



# Delivering Responsibly

2019 DATA SUPPLEMENT  
GRI AND SASB INDEX







Our Reporting

About this Report

Our Priorities

Data Tables

GRI Index

SASB Index

Our Sustainability  
Commitment

# Our Reporting

CONTACT

We welcome comments, questions and feedback on this report. Please contact:

Chantale Després  
CN Sustainability Director  
[chantale.despres@cn.ca](mailto:chantale.despres@cn.ca)

Canadian National Railway Company  
935 de La Gauchetière Street West  
Montreal, Quebec H3B 2M9

P.O. Box 8100  
Montreal, Quebec H3C 3N4  
1-888-888-5909

Transparent reporting is part of our commitment to be open about our business and to communicate our progress with focus, clarity and comparability.

About this Report

We typically issue our full Delivering Responsibly Sustainability Report on a biennial basis. In the interim, we publish the following data supplement to disclose key performance metrics annually and supplement our most recent comprehensive sustainability report available at [www.cn.ca/delivering-responsibly](http://www.cn.ca/delivering-responsibly).

The scope of information covered in this supplement relates to our operations in Canada and the U.S., in the 2016 to 2019 calendar years, unless otherwise noted.

Reporting Standards and Assurance

This report has been prepared in accordance with the Global Reporting Initiative (GRI) Standards: Core option. The GRI is an independent institution that provides a standard framework for sustainability reporting across companies and industries.

This year marks the first time that CN has reported to the Sustainability Accounting Standards Board (SASB) framework against the Rail Transportation Standards. SASB connects businesses and investors on the financial impacts of sustainability.

Our environmental data related to GHG emissions from Scope 1 (locomotive emissions), Scope 2 (electricity consumption) and Scope 3 (fuel production) were verified by PricewaterhouseCoopers to a limited level of assurance in accordance with the ISO 14064-3: 2006 Specification with guidance for the validation and verification of greenhouse gas assertions. The statements can be found at [www.cn.ca/delivering-responsibly](http://www.cn.ca/delivering-responsibly).

Additional Information

We also provide more details on our website, which hosts numerous corporate disclosure reports as well as information on our policies, initiatives and culture, and via other publications and CN's social media platforms.

In addition, we provide information to the CDP, the Dow Jones Sustainability Index and other organizations that assess our sustainability performance. An index of our conformance to the GRI Standards: Core option, and SASB: Rail Transportation Standards reporting requirements and references to other relevant information sources can be found at the end of this supplement.



VIEW ONLINE

Our new Delivering Responsibly website provides online access to our 2018 Full Sustainability Report as well as all current and past reports.

[www.delivering-responsibly.cn.ca](http://www.delivering-responsibly.cn.ca)



Our Reporting

About this Report

Our Priorities

Data Tables

GRI Index

SASB Index

Our Sustainability Commitment



Our Priorities

To inform the content of the 2018 Delivering Responsibly Report, we applied the principle of materiality and stakeholder inclusiveness to prioritize relevant topics.

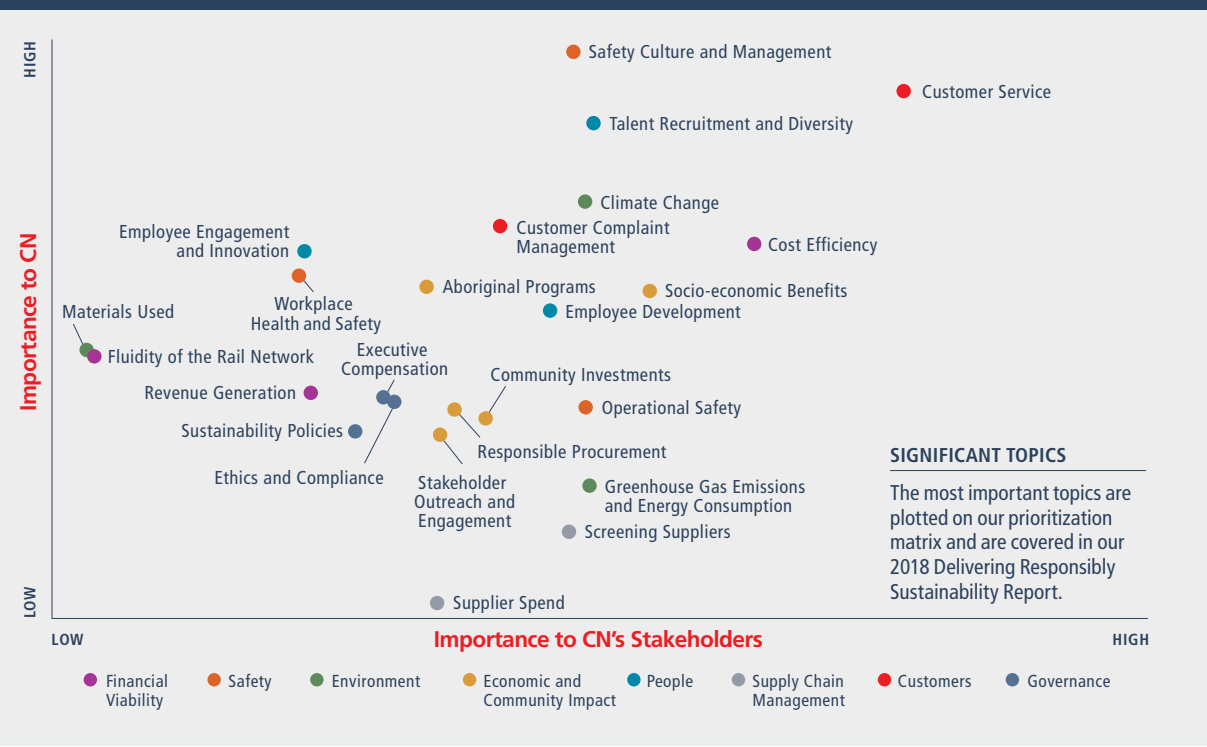
In 2018, we received input from 205 stakeholders using an electronic survey to understand the sustainability topics that most influence their decisions or perspectives of CN. Diverse groups were engaged, including employees, suppliers, governments, railway associations, customers, investors, unions, Aboriginal peoples, community groups, and NGOs. The selection and identification of stakeholders considered their geographic representation and their influence and interest in our business. We also engaged with our executive management to further inform the sustainability topics prioritization process.



FURTHER READING

- 2018 Full Sustainability Report (PDF)
- 2018 Full Sustainability Report (Online)

OUR PRIORITIZATION MATRIX





# Data Tables

The following data covered in this report applies to CN and its subsidiaries. CN subsidiaries are listed in the 2019 Annual Information Form on page 2.

Data	Measurement	2019	2018	2017	2016	GRI	SASB
ABOUT CN							
ACTIVITY MEASURES							
Carloads transported	Number (thousands)	5,912	5,976	5,737	5,205	201-1	000.A
Intermodal units transported <sup>(a)</sup>	Number (thousands)	2,618	2,634	2,514	2,163	201-1	000.B
Track miles (includes Canada and the U.S.)	Number	21,300	21,300	21,200	21,300	201-1	000.C
Revenue ton miles (RTMs) <sup>(b)</sup>	Million	241,954	248,383	237,098	214,327	201-1	000.D
Gross ton miles (GTMs) <sup>(c)</sup>	Million	482,890	490,414	469,200	423,426	201-1	–

- (a) Intermodal units transported are a subset of the carloads transported.
- (b) Revenue ton-miles (RTMs) refers to the movement of one revenue-producing ton of freight over a distance of one mile. RTMs are calculated by multiplying the weight in tons of the shipment lading being transported (or “tons of lading carried in the Carload”) by the number of miles that the shipment (or Carload) is transported on company lines. The tare weight of the car is excluded.
- (c) Gross ton-miles (GTMs) refers to the movement of one ton of freight or equipment over one mile. GTMs are calculated by multiplying total train weight by the distance the train moved.

