EXTINCTION LEARNING

Young Scientists Symposium #2

extinction learning | FOR 1581

FOR 1581: Extinction Learning

November, 16th – 17th 2015


Zollverein

Local Organizers

Young Scientists of FOR1581

Extinction Learning

Symposium #2

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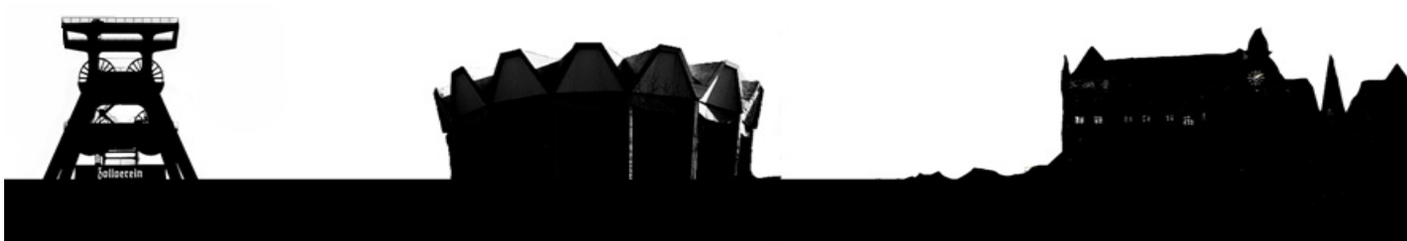
Bochum

Content



Key Information

Optional Program for Saturday and Sunday

Saturday, 14.11.2015
5.00 pm: Walk and snack in Bochum

Sunday, 15.11.2015
1.30 pm: Shuttle from Hotel Claudius to Zeche Zollverein
3.00 pm: Guided tour "About Coal and Miners" in Zeche Zollverein
(www.zollverein.de)
7.00 pm: Dinner at Café Ferdinand, Bochum (between train station and hotel)

Schedule for the Symposium

Monday, 16.11.2015
9.00 am: Arrival and Registration at Beckmanns Hof
Program see below
5.00 pm: Shuttle from Beckmanns Hof to Hotel Claudius
6.30 pm: Dinner at Yamas, Bochum (*www.yam.as*)

Tuesday, 17.11.2015
9.45 am: Arrival and Coffee
Program see below
5.15 pm: Shuttle from Beckmanns Hof to Hotel Claudius
6.30 pm: Shuttle from Hotel Claudius to Haus Herbede
7.00 pm: Dinner at Haus Herbede, Bochum Witten
9.15 pm: Shuttle from Haus Herbede back to Hotel Claudius

Helpful Phone numbers

Sandra Linn: +49 176 24899658 Office Biopsychology: +49 234 32 28213

Ruhr-University Bochum

Bochum Tourism

RuhrCongress Bochum

German Mining Museum
Icon of our past

Lake Kemnade / Ruhr valley

Starlight Express Musical
Since 25 years in Bochum

„Leonardo da Vinci - EXPLORING ARTS & SCIENCE"

Kortumhaus, Bochum

daily 9.00 am – 6.00 pm

"Cirque du Soleil – Varekai"

Westfalenhallen, Dortmund

Saturday, 14.11.2015 4.00 pm / 8.00 pm

Sunday, 15.11.2015 1.00 pm / 5.00 pm

URBANATIX »NOW!«

Jahrhunderthalle, Bochum

Saturday, 14.11.2015 5.00 pm / 8.00 pm

Sunday, 15.11.2015 5.00 pm

Monday, 16.11.2015 7.00 pm

Tuesday, 17.11.2015 6.00 pm

For more information see www.bochum-tourismus.de/en/

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Program

Monday 16th

9.00 Arrival and Registration

9.30 Welcome by Onur Güntürkün
Introduction by the Young Scientists

10.15 **John Pearce**
The Discrimination of Magnitude

11.30 Coffee Break

11.45 **Gavan McNally**
Neural Circuit Mechanisms for Fear Prediction Error: Implications for Understanding Clinical Anxiety

13.00 Lunch

14.00 **Poster Session** (incl. Coffee Break)

15.30 **Mark Bouton**
Response Inhibition and Response Recovery in the Extinction of Instrumental Learning

Each talk will start with a short introduction of topic and speakers by the Young Scientists – length of each talk 45 minutes followed by 15 minutes discussion

Tuesday 17th

09.45 Arrival and Coffee

10.15 **Germund Hesslow**
New Mechanisms of Learning and Extinction in the Cerebellum

11.30 Coffee Break

11.45 **Ingrid Ehrlich**
Amygdala Circuits and the Control of Acquired Fear and its Extinction

13.00 Lunch

14.00 **David Knight**
Functional Neuroimaging of the Acquisition and Extinction of Human Pavlovian Conditioned Fear

15.15 Coffee Break

15.30 **Johan Vlaeyen**
Extinction of Pain-Related Fear: Experimental Findings and Clinical Applications

16.30 Final Discussion and Farewell

Each talk will start with a short introduction of topic and speakers by the Young Scientists – length of each talk 45 minutes followed by 15 minutes discussion

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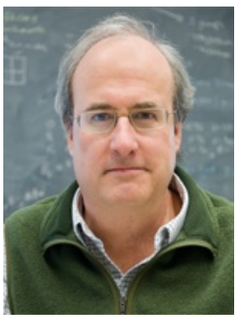
Speaker Abstracts

(alphabetical order)

Mark Bouton



Response Inhibition and Response Recovery in the Extinction of Instrumental Learning

Department of Psychological Science, University of Vermont (USA)

Monday, 16.11.2015 3.30 pm

In instrumental extinction, an instrumental (operant) behavior decreases when its reinforcer is removed. Like Pavlovian extinction, instrumental extinction involves a context-dependent form of inhibitory learning, as suggested by the fact that responding is renewed when the context is changed after extinction (ABA, ABC, and AAB renewal all occur). We argue that it is also suggested by "resurgence," in which an extinguished instrumental behavior recovers when a second behavior that has been reinforced to replace it is also placed on extinction. Experiments on the extinction of simple operant responses, as well as discriminated heterogeneous chains (S1-R1-S2-R2-O), all produced results suggesting the importance of being able to make the response in extinction in order to obtain good extinction learning. Such results, plus the fact that extinction of a response trained in one S transfers and inhibits the same response, but not a different response, occasioned by another S suggest that the organism actively learns to inhibit its behavior when it learns extinction after instrumental learning.

