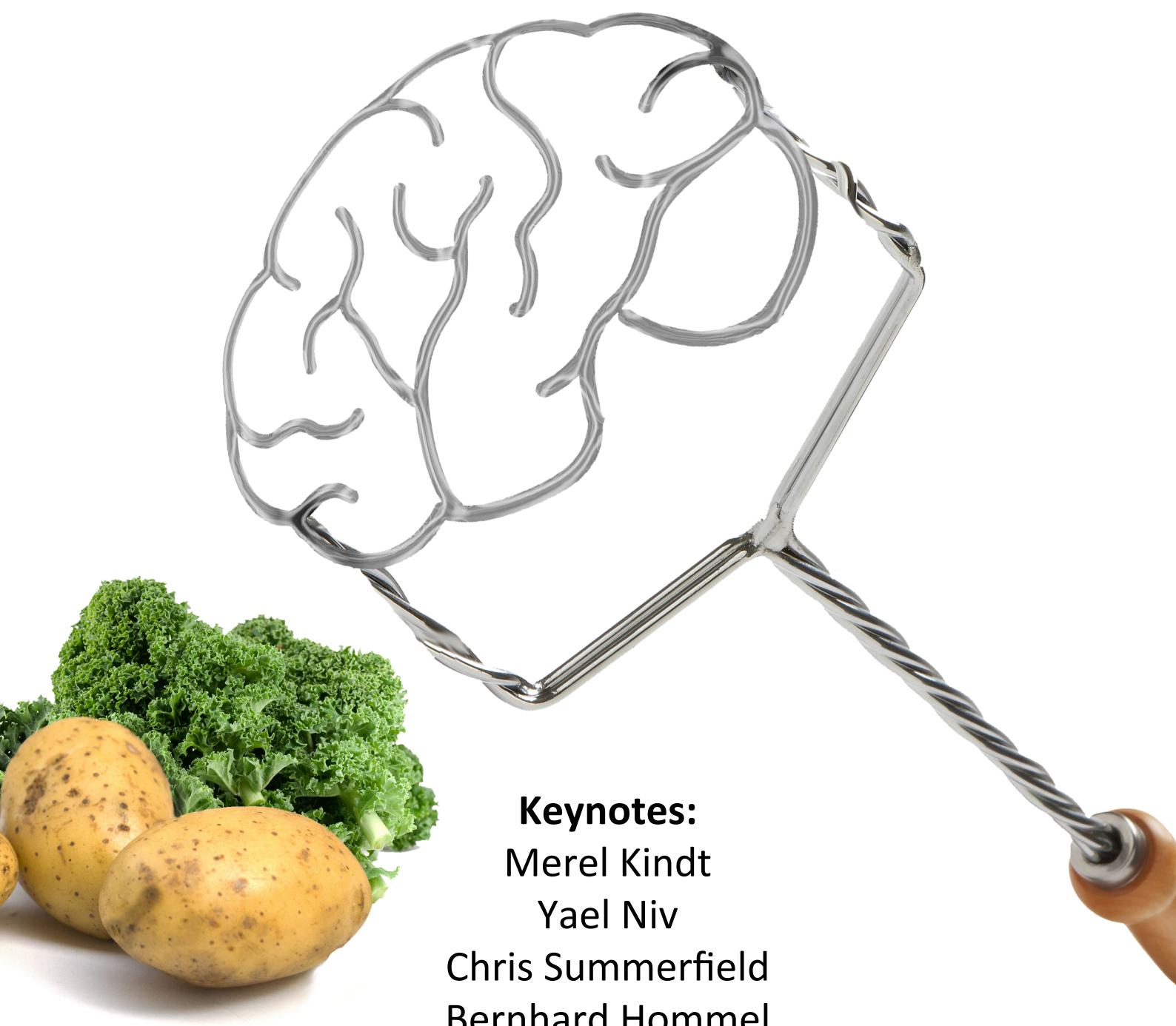


Nederlandse Vereniging voor Psychonomie

**NVP**  
**WINTER CONFERENCE**  
**2017**



**Keynotes:**

Merel Kindt

Yael Niv

Chris Summerfield

Bernhard Hommel

Egmond aan Zee

14-16 December



# WINTERCONFERENCE 2017 ★ EGMOND AAN ZEE

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DECEMBER 14 - 16

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## Organizing Committee

H. Steven Scholte (chair)  
Viona Wijnen  
Stefan van der Stigchel  
Romke Rouw

## Scientific Committee

Simon van Gaal (chair)  
Joke Baas  
Katinka Dijkstra  
Hedderik van Rijn  
Marieke Jepma  
Floris de Lange  
Amanda Kaas  
Johannes Fahrenfort  
Hanneke den Ouden

# PROGRAMME OVERVIEW

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## **THURSDAY**

13:00	Bus leaves from Alkmaar train station (behind station)
13:00 - 14:30	Registration* NVP desk
14:30 - 14:45	Opening Lamoraalzaal
14:45 - 15:45	Keynote: <i>Merel Kindt</i> Lamoraalzaal
15:45 - 16:00	Coffee/Tea Lounge 1
16:00 - 17:00	Parallel sessions 1 Lamoraalzaal, Abdijzaal & Zaal 522
17:00 - 19:00	Poster session 1 + drinks Lounge 1 + Lounge 2
19:00 - 21:00	Dinner Ritz
21:00 - 23:00	NVP Pubquiz Zuiderduinzaal
21:00 - 02:00	Bar open Pub

\* ) With the exception of this period registration occurs during hotel check-in

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## **FRIDAY**

07:00 - 09:00	Breakfast	Restaurant
09:00 - 10:00	Parallel sessions 2	Lamoraalzaal, Abdijzaal & Zaal 522
	Coffee/Tea	Lounge 1
10:15 - 11:15	Keynote: <i>Chris Summerfield</i>	Lamoraalzaal
	Coffee/Tea	Lounge 1
11:30 - 12:30	Parallel sessions 3	Lamoraalzaal, Abdijzaal & Zaal 522
12:30 - 13:30	Lunch	Restaurant
12:30 - 13:30	Meet the Profs	Lounge 2 (left side)
13:30 - 15:30	Poster session 2	Lounge 1 + Lounge 2
15:30 - 16:30	Parallel sessions 4	Lamoraalzaal, Abdijzaal & Zaal 522
	Coffee/Tea	Lounge 1
16:45 - 17:45	Dissertation prize + poster prize	Lamoraalzaal
	Coffee/Tea	Lounge 1
18:00 - 18:45	NVP business meeting	Lamoraalzaal
19:00 - 21:00	Dinner	Ritz
21:00 - 01:00	Bar open	The Pub
21:00 - 03:00	Disco bowling	Bowling

## **SATURDAY**

07:00 - 09:00	Breakfast	Restaurant
09:00 - 10:00	Parallel sessions 5	Lamoraalzaal, Abdijzaal & Zaal 522
	Coffee/Tea	Lounge 1
10:15 - 11:15	Keynote: <i>Yael Niv</i>	Lamoraalzaal
	Coffee/Tea	Lounge 1
11:30 - 12:30	Parallel sessions 6	Lamoraalzaal, Abdijzaal & Zaal 522
12:30 - 13:30	Lunch	Restaurant
13:30 - 14:30	Parallel sessions 7	Lamoraalzaal, Abdijzaal & Zaal 522
	Coffee/Tea	Lounge 1
14:45 - 15:45	Keynote: <i>Bernhard Hommel</i>	Lamoraalzaal
15:45 - 16:00	Closing	Lamoraalzaal
16:15	Bus leaves for Alkmaar train station (hotel entrance)	

Check-out at hotel desk before 10:30. Luggage can be stored in room 534

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# INSTRUCTIONS FOR AUTHORS

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## Oral presentations

Make sure you are present 15 minutes before the start of your session. All rooms will be equipped with a monitor switch, but a computer is not provided. You are responsible to take to the room a laptop on which your presentation runs smoothly, which can be plugged into the monitor switch. Talks should last 12 minutes + 3 minutes for questions.

## Poster presentations

Poster boards have a size of 100 cm (width) \* 125 cm (height), which is big enough for an A0 portrait poster. On Thursday, posters can be mounted from 13:00 until Friday 12:00. On Friday, posters can be mounted from 12:30 until the end of the conference.

## MEET THE PROFESSORS

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This year we are organizing a new event during the NVP Winter Conference: **Meet the professors**. During the lunch on December 15, PhD students and post-docs have the opportunity for a free-wheeling, open-ended discussion with the professors and senior PIs of our society. They might chat about science, building a career, or whatever comes up. The event will consist of two 30-minute sessions. Students have selected a different professor for each session. Registration for this event was completed before the start of the conference.

