

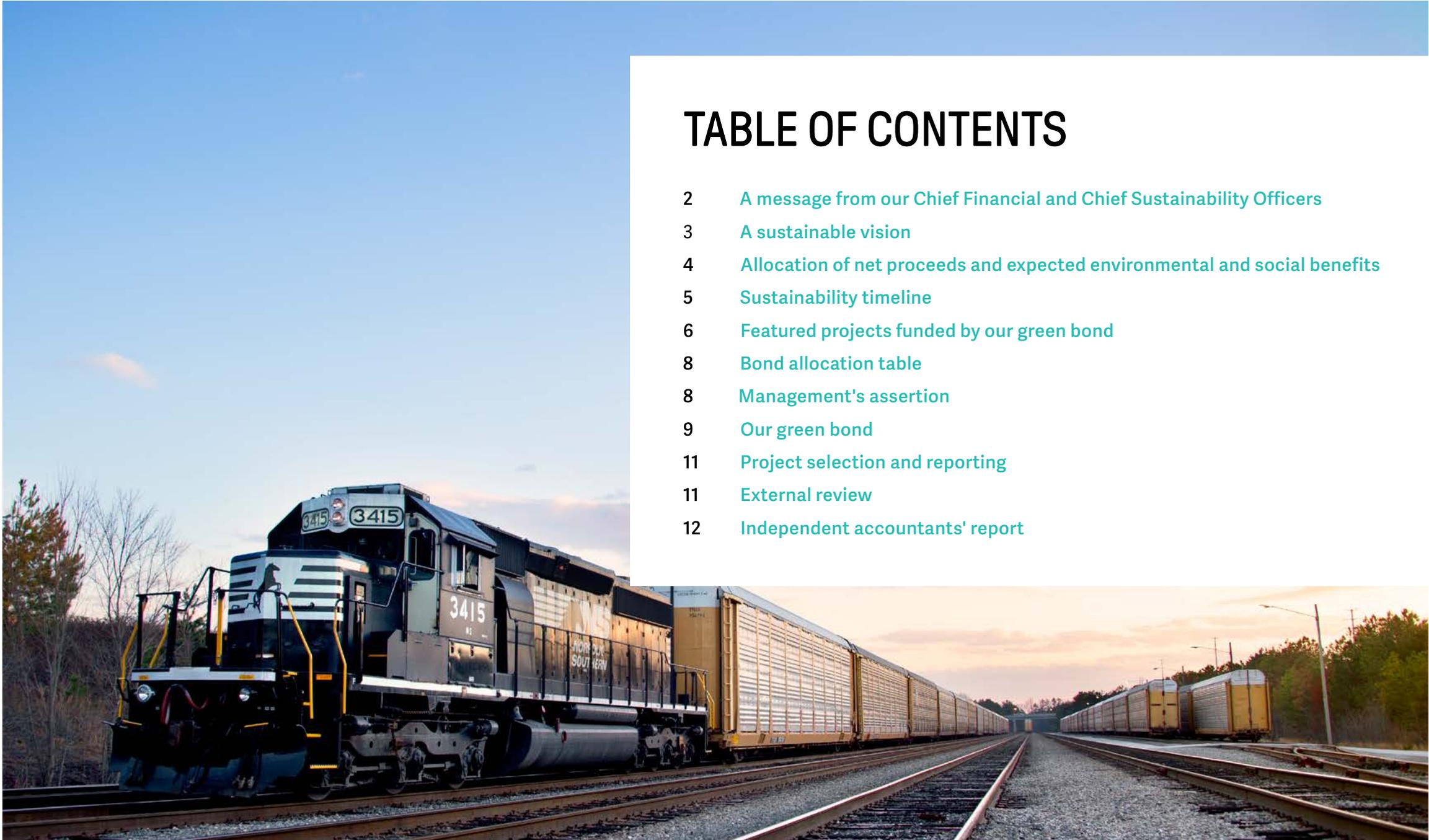


# IN THE BUSINESS OF A BETTER PLANET

NORFOLK SOUTHERN USE OF PROCEEDS REPORT

Covering our May 2021 Green Bond





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# A MESSAGE FROM OUR CHIEF FINANCIAL AND CHIEF SUSTAINABILITY OFFICERS



Our customers avoid an estimated 15 million metric tons of carbon emissions annually by shipping with Norfolk Southern. Rail currently moves 45% of all freight ton-miles for long-distance shipping in the U.S. while only producing 7% of freight carbon emissions. On average, we can haul one ton of freight in excess of 460 miles on a single gallon of fuel. We're honored to sustainably serve our customers and communities in this way – and proud to partner with those who share our vision for responsible growth.