Ingrid Ehrlich

Amygdala circuits and the control of acquired fear and its extinction

Department HIH/CIN Physiology of Learning and Memory, Eberhard Karls University Tübingen (Germany)

Tuesday, 17.11.2015 11.45 am

Associative Pavlovian fear conditioning and fear extinction are widely used paradigms to gain insights into substrates and mechanisms supporting learning and memory processes. They are powerful models because of striking parallels between rodents and humans and their high relevance for unraveling neural dysfunctions and improving therapies in anxiety disorders. The amygdala, a conserved part of the limbic system in vertebrates, receives sensory information from the outside world and is a key structure for emotional stimulus-associations and storage of fear memories. Furthermore, an interconnected network of hippocampus, medial prefrontal cortex, and amygdala has been implicated in state- and context-dependent control of fear.

Increasing evidence suggests that parallel plastic processes in these circuits involve projection specific cell-types, and inhibitory elements to control fear and extinction memory. In my lab, we use a combination of behavioral, and ex vivo electrophysiological, anatomical and optogenetic approaches in mice to delineate properties and plasticity in fear and extinction circuits. Here, I will focus on several aspects of our recent work. Firstly, I present data on the functional architecture of prefrontal- and hippocampal-basolateral amygdala circuits, and the putative role of projection cell types. Secondly, I talk about processes that may modulate extinction consolidation, and may tap into these circuits. Lastly, I summarize findings on novel connectivity and plasticity of specific GABAergic neurons, the amygdala intercalated cells. They provide learning-modulated sensory feed-forward and feedback inhibition to basolateral amygdala, and are in a unique position to gate fear expression or suppression.

Germund Hesslow

New mechanisms of learning and extinction in the cerebellum

Department of Experimental Medicine, University of Lund (Sweden)

Tuesday, 17.11.2015 10.15 am

A hypothesis made famous by Cajal and Hebb is that learning and extinction in the nervous system consist in strengthening vs weakening of synaptic strength. This idea has been enormously influential as can be seen in the focus on long-term potentiation and depression in current memory research. A problem with this approach has been that it cannot easily account for timing of neural responses. An example is Pavlovian conditioning of blink responses, which are adaptively timed. It is known that this learning takes place in the cerebellum where adaptively timed pauses in Purkinje cells drive the overt behavior. The learning mechanism usually invoked to account for the pauses is long-term depression of parallel fibre to Purkinje cell synapses. Recent results have undermined this view and suggest a novel type of learning mechanism. They also show that learning a new timing of a cellular response involves interplay between learning and extinction. This and some other results suggest a revision of our view of timing in the cerebellum and also undermine the traditional Cajal-Hebb paradigm.

David Knight

Functional Neuroimaging of the Acquisition and Extinction of Human Pavlovian Conditioned Fear

Department of Psychology, University of Alabama at Birmingham (USA)

Tuesday, 17.11.2015 2.00 pm

Pavlovian fear conditioning has become a popular paradigm for the study of learning, memory, and emotion processes that may play an important role in the development and maintenance of emotion-related disorders (e.g. anxiety). Relatively recent human neuroimaging research has identified neural circuitry that underlies these fear conditioning processes. For example, the prefrontal cortex, hippocampus, and amygdala are among the primary brain regions that appear to support important aspects of conditioned fear acquisition and extinction. Other research indicates that the degree to which a threat can be controlled impacts conditioned brain and behavioral responses. This presentation will highlight recent functional magnetic resonance imaging (fMRI) findings from our lab investigating the neural correlates of Pavlovian fear conditioning and extinction. In addition, we will discuss the neural and behavioral impact that having control over a threat has on the acquisition and extinction of conditioned fear. Finally, we will discuss recent human behavioral research investigating partial reinforcement effects on the acquisition and extinction of conditioned fear.

Gavan McNally

Neural circuit mechanisms for fear prediction error: Implications for understanding clinical anxiety

School of Psychology, University of New South Wales (Australia)

Monday, 16.11.2015 11.45 am

Several neuropsychiatric disorders are characterised by heightened activation of the amygdala. Such heightened activation has been hypothesised to underlie increased emotional reactivity, fear over generalization, and deficits in fear inhibition. Yet the mechanisms linking heightened amygdala activation to heightened emotional learning are elusive. I will describe evidence that a key mechanism linking heightened amygdala activation to excessive fear is disruption in the use of fear prediction error to regulate fear learning. This disruption leads to formation of inappropriate fear associations and impaired fear inhibition.

John Pearce

The Discrimination of Magnitude

School of Psychology, Cardiff University (UK)

Monday, 16.11.2015 10.15 am

Discriminations between two stimuli that differ in quality, such as tones of different frequency, tend to be symmetrical. That is, the course of the discrimination is unaffected by which of the stimuli signal reward. In contrast, a limited body of evidence indicates that discriminations based on stimuli that differ in quantity, or magnitude, do not follow this rule. Such discriminations appear to be solved more readily when reward is signalled by the larger rather than the smaller of the two stimuli. I shall describe a series of experiments that demonstrate this asymmetry with stimuli that differ in intensity, number, duration and length. One explanation for these results is that nonreinforced exposure to cues present during the intertrial interval exerts a disruptive influence on responding during the stimulus that signals reward, and this disruption is stronger for weak than strong stimuli. Experiments designed to test this proposal were successful for discriminations based on number, but not for those based on intensity. The implications of these results for our understanding of how magnitude is represented, and for the role played by extinction in a discrimination will be considered.

Johan Vlaeyen

Extinction of pain-related fear: Experimental findings and clinical applications

Research Group Health Psychology, University of Leuven (Belgium) and Department of Clinical Psychological Science, Maastricht University (Netherlands)

Tuesday, 17.11.2015 3.30 pm

Pain is a biologically relevant and vital signal of bodily threat, urging the individual to protect him/herself. Immediate protective responses to pain include increased arousal, orientation to the sources of threat, and various safety-seeking behaviors including escape and avoidance. Despite this biologically hard-wired system, there are individual differences the perceived threat value of pain. The expression of pain usually is dependent on social context variables and current goals. Also, learning takes place rapidly. In order to facilitate early and effective protection against bodily threat, previously neutral cues that somehow are causally or functionally related to pain can receive the propensity to elicit similar defensive responses. Chronic pain may develop when the individual overgeneralizes the 'cue-pain' knowledge, and starts to avoid various movements and activities, despite medical reassurance about the innocent cause and the transient character of pain.

