

**Title: HD shared visualization + "real" remote desktop + captioning and translation services**

The AccessFabrik Lab was established to facilitate collaborative research in the area of shared-space multimedia interaction. Our work on this project focused on extending an existing, open-source videoconferencing application (the Access Grid) to allow for high-definition visualization, as well as remote control of computing resources across geographic divides. We also set out to reduce cultural barriers to collaboration by developing a suite of tools that facilitate real-time captioning and translation. Our main test case saw implementation of the above to the field of automotive engineering, where visualizations of industrial designs were shared and jointly-manipulated across continents. Our partners included Magna Closures in Canada, as well as the Fraunhofer Institute and DaimlerChrysler in Germany.

Our live demonstration will showcase a work in progress in the following areas:

- HD shared visualization & remote desktop control
- Real-time captioning & translation services

We would require one ethernet connection to Ryerson from the conference facilities through CA\*Net4 @ 100Mb/s. Our application only utilizes 4-10% of that bandwidth. If 802.11G is available we could also optionally demonstrate the low bandwidth aspect of our suite of applications. Additionally we would require access to a projector with 1280x1024 or more resolution support. Demonstration will run off our own laptop. We might additionally bring a portable setup -- time permitting -- to the conference to show potential miniaturization of our "headend" setup.