OUR BUSINESS AT A GLANCE

CN is a leading North American transportation and logistics company, and our 20,000-mile network spans Canada and Mid-America, connecting ports on three coasts. We offer fully integrated rail and other transportation services, including intermodal, trucking, freight forwarding, warehousing and distribution. Serving exporters, importers, retailers and manufacturers, we move raw materials, intermediate goods and finished products to market, fostering the prosperity of the markets we serve.

2019 REVENUES BY COMMODITY GROUP  
(% of total revenues)

25% Intermodal

6% Automotive

21% Petroleum and chemicals

16% Grain and fertilizers

12% Forest products

11% Metals and minerals

4% Coal

5% Other revenues

CONSUMER PRODUCT SUPPLY CHAIN

RAIL CENTRIC SUPPLY CHAIN

2019 REVENUES BY GEOGRAPHIC FLOW  
(% of freight revenues)

34% Transborder

33% Overseas

17% Canadian domestic

16% U.S. domestic

2019 HIGHLIGHTS

\$250B

VALUE OF GOODS HANDLED

\$3.9B

CAPITAL INVESTMENTS

~47,000

TONNES OF CARBON EMISSIONS AVOIDED

~90%

WASTE DIVERTED FROM LANDFILL AND INSTEAD SENT FOR REUSE OR RECYCLING

\$14M

INVESTED IN COMMUNITIES IN SPONSORSHIPS AND DONATIONS

38%

WOMEN ON THE BOARD OF DIRECTORS

< >

CN | 2019 DATA SUPPLEMENT / GRI AND SASB INDEX | DATA TABLES

03



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
ENVIRONMENT							
EMISSIONS							
Total GHG emissions (Scopes 1 and 2) <sup>(a)</sup>	Metric tonnes of CO <sub>2</sub> e	5,934,095	5,965,175	5,671,982	5,221,152	–	110a.1
Direct GHG emissions (Scope 1) <sup>(b)</sup>	Metric tonnes of CO <sub>2</sub> e	5,771,894	5,776,183	5,499,641	5,032,309	305-1	110a.1
Rail locomotives <sup>(c)</sup>	Metric tonnes of CO <sub>2</sub> e	4,962,923	5,095,382	4,865,352	4,405,606	305-1	110a.1
Intermodal CNTL trucks	Metric tonnes of CO <sub>2</sub> e	140,760	149,620	149,669	140,804	305-1	110a.1
Intermodal TransX trucks	Metric tonnes of CO <sub>2</sub> e	132,518	N/A	N/A	N/A	305-1	110a.1
Marine vessel fleet	Metric tonnes of CO <sub>2</sub> e	191,557	192,860	187,093	204,067	305-1	110a.1
On Company Service fleet	Metric tonnes of CO <sub>2</sub> e	95,552	95,664	90,211	86,273	305-1	110a.1
Intermodal equipment	Metric tonnes of CO <sub>2</sub> e	60,834	62,323	57,185	45,581	305-1	110a.1
Miscellaneous fuel emissions	Metric tonnes of CO <sub>2</sub> e	187,749	180,334	150,130	149,978	305-1	110a.1
Indirect GHG emissions (Scope 2) <sup>(d)</sup>	Metric tonnes of CO <sub>2</sub> e	162,202	188,992	172,341	188,843	305-2	–
Other indirect GHG emissions (Scope 3) <sup>(e)</sup>	Metric tonnes of CO <sub>2</sub> e	2,298,649	2,488,659	2,768,395	2,740,942	305-3	–
GHG emission intensity <sup>(f)</sup>							
Total GHG emissions (by rail freight revenue)	Metric tonnes of CO <sub>2</sub> e per thousand dollars of rail freight revenue	0.42	0.44	0.46	0.46	305-4	–
Total GHG emissions (by employee)	Metric tonnes of CO <sub>2</sub> e per full-time employee	222	235	246	234	305-4	–
Impact of service							
Rail emission intensity <sup>(g)</sup>	Metric tonnes of CO <sub>2</sub> e per million GTMs	10.28	10.39	10.37	10.40	–	110a.1
CNTL truck emission intensity <sup>(h)</sup>	Metric tonnes of CO <sub>2</sub> e per thousand kilometres travelled	1.21	1.21	1.23	1.22	–	110a.1
TransX truck emission intensity <sup>(h)</sup>	Metric tonnes of CO <sub>2</sub> e per thousand kilometres travelled	1.31	N/A	N/A	N/A	–	110a.1
Marine vessel emission intensity	Metric tonnes of CO <sub>2</sub> e per million net ton miles	16.63	16.20	16.37	16.90	–	110a.1
Target							
Measure (GHG emission intensity) <sup>(i)</sup>	Metric tonnes of CO <sub>2</sub> e per million revenue tonne kilometres	15.61	15.62	15.56	15.71	–	110a.1
ENERGY							
Total direct and indirect energy consumed within the organization <sup>(j)</sup>	Megawatt hours	22,178,631	22,149,870	20,972,206	19,242,556	302-1	–
Total direct energy consumed	Megawatt hours	21,621,370	21,558,096	20,427,005	18,685,836	302-1	–
Diesel (used for locomotives)	Megawatt hours	18,203,164	18,637,602	17,754,169	16,045,338	302-1	–
Diesel (other) <sup>(k)</sup>	Megawatt hours	2,346,748	1,858,793	1,796,043	1,768,728	302-1	–
Natural gas	Megawatt hours	709,613	702,780	532,195	527,157	302-1	–
Other fuels (propane, gasoline, kerosene, stove oil, furnace oil)	Megawatt hours	361,845	358,920	344,599	344,614	302-1	–
Total indirect energy consumed – electricity	Megawatt hours	557,261	591,775	545,201	556,720	302-1	–



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
ENVIRONMENT							
Total renewable energy consumed <sup>(l)</sup>	Megawatt hours	464,390	444,660	466,293	404,102	302-1	–
Total non-renewable energy consumed	Megawatt hours	21,714,241	21,705,210	20,505,914	18,838,454	302-1	–
Energy intensity <sup>(m)</sup>	Megawatt hours per million CDN dollars of rail freight revenue	1.56	1.63	1.71	1.70	302-3	
Fuel efficiency <sup>(n)</sup>	GTM's per U.S. gallon of fuel consumed	1,070	1,060	1,063	1,061	302-3	110a.3
Fuel efficiency savings <sup>(o)</sup>	\$ million	13	0	2	19	–	110a.3
NO <sub>x</sub> , SO <sub>x</sub> , AND OTHER SIGNIFICANT RAIL EMISSIONS IN CANADA <sup>(p)</sup>							
Nitrous oxide (NO <sub>x</sub> )	Kilotonnes	44.51	48.55	48.04	44.27	305-7	120a.1
Sulphur dioxide (SO <sub>x</sub> )	Kilotonnes	0.03	0.02	0.02	0.02	305-7	120a.1
Particulate matter	Kilotonnes	0.92	1.00	0.99	0.91	305-7	120a.1
Hydrocarbons	Kilotonnes	1.91	2.00	2.07	1.91	305-7	120a.1
Carbon monoxide	Kilotonnes	8.64	8.82	8.53	7.84	305-7	120a.1
NO <sub>x</sub> , SO <sub>x</sub> , AND OTHER SIGNIFICANT RAIL EMISSIONS IN THE U.S. <sup>(p)</sup>							
Nitrous oxide (NO <sub>x</sub> )	Kilotonnes	15.54	19.37	19.24	16.99	305-7	120a.1
Sulphur dioxide (SO <sub>x</sub> )	Kilotonnes	0.01	0.01	0.01	0.01	305-7	120a.1
Particulate matter	Kilotonnes	0.32	0.40	0.40	0.35	305-7	120a.1
Hydrocarbons	Kilotonnes	0.67	0.80	0.84	0.75	305-7	120a.1
Carbon monoxide	Kilotonnes	3.02	3.49	3.39	2.94	305-7	120a.1
EFFLUENTS AND WASTE							
Total weight of waste generated <sup>(q)</sup>	Metric tonnes	397,406	340,291	313,251	400,744	306-2	–
Total hazardous waste generated	Metric tonnes	787	881	789	770	306-2	–
Disposal methods <sup>(r)</sup>							
Recycled	Metric tonnes	698	830	725	655	306-2	–
Recovery for energy	Metric tonnes	35	9	23	88	306-2	–
Incinerated	Metric tonnes	24	8	19	1	306-2	–
Deep-well injected	Metric tonnes	0	0	0	0	306-2	–
Sent to landfill	Metric tonnes	28	31	20	24	306-2	–
Treatment	Metric tonnes	2	3	2	2	306-2	–
Water discharge	Metric tonnes	0	0	0	0	306-2	–
Disposed in caverns	Metric tonnes	0	0	0	0	306-2	–
Waste fuel blended	Metric tonnes	0	0	0	0	306-2	–