In this presentation, I will present experimental work featuring the acquisition, generalization and extinction of pain-related fear using a proprioceptive fear-conditioning paradigm. This will be followed by a review of the effectiveness of novel exposure techniques in patients with chronic pain reporting increased fear of pain levels.


Zollverein

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Young Scientists CVs

Dipl.-Phys. Thomas M. Ernst

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Curriculum Vitae

2014 - present	**Research Associate, Essen, Germany**
	Department for Experimental Neurology, University Hospital Essen & Erwin L. Hahn Institute for Magnetic Resonance Imaging, Essen
	Grant: FOR 1581 Extinction
	Focus: Ultra high field magnetic resonance imaging (MRI), structural and functional MRI of the cerebellum
2010 – 2014	Research Associate, Hamburg, Germany
	Clinic and Policlinic for Diagnostic and Interventional Radiology, University Medical Center Hamburg
	Grant: SFB 841 - Liver inflammation and regeneration
	Focus: Ultra high field MRI, small animal abdominal imaging
2009	Physics-Diploma, Marburg, Germany
	Diploma thesis title: “Measuring diffusion with NMR – Generation and test of strongly inhomogeneous pulsed magnetic field gradients”
	Focus: Nuclear magnetic resonance (NMR), surface physics

Methods and Research Interests

Extinction of conditioned reflexes and fear responses
Structural and functional MRI of the human cerebellum and the cerebellar nuclei
MRI at ultra high field (7 T)

Publications

Chang DI, Lissek S, **Ernst TM**, Thurling M, Uengoer M, Tegenthoff M, Ladd ME and D. Timmann (2015). Cerebellar Contribution to Context Processing in Extinction Learning and Recall.*Cerebellum*.

Utz A, Thurling M, **Ernst TM**, Hermann A, Stark R, Wolf OT, Timmann D and Merz CJ. (2015). Cerebellar vermis contributes to the extinction of conditioned fear. *Neurosci Lett*, 604: 173-177.

Ernst TM, Fehling H, Bernin H, Zaruba MD, Bruchhaus I, Adam G, Ittrich H and Lotter H. (2015). Magnetic Resonance Imaging of Pathogenic Protozoan Parasite Entamoeba histolytica Labeled With Superparamagnetic Iron Oxide Nanoparticles. *InvestRadiol,* 50(10): 709-718.

Ernst TM, Schwinge D, Raabe N, Daubmann A, Kaul MG, Adam G, Schramm C andIttrich H. (2014). Imaging of the murine biliopancreatic tract at 7 Tesla: technique and results in a model of primary sclerosing cholangitis. *J MagnReson Imaging*, 40(6): 1355-1364.

Poster Presentations and Talks **(selected)**

Ernst TM, Thürling M, Müller S, Kahl F, Maderwald S, Stefanescu RM, Schlamann M, Boele HJ, DeZeeuw CI, Medina J, Diedrichsen J, Ladd ME, Koekkoek SKE, Timmann D. (2015). Modulation of fMRI signal in the cerebellar cortex and nuclei during acquisition, extinction and reacquisition of conditioned eyeblink responses – a fMRI study at 7 T. *Poster presented on the 3rd Gordon Conference on the Cerebellum*,

Ernst TM, Maderwald S, Timmann D. (2015). Structural and functional 7T MRI of the cerebellar nuclei in healthy subjects and patients with cerebellar ataxia.*Talk at the 9th Erwin Hahn Workshop and Lecture on Ultra High Field MRI*, Essen.

Title of the Poster

Modulation of fMRI signal in the cerebellar cortex and nuclei during acquisition, extinction and reacquisition of conditioned eyeblink responses – a fMRI study at 7 T

M.Sc. Psych. Anne Golisch

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Web: http://www.rub.de/neuroplasticity

Curriculum Vitae

Since 2014	**PhD Psychology Candidate at Ruhr University Bochum** with the thesis work being done at the University Clinic Bergmannsheil GmbH (Bochum) at the Neuroimaging Research Group Neuroplasticity / Learning
2014	M.Sc. Thesis: "The influence of cognitive control on the competition-based selection of attention in children - an EEG-study"
2012 - 2014	M.Sc. Psychology at the Heinrich Heine University in Düsseldorf
2012	B.Sc. Thesis: "The ideal formulation of job advertisements: gender specific stereotypes and titles"
2009 - 2012	B.Sc. Psychology at the Heinrich Heine University in Düsseldorf
2009	High school graduation (Abitur) at the Pestalozzi-Gymnasium in Unna

Methods and Research Interests

Neuroimaging (fMRI, resting state, diffusion tensor imaging)
Neural Mechanisms of Extinction Learning and the Renewal Effect
Influence of neurotransmitter systems on Extinction Learning (e.g. NMDA)
Attentional modulation on human learning and memory

Publications

Golisch, A., Schlaffke, L., Haag, L.M., Lenz, M., Heba, S., Lissek, S., Schmidt-Wilcke, T., Eysel, U.T. &Tegenthoff, M. (2015). The brain's dress code: How The Dress allows to decode the neuronal pathway of an optical illusion. *Cortex*, *73*, 271-275.

Poster Presentations and Talks **(selected)**

Golisch, A., Lissek, S. &Tegenthoff, M. (2015).Effects of NMDA modulation on behavioral and brain activation correlates of contextual extinction learning and the renewal effect. *Poster presented at the Summer School on Emotional Learning and Memory in Health and Psychopathology,* Leuven, Belgium.

Golisch, A., Schlaffke, L., Haag, L.M. et al. (2015). The brain's dress code: How The Dress allows to decode the neuronal pathway of an optical illusion. *Poster presented at the NeuroVisionen 11,* Münster, Germany.

