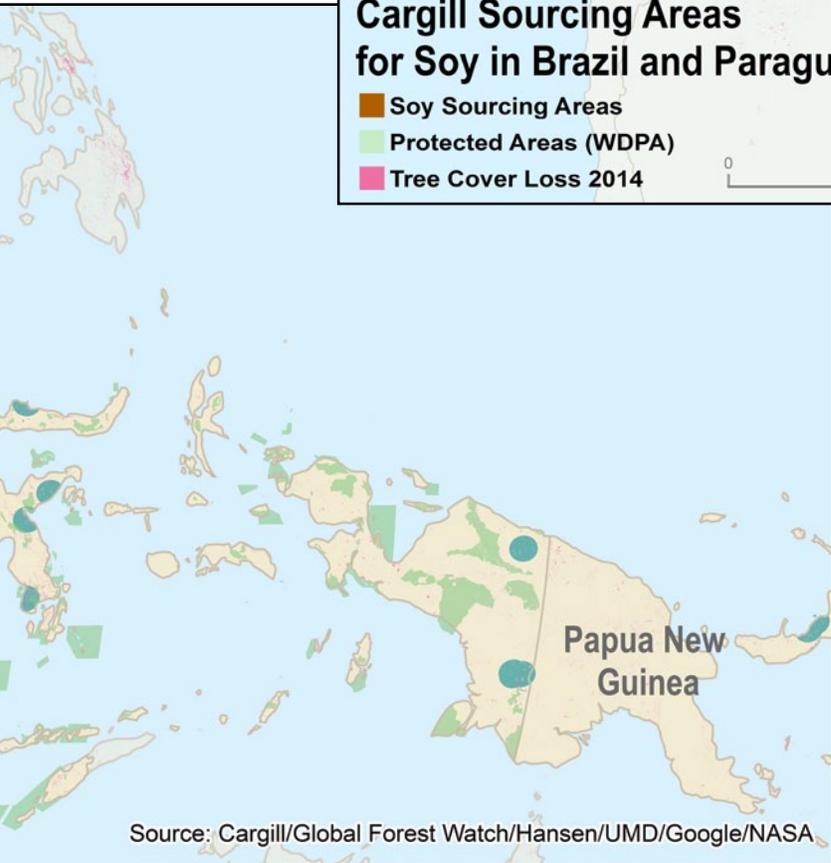
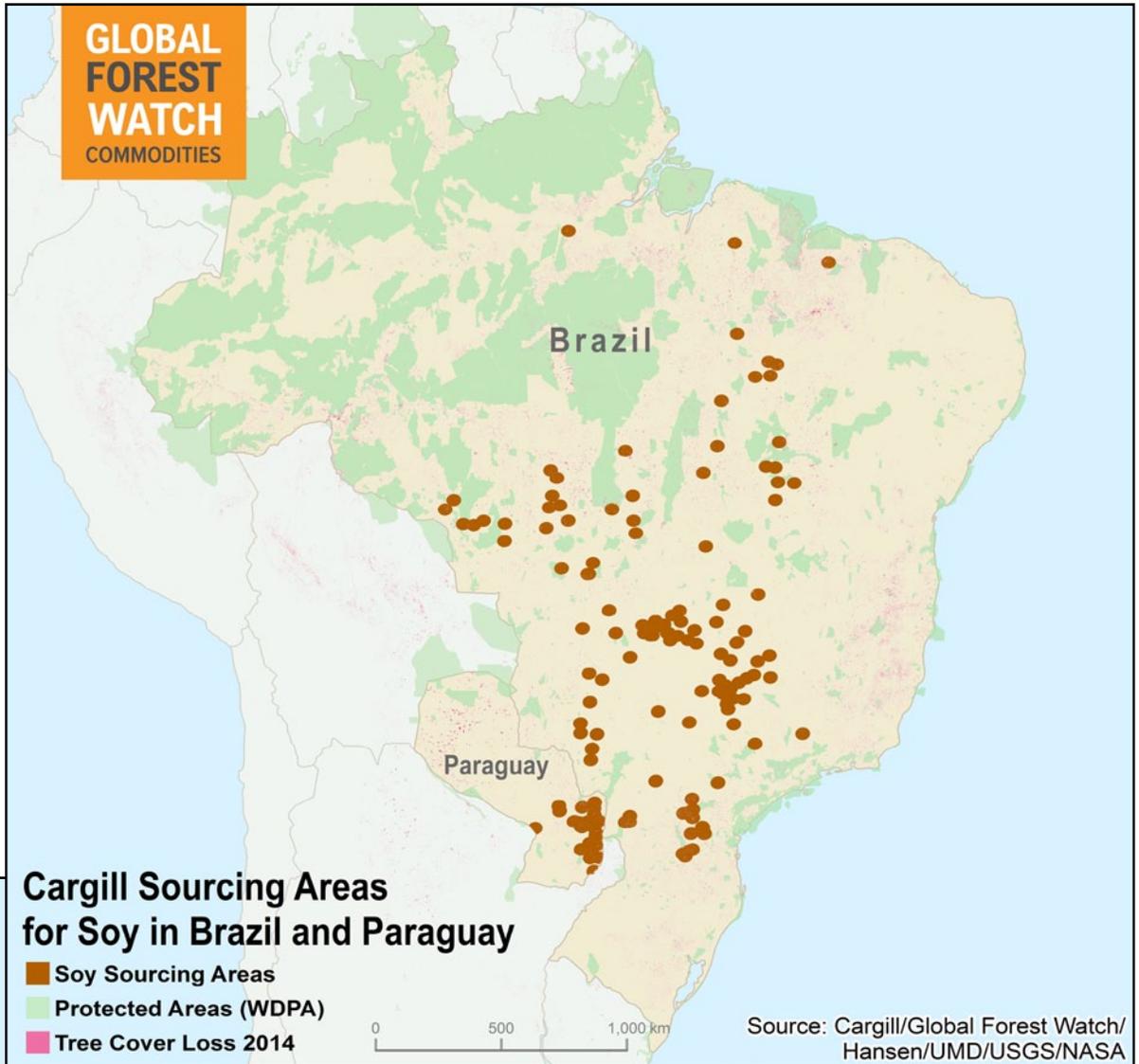
Using estimated sourcing areas around these points, a 2014 retroactive baseline and historical levels of deforestation in these landscapes was established. Put together, these points encompass an area of more than 166 million hectares and include more than 119 million hectares of historical tree cover. GFW analysis shows that these areas experienced 1.7 million hectares (approximately 1.4 percent) of tree cover loss in 2014. Of that loss, 47,000 hectares were in protected areas.

