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CO600: Project Meeting

Poster Fair: Abstract

Title:

ANEXD: Platform for Real-Time Collaborative Web Applications

Project Description:

The fundamental concept involves the use of a primary desktop display interface, to which multiple mobile-based users can connect and contribute their input. The platform utilises the Communicating Sequential Processes (CSP) concurrency model to direct and process a potentially limitless number of connected users within a session. Our highly concurrent engine bridges the communication between the users on our web based front-end to the respective application server.

An essential ambition for the project is to be completely impartial to any languages chosen by application developers; all that is required is to follow our generic and flexible message format specification, while the platform elegantly handles all of the connection logistics.

Ultimately, ANEXD provides a platform for a huge number of diverse cooperative concepts, including multiplayer games, business collaboration, large-scale feedback sessions, and processes of creativity and entertainment.

Results:

The ANEXD front-end is built using highly dynamic web technologies including Angular.JS and Sass, which deliver a clean, modern UI and an intuitive UX that we serve to our end users.

ANEXD developers can create a web-based interface for their application, which communicates with their custom back-end, developed in the language of their choice. These two ends are connected through our API and lobby engine created in the Go programming language, using WebSocket connections by the Socket.IO library. Messages are routed between our API and the application server over a single TCP connection.
We have successfully developed several proof of concept applications to exhibit the exceptional range of the platform.