# **Navistar International Corporation - Climate Change 2018**

## **C0. Introduction**

## **C0.1**

### **(C0.1) Give a general description and introduction to your organization.**

Navistar International Corporation (NYSE: NAV) is a holding company whose subsidiaries and affiliates produce International® brand commercial and military trucks, proprietary diesel engines, and IC Bus™ brand school and commercial buses. An affiliate also provides truck and diesel engine service parts. Another affiliate offers financing services. Additional information is available at www.Navistar.com. This report is created and submitted by the operating subsidiary, Navistar, Inc.

Important disclaimer: The information provided in this questionnaire is provided for general information only and has not been audited or verified, except as may be set forth in an underlying document from which said information may be derived. Discussions of risk and materiality are applicable only to this questionnaire and are not to be read as tantamount to disclosures made in regulatory disclosures, including forms 10-K, 10-Q or 8K and other applicable regulatory disclosures. In the event of any conflict between statements in this report and any regulatory filing, including any disclaimers related to forward looking statements made therein the statements in the regulatory filings should be seen as controlling. Nothing in this questionnaire is meant to be a guarantee of performance or results and all responses in this response, including descriptions of business strategy, involve risks, uncertainties and assumptions.

## **C0.2**

### **(C0.2) State the start and end date of the year for which you are reporting data.**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **Start date** | **End date** | **Indicate if you are providing emissions data for past reporting years** | **Select the number of past reporting years you will be providing emissions data for** |
| Row 1 | January 1 2017 | December 31 2017 | No | <Not Applicable> |
| Row 2 | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Row 3 | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Row 4 | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |

## **C0.3**

### **(C0.3) Select the countries/regions for which you will be supplying data.**

Argentina

Brazil

Canada

Mexico

United States of America

## **C0.4**

### **(C0.4) Select the currency used for all financial information disclosed throughout your response.**

USD

## **C0.5**

### **(C0.5) Select the option that describes the reporting boundary for which climate-related impacts on your business are being reported. Note that this option should align with your consolidation approach to your Scope 1 and Scope 2 greenhouse gas inventory.**

Operational control

## **C-TO0.7/C-TS0.7**

### **(C-TO0.7/C-TS0.7) For which transport modes will you be providing data?**

Heavy Duty Vehicles (HDV)

## **C1. Governance**

## **C1.1**

### **(C1.1) Is there board-level oversight of climate-related issues within your organization?**

Yes

## **C1.1a**

### **(C1.1a) Identify the position(s) of the individual(s) on the board with responsibility for climate-related issues.**

|  |  |
| --- | --- |
| **Position of individual(s)** | **Please explain** |
| Other, please specify (Audit Committee of the Board of Directo) | Audit Committee of the Board of Directors, (responsibility for environmental risks, including climate change.) |

## **C1.1b**

### **(C1.1b) Provide further details on the board’s oversight of climate-related issues.**

|  |  |  |
| --- | --- | --- |
| **Frequency with which climate-related issues are a scheduled agenda item** | **Governance mechanisms into which climate-related issues are integrated** | **Please explain** |
| Scheduled – some meetings | Reviewing and guiding risk management policies | Navistar’s Enterprise Risk Management (ERM) process includes risk assessments, risk management action plans and ERM reporting which are performed by ERM, individual business units and functional areas. This includes a semi-annual Top Down assessment by the Executive Risk Committee. Individual projects/initiatives may also be assessed by both ERM and business units. The Corporate Risk Organization reports on risks to the Board at least 2 times annually and regularly to the Executive Risk Committee. Navistar's ERM process also established a Risk Committee whose members represent each individual business unit and functional area. The Committee oversees the implementation and ongoing application of risk management throughout all business units and functions of the Company with the goal of supporting and enhancing the current existing risk management program. |

## **C1.2**

### **(C1.2) Below board-level, provide the highest-level management position(s) or committee(s) with responsibility for climate-related issues.**

|  |  |  |
| --- | --- | --- |
| **Name of the position(s) and/or committee(s)** | **Responsibility** | **Frequency of reporting to the board on climate-related issues** |
| Risk committee | Assessing climate-related risks and opportunities | Half-yearly |

## **C1.2a**

### **(C1.2a) Describe where in the organizational structure this/these position(s) and/or committees lie, what their associated responsibilities are, and how climate-related issues are monitored.**

Navistar’s Enterprise Risk Management (ERM) process includes risk assessments, risk management action plans and ERM reporting which are performed by ERM, individual business units and functional areas. This includes a semi-annual Top Down assessment by the Executive Risk Committee. Individual projects/initiatives may also be assessed by both ERM and business units. The Corporate Risk Organization reports on risks to the Board at least 2 times annually and regularly to the Executive Risk Committee. Navistar's ERM process also established a Risk Committee whose members represent each individual business unit and functional area. The Committee oversees the implementation and ongoing application of risk management throughout all business units and functions of the Company with the goal of supporting and enhancing the current existing risk management program.

## **C1.3**

### **(C1.3) Do you provide incentives for the management of climate-related issues, including the attainment of targets?**

No

## **C2. Risks and opportunities**

## **C2.1**

### **(C2.1) Describe what your organization considers to be short-, medium- and long-term horizons.**

|  |  |  |  |
| --- | --- | --- | --- |
|  | **From (years)** | **To (years)** | **Comment** |
| Short-term | 1 | 2 | There is no set definition for these timelines and terms depend somewhat upon topic. These are presented for Climate Change discussions. |
| Medium-term | 2 | 5 |  |
| Long-term | 5 | 20 |  |

## **C2.2**

### **(C2.2) Select the option that best describes how your organization's processes for identifying, assessing, and managing climate-related issues are integrated into your overall risk management.**

Integrated into multi-disciplinary company-wide risk identification, assessment, and management processes

## **C2.2a**

### **(C2.2a) Select the options that best describe your organization's frequency and time horizon for identifying and assessing climate-related risks.**

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Frequency of monitoring** | **How far into the future are risks considered?** | **Comment** |
| Row 1 | Six-monthly or more frequently | 1 to 3 years | Climate change risk assessment is performed as part of the multidisciplinary risk assessment process. Depending upon the existence of risk and prioritization of the risk by either the business functions, or Executive Risk Committee, the risk is included in the “Top ERM risks” dashboard for risk mitigation. |

## **C2.2b**

### **(C2.2b) Provide further details on your organization’s process(es) for identifying and assessing climate-related risks.**

Climate change risk assessment is performed as part of the multidisciplinary risk assessment process. Depending upon the existence of risk and prioritization of the risk by either the business functions, or Executive Risk Committee, the risk is included in the “Top ERM risks” dashboard for risk mitigation. Also see

C2.2d below.

## **C2.2c**

### **(C2.2c) Which of the following risk types are considered in your organization's climate-related risk assessments?**

|  |  |  |
| --- | --- | --- |
|  | **Relevance & inclusion** | **Please explain** |
| Current regulation | Relevant, always included | Compliance with applicable rules and regulation is baseline for Navistar. All current and upcoming proposed regulatory actions are monitored and most often Navistar is an active stakeholder participant. Examples include all engine product rules, including Phase I and II GHG for truck, and Clean Power Plan, GHG reporting and air permitting NSR for stationary manufacturing sites. Navistar is compliant with current regulation. We plan for and invest as needed for compliance with upcoming regulations. |
| Emerging regulation | Relevant, always included | Compliance with applicable rules and regulation is baseline for Navistar. All current and upcoming proposed regulatory actions are monitored and most often Navistar is an active stakeholder participant. Examples include all engine product rules, including Phase I and II GHG for truck, and Clean Power Plan, GHG reporting and air permitting NSR for stationary manufacturing sites. Navistar is compliant with current regulation. We plan for and invest as needed for compliance with upcoming regulations. |
| Technology | Relevant, sometimes included | Navistar remains on the forefront of technology advances and options for truck and engine, including a most recent important technology source is our CatalIST International SuperTruck, developed through the U.S. Department of Energy (DOE) SuperTruck I initiative. The CatalIST greatly exceeded DOE’s targeted improvement in freight efficiency. It also yielded our industry-leading predictive cruise control technology, which optimizes fuel economy by using GPS data to adjust cruising speed based on the terrain ahead. Our SuperTruck I work also inspired our International® LT® Series of ergonomic, aerodynamic Class 8 vehicles, which in 2017 was shown by a third-party study to provide industry-leading fuel efficiency. We are now participating in the next phase of DOE’s SuperTruck initiative, SuperTruck II. We are also advancing electric trucking technologies and autonomous truck platooning opportunities. |
| Legal | Relevant, always included | Compliance with applicable rules and regulation is baseline for Navistar. All current and upcoming proposed regulatory actions are monitored and most often Navistar is an active stakeholder participant, ensuring flexibility to allow Navistar to meet all legal obligations, to the letter and intent. Navistar is compliant with current regulation, products, sites, other. We plan for and invest as needed for compliance with legal changes and implications. |
| Market | Not relevant, included | The Climate Change impacts from products and stationary sites are often not a top concern for most truck customers, thus the "Not Relevant" choice. However, Navistar, Inc. certainly includes as a risk and opportunity, especially as it effects compliance, legal issues, and the ability to sell our trucks. Navistar complies with Phase I GHG truck limits and technology. |
| Reputation | Relevant, sometimes included | As part of its mission to help customers improve their vehicles’ uptime, Navistar also aims to deliver vehicles that perform as efficiently, reliably and with as low an impact on the environment as possible. Navistar’s long history of product innovation includes pioneering steps in emissions reduction. Since the advent of federal regulation by the U.S. EPA, emissions of nitrogen oxides (NOx) from diesel engines have been reduced by more than 90 percent; emissions of particulate matter (PM) have been cut by 99 percent; and emissions of carbon monoxide (CO) and hydrocarbons (HC) have been reduced to near-zero levels. We were the first North American engine manufacturer to release a smokeless diesel engine, and we worked with the EPA to advocate reducing the sulfur content of diesel fuel to 15 ppm in order to cut emissions of NOx and PM. Navistar has built on this tradition, working with the industry, EPA and the National Highway Traffic Safety Administration (NHTSA) to develop workable greenhouse gas regulations. |
| Acute physical | Not relevant, explanation provided | Navistar is not aware of any acute or chronic effects from Climate Change at this time, but considers potential published impacts. |
| Chronic physical | Not relevant, explanation provided | Navistar is not aware of any acute or chronic effects from Climate Change at this time, especially none at or effecting our operations. |
| Upstream | Relevant, always included | For products the upstream supplier and technology options can significantly impact the products' performance both in fuel efficiency and GHG emissions, among others. At our manufacturing sites, Scope 3 is not currently monitored but is relevant to operations and GHG emissions. Also see specific examples under Reputation and Technology |
| Downstream | Relevant, always included | Downstream is always considered, whether a customer or affected party Navistar always includes consideration for downstream impacts, positive or negative. Examples include product use and efficiency reducing GHG by continually increasing fuel efficiency. Much of Navistar’s leadership in fuel economy is due to innovations in aerodynamics. Navistar’s introduction of the LT Series built on the company’s many innovations designed to reduce energy consumption. In addition to vehicle aerodynamics, these innovations have included improvements in base engine efficiency, engine-transmission integration, lubrication materials, and intelligent control strategies, as well as vehicle weight reductions. Manufacturing sites actively work to reduce Scope 1 and 2 emissions by efficiency gains and energy conservation. Energy reduction "Treasure Hunts" team events are an example, conducted to find energy waste, reducing downstream impacts. |

