

POLLUTION: Take 4 Steps to Comply with NPRI Reporting Requirements



The *Canadian Environmental Protection Act, 1999* (CEPA) required the federal government to create the National Pollutant Release Inventory (NPRI), a publicly accessible inventory of releases of pollutants into the air, water and land and disposals and off-site transfers of designated substances for recycling. The government uses the information in the NPRI to identify pollution prevention priorities; support the assessment and risk management of chemicals and air quality modelling; and help develop targeted regulations for reducing releases of toxic substances and air pollutants. The law requires facilities covered by the requirements to report information about their releases each calendar year by June 1 of the following calendar year. Companies that fail to report, report late or knowingly submit false or misleading information could be fined. Here's a look at the NPRI and four steps to take to ensure that your company complies with the reporting requirements, if applicable.

NPRI BASICS

Sec. 48 of Part 3 of CEPA specifically requires the federal Minister of the Environment to 'establish a national inventory of releases of pollutants,' which is the NPRI. The specific NPRI reporting requirements for each calendar year change. The government publishes them in a notice in the *Canada Gazette*. The reporting requirements for the 2012 and 2013 reporting years were published on Dec. 29, 2012 (You can also download them as a PDF.).

The notice is divided into four parts or 'schedules':

Schedule #1: NPRI substances. Schedule #1 lists all substances and groups of substances included in the NPRI and is broken into five parts according to the type of substance and the reporting criteria:

- Part 1 is the largest group and includes over 200 core substances. It's further divided into Group A and Group B substances;
- Part 2 covers individual polycyclic aromatic hydrocarbons (PAHs);
- Part 3 covers dioxins/furans and hexachlorobenzene (HCB);
- Part 4 covers seven criteria air contaminants (CACs), such as carbon

monoxide and sulphur dioxide; and

- Part 5 covers selected volatile organic compounds (VOCs) with additional reporting requirements (speciated VOCs), such as benzene.

Schedule #2: definitions. This schedule includes the definitions of key terms, such as 'facility' and 'by-product.'

Schedule #3: reporting criteria. In Schedule #3, you'll find the general reporting criteria, including:

- Which facilities are generally subject to the reporting requirements and any exclusions;
- How some amounts should be calculated; and
- Who's required to submit a facility's report, i.e., the person who owned or operated the facility on Dec. 31 or if the facility's operations were terminated, the last owner or operator.

Schedule #3 also includes specific reporting criteria for all substances and groups of substances, broken down into five parts that each correspond to a group from Schedule 1. For example, Schedule #3, Part 5 contains the reporting criteria for substances listed in Schedule #1, Part 5.

Schedule #4: information that must be reported. Schedule #4 outlines the information that must be submitted by owners/operators whose facilities meet the reporting criteria and how that information must be reported. Covered facilities must provide information on:

- The facility, such as its name and address, contact information for the person submitting the report and NPRI identification number; and
- The various covered substances, specified by the part they're listed under in Schedule 1. For example, required information for substances in Part 1 is different than for those in Part 3.

TAKE FOUR STEPS

Because complying with the NPRI reporting requirements is complicated, the NPRI website provides guidance to help companies. But although the reporting requirements for 2012 were already published, the 2012 NPRI reporting tools and guidance haven't been released yet. However, according to the notice, there are no substantive changes to the reporting requirements for those years. Thus, you can still use the 2011 Guide to Reporting to the NPRI to start preparing your 2012 reports.

According to the 2011 guide and Environment Canada, companies should take the following four steps to ensure compliance with the reporting requirements:

[box]Step #1: Determine if Your Company's Facilities Are Required to Report[/box]

Not all facilities are required to report to the NPRI. So first determine if your company's facilities and activities are covered by the reporting requirements. In general, there are two classes of facilities that may have to report to the NPRI:

Those that meet the 'employee threshold.' If one or more NPRI substances was

manufactured, processed or otherwise used at a facility during the calendar year and the total number of hours worked there exceeded the so-called '20,000-hour employee threshold,' you'll need to determine the total amount of each NPRI substance at your facility during that year to see whether any of the reporting criteria were met, triggering the need to report. It takes about 10 full-time employees to meet the 20,000-hour threshold, which is based on the number of hours'including paid vacation and sick leave'worked by *all* workers at the facility during the calendar year, including:

- Individuals employed at the facility, such as full-time workers, students, part-time and term workers;
- Owner(s) who performed work on site at the facility; and
- Individuals, such as contractors, who performed work at the facility that's related to the facility's operations for the period of time that they performed that work.