## WINNERS STUDENT ATTENDENCE GRANTS

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### **Carlien Roelofzen**

*Universiteit Utrecht*

### **Alexandra Loseva**

*Universiteit Leiden*

### **Rosyl Somai**

*Universiteit Utrecht*

### **Floortje Spronkers**

*Universiteit van Amsterdam*

### **Julia Beitner**

*Universiteit van Amsterdam*

### **Nienke van Bueren**

*Universiteit Utrecht*

### **Lola Beerendonk**

*Universiteit van Amsterdam*

### **Maarten van der Velde**

*Rijksuniversiteit Groningen*

### **Matthijs de Wit**

*Universiteit Leiden*

### **Tuomas ten Cate**

*Universiteit Utrecht*

### **Jessica Loke**

*Universiteit van Amsterdam*

# KEYNOTE LECTURES

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*Thursday 14<sup>th</sup> of December, 14:45-15:45*

## The surprising subtleties of changing emotional memories

*Merel Kindt*

Universiteit van Amsterdam, The Netherlands

Current pharmacological and psychological treatments for disorders of emotional memory only dampen the affective response while leaving the original fear memory intact. Under adverse circumstances, these original memories regain prominence, causing relapses in many patients. The (re)discovery in neuroscience that after reactivation consolidated fear memories may return to a transient labile state, requiring a process of restabilisation in order to persist, offers a window of opportunity to fundamentally change fear memories with amnestic agents. This process, known as memory reconsolidation, opens avenues for developing a revolutionary treatment for emotional memory disorders. The reconsolidation intervention challenges the dominant pharmacological and psychological models of treatment: it is only effective when the amnestic drug is given in conjunction with memory reactivation during a specific time window, and a modification of cognitive processes is a boundary condition for changing fear. Notwithstanding the dramatic effects of targeting memory reconsolidation in the laboratory (i.e., proof of principle), the greatest hurdle to overcome is that the success of the manipulation depends on subtle differences in the reactivation procedure. These experimental parameters cannot be easily controlled in clinical practice. An obvious limitation in human memory research is that the underlying neurobiological processes of reconsolidation can neither be directly observed nor locally targeted. Hence, the critical conditions for harnessing the clinical potential of memory reconsolidation are still largely unknown.

*Friday, 15<sup>th</sup> of December, 10:15-11:15*

## Optimality and irrationality in human decision-making

*Chris Summerfield*

University of Oxford, United Kingdom

Sensory neuroscientists tend to think of humans and other species as making optimal decisions – those that are limited only by noise in sensory encoding. Psychologists and economists, by contrast, have spent many decades describing pernicious cognitive biases that corrupt human decisions. Which of them is right? I will argue that one simple process model, based on the sequential sampling framework but incorporating a selective, limited-capacity filter (or ‘bottleneck’), can explain a number of violations of axiomatic rationality - including choices that are intransitive, that fail to show independence from irrelevant alternatives, or that are susceptible to framing effects. Critically, however, the simulations show that the selective bottleneck paradoxically **increases** decision accuracy by protecting choices against noise arising late, during information integration. In other words, cognitive biases may paradoxically play a key role in optimising decisions in the face of noise arising in neural computations.

*Saturday 16<sup>th</sup> of December, 10:15-11:15*

## Selective attention in the service of reinforcement learning

*Yael Niv*

Princeton University

On the face of it, most real-world world tasks are hopelessly complex from the point of view of reinforcement learning mechanisms. In particular, due to the "curse of dimensionality", even the simple task of crossing the street should, in principle, take thousands of trials to learn to master. But we are better than that.. How does our brain do it? In this talk I will argue that the limited nature of attention is our friend, not a foe. I will show evidence for a bidirectional interaction between selective attention and reinforcement learning in which attention shapes learning processes, and at the same time we have to learn what to attend to. I will then talk about the orbitofrontal cortex, and the role it plays in, what I call, "shallow learning with deep representations".

*Saturday 16<sup>th</sup> of December, 13:30-14:30*

## Metacontrol: The Yin and Yang of Cognitive Control

*Bernhard Hommel*

Universiteit van Leiden, The Netherlands

Traditional approaches to action control assume the existence of a more or less unitary control system that struggles with, and serves to overcome action tendencies induced by automatic processes. In this talk, I point out that and why these approaches fail to capture the complexity and dynamics of cognitive control. I describe an alternative approach that assumes that control emerges from the interaction of at least two counteracting forces: one system promoting persistence and the maintenance of action goals and another promoting mental and behavioral flexibility. I describe how this interaction might be shaped by various factors, including genetic predisposition, learning, personal experience, and the cultural context, and suggest a simple functional model (the Metacontrol State Model, MSM) that explains how this shaping process works. Then I provide an overview of studies from various fields (including perception, attention, performance monitoring, conflict resolution, creativity, meditation, religion, and social cognition/behavior) that successfully tested predictions from the MSM.

# Symposia and talk sessions

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**Thursday 14 December, 16:00-17:00**

**Lamoraal zaal, Symposium**

## **Applications of Laminar fMRI for Cognitive Neuroscience (chair: Samuel Lawrence)**

Recent developments in high spatial resolution fMRI allow for non-invasive measurements of brain responses specific to separate cortical layers. This provides an important opportunity to dissociate between feedforward and feedback brain responses, and investigate communication between brain areas at a more fine-grained level than previously possible in humans. This symposium will highlight some of the ways that laminar fMRI is being applied to answer new questions in cognitive neuroscience.

- S1) **Benchmarking laminar fMRI: Neuronal spiking and synaptic activity during top-down and bottom-up processing in the different layers of cortex.**  
Matthew Self. Netherlands Institute for Neuroscience
- S2) **Laminar imaging: from population receptive fields to attention.**  
Serge Dumoulin. Spinoza Centre for Neuroimaging, Amsterdam
- S3) **Contributions of cortical layers to sustained visual cortex activity during visual working memory.**  
Samuel Lawrence. Radboud University Nijmegen
- S4) **Using ultra-high field fMRI to investigate the human auditory pathway.**  
Michelle Moerel. Maastricht University

**Abdijzaal, Talk Session**

## **Decision Making & Control (Chair: Tessa M Dekker)**

- T1) **How quickly does the eye movement system register changes across saccades?**  
Jonathan van Leeuwen & Artem V. Belopolsky. *Vrije Universiteit Amsterdam*
- T2) **Suboptimal accounting for visuomotor uncertainty increases movement risk in childhood**  
Tessa M. Dekker & Imogen Large. *University College London*
- T3) **Microsaccades reveal the temporal dynamics of template and response preparation during visual search.**  
Katya Olmos Solis, Anouk M. van Loon & Christian N. L. Olivers. *Vrije Universiteit Amsterdam*
- T4) **Can you solve complex problems unconsciously? An adversarial collaboration and large-scale replication of the unconscious-thought advantage for complex problems**  
Sebastiaan Mathôt, Don van Ravenzwaaij, Marlène Abadie, Laurent Waroquier, Hedderik van Rijn, Mark Nieuwenstein. *Department of Psychology, University of Groningen, The Netherlands*

**Zaal 522, Talk Session**

## **Social Cognition & Morality (Chair: Marte Otten)**

- T5) **Measuring morality: An EEG study contrasting theft and digital piracy**  
Gert-Jan Munneke, Anouar El Haji, Michiel van Elk, Mark van Vugt, Maurits van der Molen.  
*Institute for Logic Language and Computation, Universiteit van Amsterdam, The Netherlands*
- T6) **Heritability of neural reactions to social exclusion and prosocial behavior in middle childhood**  
Mara van der Meulen, Niko Steinbeis, Michelle Achterberg, Marinus H. van IJzendoorn, Eveline Crone  
*Leiden University, The Netherlands*
- T7) **What's good about big pupils?**  
Yavor Ivanov, Sebastiaan Mathôt  
*Department of Psychology, University of Groningen, Netherlands*
- T8) **Processing morally loaded language in stories: simulation, evaluation, or both?**  
Björn 't Hart, Marijn Struiksma, Ton van Boxtel & Jos van Berkum  
*Utrecht University*

## Friday 15 December, 9:00-10:00

Lamoraal zaal, Symposium

### Clarifying the cognitive mechanisms underlying mind wandering (chair: Johathan Smallwood)

This symposium will introduce the field of mind-wandering research. The speakers will discuss current theoretical frameworks and experimental methodologies for measuring mind-wandering. The speakers of this symposium will also demonstrate how formal modeling of different kinds can help to inform theories of cognitive processing, especially when those cognitive processes are as difficult to define and characterize as mind-wandering.

