Partners in Science

Academic Studies using WorldViz Technology
September 2014 - September 2015

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where virtual becomes reality™

Introduction

WorldViz is proud to supply universities around the world with cutting-edge VR solutions, enabling researchers to broaden the horizon of scientific understanding. Virtual reality is a powerful research tool allowing for unprecedented experimental control within fully immersive stimuli. The **WorldViz Partners in Science Report** highlights published studies from our partners—top scientific researchers embracing virtual reality to advance their field.

The report is organized by scientific field:

        Architecture, Computer Science, Engineering, Neuroscience, Psychology.

Links to the published journal articles for each study along with the authors are provided below. The dates of publication range from September 2014 - September 2015. As some of the papers are hosted on SpringerLink and IEEE, you'll need to use your university license to access them.

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Architecture

Ball State University
College of Architecture and Planning (CAP)

Researcher: Antonieta Angulo

Title of Paper/Research: [Rediscovering Virtual Reality in the Education of Architectural Design: The immersive simulation of spatial experiences](#)

Journal: Ambiances, International Journal of Sensory Environment, Architecture and Urban Space

University of Southern California
Department of Civil and Environmental Engineering; School of Architecture

Researchers: Arsalan Heydarian, Joao P. Carneiro, David Gerber, Burcin Becerik-Gerber

Title of Paper/Research: [Immersive virtual environments, understanding the impact of design features and occupant choice upon lighting for building performance](#)

Journal: Building and Environment

Researchers: Arsalan Heydarian, Joao P. Carneiro, David Gerber, Burcin Becerik-Gerber, Timothy Hayes, Wendy Wood

Title of Paper/Research: [Immersive virtual environments versus physical built environments: A benchmarking study for building design and user-built environment explorations](#)

Journal: Automation in Construction

End of Architecture

Computer Science

Cyber & Information Security Res. Group, Oak Ridge, TN, USA

Researchers: Eric D. Ragan, Doug A. Bowman, Regis Kopper, Cheryl Stinson, Siroberto Scerbo, Ryan P. McMahan

Title of Paper/Research: [Effects of Field of View and Visual Complexity on Virtual Reality Training Effectiveness for a Visual Scanning Task](#)

Journal: IEEE Transactions on Visualization and Computer Graphics

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Indian Institute of Technology, Gandhinagar, Gandhinagar, India
Electrical Engineering

Researchers: Selvia Kuriakose, Uttama Lahiri

Title of Paper/Research: [Understanding the Psycho-Physiological Implications of Interaction With a Virtual Reality-Based System in Adolescents With Autism: A Feasibility Study](#)

Journal: IEEE Transactions on Neural Systems and Rehabilitation Engineering

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Miami University
Dept. of Psychology and Armstrong Institute of Interactive Media Studies; Department of Computer Science & Software Engineering; Department of Psychology

Researchers: Eric Hodgson, Eric R. Bachmann, David Vincent, Michael Zmuda, David Waller, James Calusdian

Title of Paper/Research: [WeaVR: a self-contained and wearable immersive virtual environment simulation system](#)

Journal: Behavior Research Methods

Computer Science

Stanford University
Department of Communication;
Department of Computer Science

One Microsoft Way
Microsoft Research

Researchers: Andrea Stevenson Won, Jeremy Bailenson, Jimmy Lee, Jaron Lanier

Title of Paper/Research: Homuncular Flexibility in Virtual Reality

Journal: Journal of Computer-Mediated Communication

University of Hamburg
Department of Computer Science

Researchers: G. Bruder, P. Lubas, F. Steinicke

Title of Paper/Research: Cognitive Resource Demands of Redirected Walking

Journal: IEEE Transactions on Visualization and Computer Graphics

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Vanderbilt University

Researchers: Qiufeng Lin, John Rieser, Bobby Bodenheimer

Title of Paper/Research: Affordance Judgments in HMD-Based Virtual Environments: Stepping over a Pole and Stepping off a Ledge

Journal: ACM Transactions on Applied Perception (TAP)

Graduate School of Vanderbilt University

Researcher: Qiufeng Lin

Title of Paper/Research: People's Perception and Action in Immersive Virtual Eenvironments (IVES)