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community and Economy

GRI Index

SASB Index

Our Sustainability Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
ENVIRONMENT							
Total non-hazardous waste generated	Metric tonnes	396,619	339,410	312,462	399,974	306-2	–
Disposal methods <sup>(i)</sup>							
Recycled	Metric tonnes	235,905	164,935	135,008	223,202	306-2	–
Recovery for energy	Metric tonnes	127,779	143,524	141,552	140,485	306-2	–
Incinerated	Metric tonnes	10	14	25	90	306-2	–
Deep-well injected	Metric tonnes	544	194	279	244	306-2	–
Sent to landfill	Metric tonnes	21,526	21,309	26,855	25,886	306-2	–
Treatment	Metric tonnes	10,855	9,434	8,743	10,067	306-2	–
Water discharge	Metric tonnes	0	0	0	0	306-2	–
Disposed in caverns	Metric tonnes	0	0	0	0	306-2	–
Waste fuel blended	Metric tonnes	0	0	0	0	306-2	–
WATER							
Water consumption from municipal sources <sup>(s)</sup>	Million litres	1,775	1,647	1,659	1,776	303-1	–
BIODIVERSITY AND LAND MANAGEMENT							
Spend on site assessments and remediation	\$ million	34	34	23	29	–	–

- (a) Our Scope 1 and 2 GHG emissions are consolidated based on an operational control approach.
- (b) Our GHG Scope 1 emissions include rail and non-rail emissions. The GHG Protocol was applied. We measured carbon dioxide, methane and nitrous oxide using emission factors and global warming potentials from the Environment Canada National Inventory report and the International Panel on Climate Change Fifth Assessment reports, respectively.
- (c) Rail locomotives emissions decreased 2.6% from 2018 due to a decrease in locomotive diesel consumption. Less locomotive diesel was consumed as a result of higher rail fuel efficiency and less GTMs travelled in 2019.
- (d) Our GHG Scope 2 emissions comprise electricity emissions only. The GHG Protocol was used to calculate the scope 2 GHG emissions, covering carbon dioxide, methane and nitrous oxide. Scope 2 emissions were calculated using a location-based method. We applied North American utility cost per MWh conversion factors and used emission factors from Environment Canada’s National Inventory Report and the U.S. EPA eGRID database to convert MWh into tonnes of CO<sub>2</sub>e.
- (e) Our GHG Scope 3 emissions include emissions from diesel fuel production, purchased goods and services, capital goods, waste generated in operations and upstream transportation and distribution. In 2018, business travel emissions represented less than 2% of Scope 3 emissions. They were considered immaterial in the 2019 reporting year and excluded from our Scope 3 emissions estimate. Other categories of emissions were calculated using standard emission factors multiplied by activity levels or dollars of spend.
- (f) Calculations for GHG emission intensity covers Scope 1 and 2 emissions only.
- (g) Rail emission intensity is a measure of the tonnes of CO<sub>2</sub>e generated by locomotives per million gross ton miles (GTM).
- (h) The emissions intensity of the recently acquired TransX trucking fleet is reported separately to provide year-over-year comparability.
- (i) GHG emissions are total Scope 1 and 2. Revenue tonne kilometers include rail, marine vessels and CNTL trucks. The recently acquired TransX trucks are not included in this metric to provide year-over-year comparability while CN investigates ways to consider acquisitions and divestitures in its science-based target.
- (j) Energy consumption relates to fuel and electricity consumed within the Company. Conversions to MWh from volumes of fuel were based on Natural Resource Canada conversion factors, and include renewable fuel volumes (biodiesel). Electricity MWh were estimated from utility invoice data using North American utility cost per MWh conversion factors.
- (k) Other diesel fuel consumption increased due to the recently acquired TransX truck fleet.
- (l) Renewable energy consumed includes biodiesel used in our locomotives, as well as location-based low carbon electricity.
- (m) Energy includes total direct and indirect energy, covering locomotive fuel, non-locomotive fuel, electricity, natural gas, and other fuels such as propane, gasoline, kerosene, stove oil, and furnace oil. The energy is used within the organization only.
- (n) Fuel consumed is locomotive diesel fuel only. Our fuel efficiency target is 6% improvement by 2022 from 2017, in line with the Railway Association of Canada MOU with Transport Canada.
- (o) Annual fuel savings in gallons were estimated based on the fuel efficiency gain in gallons per GTM multiplied by GTMs for that year. Associated cost savings were then estimated by multiplying the fuel gallons saved by the average price of fuel for each year.
- (p) Criteria Air Contaminant (CAC) emissions were calculated using Canadian emission factors published by the Railway Association of Canada (RAC). We measured nitrous oxide, sulphur dioxide, particulate matter, hydrocarbons, and carbon monoxide by applying the RAC emission factors to total fuel consumed. The most recent 2017 emission factors were used to calculate 2019 emissions.
- (q) Total weight of waste generated includes our rail ties, scrap metal, locomotive lead acid batteries and day-to-day office and yard waste. Waste quantities are provided by our third-party waste disposal contractors. Where data was not available, estimations were made based on industry standards. Definitions of hazardous and non-hazardous waste are based on provincial and state regulations, which we assess on a case-by-case basis depending on the condition of the waste.
- (r) Waste disposal methods and associated quantities are provided to us by our third-party waste disposal contractor.
- (s) Water consumption was estimated from utility invoices using North American average water costs per cubic metre. Given the nature of our operations, we do not consume significant quantities of water in our business.