- S5) **How the architecture of the brain constrains the structure of the mind-wandering state.**  
Jonathan Smallwood  
*University of York, United Kingdom*
- S6) **Using computational modeling of cognitive to differentiate between rumination-modes and day-dreaming-modes of mind-wandering**  
Marieke van Vugt  
*University of Groningen*
- S7) **Temporal dynamics of the mind-wandering process**  
Klaus Linkenkaer-Hansen  
*Vrije Universiteit Amsterdam*

Abdijzaal, Talk Session

### Organisation of the visual system (chair: Tomas Knapen)

- T9) **Turtles all the way up: retinotopic maps in frontal cortex**  
D. M. van Es, J. Theeuwes, T. Knapen  
*Vrije Universiteit Amsterdam*
- T10) **Consecutive TBS-fMRI on scene-selective cortex reveals non-specific effects in high-level visual cortex**  
Iris I. A. Groen, Edward H. Silson, Chris I. Baker  
*Laboratory of Brain and Cognition, National Institutes of Health, Bethesda, USA*
- T11) **Retinotopic Organization in the Default Mode Network**  
T. Knapen, D.M. van Es, M. Barendregt  
*Cognitive Psychology Vrije Universiteit Amsterdam*
- T12) **Visual pathways from the perspective of multi-task deep neural networks**  
H. Steven Scholte, Max M. Losch, Kandan Ramakrishnan, Edward H.F. de Haan, Sander M. Bohte  
*University of Amsterdam, department of Brain & Cognition*

Zaal 522, Talk Session

### Clinical (chair: Frederik M. van der Veen)

- T13) **Individuals with autism show typical fMRI repetition suppression, but atypical surprise response**  
Christian Utzerath, Iris C. Schmitz, Jan Buitelaar, Floris P. de Lange  
*Radboud University*
- T14) **Occipital lobe involvement in evoking pupillary responses: evidence from hemianopia patients**  
Marnix Naber, Alessio Fracasso, Carlien Roelofzen, Joris Elshout, Giorgio Porro, Douwe Bergsma, Mies van Genderen, Serge Dumoulin  
*Experimental Psychology, Helmholtz Institute, Faculty of Social Sciences, Utrecht University*
- T15) **The Relation between Depression Symptoms, Neuroticism and Brain Measures of Feedback Learning**  
Frederik M. van der Veen, Adriana Bugnariu, Sabine Peters, Maartje E. Raijmakers, Ingmar H.A. Franken  
*Erasmus University Rotterdam*
- T16) **Auditory sensitivity in adults with autism spectrum disorders: the role of physiological habituation and subjective detection thresholds**  
M.W.M. Kuiper, E.W.M. Verhoeven, H.M. Geurts  
*Dr. Leo Kannerhuis, University of Amsterdam*

## **Friday 15 December, 11:30-12:30**

**Lamoraal zaal, Symposium**

### **Motivation for effort: Neuro-computational mechanisms, physiology and social dynamics (chair: Roshan Cools)**

Motivation is central to adaptive behavior. This symposium outlines the latest findings of the computational, neural and cognitive mechanisms underlying motivated behaviour. This symposium brings together researchers across a broad section of psychology and neuroscience to provide a comprehensive examination of people's willingness to exert effort, its impact on adaptive and social behaviours, and cognitive control.

#### **S8) Adaptive effort allocation by the anterior cingulate cortex**

Eliana Vassena

*Donders Institute for Brain, Cognition and Behavior*

#### **S9) Meta-learning foundations of cognitive control**

Massimo Silvetti

*Ghent University*

#### **S10) How effortful is cognitive control? Evidence from pupillometry, facial EMG, and a novel cardiovascular measure**

Henk Van Steenbergen

*Leiden University*

#### **S11) Prosocial apathy: when helping others is too much effort**

Matthew Apps

*University of Oxford*

**Abdijzaal, Talk Session**

### **Perception & Attention 1 (chair: Artem Belopolsky)**

#### **T17) Statistical Regularities Modulate Attentional Capture**

Benchi Wang, Jan Theeuwes

*Vrije Universiteit Amsterdam*

#### **T18) Rapid updating of spatial working memory across saccades**

Artem V. Belopolsky, Paul J. Boon, Silvia Zeni & Jan Theeuwes

*Vrije Universiteit, Amsterdam*

#### **T19) The content of visual working memory alters processing of visual input prior to conscious access: evidence from pupillometry**

Surya Gayet, Chris Paffen, Matthias Guggenmos, Philipp Sterzer, Stefan Van der Stigchel

*Donders Centre for Cognition*

#### **T20) The acute effects of cocoa flavanols on temporal and spatial attention**

Aytaç Karabay, Jefta D. Saija, David T. Field, & Elkan G. Akyürek

*University of Groningen*

**Zaal 522, Talk Session**

### **Methodological Issues, Development & Aging (chair: Linda Geerligs)**

#### **T21) Voodoo correlations in psi experiments**

Jacob Jolij, Dick Bierman

*Department of Experimental Psychology, University of Groningen*

#### **T22) How to (not) deal with confounds in MVPA: evaluating biases in methods to control confounds**

Lukas Snoek, Steven Miletic, H. Steven Scholte

*Universiteit van Amsterdam*

#### **T23) Psychomotor slowing in obesity and ageing – Mediating effects of inflammation**

Leonie JT Balter, Sarah Aldred, Suzanne Higgs, Jane E Raymond, & Jos A Bosch

*University of Amsterdam (NL), University of Birmingham (UK)*

#### **T24) I did it my way : Explaining age-related declines in inter-subject synchronization during naturalistic viewing**

Linda Geerligs, Cam-CAN, Karen L. Campbell

*Donders Institute for Brain, Cognition and Behaviour*

## **Friday 15 December, 15:30-16:30**

**Lamoraal zaal, Symposium**

### **Chasing down perceptual decision-making through the hierarchy of the visual system (chair: Martijn Wokke)**

It is well known that visual perception emerges from processing through a cortical hierarchy that is structured by multiple gradients. However, it remains unclear how visual information progresses from the detection of low-level features to conscious visual perception. In this symposium, four speakers will demonstrate how cutting-edge tools used in cognitive neuroscience, such as machine learning, brain stimulation and multivariate classification analyses of EEG data, can reveal and reconstruct the complex computational architecture of perceptual decision-making.

#### **S12) Neural decisions under perceptual uncertainty**

Janneke Jehee

*Donders Institute for Brain, Cognition and Behavior*

#### **S13) Decoding the representation, selection and maintenance of invisible stimuli along the visual hierarchy**

Jean-Rémi King

*New York University, USA*

#### **S14) Perceptual integration without conscious access**

Johannes Fahrenfort

*Free University Amsterdam*

#### **S15) Just do it! (and after that have some knowledge about what you just did)**

Martijn Wokke

*City University New York, USA*

**Abdijzaal, Talk Session**

### **Perception & Attention 2 (chair: Fleur L Bouwer)**

#### **T25) Facilitation and inhibition in selective attention: Two sides of the same coin?**

Dirk van Moorselaar, Heleen A. Slagter

*Universiteit van Amsterdam*

#### **T26) Opposite effects of predictability and periodicity on temporal expectations in rhythm**

Fleur L. Bouwer, Henkjan Honing, Heleen A. Slagter

*Amsterdam Brain and Cognition, Universiteit van Amsterdam*

#### **T27) Attention Gates the Selective Encoding of Duration**

Jim Maarseveen, Hinze Hogendoorn, Frans A. J. Verstraten, Chris L.E. Paffen

*Department of Experimental Psychology, Utrecht University*

#### **T28) Preparing for selection: The neural dynamics of temporal prediction (and its violation) in visual search**

Joram van Driel, Christian N.L. Olivers

*Vrije Universiteit Amsterdam*

**Zaal 522, Talk Session**

### **Memory, Learning & Encoding (chair: Rene Zeelenberg)**

#### **T29) Visual memory: The price of encoding details**

Mark Nieuwenstein, Maria Kromm

*University of Groningen*

#### **T30) An ecologically rational theory of set size effects in visual working memory and attention**

Ronald van den Berg, Wei Ji Ma

*Uppsala University, New York University*

#### **T31) Exploring the hidden states of auditory and visual working memory**

Güven Kandemir, Michael Wolff, Mark Stokes, Elkan Akyürek

*University of Groningen*

#### **T32) Action Correspondence Effects: Evidence for Automatic Activation of Afforded Actions?**

Rene Zeelenberg, Diane Pecher

*Erasmus University Rotterdam, Erasmus University Rotterdam*

**Saturday 16 December, 9:00-10:00**

**Lamoraal zaal, Symposium**

**Towards Realistic Social Experiments: The Case for Integrative Social Decision-Making Research**

When making social decisions in the real world (e.g. cooperation, trust, exploitation), the human brain integrates many cues, from physiology and faces to motivational states and social norms. By manipulating, measuring and modeling this wide array of signals in realistic experimental paradigms, we are working towards an ecologically valid science of social behavior. The developments we present involve innovative methods that will appeal to all sub-fields of psychonomics, ranging from pupillometry to multivariate neuroimaging analysis, and facilitate asking new questions about the real-world experiences of humans.