Journal: Dissertation

Computer Science

Indian Institute of Technology
Electrical Engineering

Vanderbilt University
*Electrical Engineering and
Computer Science;
Pediatrics and Psychiatry*

University of Tennessee Health Science Center

Researchers: Uttama Lahiri, Esubalew Bekele, Elizabeth Dohrmann, Zachary Warren, Nilanjan Sarkar

Title of Paper/Research: A Physiologically Informed Virtual Reality Based Social Communication System for Individuals with Autism

Journal: Journal of Autism and Development Disorders

Researchers: Mahdi Nabiyouni, Ayshwarya Saktheeswaran, Doug A. Bowman, Ambika Karanth

Title of Paper/Research: Comparing the Performance of Natural, Semi-Natural, and Non-Natural Locomotion Techniques in Virtual Reality

Journal: IEEE Symposium on 3D User Interfaces

Virginia Tech
*Center for Human-Computer Interaction
and Department of Computer Science*

Researchers: Mahdi Nabiyouni, Siroberto Scerbo, Vincent DeVito, Stefan Smolen, Patrick Starrin, Doug A. Bowman

Title of Paper/Research: Design and Evaluation of a Visual Acclimation Aid for a Semi-Natural Locomotion Device

Journal: IEEE Symposium on 3D User Interfaces

End of Computer Science

Engineering

Bielefeld University
Department of Cognitive Neuroscience
Cognitive Interaction Technology Center of Excellence (CITEC); Nanjing Tech University College of Electrical Engineering and Control Science

Researchers: Abdeldjallil Naceri, Alessandro Moscatelli, and Ryad Chellali

Title of Paper/Research: Depth discrimination of constant angular size stimuli in action space: role of accommodation and convergence cues

Journal: Frontiers in Human Neuroscience

Cyber & Information Security Res. Group, Oak Ridge, TN, USA

Researchers: Eric D. Ragan, Doug A. Bowman, Regis Kopper, Cheryl Stinson, Siroberto Scerbo, Ryan P. McMahan

Title of Paper/Research: Effects of Field of View and Visual Complexity on Virtual Reality Training Effectiveness for a Visual Scanning Task

Journal: IEEE Transactions on Visualization and Computer Graphics

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National University of Singapore
Department of Psychology
Norfolk State University
Department of Engineering

Researchers: Maria Kozhevnikov, Lee Rong Cheng, Michael Kozhevnikov

Title of Paper/Research: Effect of Environment Immersivity on Encoding Strategies of Spatial Tasks

Journal: Procedia Manufacturing

Engineering

Rowan University
College of Engineering

Researchers: Mark D. Locuson, George D. Lecakes, Anthony Aita, H. Warren Goldman, Shreekanth Mandayam, Mira Lalovic-Hand

Title of Paper/Research: [A virtual scalpel for visualizing patients in a three-dimensional, immersive, navigable and interactive virtual reality environment](#)

Journal: IEEE Conference Publications

Tshwane University of Technology (TUT)
Dept. of Electrical Engineering
University of Versailles Saint Quentin (UVSQ); University Paris Est-Creteil/LISSI Lab

Researchers: Nico Steyn, Yskandar Hamam, Eric Monacelli, Karim Djouani

Title of Paper/Research: [Modelling and design of an augmented reality differential drive mobility aid in an enabled environment](#)

Journal: Simulation Modelling Practice and Theory

University of Nebraska Medical Center
Division of Physical Therapy Education, School of Allied Health Professions
University of Nebraska–Lincoln
Department of Mechanical and Materials Engineering
University of Nebraska Medical Center
Center for Advanced Surgical Technology; College of Public Health

Researchers: Chun-Kai Huang, Mohsen Zahiri, Carl A. Nelson, Ryan Booton, Ka-Chun Siu

Title of Paper/Research: [Outcomes of Muscle Effort Using a Novel Portable Laparoscopic Training System](#)

Journal: Journal of Medical Devices

Engineering

Laureate Institute for Brain Research
Faculty of Community Medicine

The University of Tulsa
Department of Psychology;
Center for Biomedical Engineering

