

S4-01

**Perspectives of Green & Sustainable Chemistry Education in the World**

Hideki Tsuge, Department of Applied Chemistry, Keio University  
3-14-1, Hiyoshi, Kohoku-ku, Yokohama, 223-8522 Japan  
Tel: 045-566-1574, Fax: 045-566-1551, [tsuge@applc.keio.ac.jp](mailto:tsuge@applc.keio.ac.jp)

Education and Enlightenment Session in the first International Conference on Green & Sustainable Chemistry (GSC), Tokyo 2003 aims to enlighten on GSC to student, school children, teachers, experts in academia and industries and also citizens in the world for promotion of information exchange, dissemination and communication to enhance the reliability of chemistry among the society.

S4-02

**Green Chemistry and Science Education for Everyone**

John C. Warner, UMB Center for Green Chemistry, Department of Chemistry,  
University of Massachusetts Boston,  
100 Morrissey Boulevard, Boston, MA 02125-3393  
617-287-6165, Fax: 617-287-6127, [john.warner@umb.edu](mailto:john.warner@umb.edu)

The earth's ecosystem and environment has a limited capacity to deal with expanding industry. As developed countries increase their manufacturing output and developing countries become more industrialized, we face the potential acceleration of the degradation of the environment. Green chemistry is a revolutionary philosophy that seeks to unite government, academic and industrial communities by placing more emphasis on tending to environmental impacts at the earliest stage of innovation and invention. This approach requires an open and interdisciplinary view of materials design, applying the principle that it is better to not generate waste in the first place, rather than disposing or treating it afterwards.

S4-03

**Green Chemistry and the Consumer**

James Clark  
Professor of Chemistry, University of York, UK  
([www.york.ac.uk/res/gcg/welcome.htm](http://www.york.ac.uk/res/gcg/welcome.htm)) and  
Director of the Green Chemistry Network ([www.chemsoc.org/gcn](http://www.chemsoc.org/gcn))

Most people now agree that there is a need for society to function in a sustainable way so that we can all seek to enjoy a good quality of life today, and in future generations. The concerns of the public over the use of hazardous or non-sustainable chemicals in all aspects of modern society are now evident in the work of pressure groups and governments. This will have an impact on the way products are designed, manufactured and either disposed of or recycled. The chemical manufacturing industry has already had to face a barrage of ever-tighter legislation and widespread criticism of its practices. The retail sector, which makes use of the products of the chemical industry, and directly interfaces with the general public as consumers, needs to become aware of these changes and the challenges ahead.

S4-04

**A CURRENT STATUS OF GSC RESEARCH AND  
EDUCATION PROGRAM IN KOREA**

Tae Hee Lee, Department of Chemical Engineering, Yonsei University  
134 Sinchon-Dong, Seodaemun-Gu, Seoul 120-749, Korea  
Tel: 82-2-2123-2754, Fax: 82-2-312-6401, leeth@yonsei.ac.kr

In recent years, there has been a shift in people's attention from post pollution treatment to preventive approach in dealing with environmental problems. Green Sustainable Chemistry (GSC) is on its way to various areas of Korea such as government, nongovernmental organization, and university. Yonsei University is playing a leading role in implementing the GSC research & education program through the Yonsei University Environmental Forum, Yonsei Center for Clean Technology, and Yonsei Institute of Environmental Science and Technology.

S4-05

**Green & Sustainable Chemistry Education in Japan**

Kazuko OGINO

College of Medical Sciences, Tohoku University  
16-30 Shiheimachi, Aobaku, Sendai, 9810944 Japan  
Phone/FAX: 81-22-233-6388, e-mail: [oginok@inorg.chem.tohoku.ac.jp](mailto:oginok@inorg.chem.tohoku.ac.jp)

Green & Sustainable Chemistry Network (GSCN) and its member organizations have been working to disseminate Green & Sustainable Chemistry (GSC). Now, GSC has become rather a well-known concept among chemists. In this paper, educational activities for schools and for the general public will be reviewed briefly.