**S16) The Neural and Computational Substrates of Moral Phenotypes in Social Decision-Making**

Jeroen van Baar

*Donders Institute for Brain, Cognition and Behavior*

**S17) The Role of Pupil Mimicry in Social Cognition**

Eliska Prochazkova

*Leiden University*

**S18) Differential Neural Processing of Predator and Prey Behavior**

Michael Giffin

*Leiden University*

**S19) The Role of Automatic Defensive Reactions in Instrumental Social Approach-Avoidance Decision-Making**

Karin Roelofs

*Radboud University*

**Abdijzaal, Talk Session**

**Perception & Attention 3 (chair: Chris Olivers)**

**T33) Choices bias the accumulation of perceptual evidence in the next trial**

Anne E. Urai, Tobias H. Donner

*University Medical Center Hamburg-Eppendorf*

**T34) The dynamics and control of semantic selection in visual search**

Christian N. L. Olivers, Floor de Groot, Falk Huettig

*Vrije Universiteit Amsterdam*

**T35) Probabilistic forward replay of stimulus sequences in human visual cortex**

Matthias Ekman, Giulia Gennari, Floris P. de Lange

*Radboud University Nijmegen*

**T36) The location of covert spatial attention is continuously reflected by pupil size**

Schut, Martijn J., Maarseveen, Jim, Fabius, Jasper H., Wittenberg, Annelies C., Van der Stoep, Nathan, & Van der Stigchel, Stefan

*Utrecht University*

**Zaal 522, Talk Session**

**Wandering, Rumination & Fatigue (chair: Niels Taatgen)**

**T37) The Wandering Self: Tracking Self-Generated Thought in a Cognitively Demanding Context**

Stefan Huijser, Marieke K. van Vugt, Niels A. Taatgen

*University of Groningen*

**T38) Modelling Rumination: Understanding the Cognitive Mechanisms of Mind-Wandering in the Depressed Mind**

Maarten van der Velde, Marieke K. van Vugt

*Department of Artificial Intelligence, University of Groningen*

**T39) Mental Fatigue - Motivation Interaction and Measurement Using Psychophysiological Instruments**

MB Herlambang, NA Taatgen, F Cnossen

*Department of Artificial Intelligence and Cognitive Engineering University of Groningen*

**T40) We can't stop thinking**

Niels Taatgen

*University of Groningen*

## Saturday 16 December, 11:30-12:30

### Lamoraal zaal, Symposium

#### The storytelling mind: The potential of using stories in cognitive neuroscience (chair: Roel Willems)

Stories are an important ingredient of human cognition. In this symposium researchers from diverse fields of cognitive neuroscience illustrate the potential of using stories as stimuli to increase ecological validity while retaining experimental control. The talks demonstrate that previous methodological issues with stories as stimuli have been overcome, and showcase their potential as a powerful combination of experimental control with ecological validity.

##### S20) Narratives as a natural kind for the brain

Roel Willems

*Radboud University & Max Planck Institute for Psycholinguistics*

##### S21) Memory formation and narratives

Branka Milivojevic

*Erasmus University Rotterdam & Donders Institute Nijmegen*

##### S22) Narratives in emotion regulation

Dalya Samur

*Free University Amsterdam*

##### S23) Insights into mental simulation via narratives

Marloes Mak

*Radboud University Nijmegen*

### Abdijzaal, Talk Session

#### Predictive coding & probability representations (chair: Richard Ridderinkhof)

##### T41) Does expectation sharpen or silence perceptual processing of action outcomes? An fMRI MVPA study

Daniel Yon; Sam J Gilbert; Floris de Lange; Clare Press

*Department of Psychological Sciences, Birkbeck, University of London;*

##### T42) Turning goalkeepers into penalty killers through mental training: A predictive-processing theory approach

K. Richard Ridderinkhof, Lukas Snoek, Janna Cousijn, A. Dilene van Campen

*University of Amsterdam*

##### T43) Role of IT in perceptual prediction

David Richter, Matthias Ekman, Floris P. de Lange

*Donders Institute for Brain Cognition and Behaviour; Radboud University Nijmegen*

##### T44) Prior knowledge and visual processing

Mariya E. Manahova, Pim Mostert , Peter Kok, Jan-Mathijs Schoffelen, Floris P. de Lange

*Donders Institute for Brain, Cognition and Behaviour, Radboud University Nijmegen,*

### Zaal 522, Talk Session

#### Reward, awareness & illusions (chair: Simon van Gaal)

##### T45) I know what you mean (but I may not see it) - Semantic processing in absence of awareness

Valeria Mongelli, Erik Meijs, Simon Van Gaal, Peter Hagoort

*Neurobiology of Language Department - Max Planck Institute for Psycholinguistics Nijmegen*

##### T46) Reward value and probability representations in the cortex, and the role of catecholamines

Iris Schutte, J. Leon Kenemans

*Dept. of experimental psychology Utrecht University*

##### T47) The effect of reward- and goal-driven attentional biases on oculomotor control

Daniel Preciado, Jan Theeuwes

*VU Amsterdam*

##### T48) No consistent cooling of the real hand in the rubber hand illusion

Alyanne M. de Haan , Haike E. Van Stralen, Miranda Smit, Anouk Keizer, Stefan Van der Stigchel, H. Chris Dijkerman

*Utrecht University*

**Saturday 16 December, 13:30-14:30**

**Lamoraal zaal, Symposium**

**It was twenty-five years ago today: the two-pathway model of perception (chair: Edward de Haan)**

The prevailing view of the functional architecture of the perceptual brain suggests that the different cortical areas or “maps” are organized into two major pathways, one involved in recognition and memory (the ‘what’ pathway) and the other in the programming of action (the ‘how’ pathway). Recently, basic aspects of this model have been questioned. In this symposium, a number of critical issues will be discussed, and this will lead us to the question whether we need to adapt the current model.

**S24) Interacting with objects in space**

Sara Fabbri

*University of Nevada*

**S25) Illusions of two visual pathways**

Jeroen Smeets

*Free University Amsterdam*

**S26) Dynamic representations of visual space for perception and action**

Pieter Medendorp

*Radboud University*

**S27) Somatosensory perception: many bodies in the brain**

Chris Dijkerman

*Utrecht University*

**Abdijzaal, Talk Session**

**Perception & Attention 4 (chair: Anouk van Loon)**

**T49) Discrimination Judgments Alter the Appearance of Visual Stimuli**

Matthias Fritzsche & Floris P. de Lange

*Donders Institute for Brain, Cognition and Behaviour*

**T50) Statistical regularities induce spatial as well as feature-specific suppression in visual search**

Michel Failing, Jan Theeuwes

*Vrije Universiteit Amsterdam*

**T51) The fMRI contrast response function to natural images is enhanced according to local subjective importance**

Zuiderbaan, W., Dumoulin, S.O.

*Spinoza Centre for Neuroimaging*

**T52) Current and future goals warp object category space in opposite directions**

Anouk M. van Loon, Johannes J. Fahrenfort, Christian N. L. Olivers

*Vrije Universiteit Amsterdam*

**Zaal 522, Talk Session**

**Memory & Learning (chair: Jaap Murre)**

**T53) Seeing the past: familiarity as a perceptual judgment**

Martijn Meeter, Lianne de Vries

*Vrije Universiteit Amsterdam*

**T54) Subjective confidence reveals the hierarchical nature of learning**

Micha Heilbron, Florent Meyniel

*Cognitive Neuroimaging Unit of NeuroSpin Center of Commissariat à l'Énergie Atomique et aux Énergies Alternatives*

**T55) A new theory of memory consolidation: Retention of long-term memory despite randomly fluctuating neural connections**

Jaap Murre

*University of Amsterdam*

**T56) How working memory benefits from dynamic temporal packaging**

Elkan Akyurek, Michael Wolff

*University of Groningen*

**Action and motor control****P1) Anticipation of positive emotional signals can lead to robust modulations of action tendencies**

Vincent Hoofs, C. Nico Boehler, Onur Asci, Ruth M. Krebs

*Department of Experimental Psychology, Ghent University, Belgium***P2) Elite soccer players exhibit stronger connectivity in fronto-striatal-cerebellar network during rest**

Zai-Fu Yao, David Moreau, Shulan Hsieh, Cheng-Ta Yang, Chia-Liang Tsai, K. Richard Ridderinkhof, Ilja G. Sligte, Chun-Hao Wang

*Brain & Cognition, Department of Psychology, University of Amsterdam***P3) Vestibular input modulates visuomotor feedback responses in reaching**

Leonie Oostwoud Wijdenes, W. Pieter Medendorp

*Radboud University***P4) Training to stop or to kick a penalty! A practical implementation of a predictive processing theory approach in goalkeeping**

A.D.(Dilene) van Campen, K.R.(Richard) Ridderinkhof

*Universiteit van Amsterdam***P5) Alignment Effects for Pictured Objects: Do Instructions to "Imagine Picking Up an Object" Prime Actions?**

Emily Thomas, Nic Stötefalk, Diane Pecher, René Zeelenberg

*Erasmus University Rotterdam***P6) Optimized sequential motor control in a virtual robot arm**

Roy de Kleijn, George Kachergis, Bernhard Hommel

*Leiden University***P7) Is Acceptance and commitment therapy (ACT) effective on the academic resilience of children with anxiety?**

Mercede Erfanian, Azita Keshavarz

*Maastricht University***Clinical****P8) An fMRI study on the effect of cue reactivity on striatal reward anticipation in alcohol dependent patients**

T. van Timmeren, Ruth J. van Holst, Anna E. Goudriaan

*Academic Medical Center, Department of Psychiatry***P9) A single-dose of guanfacine in unilateral neglect improves visual search, but not sustained attention, working memory, or search organisation**

Edwin S. Dalmajer, Korina M.S. Li, Nikos Gorgoraptis, Alexander P. Leff, David L. Cohen, Masud Husain, Paresh A. Malhotra.