IMPORTANT: These results illustrate the loss of forest in the approximate vicinity of Cargill's sourcing areas, but the forest impacts should not be interpreted as directly attributable to the commodity of interest or to Cargill's sourcing itself. There are many overlapping causes of deforestation and many actors (including Cargill's commodity trading peers) operating in the same landscapes. As such, only a closer study of Cargill's actual sourcing using production-level footprint data will produce an accurate measurement of forest loss in Cargill's supply chains and the reduction thereof.

Cargill's wholesale assessment of hundreds of its sourcing areas in tropical forest regions using Global Forest Watch data is an unprecedented step in measuring progress toward no-deforestation targets. These analyses and other insights will catalyze Cargill's work going forward, and are setting an example for industry peers of how a global and data-driven approach can kick-start a company's implementation of a responsible sourcing policy.

As Global Forest Watch continuously releases new data and provides further context for factors that impact forests, Cargill can continuously evaluate its portfolio at both global and local scales, and help influence industry change.





“Transparency is key to achieving deforestation commitments. Measurement and monitoring is a necessary first step in that journey. Cargill’s position in the market could serve as a potent catalyst to influence other actors in commodities supply chains to embark on comparable measurement efforts to monitor real-time deforestation impact in supply chains.”

Luiz Amaral, *Director, Private Sector Engagement, Global Forest Watch, World Resources Institute*

Progress against our supply chain action plans

Ending deforestation requires more than a one-size-fits-all approach. Each supply chain is different and has its own unique social, environmental and regulatory challenges. As we work to drive progress, we are addressing the conditions of particular supply chains while applying global insights.