Title of the Poster

NMDA-receptor blockade enhances contextual extinction learning and modulates activation of extinction-related brain regions

Dr.rer.nat. Martin Hadamitzky

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Web: http://www.uk-essen.de/medizinische-psychologie

Curriculum Vitae

2015	**Postdoctoral Fellow, Institute of Medical Psychology and Behavioral Immunobiology**, Faculty of Medicine, University of Duisburg-Essen, Germany
2010-2011	Postdoctoral Fellow Institute of Pharmacology, Toxicology, and Pharmacy, Ludwig-Maximilians-University, Munich, Germany
2010	Research Assistant at the Max Planck Institute for Neurological Research and the Department of Neurology, University of Cologne, Germany
2009	Research Fellow at the Department of Psychiatry, University of California San Diego (UCSD), USA
2008	Ph.D., Department of Neuropharmacology, Center for Cognitive Sciences (COGNIUM), University of Bremen, Germany
2005	Diploma in Biology, University of Bremen, Germany
1999-2005	Biology Student at the Universities of Kaiserslautern and Bremen, Germany

Methods and Research Interests

Extinction learning
Neuropsychopharmacology
Animal Models
Behavioral Immunobiology
Neuroscience

Publications (selected)

Lückemann, L., Bösche, K., Engler, H., Schwitalla, J.C., **Hadamitzky, M.**, Schedlowski, M., (2015) Pre-exposure to the unconditioned or conditioned stimulus does not affect learned immunosuppression in rats.*Brain Behavior and Immunity*, (Epub ahead of print).

Hadamitzky, M., Bösche, K., Wirth, T., Buck, B., Beetz, O., Christians, U., Schniedewind, B., Lückemann, L., Güntürkün, O., Engler, H., Schedlowski, M. (2015) Memory-updating abrogates extinction of learned immunosuppression *Brain Behavior and Immunity*, (Epub ahead of print).

Hadamitzky, M., Bösche, K., Engler, A., Schedlowski, M., Engler, H. (2015) Extinction of conditioned taste aversion is related to the aversion strength and associated with c-fos expression in the insular cortex. *Neuroscience*, 303:34-41.

Bösche, K, Weissenborn, K, Christinas, U, Witzke, O, Schedlowski, M, **Hadamitzky, M** (2015) Neurobehavioral consequences of small molecule-drug immunosuppression. *Neuropharmacology*, 96: 83-93.

Hadamitzky, M., Herring, A., Keyvani, K., Doenlen, R., Engler, H., Krügel, U., Bösche, K., Orlowski, K., Schedlowski, M. (2014) Acute systemic rapamycin induces neurobehavioral alterations in rats. *Behavioural Brain Research*, 15: 16-22.

Hadamitzky, M., Engler, H., Schedlowski, M. (2013) Learned immunosuppression: extinction, renewal, and the challenge of reconsolidation. *Journal of Neuroimmune Pharmacology*, 8: 180-8.

Lacan, G.,**Hadamitzky, M.**, Kuczenski, R., Melega, W.P. (2013)Alterations in the Striatal Dopamine System After Long Term Intravenous Methamphetamine Exposure: Contingent and Noncontingent Administration. *Synapse,*8: 476-88.

Hadamitzky, M., McCunney, S., Markou, A., Kuczenski, R. (2012) Development of stereotyped behaviors during escalating dose methamphetamine self-administration. *Psychopharmacology*, 223: 259-69.

Hadamitzky, M., Markou, A., Kuczenski, R. (2011) Extended access to methamphetamine self-administration affects sensorimotor gating in rats. *Behavioural Brain Research*, 217: 386-90.

Hadamitzky, M., Koch, M. (2009) Effects of acute intra-cerebral administration of the 5-HT2A/C receptor ligands DOI and ketanserin on impulse control in rats. *Behavioural Brain Research*, 204: 88-92.

Dipl.-Psych. Adriane Icenhour

University Hospital Essen
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Institute of Medical Psychology and Behavioral Immunobiology
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Curriculum Vitae

Since 2015	**Research fellow, Institute of Medical Psychology and Behavioral Immunobiology**, University Hospital Essen, Germany
2015	PhD
2012 - 2015	Research fellow and PhD candidate, Institute of Medical Psychology and Behavioral Immunobiology, University Hospital Essen, Germany
2011	Diploma in Psychology, University ofGiessen, Germany
2008 - 2009	Research assistant, Bender Institute of Neuroimaging, Giessen, Germany
2003 - 2011	Studies in Psychology, University ofGiessen, Germany
2001 - 2003	Studies in Psychology and Anglistics, University of Duisburg, Germany
1999	Abitur , Karl-Ziegler-Gymnasium, Mülheim, Germany

Methods and Research Interests

Neural mechanisms of pain-related learning and extinction in visceral pain

Distinct roles of learned fear and safety in pain-related learning and memory processes and their clinical implications

(Sex-specific) impact of stress on pain-related associative learning and extinction

Interoceptive conditioning in visceral pain

Publications **(selected)**

Labrenz, F., **Icenhour, A.**, Thürling, M., Schlamann, M., Forsting, M., Timmann, D. & Elsenbruch, S. (2015). Sex differences in cerebellar mechanisms involved in pain-related safety learning.*Neurobiol Learn Mem* 123, 92-99.

Icenhour, A., Elsenbruch, S. & Benson, S. (2015). Biological and psychosocial influences on sex- or gender-associated differences in pain. *Gender* 2, 11-28.

Icenhour, A., Kattoor, J., Benson, S., Boekstegers, A., Schlamann, M., Merz, C.J., Forsting, M. & Elsenbruch, S. (2015). Neural circuitry underlying effects of context on human pain-related fear extinction in a renewal paradigm. *Hum Brain Mapp*, 36, 3179-3193.

Icenhour, A., Langhorst, J., Benson, S., Schlamann, M., Hampel, S., Engler, H., Forsting, M. & Elsenbruch, S. (2015). Neural circuitry of abdominal pain-related fear learning and reinstatement in irritable bowel syndrome. *NeurogastroentMotil* 27, 114-127.

Poster Presentations and Talks **(selected)**

Icenhour, A. (2015). Visceral pain-related danger and safety learning and extinction*. Talk at the NeuroGASTRO meeting organized by the European Society of Neurogastroenterology& Motility,* Istanbul, Turkey.