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
SAFETY							
JOINT MANAGEMENT: WORKER HEALTH AND SAFETY (H&S) COMMITTEES <sup>(a)</sup>							
Number of joint union–management H&S committees	Number	93	103	103	103	403-1	–
% of workforce represented in joint union–management H&S committees <sup>(b)</sup>	%	83	95	95	96	403-1	–
WORK-RELATED INJURIES <sup>(c)</sup>							
Total recordable incident rate (TRIR) <sup>(d)</sup>	Ratio	3.40	3.26	3.28	3.04	403-9	320a.1
Injury frequency rate – Federal Railroad Administration (FRA)	Ratio	1.91	1.81	1.83	1.70	403-9	320a.1
Canada	Ratio	1.92	1.61	1.61	1.54	403-9	320a.1
U.S.	Ratio	1.87	2.27	2.30	2.05	403-9	320a.1
Female	Ratio	1.39	1.23	0.57	0.97	403-9	320a.1
Male	Ratio	1.95	1.86	1.96	1.78	403-9	320a.1
Lost-time injury frequency rate – FRA	Ratio	1.13	1.30	1.35	1.19	403-9	320a.1
Canada	Ratio	0.97	1.06	1.06	0.95	403-9	320a.1
U.S.	Ratio	1.56	1.87	1.99	1.74	403-9	320a.1
Female	Ratio	0.77	1.00	0.43	0.97	403-9	320a.1
Male	Ratio	1.17	1.33	1.44	1.25	403-9	320a.1
FATALITIES							
On-duty employees							
Canada	Number	1	1	1	1	403-9	320a.1
U.S.	Number	0	0	1	0	403-9	320a.1
Female	Number	0	0	1	0	403-9	320a.1
Male	Number	1	1	1	1	403-9	320a.1
Fatality rate <sup>(e)</sup>	Ratio	0.00	0.00	0.01	0.01	403-9	320a.1
Contract workers							
Contract workers fatalities <sup>(f)</sup>	Number	0	0	0	0	403-9	320a.1
TRAIN ACCIDENTS							
Train-related incidents and accidents <sup>(g)</sup>	Number	949	981	820	698	–	540a.1
FRA train accidents <sup>(h)</sup>	Number	157	151	129	94	–	540a.1
FRA train accident rate <sup>(i)</sup>	Per million train miles	2.11	2.02	1.83	1.42	–	540a.1
Transportation Safety Board of Canada (TSB) train accidents	Number	310	371	344	330	–	540a.1
TSB train accident rate <sup>(j)</sup>	Per million train miles	5.92	7.01	6.95	7.11	–	540a.1
Grade crossing accidents	Number	233	187	202	194	–	540a.1
Grade crossing accident rate <sup>(k)</sup>	Per million train miles	3.51	2.66	2.70	2.60	–	540a.1
Trespassing accidents	Number	65	75	74	59	–	540a.1
Trespassing accident rate	Per million train miles	0.98	1.07	0.92	0.79	–	540a.1
Train vs. vehicle fatalities <sup>(l)</sup>	Number	23	25	26	25	–	540a.1
Train vs. vehicle injuries <sup>(m)</sup>	Number	66	73	109	78	–	540a.1





Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
SAFETY							
Train-related accidents involving the release of hazardous materials <sup>(n)</sup>	Number	3	2	8	0	–	540a.2
Non-accident releases of hazardous materials <sup>(o)</sup>	Number	57	91	88	61	–	540a.2
SIGNIFICANT SPILLS							
Significant spill events <sup>(p)</sup>	Number of spills	34	22	11	13	306-3	–
FRA RECOMMENDATIONS							
Number of FRA recommended violation defects <sup>(q)</sup>	Number	176	202	142	166	–	540a.3
TRACK INSPECTIONS							
Frequency of internal railway integrity inspections <sup>(r)</sup>	Ratio	1.77	1.76	1.76	1.75	–	540a.4

- (a) The joint union–management health and safety committees exist at the local level across the system. The % is based on the total number of employees. To perform the calculation, senior manager-level employees and non-participating unionized employees were subtracted from the total workforce number.
- (b) The workers in the U.S. included in the percentage are represented by a formal Peer Engagement Team, which includes both management and worker representatives and addresses, amongst other topics, H&S matters.
- (c) As a North American railroad, our occupational health and safety metrics are established based on industry guidelines set by the Federal Railroad Administration (FRA) and the Transportation Safety Board (TSB) of Canada. We track the FRA injury and accident rates and the TSB accident rate covering our operations in North America. The FRA injury frequency rates per country and gender are based on an estimate using demographic data calculations. The FRA injury frequency rate is the number of reportable injuries per 200,000 hours worked. According to the FRA, a reportable injury frequency rate must be occupational or work-related; be a new case, and not a new episode of an already existing medical condition; and result in one of the following situations: death, days away from work, day(s) on modified or alternate duties, medical treatment or loss of consciousness. In 2019, 81% of our reportable injuries represented: sprain or strain (39%), cut/laceration/abrasion (14%), painful body part (10%), fracture (9%) and bruise/contusion (9%). The remaining 19% is represented by over 23 different injury types.
- (d) The Total recordable incident rate (TRIR) is a measure of recordable work-related injuries and illnesses. The rate is calculated as total number of recordable cases multiplied by 200,000, divided by total employee hours worked during the reporting period.
- (e) The Fatality rate is a measure for work-related fatalities. The rate is calculated as total number of recordable cases multiplied by 200,000, divided by total employee hours worked during the reporting period.
- (f) Contract worker fatalities refers to incidents resulting in the death of an employee of a third party service provider, while performing work on behalf of CN.
- (g) A train-related incident or accident is any undesired event where rolling stock gets involved in either a derailment or a collision with another rolling stock. A derailment is an event where one or more wheels of rolling stock have come off the normal running surface of the rail. A collision is an event where two rolling stocks come into contact unintentionally.
- (h) FRA reportable train accidents refers to a subset of reported train-related incidents and includes only those events involving damage exceeding a specific monetary value set by the FRA. For 2018 and 2017, this value was US\$10,700 and US\$10,500 in damage for events occurring from 2014–2016. There was no change to the reporting threshold (\$10,700) for 2019.
- (i) FRA train accident rate reflects the number of train accidents resulting in damage exceeding a specific monetary threshold (set by FRA), multiplied by 1,000,000, divided by total train miles travelled during the reporting period. Monetary threshold for 2018 and 2017 was US\$10,700 and US\$10,500 in damage for events occurring from 2014–2016. There was no change to the reporting threshold (\$10,700) for 2019.
- (j) In 2017, the TSB made a regulatory change in terms of reporting criteria. This change took place on January 1, 2017. The 2016 ratio has been restated due to this change.
- (k) A grade crossing accident is defined as any impact between on-track railway equipment and a highway user at a highway-rail grade crossing. Highway-rail grade crossing means: (1) a location where a public highway, road, street or private roadway, including associated sidewalks, crosses one or more railway tracks at grade; or (2) a location where a pathway explicitly authorized by a public authority or a railway carrier (dedicated for the use of non-vehicular traffic, including pedestrians, bicyclists and others), not associated with a public highway, road, street or private roadway, crosses one or more railway tracks at grade.
- (l) Incidents involving train and road vehicle collisions that result in a fatality.
- (m) Incidents involving train and vehicle collisions that result in an injury.
- (n) Train-related accidents involving the release of hazardous materials are defined as incidents involving the release of hazardous materials (U.S.) or dangerous goods (Canada), from a means of containment during transportation by train, that are required to be reported to regulatory or governmental agencies.
- (o) Non-accidental releases are defined as an unintentional release of a hazardous material or dangerous good from a means of containment during transportation. These events do not involve a train-related accident and can result from equipment failure or improperly secured materials.
- (p) Significant spill events include reported incidents where a hazardous material has been released in excess of local regulatory reporting thresholds. Spills include events involving an accidental release, spill, leak, including those resulting from a derailment or yard/mainline incident, or result from the failure of means of containment.
- (q) Number of Recommended Violation Defects resulting from the U.S. Federal Railroad Administration (FRA) or state inspections or audits.
- (r) The Frequency of internal railway integrity inspections is calculated as the number of weekly inspections multiplied by the miles of track on which they took place, divided by the total main track miles.