## **C2.2d**

### **(C2.2d) Describe your process(es) for managing climate-related risks and opportunities.**

Climate change risk assessment is performed as part of the multidisciplinary risk assessment process. Navistar’s Enterprise Risk Management (ERM) process includes risk assessments, risk management action plans and ERM reporting which are performed by ERM, individual business units and functional areas. This includes a semi-annual Top Down assessment by the Executive Risk Committee. Individual projects/initiatives may also be assessed by both ERM and business units. The Corporate Risk Organization reports on risks to the Board at least 2 times annually and regularly to the Executive Risk Committee. Navistar's ERM process also established a Risk Committee whose members represent each individual business unit and functional area. The Committee oversees the implementation and ongoing application of risk management throughout all business units and functions of the Company with the goal of supporting and enhancing the current existing risk management program.

Navistar ERM also established a Risk Operating Committee whose members represent each individual business unit, risk action owner or functional area. The Executive Risk Committee oversees the implementation and ongoing application of risk management throughout all business units and functions of the Company with the goal of supporting and enhancing the current existing risk management program. The Committee will prioritize the risks and opportunities identified.

## **C2.3**

### **(C2.3) Have you identified any inherent climate-related risks with the potential to have a substantive financial or strategic impact on your business?**

Yes

## **C2.3a**

### **(C2.3a) Provide details of risks identified with the potential to have a substantive financial or strategic impact on your business.**

### **Identifier**

Risk 1

### **Where in the value chain does the risk driver occur?**

Direct operations

### **Risk type**

Transition risk

### **Primary climate-related risk driver**

Policy and legal: Mandates on and regulation of existing products and services

### **Type of financial impact driver**

Technology: Capital investments in technology development

### **Company- specific description**

EPA and DOT continual new regulation changes prior to existing rules taking effect. These and other rules drive risks from costs for product development and regulatory implementation. EPA and DOT adopted final rules setting fuel economy and greenhouse gas emissions standards for medium and heavy duty engines and vehicles that came into effect in model year 2014. Having just implemented these reductions, in 2015 and 2016 EPA and NHTSA embarked on an effort to adopt the next phase of greenhouse gas/fuel efficiency regulations in the heavy duty sector. The final rule, adopted in October 2016, phases in over model years 2021 through 2027, and will require new and expanded efficiency technologies across vehicle and engine platforms. EPA estimates the Phase 2 rule will result in an additional 10 percent reduction in greenhouse gas emissions.

### **Time horizon**

Current

### **Likelihood**

Virtually certain

### **Magnitude of impact**

High

### **Potential financial impact**

0

### **Explanation of financial impact**

This is ever changing value and considered proprietary information. Disclosing is deemed a competitive disadvantage.

### **Management method**

Closely monitoring and stake-holder involvement in regulatory changes affecting manufacturing and products. Trade associations and direct contact with EPA and law makers. Proactive involvement. CASE STUDY EXAMPLE: EPA having just implemented Phase 1 GHG reductions, in 2015 and 2016 EPA and NHTSA embarked on an effort to adopt the next phase of greenhouse gas/fuel efficiency regulations in the heavy duty sector. Navistar was directly involved with rule-making, comments, stakeholder reviews, business roundtable, and R&D work with DOE. The final rule was adopted in October 2016, phases in over model years 2021 through 2027, and will require new and expanded efficiency technologies across vehicle and engine platforms.

### **Cost of management**

0

### **Comment**

Disclosing is deemed a competitive disadvantage.

### **Identifier**

Risk 2

### **Where in the value chain does the risk driver occur?**

Direct operations

### **Risk type**

Transition risk

### **Primary climate-related risk driver**

Market: Increased cost of raw materials

### **Type of financial impact driver**

Market: Increased production costs due to changing input prices (e.g., energy, water) and output requirements (e.g., waste treatement)

### **Company- specific description**

Fuel and energy regulation and taxes, causing increased costs or reliability of supplies.

### **Time horizon**

Medium-term

### **Likelihood**

More likely than not

### **Magnitude of impact**

Medium

### **Potential financial impact**

### **Explanation of financial impact**

The risk is the undetermined impact to costs in medium timeframe, as it is not possible to predict these costs or supplies. Changing political climate has eased this concern, however it could be more impactful by sudden changes due to public concern or world events.

### **Management method**

Proactive monitoring of energy markets for both product and manufacturing, lobbying input for effects on customers, product demand, employment, profits. This includes investigating alternatives that could increase market sales or replace risk.

### **Cost of management**

0

### **Comment**

Overall cost is an increase in tax due to GHG emissions whether direct or indirect via energy costs, currently not measurable.

### **Identifier**

Risk 3

### **Where in the value chain does the risk driver occur?**

Direct operations

### **Risk type**

Physical risk

### **Primary climate-related risk driver**

Chronic: Rising mean temperatures

### **Type of financial impact driver**

Increased operating costs (e.g., inadequate water supply for hydroelectric plants or to cool nuclear and fossil fuel plants)

### **Company- specific description**

Increase in cooling needs or damaged equipment as recorded ambient and earth temperatures rise, for both human comfort and equipment. This will have a direct increase in operational costs and indirect GHG emissions, causing additional tax or costs. Toll to human resources in and outside work would impact production costs.

### **Time horizon**

Long-term

### **Likelihood**

More likely than not

### **Magnitude of impact**

Medium-low

### **Potential financial impact**

### **Explanation of financial impact**

Navistar cannot ascertain exact financial impacts of unknown scientific earth events in terms of customer or investor related costs or profit.

### **Management method**

Proactive and continuous monitoring and direct involvement with industry groups and EPA initiatives. Navistar participates on many levels with Business Roundtable, Chamber of Commerce, and other manufacturing and trade groups to stay current with potential business impacts from Climate Change and other environmental or business risks. Ohio Manufacturing Association active members and sit on separate Energy, Environmental and Sustainability committees.

### **Cost of management**

0

### **Comment**

Participation is enhanced due to Climate Change issues and new committees, however the company would stay involved with these groups issues for all topics, thus no added cost.

## **C2.4**

### **(C2.4) Have you identified any climate-related opportunities with the potential to have a substantive financial or strategic impact on your business?**

Yes

## **C2.4a**

### **(C2.4a) Provide details of opportunities identified with the potential to have a substantive financial or strategic impact on your business.**

### **Identifier**

Opp1

### **Where in the value chain does the opportunity occur?**

Customer

### **Opportunity type**

Markets

### **Primary climate-related opportunity driver**

Access to new markets

### **Type of financial impact driver**

Increased revenues through access to new and emerging markets (e.g., partnerships with governments, development banks)

### **Company- specific description**

Concerns about global climate change, attributed mostly to GHG emissions, have escalated considerably over the last few years. Navistar considers the escalation of such concerns as opportunity to market its fuel efficient and innovative products. • Navistar launched our new International® LT™ Series of ergonomic Class 8 vehicles in 2016, which provide fuel efficiency that is 7 percent better than the company’s previous offering. In addition to vehicle aerodynamics, these innovations have included improvements in base engine efficiency, engine-transmission integration, lubrication materials, and intelligent control strategies, as well as vehicle weight reductions. • Navistar involvement in a five-year R&D program with the U.S. DOE to develop a highly fuel-efficient Class 8 line haul truck SuperTruck I was delivered in 2016 with exceptional results. The truck, known as the CatalIST, exceeded the DOE’s requirements for a 50 percent improvement in overall freight efficiency on a heavy-duty Class 8 tractor-trailer vehicle, and 50 percent engine efficiency. Ultimately, the CatalIST achieved a fuel efficiency of 13 miles per gallon and demonstrated 50.3 percent Brake Thermal Efficiency, representing an improvement in freight efficiency of 104% over DOE’s control vehicle. • Navistar won funding for the U.S. DOE’s SuperTruck II project, which has the goal of improving heavy-truck freight efficiency by more than 100 percent compared with a manufacturer’s best-in-class 2009 truck. • Navistar is playing a leading role in developing a new generation of connected heavy-duty vehicles and also exploring the great potential benefits from autonomous technologies that enable platooning, which allows trucks to safely follow each other to reduce wind drag. This platooning work is being conducted through Navistar’s research partnership with the Texas A&M Transportation Institute. • In November 2017, Navistar unveiled the chargeE™, an electric concept school bus developed with Volkswagen Truck & Bus. Navistar believes alternative fuel choices we offer; diesel, propane, natural gas, gasoline and B20 options, continue to offer solutions to climate change issues.