The University of Oklahoma
College of Engineering;
Janssen Research and Development,
Janssen Pharmaceuticals

Researchers: R. P. Alvarez, N. Kirlic, M. Misaki, J. Bodurka, J. L. Rhudy, M. P. Paulus, W. C. Drevets

Title of Paper/Research: Increased anterior insula activity in anxious individuals is linked to diminished perceived control

Journal: Translational Psychiatry

University of Southern California
Department of Civil and Environmental
Engineering; School of Architecture and
Department of Civil & Environmental
Engineering

Researchers: Arsalan Heydarian, Joao P. Carneiro, David Gerber, Burcin Becerik-Gerber

Title of Paper/Research: Immersive virtual environments, understanding the impact of design features and occupant choice upon lighting for building performance

Journal: Building and Environment

Researchers: Arsalan Heydarian, Joao P. Carneiro, David Gerber, Burcin Becerik-Gerber, Timothy Hayes, Wendy Wood

Title of Paper/Research: Immersive virtual environments versus physical built environments: A benchmarking study for building design and user-built environment explorations

Journal: Automation in Construction

End of Engineering

Neuroscience

Arizona State University
School of Biological and Health Systems Engineering

Researchers: Gregory A. Apker, Keith Dyson, Garrett Frantz, Christopher A. Buneo

Title of Paper/Research: [Efficiency of visual feedback integration differs between dominant and non-dominant arms during a reaching task](#)

Journal: Experimental Brain Research

Bielefeld University
Department of Cognitive Neuroscience

Cognitive Interaction Technology Center of Excellence (CITEC);
Nanjing Tech University
College of Electrical Engineering and Control Science

Researchers: Abdeldjallil Naceri, Alessandro Moscatelli, Ryad Chellali

Title of Paper/Research: [Depth discrimination of constant angular size stimuli in action space: role of accommodation and convergence cues](#)

Journal: Frontiers in Human Neuroscience

Maastricht University
Clinical Psychological Science, Faculty of Psychology and Neuroscience

Universitätsklinikum Schleswig-Holstein
Institut für Sexualmedizin und Forensische Psychiatrie und Psychotherapie, Kiel, Germany

Researchers: Pauline Dibbets, Michel A. Schulte-Ostermann

Title of Paper/Research: [Virtual reality, real emotions: a novel analogue for the assessment of risk factors of post-traumatic stress disorder](#)

Journal: Frontiers in Psychology

Neuroscience

Ludwig-Maximilians-Universität München, Planegg-Martinsried, Germany; Bernstein Center for Computational Neuroscience Munich, Munich, Germany

Researchers: Christian Garbers, Josephine Henke, Christian Leibold, Thomas Wachtler, Kay Thurley

Title of Paper/Research: Contextual processing of brightness and color in Mongolian gerbils

Journal: Journal of Vision

Max Planck Institute for Human Cognitive and Brain Sciences
Department of Social Neuroscience

Researchers: Cade McCall, Tania Singer

Title of Paper/Research: Facing Off with Unfair Others: Introducing Proxemic Imaging as an Implicit Measure of Approach and Avoidance during Social Interaction

Journal: PLOS One

National Human Genome Research Institute;
National Institutes of Health
Social and Behavioral Research Branch
Texas A&M University
Department of Communication;
Houston Center for Quality of Care and Utilization Studies;
Section of Health Services Research
Baylor College of Medicine
Department of Medicine

Researchers: Susan Persky, Richard L. Street Jr.

Title of Paper/Research: Evaluating Approaches for Communication About Genomic Influences on Body Weight

Journal: Annals of Behavioral Medicine

Neuroscience

Vanderbilt University
Department of Psychology

Iowa State University
Department of Psychology

The University of Texas
Center for Learning and Memory

Researchers: Xiaoli Chen, Qiliang He, Jonathan W. Kelly, Ila R. Fiete, Timothy P. McNamara

Title of Paper/Research: [Bias in Human Path Integration Is Predicted by Properties of Grid Cells](#)

Journal: Current Biology

University of Coimbra
IBILI—Institute for Biomedical Imaging in Life Sciences, Faculty of Medicine