*University of Oxford***P10) Bedside EEG in detecting delirium superimposed on dementia**

Viona J. Wijnen, Arjen J.C. Slooter, Willem. A. van Gool

*Donders Institute for Brain, Cognition and Behaviour***Cognitive control****P11) Is the frontal cortex differently involved in free and forced target choice during multiple-target search**

Eduard Ort, Johannes J. Fahrenfort, Reshanne R. Reeder, Falko R. Kaule, Michael Hanke, Stefan Pollmann, Christian N. L. Olivers.

*VU Amsterdam Department of Applied and Experimental Psychology***P12) Implicitly conditioned stimulus-effect associations can affect metacontrol states.**

van Dooren, R., Sellaro, R., &amp; Hommel, B.

*Leiden University***P13) Failures to induce habits in humans using existing outcome devaluation paradigms**

S. de Wit, M. Kindt, S.L. Knot, A.A.C. Verhoeven, T.W. Robbins, Julia Gasull-Camos, Michael Evans, Hira Mirza, C.M. Gillan

*Department of Clinical Psychology, University of Amsterdam***P14) Effects of acute tyrosine supplementation on cognitive effort valuation in older adults**

Monja Froböse, Mirjam Bloemendaal, Andrew Westbrook, Esther Aarts, Roshan Cools

*Donders Institute, Radboud University, Nijmegen, the Netherlands*

**P15) Neuronal Avalanches as Marker for Arithmetic Cognition during transcranial Random Noise Stimulation (tRNS) in relation to Learning and Overlearning**

Nienke E. R. van Bueren  
*University of Utrecht*

**P16) Overtraining does not lead to habit formation in the Sneaky Snack Game (yet?)**

Irene van de Vijver, Poppy Watson, Sanne de Wit  
*University of Amsterdam*

**P17) Microdosing psychedelics: The key to creativity?**

Dominique P. Lippelt, Luisa Prochazkova, Lorenza S. Colzato, Zsuzsika Sjoerds, Bernhard Hommel  
*Leiden University*

**P18) Did I do that? Expectancy effects of brain stimulation on error-related negativity and sense of agency.**

Suzanne Hogeweegen, Uffe Schjoedt, Michiel van Elk  
*Universiteit van Amsterdam*

**P19) Clustering and switching behavior in fluency tasks: Gaining additional insight into cognitive metacontrol**

Vera Mekern, Zsuzsika Sjoerds, Bernhard Hommel  
*Leiden University*

**P20) Dopaminergic effects on choice bias in Parkinson's disease**

Annelies van Nuland, Rick Helmich, Ivan Toni, Roshan Cools, Hanneke den Ouden  
*Donders Institute for Brain cognition and behavior*

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## Decision making and reasoning

**P21) Neurocomputational mechanisms of (overcoming) motivational biases in instrumental action**

Jennifer C. Swart, Jessica I. Määttä, Michael J. Frank, Ole Jensen, Roshan Cools, Hanneke E.M. den Ouden  
*Donders Institute for Brain cognition and behavior*

**P22) Reward expectancy modulates corticospinal excitability depending on action requirements during task preparation**

Carsten Bundt, Lara Bardi, Frederick Verbruggen, C. Nico Boehler, Marcel Brass, Wim Notebaert  
*Department of Experimental Psychology, Ghent University*

**P23) Cortical dynamics reflecting Bayesian surprise about the timing of perceptual events**

Thomas Meindertsma, Niels A. Kloosterman, Andreas K. Engel, Eric-Jan Wagenmakers, Tobias H. Donner  
*Amsterdam Brain and Cognition, University of Amsterdam, Amsterdam, Netherlands*

**P24) Hierarchical Bayesian modeling of reinforcement learning in Parkinson's disease**

Brónagh McCoy, Gwenda Engels, Sara Jahfari, Tomas Knapen, Jan Theeuwes  
*Vrije Universiteit*

**P25) Action kinematics at 10 months are associated with later social abilities at 14 months in infants at high and low risk for developing autism**

Rosanna Edey, Emily Jones, Jannath Begum, Tony Charman, Mark Johnson, Clare Press and The BASIS Team  
*Birkbeck University of London*

**P26) Win for your kin: NAcc responses to personal and vicarious rewards in mothers and their children**

Jochem Spaans, Sarah Burke, Sibel Altikulac, Zdena Op De Macks, Eveline Crone  
*Leiden University*

**P27) Different mouse-patterns in the ageing population**

Marlon de Jong, Jacob Jolij, Monique M. Lorist  
*Rijksuniversiteit Groningen*

**P28) Aging and Sensitivity to Illusory Target Motion - Association with Problems with Activities of Daily Life**

Alix L. de Dieuleveult, Anne-Marie Brouwer, Petra C. Siemonsma, Jan B.F. van Erp  
*TNO, University of Twente*

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## Emotion

**P29) Hearing an emotional face: Visual emotion recalibrates auditory perception.**

Martijn Baart, Jean Vroomen  
*Tilburg University*

**P30) Pupilometry as a measure of emotional processing and withdrawal responses to robotic faces**

Marnix Naber, Anne Reuten, Maureen van Dam  
*Utrecht University*

**P31) Decoding Emotions from EEG patterns using Machine Learning**

Hans Revers, Marcel Bastiaansen, Katrijn Van Deun, Jean Vroomen  
*Tilburg University*

**P32) Fear improves unconscious visual processing of coarse low spatial frequency information**

Manon Mulckhuyse, Maria Lojowska, Erno Hermans, Karin Roelofs  
*Radboud University*

## Memory and learning

- P33) Does Reading Literary Fiction Improve Theory of Mind? Two replication studies of Kidd & Castano (2013)**  
 Katinka Dijkstra, Peter Verkoeijen, Rolf Zwaan  
*Erasmus University & Learning and Innovation Centre, Avans University of Applied Sciences*
- P34) Neural mechanisms underlying learning efficacy in aging.**  
 Tineke de Haan, Berry van den Berg, Marty Woldorff, André Aleman, Monique Lorist  
*University of Groningen*
- P35) COMT Val/Met polymorphism does not modulate the effect of transcranial direct current stimulation on working memory in healthy humans**  
 Aleksandra Loseva, Bryant J. Jongkees, Michael A. Nitsche, Lorenza S. Colzato  
*Leiden University*
- P36) Cognitive Modeling of Cardiopulmonary Resuscitation Knowledge and Skill Spanning Months to Years**  
 Maass, S., Sense, F., Walsh, M., Gluck, K., & Van Rijn, H.  
*University of Groningen*
- P37) Which aspects of an intervening task affect visual working memory?**  
 Ingmar E.J. de Vries, Joram van Driel, Christian N.L. Olivers  
*Vrije Universiteit Amsterdam*
- P38) Strengthening episodic memories by stimulating arousal during reconsolidation**  
 Olivier de Vries, Sascha Duken, Merel Kindt, Vanessa van Ast  
*Department of Clinical Psychology, University of Amsterdam*
- P39) Influences of monetary incentives on working-memory performance and time perception**  
 Michel Quak, Ruth Krebs  
*Ghent University*
- P40) A Comparison of Visual Working Memory and Episodic Memory Performance in Relation to Aging**  
 Selma Lugtmeijer, Edward H. F. de Haan, Roy P. C. Kessels  
*Donders Institute for Brain, Cognition and Behaviour, Radboud University*
- P41) The Neural Correlates of Cued and Contextual Fear of Touch-Related Pain**  
 Emma E. Biggs, Rainer Goebel, Ann Meulders, Johan W. S. Vlaeyen, Amanda L. Kaas  
*Research Group Health Psychology, Leuven University*
- P42) Testing the effect of pupil size on perceived brightness**  
 Intan K. Wardhani, Sebastiaan Mathôt  
*University of Oslo, Norway*

## Perception and attention

- P43) The effects of reward on encoding and maintaining information in visual short-term memory**  
 Rosyl S. Somai, Masud Husain, & Edwin S. Dalmaijer  
*Department of Experimental Psychology, Utrecht University*
- P44) Influences of transcutaneous vagus nerve stimulation on the alerting system: evidence from the attentional network task**  
 Alessandra Finisguerra, Bryant J. Jongkees, Lorenza S. Colzato  
*Leiden University*
- P45) Detection of audio signals in driving and autonomous driving as revealed by the frontal-p3 ERP Remo**  
 M.A. van der Heiden, Christian P. Janssen, Lotte E.S. Hardeman, Keri Mans, Stella F. Donker, J. Leon Kenemans  
*Experimental Psychology & Helmholtz Institute, Utrecht University*
- P46) Elucidating the role of the prefrontal cortex in phenomenal consciousness in a no-report paradigm**  
 Andrés Canales-Johnson, Lola Beerendonk, Will J. Harrison, Simon van Gaal  
*University of Amsterdam*
- P47) EEG dynamics of negative templates for visual search.**  
 Blaire Dube, Ingmar E. J. de Vries, Joram van Driel, Christian N. L. Olivers  
*University of Guelph, Vrije Universiteit Amsterdam*
- P48) Change Blindness: Is V1 actually blind?**  
 Akhil Edadan, Wietske Zuiderbaan, Alessio Fracasso, Serge Dumoulin  
*Utrecht University*
- P49) Electrical stimulation of the dorsolateral prefrontal cortex during an attentional blink task: ERP and behavioral effects**  
 Leon C. Reteig, Lionel Newman, K. Richard Ridderinkhof, Heleen A. Slagter  
*University of Amsterdam*