Icenhour, A., Kattoor, J., Hampel, S., Schlamann, M., Benson, S. & Elsenbruch, S. (2014). Context effects on extinction and renewal of conditioned visceral pain-related fear memories.*Poster presented at the 20th Annual Meeting of the Organization for Human Brain Mapping (OHBM)*, Hamburg, Germany.

Icenhour, A., Langhorst, J., Benson, S., Schlamann, M., Hampel, S., Engler, H. & Elsenbruch, S. (2014). Neural circuitry of pain-related fear learning and memory retrieval in irritable bowel syndrome. *Poster presented at the 20th Annual Meeting of the Organization for Human Brain Mapping (OHBM)*, Hamburg, Germany.

Icenhour, A. (2013). Neural mechanisms of learning and extinction in chronic visceral pain.*Talk at the 7th Erwin L. Hahn fMRI Workshop*, Essen, Germany.

Grants / Scholarships / Awards

Best Young Investigator Presentation Award (2015) by the European Society of Neurogastroenterology and Motility (ESNM).

Martin-Wienbeck Travel Grant (2015)by the German Society of Neurogastroenterology& Motility (DGNM) for NeuroGastro meeting, Istanbul, Turkey.

Young Investigator Award (2013) by the German Pain Society.

Exploratory Treasure Grant (2013) by the DFG Research Unit FOR 1581 “Extinction learning”.

Title of the Poster

Contingency awareness shapes acquisition and extinction of emotional responses in a conditioning model of pain-related fear

M.Sc. Psych. Valerie Kinner

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Curriculum Vitae

Since 2013	**PhD candidate at the Department of Cognitive Psychology** at the Ruhr-University Bochum, Germany
2010 - 2013	M.Sc. Clinical Psychology at the Ruhr-University Bochum, Germany (Thesis: “The influence of a stress-induced cortisol elevation on emotion regulation processes in healthy men and women”)
2013	Internship at the Centre for Research in Environmental Epidemiology (CREAL), Barcelona, Spain
2012	Study abroad at the University Barcelona, Spain
2011	Internship in the Department of Psychiatry, Psychosomatics and Psychotherapy for Children and Adolescents at the University Clinic Charité Berlin, Germany
2007 - 2010	B.Sc. Psychology at the Ruhr-University Bochum, Germany (focus: cognitive neuroscience; Thesis: “The influence of stress on the reconsolidation of autobiographical memories”)
2007	A-level Exam (Abitur), Gymnasium an der Wolfskuhle, Essen

Methods and Research Interests

Neural and behavioral mechanisms of extinction and renewal

Stress hormone effects and sex differences

Emotion regulation

Neuroimaging (fMRI)

Psychophysiology (electrodermal activity (EDA), pupillometry, neuroendocrine markers (salivary cortisol, alpha-amylase), blood pressure)

Publications

Kinner, V.L., Het, S., & Wolf, O.T. (2014). Emotion regulation: exploring the impact of stress and sex. *Frontiers in Behavioral Neuroscience, 8* (397), 1-8.

Kinner, V.L., Merz, C.J., Lissek, S., & Wolf, O.T. (submitted).Cortisol modulates the neural correlates of extinction recall.

Kinner, V.L., Wolf, O.T., & Merz, C.J. (submitted). Cortisol alters reward processing in the human brain.

Poster Presentations and Talks

Kinner, V.L., Wolf, O.T., Merz, C.J. (2015). Geschlechtsspezifischer Cortisoleffekt auf die neuronalen Korrelate der Belohnungsantizipation. *Talk at the 41st annual meeting „Psychologie & Gehirn*“, Frankfurt, Germany.

Kinner, V.L., Wolf, O.T., Merz, C.J. (2015). Cortisol administration alters reward processing in the human brain. *Poster presented at the 21st annual meeting of the "Organization for Human Brain Mapping"*, Honolulu, Hawaii.

Kinner, V.L., Otto, T., & Wolf, O.T. (2015). What our eyes tell us about feelings! Tracking pupillary responses during emotion regulation processes. *Talk at the 3rd "Young Scientist Retreat (DGPs FG Biologische Psychologie & Neuropsychologie and DGPA*), Marburg, Germany.

Kinner, V. L., Wolf, O.T. & Merz, C.J. (2014). Geschlechtsspezifische Auswirkungen von Cortisol auf das Belohnungslernen. *Talk at the 2nd „Young Scientist Retreat"(DGPs FG Biologische Psychologie & Neuropsychologie and DGPA)*, Berlin, Germany.

Kinner, V. L., Het, S. & Wolf, O.T. (2014). Cortisol increases after acute stress affect emotion regulation in a sex-dependent manner. *Poster presented at the 49th annual meeting of the „Deutsche Gesellschaft für Psychologie"*, Bochum, Germany.

Kinner, V. L., Het, S. & Wolf, O.T. (2014).The impact of acute stress on emotion regulation differs in men and women. *Poster presented at the 40th annual meeting of „Psychologie und Gehirn"*, Lübeck, Germany.

Kinner, V. L., Het, S. & Wolf, O.T. (2014). Emotion regulation is differentially affected by stress-induced cortisol increases. *Poster presented at 56th annual meeting of the "Tagung experimentell arbeitender Psychologen*", Gießen, Germany.

Title of the Poster

Cortisol modulates the neural correlates of extinction recall

M.Sc. Psych. Shira Meir Drexler

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Web: https://www.researchgate.net/profile/Shira_Meir_Drexler

Curriculum Vitae

Since 2012	**Neuroscience, PhD candidate,** International Graduate School of Neuroscience Ruhr-University Bochum, Germany Project title: Effects of cortisol on fear memory reconsolidation Supervisor: Prof. Wolf, O.T., Department of Cognitive Psychology
2010-2012	Biopsychology, M.A., University of Haifa, Israel Project title: Effects of exposure to stress in juvenility and adulthood on anxiety and on daily rhythms of body temperature and physical activity in rats Supervisor: Prof. Richter-Levin, G., Department of Biopsychology
2002-2005	Psychology, B.A., University of Haifa, Israel Project title: Spatial memory in rats is differently affected by high vs. low levels of stress Supervisor: Prof. Richter-Levin, G., Department of Biopsychology

Methods and Research Interests

Fear conditioning and extinction learning

Stress and glucocorticoids

Memory reconsolidation

Publications

Meir Drexler, S.; Merz C.J.; Hamacher-Dang; T.C.; Tegenthoff M & Wolf O.T. (2015). Effects of cortisol on reconsolidation of reactivated fear memories. *Neuropsychopharmacology*. doi: 10.1038/npp.2015.160.