Over the past year, Norfolk Southern has taken notable steps to further our long-term sustainability goals. We established a science-based target for greenhouse gas reduction consistent with the Paris Agreement on climate change, and became the first major North American railroad to issue green bonds. Through these initiatives, we're taking a comprehensive approach to carbon emissions reduction across our company.

In May 2021, we issued \$500 million in green bonds. With our green bond financing, we are aligning our efforts to address climate change and advance sustainable business practices with investors' desire to put their money toward projects that benefit the environment.

Norfolk Southern's commitment to sustainability and innovation has received notable recognition over the years. Recently, we've been honored by Environmental Finance with the 2022 corporate "green bond of the year" award, as well as earned the Responsible Care Energy Efficiency Award for locomotive fuel efficiency from the American Chemistry Council. We're proud of what our company has accomplished so far, and grateful for the support of so many who have helped us achieve our shared goals.

With the added partnership and resources of our green bond investors, we intend to take our industry leadership even further. From improved fuel efficiency of our locomotive fleet to ecological projects that restore natural landscapes, and much more, we believe these funds are driving progress and long-term value for all our stakeholders.

Sincerely,

Mark George, Chief Financial Officer (left)

Josh Raglin, Chief Sustainability Officer (right)

To our stakeholders,

At Norfolk Southern, we're in the business of a better planet – committed to being a sustainability leader for the transportation industry and throughout the communities we serve. Together, we have a tremendous opportunity to reduce our environmental impact, improve the efficiency of our organization, and drive long-term shareholder value. We intend to lead our industry in delivering the low-carbon economy while helping customers reduce their supply-chain emissions.

Norfolk Southern was awarded the 2022 corporate  
**"green bond of the year"**  
by Environmental Finance.