The 20,000-hour employee threshold applies only to the reporting of substances in Parts 1A through 3 and not to the reporting of Part 4 and 5 substances. There are also certain facilities that are excluded from meeting the employee threshold because their activities, such as hazardous waste incineration, release significant quantities of NPRI substances into the environment.

Where specified activities take place. Regardless of the number of employees at your facility, you may need to report to the NPRI if any of the following activities took place at your facility during the year:

- Waste or sewage sludge incineration;
- Wood preservation;
- Fuel terminal operations;
- Municipal wastewater collection and/or treatment; or
- Pit or quarry operations.

Also, any facilities operating stationary combustion equipment must report for CACs (Part 4 of Schedule #1), regardless of employee hours, if the release thresholds and related requirements are met.

Note that certain facilities are exempt from the reporting requirements. For example, facilities used exclusively for oil and gas exploration or the drilling of oil and gas wells are exempt from all NPRI reporting requirements. In addition, a facility is exempt from reporting Parts 1A through 3 substances if the only source or use of such substances at the facility is from one or more of the following activities:

- Education or training of students, such as at universities, colleges and schools;
- Research or testing;
- Maintenance and repair of vehicles, such as automobiles, trucks, locomotives, ships or aircraft, except the painting and stripping of vehicles or their components or the rebuilding or re-manufacturing of vehicle components;
- Distribution, storage or retail sale of fuels, except as part of terminal operations;
- Wholesale or retail sale of articles or products that contain the substance, if the substance isn't released to the environment during the use at the facility;

- Retail sale of the substance;
- Growing, harvesting or management of renewable natural resources, such as fisheries, forestry or agriculture, except processing or otherwise using renewable natural resources;
- Mining related to pits and quarries; and
- The practice of dentistry.

Substance Specific Reporting Requirements

If your company's facilities do fall into one of the two general groups above, you'll then need to look at the reporting requirements for each group of substances to determine whether you must submit a report:

Part 1A substances. In general, the owner/operator of a facility must submit a report to the NPRI for a Part 1A substance only if the following criteria are met:

- The facility meets or is exempted from meeting the employee threshold;
- The facility manufactured, processed or otherwise used 10 tonnes (10,000 kg) or more of a Part 1A substance in the calendar year; and
- The **Part 1A** substance was manufactured, processed or otherwise used at a concentration greater than or equal to 1% by weight, except for by-products and mine tailings, which have no concentration threshold.

Examples of facilities that typically must report Part 1A substances include wastewater facilities; oil and gas facilities; chemical, plastic and paint manufacturers; manufacturers of wood products; and metal fabricators.

Part 1B substances. The owner/operator of a facility must generally submit a report to the NPRI for Part 1B substance if, during the calendar year:

- The facility meets or is exempted from meeting the employee threshold; and
- A Part 1B substance was manufactured, processed or otherwise used in quantities equal to or exceeding mass thresholds.

Examples of facilities that usually have to report Part 1B substances include wastewater facilities, wood preservation facilities, metal plating facilities, military bases, pulp and paper mills, power stations, cement and lime manufacturers, and hospitals.

Part 2 substances. You may need to report for Part 2 substances if:

- The facility meets or is exempted from meeting the employee threshold; and
- PAHs were incidentally manufactured or present in mine tailing, and were released, disposed of or transferred for recycling in a combined quantity of ≥ 50 kg.

Wood preservation facilities using creosote must report regardless of the mass threshold for PAHs and regardless of the number of hours worked by employees. Other examples of facilities that typically report Part 2 substances include pulp and paper mills, oil and gas facilities, cement manufacturers and power stations.

Part 3 substances. You must report for Part 3 substances if any of the following activities took place at your facility:

- Incineration;
- Chlorinated solvent production;
- Metal smelting;
- Power generation;
- Iron and steel manufacturing;
- Pulp and paper manufacturing;
- Titanium dioxide pigment production;
- Cement manufacturing;
- Magnesium production; and
- Wood preservation using pentachlorophenol.

Part 4 substances. All facilities are required to consider CACs released from stationary combustion equipment regardless of the number of employees at the facility. In addition, facilities that meet or exceed the 20,000-employee hour threshold or are excluded from it must consider all other sources of CACs at the facility. You may need to report for CACs if they were released into the air from your facility in quantities equal to or exceeding their release thresholds.