### **Time horizon**

Short-term

### **Likelihood**

Virtually certain

### **Magnitude of impact**

High

### **Potential financial impact**

0

### **Explanation of financial impact**

Considered a competitive advantage and not something we can reveal.

### **Strategy to realize opportunity**

Please see the company description above which also lays out the strategy of developing, partnering, and binging to market various alternatives and customer product options.

### **Cost to realize opportunity**

0

### **Comment**

Considered a competitive advantage and not something we can reveal.

### **Identifier**

Opp2

### **Where in the value chain does the opportunity occur?**

Customer

### **Opportunity type**

Products and services

### **Primary climate-related opportunity driver**

Development and/or expansion of low emission goods and services

### **Type of financial impact driver**

Increased revenue through demand for lower emissions products and services

### **Company- specific description**

The company continues to pursue innovations that build on technology’s inherent to fuel economy advantages, using improved aerodynamics and other approaches to improve fuel efficiency and reduce emissions: • Some examples include: Predictive cruise control that innovatively uses GPS mapping and the latest commercial route data to adjust cruising speed without the need to pre-drive routes; Advanced integration of engine and vehicle, utilizing proprietary intelligent controls and high-efficiency combustion; Innovative use of lighter-weight carbon-fiber panels in the upper body, roof headers, back panel and dash panel; and Aerodynamic improvements that reduce the trailer’s drag coefficient by more than 30 percent, to name a few. • Navistar worked extensively with EPA and NHTSA and with the industry, to develop workable Phase II GHG regulations. The final rule, which was adopted in October 2016, phases in over model years 2021 through 2027, and will require new and expanded efficiency technologies across vehicle and engine platforms. EPA has estimated the Phase 2 rule will result in an additional 10 percent reduction in greenhouse gas emissions. • In 2016 our focus on key contributors to energy consumption made for additional improvements in the aerodynamics of the vehicle, base engine efficiency, engine transmission integration, lubrication materials, and intelligent control strategies, accounting for a notable difference and helping customers improve their bottom line. • Navistar also contributes to reduced emissions by offering many anti-idle solutions, such as battery-powered heating and air conditioning systems. Our Parts group offers validated diesel exhaust emission retrofit products from various manufacturers to help reduce emissions from older vehicles. • Navistar also offers alternative-fuel vehicles.

### **Time horizon**

Current

### **Likelihood**

Very likely

### **Magnitude of impact**

Medium-high

### **Potential financial impact**

0

### **Explanation of financial impact**

Considered a competitive advantage and not something we can reveal.

### **Strategy to realize opportunity**

Please see the company description above which also lays out the strategy of developing, partnering, and bringing to market various alternatives and customer product options.

### **Cost to realize opportunity**

0

### **Comment**

Considered a competitive advantage and not something we can reveal.

### **Identifier**

Opp3

### **Where in the value chain does the opportunity occur?**

Supply Chain

### **Opportunity type**

Products and services

### **Primary climate-related opportunity driver**

Development of new products or services through R&D and innovation

### **Type of financial impact driver**

Better competitive position to reflect shifting consumer preferences, resulting in increased revenues

### **Company- specific description**

Navistar also works with the supply chain to develop and offer customers the best, most innovative and efficient line of product offerings available with a history of uptime. In 2017, we agreed to work with our alliance partner, Volkswagen Truck & Bus, to develop battery-powered school buses and medium duty trucks. The chargE™, our prototype next-generation electric school bus, is based on alliance technology. In 2016, Navistar announced the formation of an alliance with Volkswagen Truck & Bus, a leading Europe-based maker of commercial vehicles. The alliance includes strategic technology and supply collaboration, focused on commercial vehicle development, including powertrain technology solutions, advanced driver assistance systems, connected vehicle solutions, platooning and autonomous technologies, electric vehicles, and cab and chassis components. Navistar offers customers a wide range of engine options. All engines in Navistar® products are certified by CARB and EPA for on-board diagnostics (OBD), a self-diagnostic and reporting capability that ensures emissions control components are working effectively. All of the company’s diesel engines can operate using biodiesel up to B20. Navistar also contributes to reduced emissions by offering many solutions to support anti-idling, such as battery-powered heating and air conditioning systems. Our Parts group offers diesel exhaust emission retrofit products from various manufacturers in order to help reduce emissions from older vehicles. During 2017, our recently introduced propane school bus option, the IC Bus® CE series PSI, continued to find favor with customers. Using an 8.8 liter heavy-duty propane engine, this alternative-fuel solution does not sacrifice power, torque or durability.

### **Time horizon**

Current

### **Likelihood**

Virtually certain

### **Magnitude of impact**

Medium-high

### **Potential financial impact**

0

### **Explanation of financial impact**

Considered a competitive advantage and not something we can reveal.

### **Strategy to realize opportunity**

Please see the company description above which also lays out the strategy of developing, partnering, and bringing to market various alternatives and customer product options.

### **Cost to realize opportunity**

0

### **Comment**

Considered a competitive advantage and not something we can reveal.

### **Identifier**

Opp4

### **Where in the value chain does the opportunity occur?**

Direct operations

### **Opportunity type**

Resource efficiency

### **Primary climate-related opportunity driver**

Use of more efficient production and distribution processes

### **Type of financial impact driver**

Reduced operating costs (e.g., through efficiency gains and cost reductions)

### **Company- specific description**

The company is always seeking continuous improvements and efficiencies, both in our products and manufacturing processes. To that end, Navistar voluntarily agrees to external emission and energy reduction programs to promote and recognize such achievements. Currently Navistar participates in the DOE "Better Plants Better Buildings" program to reduce energy intensity 20% by 2020. As described herein, reductions are on track and on-going cost savings have been realized. GHG reduction is directly associated with energy use, which is also a cost reduction opportunity. Energy reduction Treasure Hunts have been performed in partnership with DOE and other industry professionals. The events have reduced energy usage, costs, and subsequent GHG emissions, in addition to the sites many ongoing efforts.

### **Time horizon**

Current

### **Likelihood**

Virtually certain

### **Magnitude of impact**

Medium

### **Potential financial impact**

1000000

### **Explanation of financial impact**

Over the course of several goal years it is estimated more than $1MM in purchased energy costs have been eliminated.

### **Strategy to realize opportunity**

Continuous improvement efforts, energy Treasure Hunts, monitoring and measuring energy use and waste, load ratios and concentration on energy reduction during nonproduction energy use periods.

### **Cost to realize opportunity**

0

### **Comment**

Considered a competitive advantage. Most opportunities come from efficiency improvements, cultural changes and are less capitol cost oriented, more low to no cost opportunities. Examples include: turning off unused equipment, motion sensors or timers, Upgrades during normal maintenance replacement, such as LED lighting replacing older fluorescent, including VFDs to new equipment purchases, more efficient fuel burning boilers or heaters, automated controls.)

## **C2.5**

### **(C2.5) Describe where and how the identified risks and opportunities have impacted your business.**

|  |  |  |
| --- | --- | --- |
|  | **Impact** | **Description** |
| Products and services | Impacted | Customer demand for increased fuel efficiency, equating to reducing GHG emissions drives much of product development and innovations and commensurate services. New product lines, fuel options, electric options, advanced parts, controls and monitoring are all geared towards reduced emissions, costs, and resources with increased profits, product offerings, and overall market share. |
| Supply chain and/or value chain | Impacted | A repeat of above description for products and services applies here. In 2017, Navistar and Volkswagen Truck & Bus established a strategic alliance, featuring a procurement joint venture and technology collaboration. The alliance is exploring all aspects of commercial vehicle development, including powertrain technology solutions, advanced driver assistance systems, connected vehicle solutions, platooning and autonomous technologies, electric vehicles, as well as cab and chassis components. In September 2017, the two companies announced they would collaborate on development of electric powertrains for school buses and Class 6-7 medium-duty trucks, with a launch planned in late 2019 or 2020 Our alliance partner, Volkswagen . The chargE™, our prototype next-generation electric school bus, is based on alliance technology. We incorporate advanced driver assistance systems. Our medium-duty vehicles were the first to use the Bendix® Wingman® Fusion™ suite of integrated, advanced safety technologies. these are just a couple significant examples of supply and value chain impact. |
| Adaptation and mitigation activities | Impacted for some suppliers, facilities, or product lines | Product line diversity has increased due to customer demand for increased fuel efficiency, reducing GHG emissions. Navistar's proud diesel engine history has grown into many diverse product offerings, including gasoline, propane, biofuels, and electric concepts. |
| Investment in R&D | Impacted | Please refer to many examples throughout, including partnerships with U.S. Department of Energy (DOE,) Texas A&M Transportation Institute, Volkswagen Truck & Bus alliance. |
| Operations | Impacted for some suppliers, facilities, or product lines | Some manufacturing facilities trigger the EPA required GHG reporting. Monitoring and tracking developed for all sites to evaluate impacts. |
| Other, please specify | Impacted for some suppliers, facilities, or product lines | Customers are impacted by increased availability of energy efficient low emitting products, or the converse increased operating costs from inefficient competitor products or regulatory taxes. |

