

Monday, 28 August 2023

8:30 - 10:00 **Symposia**

Room:	Symposium 1: Dynamic vision and its development: a symposium in honour of Oliver Braddick Chair: David Burr & Johannes Zanker	Symposium 2: Vision beyond cones: uncovering the role of rods and melanopsin in perception Chair: Pablo Barrionuevo	Room:
Aphrodite Hall			Adonis
8:30	Dynamic vision and its development: a symposium in honour of Oliver Braddick. <i>Janette Atkinson</i>	Multi-primary high dynamic range displays for vision science: implementation, challenges, and psychophysics <i>Allie Hexley</i>	
8:50	Development and plasticity of motion circuitry in human infants <i>Maria Concetta Morrone</i>	Filling-in of the foveal rod scotoma under mesopic viewing conditions <i>Hui Men</i>	
9:10	Dynamic vision and its development: spatial coding and seeing in depth <i>Marko Nardini</i>	The contribution of rods and cones to brightness induction <i>Pablo Barrionuevo</i>	
9:30	Two motion systems in the primate brain. <i>Anthony Movshon</i>	How does melanopsin help us to see? <i>Tom Woelders</i>	
		Melanopsin in complex scenes: Brightness and color interactions <i>Tanner DeLawyer</i>	

10:00 - 11:00 **Coffee Break**

Poster Sessions 1: Eye movements and Pupillometry; Perception & Action

Eye Movements and Pupillometry Poster Session

Confirmation of required specifications for cognitive function tests based on eye-movement-measuring devices
Mitsunobu Kunimi

Fixational Eye Movements As Bio-Markers For Visual Acuity
Michael Lellouch, Ohad Ben-Shahar

Eye Movement Patterns in Visual Expertise for Print
Evgenia Kouki, Evangelos Paraskevopoulos, George Spanoudis, Timothy C. Papadopoulos

Eye movements in facial expression recognition
Sofya Klumova, Galina Menshikova

Gaze characterization of ophthalmic lenses wearers with a new algorithm of pupil position estimation
Clara Benedi-Garcia, Pablo Concepcion-Grande, Marta Alvarez, Carmen Cano, Jose Miguel Cleva, Eva Chamorro

Fixation Stability in Reading and Non-reading Task
Evita Serpa, Gunta Krumina, Evita Kassaliete, Aiga Svede, Ilze Cepule, Liva Volberga, Rita Mikelsons, Asnate Berzina, Viktorija Goliskina, Sofija Vasiljeva, Marija Koleda, Madara Alecka, Elizabete Ozola, Daniela Toloka

Transsaccadic perception of changes in image regularity
Nino Sharvashidze, Matteo Valsecchi, Alexander C. Schütz

Feature-tuned properties and underlying neural mechanisms of short-latency stimulus-driven ocular position drift responses
Tatiana Malevich, Fatemeh Khademi, Tong Zhang, Matthias P. Baumann, Antimo Buonocore, Ziad M. Hafed

Spatial and temporal image statistics of fixated vs non-fixated regions in viewing artworks
Branka Sephar, Vicente Estrada-Gonzalez, Michael Garbutt, Scott East

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Coupling of eye movement to the visuospatial representations

Ziva Korda, Sonja Walcher, Christof Körner, Mathias Benedek

WALD-EM: Wald Accumulation for Locations and Durations of Eye Movements

Simon Kucharsky, Ingmar Visser, Maartje Raijmakers

Fixational eye movements form fine stereoacuity

Anna Ptukha

Effects of the nature of the context on contextual saccadic adaptation

Maxime Martel, Laurent Madelain

Exploring the Relationship Between Gaze and Movement Transitions During Natural Human Walking on Different Terrains

Christiane Wiebel-Herboth, Martina Hasenjäger

Comparison of saccades in athletes and non-athletes

Angelina Ganebnaya, Jekaterina Berkova, Alona Purmale, Līga Puhova, Mariya Misri, Svetlana Semjonova, Alina Kucika, Davids Davis Gailitis, Atis Kovaļovs, Aiga Švede

Developing an Indicator of Cognitive Load Using Pupillometry

Daniel Frazer, John Cass, Gabrielle Weidemann, Tamara Watson

Vision relaxation with a new device EyeRoll

Līga Puhova, Aiga Švede, Svetlana Semjonova, Alina Kučika, Angelina Ganebnaya, Dmitry Gromov, Kulsum Baig Fatima

Dissociating temporal expectations in the perceptual and oculomotor domains

Neil Roach, Ahmad Syazwan Muhammad Kamal, Paul McGraw, Chris Scholes

Pupil Size Reveals Imagination: Pupillary Response in Visual Imagery

Sin Wan, Sharon Hon, Sing-Hang CHEUNG

Is Eye Movement Latency Variation as a Predictor of Cognitive Impairment ?

