



Owens Corning Guelph Glass Plant

247 York Road Guelph, Ontario N1E 3G4

Request Summary Fact Sheet – March 2015

What We're Requesting	The Owens Corning Guelph Glass Plant (Owens Corning) is requesting from the Ministry of the Environment and Climate Change (Ministry) an interim site-specific annual standard for hexavalent chromium under Section 32 of Ontario Regulation 419/05: Air Pollution – Local Air Quality.
About the Glass Manufacturing Process	The facility produces fiberglass reinforcements for commercial and industrial markets worldwide. This facility has been operating in Guelph since 1951 and owned by Owens Corning since 1989. It is the sole producer of fiberglass for reinforcements in Ontario and Canada. The process is a continuous one, which is why the process runs 24 hours a day, 365 days a year for a period of 10 years. The facility currently processes approximately 22,000 tonnes of glass fiber product per year.
Hexavalent Chromium is a Byproduct of the Manufacturing Process	Glass fibers are produced by melting raw materials in a gas fired furnace and transporting the molten glass through special heated channels called forehearts to “bushings” where it is mechanically pulled to form the fibers. The glass melting and molten glass transport structures are made from materials which include chromium oxide. These materials are used because they resist extreme wear conditions in the furnace and forehearts. As a result of the high temperatures and other conditions of the process, an extremely small fraction of the chromium oxide is transformed into hexavalent chromium and emitted to the air, primarily via 3 stacks.
In Compliance with Current Air Regulations	The Ministry uses a framework for managing risk to local communities from a facility's emissions of a contaminant to air. The Guelph Glass Plant is in compliance with current Ministry regulations for local air quality.
About the Future Standard	On July 1, 2016, a new hexavalent chromium air standard will come into effect. The future standard has been set at 0.00014 micrograms per cubic meter ($\mu\text{g}/\text{m}^3$) on an annual average basis. The standard is protective of human health. This new air standard represents a 99% reduction from the current regulation's comparator for hexavalent chromium.
An Interim Site-Specific Standard Is an Allowable Approach	An interim site-specific standard is an approach developed by the Ministry to enable a facility to maintain compliance as long as the Ministry is satisfied that the facility is reducing emissions as much as possible with technology based solutions and best practices. The Ministry recognizes that technical challenges and related economics will limit some facilities from achieving the future general standard by the July 1, 2016 date.
The Basis of Owens Corning's Interim Site-Specific Standard	The basis for Owens Corning's interim site-specific request is a mathematical calculation using a Ministry approved air dispersion model (AERMOD). Factors in the calculation include 5 years of local meteorological data and site-specific emissions for hexavalent chromium, based on: (1) validated testing conducted in 2014 on all sources of hexavalent chromium including the glass melting furnace, forehearts and furnace hall general ventilation; and (2) on the actions the facility can take to reduce emissions to air as much as possible considering the technology available (see <i>Action Plan Summary Fact Sheet</i>). The result is the prediction of the highest annual concentration that may occur at any location along the property line or beyond (referred to as a Point of Impingement or POI).
Our Request	As a result of modeling, the Owens Corning Guelph Glass Plant is requesting an interim site-specific standard of 0.0024 $\mu\text{g}/\text{m}^3$ on an annual average basis, for a term of 10 years.

About the Process for Requesting an Interim Site-Specific Standard

The request must be made 15 months in advance of the regulation taking effect.

Owens Corning will submit its request by March 31, 2015.

The request must include:

- ✓ Emission summary and dispersion modeling report
- ✓ Technical benchmarking report
- ✓ Economic feasibility study report
- ✓ Action plan for achieve the lowest air concentrations possible considering both technical and economic feasibility
- ✓ Public consultation report

We Encourage Your Questions and Input

Fill out comments cards at the Community Information Session

Email Owens Corning at
OCGuelph@owenscorning.com

Send a letter to:

Rob Nixon
Owens Corning
247 York Road
Guelph, Ontario N1E 3G4

The community must be notified and provided an opportunity to review the request and provide input to the Ministry through:

- ✓ Mailing of a notification letter within a defined distance of the facility
 - more than 4,000 letters were issued on February 14, 2015
- ✓ Placement of a public notice
 - notice was published in the Guelph Mercury and Guelph Tribune on February 17, 2015
- ✓ Holding a public information session
 - two sessions are being held on March 5, 2015, from 3 p.m.-5 p.m. and from 7 p.m.-9 p.m.
- ✓ Submitting a Public Consultation Report
 - a summary of the questions asked and comments made by persons who attended the public meeting and the responses given by Owens Corning will be included as part of the request submission and also posted on www.ocguelph.com

In addition, Owens Corning will make available the draft Executive Summaries of the main components of the application and a complete written copy of a draft of the proposed request, including all the materials provided at the Public Meeting, via its website www.ocguelph.com and in print (within 30 days of the public meeting) to all who request it.

The Ministry will then conduct a technical review of the request.

- ✓ The request for an interim site-specific specific standard allows for comment directly to Owens Corning and to the MOECC through the Environmental Registry. The Ministry will post a draft decision on the Environment Registry for public comment at www.ebr.gov.on.ca