## A SUSTAINABLE VISION

Norfolk Southern has allocated

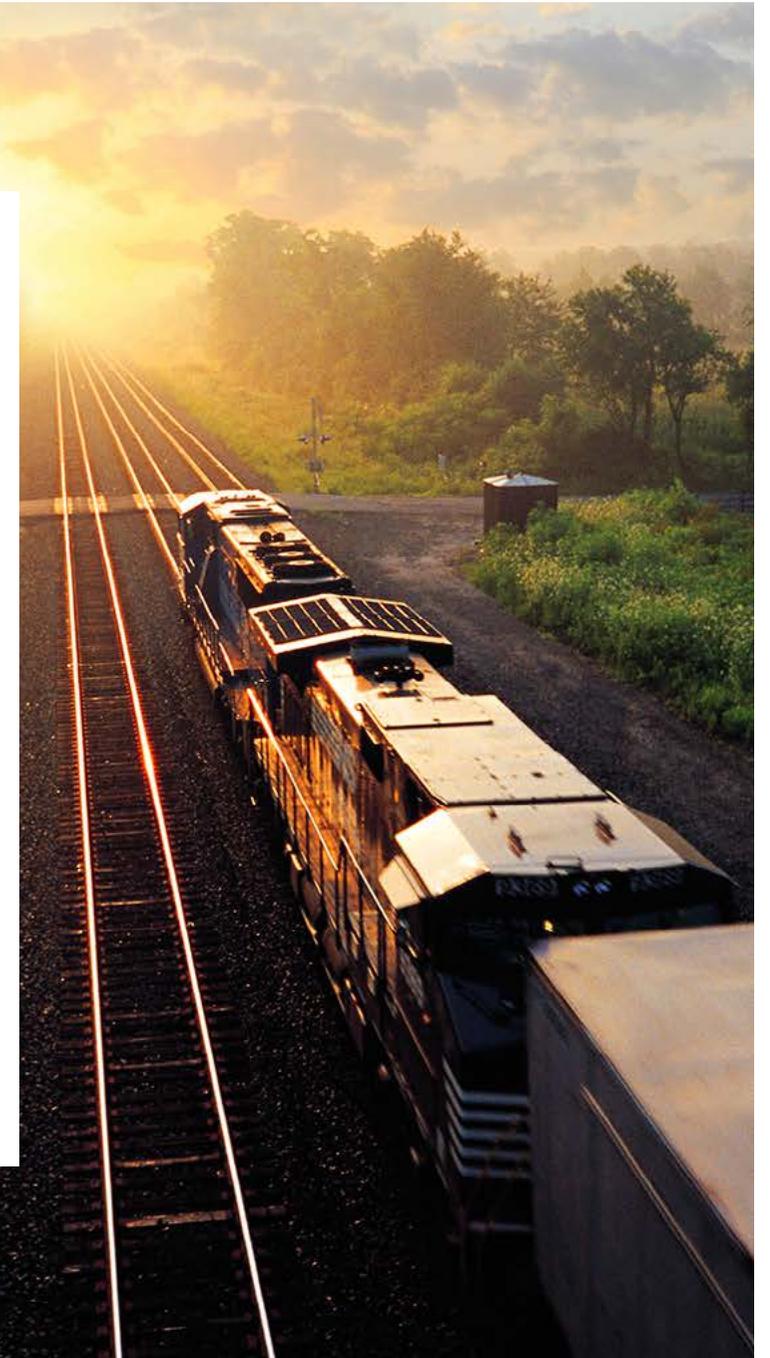
**\$496 Million**

– 100% of net proceeds from the green bond.

Sustainability is in Norfolk Southern's DNA. Throughout our history, we have strived to deliver a safe and reliable service product as an environmentally and socially responsible partner. We support a wide range of industries and manufacturers, connecting customers to markets and communities to economic opportunity. As a leader in innovation, Norfolk Southern is developing cutting-edge technology and creative ways to improve service and efficiently manage resources.

In 2007, we were the first in our industry to appoint a Chief Sustainability Officer. We've now become the first North American railroad to issue green bonds. Through it all, we have focused on instilling sustainability at every level of our organization. Having allocated nearly \$500 million of net proceeds for eligible green projects, we believe Norfolk Southern is well-positioned to build on what we've accomplished.

In this report, we'll share our allocation for these funds, and the benefits we anticipate for our company, customers, and communities.