Meir Drexler, S.; Merz, C.J.; Hamacher-Dang, T.C.; Marquardt, V.; Fritsch, N. & Wolf, O.T. (2014). Effects of postretrieval-extinction learning on return of contextually controlled cued fear. *Behavioral Neuroscience 128(4):* 474-481.

Poster Presentations and Talks (selected)

Meir Drexler, S.; Merz, C., J.; Hamacher-Dang, T.; Wolf, O.T. (2015). Cortisol enhances human fear memory reconsolidation. *Seventh European Meeting on Human Fear Conditioning*. Bochum, Germany.

Meir Drexler, S.; Merz, C., J ; Hamacher-Dang, T.; Wolf, O.T. (2015). Effects of cortisol on reactivated fear memories. *4th International SFB Symposium: Fear, Anxiety, Anxiety Disorders*. Münster, Germany.

Meir Drexler, S.; Merz, C., J ; Hamacher-Dang, T.; Wolf, O.T. (2015). Effects of cortisol on reactivated fear memories. *International Society of Psychoneuroendocrinology (ISPNE) Annual Conference*. Edinburgh, UK.

Meir Drexler, S.; Marquardt, V.; Hamacher-Dang, T.; Merz, C., J.; Wolf, O.T. (2013). The effects of memory reactivation on the return of contextual fear. *Fear, Anxiety, Anxiety Disorders – International Symposium*. Hamburg, Germany.

Meir Drexler, S.; Marquardt, V.; Hamacher-Dang, T.; Merz, C., J.; Wolf, O.T. (2013). The effects of memory reactivation on the renewal of contextual fear conditioning. *Fifth European Meeting on Human Fear Conditioning*. Affligem, Belgium.

Meir, S. (2007). Social factors influencing learned helplessness. *The Annual Meeting of Psychobiology Labs*. Be'er Sheva, Israel.

Grants and Scholarships

2012-2014 Scholarship of the International Graduate School of Neuroscience, Ruhr-University Bochum, Germany

Title of the Poster

Effects of cortisol on reactivated fear memories

Dr. rer. nat. Sara Lucke

Philipps-Universität Marburg
Faculty of Psychology
Section for Experimental and Biological Psychology
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Curriculum Vitae

2015	**Licensure as Clinical Psychologist**
2014	Ph.D. in Psychology (Dr.rer.nat.), Philipps-Universität Marburg
	„Mechanisms of experimental relapse: Context-relevance affects the strength of context-dependent learning“ (Prof. Harald Lachnit, Prof. Mark Bouton)
2011	Diploma in Psychology, Philipps-Universität Marburg
	“Influence of prolonged training and extinction on resurgence of instrumental behavior” (Prof. Dr. Harald Lachnit, Dr. Anja Lotz) Data collection: University of Vermont, Biobehavioral Psychology, lab Mark Bouton
2006	School leaving examination (Abitur) at Städtisches Gymnasium Kreuztal

Methods and Research Interests

Attentional processes in human predictive and eye tracking paradigms

Post-extinction phenomena and their underlying mechanisms

Application of general psychological processes to clinical psychology and psychotherapy

Publications

Lucke, S.,Lachnit, H., Stüttgen, M., &Uengoer, M. (2014).The impact of context relevance during extinction learning. *Learning & Behavior, 42(3),* 256-269.

Lucke, S., Lachnit, H., Koenig, S., &Uengoer, M. (2013). The Informational Value of Contexts affects Context Dependent Learning. *Learning &* Behavior, 41(3), 285-297.

Winterbauer, N.E., **Lucke, S.,**& Bouton, M.E. (2013). Some factors modulating the strength of resurgence after extinction of an instrumental behavior. *Learning and Motivation, 41(1*), 60-71.

Poster Presentations and Talks **(selected)**

Lucke, S.,Uengoer, M., &Lachnit, H. (2012).The Role of Attention Toward the Context of Acquisition for the Formation of Renewal. *16th Associative Learning Symposium 2012*, Gregynog, England.

Lucke, S.,Uengoer, M., Wolf, O.T., &Lachnit, H. (2014). Memory reconsolidation in human predictive learning*. Poster presented at the 49. Kongress der DGPS*, Bochum, Germany.

Lucke, S.,Uengoer, M., &Lachnit, H. (2013). The Role of Attention Toward the Context for the Formation of Renewal. *Poster presented at 55th Conference of Experimental Psychologists*, Vienna, Austria.

Lucke, S.,Lachnit, H., &Uengoer, M. (2011). The Role of Attention Toward the Context of Extinction for the Formation of Renewal. *Poster presented at XXIII International Meeting of the Spanish Society for Comparative Psychology*, Granada, Spain.

Grants / Scholarships / Awards

Grant of the “exploratory treasure” for young scientist within the DFG Research Unit FOR 1581 “Extinction learning: neuronal mechanisms, behavioral manifestations, and clinical implications”

2008-2014 Scholarship for highly-qualified students awarded by Evangelisches Studienwerk Villigst e.V. (German official scholarship organization)

M.Sc. Med biol. Laura Lückemann

University: Duisburg- Essen
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Curriculum Vitae

Since 2014	**Dissertation – University Hospital of Essen Institute of Medical Psychology And Behavioral Immunobiology** Working on : Conditioning immunosuppression and the effect on rheumatoid arthritis
2011 - 2013	Master thesis - University hospital Essen Clinic for Pediatrics Thesis: Effects of hypothermia and Levetiracetam on neuroprotective pathways after hypoxia-ischemia in the neonatal mouse brain
2011 - 2012	Internship-Centre for Molecular & Cellular Biology of Inflammation Kings Collage – London Worked on: Development of tissue resident macrophages and dendritic cells independently of haematopetic stem cells
2008 - 2011	Bachelor Thesis -Justus-Liebig University Giessen– Institute of Immunology Thesis: The effect of IL-33 on dendritic cells
1999 - 2008	Theodor-Heuss Gymnasium, Graduation: Abitur
1995 - 1999	Elementary School, Radevormwald