## **C2.6**

### **(C2.6) Describe where and how the identified risks and opportunities have factored into your financial planning process.**

|  |  |  |
| --- | --- | --- |
|  | **Relevance** | **Description** |
| Revenues | Impacted for some suppliers, facilities, or product lines | Increased product offerings grow and diversify customer base, often demanding higher profit margins. |
| Operating costs | Impacted for some suppliers, facilities, or product lines | Varies. Energy costs have increased in some locations while some sites have enjoyed lower energy costs due to regional supplies. Potential GHG taxes are a threat to increase costs, possibly negating recent energy cost reductions achieved through efficiency gains. |
| Capital expenditures / capital allocation | Impacted | Required for continuous R&D and partnerships, as well as manufacturing infrastructure and operating costs for newer products and diverse fuel offerings. Such developments impact operations requiring new equipment, processes, training, etc. |
| Acquisitions and divestments | Impacted for some suppliers, facilities, or product lines | Affected as the company adjust business planning and investments to match customer demands for products. Significant impact to Navistar's engine division. |
| Access to capital | Impacted for some suppliers, facilities, or product lines |  |
| Assets | Impacted for some suppliers, facilities, or product lines | Capital expenditures are required for continuous R&D and partnerships, as well as manufacturing infrastructure and operating costs for newer products and diverse fuel offerings. Such developments impact operations requiring new equipment, processes, training, etc |
| Liabilities | Not impacted |  |
| Other | Not impacted |  |

## **C3. Business Strategy**

## **C3.1**

### **(C3.1) Are climate-related issues integrated into your business strategy?**

Yes

## **C3.1a**

### **(C3.1a) Does your organization use climate-related scenario analysis to inform your business strategy?**

Yes, qualitative and quantitative

## **C-AC3.1b/C-CE3.1b/C-CH3.1b/C-CO3.1b/C-EU3.1b/C-FB3.1b/C-MM3.1b/C-OG3.1b/C-PF3.1b/C-ST3.1b/C-TO3.1b/C-TS3.1b)**

### **(C-AC3.1b/C-CE3.1b/C-CH3.1b/C-CO3.1b/C-EU3.1b/C-FB3.1b/C-MM3.1b/C-OG3.1b/C-PF3.1b/C-ST3.1b/C-TO3.1b/C-TS3.1b) Indicate whether your organization has developed a low-carbon transition plan to support the long-term business strategy.**

No, we do not have a low-carbon transition plan

## **C3.1c**

### **(C3.1c) Explain how climate-related issues are integrated into your business objectives and strategy.**

June of every year, Navistar's Senior VP and General Counsel reports to the Audit Committee of the Board on the status and progress of the company's major programs for environmental and energy management and progress towards energy /GHG goals. This report also includes coverage of the status and progress of the company's actions regarding climate change. Environmental and Energy Affairs also prepares an internal Environmental and Energy Scorecard report that describes facilities' energy consumptions, costs, and facilities' electric consumption loads during production and non-production periods. Energy use mirrors GHG emissions, thus communicating, tracking, and reducing energy use is commensurate to GHG. The product development functions consider greenhouse gas emissions, generally involving product fuel economy, throughout the product development process. Our vehicles and engines are regulated for greenhouse gas emissions and fuel economy, and therefore, product development takes climate change policy into account, meeting or exceeding regulated limits. Navistar is also an active participant in the development of climate change policy, particularly in the development and implementation of heavy duty greenhouse gas and fuel efficiency regulations, working with EPA, CARB, DOE, and NHTSA.

## **C3.1d**

### **(C3.1d) Provide details of your organization’s use of climate-related scenario analysis.**

|  |  |
| --- | --- |
| **Climate-related scenarios** | **Details** |
| Other, please specify (Reduce carbon/GHG IncreaseEnergy Efficie) | Goals to reduce energy usage, which reduces GHG emissions, meeting these site reduction goals and product GHG regulations . Goals are driven both voluntarily at stationary sites and mandatory for product lines as driven by EPA. Reduction strategies are both qualitative and quantitative; qualitative being those with known reductions but specifically unmeasured. .xxxNEED TO DELETE THIS NOTEGeneral •You should answer “Yes” when one of the following is integrated in to your overall business strategy: - The need to reduce carbon or other greenhouse gas emissions; - The need to adapt to climate change, the Paris Agreement, and related energy impacts (positive or negative); - The need to capitalize on opportunities presented by climate change, and/or; - The need to communicate on/learn more about climate change is integrated into the company's overall business strategy. •As such, climate-related issues are part of the 'top line growth' strategy of the company, rather than being dealt with solely at the operational level |
| Other, please specify (Alternative fuels-efficient Trucks - Opp) | Climate-change opportunity to grow markets for new products; alternative fuels trucks, electric truck development, as well as autonomous vehicles. All incorporated into business strategy and R&D units developed. |

## **C4. Targets and performance**

## **C4.1**

### **(C4.1) Did you have an emissions target that was active in the reporting year?**

Both absolute and intensity targets

## **C4.1a**

### **(C4.1a) Provide details of your absolute emissions target(s) and progress made against those targets.**

### **Target reference number**

Abs 1

### **Scope**

Scope 1+2 (location-based)

### **% emissions in Scope**

100

### **% reduction from base year**

15

### **Base year**

2014

### **Start year**

2014

### **Base year emissions covered by target (metric tons CO2e)**

323388

### **Target year**

2020

### **Is this a science-based target?**

No, and we do not anticipate setting one in the next 2 years

### **% achieved (emissions)**

62

### **Target status**

Underway

### **Please explain**

This is an internal GHG emission target intended to match our goals for energy reduction. The below intensity target is a voluntary and public, via DOE Better Buildings Better Plants program; on target to meet in 2020.

## **C4.1b**

### **(C4.1b) Provide details of your emissions intensity target(s) and progress made against those target(s).**

### **Target reference number**

Int 1

### **Scope**

Scope 1+2 (location-based)

### **% emissions in Scope**

70

### **% reduction from baseline year**

20

### **Metric**

Other, please specify (US Energy use reduction (Scope 1 & 2))

### **Base year**

2010

### **Start year**

2010

### **Normalized baseline year emissions covered by target (metric tons CO2e)**

2894159

### **Target year**

2020

### **Is this a science-based target?**

Yes, we consider this a science-based target, but this target has not been approved as science-based by the Science Based Targets initiative

### **% achieved (emissions)**

87

### **Target status**

Underway

### **Please explain**

2,894,159 units are MMBTU, NOT CO2 tons. Our "science-based" target is adopted directly from DOE Better Plants Program. Inclusion allows only US specific sites, thus 70%. Goal 20% by 2020 is at 17.5% in 2017, well on track. Voluntary commitment - Energy reduction. This is our voluntary commitment to the USDOE/USEPA Better Buildings, Better Plants Program. Base year normalized energy use is adjusted due to acquisitions and closures per Protocol. Thus, the base year energy and emissions have changed annually due to adjustments. This value is accurate in RY2017.

### **% change anticipated in absolute Scope 1+2 emissions**

25

### **% change anticipated in absolute Scope 3 emissions**

0

## **C4.2**

### **(C4.2) Provide details of other key climate-related targets not already reported in question C4.1/a/b.**

## **C4.3**

### **(C4.3) Did you have emissions reduction initiatives that were active within the reporting year? Note that this can include those in the planning and/or implementation phases.**

Yes

## **C4.3a**

### **(C4.3a) Identify the total number of projects at each stage of development, and for those in the implementation stages, the estimated CO2e savings.**

|  |  |  |
| --- | --- | --- |
|  | **Number of projects** | **Total estimated annual CO2e savings in metric tonnes CO2e (only for rows marked \*)** |
| Under investigation | 12 | 3500 |
| To be implemented\* | 8 | 1500 |
| Implementation commenced\* | 3 | 1000 |
| Implemented\* | 3 | 1700 |
| Not to be implemented |  |  |

## **C4.3b**

### **(C4.3b) Provide details on the initiatives implemented in the reporting year in the table below.**

### **Activity type**

Energy efficiency: Processes

### **Description of activity**

Compressed air

### **Estimated annual CO2e savings (metric tonnes CO2e)**

128

### **Scope**

Scope 2 (location-based)

### **Voluntary/Mandatory**

Voluntary

### **Annual monetary savings (unit currency – as specified in CC0.4)**

12000

### **Investment required (unit currency – as specified in CC0.4)**

1000

### **Payback period**

<1 year

### **Estimated lifetime of the initiative**

3-5 years

### **Comment**

Turn off extra air compressor during off hours. Limited lifetime given due to aging equipment efficiency, continued implementation expectancy based upon increased production hours and compressed air use.

### **Activity type**

Energy efficiency: Processes

### **Description of activity**

Process optimization

### **Estimated annual CO2e savings (metric tonnes CO2e)**

1500

### **Scope**

Scope 1

### **Voluntary/Mandatory**

Voluntary

### **Annual monetary savings (unit currency – as specified in CC0.4)**

100000

### **Investment required (unit currency – as specified in CC0.4)**

1000

### **Payback period**

<1 year

### **Estimated lifetime of the initiative**

Ongoing

### **Comment**

Manual activity, could be automated with process at additional cost and risk. The project is setback of the air abatement thermal oxidizer during off-shifts. Weekdays are challenging due to varying production schedules and hours to heat up to compliance temperature prior to production start.