**P50) Exploring the off-focus state of a wandering mind during task performance**

E. Jubera-Garcia, W. Gevers, F. Van Opstal  
*ULB & UvA*

**P51) Neural markers of memory consolidation do not predict temporal estimates of encoded items.**

w. Robbert van der Mijn, Atser Damsma, Hedderik van Rijn  
*University of Groningen*

**P52) Using the SSVEP to evaluate the role of the SNARC effect on covert spatial attention.**

Anderson Mora-Cortes, K. Richard Ridderinkhof, Michael X Cohen  
*Department of Psychology, University of Amsterdam*

**P53) Medial frontal theta-band activity triggered by unattended conflict, but not for long...**

Stijn Nuitjen, Simon van Gaal  
*Universiteit van Amsterdam*

**P54) Neural correlates of consciousness in the medial temporal lobe: an intracranial EEG study of attentional blink.**

J.D. Herring, T.P. Reber, F. Mormann, H.A. Slagter  
*Department of Psychology-University of Amsterdam*

**P55) Robustness of Individual Differences in Temporal Interference Effects**

Nadine Schlichting, Ritske de Jong, Hedderik van Rijn  
*University of Groningen*

**P56) Prior expectation modulates early auditory responses and representations**

Biao Han, Pim Mostert, Floris P. de Lange  
*Donders Institute for Brain, Cognition and Behaviour*

**P57) Statistical regularities bias eye movements**

Iliana Samara, Benchí Wang, Jan Theeuwes  
*Vrije Universiteit Amsterdam*

**P58) On the existence of a gustatory ‘white’**

Garmit Dijksterhuis, Sanne Boesveldt  
*Consumer Understanding Group Wageningen Food and Biobased Research Wageningen the Netherlands*

**P59) Using placebo analgesia to study sensory precision in autism and alexithymia**

Eri Ichijo, Michel-Pierre Coll, Geoffrey Bird  
*MRC Social, Genetic & Developmental Psychiatry Centre, King's College London*

**P60) Limitations of pupillometry as a measure of mental effort during product search on webpages**

Felix HermSEN, Naber Marnix  
*Experimental Psychology, Helmholtz Institute, Faculty of Social Sciences, Utrecht University*

**P61) Neural Correlates of Impaired Motor-Auditory Prediction in Autism Spectrum Disorder**

Thijs van Laarhoven, Jeroen J. Stekelenburg, Jean Vroomen  
*Department of Cognitive Neuropsychology Tilburg University*

**P62) The eye’s pupil does not imitate others’ pupil sizes but it does respond to negative emotional expressions**

Madou Derksen, Juliette van Alphen, Sander Schaap, Marnix Naber  
*Experimental Psychology, Helmholtz Institute, Faculty of Social Sciences, Utrecht*

**P63) Neither predictions nor attention modulate the first feedforward-sweep of cortical information processing**

Josipa Alilovic, Bart Timmermans, Leon C. Reteig, Simon van Gaal, Heleen A. Slagter  
*Department of Psychology, University of Amsterdam, Amsterdam, The Netherlands*

**P64) The effects of alpha-band electrical stimulation over fronto-parietal regions on spatial attention.**

Martine R. van Schouwenburg, Lynn Sørensen, Raza de Clerk, Leon C. Reteig, Heleen A. Slagter  
*University of Amsterdam*

**P65) Probing visual field integrity using an anatomical measure of the stria of Gennari at ultra-high field MRI**

Carlien Roelofzen, Alessio Fracasso, Giorgio Porro, Douwe Bergsma, Mies van Genderen, Serge Dumoulin  
*Spinoza Centre for Neuroimaging, Spinoza Centre for Neuroimaging*

**P66) An integrated view of visual lateralization**

Sanne G. Brederoo, Lise Van der Haegen, Marc Brysbaert, Mark R. Nieuwenstein, Frans W. Cornelissen,  
 Monique M. Lorist  
*Experimental Psychology University of Groningen*

**P67) Freezing modulates early visuocortical activity in humans**

Maria Lojowska, Sam Ling, Karin Roelofs, Erno Hermans  
*Radboud University*

**P68) No Evidence For Improved Attention Towards Implicit Temporal Regularities**

Atser Damsma, Ritske de Jong, Niels Taatgen, Hedderik van Rijn  
*University of Groningen*

**P69) The role of Border-Ownership in Backward Metacontrast Masking**

D.E. Dijksterhuis, P.R. Roelfsema, M.W. Self  
*Netherlands Institute for Neuroscience*

**P70) A comparison of different correction methods for geometrical distortions in submillimeter functional MRI**

Gilles de Hollander, Wietske van der Zwaag, Tomas Knapen  
*Vrije Universiteit Amsterdam*

**P71) Linear responses across visual cortex lamina using sub-millimetre resolution fMRI**

Jelle A. van Dijk, Alessio Fracasso, Serge O. Dumoulin  
 Spinoza Centre for Neuroimaging

**P72) The temporal dynamics of conscious and unconscious processing: An EEG decoding study**

Matthew Weaver, Johannes Fahrenfort, Artem Belopolsky, Simon van Gaal  
 University of Amsterdam

**Friday, Poster Session 2 (13:30-15:30)****Action and motor control****P1) What cognition is for and why that matters for doing research**

Sebo Uithol  
*Radboud University Nijmegen*

**P2) The influence of action-outcome contingency on motivation from control**

Tegan Penton, Caroline Catmur, & Geoffrey Bird  
*Kings College London*

**P3) Remapping of the global effect across saccades**

Kiki Arksteijn ,Jeroen Smeets, Mieke Donk, Artem Belopolsky  
*VU Amsterdam*

**P4) How to become a maestro**

Joram van Ketel, Susan Williams, Guido Band  
*Leiden University*

**P5) To what extent does motor imagery resemble motor preparation?**

Rob H.J. Van der Lubbe, Jagna Sobierajewicz, Marijtje Jongasma, Anna Przekoracka-Krawczyk  
*University of Twente*

**Clinical****P6) Remote heart rate detection with a webcam**

Koen van der Kooij, Marnix Naber  
*Utrecht University*

**P7) Measuring fear trajectories: development of a short fear conditioning task**

F.E. van der Flier, N. A. Leen, P. Duits, J. M. P. Baas  
*Department of Experimental Psychology; Utrecht University*

**P8) A probabilistic atlas of the VTA based on 7T high-resolution MR data**

Anne C. Trutti, Laura Fontanesi, Martijn Mulder, Bernhard Hommel, Birte Forstmann  
*Leiden University*

**P9) A role for orbitofrontal learning signals in flexibility and clinical compulsive symptoms in obsessive-compulsive disorder**

Zsuzsika Sjoerds, Lennart Luettgau, Sebastian Olbrich, Martin Huss, Ina Jahn, Lorenz Deserno, Katarina Stengler, Florian Schlagenauf  
*Max Planck Institute for Human Cognitive and Brain Sciences (Leipzig Germany), Leiden*

**Cognitive control****P10) Variable heart rate and a flexible mind: higher resting-state heart rate variability predicts better task-switching**

Matthijs C. de Wit, Lorenza S. Colzato, Melle J. W. van der Molen, Laura Steenbergen  
*Leiden University*

**P11) Working Memory with Selective Gating: Attentional Tags and Internal Actions**

Wouter Kruijne, Sander M. Bohte, Pieter R. Roelfsema, Christian N. L. Olivers  
*VU Amsterdam*

**P12) Curiosity varies with uncertainty, not expected value of information**

Lieke L. F. van Lieshout, Annelinde R. E. Vandebroucke, Nils C. J. Muller, Roshan Cools, Floris P. de Lange  
*Donders Institute, Radboud University, Nijmegen*

**P13) Meditation-induced cognitive-control states affect the top-down control of feature binding**

Luisa Prochazkova, Roberta Sellaro, Lorenza S. Colzato, Bernhard Hommel  
*Leiden University*

**P14) Developing an EEG biomarker of mind-wandering**

Christina Y Jin; Marieke van Vugt; Jelmer Borst  
 Institute of Artificial Intelligence, University of Groningen

**P15) The effect of flexibility-promoting versus persistence-promoting dual-task training on creativity.**

Heijnen, S., Sellaro, R., Hommel, B.  
 Leiden University Cognitive Psychology Unit

**P16) Conditioning task switching behavior**

Senne Braem  
 Department of Experimental Psychology, Ghent University

**P17) Color vision predicts individual differences in dopamine function and metacontrol state**

Bryant J. Jongkees, Laura Steenbergen, Antonino Valessi, Lorenza S. Colzato  
 Leiden University