Methods and Research Interests

Extinction learning
Conditioning immunosuppression
Conditioned taste aversion
Cyclosporine A
Interleukin-2
Rheumatoid arthritis

Publications

Laura Lueckemann[1], Katharina Bösche[1], Harald Engler, Jan-Claudius Schwitalla, Martin Hadamitzky, Manfred Schedlowski (2015). Pre-exposure to the unconditioned or conditioned stimulus does not affect learned immunosuppression in rats.*Brain, Behavior, and Immunity* (in press)

Martin Hadamitzky, Katharina Bösche, Timo Wirth, Benjamin Buck, Oliver Beetz, Uwe Christians, BjörnSchniedewind, **Laura Lückemann**, OnurGüntürkün, Harald Engler, Manfred Schedlowski (2015). Memory-updating abrogates extinction of learned immunosuppression. *Brain, Behavior, and Immunity* (in press)

Poster Presentations and Talks **(selected)**

Laura Lückemann, Katharina Bösche, Martin Hadamitzky, Harald Engler, Manfred Schedlowski (2015). Pre-exposure to the unconditioned stimulus or conditioned stimulus does not affect learned immunosuppression in rats. *Talk given at the GEBIN 2015 Meeting,* Munich, Germany.

Laura Lückemann, Martin Hadamitzky, Katharina Bösche, Harald Engler, Manfred Schedlowski (2014). Context change affects extinction in rat taste-aversive learning with cyclosporine A. *Poster presented at the Research day 2014,* Essen, Germany.

Grants / Scholarships / Awards

Travel Award for Young researchers -GEBIN 2015 Meeting in Munich

Title of the Poster

Pre-exposure to the unconditioned or conditioned stimulus does not affect learned immunosuppression in rats.

M.Sc. Psych. Friederike Preußer

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Curriculum Vitae

Since 2014	**PhD student at the Department of Clinical Psychology and Psychotherapy**, Ruhr-University Bochum, Bochum, Germany
2011-2014	M.Sc. Psychology, Heinrich-Heine University, Düsseldorf, Germany
	Thesis: „Development and validation of a task for spatial working memory and pattern separation in preclinical schizophrenia research"
2014	Student assistant at the Department of Comparative Psychology, Heinrich-Heine University, Düsseldorf, Germany
2012 -2013	Internship / data collection for Master's thesis at the Translational Cognitive Neuroscience lab, University of Cambridge, UK
2008-2011	B.Sc. Psychology, University of Groningen (the Netherlands)
	Thesis: "Exploration of factors related to healthy living behavior in students transitioning from secondary education to university"
2010	Erasmus exchange at the EötvösLoránd University, Budapest, Hungary
2007	Abitur / A level exam, Gymnasium LeoninumHandrup, Handrup

Methods and Research Interests

Anxiety disorders & exposure therapy
Extinction learning and renewal (clinical implications)
Pattern separation / Pattern completion
Self-efficacy
Psychophysiology (EDA, heart rate, salivary cortisol)

Publications

Zlomuzica, A., **Preusser, F**., Totzeck, C., Dere, E., Margraf, J. (in press).The impact of different emotional states on the memory for what, where and when features of specific events, *Behavioral Brain Research*.

Zlomuzica, A., **Preusser, F**., Schneider, S., & Margraf, J. (2015). Increased perceived self-efficacy facilitates the extinction of fear in healthy participants. *Frontiers in Behavioral Neuroscience*, *9*, 270.

Oomen, C. A., Hvoslef-Eide, M., Kofink, D., **Preusser, F**., Mar, A. C., Saksida, L. M., & Bussey, T. J. (2015).A novel 2-and 3-choice touchscreen-based continuous trial-unique nonmatching-to-location task (cTUNL) sensitive to functional differences between dentate gyrus and CA3 subregions of the hippocampus. *Psychopharmacology*, *232*(21-22), 3921-3933.

Poster Presentations and Talks **(selected)**

Preusser, F., Zlomuzica, A., Adolph, D., Schneider, S., Margraf, J. (2015). Konditionierungslernen als Prädiktor für den Expositionstherapieausgang. *Poster presented at the 9th workshopcongress for Clinical Psychology and Psychotherapy of the DGPs Section Clinical Psychology and Psychotherapy*, Dresden, Germany.

Preusser, F. (2015). Strategien zur Optimierung expositionsbasierter Verfahren – der Einfluss der Selbstwirksamkeitserwartung. *Talk at the colloquium of the Associative Learning Unit, Philipps-University Marburg*, Marburg, Germany.

Preusser, F., Zlomuzica, A., Schneider, S., Margraf, J. (2015). Increased perceived self-efficacy facilitates the extinction of fear. *Poster presented at the 7th European Meeting of Human Fear Conditioning*, Bochum, Germany.

Mosig, C., **Preusser, F**., Merz, C.J., Wolf, T., Schneider, S., Margraf, J. (2014). The nature of context-dependent fear conditioning in spider-fearful individuals.*Poster presented at the 49th congress of the DGPs*, Bochum, Germany.

Grants / Scholarships / Awards

2012 – 2013 High Potential Mobility Grant (DAAD & Heinrich-Heine University)

Title of the Poster

Positive verbal persuasions enhance extinction learning: Implications for exposure-based treatments

Dr. Sarah Starosta

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AE Biopsychologie
D-44780 Bochum, Germany

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Curriculum Vitae

Since 2015	**Post-doc in the lab of Prof. Dr. Dr. h.c. Onur Güntürkün**
August 2015	PhD in Neuroscience International Graduate School of Neuroscience, Bochum, Germany PhD Thesis: "Neuronal and behavioral mechanisms of extinction learning and Renewal"
2011-2015	PhD student, Prof. Dr. Dr. h.c. Onur Güntürkün Ruhr-University Bochum, Germany
2008-2011	Master of Science, Psychology Ruhr-University Bochum, Germany M.Sc. Thesis: "Representation of value and reinforcement in the avian brain as assessed with a generalization task"
2009-2010	Studies abroad, Erasmus Scholarship University La Sapienza, Rome, Italy
2005-2008	Bachelor of Science, Psychology Ruhr-University Bochum, Germany B.Sc. Thesis: "Neuronal activity of striatal neurons during classical conditioning with varying amounts of reward"

Methods and Research Interest

Single-unit recordings in freely-moving animals
Pharmacological manipulations in specific brain regions
Neuronal basis of the dynamics of learning
Animal learning theory
Decision making
Value coding in the brain

Publications

Starosta, S., Güntürkün, O. &Stüttgen, M. C. (2013). Stimulus-response-outcome coding in the pigeon nidopalliumcaudolaterale.PLoSOne 8, e57407.