Sustainable palm oil globally

Building a 100 percent traceable, transparent and sustainable supply chain by 2020

Cargill sources palm oil from 10 countries and delivers to hundreds of customers worldwide. Palm oil is widely used in a variety of consumer products and is the preferred cooking oil in many countries. As increased demand has led to clear-cutting of forests and development on peat areas, Cargill has developed policies and programs to source palm oil responsibly and sustainably.

Since Cargill released its [Policy on Sustainable Palm Oil](#) in 2014, we have been working to reach our goal of building a 100 percent traceable, transparent and sustainable supply chain by 2020.



Our actions

- We introduced a revised sustainable palm implementation plan that promotes responsible land use, social responsibility and economic viability in our supply chains.
- We are partnering with Proforest and TFT, two NGOs with deep experience in palm supply chains, to conduct supplier assessments. Following the assessments we work with the NGOs to develop supplier engagement strategies to highlight concerns and ensure compliance with our policy.
- We have also instituted a formal [grievance process](#) for logging and responding to allegations of supplier misconduct.
- We worked with small-scale farmers – who comprise roughly 40 percent of our palm oil supply – to help them meet requirements for sustainable palm oil production based on the Roundtable on Sustainable Palm Oil's (RSPO) principles and criteria and our policy. We conducted two workshops with smallholder farmers to increase awareness of our policy and best practices.
- We advanced sustainable practices at the four palm plantations Cargill owns and operates in Indonesia. We are working to uphold the highest standards on these plantations and have ongoing programs to reduce greenhouse gas emissions, lead best practices in environmental management and collaborate with local government. This includes participation in the Initiative for Sustainable Landscapes to create a sustainable supply shed in South Sumatra.
- We participated in a number of multi-stakeholder groups to advance dialogue and promote a more sustainable industry for palm oil. These partnerships, which include IDH-The Sustainable Trade Initiative Working Group, and a new partnership with World Resource Institute's Global Forest Watch, demonstrate the ongoing need for scalable solutions.

Our results

- In 2015, we mapped our third-party traded palm oil to the mill level, achieving our goal of full traceability to the mill in key markets. Building on this progress, we are now working to reach full traceability to mill across all the markets we serve and have started reporting on traceability to plantation.
- In 2016, we completed four supplier assessments in partnership with NGOs.
- We have engaged 10 high-risk suppliers to highlight concerns and ensure compliance with our policy.
- We have worked with farmers to increase access to agricultural services to improve yields, manage costs, optimize inputs and open pathways to certification.
- In 2016, our P.T. Poliplant Sejahtera palm oil plantation in West Kalimantan, Indonesia, and P.T. Hindoli Sungai Lilin Kernel Crushing Plant in South Sumatra, Indonesia, were both certified by the RSPO. At our Poliplant Group plantations, we are preparing more than 390 smallholders to achieve RSPO certification and complete High Carbon Stock and High Conservation Value assessments.
- Five palm oil mills at Cargill's palm oil plantations in Indonesia were recognized in 2016 with Green Industry Awards by the Indonesian ministries of environment and forestry and industry in 2016 for achievements in environmental management.

Sustainable soy in Brazil

Building on a decade of progress to protect the Amazon and advance sustainable soy production

Brazil is the world's second largest producer of soybeans. Cargill works with more than 15,000 soy farmers at all levels of production across the country. Cargill has been working since 2004 to reduce deforestation in the Amazon biome.

Our actions

Cargill and industry, government and civil society partners marked a major milestone by extending indefinitely the 10-year Soy Moratorium in the Amazon biome, a voluntary ban on purchasing soy produced on newly deforested land. The moratorium was one factor that has contributed to an 80 percent reduction in the rate of deforestation since 2004. With the Soy Moratorium extended, we are now:

- Advocating for the implementation of the Brazilian Forest Code and governance through the Rural Environmental Registry, or CAR, which is expected to go into effect in December 2017 to ensure country-wide environmental land use compliance and monitoring.
- Participating in the *Coalizão Brasil Clima, Florestas e Agricultura*, a multi-sector movement established to propose initiatives and influence public policies that lead to the development of a low-carbon economy by creating decent jobs, encouraging innovation, advancing Brazil's global competitiveness and generating wealth across society. Over 150 companies, business associations,

research centers and civil society organizations have already joined. Some of the partners are The Nature Conservancy, World Wildlife Fund, the Brazilian Association of Vegetable Oil Industries (ABIOVE), Agroicone, Imazon, IPAM and many others. Cargill co-leads the forest code implementation working group.

