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Editorial

Foreword to the Special Section on Education

During SIGGRAPH Asia 2009, several events were carried out to allow academia and industry experts to share their views and experiences with respect to computer graphics education. In this Special Section, we highlight the outcomes of one of these events, namely the Education Papers section of the Educators Program.

A total of 43 papers were submitted to the Educators Program, and 17 of these papers, representing nine nations, were accepted for presentation during the conference in December 2009. Among the accepted papers, four were selected for publication in this issue. These papers have undergone another two-stage comprehensive reviewing process. Authors were invited to submit carefully extended and revised versions of conference papers. These were then reviewed by no less than three experts in the field. We gratefully acknowledge the valuable participation of outstanding computer graphics educators in this process.

Although the case studies and experiences described in the selected works have a common computer graphics thread, their creative contributions to education can be extended to other fields. In fact, we believe that their interdisciplinary nature is one of their most important assets.

Anderson et al. in "Educating Technophile Artists and Artophile Technologists: A successful experiment in Higher Education" present their experience in developing a successful technical program in computer animation and game art. They share their vision about a curriculum that combines art, technology and production courses. Their discussion about this curriculum will likely help other educators in building similar programs.

Mikami et al. in "Construction trial of a practical education curriculum for game development by industry/university collaboration in Japan" discuss the problem of finding students with specific skills to work in the game development industry in Japan. They describe a groundbreaking collaboration between a Japanese university and a company to address this problem through the development of a game oriented undergraduate curriculum.

Ariga and Mori in "Sensory Vision—Development of a Course for Physical Interaction and Graphics", present a case study involving the development of a basic course for teaching interactivity in media arts and design. In this course, toolkits are provided to enable students to create an interactive installation and to acquire sensory experience on action–sense interactions as basic training for education in media art and design.

Miyata et al. in "An Educational Framework for Creating VR Application through Groupwork" describe a framework to stimulate group work. This framework is presented as a case study where a team takes advantage of each member's specific knowledge in areas such as aesthetics and storytelling to create VR applications. The goal is to obtain the best results with respect to design and implementation, and to foster collaboration among the students.

We expect that these papers will contribute to future efforts aiming at the improvement of educational practices involving computer graphics and interactive technology.

Ayumi Miyai is Secretary General at the Computer Graphic Arts Society (CG-ARTS) in Tokyo, Japan. She started her career as a designer and animator of computer graphics at the Japan Computer Graphics Lab (JCGL). She was one of the core organizers of the CG-ARTS and has been engaged in developing educational and training programs for the computer graphics industry in Japan. She has served to develop teaching materials, certification tests and student computer graphics contests. She has served as Educators Program Chair to organized SIGGRAPH Asia 2009 Educators Program. Currently, while continuing her work at the CG-ARTS as Secretary General, she is pursuing a doctorate at the University of Tokyo and researching measurement methodologies for computer graphics production proficiency.

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