Our Reporting

Data Tables

- About CN
- Environment
- Safety
- People
- Community and Economy

GRI Index

SASB Index

Our Sustainability Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
PEOPLE							
TOTAL EMPLOYEES							
Total number of full-time employees (end of year) <sup>(a)</sup>	Total number	25,975	25,720	23,945	22,249	102-7	000.E
CN employees <sup>(b)</sup>	Total number	23,565	24,364	22,800	21,173	102-7	–
CN employees with fixed-term contract	Total number	56	110	98	66	102-8	–
CN wholly-owned subsidiary employees	Total number	2,354	1,246	1,047	1,010	102-8	–
Total number of part-time employees <sup>(c)</sup>	Total number	0	0	0	0	102-8	–
EMPLOYEES BY REGION AND GENDER							
Canada	Total number	16,717	17,040	15,800	14,692	102-8	–
U.S.	Total number	6,848	7,324	7,000	6,481	102-8	–
Female	Total number	1,990	2,108	2,071	1,904	102-8	–
Male	Total number	21,575	22,256	20,729	19,269	102-8	–
EMPLOYEES BY CONTRACT <sup>(c)</sup>							
Permanent contract	Total number	23,509	24,254	22,702	21,107	102-8	–
Female	Total number	1,968	2,053	1,978	1,876	102-8	–
Male	Total number	21,541	22,201	20,724	19,231	102-8	–
Fixed-term contract	Total number	56	110	98	66	102-8	–
Female	Total number	22	55	93	28	102-8	–
Male	Total number	34	55	5	38	102-8	–
COLLECTIVE BARGAINING AGREEMENTS							
% of CN employees covered by collective bargaining agreements	% of total employees	80%	80%	79%	79%	102-41	–
NEW EMPLOYEE HIRES							
Application pool (via CN website)	Total number	142,764	175,808	156,668	80,893	–	–
Total new employee hires	Total number	2,605	4,604	3,404	735	401-1	–
New employee hire rate	% of total employees	10%	18%	14%	3%	401-1	–
Age group							
New employee hires below 30 years old	Total number of new employee hires	1,279	2,179	1,605	352	401-1	–
% of new employee hires below 30 years old	% of total new employee hires	49%	47%	47%	48%	401-1	–
New employee hires 30–50 years old	Total number of new employee hires	1,208	2,201	1,616	349	401-1	–
% of new employee hires 30–50 years old	% of total new employee hires	46%	48%	47%	47%	401-1	–
New employee hires above 50 years old	Total number of new employee hires	118	224	183	34	401-1	–
% of new employee hires above 50 years old	% of total new employee hires	5%	5%	5%	5%	401-1	–
Gender							
Female	Total number of new employee hires	237	386	307	130	401-1	–
% of new employee hires – female	% of total new employee hires	9%	8%	9%	18%	401-1	–
Male	Total number of new employee hires	2,368	4,218	3,097	605	401-1	–
% of new employee hires – male	% of total new employee hires	91%	92%	91%	82%	401-1	–





Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
PEOPLE							
Region							
Canada	Total number of new employee hires	2,060	3,497	2,472	552	401-1	–
% of new employee hires in Canada	% of total new employee hires	79%	76%	73%	75%	401-1	–
U.S.	Total number of new employee hires	545	1,107	932	183	401-1	–
% of new employee hires in the U.S.	% of total new employee hires	21%	24%	27%	25%	401-1	–
EMPLOYEE TURNOVER <sup>(d)</sup>							
Total employee turnover number	Total number	2,513	2,744	2,031	1,903	401-1	–
% of total employee turnover rate	% of total employee turnover number	10.7%	11.3%	8.9%	9.0%	401-1	–
Total voluntary employee turnover number	Total number	867	976	749	623	401-1	–
% of total voluntary employee turnover rate	% of total voluntary employee turnover number	3.7%	4.0%	3.3%	2.9%	401-1	–
Age group							
Employee turnover below 30 years old	Total number	586	630	420	309	401-1	–
% of employee turnover below 30 years old	% of total employee turnover number	2.5%	2.6%	1.8%	1.5%	401-1	–
Employee turnover 30–50 years old	Total number	1,097	1,102	713	589	401-1	–
% of employee turnover 30–50 years old	% of total employee turnover number	4.7%	4.5%	3.1%	2.8%	401-1	–
Employee turnover above 50 years old	Total number	830	1,012	898	1,005	401-1	–
% of employee turnover above 50 years old	% of total employee turnover number	3.5%	4.2%	3.9%	4.7%	401-1	–
Gender							
Employee turnover – women	Total number	306	320	178	165	401-1	–
% of employee turnover – women	% of total employee turnover number	1.3%	1.3%	0.8%	0.8%	401-1	–
Employee turnover – men	Total number	2,207	2,424	1,853	1,738	401-1	–
% of employee turnover – men	% of total employee turnover number	9.4%	9.9%	8.1%	8.2%	401-1	–
Region							
Employee turnover – Canada	Total number	1,832	2,035	1,561	1,401	401-1	–
% of employee turnover in Canada	% of total employee turnover number	7.8%	8.4%	6.8%	6.6%	401-1	–
Employee turnover – U.S.	Total number	681	709	470	502	401-1	–
% of employee turnover in the U.S.	% of total employee turnover number	2.9%	2.9%	2.1%	2.4%	401-1	–
ABSENTEEISM RATES <sup>(e)</sup>							
Female	% of absentee hours on actual hours of service	2.93	2.53	2.36	2.43	403-2	–
Male	% of absentee hours on actual hours of service	2.08	1.84	1.60	1.51	403-2	–
Canada	% of absentee hours on actual hours of service	2.50	2.15	2.00	1.86	403-2	–
U.S.	% of absentee hours on actual hours of service	1.34	1.36	1.03	1.05	403-2	–
TRAINING AND EDUCATION <sup>(f)</sup>							
Total hours of training	Total number of hours	1,151,451	1,881,592	1,333,406	711,396	–	–
Average training hours							
Employee	Average hours	47.4	77.2	58.5	33.6	404-1	–
Female	Average hours	38.1	41.7	34.3	21.2	404-1	–
Male	Average hours	48.3	80.3	60.3	34.8	404-1	–



Our Reporting

Data Tables

- About CN
- Environment
- Safety
- People
- Community and Economy

GRI Index

SASB Index

Our Sustainability Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
PEOPLE							
Average training hours (cont.)							
Management	Average hours	25.8	33.7	25.9	36.9	404-1	–
Unionized	Average hours	53.6	88.1	66.6	32.7	404-1	–
REGULAR PERFORMANCE AND CAREER DEVELOPMENT REVIEW							
% of total management receiving reviews	% of management	94%	99%	95%	96%	404-3	–
EMPLOYEE ENGAGEMENT							
Employee engagement	% of actively engaged employees	68%	76%	76%	N/A	–	–
Data coverage <sup>(g)</sup>	% of total employees	90%	18%	19%	N/A	–	–
DIVERSITY AND EQUAL OPPORTUNITY							
Females	% of total employees	8%	9%	9%	9%	405-1	–
Females in revenue-generating functions <sup>(h)</sup>	% in management positions	34%	31%	N/A	N/A	–	–
Diversity in Canada <sup>(i)</sup>	% of total employees	18.4%	17.3%	16.0%	14.7%	405-1	–
Women	% of total employees	9.8%	10.1%	10.8%	10.4%	405-1	–
Aboriginals <sup>(k)</sup>	% of total employees	4.7%	4.7%	4.4%	3.9%	405-1	–
Persons with disabilities <sup>(l)</sup>	% of total employees	1.7%	1.5%	1.3%	1.5%	405-1	–
Visible minorities <sup>(m)</sup>	% of total employees	12.0%	11.1%	10.3%	9.3%	405-1	–
Diversity in the U.S. <sup>(p)</sup>	% of total employees	20.0%	19.0%	18.0%	17.0%	405-1	–
Women	% of total employees	5.4%	5.5%	5.8%	6.0%	405-1	–
Persons with disabilities <sup>(l)</sup>	% of total employees	0.4%	0.2%	0.2%	0.2%	405-1	–
Visible minorities <sup>(m)</sup>	% of total employees	19.8%	19.8%	18.8%	17.6%	405-1	–
Age group							
% over 50 years old	% of total employees	20%	23%	26%	30%	405-1	–
% 30–50 years old	% of total employees	60%	59%	54%	55%	405-1	–
% below 30 years old	% of total employees	19%	18%	20%	15%	405-1	–
Governance bodies							
Board of Directors	Total number	13	13	13	11	405-1	–
% of females	% of total Board	38%	38%	38%	27%	405-1	–
% over 50 years old	% of total Board	92%	92%	100%	100%	405-1	–
Employee categories							
C-suite	Total number of C-suite	6	N/A	N/A	N/A	405-1	–
% of females	% of C-suite	33%	N/A	N/A	N/A	405-1	–
Executive committee <sup>(n)</sup>	Total number of executive committee	29	N/A	N/A	N/A	405-1	–
% of females	% of executive committee	21%	N/A	N/A	N/A	405-1	–
Senior management	Total number of senior management	193	202	208	193	405-1	–
% of females	% of senior management	19%	13%	16%	15%	405-1	–
% over 50 years old	% of senior management	48%	55%	57%	60%	405-1	–
% 30–50 years old	% of senior management	52%	45%	43%	40%	405-1	–
% diversity in Canada <sup>(i)</sup>	% of senior management	11%	9%	5%	6%	405-1	–
% diversity in the U.S. <sup>(p)</sup>	% of senior management	5%	9%	4%	7%	405-1	–