- Partnering with ABIOVE to expand the Soya Plus Program, an environmental and social management program for soy in Brazil.

Cargill's Geographic Information System (GIS) Team utilized geospatial analysis and satellites to monitor Cargill's supply chains in Brazil and monitor our suppliers' adherence to the Brazilian Forest Code and farm registration system. Using a WebGIS platform, available public data and Cargill proprietary intelligence, we are working to better understand the grain supply chains in which we operate and help connect local farmers to consumers anywhere in the world.

Our results

According to data released by Brazil's Ministry of the Environment in October 2016⁴, more than 3.8 million farms representing almost 400 million hectares have been registered in the CAR over the past two years.

While increased registration demonstrates significant progress, data collection and reporting systems have yet to keep pace with the need for transparency in soy origination. To address this challenge, Cargill has advocated for various efforts to increase transparency and availability of the CAR data.

Last year, we further strengthened the adoption and implementation of the Brazilian Forest Code by:

- Assessing more than 12,000 farmers related to our soy supply chain regarding their CAR status and Forest Code implementation. These assessments revealed that 60 percent of Cargill's direct soy sourcing in Brazil is covered by the CAR. We are working to expand the implementation of the CAR with our direct and indirect suppliers.

- Training 300 Cargill employees to evaluate and track the implementation of the Forest Code in our supply chain and encourage producers to register in the CAR.

- Developing and distributing 20,000 leaflets to inform and educate farmers and farmer associations about the Forest Code.

- Signing a Cooperation Agreement with the Brazilian Ministry of the Environment to further demonstrate our support of the CAR.

- Enrolling and committing to the Green Grain Protocol, which incorporates the CAR as a sourcing requirement, in the State of Pará.

- Supporting the expansion of the Soya Plus Program to the MAPITOBA states of Maranhão, Piauí, Tocantins and Bahia. The CAR has been incorporated as a key performance indicator of the program and training sessions.



- Translating and distributing 1,000 copies of IMAFLORA’s “[Guide for Application of the New Forest Law to Rural Properties](#)” to producers and international stakeholders.

The incorporation of the CAR as a sourcing requirement for all soy direct sourcing will be implemented over the next few growing seasons in accordance with the new CAR enrollment legal deadline.

In the meantime, we have included a formal request in our Origination Credit Policy in Brazil for all producers with whom Cargill trades to present documentation proving they are in compliance with the CAR. Producers who fail to present the appropriate documentation will be required to sign an agreement acknowledging the importance of the CAR and committing to comply with the CAR enrollment legal deadlines.

*Source: CAR Boletim Informativo (Information Bulletin)



Sustainable soy in Paraguay

Mapping Cargill's footprint and working with stakeholders to enforce the country's forest law

Fifty percent of Paraguay's total agricultural area is devoted to soy, a product that accounts for 12 percent of the country's Gross Domestic Product. Cargill partners with governments, civil society groups, businesses and more than 3,000 farmers in the Atlantic Forest region.



We have been advancing our sustainable soy program in Paraguay since 2012 to meet the sustainability criteria recognized by the European Union, a major destination for Paraguayan soy.

Our actions

- Cargill joined the U.N. Development Programme's Green Commodities Programme to advance multi-stakeholder dialogue, while continuing to work directly with soy producers to educate them on best practices and new policies in the Atlantic Forest.
- We started a partnership with WRI in Paraguay (and other countries) to help equip the agricultural sector with new analysis tools. We have also increased our risk analysis capabilities through a third-party-driven analysis using geographic information systems, including 100 percent of the farmers participating in Cargill's sustainability program in Paraguay.
- Cargill advanced the Triple S (Sustainably Sourced & Supplied) process of continuous improvement. We rolled out a proprietary certification program based on three pillars: increasing the use of best agricultural practices; protecting worker welfare; and managing greenhouse gases under a continuous improvement process that encourages greater adoption of sustainable practices.

