

## **XML-based Markup Language for Web Information Integration in 3D Virtual Space**

Yasuhiko Kitamura, Yatsuho Shibata, Keisuke Tokuda, Kazuki Kobayashi, and Noriko Nagata

3D virtual space can visually represent the spatial structure to users and an agent can interactively navigate a user in it. The 3D virtual space technology has been applied to city planning, navigation, education, entertainment and so on. The virtual space gets more reality by integrating the Web information. For example, we can change the weather in the virtual space and can open or close gates according to the corresponding information from the Web. When the virtual space changes depending on the Web information, the agents need to adapt to the change. In this paper, we design an XML-based markup language called AVSML (Agent and Virtual Space Markup Language) to integrate Web information in a 3D virtual space and to specify the behaviors of the agents flexibly. We show how this language can be applied to a campus guide system on VKSC (Virtual Kobe Sanda Campus).