

Environmental Management Newsletter

Welcome to Pollutech's Environmental Management Newsletter. The newsletter focuses on new and proposed regulations that may affect your business operations as well as provide you with news briefs on various items of environmental concern.

(TRA) Ontario Toxics Reduction Act, (Ontario Regulation 455/09)

NOW IN EFFECT AS OF JANUARY 1st, 2010.

As of January 1st, 2010 regulated facilities in the manufacturing and minerals processing sectors are required to track, report, and prepare toxic reduction plans for the toxic substances that they use. The preparation of toxic substance reduction plans is mandatory; however implementation of the reduction plan is voluntary.

The TRA applies to facilities:

- with NAICS codes beginning with "31, 32, 33 and 212" digits,
- with a minimum of 20,000 employee hours worked in 2010,
- manufacture, process, or otherwise use any of the prescribed toxic substances in any amount that meets or exceeds the prescribed thresholds.

The O. Reg. 455/09 legislation can be viewed at <http://www.ene.gov.on.ca/en/toxics/OReg455-09.pdf> and/or: http://www.e-laws.gov.on.ca/html/regs/english/elaws_regs_090455_e.htm

Air Pollution - Local Air Quality, (Ontario Regulation 419/05)

NOW IN EFFECT AS OF FEBRUARY 1st, 2010.

Facilities that have a North American Industry Classification System (NAICS) Code listed in Schedule 4 below are required to use the approved advanced air dispersion model programs (AERMOD, ISCPRIME, ASHRAE, SCREEN3) for all new Certificates of Approvals (Air & Noise). Facilities that have an existing C of A and fall under Schedule 4 below are required to update their existing Emission Summary and Dispersion Model (ESDM) Report using one of the above approved dispersion models.

Schedule 4: Target Sectors for 2010	
NAICS Code	Sector Description
2122	Metal Ore Mining
221112	Fossil-Fuel Electric Power Generation
324110	Petroleum Refineries
3251	Basic Chemical Manufacturing
3252	Resin, Synthetic Rubber, and Artificial and Synthetic Fibres and Filaments Manufacturing
3311	Iron and Steel Mills and Ferro-Alloy Manufacturing
331410	Non-Ferrous Metal (Except Aluminum) Smelting and Refining
3315	Foundries

There is potential for facilities that are currently in compliance with Regulation 346 to exceed the new standards outlined in Regulation 419 using the updated dispersion models. For this reason, the MOE has permitted a phased-in approach for all industries, based on there facility NAICS code, to evaluate compliance using the new "approved" dispersion models (i.e. AERMOD) and, if necessary, request an "Alteration of Standards" if they are unable to meet the new regulatory point of impingement limits. The following schedule outlines when a facility can evaluate compliance using the updated dispersion models and request an "Alteration of Standard" if required:

- Schedule 4 Facilities – February 1, 2007 to October 31, 2008. – **Date Passed**
- **Schedule 5 Facilities – February 1, 2010 to October 31, 2011.**
- All other Facilities – February 1, 2013 – October 31, 2017.

Schedule 5: Target Sectors for 2013	
NAICS Code	Sector Description
3221	Pulp, Paper and Paperboard
324190	Other petroleum and coal product manufacturing
325	Chemical manufacturing
326150	Urethane and Other Foam Product (except Polystyrene) Manufacturing
3279	Other Non-Metallic Mineral Product Manufacturing
331	Primary Metal Manufacturing
332	Fabricated Metal Product Manufacturing
336	Transportation Equipment Manufacturing
5622	Waste Treatment and Disposal

The O. Reg. 419/05 legislation can be viewed at: http://www.e-laws.gov.on.ca/html/regs/english/elaws_regs_050419_e.htm and/or: <http://www.ene.gov.on.ca/envision/air/regulations/localquality.htm>

Amendment to Ontario's Record of Site Condition (RSC), O.Reg.153/04, (Ontario Regulation 511/09)

PUBLISHED ON JANUARY 16th, 2010.