# ALLOCATION OF NET PROCEEDS AND EXPECTED ENVIRONMENTAL AND SOCIAL BENEFITS

Allocation amount in millions

Total Allocation

\$496.0

## Efficiency & The Environment



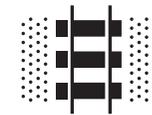
Locomotive Conversions

\$275.6



Intermodal Facility Improvements

\$99.5



Rail, Ties, and Ballast Program

\$97.8



Locomotive Fuel Management

\$10.9



Rail Siding Extensions

\$6.5



Locomotive GP34 ECO Yard Unit

\$1.4

## Environmental Stewardship



Restoration of Shore Line

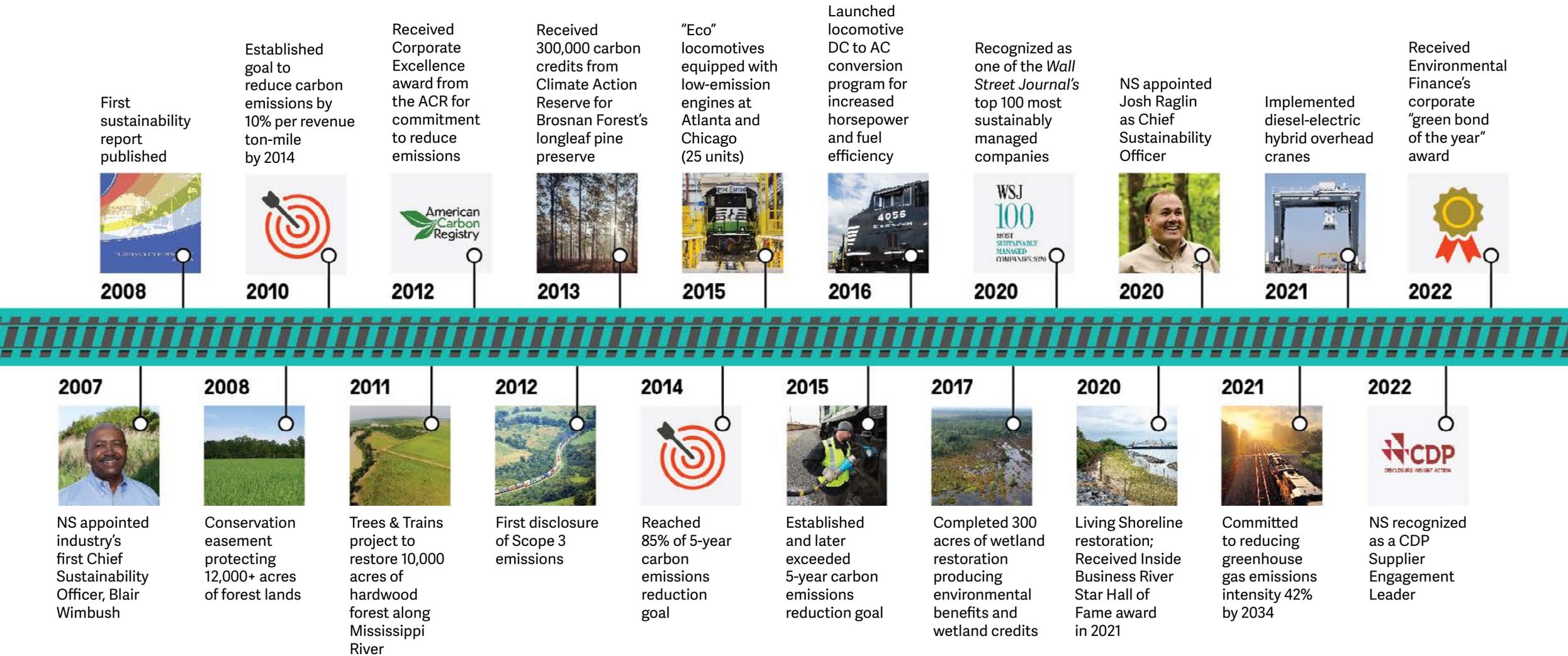
\$0.9



Restoration of Stream and Wetland Ecosystems

\$3.4

# SUSTAINABILITY TIMELINE



# FEATURED PROJECTS FUNDED BY OUR GREEN BOND

## Locomotive conversions and fuel efficiency



At Norfolk Southern, initiatives to improve efficiency in our operations are also delivering environmental benefits. A prime example is our DC-to-AC locomotive conversion program, which is producing more reliable and fuel-

efficient units at about half the cost of buying new models. According to Wabtec, our industry partner on the project, roughly 200 tons of carbon emissions are saved due to modernizing an existing locomotive versus producing a newly manufactured AC locomotive. That also means less wasted material as locomotives are reimagined, rather than scrapped. Upon completion of the program, Norfolk Southern expects to have the largest modernized fleet in North America, with each converted unit avoiding 500 tons of carbon emissions per year due to fuel savings.

Additionally, the use of energy management technology across our locomotive fleet is helping Norfolk Southern improve fuel efficiency and meet our science-based target for carbon reduction. With a portion of funds from our green bond, we're making further investments to equip our road fleet with these optimizing systems.