### **Activity type**

Energy efficiency: Processes

### **Description of activity**

Compressed air

### **Estimated annual CO2e savings (metric tonnes CO2e)**

38

### **Scope**

Scope 2 (location-based)

### **Voluntary/Mandatory**

Voluntary

### **Annual monetary savings (unit currency – as specified in CC0.4)**

4000

### **Investment required (unit currency – as specified in CC0.4)**

1800

### **Payback period**

<1 year

### **Estimated lifetime of the initiative**

<1 year

### **Comment**

Concentrated effort to fix air leaks nearest to compressors (in CAS) and then expand ongoing program. Leaks never stop as fix some, new appear. It is estimated by some <6 months before new leaks begin after repairs.

## **C4.3c**

### **(C4.3c) What methods do you use to drive investment in emissions reduction activities?**

|  |  |
| --- | --- |
| **Method** | **Comment** |
| Financial optimization calculations | Energy reduction 'Treasure Hunt' training and tools refine energy reduction specific calcs and GHG savings can be completed by anyone with TH tool and sent to Accounting for verification. These energy specific savings help drive implementation. |
| Dedicated budget for other emissions reduction activities | Dedicated funds and resources for meeting and exceeding ongoing product emission reductions and freight efficiency improvements. |
| Employee engagement | Energy reduction 'Treasure Hunts' involving employees, before, during, and after. On-going facility efficiency activities are focused on non-production time energy reduction, often relying on employees active participation for non-automated energy systems or devices. |
| Partnering with governments on technology development | Navistar won funding for the U.S. Department of Energy's, SuperTruck II project, with a goal of improving heavy-truck freight efficiency by 100%, as compared to 2009. Navistar's work on the first SuperTruck concept delivered the CatalIST International® to the U.S. Department of Energy in 2016 with an improvement in freight efficiency of 104% over DOEs control vehicle. SuperTruck II aims to more than double the freight efficiency of Class 8 trucks moving forward. And platooning work is being conducted through Navistar’s research partnership with the Texas A&M Transportation Institute, demonstrate the potential of energy-saving truck platooning. |
| Compliance with regulatory requirements/standards | As applicable, investments are always available for regulatory compliance, at a minimum. This represents significant investments. |
| Partnering with governments on technology development | In 2017, Navistar again partnered with the U.S. Department of Energy, Better Buildings, Better Plants program. The Springfield assembly plant was awarded a U.S. Department of Energy (DOE) sponsored “energy treasure hunt” (TH) to identify ways of decreasing both CO2 emissions and cost. The plant had onsite collaboration and support from members of the DOE and our Treasure Hunt partner companies. |

## **C4.5**

### **(C4.5) Do you classify any of your existing goods and/or services as low-carbon products or do they enable a third party to avoid GHG emissions?**

Yes

## **C4.5a**

### **(C4.5a) Provide details of your products and/or services that you classify as low-carbon products or that enable a third party to avoid GHG emissions.**

### **Level of aggregation**

Group of products

### **Description of product/Group of products**

Our Project Horizon initiative has delivered the industry’s newest product line: innovative, fuel-efficient vehicles with enhanced visibility and advanced safety features. One important technology source is our CatalIST International SuperTruck, developed through the U.S. Department of Energy (DOE) SuperTruck I initiative. The CatalIST greatly exceeded DOE’s targeted improvement in freight efficiency. It also yielded our industry-leading predictive cruise control technology, which optimizes fuel economy by using GPS data. Our SuperTruck I also inspired our International® LT® Series of ergonomic, aerodynamic Class 8 vehicles, which in 2017 was shown by a third-party study to provide industry-leading fuel efficiency. Navistar also contributes to reduced emissions by offering many solutions to support anti-idling, such as battery-powered heating and air conditioning systems. Next phase of DOE’s SuperTruck initiative, SuperTruck II, which aims to more than double the freight efficiency of Class 8 trucks moving forward. We are also advancing electric trucking technologies, which are poised to deliver major environmental benefits in the school bus and medium truck markets. In 2017, we agreed to work with our alliance partner, Volkswagen Truck & Bus, to develop battery-powered school buses and medium duty trucks. The chargE™, our prototype next-generation electric school bus, is based on alliance technology.

### **Are these low-carbon product(s) or do they enable avoided emissions?**

Low-carbon product and avoided emissions

### **Taxonomy, project or methodology used to classify product(s) as low-carbon or to calculate avoided emissions**

Other, please specify (Internal based upon calc low emissions)

### **% revenue from low carbon product(s) in the reporting year**

### **Comment**

## **C5. Emissions methodology**

## **C5.1**

### **(C5.1) Provide your base year and base year emissions (Scopes 1 and 2).**

### **Scope 1**

### **Base year start**

January 1 2014

### **Base year end**

December 31 2014

### **Base year emissions (metric tons CO2e)**

107979

### **Comment**

### **Scope 2 (location-based)**

### **Base year start**

January 1 2014

### **Base year end**

December 31 2014

### **Base year emissions (metric tons CO2e)**

215409

### **Comment**

### **Scope 2 (market-based)**

### **Base year start**

### **Base year end**

### **Base year emissions (metric tons CO2e)**

### **Comment**

Location-based only, Scope 1 and Scope 2

## **C5.2**

### **(C5.2) Select the name of the standard, protocol, or methodology you have used to collect activity data and calculate Scope 1 and Scope 2 emissions.**

Energy Information Administration 1605B

The Climate Registry: General Reporting Protocol

The Greenhouse Gas Protocol: A Corporate Accounting and Reporting Standard (Revised Edition)

US EPA Climate Leaders: Direct Emissions from Stationary Combustion

US EPA Mandatory Greenhouse Gas Reporting Rule

## **C6. Emissions data**

## **C6.1**

### **(C6.1) What were your organization’s gross global Scope 1 emissions in metric tons CO2e?**

### **Row 1**

### **Gross global Scope 1 emissions (metric tons CO2e)**

77503

### **End-year of reporting period**

<Not Applicable>

### **Comment**

## **C6.2**

### **(C6.2) Describe your organization’s approach to reporting Scope 2 emissions.**

### **Row 1**

### **​Scope 2, location-based​**

We are reporting a Scope 2, location-based figure

### **Scope 2, market-based**

We have operations where we are able to access electricity supplier emission factors or residual emissions factors, but are unable to report a Scope 2, market-based figure

### **Comment**

## **C6.3**

### **(C6.3) What were your organization’s gross global Scope 2 emissions in metric tons CO2e?**

### **Row 1**

### **Scope 2, location-based**

145869

### **Scope 2, market-based (if applicable)**

<Not Applicable>

### **End-year of reporting period**

<Not Applicable>

### **Comment**

## **C6.4**

### **(C6.4) Are there any sources (e.g. facilities, specific GHGs, activities, geographies, etc.) of Scope 1 and Scope 2 emissions that are within your selected reporting boundary which are not included in your disclosure?**

No

## **C6.5**

### **(C6.5) Account for your organization’s Scope 3 emissions, disclosing and explaining any exclusions.**

### **Purchased goods and services**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Capital goods**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Fuel-and-energy-related activities (not included in Scope 1 or 2)**

### **Evaluation status**

Relevant, calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Upstream transportation and distribution**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Waste generated in operations**

### **Evaluation status**

Not evaluated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Business travel**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Employee commuting**

### **Evaluation status**

Not evaluated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Upstream leased assets**

### **Evaluation status**

Not evaluated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Downstream transportation and distribution**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Processing of sold products**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Use of sold products**

### **Evaluation status**

Relevant, calculated

### **Metric tonnes CO2e**

50000000

### **Emissions calculation methodology**

Trucks and engines sold \* 1,000,000 mile limited useful life of the product \* / 8 average MPG To calculate an estimated emissions from products, a number of baseline units for each general category of vehicles was multiplied by useful life, estimated average fuel consumption and emission factor to calculate estimated tons of CO2 for that generalized vehicle population.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

### **Explanation**

Emissions estimated from long life expectancy of products in use and the combustion of fossil fuels to operate, primarily diesel. Actual CO2 emissions from these vehicles rely heavily upon actual use and will vary depending on a number of factors, including final vehicle configuration, duty cycle, routes, maintenance and other factors.

### **End of life treatment of sold products**

### **Evaluation status**

Relevant, not yet calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Downstream leased assets**

### **Evaluation status**

Not evaluated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Franchises**

### **Evaluation status**

Not relevant, explanation provided

### **Metric tonnes CO2e**

0

### **Emissions calculation methodology**

None. Not applicable

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

### **Explanation**

None. Not applicable

### **Investments**

### **Evaluation status**

Not relevant, calculated

### **Metric tonnes CO2e**

### **Emissions calculation methodology**

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

### **Explanation**

### **Other (upstream)**

### **Evaluation status**

Not relevant, explanation provided

### **Metric tonnes CO2e**

0

### **Emissions calculation methodology**

No known "other" not already included or considered.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

### **Explanation**

No known "other" not already included or considered.

### **Other (downstream)**

### **Evaluation status**

Not relevant, explanation provided

### **Metric tonnes CO2e**

0

### **Emissions calculation methodology**

No known "other" not already included or considered.

### **Percentage of emissions calculated using data obtained from suppliers or value chain partners**

0

### **Explanation**

No known "other" not already included or considered.