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
PEOPLE							
Management	Total number of management	4,456	4,654	4,618	4,351	405-1	–
% of females	% of management	23%	23%	24%	24%	405-1	–
% over 50 years old	% of management	23%	26%	30%	31%	405-1	–
% 30–50 years old	% of management	68%	66%	61%	62%	405-1	–
% below 30 years old	% of management	10%	8%	9%	7%	405-1	–
% diversity in Canada <sup>(i)</sup>	% of management	21%	21%	19%	18%	405-1	–
% diversity in the U.S. <sup>(j)</sup>	% of management	22%	20%	20%	17%	405-1	–
Junior management <sup>(o)</sup>	Total number of junior management	3,277	3,489	3,439	3,283	405-1	–
% of females	% of junior management	22%	22%	22%	23%	405-1	–
Non-management	Total number of non-management	18,916	19,508	17,974	16,629	405-1	–
% of females	% of non-management	5%	5%	5%	5%	405-1	–
% over 50 years old	% of non-management	19%	22%	24%	30%	405-1	–
% 30–50 years old	% of non-management	58%	58%	53%	52%	405-1	–
% below 30 years old	% of non-management	22%	20%	23%	18%	405-1	–
% diversity in Canada <sup>(i)</sup>	% of non-management	18%	17%	15%	14%	405-1	–
% diversity in the U.S. <sup>(j)</sup>	% of non-management	20%	19%	18%	17%	405-1	–
EQUAL REMUNERATION FOR WOMEN AND MEN <sup>(p)</sup>							
Senior management	Ratio of women to men	1.0	0.9	1.0	0.9	405-2	–
Management	Ratio of women to men	1.0	1.0	1.0	1.0	405-2	–
Non-management	Ratio of women to men	0.9	1.0	0.9	0.9	405-2	–

(a) The total number of employees (year end) for each year is from the CN Annual Report of the equivalent year.

(b) The breakdown of employee data covers CN employees only. The breakdown of employee data is not available for employees with fixed-term contracts or for CN wholly-owned subsidiaries.

(c) As defined by national laws.

(d) Employee turnover is the number of employees who leave the organization voluntarily or due to dismissal, retirement, or death in service.

(e) The absenteeism rate is the number of casual actual absentee hours of our unionized employees expressed as a percentage of the actual number of hours an employee was available to work during a given year (hours of service). Hours of service are reduced for any prolonged absences, lost time days etc. The absenteeism rate does not include any known prolonged absences (i.e., sick leave, extended injury leaves) or absences related to holidays, study, maternity or paternity leave, and compassionate leave.

(f) The decrease of training hours in 2019 is due to a lower level of hiring and workforce reductions.

(g) The data coverage refers to the percentage of employees who participated in the employee engagement survey out of the total number of employees. In 2019, all our management and non-management employees participated in the survey, whereas in the years 2018 and 2017 only our management employees participated.

(h) Females in management positions in revenue-generating functions as a % of all such managers.

(i) The diversity % for Canada includes the following minority groups: visible minorities, persons with disabilities and Aboriginals.

(j) The diversity % for U.S. includes the group called Minority.

(k) Aboriginal is defined as all First Nations, Inuit, Métis and North American Indian peoples. These metrics are not tracked in the U.S.

(l) Persons with disabilities defines individuals who have a long-term or recurring physical, mental, sensory, psychiatric or learning impairment and who (a) consider themselves to be disadvantaged in employment by reason of that impairment, or (b) believe that an employer or potential employer is likely to consider them to be disadvantaged in employment by reason of that impairment, and includes persons whose functional limitations owing to their impairment have been accommodated in their current job or workplace.

(m) Visible minorities defines persons, other than Aboriginal, who are non-Caucasian in race or non-white in colour. Categories in the visible minorities variable include South Asian, Chinese, Black, Filipino, Latin American, Arab, Southeast Asian, West Asian, Korean, Japanese, visible minorities not included elsewhere, multiple visible minorities and not a visible minority.

(n) The executive committee refers to positions with a reporting line two levels away from the CEO.

(o) Junior management refers to positions as first-line managers and junior managers.

(p) The ratio is based on basic salary in North America. Significant location represents our operations in Canada and the U.S. The numbers for the year 2016 were restated due to a modification in the methodology to better reflect salary ratio within each employee category.



Our Reporting

Data Tables

About CN

Environment

Safety

People

Community  
and Economy

GRI Index

SASB Index

Our Sustainability  
Commitment

Data	Measurement	2019	2018	2017	2016	GRI	SASB
COMMUNITY AND ECONOMY							
ECONOMIC PERFORMANCE							
Direct economic value generated (revenues)	\$ million	14,917	14,321	13,041	12,037	201-1	–
Economic value distributed	\$ million	11,704	10,950	9,765	8,835	201-1	–
Operating costs	\$ million	9,324	8,828	7,798	7,005	201-1	–
Labour and fringe benefits	\$ million	2,922	2,860	2,536	2,399	201-1	–
Purchased services, materials and fuel	\$ million	3,904	3,703	3,131	2,643	201-1	–
Other <sup>(a)</sup>	\$ million	2,498	2,265	2,131	1,963	201-1	–
Payments to providers of capital – dividends	\$ million	1,544	1,333	1,239	1,159	201-1	–
Payments to governments	\$ million	822	776	712	653	201-1	–
Payments to Canadian tax authorities	\$ million	794	831	657	728	201-1	–
Payments to U.S. tax authorities	\$ million	28	(55)	55	(75)	201-1	–
Community investment <sup>(b)</sup>	\$ million	14.0	12.9	15.5	18.2	201-1	–
Economic value retained	\$ million	3,213	3,371	3,276	3,202	201-1	–
Cost of employee volunteering during paid work hours	\$ million	0.26	0.28	0.27	N/A	–	–
Cost of management overheads for community investment programs <sup>(c)</sup>	\$ million	0.85	1.05	1.05	N/A	–	–
Critical suppliers <sup>(d)</sup>	Number	59	59	59	62	–	–
Critical suppliers screened on environmental, social and governance issues <sup>(e)</sup>	%	39%	69%	69%	69%	308-1 414-1	–

(a) Other expenses include depreciation and amortization, equipment rents, and casualty and other.

(b) Community investment includes sponsorships, donations and activation fees as well as contributions through the CN Railroaders in the Community program.

(c) The calculated cost of management overheads for community investment programs includes salaries and benefits.

(d) Critical supplier is defined as critical component supplier, non-substitutable supplier, or supplier with greater than \$2M of spending per year.