Researchers: Carlos P. Amaral, Marco A. Simões, Miguel S. Castelo-Branco

Title of Paper/Research: [Neural Signals Evoked by Stimuli of Increasing Social Scene Complexity Are Detectable at the Single-Trial Level and Right Lateralized](#)

Journal: PLOS One

University of Leeds, UK; University of Bradford

Researchers: Matthew Smith, Callum D. Mole, Georgios K. Kountouriotis, Catharine Chisholm, Bipin Bhakta, Richard M. Wilkie

Title of Paper/Research: [Driving with homonymous visual field loss: Does visual search performance predict hazard detection?](#)

Journal: British Journal of Occupational Therapy

New York University
Center for Neural Science

Researchers: David Putrino, Yan T. Wong, Adam Weiss, Bijan Pesaran

Title of Paper/Research: [A training platform for many-dimensional prosthetic devices using a virtual reality environment](#)

Journal: Journal of Neuroscience Methods

Neuroscience

University of Chicago
Department of Psychology

Free University of Brussels
Department of Linguistics

University of Chicago
Department of Linguistics;
Laboratory of Brain and Cognition,
National Institute of Mental Health,
Institute of Cognitive Neuroscience

University College London;
Max Planck Institute for Psycholinguistics;
Donders Institute for Brain, Cognition and Behaviour

Researchers: Tom Gijssels, Laura Staum Casasanto, Kyle Jasmin, Peter Hagoort, Daniel Casasanto
Title of Paper/Research: Speech Accommodation Without Priming: The Case of Pitch
Journal: Discourse Processes

University of California
Institute for Neural Computation;
Interdepartmental Neuroscience Program;
Departments of Radiology,
Neurosciences, and Psychiatry

Researchers: Markus Plank, Joseph Snider, Erik Kaestner, Eric Halgren, Howard Poizner
Title of Paper/Research: Neurocognitive stages of spatial cognitive mapping measured during free exploration of a large-scale virtual environment
Journal: Journal of Neurophysiology

Neuroscience

The University of Edinburgh
*Human Cognitive Neuroscience,
Department of Psychology;
Centre for Cognitive Ageing and Cognitive
Epidemiology, Department of Psychology*

Heriot-Watt University
*Department of Psychology,
School of Life Sciences*

German Center for Neurodegenerative Diseases (DZNE)
Aging and Cognition Research Group

Otto-von-Guericke University
*Center for Behavioral Brain Sciences
(CBBS)*

Researchers: Michael Craig, Michaela Dewar, Mathew A. Harris, Sergio Della Sala, Thomas Wolbers

Title of Paper/Research: Wakeful rest promotes the integration of spatial memories into accurate cognitive maps

Journal: Hippocampus

West Virginia University
*Department of Human Performance and
Applied Exercise Science, Division of
Physical Therapy*

Researchers: William J. Talkington, Bradley S. Pollard, Erienne V. Olesh, Valeriya Gritsenko

Title of Paper/Research: Multifunctional Setup for Studying Human Motor Control Using Transcranial Magnetic Stimulation, Electromyography, Motion Capture, and Virtual Reality

Journal: JoVE

Neuroscience

Wilfrid Laurier University
Sun Life Financial Movement Disorders Research and Rehabilitation Centre

University of Waterloo
Cognitive Neuroscience, Department of Psychology

Researchers: Kaylena A. Ehgoetz Martens, Colin G. Ellard, Quincy J. Almeida

Title of Paper/Research: Anxiety-provoked gait changes are selectively dopa-responsive in Parkinson's disease

Journal: European Journal of Neuroscience

Wilfrid Laurier University
Sun Life Financial Movement Disorders Research and Rehabilitation Centre

University of Waterloo
Department of Psychology

Researchers: Kaylena A. Ehgoetz Martens, Colin G. Ellard, Quincy J. Almeida

Title of Paper/Research: Does manipulating the speed of visual flow in virtual reality change distance estimation while walking in Parkinson's disease?

