

and outcomes through its multi-modal approaches, including gamification (usage of game-based elements in a non-game context to engage learners and promote learning), active observational practice, independent hands-on practice, case-based discussion, peer-to-peer assessment, expert facilitated feedback, skills debriefing and reflective practice.

Conclusion: This micro-credential program will provide an enhanced dementia care curriculum for building capacity of existing workers, and those entering into the workforce to promote a dementia-friendly environment for older adults.

Using Virtual Reality to Facilitate Reminiscence Therapy for People with Dementia

Authors: Sun, Winnie. & Burhan, Amer .M.

Background: Reminiscence therapy (RT) is a multi-sensory treatment that uses a combination of sight, touch, taste, smell and sound to help people with dementia (PWD) remember events, people and places from their past lives. Currently, digital technologies such as mobile applications and immersive solutions including virtual and augmented reality, are gaining momentum as supplementary tools for RT. This paper presents a usability study of a web-based and virtual reality application to understand the limitations and opportunities of digital platforms for facilitating engaging experiences for PWD towards recalling memories, while easing the therapy process for the caregivers.

Methods: A total of fifteen healthcare caregivers were recruited from the Geriatric Dementia Unit and Geriatric Transitional Unit in Ontario Shores Center for Mental Health Sciences, Ontario Canada. Usability feedback from the caregivers were collected from the interviews after the completion of the System Usability Scale (SUS) questionnaire.

Results: Healthcare caregivers found both web-based and virtual reality (VRRT) usable with SUS score above average (68/100), but required improvements related to the onboarding training of caregivers. The interview revealed four overarching themes related to the VRRT: (1) Ease of use; (2) Positive impact on caregiving; (3) Potential reduction in behavioral symptoms; (4) Feasibility of promoting social connection during COVID-19 pandemic.

Conclusion: Next steps will focus on improving the user experience and expanding the application for immersive VR supporting head-mounted displays, hand tracking, and physiological measures, as well as conducting a usability study with PWD to expand our understanding of using RT digital tools with various levels of immersion.

Virtual reality to provide caregiver skill development and problem solving

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Background: Caring for persons with dementia (PWD) leads to disproportionate vulnerability to physical, mental, and social adverse health consequences among caregivers (CGs). The VR-SIMS CARERS Initiative aims to engage Knowledge Users (KUs), older adults and community stakeholders in the co-design of a Virtual Reality (VR) simulation training environment for dementia caregivers, and to explore end-user's perspectives, design and implementation challenges and opportunities (e.g. digital literacy, technology readiness, VR acceptability), to ensure that the resulting "Minimally Viable Prototype" is clinically efficacious, scalable and sustainable.

Objectives & Methodology: The specific objectives of this study are to:

1. employ a co-design approach to develop and validate an immersive VR simulation training environment for CGs to be in touch with realities of caregiving, practice communications and behavioural management of PWD based on the well-established CARERS Program;