Trevor Crawford, Megan Polden

Effect of eye movements and finger pointing on auditory spatial perception

Saranya Tarat, Chaipat Chunharas, Sedthapong Chunamchai

Predicting Multiple-Target Search Performance Using Eye Movements and Individual Differences

Kayley Birch-Hurst, Alice M Jones, Angela Ong, Kayleigh M Stoker, Melvyn L Smith, Wenhao Zhang, Kait Clark

Sight translation in L2: evidence from eye-tracking

Tatiana Petrova

Development of functional spatial span measure in reading

Natália Máximo, Victoria Menegon, Marcelo Fernandes Costa

The use of progressive lenses while going upstairs or downstairs: an eye-tracker study

Amelia Gonzalez, Clara Benedi-Garcia, Pablo Concepcion-Grande, Jose Miguel Cleva, Eva Chamorro

Robust storage for a large variety of stimulus features across saccades, but not across peripheral-to-foveal retinal shifts during fixation

Arne Stein, Lukasz Grzeczowski, Martin Rolfs

Pupillary responses to perceived glossiness and attractiveness

Hideki Tamura, Shigeki Nakauchi, Tetsuto Minami

Verbal labels influence target identification process in visual search

Maxim Morozov

I spy with my little eye... an anchor object! How anchor objects modulate eye movements during visual search

Deliane Bechar, Aylin Kallmayer, Melissa Lê-Hoa Võ

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Individual differences in gaze strategies when performing the same task: an example from stair climbing

Andrea Ghiani, Daan Amelink, Eli Brenner, Ignace Hooge, Roy Hessels

Looking versus searching: Inhibition of return in an extended saccade sequencing paradigm

Christof Körner, Margit Höfler, Florian F. Thaler, Iain D. Gilchrist

Does individual gaze lead to individual visual representations?

Petra Borovska, Benjamin de Haas

A pupillometry study of reward and uncertainty in exploratory decision making

Zoe He, Maëva L'Hôtellier, Alexander Paunov, Dalin Guo, Florent Meyniel, Angela Yu

Pupil responses reveal detection rates beyond reports in choice blindness

Pablo Grassi, Emre Baytimur, Lena Hoeppe, Andreas Bartels

Microsaccade size reflects spatial demands on internal selective attention in the oculomotor system

Baiwei Liu, Zampeta-Sofia Alexopoulou, Anne Zonneveld, Freek van Ede

Perception & Action Poster Session

Temporal dynamics of size constancy for perception and action with real objects at real distances

Simona Noviello, Saman Songhorabadi Kamari, Juan Chen, Chao Zheng, Angelo Pisani, Elena Franchin, Enrica Pierotti, Elena Tonolli, Simona Monaco, Louis Renoult, Irene Sperandio

Visual perception can learn from action. A study of cross-modal cue recruitment.

Lionel Louiset, Lionel Louiset

Lexical Access to Function Understanding is Influenced by the Objects Utilized for an Action

Lea Alexandra Müller Karoza, Sandro Luca Wiesmann, Melissa Lê-Hoa Vo

Adaptation of forearm orientation inhibited by visual information

Atsuki Higashiyama

Assessment of biophilic design and impact on visual perception in patient rooms

Maria Englezou, Kleanthis Neokleous

Obstacle Perception: A Heatmap-based Comparison of Human and Machine Alignment Focus Points

Aikaterini Karakasidi, Marios Thoma, Periklis Perikleous, Harris Partaourides, Zenonas Theodosiou, Loizos Michael, Andreas Lanitis

Effects of accuracy demands and light level on hand movements in a grasp-and-place task

Constanze Hesse, Martin Giesel

Exploratory hand movements affect perceived material attributes in a dimension-specific way

Fatma Kılıç, Dicle Dövençioğlu

Slightly perturbing the arm influences choices between multiple targets

Veronika Hadjipanayi, Eli Brenner, Emily M. Crowe

Effects of dynamic alterations of depth cues during continuous dynamic interaction

Francesca Peveri, Silvio Paolo Sabatini, Andrea Canessa

Variation in the location of the visual egocentre measured using a monocular and binocular sighting task