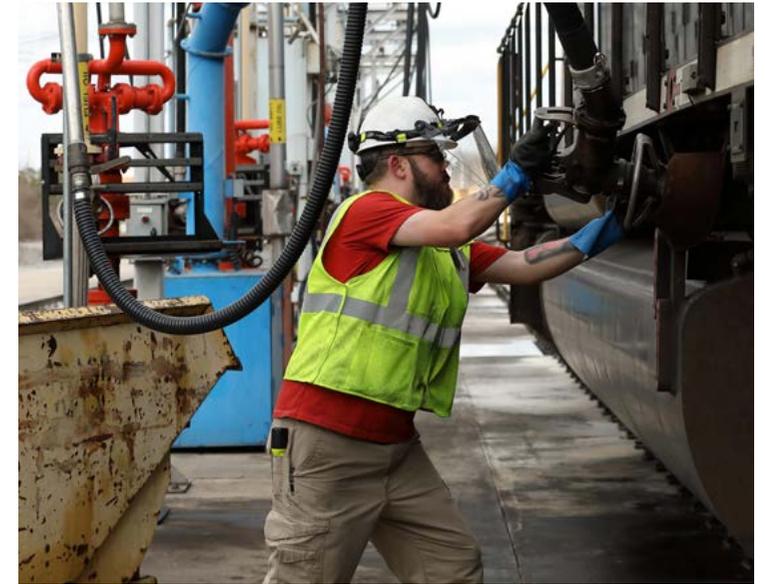
## Roughly 200 tons of carbon emissions are avoided

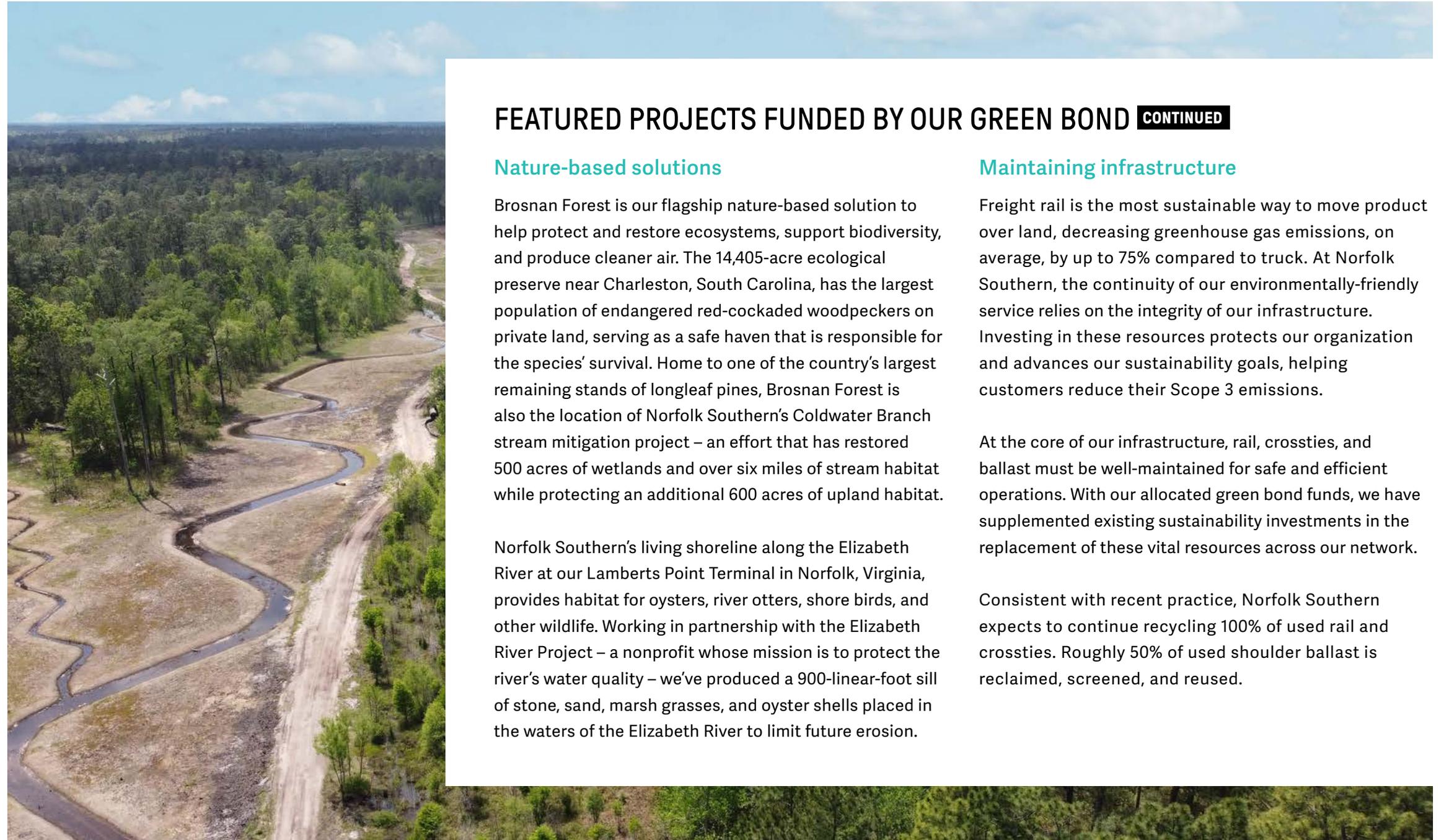
when modernizing an existing locomotive versus producing a newly manufactured AC locomotive.