The Ontario Ministry of the Environment (MOE) published under the Environmental Protection Act Ontario Regulation 511/09 to amend Ontario Regulation 153/04.

The major amendments include but are not limited to:

- revision for the Phase I & II Environmental Site Assessment (ESA), with new schedules covering the application, site investigations, review & evaluation of the information, and preparation of the ESA reports;
- introduction of strengthened soil, groundwater and sediment standards "Under Part XV.1 of the Environmental Protection Act.";
- a new definition of an "owner" under Section 4;
- clarification of the "Qualified Person under the Record of Site Conditions" definition;
- new site conditions standards for shallow soil properties;
- new analytical procedures and protocols;
- new provisions addressing soil brought in from another property;
- Schedule A revisions (contents and submission of the Record of Site Condition (RSC));
- new mandatory requirements for Risk Assessment reports in Schedule C.

The amendments will be phased in starting July 1st, 2010 with subsequent amendments being phased in July 1st, 2011.

Please visit: http://www.e-laws.gov.on.ca/html/source/regs/english/2009/elaws_src_regs_r09511_e.htm - to read more about Ontario Regulation 511/09.

Environmental Reporting & Disclosure Program, By-Law No.1293-2008, Toronto IN EFFECT IN JANUARY 1st, 2010

The Environmental Reporting and Disclosure Program require businesses that are located in Toronto to annually report their use and release of 25 hazardous chemicals:

Reporting is phased in over a four year period:

- Phase I sector industries: food and beverage manufacturing, printing and publishing, chemical manufacturing, wood industries, power generation and waste and water facilities, are required to track their 2010 data of the chemical use and emissions. Reporting deadline - June 30, 2011.
- Phase II sector industries: chemical wholesale, waste management and remediation services, medical and diagnostic laboratories, dry cleaning and laundry services, auto body repair, and funeral services establishments are required to track their 2011 data. Reporting deadline (along with Phase I sector industry 2011 data) - June 30, 2012.
- Phase III sector industries: "Other manufacturing" are required to track their 2012 data. Reporting deadline (along with Phase I and II sector industry 2012 data) - June 30, 2013.

The public database available for search by facility, chemical or neighborhood, with health and environmental information about the substances will be available to the public by January 2012.

For more information about the Toronto By-Law No. 1293-2009 and list of substances with their thresholds please visit:

<http://www.toronto.ca/legdocs/bylaws/2008/law1293.pdf> and/or: http://www.toronto.ca/health/hphe/enviro_info.htm

NPRI Requirement Changes for the 2009 Reporting Year

PUBLISHED ON DECEMBER 5, 2009

Environment Canada has made an adjustment to the National Pollutant Release Inventory (NPRI) requirements for the 2009 reporting year with the reporting deadline - **June 1st, 2010**. Facilities are required to report the amount of NPRI listed substances contained in tailings or waste rock disposed of at the mine or transferred off site for disposal. Environment Canada also wants to collect retroactive data from the "prescribed facilities" for the 2006 through 2008 reporting years. "Prescribed facilities" are those that generate or dispose of tailings or waste rock as a result of "the extraction or recovery of bitumen, coal, diamonds, metals & potash, or the extraction or beneficiation of metallic ore or concentrate" and that meet the other criteria set out in the NPRI schedule.

For more details please visit: <http://www.ec.gc.ca/inrp-npri/default.asp?lang=En&n=06277721-1>

Reverse Etching and Chromium Electroplating and Anodizing Regulations

IN FORCE SINCE JUNE, 2009

These are new regulations to reduce the air emissions of hexavalent chromium developed during the use of chromic acid in chromium electroplating, anodizing, or reverse etching operations.

The Regulations are applicable to any person or facilities that uses a solution containing hexavalent chromium compound (HVC) for chromium electroplating, chromium anodizing or reverse etching in a tank located at a facility where 50 kg or more of chromium trioxide (CrO₃) is used per calendar year.