Yalige Ba, Paul McGraw, Timothy Ledgeway

PROGRAMME



Monday, 28 August 2023

11:00 - 13:00 Talk Sessions 1: Attention & Clinical populations

Room: Aphrodite Hall	Attention session Chair: Rosanne Rademake	Clinical aspects of vision session/Clinical populations Chair: Luca Tarasi	Room: Adonis
11:00	<p>Manipulating attentional priority creates a trade-off between memory and sensory representations in human visual cortex <i>Rosanne Rademaker, John Serences</i></p>	<p>The four factors of visual hypersensitivity: definition and measurement <i>Alice Price, Rebecca Oates, Petroc Sumner, Georgina Powell</i></p>	
11:15	<p>Self-initiation of attentional shift during visual search <i>Dengzhe Hou, Sai Sun, Yoshiyuki Sato, Yasuhiro Hatori, Chia-huei Tseng, Satoshi Shioiri</i></p>	<p>Detecting and delineating visual field defects based on free-viewing in glaucoma <i>Henning Schulte, Birte Gestefeld, Jan-Bernard Marsman, Jeroen Goossens, Frans Cornelissen</i></p>	
11:30	<p>Statistical Learning Alters the Latent Saliency of Attentional Priority Maps: As Revealed via Pinging and ERP's <i>Dock Duncan, Dirk van Moorselaar, Jan Theeuwes</i></p>	<p>Is there a common factor underlying visual abilities in patients with AMD? <i>Simona Garobbio, Ursula Hall, Philipp Anders, Hendrik Scholl, Michael H. Herzog</i></p>	
11:45	<p>Object-based and salience-based attention development: evidence from free-viewing in infants and adults <i>Ingmar Visser, Maartje Raijmakers</i></p>	<p>Visual flow and complexity as triggers and rehabilitation stimuli for dizziness <i>Nathan Goodwin, Petroc Sumner, Fernando Loizides, Hannah Derry-Sumner, Georgina Powell</i></p>	
12:00	<p>Increasing saccadic vigor with reward: effects on main sequence, latency and presaccadic attention <i>Lukasz Grzeczkowski, Oliver Steiner, Madeleine Gross, Martin Rolfs</i></p>	<p>Long-term adaptation to a visual field defect improves functional vision: evidence from a continuous visual tracking task <i>Minke de Boer, Anne Vrijling, Remco Renken, Jan-Bernard Marsman, Alessandro Grillini, Carlo Enrico Petrillo, Joost Heutink, Nomdo Jansonius, Frans Cornelissen</i></p>	
12:15	<p>Effect of Target-Distractor Similarity on Attentional Modulation in the Human Visual Cortex <i>Narges Doostani, Gholam-Ali Hossein-Zadeh, Radoslaw Martin Cichy, Maryam Vaziri-Pashkam</i></p>	<p>Status of symmetry perception following prolonged visual deprivation <i>Priti Gupta, Meghna Rao, Dhun Verma, Manvi Jain, Chetan Ralekar, Suma Ganesh, Pawan Sinha</i></p>	
12:30	<p>Perceptual coupling, not binocular rivalry, requires attention. <i>Alexander Pastukhov, Claus-Christian Carbon</i></p>	<p>Autistic and schizotypal traits shape neural markers of predictive inference <i>Luca Tarasi, Maria Eugenia Martelli, Giuseppe di Pellegrino, Vincenzo Romei</i></p>	
12:45	<p>Dissociable roles of human frontal eye fields and early visual cortex in presaccadic attention – evidence from TMS <i>Nina Hanning, Antonio Fernández, Marisa Carrasco</i></p>	<p>Prosopagnosia is highly comorbid with developmental coordination disorder (DCD). <i>Katherine Maw, Edwin Burns, Geoff Beattie</i></p>	

