

Toxics Reduction Act – Public Summary Report – 2020 Reporting Year Ford Windsor Engine Plant

A. FACILITY INFORMATION

The Windsor Engine Plant machines and assembles engine components to produce complete automotive engine assemblies, including the 5.4L V8, the 6.8L V10 and the 7.8L V8 engines. The main facility processes consist of machining and assembly.

Address	1000 Henry Ford Center Drive	
	Windsor, Ontario	
	N9A 7E8	
Spatial Coordinates	335503 m E, 4687508 m N	
NPRI/MECP IDs	NPRI = 4781	
	MECP = 6401	
No. of Employees	1005	
Primary Operation	Engine Machining and Assembly Plant	
NAICS Code	33 – Manufacturing	
	3363 – Motor Vehicle Parts Manufacturing	
	336310 – Motor Vehicle Gasoline Engine and Engine	
	Parts Manufacturing	
Facility Contact	Mr. Cary Holt	
	Ford Motor Company	
	Environmental Quality Office	
	290 Town Center Drive	
	Suite 800	
	Dearborn, Michigan	
	48126	
	Phone: (313) 938-6055	
	Email: cholt2@ford.com	
Parent Company	Ford Motor Company of Canada, Limited	
	100 The Canadian Road	
	Oakville, Ontario	
	L6J 5E4	



B. TOXIC SUBSTANCE ACCOUNTING

Substances Reported	CAS#	Primary Use/Source		
NPRI Part 1 Substances				
Copper (and its compounds)	n/a	Machining/assembly		
Manganese (and its compounds)	n/a	Machining/assembly		
Nickel (and its compounds)	n/a	Machining/assembly		
Lead (and its compounds)	n/a	Machining/assembly		
NPRI Part 4 Substances	•			
Particulate Matter ≤ 10 micron (PM10)	n/a	Machining/assembly/fuel combustion/cooling towers		
Particulate Matter ≤ 2.5 micron (PM2.5)	n/a	Machining/assembly/fuel combustion/cooling towers		
NPRI Part 5 Substances				
Hydrotreated Light Distillate (Petroleum)	64742-47-8	Machining coolant		

Accounting Details

		Accountin	g Quantities		
Substance/Category	2019	2020	2020 Annual Comparison		Reason for Change
	(tonne)	(tonne)	(tonne)	(%)	
Copper (and its compo	ounds)				
Used	589.9	476.3	113.6	↓19%	Decrease in production levels due to COVID-19 Pandemic.
Created	0	0	0	0%	N/A
Contained in Product	546.5	445.8	100.8	↓18%	Decrease in production levels due to COVID-19 Pandemic.
Released to Air	0.095	0.034	0.060	↓64%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Water	0	0	0	0%	N/A



		Accountin	g Quantities		
Substance/Category	2019	2020	Annual Co	mparison	Reason for Change
	(tonne)	(tonne)	(tonne)	(%)	
Transfer for Disposal	0.005	0.005	0.000	0%	No significant change.
Transfer for Recycle	78.59	79.37	-0.780	†1%	No significant change.
Manganese (and its con	mpounds)				
Used	305.4	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Created	0	NR	NR	N/A	N/A
Contained in Product	238.9	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Air	0.014	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Water	0	NR	NR	N/A	N/A
Transfer for Disposal	0.016	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Transfer for Recycle	80.31	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Nickel (and its compou	ınds)				
Used	75.12	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Created	0	NR	NR	N/A	N/A
Contained in Product	67.56	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Air	0.0079	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Water	0	NR	NR	N/A	N/A
Transfer for Disposal	0.0006	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Transfer for Recycle	10.27	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.



		Accountir	ng Quantities	Reason for Change	
Substance/Category	2019	2020	Annual Comparison		
	(tonne)	(tonne)	(tonne)	(%)	
Lead (and its compoun	nds)				
Used	22.87	17.82	5.05	↓22%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Created	0	0	0	0%	N/A
Contained in Product	21.36	16.86	4.50	↓21%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Air (kg)	0.590	0.300	0.290	↓49%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Water (kg)	0	0	0	0%	N/A
Transfer for Disposal (kg)	0.850	0.780	0.070	↓8%	No significant change.
Transfer for Recycle (kg)	2,938	2,304	634.0	↓22%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Particulate Matter ≤ 10	0 micron (PM	10)			
Used	0	0	0	0%	N/A
Created	90.33	37.93	52.40	↓58%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Air	5.293	1.677	3.616	↓68%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Particulate Matter ≤ 2 .	.5 micron (PM	[2.5]			
Used	0	0	0	0%	N/A
Created	44.82	18.86	25.96	↓58%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Released to Air	4.540	1.421	3.119	↓69%	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.
Hydrotreated Light Di	istillate (Petro	leum)			
Used	49.01	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.



	Accounting Quantities				
Substance/Category	2019	2020	2020 Annual Comparison		Reason for Change
	(tonne)	(tonne)	(tonne)	(%)	
Created	0	NR	NR	N/A	N/A
Released to Air	4.956	NR	NR	N/A	Facility shutdown and decrease in production levels due to COVID-19 Pandemic.

Notes:

NR – Not Reported N/A – Not Applicable



C. TOXIC SUBSTANCE REDUCTION PLANNING

Objectives & Targets

Substance	Objectives & Targets	Reduction Option Progress
Copper (and its compounds)	Reduce the use of Copper (and its compounds) by implementing improved operating procedures and training efforts with a goal of improving department specific first time through numbers.	
Manganese (and its compounds)	Reduce the use of Manganese (and its compounds) by implementing improved operating procedures and training efforts with a goal of improving department specific first time through numbers.	All team leaders and process coaches participated in the Ford Production System
Nickel (and its compounds)	Reduce the use of Nickel (and its compounds) by implementing improved operating procedures and training efforts with a goal of improving department specific first time through numbers.	(FPS) training which included a review of all FPS elements (safety, quality, delivery, cost, people, maintenance and environment).
Lead (and its compounds) Lead (and its compounds) Reduce the use of Lead (and its compounds) implementing improved operating procedure training efforts with a goal of improving department specific first time through number		
Particulate Matter ≤ 10 micron (PM10)	Reduce the creation of Particulate Matter ≤ 10 micron by implementing improved operating procedures and training efforts with a goal of improving department specific first time through numbers.	See above.
Particulate Matter ≤ 2.5 micron (PM2.5)	Reduce the creation of Particulate Matter ≤ 2.5 micron by implementing improved operating procedures and training efforts with a goal of improving department specific first time through numbers.	See above.
Hydrotreated Light Distillate (Petroleum)	Reduce the use of Hydrotreated Light Distillate (HLD) by substituting the current product used, to one that contains less to no HLD.	No alternate products containing less HLD were used in 2020.



Annual Report Certification Statement

As of September 21, 2021, I certify that I have read the report(s) on the toxic substance reduction plan(s) for the toxic substances included above, and am familiar with its/their contents and to my knowledge the information contained in the report(s) is factually accurate and the report complies/reports comply with the Toxics Reduction Act, 2009 and Ontario Regulation 455/09 (General) made under the Act.

Thomas Reeber, Site Operations M	anager
(Digital signature on file)	