Examples of typical facilities that report Part 4 substances include facilities with boilers burning fuels or waste; oil and gas facilities; aluminium production and processing facilities; pulp and paper mills; bakeries; painting operations; printers; waste treatment facilities; mines, pits and quarries; and sawmills and wood products facilities.

Part 5 substances. You may need to report for Part 5 substances if your facility released VOCs into the air in a quantity of \geq one tonne and the 10 tonne air release threshold for VOCs (under Part 4) was met.

Insider Says: If you were required to submit a report for 2011, it's likely that you'll have to do so again for 2012 but not always. If your facility doesn't have to report its emissions 2012, you'll still have to submit an online report by June 1, 2013 stating that the facility doesn't meet the 2012 reporting criteria.

[box]Step #2: Collect Required Information[/box]

If you determine that a report is required for one or more of your company's facilities, the next step is to collect the information needed for the reports. For facilities whose emissions are already monitored under another environmental law, you should submit those measurements. If your emissions aren't monitored or measured under another environmental law, you must make reasonable efforts to gather information on releases, disposals and transfers of NPRI substances and calculate estimates of the quantity of a substance that's manufactured, processed or otherwise used and that's released, disposed of or transferred for recycling using one of the following methods:

- Continuous emission monitoring;
- Predictive emission monitoring;
- Source testing;
- Mass balance;
- Published emission factors;
- Site-specific emission factors; or
- Engineering estimates.

[box]Step #3: File Report with the NPRI[/box]

If you have to submit NPRI reports for any or all of the company's facilities, do so online through Environment Canada's Single Window System. The information you must report is divided into three categories:

Contact information. For each of the following, you must provide the name, position, mailing address, telephone number and email address:

- *Technical contact*: the person who prepared the report and will be able to answer any questions about its contents. All correspondence from Environment Canada regarding the NPRI will be sent to the technical contact if no coordinator is identified;
- *Public contact* (if any): the person responsible for answering any questions from the public about the report. This name will appear on the NPRI website as the contact for the facility. If a public contact isn't identified, the name of the coordinator or technical contact will appear instead;
- *Coordinator* (if any): the person who's responsible for preparing and submitting NPRI reports for more than one facility for the same company. Coordinators are responsible for answering any questions concerning all of the NPRI reports they filed. All NPRI correspondence from Environment Canada will be sent to the coordinator, if one's identified;
- *Certifying official*: the person who's legally responsible for the contents of the report. The certifying official is usually the owner or operator or a company official authorized to act on his/her behalf; and
- *Independent contractor* (if any): if an independent contractor prepared the report, its contact information must be provided, including the name of the contracting company.

Facility-related information. The facility-related information required includes:

- The company's legal and trade name, physical and mailing addresses, and DUNS and federal business numbers;
- For any Canadian parent companies, their legal and trade name, mailing address, DUNS number and federal numbers;
- The number of fulltime workers;
- The NPRI identification number;
- If the facility is portable or reporting for the first time, its latitude and longitude coordinates;
- 6-digit NAICS Canada code of the facility; and
- Pollution prevention plan information, including whether and why the plan was prepared, whether an existing plan was updated and whether the plan addressed substances, energy conservation or water conservation.

Substance-related information. The specific information that you must report for each group of NPRI substances varies. But in general, the report must include:

- The name of the substance and its Chemical Abstracts Service (CAS) number;
- The nature of its use;
- The quantities released onsite;
- The quarterly breakdown of onsite releases;
- The quantities disposed of;
- The quantities transferred off-site for recycling; and
- The anticipated releases, disposals and transfers for recycling over the next three years.

REPORTING CHECKLIST: Use this checklist when filling out your NPRI report to ensure that you provide the correct information and avoid common mistakes.

[box]Step #4: Keep the Information You Used[/box]

The facility's owner/operator is required to retain copies of all information on which the NPRI report is based, including any calculations, measurements and other related data, for three years. This information must be kept at the facility or at the principal place of business in Canada of the owner/operator of the facility to which the information relates.

BOTTOM LINE

For the 2011 reporting year, over 8,000 industrial, commercial and other facilities reported to the NPRI. So if you're required to report, you're in good company. The federal government considers the information contained in the NPRI to be vital to its efforts to reduce releases of substances that are of concern for environmental and health reasons. For example, the NPRI helps the government determine if regulatory or other action is necessary to reduce emissions of such substances. It also provides Canadians with annual information on releases of pollutants in their communities.