(e) The percentage represents the number of our critical suppliers that have been screened on environmental, social and governance issues. It includes new suppliers that fall into the critical supplier category.



- GRI 101: Foundation
- GRI 102: General Disclosures
- GRI 103: Management Approach
- GRI 200: Economic Standard Series
- GRI 300: Environmental Standard Series
- GRI 400: Social Standard Series

# GRI Index

The following Global Reporting Initiative Index has been developed in accordance with the GRI Standards: Core option. The Index provides references to relevant information presented in the 2018 Sustainability Report, as well as other corporate disclosures such as the Annual Report to Shareholders and other regulatory or voluntary reports.

GRI Disclosure		Response / Location, Page and URL
GRI 101: FOUNDATION		Does not include any disclosures.
GRI 102: GENERAL DISCLOSURES		
ORGANIZATIONAL PROFILE		
102-1	Name of the organization	<a href="#">2018 Sustainability Report</a> , p. 65
102-2	Activities, brands, products, and services	<a href="#">2018 Sustainability Report</a> , p. 6
102-3	Location of headquarters	<a href="#">2018 Sustainability Report</a> , p. 65
102-4	Location of operations	<a href="#">2018 Sustainability Report</a> , p. 6 <a href="#">2019 Investor Fact Book</a> , Operations, pp. 80–87
102-5	Ownership and legal form	<a href="#">2018 Sustainability Report</a> , p. 65
102-6	Markets served	<a href="#">2018 Sustainability Report</a> , p. 6 <a href="#">2019 Investor Fact Book</a> , Markets, pp. 22–79
102-7	Scale of the organization	<a href="#">2018 Sustainability Report</a> , p. 6 <a href="#">2019 Investor Fact Book</a> , Our Strengths and Competitive Advantages, pp. 2–3
102-8	Information on employees and other workers	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 9
102-9	Supply chain	<a href="#">2018 Sustainability Report</a> , p. 6; <a href="#">2019 Investor Fact Book</a> , p. 6, pp. 24–25
102-10	Significant changes to the organization and its supply chain	<a href="#">2019 Annual Information Form</a> , General Development of the Business, pp. 3–11
102-11	Precautionary principle or approach	<a href="#">2020 Management Information Circular</a> , Risk Management Oversight, p. 24
102-12	External initiatives	<a href="#">2018 Sustainability Report</a> , p. 53
102-13	Membership of associations	<a href="#">2018 Sustainability Report</a> , Awards and Recognitions, p. 4 <a href="#">2019 Carbon Disclosure Project Response</a> , p. 56
STRATEGY		
102-14	Statement from senior decision maker	<a href="#">2018 Sustainability Report</a> , pp. 1, 5
ETHICS AND INTEGRITY		
102-16	Values, principles, standards and norms of behaviour	<a href="#">2018 Sustainability Report</a> , pp. 57–58
102-17	Mechanisms for advice and concerns about ethics	<a href="#">2018 Sustainability Report</a> , p. 58
GOVERNANCE		
102-18	Governance structure	<a href="#">2018 Sustainability Report</a> , pp. 16, 57, 61
102-19	Delegating authority	<a href="#">2018 Sustainability Report</a> , pp. 16, 57, 61
102-20	Executive-level responsibility for economic, environmental and social topics	<a href="#">2018 Sustainability Report</a> , pp. 16, 57, 61
102-21	Consulting stakeholders on economic, environmental and social topics	<a href="#">2018 Sustainability Report</a> , pp. 47–48, 53–55



Our Reporting

Data Tables

GRI Index

GRI 101:  
Foundation

**GRI 102:**  
General Disclosures

**GRI 103:**  
Management Approach

GRI 200:  
Economic  
Standard Series

GRI 300:  
Environmental  
Standard Series

GRI 400:  
Social Standard Series

SASB Index

Our Sustainability  
Commitment

GRI Disclosure		Response / Location, Page and URL
102-22	Composition of the highest governance body and its committees	<a href="#">2018 Sustainability Report</a> , p. 57 <a href="#">2020 Management Information Circular</a> , pp. 23–24
102-23	Chair of the highest governance body	<a href="#">2020 Management Information Circular</a> , p. 23
102-24	Nominating and selecting the highest governance body	<a href="#">2020 Management Information Circular</a> , pp. 26–30
102-25	Conflicts of interest	<a href="#">2020 Management Information Circular</a> , Common Directorships, p. 30
102-28	Evaluating the highest governance body’s performance	<a href="#">2020 Management Information Circular</a> , Board Performance Assessment Process, p. 30
102-30	Effectiveness of risk management processes	<a href="#">2020 Management Information Circular</a> , Risk Management Oversight, p. 24
102-33	Communicating critical concerns	<a href="#">2018 Sustainability Report</a> , pp. 55, 58; <a href="#">CN Code of Conduct</a> , pp. 79–83
102-35	Remuneration policies	<a href="#">2020 Management Information Circular</a> , Board of Directors Compensation, pp. 17–20 and Statement of Executive Compensation, pp. 34–35; <a href="#">2018 Sustainability Report</a> , p. 61
102-36	Process for determining remuneration	<a href="#">2020 Management Information Circular</a> , Board of Directors Compensation, pp. 17–20 and Statement of Executive Compensation, pp. 34–35
STAKEHOLDER ENGAGEMENT		
102-40	List of stakeholder groups	<a href="#">2018 Sustainability Report</a> , p. 53
102-41	Collective bargaining agreements	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 9
102-42	Identifying and selecting stakeholders	<a href="#">2018 Sustainability Report</a> , pp. 53, 64
102-43	Approach to stakeholder engagement	<a href="#">2018 Sustainability Report</a> , pp. 53, 64
102-44	Key topics and concerns raised	<a href="#">2020 CN in Your Community</a> , p. 71
REPORTING PRACTICE		
102-45	Entities included in the consolidated financial statements	<a href="#">2019 Annual Information Form</a> , Subsidiaries, p. 2
102-46	Defining report content and topic boundaries	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 64
102-47	List of material topics	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 2; <a href="#">2018 Sustainability Report</a> , p. 64
102-48	Restatements of information	There are no material restatements within the report.
102-49	Changes in reporting	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 64
102-50	Reporting period	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 64
102-51	Date of most recent report	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 64
102-52	Reporting cycle	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 64
102-53	Contact point for questions regarding the report	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1; <a href="#">2018 Sustainability Report</a> , p. 65
102-54	Claims of reporting in accordance with the GRI Standards	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1
102-55	GRI content index	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 14
102-56	External assurance	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 1
GRI 103: MANAGEMENT APPROACH 2016		
103-1	Explanation of the material topic and its boundary	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 2
103-2	The management approach and its components	<a href="#">2018 Sustainability Report</a> , pp. 13, 29, 39, 47, 57
103-3	Evaluation of the management approach	<a href="#">2018 Sustainability Report</a> , pp. 13, 29, 39, 47, 57



Our Reporting

Data Tables

GRI Index

- GRI 101:  
Foundation
- GRI 102:  
General Disclosures
- GRI 103:  
Management Approach
- GRI 200:  
Economic  
Standard Series**
- GRI 300:  
Environmental  
Standard Series**
- GRI 400:  
Social Standard Series

SASB Index

Our Sustainability  
Commitment

GRI Disclosure

Response / Location, Page and URL

GRI 200: ECONOMIC STANDARD SERIES 2016

ECONOMIC PERFORMANCE

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 47–50
201-1	Direct economic value generated and distributed	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 13
201-2	Financial implications and other risks and opportunities due to climate change	<a href="#">2019 Carbon Disclosure Project Response</a> , Risks and Opportunities, pp. 9–19
201-3	Defined benefit plan obligations and other retirement plans	<a href="#">2019 Annual Report</a> , Pensions and Other Postretirement Benefits, pp. 84–91
201-4	Financial assistance received from government	CN does not obtain financial assistance from governments.