## **C6.7**

### **(C6.7) Are carbon dioxide emissions from biologically sequestered carbon relevant to your organization?**

No

## **C6.10**

### **(C6.10) Describe your gross global combined Scope 1 and 2 emissions for the reporting year in metric tons CO2e per unit currency total revenue and provide any additional intensity metrics that are appropriate to your business operations.**

### **Intensity figure**

26.1

### **Metric numerator (Gross global combined Scope 1 and 2 emissions)**

223372

### **Metric denominator**

unit total revenue

### **Metric denominator: Unit total**

8570

### **Scope 2 figure used**

Location-based

### **% change from previous year**

11

### **Direction of change**

Decreased

### **Reason for change**

Reduction attributed to site's efforts in reducing energy use, especially focused on non-production time and load ratio monitoring. Note: RY2016 mistakenly listed CC12.2 denominator, "Unit of total revenue" as 10140, which was the previous year's value. This RY16 CC12.2 revenue should have been 8,111, for an intensity figure of 29.4, a 12.7% reduction in RY16, not the reported 30% reduction.

### **Intensity figure**

19.6

### **Metric numerator (Gross global combined Scope 1 and 2 emissions)**

223372

### **Metric denominator**

full time equivalent (FTE) employee

### **Metric denominator: Unit total**

11400

### **Scope 2 figure used**

Location-based

### **% change from previous year**

7

### **Direction of change**

Decreased

### **Reason for change**

Reduction attributed to site's efforts in reducing energy use, especially focused on non-production time and load ratio monitoring.

### **Intensity figure**

0.019

### **Metric numerator (Gross global combined Scope 1 and 2 emissions)**

223372

### **Metric denominator**

square foot

### **Metric denominator: Unit total**

11573688

### **Scope 2 figure used**

Location-based

### **% change from previous year**

8

### **Direction of change**

Decreased

### **Reason for change**

First Year reported in these units.

## **C7. Emissions breakdowns**

## **C7.1**

### **(C7.1) Does your organization have greenhouse gas emissions other than carbon dioxide?**

Yes

## **C7.1a**

### **(C7.1a) Break down your total gross global Scope 1 emissions by greenhouse gas type and provide the source of each used greenhouse warming potential (GWP).**

|  |  |  |
| --- | --- | --- |
| **Greenhouse gas** | **Scope 1 emissions (metric tons of CO2e)** | **GWP Reference** |
| CO2 | 76712 | IPCC Fifth Assessment Report (AR5 – 100 year) |
| HFCs | 791 | IPCC Fifth Assessment Report (AR5 – 100 year) |

## **C7.2**

### **(C7.2) Break down your total gross global Scope 1 emissions by country/region.**

|  |  |
| --- | --- |
| **Country/Region** | **Scope 1 emissions (metric tons CO2e)** |
| Argentina | 230 |
| Brazil | 2053 |
| Canada | 922 |
| Mexico | 16928 |
| United States of America | 57370 |

## **C7.3**

### **(C7.3) Indicate which gross global Scope 1 emissions breakdowns you are able to provide.**

By facility

By activity

## **C7.3b**

### **(C7.3b) Break down your total gross global Scope 1 emissions by business facility.**

|  |  |  |  |
| --- | --- | --- | --- |
| **Facility** | **Scope 1 emissions (metric tons CO2e)** | **Latitude** | **Longitude** |
| Section C7.3b facility data is tracked internally but deemed too detailed and unnecessary, thus retained as proprietary. |  |  |  |

## **C7.3c**

### **(C7.3c) Break down your total gross global Scope 1 emissions by business activity.**

|  |  |
| --- | --- |
| **Activity** | **Scope 1 emissions (metric tons CO2e)** |
| Manufacturing | 70328 |
| Used Truck | 738 |
| Offices | 2147 |
| Warehouses | 2471 |
| Other: Corporate-wide (DealCor and Fleet) | 1817 |

## **C-CE7.4/C-CH7.4/C-CO7.4/C-EU7.4/C-MM7.4/C-OG7.4/C-ST7.4/C-TO7.4/C-TS7.4**

### **(C-CE7.4/C-CH7.4/C-CO7.4/C-EU7.4/C-MM7.4/C-OG7.4/C-ST7.4/C-TO7.4/C-TS7.4) Break down your organization’s total gross global Scope 1 emissions by sector production activity in metric tons CO2e.**

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Gross Scope 1 emissions, metric tons CO2e** | **Net Scope 1 emissions , metric tons CO2e** | **Comment** |
| Cement production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Chemicals production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Coal production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Electric utility generation activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Metals and mining production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Oil and gas production activities (upstream) | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Oil and gas production activities (downstream) | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Steel production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Transport OEM activities | 73538 | <Not Applicable> | Includes manufacturing, warehouses, and used truck. |
| Transport services activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |

## **C7.5**

### **(C7.5) Break down your total gross global Scope 2 emissions by country/region.**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
| **Country/Region** | **Scope 2, location-based (metric tons CO2e)** | **Scope 2, market-based (metric tons CO2e)** | **Purchased and consumed electricity, heat, steam or cooling (MWh)** | **Purchased and consumed low-carbon electricity, heat, steam or cooling accounted in market-based approach (MWh)** |
| Argentina | 680 | 0 | 1744 | 1744 |
| Brazil | 783 | 0 | 11514 | 11514 |
| Canada | 535 | 0 | 2188 | 2188 |
| Mexico | 24046 | 0 | 43712 | 43712 |
| United States of America | 119825 | 0 | 214550 | 46 |

## **C7.6**

### **(C7.6) Indicate which gross global Scope 2 emissions breakdowns you are able to provide.**

By facility

By activity

## **C7.6b**

### **(C7.6b) Break down your total gross global Scope 2 emissions by business facility.**

|  |  |  |
| --- | --- | --- |
| **Facility** | **Scope 2 location-based emissions (metric tons CO2e)** | **Scope 2, market-based emissions (metric tons CO2e)** |
| Section C7.6b data is tracked internally but deemed too detailed and unnecessary, thus retained as proprietary. |  |  |

## **C7.6c**

### **(C7.6c) Break down your total gross global Scope 2 emissions by business activity.**

|  |  |  |
| --- | --- | --- |
| **Activity** | **Scope 2, location-based emissions (metric tons CO2e)** | **Scope 2, market-based emissions (metric tons CO2e)** |
| Manufacturing | 125781 | 0 |
| Used Truck | 1282 | 0 |
| Offices | 14141 | 0 |
| Warehouses | 4666 | 0 |
| Other: Corporate-wide (DealCor and Fleet) | 0 | 0 |

## **C-CE7.7/C-CH7.7/C-CO7.7/C-MM7.7/C-OG7.7/C-ST7.7/C-TO7.7/C-TS7.7**

### **(C-CE7.7/C-CH7.7/C-CO7.7/C-MM7.7/C-OG7.7/C-ST7.7/C-TO7.7/C-TS7.7) Break down your organization’s total gross global Scope 2 emissions by sector production activity in metric tons CO2e.**

|  |  |  |  |
| --- | --- | --- | --- |
|  | **Scope 2, location-based, metric tons CO2e** | **Scope 2, market-based (if applicable), metric tons CO2e** | **Comment** |
| Cement production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Chemicals production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Coal production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Metals and mining production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Oil and gas production activities (upstream) | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Oil and gas production activities (downstream) | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Steel production activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Transport OEM activities | 131729 | 0 | Includes manufacturing, warehouses, and used truck. |
| Transport services activities | <Not Applicable> | <Not Applicable> | <Not Applicable> |

## **C-TO7.8**

### **(C-TO7.8) Provide primary intensity metrics that are appropriate to your indirect emissions in Scope 3 Category 11: Use of sold products from transport.**

### **Activity**

Heavy Duty Vehicles (HDV)

### **Emissions intensity figure**

### **Metric numerator (Scope 3 emissions: use of sold products) in Metric tons CO2e**

### **Metric denominator**

Please select

### **Metric denominator: Unit total**

### **% change from previous year**

### **Vehicle unit sales in reporting year**

### **Vehicle lifetime in years**

### **Annual distance in km or miles (unit specified by column 4)**

### **Load factor**

### **Please explain the changes, and relevant standards/methodologies used**

Navistar estimates the CO2e emission from the use of its traditional products as: (Trucks and engines sold \* 1,000,000 mile limited useful life of the product \* / 8 average MPG ) To calculate an estimated emissions from products, a number of baseline units for each general category of vehicles was multiplied by useful life, estimated average fuel consumption and emission factor to calculate estimated tons of CO2 for that generalized vehicle population. Emissions estimated from long life expectancy of products in use and the combustion of fossil fuels to operate, primarily diesel. Actual CO2 emissions from these vehicles rely heavily upon actual use and will vary depending on a number of factors, including final vehicle configuration, duty cycle, routes, maintenance and other factors. Navistar cannot know the freight hauled per truck product sold over its million mile life expectancy as the only reporting option allowed herein.