13:00 - 14:30

Lunch Break

Monday, 28 August 2023

14:30 - 16:15 Talk Sessions 2: Eye movements; Perception & Action			
Room:	Eye movement session	Perception & Action session	Room:
Aphrodite Hall	Chair: Sonja Walcher	Chair: Paola Binda	Adonis
14:30	When and why does eye behavior decouple from visual input during internally directed cognition? <i>Sonja Walcher, Ziva Korda, Christof Körner, Mathias Benedek</i>	Grasping follows Weber's Law <i>Kriti Bhatia, Christian Loewenkamp, Volker Franz</i>	
14:45	Idiosyncratic eye-movement patterns affect behavioral and ERP correlates of face perception <i>Nianzeng Zhong, Janet H. Hsiao, William G. Hayward</i>	Active vision shapes ocular dominance <i>Paola Binda, Cecilia Steinwurz, Giulio Sandini, Maria Concetta Morrone</i>	
15:00	Eye movements during 'everyday hallucinations': Scaffolded attention as a function of covert (rather than overt) attention <i>Joan Danielle K. Ongchoco, Brian Scholl</i>	Linking the space in visual and haptics <i>Liga Zarina, Jurgis Skilters, Solvita Umbrasko, Egle Zilinskaite-Sinkūniene</i>	
15:15	Tell me your point of view: Individual differences in gaze behavior predict individual differences in scene descriptions <i>Diana Kollenda, Benjamin de Haas</i>	Actions are characterised by 'canonical moments' in a sequence of movements <i>Patricia Gough, Nuala Brady, David McGovern</i>	
15:30		Causal Effects of Pupil Size on Visual Processing <i>Sebastiaan Mathôt, Hermine Berberyan, Philipp Büchel, Veera Ruuskanen, Ana Vilotjević, Wouter Kruijne</i>	
15:45		Stochastic resonance reflects decisional, not sensory, suboptimalities in human vision <i>Carlo Paris, Peter Neri</i>	
16:00		Gaze responses to visual perturbations during reaching <i>Dimitris Voudouris, David Franklin</i>	

16:15 - 17:15 **Coffee Break**
Poster Sessions 2: Attention & Clinical Vision Poster Sessions

Attention Poster Session	
A new object versus rejuvenated object in visual attentional selection <i>Atsunori Ariga</i>	
Effects of Interstimulus Competition on Attentional Target Selection in Conjunction Search <i>Rebecca Nako, Nick Berggren, Martin Eimer</i>	
Behavioural and neural correlates of shifting within and between attentional domains <i>Daniela Gresch, Sage E. P. Boettcher, Freek van Ede, Anna C. Nobre</i>	
Inhibition of salient but irrelevant distractor depends on search mode <i>Nataša Mihajlović, Sunčica Zdravković</i>	
Non-image forming vision as measured through ipRGC-mediated pupil constriction is not modulated by covert visual attention <i>Ana Vilotjević, Sebastiaan Mathôt</i>	
Drivers compensate for environmental complexity by attentional prioritization of safety-critical events <i>Vasiliki Kondyli, Daniel Levin, Mehul Bhatt</i>	
Cognitive Components of Small and Large-Scale Foraging Behaviour <i>Emre Orun, Carlo De Lillo, Robin Green</i>	
Examining Attention Patterns in Image Classification Tasks: A Comparison between Neural Networks and Humans <i>Anna Antipova</i>	

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Attentional effects on the P300 component of the event-related potential during fast visual stimulation

Julia Haldina, Sven P. Heinrich

Cross-modal synchrony aids multitarget search

Ivan Makarov, Runar Unnthorsson, Arni Kristjansson, Ian M. Thornton

Exploring Attentional Modulation Effects on the Perception of Complex Natural Stimuli: A Study on Human Faces

Lisa-Marie Vortmann, Finn Radatz, Angela Yu

Changes in conflict-induced modulations of oblique effects in spatial attention

Kanyarat Benjasupawan, Nithit Singtokum, Naphapa Panyanirun, Anantaporn Sena, Panchalee Sookprao, Sirawaj Itthipuripat, Chaipat Chunharas

The influence of attention on visual asymmetries in the foveola

Samantha K. Jenks, Martina Poletti

The preparatory activation of attentional templates for the guidance of visual search and for the recognition of objects in non-search tasks

Gordon Dodwell, Martin Eimer

'Attentional transplants' cause recipients to like images similarly to donors: Evidence for inter-observer commonalities in how attention drives preferences

Hong B. Nguyen, Benjamin van Buren

A self-administered mobile assessment for Response Inhibition

Pornnapat Chernprateep, Anantaporn Sena, Gann Boonyaprapatsara, Thitisa Sudayuworn, Pattarathorn Jongjarearnsuntikul, Waragon Phoosuwan, Natrada Rattanapong, Chaipat Chunharas, Anthipa Chokesuwattanaskul

Geistesblitz: Repetition priming of indirect attentional sets

Malin Strynal, Alexander Pastukhov, Claus-Christian Carbon, Arni Kristjansson

Size Modulation of Visual Attention Estimated by Steady State Visual Evoked Potential

Guangyu Chen, Satoshi Shioiri

Facilitation effects and anisotropy of the attentional blink for targets presented in a rapid serial visual presentation sequence in the upper and lower visual fields.

