

TC13 ENVIRONMENT (TC13)

Chair Laurent Piranda, Guardian, Luxembourg
Vice-Chair Walter Battaglia, SSV, Italy
Secretary Mark Pudner, British Glass, UK
Webmaster Marco Van Kersbergen, CelSian, The Netherlands

Members Andreas Kasper, St. Gobain, Germany
Simon Slade, Pilkington NSG, UK
Guy Van Marcke, AGC Glass Europe, Belgium
Denis Lalart, Arc International, France
Zsuzsa Varga, GE, Hungary
Thomas Hünlich, Schott, Germany
Karlheinz Gitzhofer, HVG, Germany
Phil Ross, GICI, USA
Hugues Abensour, St. Gobain, France
Etienne Senechal, Arc International, France
Egolf Maier, St. Gobain Isover, Germany
Barış Orhan, Şişecam, Turkey
Jan Boogaardt, AGC Glass Europe, Belgium

SUMMARY

TC13 is the environment committee of ICG. All environmental issues affecting the glass industry are covered. Members are drawn from industry, consultancies and glass federations. The TC13 meets twice a year and produces extensive minutes detailing the many topics addressed. Subjects range from characterising and controlling glass furnace emissions to understanding the impact of new regulations on the different sectors of the industry. The TC13 regularly produces briefing papers and journal articles and is a source of important expertise for the industry.

All members actively contribute during the meetings. Minutes and Annual Reports are written by the secretary. Reports and external publications are written by the secretary and jointly authored.

TC13's own website, kindly hosted by CelSian, houses an extensive collection of data and is regularly updated with useful information on the work of the TC. <http://www.celsian.nl/TC13/> (Note that the bulk of the documents are in a members-only password-protected area.)

ACTIVITIES IN 2017

The first meeting of 2017 was held in the Seminarzentrum of St. Gobain Isover, in Ladenburg, in Germany. Dr. Andreas Kasper chaired the meeting and Dr. Simon Slade was the secretary. The meeting had a very full agenda and the 14 participants discussed many environmental and related occupational health topics of importance to the manufacture of glass.

The committee first discussed ICG business and were pleased to hear that some ICG money was to be made available to fund TC13 research on particulate emissions from ceramic catalytic bag filters. Then dust generated by electrostatic precipitators was addressed with specific discussions on recycling, iron content and pH under different conditions. The

committee also heard about a UK project to assess non-glass recycling options for excess EP dust.

The REACH regulation and related TC13 work was mentioned and a related presentation was given on leaching of antimony from rolled plate glass. The committee heard a brief update on the paper on the analysis of the respirable fraction in glass sands. They discussed the requirements for glass manufacturers to cease using refractory ceramic fibres wherever possible because it is also potentially carcinogenic. Hexavalent chromium measurements in used refractories were also discussed.

Updates were given by companies using novel Cercat filters and everyone gave comments on new abatement installations in their companies or regions. Finally the committee were pleased to receive a thorough presentation on the PRIME glass project and related multipoint continuous monitoring.

The second TC13 meeting was held at the NSG European Technical Centre, in Lathom, UK. The meeting had a typically full agenda and the 11 participants discussed many important environmental and health issues associated with the manufacture of different types of glass.

The committee first discussed ICG business. Mr. Kasper (TC13 chairman) and Mr. Slade (TC13 secretary) both announced that they would be standing down, but would remain members of the committee. Mr. Piranda was elected chairman and Mr. Battaglia was elected vice-chairman. Mr. Pudner agreed to take over as secretary.

The group then discussed REACH and CMD regulations in relation to boron leaching from frits and airborne measurements of refractory ceramic fibre. There was also an update on the status of the draft TC13 paper on RCS in sand.

The committee then addressed measurement of emissions from glass furnaces, with focus on the determination of emission rates from oxy-fuel furnaces, boron as a deNO_x catalyst poison and ammonia (use of FTIR). There was also a comprehensive presentation from SSV on the relationship between CO and HCl/SO₂ emissions, with further discussion on the possible mechanism.

The initial results of work part funded through the ICG to measure particle size distribution on the clean gas side of a ceramic fibre filter were discussed. Arc also presented the results of particle size analysis of emissions after different types of abatement systems.

The meeting concluded with a round table on regulations and new abatement plants.

PLANS FOR 2018

There are two meetings planned for 2018. The first will be in Arques, France hosted by Arc, on 28th and 29th March. The second will be held in November, venue to be confirmed. The rolling assessment of environmental issues addressed at each meeting will continue. This will include discussions on the recycling of flue gas filter dust, the measurement of the respirable crystalline silica content of sand and boron leaching in relation to the REACH regulations. The results of the ICG funded project to look at the particle size distribution on the clean gas side of a ceramic candle filter will also be reported.