## **C7.9**

### **(C7.9) How do your gross global emissions (Scope 1 and 2 combined) for the reporting year compare to those of the previous reporting year?**

Decreased

## **C7.9a**

### **(C7.9a) Identify the reasons for any change in your gross global emissions (Scope 1 and 2 combined) and for each of them specify how your emissions compare to the previous year.**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **Change in emissions (metric tons CO2e)** | **Direction of change** | **Emissions value (percentage)** | **Please explain calculation** |
| Change in renewable energy consumption | 0 | No change | 0 | No renewables unless as part of purchased power portfolio, not disclosed in detail by utility. |
| Other emissions reduction activities | 18155 | Decreased | 7.5 | 2017 GHG total - 2016 GHG total - % due to production rate - other |
| Divestment | 0 | Please select | 0 | No known changes to emissions due to divestitures this year. |
| Acquisitions | 0 | Please select | 0 | No known changes to emissions due to acquisitions this year. |
| Mergers | 0 | Please select | 0 | No known changes to emissions due to mergers this year. |
| Change in output | 1796 | Decreased | 0.74 | Production ratio, 2017 to 2016 = 0.91 2017 percent GHG reduction in purchased electric and natural gas, less 9% production decrease, ratioed to total GHG reduction. |
| Change in methodology | 0 | No change | 0 | No known changes to emissions due to methodology changes this year. |
| Change in boundary | 0 | No change | 0 | No changes to the boundaries this year |
| Change in physical operating conditions | 0 | No change |  | No known changes to emissions due to physical operating changes this year. |
| Unidentified | 0 | No change |  | No known changes to emissions due to Unidentified factors this year. |
| Other | 0 | No change |  | No known changes to emissions due to other causes this year. |

## **C7.9b**

### **(C7.9b) Are your emissions performance calculations in C7.9 and C7.9a based on a location-based Scope 2 emissions figure or a market-based Scope 2 emissions figure?**

Location-based

## **C8. Energy**

## **C8.1**

### **(C8.1) What percentage of your total operational spend in the reporting year was on energy?**

More than 0% but less than or equal to 5%

## **C8.2**

### **(C8.2) Select which energy-related activities your organization has undertaken.**

|  |  |
| --- | --- |
|  | **Indicate whether your organization undertakes this energy-related activity** |
| Consumption of fuel (excluding feedstocks) | Yes |
| Consumption of purchased or acquired electricity | Yes |
| Consumption of purchased or acquired heat | No |
| Consumption of purchased or acquired steam | No |
| Consumption of purchased or acquired cooling | No |
| Generation of electricity, heat, steam, or cooling | No |

## **C8.2a**

### **(C8.2a) Report your organization’s energy consumption totals (excluding feedstocks) in MWh.**

|  |  |  |  |  |
| --- | --- | --- | --- | --- |
|  | **Heating value** | **MWh from renewable sources** | **MWh from non-renewable sources** | **Total MWh** |
| Consumption of fuel (excluding feedstock) | HHV (higher heating value) | 0 | 362692 | 362692 |
| Consumption of purchased or acquired electricity | <Not Applicable> | 0 | 273708 | 273708 |
| Consumption of purchased or acquired heat | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Consumption of purchased or acquired steam | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Consumption of purchased or acquired cooling | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Consumption of self-generated non-fuel renewable energy | <Not Applicable> | <Not Applicable> | <Not Applicable> | <Not Applicable> |
| Total energy consumption | <Not Applicable> | 0 | 636400 | 636400 |

## **C8.2b**

### **(C8.2b) Select the applications of your organization’s consumption of fuel.**

|  |  |
| --- | --- |
|  | **Indicate whether your organization undertakes this fuel application** |
| Consumption of fuel for the generation of electricity | No |
| Consumption of fuel for the generation of steam | No |
| Consumption of fuel for the generation of cooling | No |
| Consumption of fuel for co-generation or tri-generation | No |

## **C8.2c**

### **(C8.2c) State how much fuel in MWh your organization has consumed (excluding feedstocks) by fuel type.**

### **Fuels (excluding feedstocks)**

Diesel

### **Heating value**

HHV (higher heating value)

### **Total fuel MWh consumed by the organization**

110595

### **MWh fuel consumed for the self-generation of electricity**

<Not Applicable>

### **MWh fuel consumed for self-generation of heat**

<Not Applicable>

### **MWh fuel consumed for self-generation of steam**

<Not Applicable>

### **MWh fuel consumed for self-generation of cooling**

<Not Applicable>

### **MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

### **Fuels (excluding feedstocks)**

Liquefied Petroleum Gas (LPG)

### **Heating value**

HHV (higher heating value)

### **Total fuel MWh consumed by the organization**

370

### **MWh fuel consumed for the self-generation of electricity**

<Not Applicable>

### **MWh fuel consumed for self-generation of heat**

<Not Applicable>

### **MWh fuel consumed for self-generation of steam**

<Not Applicable>

### **MWh fuel consumed for self-generation of cooling**

<Not Applicable>

### **MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

### **Fuels (excluding feedstocks)**

Propane Gas

### **Heating value**

HHV (higher heating value)

### **Total fuel MWh consumed by the organization**

8147

### **MWh fuel consumed for the self-generation of electricity**

<Not Applicable>

### **MWh fuel consumed for self-generation of heat**

<Not Applicable>

### **MWh fuel consumed for self-generation of steam**

<Not Applicable>

### **MWh fuel consumed for self-generation of cooling**

<Not Applicable>

### **MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

### **Fuels (excluding feedstocks)**

Motor Gasoline

### **Heating value**

HHV (higher heating value)

### **Total fuel MWh consumed by the organization**

5004

### **MWh fuel consumed for the self-generation of electricity**

<Not Applicable>

### **MWh fuel consumed for self-generation of heat**

<Not Applicable>

### **MWh fuel consumed for self-generation of steam**

<Not Applicable>

### **MWh fuel consumed for self-generation of cooling**

<Not Applicable>

### **MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

### **Fuels (excluding feedstocks)**

Natural Gas

### **Heating value**

HHV (higher heating value)

### **Total fuel MWh consumed by the organization**

238576

### **MWh fuel consumed for the self-generation of electricity**

<Not Applicable>

### **MWh fuel consumed for self-generation of heat**

<Not Applicable>

### **MWh fuel consumed for self-generation of steam**

<Not Applicable>

### **MWh fuel consumed for self-generation of cooling**

<Not Applicable>

### **MWh fuel consumed for self- cogeneration or self-trigeneration**

<Not Applicable>

## **C8.2d**

### **(C8.2d) List the average emission factors of the fuels reported in C8.2c.**

### **Diesel**

### **Emission factor**

10.24

### **Unit**

kg CO2e per gallon

### **Emission factor source**

US: The Climate Registry Default Emissions Factors 2017, Table 13.1 U.S. Default CO2 Emission Factors for Transport Fuels, US Factor listed above. Non-US: IEA / UNEP Default Emission Factors used by Navistar in previous years "Rest of World"

### **Comment**

Factors differ by country.

### **Liquefied Petroleum Gas (LPG)**

### **Emission factor**

13.77

### **Unit**

lb CO2e per gallon

### **Emission factor source**

Mexico highest consumer, Factor: IEA / UNEP Default Emission Factors used by Navistar in previous years "Rest of World"

### **Comment**

Mexico highest consumer, Factor

### **Motor Gasoline**

### **Emission factor**

8.81

### **Unit**

kg CO2e per gallon

### **Emission factor source**

US Factor: The Climate Registry Default Emissions Factors 2017, Table 13.1 U.S. Default CO2 Emission Factors for Transport Fuels Non-US: IEA / UNEP Default Emission Factors used by Navistar in previous years "Rest of World"

### **Comment**

Factors differ by country.

### **Natural Gas**

### **Emission factor**

53.32

### **Unit**

kg CO2e per million Btu

### **Emission factor source**

US: The Climate Registry Default Emissions Factors 2017, Table 12.1 U.S. Default Factors for Calculating CO2 Emissions from Fossil Fuel and Biomass Combustion Canada: The Climate Registry Default Emissions Factors 2017, Table 13.2 Canadian Default CO2 Emission Factors for Transport Fuels All others: IEA / UNEP Default Emission Factors used by Navistar in previous years "Rest of World"

### **Comment**

Factors differ by country.

### **Propane Gas**

### **Emission factor**

13.77

### **Unit**

lb CO2e per gallon

### **Emission factor source**

Mexico and all non-US: IEA / UNEP Default Emission Factors used by Navistar in previous years "Rest of World" US: The Climate Registry Default Emissions Factors 2017, Table 13.1 U.S. Default CO2 Emission Factors for Transport Fuels

### **Comment**

Mexico highest consumer, Factor shown Factors differ by country.

## **C8.2f**

### **(C8.2f) Provide details on the electricity, heat, steam and/or cooling amounts that were accounted for at a low-carbon emission factor in the market-based Scope 2 figure reported in C6.3.**

## **C-TO8.4**

### **(C-TO8.4) Provide any efficiency metrics that are appropriate for your organization’s transport products and/or services.**

## **C9. Additional metrics**

## **C9.1**

### **(C9.1) Provide any additional climate-related metrics relevant to your business.**

## **C-TO9.3/C-TS9.3**

### **(C-TO9.3/C-TS9.3) Provide tracking metrics for the implementation of low-carbon transport technology over the reporting year.**

## **C-TO9.6/C-TS9.6**

### **(C-TO9.6/C-TS9.6) What is your investment in research and development (R&D), equipment, products and services and which part of it would you consider a direct investment in the low-carbon transition?**

## **C10. Verification**

## **C10.1**

### **(C10.1) Indicate the verification/assurance status that applies to your reported emissions.**

|  |  |
| --- | --- |
|  | **Verification/assurance status** |
| Scope 1 | No third-party verification or assurance |
| Scope 2 (location-based or market-based) | No third-party verification or assurance |
| Scope 3 | No emissions data provided |

## **C10.2**

### **(C10.2) Do you verify any climate-related information reported in your CDP disclosure other than the emissions figures reported in C6.1, C6.3, and C6.5?**

No, we do not verify any other climate-related information reported in our CDP disclosure

## **C11. Carbon pricing**

## **C11.1**

### **(C11.1) Are any of your operations or activities regulated by a carbon pricing system (i.e. ETS, Cap & Trade or Carbon Tax)?**

No, and we do not anticipate being regulated in the next three years

## **C11.2**

### **(C11.2) Has your organization originated or purchased any project-based carbon credits within the reporting period?**

No

## **C11.3**

### **(C11.3) Does your organization use an internal price on carbon?**

No, and we do not currently anticipate doing so in the next two years

## **C12. Engagement**

## **C12.1**

### **(C12.1) Do you engage with your value chain on climate-related issues?**

Yes, our suppliers

Yes, our customers

Yes, other partners in the value chain

## **C12.1a**

### **(C12.1a) Provide details of your climate-related supplier engagement strategy.**

### **Type of engagement**

Innovation & collaboration (changing markets)

### **Details of engagement**

Run a campaign to encourage innovation to reduce climate impacts on products and services

### **% of suppliers by number**

10

### **% total procurement spend (direct and indirect)**

### **% Scope 3 emissions as reported in C6.5**

0

### **Rationale for the coverage of your engagement**

We are engaging with key suppliers to improve overall fuel efficiency of our products. Highlights of our efforts include utilizing predictive cruise control technology, remote engine control modules servicing, low rolling resistant tires, weight reductions, aerodynamics, improved lubrication materials, and use of fuel efficient powertrain and transmission combinations.