## Intermodal advantages

Norfolk Southern has the most extensive Intermodal franchise in the Eastern U.S., offering service to over 50 facilities across our network. Our Intermodal freight directly competes with truck markets, allowing us to reduce shipping costs and emissions for our customers. On average, our trains are removing millions of trucks – more than four million in 2021 – from the nation's congested highways each year.

Our Intermodal network requires annual investment and maintenance to provide this green shipping solution for our customers. In part through our green bond financing, we're renovating and expanding these vital facilities to promote the flow and modal shift of freight to lower-carbon alternatives such as rail.





## FEATURED PROJECTS FUNDED BY OUR GREEN BOND **CONTINUED**

### Nature-based solutions

Brosnan Forest is our flagship nature-based solution to help protect and restore ecosystems, support biodiversity, and produce cleaner air. The 14,405-acre ecological preserve near Charleston, South Carolina, has the largest population of endangered red-cockaded woodpeckers on private land, serving as a safe haven that is responsible for the species' survival. Home to one of the country's largest remaining stands of longleaf pines, Brosnan Forest is also the location of Norfolk Southern's Coldwater Branch stream mitigation project – an effort that has restored 500 acres of wetlands and over six miles of stream habitat while protecting an additional 600 acres of upland habitat.

Norfolk Southern's living shoreline along the Elizabeth River at our Lamberts Point Terminal in Norfolk, Virginia, provides habitat for oysters, river otters, shore birds, and other wildlife. Working in partnership with the Elizabeth River Project – a nonprofit whose mission is to protect the river's water quality – we've produced a 900-linear-foot sill of stone, sand, marsh grasses, and oyster shells placed in the waters of the Elizabeth River to limit future erosion.

### Maintaining infrastructure

Freight rail is the most sustainable way to move product over land, decreasing greenhouse gas emissions, on average, by up to 75% compared to truck. At Norfolk Southern, the continuity of our environmentally-friendly service relies on the integrity of our infrastructure. Investing in these resources protects our organization and advances our sustainability goals, helping customers reduce their Scope 3 emissions.

At the core of our infrastructure, rail, crossties, and ballast must be well-maintained for safe and efficient operations. With our allocated green bond funds, we have supplemented existing sustainability investments in the replacement of these vital resources across our network.

Consistent with recent practice, Norfolk Southern expects to continue recycling 100% of used rail and crossties. Roughly 50% of used shoulder ballast is reclaimed, screened, and reused.

# BOND ALLOCATION TABLE

The table below provides an overview of the allocation of net proceeds from our 2021 green bond issuance in accordance with the framework.

ALLOCATION OF \$496M IN GREEN BOND PROCEEDS			AMOUNT ALLOCATED (\$M)			
Norfolk Southern Sustainability Focus	ICMA GBP Category	Asset Type	2020	2021	TOTAL	
Efficiency & The Environment	Clean Transportation	Locomotive Conversions	\$75.6	\$200.0	\$275.6	56%
		Intermodal Facility Improvements	\$44.5	\$55.0	\$99.5	20%
		Rail, Ties, and Ballast Program	\$32.5	\$65.3	\$97.8	20%
		Locomotive Fuel Management	\$10.9	-	\$10.9	2%
		Rail Siding Extensions	-	\$6.5	\$6.5	1%
		Locomotive GP34 ECO Yard Unit	\$0.9	\$0.5	\$1.4	<1%
Environmental Stewardship	Environmentally Sustainable Management of Natural Resources and Land Use	Restoration of Stream and Wetland Ecosystems	-	\$3.4	\$3.4	1%
		Restoration of Shore Line	\$0.9	-	\$0.9	<1%
Grand Total			\$165.3	\$330.7	\$496.0	100%