Journal: Experimental Brain Research

University College London
Institute of Cognitive Neuroscience

Researchers: Xueni Pan, Antonia F. de C. Hamilton

Title of Paper/Research: Automatic imitation in a rich social context with virtual characters

Journal: Frontiers in Psychology

End of Neuroscience

Psychology

Max Planck Institute for Biological Cybernetics
Department of Human Perception, Cognition, & Action

Brown University
Department of Cognitive, Linguistic, & Psychological Sciences

Researchers: Mintao Zhao, William H. Warren

Title of Paper/Research: [Environmental stability modulates the role of path integration in human navigation](#)

Journal: Cognition

University of Connecticut
Department of Psychology

Clark University
Department of Psychology

Researchers: Nicole M. Overstreet, Diane M. Quinn, Kerry L. Marsh

Title of Paper/Research: [Objectification in Virtual Romantic Contexts: Perceived Discrepancies Between Self and Partner Ideals Differentially Affect Body Consciousness in Women and Men](#)

Journal: Sex Roles

Delft University of Technology
Interactive Intelligence Group

Eindhoven University of Technology
Human Technology Interaction Group

Researchers: Chao Qu, Yun Ling, Ingrid Heynderickx, Willem-Paul Brinkman

Title of Paper/Research: [Virtual Bystanders in a Language Lesson: Examining the Effect of Social Evaluation, Vicarious Experience, Cognitive Consistency and Praising on Students' Beliefs, Self-Efficacy and Anxiety in a Virtual Reality Environment](#)

Journal: PLOS one

Psychology

Brown University
Department of Cognitive, Linguistic, and Psychological Sciences

Researchers: Kevin W. Rio

Title of Paper/Research: Mapping the Visual Coupling between Neighbors in Real and Virtual Crowds

Journal: Dissertation

Georg-August-University
Ludwig-Meyer-Institute for Forensic Psychiatry and Psychotherapy, Faculty of Medicine, Göttingen, Lower Saxony, Germany

Researchers: Peter Fromberger, Sabrina Meyer, Christina Kempf, Kirsten Jordan, Jürgen L. Müller

Title of Paper/Research: Virtual Viewing Time: The Relationship between Presence and Sexual Interest in Androphilic and Gynephilic Men

Journal: PLOS One

Intuitive Research and Technology Corporation

Researchers: Rustin Webster

Title of Paper/Research: Declarative knowledge acquisition in immersive virtual learning environments

Journal: Interactive Learning Environments

Second University of Naples
Department of Psychology; Laboratory of Immersive Virtual Reality

Researchers: Tina Iachini, Stefano Pagliaro, Gennaro Ruggiero

Title of Paper/Research: Near or far? It depends on my impression: Moral information and spatial behavior in virtual interactions

Journal: Acta Psychologica

Psychology

Iowa State University
Department of Psychology

Researchers: Jonathan W. Kelly, William Hammel, Lori A. Sjolund, Zachary D. Siegel

Title of Paper/Research: Frontal extents in virtual environments are not immune to underperception

Journal: Attention, Perception, & Psychophysics

Researchers: Jonathan W. Kelly, Shana K. Carpenter, Lori A. Sjolund

Title of Paper/Research: Retrieval enhances route knowledge acquisition, but only when movement errors are prevented

Journal: Journal of Experimental Psychology: Learning, Memory, and Cognition

Johns Hopkins University;
University of Southern California
Kennedy Krieger Inst

Researchers: Andrew W. Long, James M. Finley, Amy J. Bastian

Title of Paper/Research: A Marching-Walking Hybrid Induces Step Length Adaptation and Transfers to Natural Walking

Journal: Journal of Neurophysiology

Maastricht University
Department of Work and Social Psychology

Open University of The Netherlands Heerlen
Faculty of Psychology and Educational Sciences

Radboud University Nijmegen, Nijmegen
Behavioural Science Institute

Illinois State University
Department of Psychology

Researchers: Henna L. Toppenberg, Arjan E. R. Bos, Robert A. C. Ruiter, Daniël H. J. Wigboldus, John B. Pryor

Title of Paper/Research: HIV-related stigma in social interactions: Approach and avoidance behaviour in a virtual environment