**P18) High vagally mediated resting-state heart rate variability is associated with superior action cascading**

Laura Steenbergen, Lorenza S. Colzato  
 University of Amsterdam

**P19) Meditation-induced cognitive-control states affect moral decisions**

Roberta Sellaro, Bernhard Hommel  
 Leiden University

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**Decision making and reasoning****P20) Of lies and men: increasing honesty through visual saliency**

Marcella Fratescu, Andrea Pittarello, Sebastiaan Mathot  
 University of Groningen

**P21) Pupil responses are indicators of value-based decision-making**

Joanne C. Van Slooten, Sara Jahfari, Tomas Knapen, Jan Theeuwes  
 Vrije Universiteit Amsterdam

**P22) Sampling Incidental Mental Arithmetic in Everyday Life**

Oliver Lindemann  
 Erasmus University Rotterdam

**P23) When do second chances matter? Conditions under which second chances promote risky behavior.**

Rob Nijenkamp, Mark Nieuwenstein, Ritske de Jong, Monique Lorist  
 University of Groningen

**P24) Active inference, curiosity and insight**

Sacha Ondobaka, Friston, K.J., Lin, M., Frith, C.D., Pezullo, G., Hobson, J.A.  
 Wellcome Trust Centre for Neuroimaging, UCL

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**Development and aging****P25) Alexithymic traits mediate the association between puberty and symptoms of depression and anxiety in adolescent females**

Renske van der Cruijsen, Jennifer Murphy, Eveline A. Crone, Geoffrey Bird  
 Department of developmental psychology: Leiden University

**P26) Impaired recognition of posture and emotions conveyed through posture in older adults**

James Chard, Rosanna Edey, Daniel Yon, Jennifer Murphy, Geoffrey Bird, Clare Press  
 Birkbeck College

**P27) Socio-emotional impact of interoceptive changes across the lifespan**

Jennifer Murphy, Edward Millgate, Hayley Geary, Caroline Catmur, Geoffrey Bird  
 King's College London

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**Language****P28) Grammatical Aspect and Motion Event Endpoints in Dutch and Chinese Language**

yiyun Liao, Monique Flecken, Katinka Dijkstra, Rolf A. Zwaan  
 Erasmus University Rotterdam

**P29) Alpha Oscillations as Neural Marker for Context induced Constraints during Sentence Processing**

René Terporten, Anne Kösem, Jan-Mathijss Schoffelen, Peter Hagoort  
 Max Planck Institute for Psycholinguistics

**P30) Parallel syntactic processing in reading: The sentence superiority effect**

Joshua Snell, Jonathan Grainger  
 Aix-Marseille University, Brain & Language Research Institute, CNRS

## Memory and learning

### P31) Learning like us: Q-learning in a sequential learning task

Myrna van den Berg, Rob Camstra  
Leiden University

### P32) Can misleading information change a memory through reconsolidation?

Sascha B. Duken, Merel Kindt, Vanessa van Ast  
University of Amsterdam

### P33) Pupil Constrictions During Encoding Predict Later Recognized Images, but Not Later Recognized Words

Y. K. Adams, W. Wiradhang, S. Mathot, M. R. Nieuwenstein  
University of Groningen

### P34) Experimentally induced inflammation decreases the ability to flexibly update reward-seeking behaviour

Leonie JT Balter, Sasha Hulskens, Sarah Aldred, Suzanne Higgs, Jane E Raymond, Jet JCS Veldhuijzen van Zanten, Jos A Bosch  
University of Amsterdam

### P35) The relation between oscillatory synchrony and specific cognitive operations in an associative recognition memory task

Oscar Portoles, Jelmer Borst, Marieke van Vugt  
University of Groningen

### P36) Integrating educational knowledge: Reactivation of prior knowledge during educational learning enhances memory integration

Marlieke van Kesteren, Lydia Krabbendam, Martijn Meeter  
Vrije Universiteit Amsterdam

### P37) A Metacognitive Catch 22?

Mario de Jonge, Noortje Coppens, Gerdien van Eersel, Peter Verkoeijen, Huib Tabbers, & Liesbeth Kester  
Utrecht University

### P38) Validation: Knowledge- and Text-based Monitoring during Reading

Marloes van Moert, Arnout Koornneef, Paul van den Broek  
Leiden University

### P39) Monitoring information during reading: investigating the role of working memory in a dual-task paradigm

Amy de Bruïne, Dietsje Jolles, Paul van den Broek

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## Perception and attention

### P40) Multi-sensory Integration and Pupil Response

Chiara Notaro, Nathan van der Stoep, Maarten van der Smagt, Marnix Naber  
Experimental Psychology, Helmholtz Institute, Faculty of Social Sciences, Utrecht University

### P41) The uniformity illusion - see an illusion arising while you look

Yair Pinto & Marte Otten  
University of Amsterdam

### P42) Feature priming elicits center surround inhibition

Paul Boon, Artem Belopolsky  
Vrije Universiteit Amsterdam

### P43) Trial-to-trial variability of spontaneous neural oscillations predicts the temporal sensitivity of multisensory perception

Raquel London, Christopher Benwell, Roberto Cecere, Michel Quak, Gregor Thut, Durk Talsma  
Ghent University

### P44) "If you eat that apple I might have to kill you"; A disproportionately negative response to particular sounds

Iza Korsmit & Romke Rouw  
University of Amsterdam

### P45) Perceptual learning supports the bias in future value-driven decisions

Sara Jahfari, Tomas Knapen, Jan Theeuwes  
Vrije Universiteit van Amsterdam

### P46) Eye dominance, a multifaceted phenomenon with variable definitions and expressions

Yun Ding, Marnix Naber, Surya Gayet, Chris Paffen, Stefan van der Stigchel  
Utrecht University

### P47) Uncertainty in cortical stimulus representations predicts serial dependence effects in orientation perception

Ruben S. van Bergen, Janneke F.M. Jehee  
Donders Institute for Brain, Cognition and Behavior

### P48) Breaking continuous flash suppression: Not so special after all

Timo Stein, Deema Awad, Marius Peelen  
University of Amsterdam

**P49) The self-generated full body illusion: consequences for tactile processing**

Lieke Swinkels, Hein van Schie, Harm Veling, Arjan ter Horst, Ap Dijksterhuis  
Radboud University

**P50) Why we are looking in the wrong direction in the search for the neural correlates of consciousness**

Jolien C. Francken, Johannes J. Fahrenfort, Simon van Gaal  
University of Amsterdam

**P51) Neural oscillations in the perception of audiovisual synchrony**

Marcel Bastiaansen, Hermine Berberyan, Jeroen Stekelenburg, Jean Vroomen  
Tilburg University

**P52) Joint attention facilitates sensory processing at attended location**

Maartje C. de Jong, Chris Dijkerman  
Utrecht University

**P53) Predictive remapping of visual features beyond saccadic targets**

Tao He, Matthias Fritzsche, Floris P. de Lange  
Donders Institute for Brain, Cognition and Behaviour, Radboud University

**P54) Evidence for the world as external memory: a trade-off between internal and external visual memory storage**

Stefan van der Stigchel, Rosyl S. Somai, Martijn J. Schut,  
Utrecht University

**P55) Radial asymmetries in population receptive field size and cortical magnification factor in early visual cortex**

Ben M Harvey, Jan W Brascamp, Sónia Ferreira, Miguel Castelo-Branco, Serge O Dumoulin, Maria Fatima Silva  
Utrecht University

**P56) Deep Convolutional Neural Networks reveal a crucial role of mid- and high-level features in the conscious access to natural images**

Daniel Lindh, Sara Asseconti, Ilja Sligte, Kimron Shapiro, Ian Charest  
University of Birmingham, United Kingdom

**P57) Action blindsight and antipointing in a hemianopic patient**

Smits, A.R., Heywood, C.A., Seijdel, N., Kentridge, R.W. & de Haan, E.H.F.  
Department of Psychology, University of Amsterdam

**P58) Confidence as a diagnostic tool for perceptual aftereffects**

Regan Gallagher, Derek Arnold  
University of Queensland

**P59) The neural substrate of disorganized visual search on cancellation tasks revealed by lesion-symptom mapping**

AF Ten Brink, JM Biesbroek, HJ Kuijf, S Van der Stigchel, Q Oort, JMA Visser-Meily, TCW Nijboer  
University Medical Center Utrecht

**P60) Comparing human and convolutional neural network performance on scene segmentation**

Noor Seijdel, Max M. Losch, Edward H.F. de Haan, H. Steven Scholte  
University of Amsterdam

**P61) The impact of asymmetrical hearing loss on multisensory integration: Sensory conflict increases saccade latencies to audiovisual stimuli**

Van der Stoep, N., Groenewege, B.J.H., Van der Stigchel, S.  
Utrecht University

**P62) Masked-priming of visual-words: interpretation of ERPs in a neural architecture of cognition**

Pieter de Vries, Berry Wijers  
University of Groningen

**P63) Rapid temporal recalibration to asynchronous audiovisual occurs unconsciously**

Erik Van der Burg, David Alais, John Cass  
Vrije Universiteit Amsterdam

**P64) Prioritized access to awareness of the naked human body obscured by systematic variations in image-properties**

Sjoerd Stuit, Martijn Barendregt, Susan te Pas  
Vrije Universiteit Amsterdam

**P65) Ultrafast HRF and pRF estimation with deep learning**

Umut Güçlü, Yağmur Güçlütürk, Luca Ambrogioni, Eric Maris, Rob van Lier, Marcel van Gerven  
Radboud University, Donders Institute for Brain, Cognition and Behaviour, Nijmegen, the Netherlands