### **Impact of engagement, including measures of success**

Navistar’s introduction of the LT Series built on the company’s many innovations designed to reduce energy consumption. In addition to vehicle aerodynamics, these innovations have included improvements in base engine efficiency, engine-transmission integration, lubrication materials, and intelligent control strategies, as well as vehicle weight reductions.

### **Comment**

## **C12.1b**

### **(C12.1b) Give details of your climate-related engagement strategy with your customers.**

### **Type of engagement**

Education/information sharing

### **Details of engagement**

Run an engagement campaign to educate customers about the climate change impacts of (using) your products, goods, and/or services

### **Size of engagement**

1

### **% Scope 3 emissions as reported in C6.5**

0

### **Please explain the rationale for selecting this group of customers and scope of engagement**

Supply GHG emissions of products and manufacturing processes, reporting to outside parties, and voluntary efforts to reduce are supplied at customer request.

### **Impact of engagement, including measures of success**

Perceived as competitive advantage providing in depth sustainability data and initiatives. No known instances of not winning product supply bid related to engagement or information sharing.

## **C12.1c**

### **(C12.1c) Give details of your climate-related engagement strategy with other partners in the value chain.**

Other Partners: Texas A&M Transportation Institute - Navistar’s is playing a leading role in research partnership with the Texas A&M Transportation Institute developing a new generation of connected heavy-duty vehicles. Navistar is also exploring the great potential benefits from autonomous technologies that enable platooning, which allows trucks to safely follow each other to reduce wind drag. This parternership has put test units on the highway.

U.S. Department of Energy - Navistar delivered the results of the five-year SuperTruck research and development program undertaken with the U.S. Department of Energy (DOE) in 2016. The truck, known as the Catal-IST, exceeded the DOE’s requirements for a 50 percent improvement in overall freight efficiency on a heavy-duty Class 8 tractor-trailer vehicle, and 50 percent engine efficiency. Our SuperTruck I work also inspired our International® LT® Series of ergonomic, aerodynamic Class 8 vehicles, which in 2017 was shown by a third-party study to provide industry-leading fuel efficiency. We are now participating in the next phase of DOE’s SuperTruck initiative, SuperTruck II.

DOE Better Plants Better Buildings program participation resulted in an award for manufacturing site energy reduction Treasure Hunt exchange with other industry and DOE partners. The 3 day event was a success in sharing opportunities, collabartion, and identifying specific energy reduction and cost savings items.

## **C12.3**

### **(C12.3) Do you engage in activities that could either directly or indirectly influence public policy on climate-related issues through any of the following?**

Direct engagement with policy makers

Trade associations

Other

## **C12.3a**

### **(C12.3a) On what issues have you been engaging directly with policy makers?**

|  |  |  |  |
| --- | --- | --- | --- |
| **Focus of legislation** | **Corporate position** | **Details of engagement** | **Proposed legislative solution** |
| Other, please specify (Phase I and II GHG for truck) | Support with major exceptions | The company worked extensively with EPA and NHTSA on the next phase of greenhouse gas/fuel efficiency regulations in the heavy-duty sector. Navistar supported the larger goal of the proposed rule, while expressing concerns about certain specific aspects of the proposed rule. The final rule, which was adopted in October 2016, phases in over model years 2021 through 2027, and will require new and expanded efficiency technologies across vehicle and engine platforms. EPA has estimated the Phase 2 rule will result in an additional 10 percent | The final rule, which was adopted in October 2016, phases in over model years 2021 through 2027, and will require new and expanded efficiency technologies across vehicle and engine platforms. EPA has estimated the Phase 2 rule will result in an additional 10 percent |
| Energy efficiency | Support with minor exceptions | Various sites working with local Chambers of Commerce or trade groups regarding support of incentives for energy efficiency improvements, energy efficiency investments, and real reduction projects at its manufacturing sites. | None. One of the minor exceptions is Clean Power Plan |
| Clean energy generation | Support with minor exceptions | Since 2013 to date Navistar has lobbied against legislative proposals in Ohio to roll back energy efficiency and renewable power standards in the state which in 2016 remain stayed but not eliminated. | Ohio legislature voted to remove the requirements. |

## **C12.3b**

### **(C12.3b) Are you on the board of any trade associations or do you provide funding beyond membership?**

Yes

## **C12.3c**

### **(C12.3c) Enter the details of those trade associations that are likely to take a position on climate change legislation.**

### **Trade association**

Engine Manufacturers Association

### **Is your position on climate change consistent with theirs?**

Mixed

### **Please explain the trade association’s position**

Navistar is primarily focused on regulations that impact our products, on manufacturing policy and on trade issues. The Engine Manufacturers Association served as a key liaison between commercial vehicle manufacturers and the EPA during the heavy duty GHG phase I, and more recent GHG phase II rulemaking process. Position is workable rules within available technologies.

### **How have you, or are you attempting to, influence the position?**

Yes, Navistar has participated in the development of positions taken by the EMA.

### **Trade association**

National Association of Manufacturers (NAM)

### **Is your position on climate change consistent with theirs?**

Mixed

### **Please explain the trade association’s position**

Navistar is primarily focused on regulations that impact our products, on manufacturing policy and on trade issues. Associations like NAM typically do not focus on the climate impact of the commercial vehicles we manufacture. Navistar is always willing to work with fellow NAM board members on climate change issues.

### **How have you, or are you attempting to, influence the position?**

Navistar is always willing to work with fellow NAM board members on climate change issues.

### **Trade association**

Chamber of Commerce

### **Is your position on climate change consistent with theirs?**

Mixed

### **Please explain the trade association’s position**

Navistar is primarily focused on regulations that impact our products, on manufacturing policy and on trade issues. Associations like the national and local Chambers typically do not focus on the climate impact of the commercial vehicles we manufacture, though do support manufacturing.

### **How have you, or are you attempting to, influence the position?**

Navistar is always willing to work with fellow Chamber members on climate change issues

## **C12.3e**

### **(C12.3e) Provide details of the other engagement activities that you undertake.**

Navistar engages on a wide variety of lobbying activities at the state and federal level. In 2017, Navistar lobbied at the federal level on the Greenhouse Gas Phase II rule for commercial vehicles, trade issues, Department of Energy funding for the Advanced Vehicle Technology office, tax reform, pension reform, and for key defense programs. Navistar also lobbied in California, Ohio, Illinois, and Oklahoma on various state and local issues that impact our dealers operations and facilities in those states.

## **C12.3f**

### **(C12.3f) What processes do you have in place to ensure that all of your direct and indirect activities that influence policy are consistent with your overall climate change strategy?**

Navistar has an annual policy and lobbying team meeting that develops the company’s lobbying agenda. This agenda is shared with the Vice-President of Product Development, the Chief Financial Officer, the Chief Operating Officer and the President/Chief Executive Officer for review and revision. Navistar’s lobbying team also conducts a mid-year review of on-going issues and formally amends its lobbying agenda at that point to reflect any changes in company priorities.

During the development, review and revision process, Navistar ensures that its lobbying activities are focused on the company’s key concerns and that the government relations group’s lobbying activities align with all relevant corporate strategies.

## **C12.4**

### **(C12.4) Have you published information about your organization’s response to climate change and GHG emissions performance for this reporting year in places other than in your CDP response? If so, please attach the publication(s).**

### **Publication**

In voluntary sustainability report

*Sustainability Report is Publically available each year, published in GRI format. https://www.navistar.com/navistar/whoweare/sustainability/*

### **Status**

Complete

### **Attach the document**

[Navistar,Inc2017\_SR\_.pdf](https://www.cdp.net/en/formatted_responses/files?file_path=k9me76vz7u2sozvqoi2gbw-cdp-credit360-com/oOeigYva3E6edTNOmjiaPA/NavistarInc2017SR.pdf)

### **Content elements**

Governance

Risks & opportunities

Emissions figures

Emission targets

Other metrics

### **Publication**

In voluntary communications

### **Status**

Complete

### **Attach the document**

### **Content elements**

Emissions figures

Emission targets

Other metrics

Other, please specify (DOE, Better Buildings No doc produced )

## **C14. Signoff**

## **C-FI**

### **(C-FI) Use this field to provide any additional information or context that you feel is relevant to your organization's response. Please note that this field is optional and is not scored.**

## **C14.1**

### **(C14.1) Provide details for the person that has signed off (approved) your CDP climate change response.**

|  |  |  |
| --- | --- | --- |
|  | **Job title** | **Corresponding job category** |
| Row 1 | Director, Environmental and Energy Affairs and Senior Counsel | Business unit manager  *Corporate Senior Legal Counsel and Director of Environmental and Energy Affairs group, also in charge of Sustainability reporting.* |