HVC users can select one of three control measures to reduce HVC air emissions:

- installing a control device for point source releases;
- maintaining the surface tension in the tanks containing the chromic acid; or
- enclosing the open surface area of the tank with a tank cover.

Depending on the selected option, users will have 3 to 30 months to comply with the HVC release limits. The regulations will be administered by Environment Canada's Chemical Sectors Directorate.

Please visit the June 24, 2009 Gazette at: <http://www.gazette.gc.ca/rp-pr/p2/2009/2009-06-24/html/index-eng.html>

Health Protection Air Quality, By-Law No.2010-035, Oakville
IN EFFECT FROM FEBRUARY 1st, 2010

The Town of Oakville passed Health Protection Air Quality, By-Law No.2010-035 on February 1st, 2010. The by-law will immediately apply to new facilities that are major emitters of fine PM (PM_{2.5}) while transition conditions will apply to existing facilities located in Oakville.

Under the by-law, existing emitters who require Certificates of Approval for their air emissions from the Ontario government will be required to report to the Town on their emissions of fine PM and Nitrogen oxides, Ammonia, Sulphur dioxide, Volatile Organic Compounds. Emitters that do not currently require a Certificate of Approval will have up to one year to submit a report.

The facility is required to prepare the application with the application fee for the Town if discharged emissions exceed the following thresholds:

- (a) Directly emitted fine Particulate Matter, more than 300 kilograms per year;
- (b) Volatile Organic Compounds, more than 10,000 kilograms per year;
- (c) Nitrogen oxides (as NO₂ equivalent), more than 20,000 kilograms per year;
- (d) Sulphur dioxide, more than 20,000 kilograms per year; or,
- (e) Ammonia, more than 10,000 kilograms per year.

Facilities that receive approval from the Town are required to prepare annual reports that would include their average and worst-case rates of daily and annual health-risk air pollutant emissions from the facility for at least three years following approval. Existing facilities that are not major emitters would file a one-time report, unless there is a change in the level of emissions from a facility.

Facilities that fail to report or obtain an approval could be fined up to \$100,000. Subsequent offences would be subject to a penalty of up to \$10,000 a day.

Please visit: <http://www.oakville.ca/nr-10feb02.htm> and/or [Health Protection Air Quality By-law 2010-035](#)

Management of Substances, Canadian Environmental Protection Act (CEPA)

A substance is defined to be toxic if it may be entering the environment at a level that may harm human health or the environment. Once information about certain substance is collected and assessed, a toxic substance can be placed on the **Toxic Substances List (TSL)** which is a permanent list contained in Schedule 1 of the Canadian Environmental Protection Act (CEPA).

The chemical substances that are harmful to human health or the environment became regulated by the Chemicals Management Plan in 2006. A key element in the Chemicals Management Plan is the collection of information on the properties and uses of the approximately 200 chemical substances identified through the categorization process as high priorities for action. This information will be used to make decisions regarding the best approach to protect human health and the environment from risks these substances might cause. This initiative is known as the "**Challenge**". Under the Challenge, the approximately 200 substances have been divided up into a number of smaller groups of substances, and these groups are being addressed sequentially.

To read more about the Chemicals Management Plan, the Challenge and chemical substances that have been listed as Challenged Substances please visit:

<http://www.chemicalsubstanceschimiques.gc.ca/challenge-defi/index-eng.php>

The substances in Batch 12, the final group of substances in the Challenge component of the Chemicals Management Plan, have now been launched.

To see the Batch 12 Substances please visit: <http://www.gazette.gc.ca/rp-pr/p1/2009/2009-12-26/html/notice-avis-eng.html#d104>

For more information on these and other environmental related topics please feel free to visit our website at: www.pollutechgroup.com or contact us directly at (905) 847-0065 or info@pollutechgroup.com and one of our staff members will be happy to assist you. For your convenience we have attached a copy of our business services page which provides a brief summary of the services we provide.



Pollutech Environmental Limited is an independent Canadian owned consulting firm providing services since 1969 in the fields of environmental engineering, process consulting, chemistry and biology.