Journal: European Journal of Social Psychology

Psychology

Maastricht University

*Clinical Psychological Science,
University of Leuven, Belgium*

Researchers: Pauline Dibbets, Riet Fonteyne

Title of Paper/Research: High spider fearfuls can overcome their fear in a virtual approach-avoidance conflict task

Journal: Journal of Depression & Anxiety

Maastricht University

*Clinical Psychological Science,
Faculty of Psychology and Neuroscience*

Universitätsklinikum Schleswig-Holstein

*Institut für Sexualmedizin und
Forensische Psychiatrie und
Psychotherapie, Kiel, Germany*

Researchers: Pauline Dibbets, Michel A. Schulte-Ostermann

Title of Paper/Research: Virtual reality, real emotions: a novel analogue for the assessment of risk factors of post-traumatic stress disorder

Journal: Frontiers in Psychology

Miami University

*Dept. of Psychology and Armstrong
Institute of Interactive Media Studies;
Department of Computer Science &
Software Engineering;
Department of Psychology*

Researchers: Eric Hodgson, Eric R. Bachmann, David Vincent, Michael Zmuda, David Waller, James Calusdian

Title of Paper/Research: WeaVR: a self-contained and wearable immersive virtual environment simulation system

Journal: Behavior Research Methods

Psychology

National University of Singapore
Department of Psychology

Norfolk State University
Department of Engineering

Researchers: Maria Kozhevnikov, Lee Rong Cheng, Michael Kozhevnikov

Title of Paper/Research: Effect of Environment Immersivity on Encoding Strategies of Spatial Tasks

Journal: Procedia Manufacturing

Northern Arizona University
*Department of Psychological Sciences;
Department of Biological Sciences*

Researchers: Heidi A. Wayment, Ann F. Collier, Melissa Birkett, Tinna Traustadóttir, Robert E. Till

Title of Paper/Research: Brief quiet ego contemplation reduces oxidative stress and mind-wandering

Journal: Frontiers in Psychology

Radboud University Nijmegen
*Donders Institute for Brain, Cognition
and Behaviour; Pedagogical Sciences,
Education Science*

Researchers: Lea A. Hald, Marianne van den Hurk, Harold Bekkering

Title of Paper/Research: Learning verbs more effectively through meaning congruent action animations

Journal: Learning and Instruction

University of Kent
School of Psychology

University of Cambridge
Behaviour and Health Research Unit

University of Manchester
School of Psychological Sciences

Researchers: Mario Weick, John A. Allen, Milica Vasiljevic, Bo Yao

Title of Paper/Research: Walking blindfolded unveils unique contributions of behavioural approach and inhibition to lateral spatial bias

Journal: Cognition

Psychology

Researchers: Bernhard E. Riecke, Jacob B. Freiberg, Timofey Y. Grechkin

Title of Paper/Research: [Can walking motions improve visually induced rotational self-motion illusions in virtual reality?](#)

Journal: Journal of Vision

Simon Fraser University
iSpace Lab, School of Interactive Arts and Technology

Researchers: Bernhard E. Riecke, Jacqueline D. Jordan

Title of Paper/Research: [Comparing the effectiveness of different displays in enhancing illusions of self-movement (vection)](#)

Journal: Frontiers in Psychology

Stanford University

Researchers: Jakki O. Bailey, Jeremy N. Bailenson, June Flora, K. Carrie Armel, David Voelker, Byron Reeves

Title of Paper/Research: [The Impact of Vivid Messages on Reducing Energy Consumption Related to Hot Water Use](#)

Journal: Environment & Behavior

Stanford University School of Medicine
Department of Psychiatry & Behavioral Sciences
Stanford University
Department of Communication

Researchers: Clare K. Purvis, Megan Jones, Jakki O. Bailey, Jeremy Bailenson, C. Barr Taylor

Title of Paper/Research: [Developing a Novel Measure of Body Satisfaction Using Virtual Reality](#)

Journal: PLOS One

Psychology

University of California
Department of Psychological & Brain Sciences

Researchers: Trevor J. Barrett, Andrew T. Stull, Ted M. Hsu, Mary Hegarty

Title of Paper/Research: [Constrained interactivity for relating multiple representations in science: When virtual is better than real](#)