**P66) Monotonic responses to numerosity in early visual cortex**

Tuomas ten Cate, Ben Harvey  
Experimental Psychology, Helmholtz Institute, Utrecht University

**P67) The Dr Who Project: Neural Encoding of fMRI Voxel Responses to Naturalistic Audio-Visual Stimuli**

Bosch SE, Sommers RP, Seeliger K, Güçlü U, van Gerven MAJ  
Radboud University; Donders Institute for Brain, Cognition & Behaviour

**P68) The order of visual operations in the perception of masked and unmasked natural images**

Jessica Loke, Noor Seijdel, H. Steven Scholte  
University of Amsterdam

**Social cognition****P69) How Nonverbal Expressions and Reputation Drive Cooperative Decisions: A Real-Life Interaction Study**

Friederike Behrens, Mariska Kret  
Leiden University

**P70) Genetic and environmental components of temperamental fear and frontal asymmetry in young children**

Ilse C. Van Wijk, Bianca G. van den Bulk, Renske Huffmeijer, Jizzo Bosdriesz, Marian J. Bakermans-Kranenburg, Marinus H. van IJzendoorn  
Leiden University

**P71) Understanding Other Minds: Investigating representations of mental states and personalities**

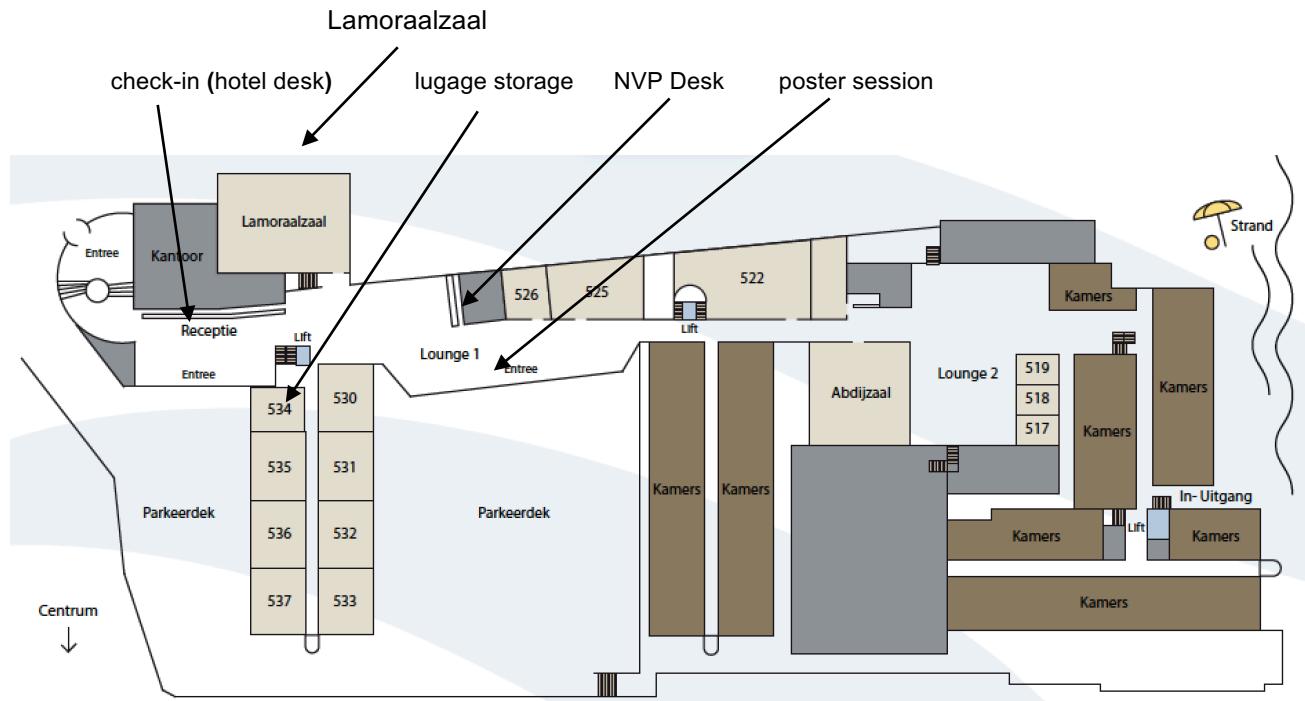
Jane Rebecca Conway; Nicholas Bronitt; Sofia Koletsi; Caroline Catmur; Geoff Bird.  
King's College London

**P72) Monitoring of own versus other's appearance: Testing an objective measure of self-focused attention with a social spatial cueing task**

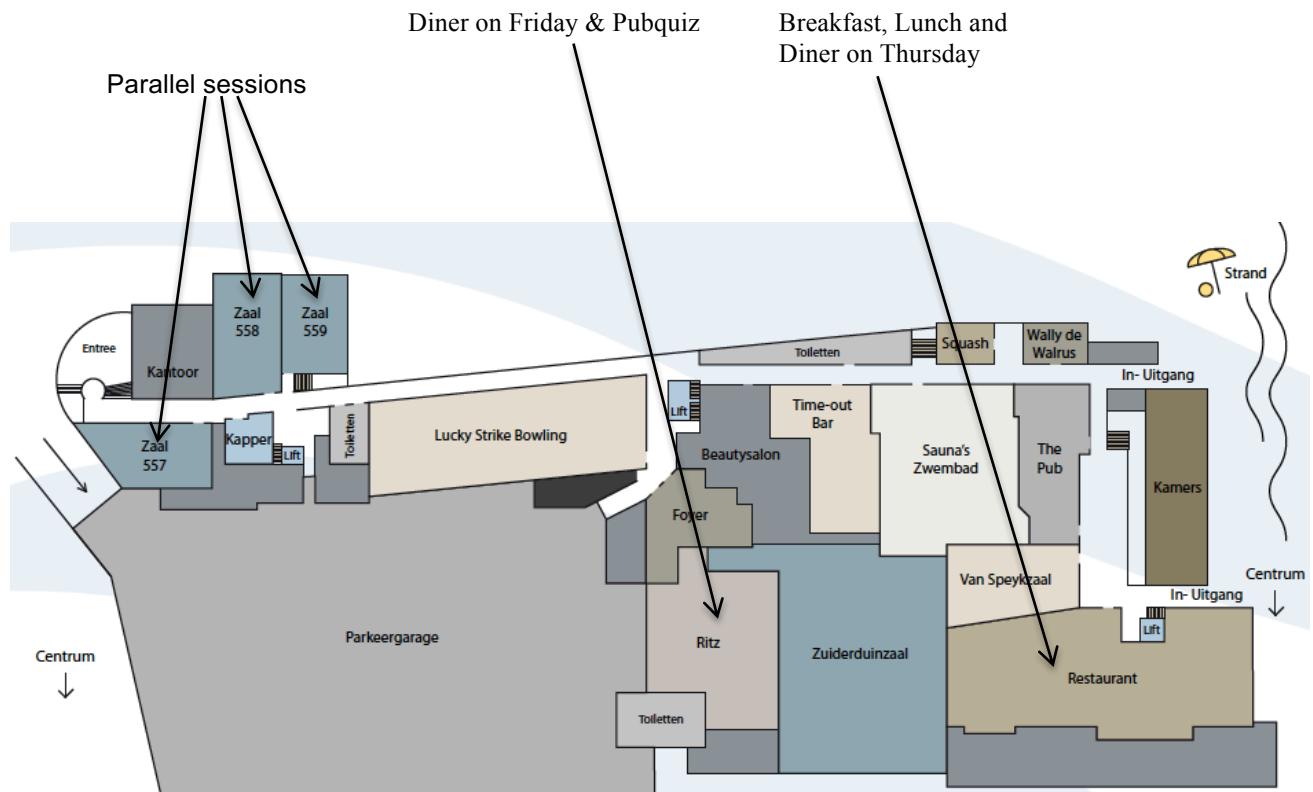
M.I. Ruissen, E.R.A. de Brujin  
Leiden University

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# MAP OF HOTEL ZUIDERDUIN



Map of the **first floor**: hotel desk (check-in), Lamoraalzaal (keynote lectures, parallel sessions, business meeting, NVP dissertation award), room 534 (lugage storage), Lounge 1 (poster session, coffee/tea breaks and drinks), and NVP desk.



Map of the **ground floor**: Vergaderzaal 557, 558, and 559 (parallel sessions), Ritz (Pubquiz on Thursday and dinner on Friday), The Pub (Thursday and Friday Night Bar) and Restaurant (breakfast, lunches and dinner at Thursday).



**Nederlandse Vereniging voor Psychonomie**  
**NVP**  
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**2017**