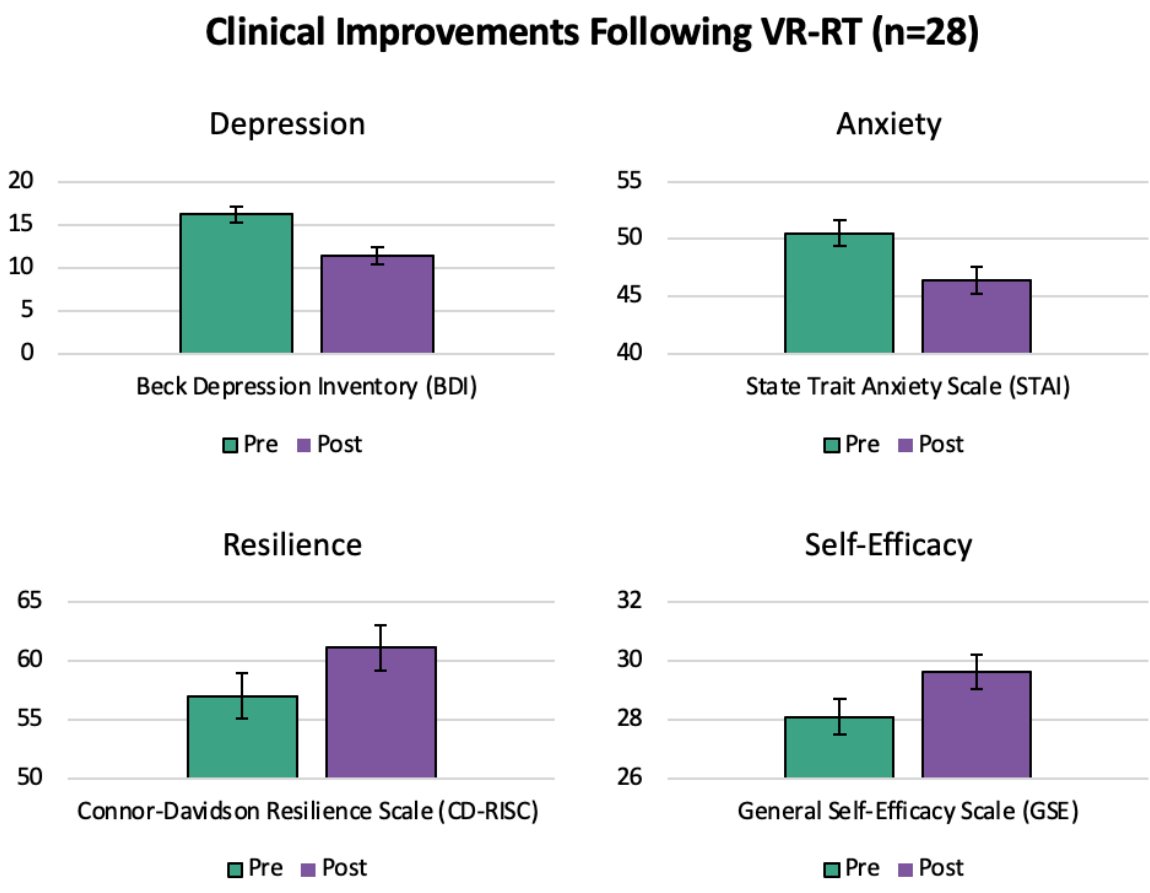
First Look

Enhancing Mental Health using Virtual Reality



Clinical Need

We are facing a “mental health crisis” among young people that has steadily worsened over the past decade. Mental health care systems are unable to meet this growing demand. Early detection and prevention strategies used in other fields of medicine have not been systematically adopted in psychiatry.

Our Innovative Approach

Our approach focuses on the less severe and less differentiated earlier stages of psychopathology than current mental health programs. This strategy may be more cost-effective and beneficial. We developed an immersive, multi-user virtual reality (VR) application to deliver a previously validated behavioral intervention called Resilience Training (RT). VR-RT comprises six one-hour sessions with up to 10 participants and two co-leaders. VR captures users’ attention, simulates being physically near others, and provides accessibility and anonymity.

Results

Several studies of RT (conducted with >400 young people), including a randomized controlled trial, show that RT significantly improves emotional resilience and reduces subclinical symptoms of psychopathology such as depression and anxiety. Two pilot studies of VR-RT have yielded similar findings and demonstrate the additional benefit of increased social comfort and improvement in social perception – key components of healthy social functioning.

Commercial Potential

VR-RT addresses many limitations of current digital mental health technologies, which typically suffer from limited user engagement and uptake. VR-RT and a facilitator training program have been fully developed and tested for immediate, large-scale deployment to at-risk young people, particularly those with limited access to mental health interventions.

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