## The 2015 VGTC Virtual Reality Career Award



## Michitaka Hirose

The 2015 Virtual Reality Career Award goes to Michitaka Hirose, University of Tokyo, Japan, for his lifetime contributions to research and practice in immersive virtual environments, 3D user interfaces and cultural VR applications.

Starting in the late 1980's, Michitaka Hirose has played an important role in various large scale VR research projects. He also contributed to the organization of interdisciplinary research areas between art and technology through the Digital Public Art and the Digital Museum projects.

The IEEE Visualization & Graphics Technical Community (VGTC) is pleased to award Michitaka Hirose the 2015 Virtual Reality Career Award.

## BIOGRAPHY

Michitaka Hirose is a professor of human interface and systems engineering in the school of information science and technology, University of Tokyo. He was born in 1954 in Kamakura, Japan. He received BE, ME, PhD in Mechanical Engineering from the University of Tokyo, in 1977, 1979, 1982, respectively.

In 1982, Hirose joined the mechanical engineering faculty at the University of Tokyo as a lecturer, and was promoted to an associate professor in 1983. His early interests included a human interface, micro computer applications, and biomedical signal processing. He facilitated the establishment of a human interface research group in Japan, and was a co-founder of the Human Interface Society of Japan. In 1985, he started 3D user interface research in his laboratory.

From 1989-90 he was a visiting scholar at U.C. Berkeley and joined the VR research group of Larry Stark where many VR pioneers were working. Once back in Japan, he started various VR research projects. One of the most memorable project was a construction of CABIN, a large scale immersive environment consist of 5 screens at the University of Tokyo (1997). He also played an important role in constructing COSMOS at VR techno-center at Gifu prefecture (1998). These two large immersive virtual environments were connected via a Gigabit network forming the Multimedia-Virtual Laboratory (MVL) project under a sponsorship of the Japanese ministry of telecommunication. As a project leader of MVL, he developed various telepresence technologies, such as, video avatar, photo-realistic walk-through environment, and wearable haptic interface.

During that period, he also helped organize the VR Society of Japan (VRSJ) and served as its director and a president (2010-11).

In 1999, he was promoted to a professor of intelligent systems at the Research Center for Advanced Science and Technology (RCAST), University of Tokyo.

At RCAST, he served as a project leader for the "Scalable Virtual Reality Contents (SVR)" project (2001-04) where VR technology was applied to educational areas. The project became a direct ancestor of the Digital Museum



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project. He also played an important role in the MR project, a big national project run by the ministry of international trade and industry and CANON, Inc.. The MR projects contribution helped develop software and hardware platforms for the Japanese MR/AR industry.

His research focused also on the contents of VR applications and contributed to organizing interdisciplinary research between art and technology. For example, he was a project leader of the "Digital Public Art" project (2004-09), sponsored by the Japan Science and Technology Agency. In 2009, he held an epic exhibition of digital public art works in Haneda Airport, the largest airport in Japan. One of the largest artwork was "Constellation of Departure," which is a novel display installed on the ceiling of the airport to show high-definition image through the afterimage phenomenon of one's vision.

From 2010-12 he served as a project leader of "Digital Museum" under a sponsorship of the Japanese ministry of education. He has developed multiple digital exhibition systems which enhance the ability to express background information for exhibits with the use of VR/AR technologies and wearable/mobile devices.

Hirose is the recipient of various honors and awards such as Tokyo Techno Forum Gold Medal Award (1995), Chairman Commendation of Information Promotion Month (Ministry of Communication) (2003), The Okawa Publication Prize (2004), Laval Virtual Award (2005, 2009), VSMM Best Paper Award (1998), VRSJ Outstanding Award (1999, 2005, 2011).

He is a member of Science Council of Japan.

## Award Information

The IEEE VGTC Virtual Reality Career Award was established in 2005. It is given every year to recognize an individual for a seminal technical achievement in virtual and augmented reality. VGTC members may nominate individuals for the Virtual Reality Career Award by contacting the awards chair, Arie Kaufman, at vgtc-vr-awards@vgtc.org.