Journal: Computers and Education

University College London (UCL)
Institute of Ophthalmology

University of Bath
Department of Psychology (NIHR) Biomedical Research Centre at Moorfields Eye Hospital and UCL Institute of Ophthalmology; Vitreoretinal Service; Moorfields Eye Hospital NHS Foundation Trust

Researchers: Sara Garcia, Karin Petrini, Gary S. Rubin, Lyndon Da Cruz, Marko Nardini

Title of Paper/Research: [Visual and Non-Visual Navigation in Blind Patients with a Retinal Prosthesis](#)

Journal: PLOS One

Durham University
Department of Psychology

Vanderbilt University

Researchers: Qiufeng Lin, John Rieser, Bobby Bodenheimer

Title of Paper/Research: [Affordance Judgments in HMD-Based Virtual Environments: Stepping over a Pole and Stepping off a Ledge](#)

Journal: ACM Transactions on Applied Perception (TAP)

Psychology

University of Chicago
Department of Psychology

Free University of Brussels
Department of Linguistics

University of Chicago
Department of Linguistics;
Laboratory of Brain and Cognition,
National Institute of Mental Health,
Institute of Cognitive Neuroscience

University College London;
Max Planck Institute for Psycholinguistics;
Donders Institute for Brain, Cognition and
Behaviour

Researchers: Tom Gijssels, Laura Staum Casasanto, Kyle Jasmin, Peter Hagoort, Daniel Casasanto

Title of Paper/Research: Speech Accommodation Without Priming: The Case of Pitch

Journal: Discourse Processes

University of Granada
Department of Clinical Psychology;
Department of Physical Therapy,
Faculty of Health Sciences;
Health Center of Villarrodrigo

University of Alicante
Department of Health Psychology,
Faculty of Health Sciences

Researchers: Eva Montero-López , Ana Santos-Ruiz, M. Carmen García-Ríos, Raúl Rodríguez-Blázquez, Miguel Pérez-García, María Isabel Peralta-Ramírez

Title of Paper/Research: A virtual reality approach to the Trier Social Stress Test: Contrasting two distinct protocols

Journal: Behavior Research Methods

Psychology

The University of Edinburgh
Human Cognitive Neuroscience,
Department of Psychology;
Centre for Cognitive Ageing and Cognitive
Epidemiology, Department of Psychology

Heriot-Watt University
Department of Psychology,
School of Life Sciences

German Center for Neurodegenerative Diseases (DZNE)
Aging and Cognition Research Group

Otto-von-Guericke University
Center for Behavioral Brain Sciences
(CBBS)

Researchers: Michael Craig, Michaela Dewar, Mathew A. Harris, Sergio Della Sala, Thomas Wolbers

Title of Paper/Research: [Wakeful rest promotes the integration of spatial memories into accurate cognitive maps](#)

Journal: Hippocampus

University of Sheffield
Department of Psychology

Institute of Education
Department of Psychology and
Human Development

Université Lille Nord de France
Department of Psychology

Researchers: Jamie Lingwood, Mark Blades, Emily K. Farran, Yannick Courbois, and Danielle Matthews

Title of Paper/Research: [Encouraging 5-year olds to attend to landmarks: a way to improve children's wayfinding strategies in a virtual environment](#)

Journal: Frontiers in Psychology

Psychology

Researchers: Barbara A. Morrongiello, Michael Corbett, Melissa Milanovic, Sarah Pyne, Robin Vierich

Title of Paper/Research: [Innovations in using virtual reality to study how children cross streets in traffic: evidence for evasive action skills](#)

Journal: Injury Prevention

Researchers: Barbara A. Morrongiello, Michael Corbett

Title of Paper/Research: [Using a virtual environment to study child pedestrian behaviours: a comparison of parents' expectations and children's street crossing behaviour](#)

Journal: Experimental Brain Research

Researchers: Barbara A. Morrongiello, Michael Corbett, Jessica Switzer, Tom Hall

Title of Paper/Research: [Using a Virtual Environment to Study Pedestrian Behaviors: How Does Time Pressure Affect Children's and Adults' Street Crossing Behaviors?](#)