Pollutech has carried out pioneering environmental consulting and science projects in a wide range of sectors, working with industry and governments at the federal, provincial and municipal levels. Industrial clientele include members of the petroleum and petrochemical industry, automotive industry, mining, milling and smelting industry, pulp and paper industry, textile industry, primary steel producers, food processing industry, organic and inorganic chemical industry, and a variety of secondary manufacturing industries.

Pollutech has undertaken international projects in over 60 countries across Europe, Asia, Central/South America, and Africa.

Pollutech has successfully completed over 1,000 Environmental Approvals and assisted industrial clients to comply with Provincial Orders issued by the Ministry of the Environment.

Professional services provided to our industrial and government clients include:

GeoEnvironmental

- Environmental Site Assessments
- Geotechnical Investigations and Instrumentation
- Soil & Debris Contaminant Studies
- Risk Assessments
- Site Remediation
- Contaminant Modelling
- Septic System impact assessment and design
- Contaminated Soil Recovery

Air Quality Emissions

- Source Emission Compliance Testing
- Odour Emissions Testing
- Continuous Emissions Monitoring
- Ambient Air Monitoring
- Advance USEPA Dispersion Modelling
- Air Pollution Control Equipment Assessments
- Industrial Ventilation Assessments

Water/Wastewater Process Evaluations

- Industrial Wastewater Treatability Testing
- Process Design of Treatment Systems
- Operations of Treatment Systems
- Process and Operations Troubleshooting
- Analytical Testing Services
- Operator Training for Treatment Systems

Waste and Hazardous Material Management

- Management and Disposal of Hazardous Wastes
- Asbestos, PCB and Mould Surveys/Abatement
- Hazardous Material Remediation

Workplace Environment Services

- Indoor Air Quality Assessments
- Industrial Hygiene & Occupational Health
- Employee Training Programs (TDGA, EMS)
- Waste Audits and Waste Reduction Plans
- Corporate environmental management programs

Litigation Support / Expert Testimony

- Cost Recovery Actions
- Environmental Compliance Issues
- Cost Allocation
- Responsible Party Identification
- Forensic and Historical Research
- Engineering/Scientific Technical Support
- Technical Expert Witness
- Regulatory Negotiation / Arbitration

Environmental Management Systems (EMS)

- EMS Implementation Planning & Support
- ISO 14001 EMS GAP Analyses
- Strategy and Policy Development
- EMS and 2nd Party Pre-Certification Audits
- Environmental Risk Assessments
- Regulatory Compliance Updates

Regulatory Compliance and Approvals

- Environmental Compliance Audits
- Environmental Assessments
- MISA Compliance Monitoring
- Certificates of Approval for Air, Water and Waste
- Environmental Reporting (NPRI & O. REG 127)
- Receiving Stream Outfall Dispersion Modelling

Climate Change/Greenhouse Gas Management (GHG)

- Emissions Testing
- Lifecycle GHG Assessments
- GHG Baseline Assessments
- Greenhouse Gas Credits

Natural Environment Services

- Biological Monitoring
- Water Resource Evaluations
- Phytoecology Assessments
- Toxicity Identification and Elimination (TIE) Studies
- Marine Diving & Investigations

Our consulting activities are complemented by full in-house laboratory facilities, which enhance our abilities to provide a full range of services from the design and bench scale testing stages through to pilot scale evaluation and full scale development.

Pollutech is a Qualified Verification Entity for providing Verification Services to ETV (Environmental Technology Verification) Canada Inc., is recognized by Environment Canada as a Marine Testing Facility, maintains Facility Security Clearance under Canada Public Works and Government Services, holds a Certificate of Authorization issued by Profession Engineers Ontario, and is a member of CAEAL (Canadian Association of Environmental Analytical Laboratories).

bringing clarity to your environment

768 Westgate Road, Oakville, Ontario, Canada L6L 5N2 • Tel: 905.847.0065 • Fax: 905.847.3840
Email: info@pollutechgroup.com • www.pollutechgroup.com