BEARS 2009

Tele-Immersion
475 Hearst Memorial Mining Building, 2:00 – 5:00pm

Please come join us in our lab for a presentation and demo session where we will share our work on teleimmersion. Teleimmersion is aimed to enable users in geographically distributed sites to collaborate in real time in a shared simulated environment as if they were in the same physical room. Our multi-camera system has 360 degree stereo capturing capability which allows full-body 3D reconstruction of people and objects. The data is captured in real time and projected into a virtual environment which can be combined with other virtual objects and scenes. We have the ability to connect through the network with remote locations. We currently have several research projects underway to improve the existing technology, including segmentation algorithms to recognize human beings and segment their data into individual limbs, mathematical models of human movement dynamics, refinement of stereo algorithms, customized hardware architectures, and sharing of real-time 3D video and audio data over long distances. We are interested to collaborate with people who share our interests.