Our results

- With the help of partners, including WRI and The Nature Conservancy, Cargill has delivered training on sustainable practices to our employees at 30 grain elevators in eastern Paraguay so they can support farmers as they apply company policies, evaluate market trends, and implement monitoring and analysis tools.
- By the end of 2016, we verified that 40 percent of the soy we source has been grown sustainably. We are working to expand our verification process in 2017.

Sustainable cocoa in Côte d'Ivoire

Ensuring socially and environmentally responsible production in West Africa

Cargill has sourcing and processing operations in major cocoa-growing countries, including Brazil, Cameroon, Côte d'Ivoire, Ghana and Indonesia. We process a full range of cocoa and chocolate products at facilities in Europe, North America, Indonesia and Brazil, which are used by food companies around the globe.



Over two-thirds of the global cocoa crop comes from just four countries in West Africa: Côte d'Ivoire, Ghana, Cameroon and Nigeria. In the cocoa supply chain, forest loss is considered largely incremental, driven not just by agricultural development.

Promoting sound governance and strong forest management policies in order to protect landscapes and biodiversity is a key component of developing a sustainable cocoa supply chain, working with farmers to increase yields and incomes.

Our actions

- Through a three-year partnership with The Nature Conservancy, we are replanting areas of land in Brazil that have been cleared of forest, as well as growing 1,000 hectares of cocoa using the forest canopy as shade protection. The project has created two demonstration plots to teach farmers about preserving forests, biodiversity and soil quality. Since 2010, Cargill has worked with The Nature Conservancy to develop and test new production models to address reforestation using cocoa, which is indigenous to the region.
- Cargill is participating in the multi-stakeholder Initiative for Sustainable Landscapes led by IDH-The Sustainable

Trade Initiative to protect six key landscapes in Africa, Asia and South America.

- Cargill is working with WRI to develop a landscape approach to evaluating deforestation risk in our cocoa supply chains, with the aim to encourage best practices in land use on a global scale.
- We are engaging policymakers and partners to drive greater transparency and align policy and the enforcement of regulations, to create sectorial and cross-sectorial solutions.

Our results

- Through the Cargill Cocoa Promise we are working with 90,000 cocoa farmers in Côte d'Ivoire and Ghana. As a part of that effort we are advancing sustainable farming techniques including better crop protection and fertilizer use. This is reducing overuse that can impact soils and biodiversity and helping increase farmers' yields.
- As part of our Farmer Coaching Field School curriculum, we have trained more than 90,000 farmers to improve productivity on existing land and curb deforestation.

Farmers are encouraged to plant shade trees not only to protect young cocoa trees but also to enhance biodiversity on their farmland.

- We are supporting a network of nurseries to grow and offer better quality, more resilient seedlings and young cocoa trees to farmers. We have supplied almost 150,000 seedlings to farmers in Côte d'Ivoire, Ghana and Indonesia and aim to supply a further 500,000.





Sustainable cotton and maize in Zambia

Working with more than 45,000 farmers and a new partner (PROFIT+) to promote sustainable practices

In Zambia, Cargill sources from more than 45,000 smallholder farmers who produce cotton and maize. While Zambia is not generally viewed as a hot spot for deforestation, agriculture has been encroaching on forested areas in parts of the country's Eastern Province. We have focused our conservation efforts and farmer training programs in this region.



Our actions

- We participated in the task force of the Chipata Roundtable and engaged with the Zambian Climate Resilience Secretariat and the World Bank Group's BioCarbon Fund Initiative for Sustainable Forest Landscapes.
- Cargill agreed to participate in a study led by the World Bank Group that focused on the drivers of deforestation in the Luangwa Valley region of Eastern Province. The study signaled an important shift from the prevailing understanding that cotton is the main driver of deforestation. It identified, in addition to agricultural expansion, fuelwood extraction and forest fires as the main drivers of deforestation. A further study led by the World Bank Group is now underway to consider how to incorporate sustainability practices that further reduce greenhouse emissions and improve rural livelihoods. This study began in November 2016 and the results are expected to be publicly available later in 2017.
- We promoted sustainable practices through Cargill Women's Clubs. The training to these farmer groups highlights the importance of stopping the encroachment into forestland. Participants are encouraged to plant trees and local plants, diversify their crops, improve pesticide use and adopt new farming techniques such as beekeeping for pollination and honey production.