Ichikawa Makoto, Masataka Miyoshi

Attentional sustainability under different types of notifications

Anastasia Anufrieva, Elena Gorbunova

Neural activities preceding self-initiated attention

Satoshi Shioiri, Wei Wu, Kazuya Kobayashi, Dengzhe Hou, Shin Ono, Yoshiyuki Sato, Yasuhiro Hatori, Chia-Huei Tseng

Temporal regularities can be used to dynamically prioritise attentional templates during visual search.

Gwenllian C. Williams, Sage E. P. Boettcher, Anna C. Nobre

Clinical Vision Poster Session

Similarities and differences in sensory hypersensitivity across 10 clinical conditions

Rebecca Oates, Georgina Powell, Petroc Sumner, Abhay Ghaiwal, Charlotte Griffin, Alice Price

Visual fatigue and power spectral analysis of accommodative response in asymptomatic and symptomatic individuals

Rémi COQ, Pascaline NEVEU, Richard LEGRAS

Objectively impaired developmental prosopagnosia cases are excluded when using liberal cognitive task-based diagnostic criteria

Edwin Burns

Age-effects on gaze and hand movement when intercepting moving targets

Leonard Gerharz, Dimitris Voudouris

Sensory responsiveness, core features of autism and alexithymia

Nuala Brady, Madeleine Diepman

Mechanisms underlying visual discomfort and implications for urban greening

Olivier Penacchio, Xavier Otazu, Arnold J. Wilkins, Sarah M. Haigh

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Are people with anxiety traits more field dependent?

Li-Chuan Hsu, Pei-Yun Lai, Pin-Yun Lin, Xing-Rou Wong, Chia-Yao Lin, Yi-Min Tien

What is the neurological condition opposite to visual agnosia?

Charles Wu

Receptive fields modulations following optic neuritis

Ruth Abulafia, Pieter de Best, Adi Vaknin-Dembinsky, Panayiota Petrou, Atira Bick, Netta Levin

The effects of contrast modulation on peripheral visual acuity

Carlos R. Cassanella, Neil W. Roach, Paul V. McGraw

The phenomenology of face blindness: A case study of developmental prosopagnosia

Erling Nørkær, Tone Roald, Randi Starrfelt

Visual impairments in schizophrenia and schizoaffective disorder

Irina Shoshina, Alice Karlova, Alice Kosikova, Zumrud Huseynova, Anna Fedorova, Marianna Tumova, Michael Ivanov

Predictions of sensorimotor contingencies is altered in the broad autistic phenotype

Antonella Pomè, Eckart Zimmermann

Brain Indices of Visual Memory in Chronic Moderate-to-Severe TBI.

Eva Pettemeridou, Fofi Constantinidou

MRI Biomarkers of Posterior Cortical Atrophy: A Single-Case Study

Caterina Annalaura Pedersini, Aniol Santo-Angles, Omnia Hassanin, Luai Eldweik, Osama Abdullah, Bas Rokers

Investigating the Link between Language and Scene Knowledge: Insights from Eye Movements in Children with and without Developmental Language Disorder

Dilara Deniz Türk, Daniela Bahn, Christina Kauschke, Melissa Le-Hoa Võ

Visual differentiation in dyslexic children: An eye-tracking study

Nicol Dostálová

Eye tracking paradigm to identify saccade, pupil, and blink abnormalities in neurodegeneration

Maha Habibi, Brian C. Coe, Donald C. Brien, Heidi C. Riek, Annette Janzen, Wolfgang H. Oertel, Douglas P. Munoz

Investigating Gaze Behavior among Older Adults with and without Mild Cognitive Impairment in a Naturalistic Task

Alexandra Wolf

Different top-down modulation of prestimulus alpha power and frequency in Developmental Dyslexia

Alessia Santoni, Giuseppe Di Dona, David Melcher, Laura Franchin, Luca Ronconi

What can eye movements tell us about the visual fields in children?

Anna Boethun

Face Recognition and Reading in Congenital Achromatopsia

Ayelet McKyton, Deena Elul, Netta Levin

Decentralized viewing behavior on facial photographs depicting Bell's palsy

Dana Gudrun Rottleb, Helene Gunhild Schaefermeyer, Gregor Uwe Hayn-Leichsenring

Eye movements and gaze dynamics toward familiar and unfamiliar faces in congenital prosopagnosia

Adi mizrachi, Galia Avidan, Orya Lancry, Yoni Pertzov

Loughborough University Concussion IDentification (LUCID): concussion diagnosis using smartphone-based eye tracking

Thomas Wilcockson