Toxics Reduction Act Public Annual Report 2020

The legal and trade names of the owner and the operator of the facility, the street address of the facility and, if the mailing address of the facility is different from the street address, the mailing address.(See below)	Lake Shore Gold 3160 Florence Street Pocupine ON P0N 1C0
Facility NPRI identification number	11796
The identification number assigned to the facility by the Ministry of the Environment for the purposes of Ontario Regulation 127/01.	-
Number of full-time employees	339
North American Industry Classification System (NAICS) - 2, 4, and 6 digit codes	21 - Mining, quarrying, and oil and gas extraction 2122 - Metal ore mining 212220 - Gold and silver ore mining

If applicable, the name, position and telephone number of the individual who is the contact at the facility for the public:

Public Contact (if applicable)	Marcel Cardinal
Title	Manager of Environmental Affairs
Phone Number	(705) 269-4344 Ext. 4202

Address of each person below if not the same as the facility

Facility Name	Bell Creek Complex
Address 1	3160 Florence Street
City	Porcupine
Province	ON
Postal Code	P0N 1C0

UTM coordinates, Easting, Northing	Easting	486800	Northing	5377580
Datum				WGS84

Mailing address

Address 1	PO Box 1067
Address 2	
City	Timmins
Province	ON
Postal Code	P4N 7H9

Substance Accounting

Substance:	Ammonia
CAS Number:	NA - 16

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	BT	Mg
The amount of substance that was created:	BT	Mg
The amount of substance that was contained in product:	BT	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance Accounting

Substance:	Chromium (and its compounds)
CAS Number:	NA - 04

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance Accounting

Substance:	Cobalt (and its compounds)
CAS Number:	NA - 05

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Copper (and its compounds)
CAS Number:	NA - 06

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Cyanides (ionic)
CAS Number:	NA - 07

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Manganese (and its compounds)
CAS Number:	NA - 09

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Nickel (and its compounds)
CAS Number:	NA - 11

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance Accounting

Substance:	Nitric acid
CAS Number:	7697-37-2

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	BT	Mg
The amount of substance that was created:	BT	Mg
The amount of substance that was contained in product:	BT	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Vanadium
CAS Number:	NA - 40

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Zinc (and its compounds)
CAS Number:	NA - 14

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>10 - 100	Mg
The amount of substance that was created:	0.0000	Mg
The amount of substance that was contained in product:	0.0000	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Arsenic (and its compounds)
CAS Number:	NA - 02

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	kg
The amount of substance that was created:	0.0000	kg
The amount of substance that was contained in product:	0.0000	kg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Cadmium (and its compounds)
CAS Number:	NA - 03

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>10 - 100	kg
The amount of substance that was created:	0.0000	kg
The amount of substance that was contained in product:	0.0000	kg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance Accounting

Substance:	Lead (and its compounds)
CAS Number:	NA - 08

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	kg
The amount of substance that was created:	0.0000	kg
The amount of substance that was contained in product:	0.0000	kg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Selenium (and its compounds)
CAS Number:	NA - 12

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	kg
The amount of substance that was created:	0.0000	kg
The amount of substance that was contained in product:	0.0000	kg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Thallium
CAS Number:	NA - 37

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	>100 - 1000	kg
The amount of substance that was created:	0.0000	kg
The amount of substance that was contained in product:	0.0000	kg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Particulate Matter (TPM)
CAS Number:	NA - M08

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	0.0000	Mg
The amount of substance that was created:	>10 - 100	Mg
The amount of substance that was contained in product:	NA	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance:	Particulate Matter (10)
CAS Number:	NA - M09

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	0.0000	Mg
The amount of substance that was created:	>10 - 100	Mg
The amount of substance that was contained in product:	NA	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Substance Accounting

Substance:	Particulate Matter (2.5)
CAS Number:	NA - M10

On a facility-wide basis:	Amount	Units
Amount that entered the facility as the substance itself or as a constituent of another substance:	0.0000	Mg
The amount of substance that was created:	>1 - 10	Mg
The amount of substance that was contained in product:	NA	Mg

On-site releases from the facility to air, water and land, as well as on and off-site disposal and off-site recycling can be viewed by searching for this facility at http://www.ec.gc.ca/inrp-npri/default.asp?lang=en

Annual Progress Report - Calendar 2020

Substances for which toxic substance reduction plans have been prepared:

Substance	CASRN
Chromium (and its compounds)	NA - 04
Cobalt (and its compounds)	NA - 05
Copper (and its compounds)	NA - 06
Cyanides (ionic)	NA - 07
Manganese (and its compounds)	NA - 09
Nickel (and its compounds)	NA - 11
Nitric acid	7697-37-2
Vanadium	NA - 40
Zinc (and its compounds)	NA - 14
Arsenic (and its compounds)	NA - 02
Cadmium (and its compounds)	NA - 03
Lead (and its compounds)	NA - 08
Selenium (and its compounds)	NA - 12
Thallium	NA - 37
Particulate Matter (TPM)	NA - M08
Particulate Matter (10)	NA - M09
Particulate Matter (2.5)	NA - M10

Plan Objectives

Lake Shore Gold - Bell Creek Complex is committed to pollution prevention and protecting the environment. Whenever technically and economically feasible, the Lake Shore Gold - Bell Creek Complex is committed to reduce the use and/or creation of toxic substances identified under the plan in compliance with federal and provincial regulations. Lake Shore Gold – Bell Creek Complex is committed to achieving excellence in environmental practices with a goal to minimizing our environmental impact. This includes a proactive approach towards protecting public health and the natural environment through existing and planned environmental and sustainability initiatives. The Bell Creek Complex is dedicated to reducing its use and creation of toxic substances by continually striving for operational and process efficiency, innovation, and conservation.

Toxics Reduction Progress

Variations in the reported quantities have been observed in several categories including quantity used, contained in product, disposal, recycled and released to air, land and water. In all cases, variations are due to changes in overall production by the facility and material assays, specifically as they relate to the ore, waste rock and tailings processed by the Facility.

Plan Implementation Progress

There were no reduction options identified in any of the plans for the above noted substances that were identified as being both technically and economically feasibile. As such, there were no timelines presented in the reduction plans for the above noted substances. However, Lake Shore Gold will continue to explore and investiage potential reduction options as they arise as part of their sustainability program.

As there were no anticipated reductions noted in each of the plans for the toxic substances noted above, there were no reductions of any toxic substances during the reporting period that would be attributable to any reduction plan.

Comparison of Reported Amounts

Substance	CASRN	Report Year	Used	Created	In Product	Air	Water	Land	Disposal
Ammonia	NA - 16	2019	>0 - 1	>10 - 100	0.000	0.000	>10 - 100	0.000	0.000
		2020	BT	BT	BT	BT	BT	BT	BT
		Change	NA	NA	NA	NA	NA	NA	NA
		Change %	NA	NA	NA	NA	NA	NA	NA
Chromium (and its compounds)	NA - 04	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>10 - 100
		Change %	209.69%	0.00%	0.00%	710.55%	3.75%	30.28%	30.28%
Copper (and its compounds)	NA - 06	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		Change	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>0 - 1	>10 - 100
		Change %	-11.2%	0.0%	0.0%	3.5%	-59.7%	-14.5%	-14.5%
Cyanides (ionic)	NA - 07	2019	>100 - 1000	0.000	0.000	>1 - 10	>0 - 1	0.000	0.000
		2020	>100 - 1000	0.000	0.000	>1 - 10	>0 - 1	0.000	0.000
		Change	>1 - 10	0.000	0.000	>0 - 1	>0 - 1	0.000	0.000
		Change %	-2.2%	0.0%	0.0%	-2.2%	-21.9%	0.0%	0.0%
Manganese (and its compounds)	NA - 09	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>100 - 1000	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>100 - 1000	>100 - 1000
		Change	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		Change %	1.1%	0.0%	0.0%	-10.4%	-64.4%	-4.6%	-4.6%
Nickel (and its compounds)	NA - 11	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		Change	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>0 - 1	>10 - 100
		Change %	28.5%	0.0%	0.0%	120.3%	-18.3%	9.0%	9.0%
Nitric acid	7697-37-2	2019	>10 - 100	0.000	0.000	>0 - 1	0.000	0.000	0.000
		2020	BT	BT	BT	BT	BT	BT	BT
		Change	NA	NA	NA	NA	NA	NA	NA
		Change %	NA	NA	NA	NA	NA	NA	NA
Vanadium	7440-62-2	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		Change	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>0 - 1	>10 - 100
		Change %	-4.7%	0.0%	0.0%	0.0%	-55.7%	-5.6%	-5.6%
Zinc (and its compounds)	NA - 14	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		2020	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>0 - 1	>10 - 100
		Change %	-64.4%	0.0%	0.0%	-54.8%	-63.1%	-9.0%	-9.0%
Arsenic (and its compounds) (kg)	NA - 02	2019	>100 - 1000	0.000	0.000	>1 - 10	>10 - 100	>100 - 1000	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>1 - 10	>10 - 100	>100 - 1000	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>1 - 10	>100 - 1000	>100 - 1000
		Change %	-7.1%	0.0%	0.0%	-4.6%	-17.9%	-12.9%	-15.6%
Cadmium (and its compounds) (kg)	NA - 03	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		2020	>10 - 100	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>10 - 100
		Change %	-83.3%	0.0%	0.0%	-67.7%	-65.4%	-13.0%	-13.0%
Cobalt (and its compounds)	NA - 05	2019	>100 - 1000	0.000	0.000	>1 - 10	>10 - 100	>100 - 1000	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>1 - 10	>10 - 100	>100 - 1000	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>10 - 100	>100 - 1000	>100 - 1000
		Change %	-0.4%	0.0%	0.0%	4.6%	-45.6%	-5.9%	-5.9%
Lead (and its compounds) (kg)	NA - 08	2019	>100 - 1000	0.000	0.000	>100 - 1000	>0 - 1	>100 - 1000	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>100 - 1000	>0 - 1	>100 - 1000	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>1 - 10	>0 - 1	>100 - 1000	>100 - 1000
		Change %	-8.4%	0.0%	0.0%	-3.9%	-72.3%	-5.2%	-5.1%
Selenium (and its compounds) (kg)	NA - 12	2019	>100 - 1000	0.000	0.000	>0 - 1	>10 - 100	>100 - 1000	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>1 - 10	>100 - 1000	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>10 - 100	>10 - 100	>100 - 1000
		Change %	-44.8%	0.0%	0.0%	-44.3%	-65.4%	-20.2%	-20.2%
Thallium (kg)	NA - 23	2019	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		2020	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>10 - 100	>100 - 1000
		Change	>100 - 1000	0.000	0.000	>0 - 1	>0 - 1	>1 - 10	>10 - 100
		Change %	-39.6%	0.0%	0.0%	33.2%	-30.8%	9.7%	9.7%
Particulate Matter (TPM)	NA - M08	2019	0.000	>10 - 100	NA	>10 - 100	NA	NA	NA
		2020	0.000	>10 - 100	NA	>10 - 100	NA	NA	NA
		Change	0.000	>1 - 10	NA	>1 - 10	NA	NA	NA
		Change %	0.0%	-12.5%	NA	-12.5%	NA	NA	NA
Particulate Matter (10)	NA - M09	2019	0.000	>10 - 100	NA	>10 - 100	NA	NA	NA
		2020	0.000	>10 - 100	NA	>10 - 100	NA	NA	NA
		Change	0.000	>1 - 10	NA	>1 - 10	NA	NA	NA
		Change %	0.0%	-12.8%	NA	-12.8%	NA	NA	NA
Particulate Matter (2.5)	NA - M10	2019	0.000	>1 - 10	NA	>1 - 10	NA	NA	NA
		2020	0.000	>1 - 10	NA	>1 - 10	NA	NA	NA
		Change	0.000	>0 - 1	NA	>0 - 1	NA	NA	NA
		Change %	0.0%	-13.7%	NA	-13.7%	NA	NA	NA