Our results

- Cargill worked with 45,000 farmers in Zambia to sustainably source cotton and maize, providing improved fertilizer and other services.
 - By the end of 2016 we provided sustainable agriculture training to more than 21,000 farmers. Farmers in this program have substantially increased their crop yields.
 - In 2016, Cargill evolved its approach in Zambia by joining with USAID Zambia Production, Finance and Improved Technology Plus (PROFIT+) to support small-scale farmers and to encourage the growth of entrepreneurial, independent agro-dealers in Zambia's agriculture sector.
- Under the project to be implemented by the nonprofit ACDI/VOCA, PROFIT+'s network of more than 300 independent agro-dealers in Eastern Province will replace the services that Cargill provided to farmers, including access to seeds, fertilizer, extension services and training. PROFIT+ has been working with farmers in Eastern Province since 2012 to improve agricultural productivity, reaching more than 200,000 small-scale farmers and increasing farmers' incomes by 30 percent.

Sustainable fiber-based packaging

Developing a new procurement policy in partnership with World Wildlife Fund

Cargill spends more than \$1.2 billion annually on packaging. Of the fiber-based packaging Cargill purchases, approximately 98 percent falls into three categories: corrugated, paper bags and folding cartons.



Our actions

In partnership with the World Wildlife Fund, we surveyed approximately 90 suppliers with an annual spend of \$10,000 or more, encompassing the majority of our supplier network, to gain a better understanding of the existing policies and potential risks in our supply chain.

As a result of this engagement, we have committed to take the following actions in accordance with our [Policy on Sustainable Fiber-based Packaging](#):

To be considered responsibly-sourced, Cargill will give preference to 100 percent recycled or Forest Stewardship Council (FSC)-certified fiber where available, also considering factors such as integrity and cost. We will also accept any certification system endorsed by the Programme for the Endorsement of Forest Certification. We will work with our suppliers to help them reach full chain of custody, with a preference for FSC certification.

We will work to achieve the following milestones:

- By 2018, 100 percent of fiber-based packaging⁵ with fiber origins in higher risk regions will be recycled or, at a minimum, third party-verified to meet the FSC Controlled Wood Standard.
- By 2020, 100 percent of fiber-based packaging with fiber origins in higher risk regions will be sourced responsibly: recycled or certified, with a preference for FSC.
- By 2025, 100 percent of fiber-based packaging Cargill procures will be sourced responsibly: recycled or certified, with a preference for FSC.
- Cargill will make its policy publicly available and engage with suppliers to implement the new policy beginning in 2017.