## Management's assertion

Norfolk Southern has allocated \$496 million in net proceeds from its green bond issuance as of December 31, 2021, to Eligible Projects as defined on pages 9 and 10 of this report. Norfolk Southern is responsible for the completeness, accuracy, and validity of this management assertion.

# OUR GREEN BOND

In May 2021, Norfolk Southern issued \$500 million in green bonds, composed of one tranche of 2.30% Senior Notes due 2031. The net proceeds of \$496 million (after deducting underwriting discounts and offering expenses) from this issuance have been allocated to expenditures in Eligible Projects, as defined under the April 2021 Norfolk Southern Green Financing Framework (“Framework”).

The net proceeds from the green bonds have been allocated to Eligible Projects with expenditures in 2020 and 2021, in accordance with our Framework. Each of our Eligible Projects meets one or more of the eligibility criteria defined by our Framework, which we believe is aligned with the ICMA Green Bond Principles 2018. Our green-eligible project categories are described below.



ICMA GBP CATEGORY	UN SDG ALIGNMENT <sup>1</sup>	NORFOLK SOUTHERN ELIGIBILITY CRITERIA
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Clean Transportation



Expenditures Related to:

- Purchase of new locomotives (Modern Tier 4 compliant high-horsepower or equivalent), new rolling stock, and conversions of existing locomotives to newer models that will provide higher fuel efficiency and produce fewer greenhouse gas emissions
- Acquisition and installation of technology and/or devices that will improve efficiency of locomotives and as a result contribute to reducing fuel consumption
- Railway modernization, infrastructure to double lines, new yards and yards’ extension, such as:
  - New sidings and double line some stretches to improve traffic conditions to reduce time spent in crossovers and save fuel
  - Extension of current length of sidings, allowing an increase in train length
- Investments and expenditures to equip road fleet with energy management technology (e.g. LEADER and Trip Optimizer)
- Replacement of rails, ties, and ballast, which can improve the operating efficiency of freight rail operations
- Replacement and expansion of intermodal facilities, which can promote the flow and modal shift of freight to lower-carbon alternatives such as rail
- Investment and expansion of Thoroughbred Bulk Terminal facilities to promote modal shift of freight to low-carbon rail solutions

## OUR GREEN BOND **CONTINUED**

Renewable Energy		<ul style="list-style-type: none"> <li>• Purchases of renewable energy from wind and solar sources, which can be pursuant to long-term (more than five years) power purchase agreements or virtual power purchase agreements</li> <li>• Construction or operation of facilities, equipment or systems that generate, store, or transmit renewable energy, such as solar panels and photovoltaic cells</li> </ul>
Energy Efficiency		<ul style="list-style-type: none"> <li>• Investments in facilities and operations to improve efficiency of energy usage, reduce energy consumption, or reduce greenhouse gas emissions, such as LED lighting and HVAC equipment upgrades</li> </ul>
Green Buildings		<ul style="list-style-type: none"> <li>• New or existing investments and expenditures related to the design, construction, maintenance, or refurbishment of buildings that have or are expected to achieve a LEED Gold or Platinum certification, or other equivalent global certifications</li> </ul>
Pollution Prevention & Control		<ul style="list-style-type: none"> <li>• Investments and expenditures related to minimizing or eliminating the amount of waste sent to landfill by Norfolk Southern's operations</li> <li>• Investments and expenditures in recycling and recovery programs (e.g. battery &amp; fluorescents recycling)</li> </ul>
Environmentally Sustainable Management of Natural Resources and Land Use		<ul style="list-style-type: none"> <li>• Investments in the preservation or restoration of natural landscapes, such as reforestation projects</li> </ul>

<sup>1</sup> In September 2015, the U.N. General Assembly announced 17 Sustainable Development Goals ("SDGs") to address global challenges and set a blueprint for action to achieve the goals by 2030.