PROCUREMENT PRACTICES

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 47–50, 59
204-1	Proportion of spending on local suppliers	<a href="#">2018 Sustainability Report</a> , pp. 6, 49

GRI 300: ENVIRONMENTAL STANDARD SERIES 2016

ENERGY

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 13–18
302-1	Energy consumption within the organization	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
302-3	Energy intensity	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 5

BIODIVERSITY

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 13, 24
304-2	Significant impacts of activities, products, and services on biodiversity	<a href="#">2018 Sustainability Report</a> , pp. 24–27

EMISSIONS

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 13–18
305-1	Direct (Scope 1) GHG emissions	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
305-2	Energy indirect (Scope 2) GHG emissions	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
305-3	Other indirect (Scope 3) GHG emissions	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
305-4	GHG emission intensity	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
305-7	Nitrous oxides (NO <sub>x</sub> ), sulphur oxides (SO <sub>x</sub> ) and other significant air emissions	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 5

EFFLUENTS AND WASTE

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 13, 20–23
306-2	Waste by type and disposal method	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , pp. 5–6

SUPPLIER ENVIRONMENTAL ASSESSMENTS

103	Management approach	<a href="#">2018 Sustainability Report</a> , pp. 13, 20
308-1	New suppliers screened using environmental criteria	<a href="#">2018 Data Supplement / GRI Index</a> , p. 10





Our Reporting

Data Tables

GRI Index

- GRI 101: Foundation
- GRI 102: General Disclosures
- GRI 103: Management Approach
- GRI 200: Economic Standard Series
- GRI 300: Environmental Standard Series
- GRI 400: Social Standard Series**

SASB Index

Our Sustainability Commitment

GRI Disclosure		Response / Location, Page and URL
GRI 400: SOCIAL STANDARD SERIES 2016		
EMPLOYMENT		
103	Management approach	2018 Sustainability Report, p. 39
401-1	New employee hires and employee turnover	2019 Data Supplement / GRI and SASB Index, pp. 9–10
LABOUR–MANAGEMENT RELATIONS		
103	Management approach	2018 Sustainability Report, pp. 44, 59
402-1	Minimum notice periods regarding operational changes	In compliance with laws and regulations.
OCCUPATIONAL HEALTH AND SAFETY		
103	Management approach	2018 Sustainability Report, pp. 29–30
403-1	Workers’ representation in formal joint management–worker health and safety committees	2019 Data Supplement / GRI and SASB Index, p. 7
403-2	Types of injury and rates of injury, occupational diseases, lost days and absenteeism, and number of work-related fatalities	2019 Data Supplement / GRI and SASB Index, p. 7
TRAINING AND EDUCATION		
103	Management approach	2018 Sustainability Report, pp. 39, 42–43
404-1	Average hours of training per year per employee	2019 Data Supplement / GRI and SASB Index, pp. 10–11
404-2	Programs for upgrading employee skills and transition assistance program	2018 Sustainability Report, pp. 39, 42–43
404-3	Percentage of employees receiving regular performance and career development reviews	2019 Data Supplement / GRI and SASB Index, p. 11
DIVERSITY AND EQUAL OPPORTUNITY		
103	Management approach	2018 Sustainability Report, pp. 39–41
405-1	Diversity of governance bodies and employees	2019 Data Supplement / GRI and SASB Index, pp. 11–12
405-2	Ratio of basic salary and remuneration of women to men	2019 Data Supplement / GRI and SASB Index, p. 12
SUPPLIER SOCIAL ASSESSMENT		
103	Management approach	2018 Sustainability Report, pp. 58–59
414-1	New suppliers screened using social criteria	2018 Data Supplement / GRI Index, p. 10
PUBLIC POLICY		
103	Management approach	CN Website, Political Contributions and Activities
415-1	Political contributions	CN Website, Political Contributions and Activities



Our Reporting

Data Tables

GRI Index

SASB Index

Our Sustainability  
Commitment

# SASB Index

The following Sustainability Accounting Standards Board (SASB) Index has been developed in accordance with the Rail Transportation Segment (TR-RA). The Index provides references to relevant information presented in the 2019 Data Supplement / GRI and SASB Index and other regulatory or voluntary reports.

SASB Disclosure		Response / Location, Page and URL
DISCLOSURE TOPICS AND ACCOUNTING METRICS		
GREENHOUSE GAS EMISSIONS		
110a.1	Gross global Scope 1 emissions	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 4
110a.2	Discussion of long-term and short-term strategy or plan to manage Scope 1 emissions, emissions reduction targets and an analysis of performance against those targets	<a href="#">2018 Sustainability Report</a> , pp. 13–18
110a.3	Total fuel consumed, percentage renewable	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 5 <a href="#">2019 Carbon Disclosure Project Response</a> , p. 46
AIR QUALITY		
120a.1	Air emissions of (1) NO <sub>x</sub> (excluding N <sub>2</sub> O) and (2) particulate matter (PM10)	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 5
EMPLOYEE HEALTH AND SAFETY		
320a.1	(1) Total recordable incident rate (TRIR), (2) fatality rate, and (3) near miss frequency rate (NMFR)	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 7 <a href="#">2018 Sustainability Report</a> , p. 29
COMPETITIVE BEHAVIOUR		
520a.1	Total amount of monetary losses as a result of legal proceedings associated with anticompetitive behavior regulations	CN was not subject to monetary losses as a result of legal proceedings associated with anticompetitive behaviour regulations in the years 2016 to 2019.
ACCIDENT AND SAFETY MANAGEMENT		
540a.1	Number of accidents and incidents	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , pp. 7–8
540a.2	Number of (1) accident releases and (2) nonaccident releases (NARs)	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 8
540a.3	Number of Federal Railroad Administration (FRA) Recommended Violation Defects	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 8
540a.4	Frequency of internal railway integrity inspections	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 8; <a href="#">2018 Sustainability Report</a> , p. 35
ACTIVITY METRICS		
000.A	Number of carloads transported	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 3; <a href="#">2019 Annual Report</a> , p. 1
000.B	Number of intermodal units transported	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 3; <a href="#">2019 Annual Report</a> , p. 1
000.C	Track miles	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 3; <a href="#">2019 Annual Report</a> , p. 1
000.D	Revenue ton miles (RTM)	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 3; <a href="#">2019 Annual Report</a> , p. 1
000.E	Number of employees	<a href="#">2019 Data Supplement / GRI and SASB Index</a> , p. 3; <a href="#">2019 Annual Report</a> , p. 1



# Our Sustainability Commitment

Delivering Responsibly is one of the pillars of What CN Stands For. It determines how we conduct our business every day and defines our contribution to building a more sustainable future. Five principles anchor our sustainability commitment:

## ENVIRONMENT

Conduct our operations with minimal environmental impact, while providing cleaner, more sustainable transportation services to our customers.

## SAFETY

Aim to be the safest railroad in North America by establishing an uncompromising safety culture.

## PEOPLE

Provide a safe, supportive and diverse work environment where our employees can grow to their full potential and be recognized for their contributions to our success.

## COMMUNITY

Build safer, stronger communities by investing in community development, creating positive socio-economic benefits and ensuring open lines of communication.

## GOVERNANCE

Continuously improve our culture of integrity and ethical business, building trust and confidence with all our stakeholders.

## STAY CONNECTED WITH CN:



[facebook.com/CNrail](https://facebook.com/CNrail)



[twitter.com/CNRailway](https://twitter.com/CNRailway)



[linkedin.com/company/cn](https://linkedin.com/company/cn)

PICTURED (COVER):  
YellowheadPass, BC  
Photo by CN Employee, Ron Worobec

[www.cn.ca](https://www.cn.ca)