Integrating Virtual Reality in an Institutional Healthcare Education Research Online Conference

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**Background:** In response to Covid-19, traditional online communications platforms were rapidly deployed to ensure continued presentation of peer-reviewed scholarship and professional networking. However, teleconferencing fatigue emerged¹ and alternatives to two-dimensional interfaces were evaluated.² The use of virtual reality (VR) for online poster presentations was implemented at a three-day institutional healthcare education research (IHER) conference to enhance social interactions and better emulate in-person presentations.³

**Purpose:** To examine the impact of a virtual reality poster presentation on an institutional online conference in healthcare education research.

**Design**
- In 2021, 181 participants attended IHER conference
  - New VR speed poster presentation platform
  - 3D avatar-based Virbela software
- 20 participants attended VR session (Fig 1)
  - Four-item survey on 7-pt scale (1=SA, 7=SD)
  - IBM® SPSS® 26.0 used for analysis
- A password-protected private meeting space
  - Phase-shifting seating configurations
  - Protected private volume areas
  - Three digital presentation boards
  - 3D-spatialized audio
- The customizable avatars had built-in functions (Fig 2)

**Outcomes**
- I felt more engaged using a VR platform than I do on traditional video conferencing platforms
- Using a VR program like Virbela reduced my ‘teleconferencing fatigue’
- Using a VR program like Virbela was an effective way for presenters to discuss their posters
- I enjoyed participating in the session

**Fig 1:** VR Participant Survey Responses

<table>
<thead>
<tr>
<th>Strongly Agree</th>
<th>Agree</th>
<th>Somewhat Agree</th>
<th>Somewhat Disagree</th>
<th>Disagree</th>
</tr>
</thead>
<tbody>
<tr>
<td>0%</td>
<td>20%</td>
<td>40%</td>
<td>60%</td>
<td>80%</td>
</tr>
</tbody>
</table>

**Fig 2:** Speed Poster Virtual Reality Session

**Strengths and Limitations**
- The VR presentations were executed with no logistical problems and generated effective discussion
- One-on-one conversations were easier to have in the VR platform than in Zoom

**Website:** [https://www.mcw.edu/IHER2021](https://www.mcw.edu/IHER2021)