The path forward

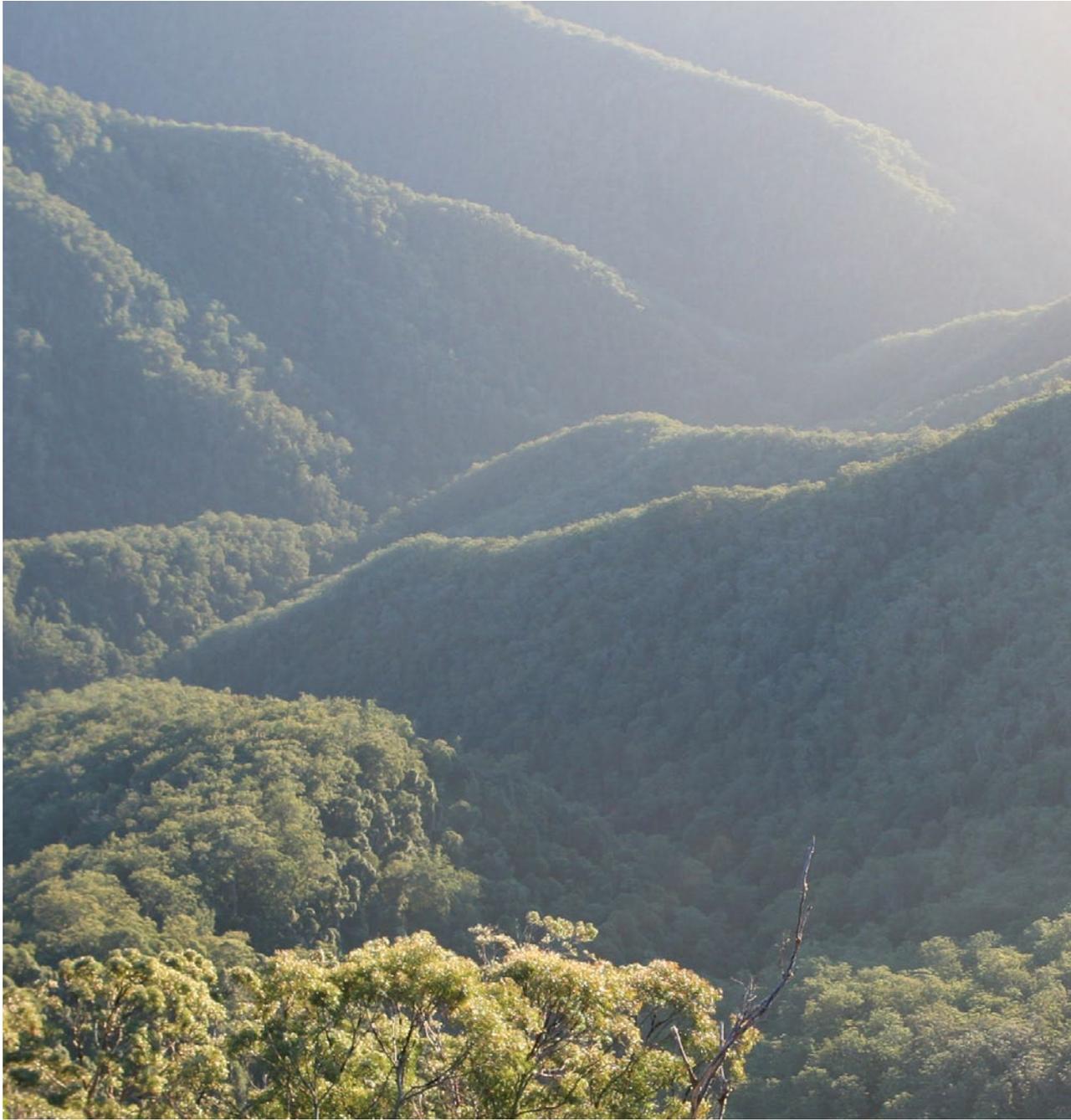
The rate of change is accelerating. This is as true for Cargill as it is for the world around us. As we embrace change, we must learn and adapt our approaches while sharpening our focus on critical issues.

This includes forests. As a leader in agriculture, food and nutrition, we recognize that the strength of our global food system depends on the health of our natural resources and our farming communities.

We have seen marked progress since we began our journey more than a decade ago. Over the last two years, we have taken steps to map and reduce our impact in key geographies and supply chains. At the same time, the growing commitments from business, government and civil society are signs of hope. Increased collaboration is driving momentum to address the global challenge of deforestation.

While we are encouraged, we need more than incremental improvements. We have more work to do and recognize we must help set the standard for sustainable, deforestation-free supply chains. Moving forward, we are resolved to:

- Incorporate forest protection and other sustainability measures more fully into the core of our business.
- Collaborate with our suppliers, customers, government and civil society to establish practical systems and tools to measure progress, improve transparency and contribute to integrated supply chain and landscape approaches that meaningfully reduce forest impacts.
- Advocate for progress by leveraging our size, expertise and supply chain capabilities to positively influence our industry and government.
- Hold ourselves and our suppliers accountable to our forest policies and deliver on our commitments to reduce and eventually eliminate deforestation from our supply chains.



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