Report Certification

As of April 1, 2021, I, Bill Shand, certify that I have read the reports on the toxic substance reduction plans for the toxic substances referred to below and am familiar with their contents, and to my knowledge the information contained in the reports is factually accurate and the reports comply with the Toxics Reduction Act, 2009 and Ontario Regulation 455/09 (General) made under that Act.

TRA Substance List

CAS RN	Substance Name
NA - 16	Ammonia
NA - 04	Chromium (and its compounds)
NA - 06	Copper (and its compounds)
NA - 07	Cyanides (ionic)
NA - 09	Manganese (and its compounds)
NA - 11	Nickel (and its compounds)
7697-37-2	Nitric Acid
7440-62-2	Vanadium
NA - 14	Zinc (and its compounds)
NA - 02	Arsenic (and its compounds)
NA - 03	Cadmium (and its compounds)
NA - 05	Cobalt (and its compounds)
NA - 08	Lead (and its compounds)
NA - 12	Selenium (and its compounds)
NA - 23	Thallium (and its compounds)
NA - M08	Particulate Matter ITPM)
NA - M09	Particulate Matter (PM10)
NA - M10	Particulate Matter (PM2.5)

The original version of this report is signed off by:

Highest Ranking Employee:	Bill Shand
Title:	General Manager Canadian Operations
Phone Number:	(705) 269-4344 Ext. 4313

I, the highest ranking employee, agree with the certification statement(s) above and acknowledge that by checking the box I am electronically signing the statement(s). I also acknowledge that by pressing the 'Submit Report(s)' button I am submitting the facility record(s)/report(s) for the identified facility to the Director under the Toxics Reduction Act, 2009. I also acknowledge that the Toxics Reduction Act, 2009 and Ontario Regulation 455/09 provide the authority to the Director under the Act to make certain information as specified in subsection 27(5) of Ontario Regulation 455/09 available to the public.