# PROJECT SELECTION AND REPORTING

Norfolk Southern's Green Finance Working Group consists of members of our Finance Division – including Treasury, Accounting, Financial Planning & Analysis, and Investor Relations – as well as members from our Law, Sustainability, and Internal Audit departments. Along with the Chief Sustainability Officer, the group has reviewed and approved all projects included in this report to ensure alignment with eligible criteria.

***In addition, as noted in the Framework, the Green Finance Working Group:***

- Determined allocations of net proceeds among Eligible Projects;
- Produced, reviewed, and approved the allocation report for investors prior to publication; and
- Reviewed the assurance report produced by the external auditor, addressing any issues raised therein.

To help ensure transparency and alignment with our Framework, we committed to report annually on which projects have been funded from the green bonds' net proceeds. We also obtained an independent accountant's examination report, providing assurance of management's assertion included in this Allocation Report regarding the allocation of \$496 million in net proceeds from our May 2021 green bond issuance to Eligible Projects. Information contained in this Allocation Report is not incorporated in, and is not part of, any report or filing we make with the U.S. Securities and Exchange Commission.

## EXTERNAL REVIEW

Committed to transparency, Norfolk Southern engaged Sustainalytics, an independent provider of sustainability ratings, research, and advisory services, to obtain a [second-party review](#) of our [Green Bond Framework](#), which can be found on the [Sustainability page](#) of Norfolk Southern's website. Based on its assessment, Sustainalytics concluded that Norfolk Southern's Green Bond Framework aligns with the transparency and reporting requirements of the Green Bond Principles.





KPMG LLP  
Suite 2000  
303 Peachtree Street, N.E.  
Atlanta, GA 30308-3210

### Independent Accountants' Report

Norfolk Southern Corporation's Board of Directors and Management:

We have examined management of Norfolk Southern Corporation's ("Norfolk Southern") assertion in the Norfolk Southern Use of Proceeds Report (the "Report") that as of December 31, 2021, Norfolk Southern has allocated \$496.0 million in net proceeds from its May 12, 2021, 2.30% Senior Notes due 2031 to Eligible Projects that meets one or more of the eligibility criteria as defined on pages 9 and 10 of the Report. Norfolk Southern's management is responsible for its assertion. Our responsibility is to express an opinion on management's assertion based on our examination.

Our examination was conducted in accordance with attestation standards established by the American Institute of Certified Public Accountants. Those standards require that we plan and perform the examination to obtain reasonable assurance about whether management's assertion is fairly stated, in all material respects. An examination involves performing procedures to obtain evidence about management's assertion. The nature, timing, and extent of the procedures selected depend on our judgement, including an assessment of the risks of material misstatement of management's assertion, whether due to fraud or error. We believe that the evidence we obtained is sufficient and appropriate to provide a reasonable basis for our opinion.

Our examination was not conducted for the purposes of evaluating information found in the Report other than management's assertion. Accordingly, we do not express an opinion or any other form of assurance on information other than management's assertion.

In our opinion, management's assertion that \$496.0 million in net proceeds from its May 12, 2021, 2.30% Senior Notes due 2031, has been allocated to Eligible Projects that meets one or more of the eligibility criteria as defined on pages 9 and 10 of the Report as of December 31, 2021, is fairly stated, in all material respects.

*KPMG LLP*

Atlanta, Georgia

May 9, 2022



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2021 DATA. PERCENTS ARE ROUNDED. 10.0522.226600.XX

This report is not, does not contain and is not intended as an offer to sell or a solicitation of any offer to buy any securities issued by Norfolk Southern. No representation is made as to the suitability of any issuance of green, social or sustainability bonds to fulfill environmental and sustainability criteria required by prospective investors. Eligible Green Projects may not satisfy an investor's expectations concerning environmental or sustainability benefits, and may result in adverse impacts. The information contained herein is provided as of the date of this report, and Norfolk Southern does not undertake to update any of such information.

[www.norfolksouthern.com](http://www.norfolksouthern.com)

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