Journal: Journal of Pediatric Psychology

University of Guelph
Psychology Department

University of Houston;
Baylor University;
Baylor College of Medicine

Researchers: Danielle E. Parrish, Holly K. Oxhandler, Jacuelynn F. Duron, Paul Swank, Patrick Bordnick

Title of Paper/Research: [Feasibility of Virtual Reality Environments for Adolescent Social Anxiety Disorder](#)

Journal: Research on Social Work Practice

Psychology

University of Illinois at Urbana-Champaign
Department of Kinesiology and Community Health

Researchers: M. Hernandez, J. Snider, C. Stevenson, G. Cauwenberghs, H. Poizner

Title of Paper/Research: A Correlation-based Framework for Evaluating Postural Control Stochastic Dynamics

Journal: IEEE Transactions on Neural Systems and Rehabilitation Engineering

---

University of Lausanne
Department of Organizational Behavior, Faculty of Business and Economics
Bern University of Applied Sciences

Researchers: Dario Bombari, Marianne Schmid Mast, Elena Canadas, Manuel Bachmann

Title of Paper/Research: Studying social interactions through immersive virtual environment technology: virtues, pitfalls, and future challenges

Journal: Frontiers in Psychology

University of London;
University of Illinois;
Ludwig-Maximilians-University of Munich

Researchers: Judit Pétervári, Amory H. Danek, Virginia Flanagin

Title of Paper/Research: Wayfinding and restructuring in a novel city: an insight problem solving task

Journal: Conference Paper

University of Muenster

Researchers: B. Bolte, M. Lappe

Title of Paper/Research: Subliminal Reorientation and Repositioning in Immersive Virtual Environments using Saccadic Suppression

Journal: IEEE Transactions on Visualization and Computer Graphics

---

Psychology

University of Texas, Austin

Researcher: Elena Hitzel

Title of Paper/Research: [Effects of Peripheral Vision on Eye Movements: A Virtual Reality Study on Gaze Allocation in Naturalistic Tasks](#)

Journal: Book published by Springer

Laureate Institute for Brain Research
Faculty of Community Medicine
The University of Tulsa
Department of Psychology;
Center for Biomedical Engineering
The University of Oklahoma
College of Engineering;
Janssen Research and Development,
Janssen Pharmaceuticals

Researchers: R. P. Alvarez, N. Kirlic, M. Misaki, J. Bodurka, J. L. Rhudy, M. P. Paulus, W. C. Drevets

Title of Paper/Research: [Increased anterior insula activity in anxious individuals is linked to diminished perceived control](#)

Journal: Translational Psychiatry

University of Utah, Max Planck Institute for Biological Cybernetics

Researchers: Jeanine K. Stefanucci, Sarah H. Creem-Regehr, William B. Thompson, David A. Lessard, Michael N. Geuss

Title of Paper/Research: [Evaluating the accuracy of size perception on screen-based displays: Displayed objects appear smaller than real objects.](#)

Journal: Journal of Experimental Psychology

Psychology

Sun Life Financial Movement Disorders Research and Rehabilitation Centre; Wilfrid Laurier University; University of Waterloo
Cognitive Neuroscience, Department of Psychology

Researchers: Kaylena A. Ehgoetz Martens, Colin G. Ellard, Quincy J. Almeida

Title of Paper/Research: [Virtually-induced threat in Parkinson's: Dopaminergic interactions between anxiety and sensory–perceptual processing while walking](#)

Journal: Neuropsychologia

WorldViz is the industry leader in immersion-ready virtual reality (VR) solutions. WorldViz's patent-pending interactive visualization and simulation technologies are deployed across 1500+ Fortune 500 companies, academic institutions and government agencies. WorldViz's core products are Vizard, the premier development platform for professional VR application design, and VizMove, the world's only enterprise-class VR software and hardware solution. WorldViz also offers PPT, a high-precision wide-area motion tracking system, as well as professional consulting and content creation services. WorldViz technology enables users to replace physical processes with immersive virtual methods. Applications range from design visualization and industrial training to interactive education and scientific research.

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