The AR Apprenticeship
Replication and Omni-directional Viewing of Subtle Movements
Tobias Sielhorst, Jörg Traub and Nassir Navab
{sielhors|traub|navab}@cs.tum.edu
CAMP - Chair for Computer Aided Medical Procedures | Technische Universität München

Exemplary scenario: Delivery Simulator with AR visualization for Medical Education and Training
[Sielhorst, Obst et al., AMI-ARCS@MICCAI 2004]

The Challenge
Medical training is done efficiently through observing expert’s action and trying to reproduce it on phantoms or patients. But what if the expert is not always available for teaching or giving feedback?

Our Solution
Exact 3D Replication and AR Visualization of Expert’s Movements
1. Recording expert’s performance
2. Replication of his subtle movements
3. Recording Trainee’s performance.
   • Comparing own movements with expert’s provides strong feedback
   • Omni-directional viewing makes this an active experience in contrast to watching videos

If Michelangelo’s movements were recorded with this system, we could learn his artistic techniques today by letting his virtual tools act again.

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