Stüttgen, M. C., Kasties, N., Lengersdorf, D.,**Starosta, S.**, Güntürkün, O. & Jäkel, F. (2013). Suboptimal criterion setting in a perceptual choice task with asymmetric reinforcement.Behavioral Processes 96, 59–70.

Starosta, S., Stüttgen, M. C., Güntürkün, O. (2014).Recording Single Neurons' Action Potentials From Freely Moving Pigeons Across Three Stages of Learning. J. Vis. Exp, 2014, (88), e51283, doi:10.3791/51283

Poster Presentations and Talks **(selected)**

Starosta, S. (2015). Dynamic coding patterns in single units of the forebrain across three stages of learning .*Talk at the Meeting of the German Neuroscience Society*, Göttingen, Germany

Starosta, S., Güntürkün, O., Stuettgen, M.C. (2014). Single-neuron activity changes during acquisition, extinction, and reacquisition of an operant response, *Poster presented at the Meeting of the German Psychological Society*, Bochum, Germany

Starosta, S., Güntürkün, O., Stuettgen, M.C. (2013). Neural correlates of altered reward contingencies during acquisition, extinction and reacquisition, *Poster presented at the Meeting of the Society for Neuroscience*, San Diego, USA

Starosta, S., Güntürkün, O., Stuettgen, M.C. (2012). Within-session assessment of acquisition, extinction and reacquisition performance in an operant visual discrimination task, *Poster presented at the Meeting of the Society for Neuroscience*, New Orleans, USA

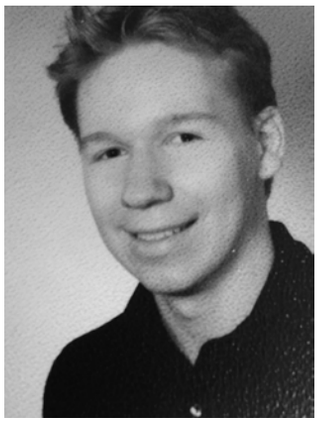
Grants / Scholarships / Awards

2012 Grant of the “exploratory treasure” for young scientist within the DFG (German Research Foundation) Research Unit FOR1581
2010 Erasmus Scholarship (University La Sapienza, Rome, Italy)

Title of the Poster

Dynamic coding patterns in single units of the forebrain across three stages of learning

M.Sc. Cognitive Science Julian Packheiser



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Phone: +49 0151 18545001
E-Mail: Julian.packheiser@rub.de
Web: http://www.bio.psy.ruhr-uni-bochum.de/

Curriculum Vitae

2015	**PhD Student at the Department of Biopsychology**, RUB
2013 - 2015	M.Sc. Cognitive Science, RUB
2009 - 2013	B.A. Psychology / German Studies, TU Dortmund
2008	Abitur, Stadtgymnasium Dortmund

Methods and Research Interests

Extinction learning

Decision making

Poster Presentations and Talks (selected)

Pusch, R., **Packheiser, J**., Güntürkün, O., &Stüttgen, M.C. (2015). Response properties of the pigeon NCL during a perceptual decision making task. *Poster presented at the 45th annual meeting of the Society for Neuroscience,* Chicago, USA.

Dr. Daniel Lengersdorf

Ruhr-University Bochum
Institute for Cognitive Neuroscience,
Department of Biopsychology
44780 Bochum, Germany

Phone: +49 234 32 42917
E-Mail: Daniel.Lengersdorf@rub.de
Web: www.bio.psy.ruhr-uni-bochum.de/members_daniel.html

Curriculum Vitae

Since 2015	**Post-Doc**
2011 – 2014	PhD-Student
2011 - 2014	Associate PhD-Student at the International Graduate School of Neuroscience
2009 – 2011	Master Student in Biology
2006 – 2009	Bachelor Student in Biology

Methods and Research Interests

The extinction learning network in the pigeon's brain: "PFC", hippocampus, amygdala
Learning under appetitive conditions
Behavioural neuropharmacological approach

Publications

Lengersdorf D., Marks D., Uengoer M., Stüttgen M.C. &Güntürkün O. (2015).Blocking NMDA-receptors in the pigeon's "prefrontal" caudal nidopallium impairs appetitive extinction learning in a sign-tracking paradigm. Front. *Behav Neurosci* 9:85.

Lengersdorf, D., Stüttgen, M.C., Uengoer, M., Güntürkün, O. (2014). Transient inactivation of the pigeon hippocampus or the nidopalliumcaudolaterale during extinction learning impairs extinction retrieval in an appetitive conditioning paradigm. *Behav Brain Res*, 2014, 265: 93-100.

Title of the Poster

The function of the pigeon's amygdala for context-dependent extinction learning – an appetitive approach.

Dr. rer. nat. Franziska Labrenz

University Hospital Essen
University of Duisburg-Essen
Institute of Medical Psychology and Behavioral Immunobiology
45122 Essen, Germany

Phone: +49 201 723 4267
E-Mail: Franziska.Labrenz@uk-essen.de
Web: http://ww2.uk-essen.de/medizinische-psychologie

Curriculum Vitae

Since 2013	**Research Fellow, Institute of Medical Psychology and Behavioral Immunobiology**, University Hospital Essen, Germany
2013	Dr. rer. nat in Psychology, Ruhr-University Bochum
2010 - 2013	Research Fellow, Department of Biopsychology, Ruhr-University Bochum, Germany
	Research Fellow, Department of Perceptual Cybernetics, Leibniz Research Centre for Working Environment and Human Factors, Dortmund, Germany
	Visiting Research Fellow, Research Group Cognition and Gender, University Hospital Münster, Germany
2007-2009	Master of Sciences, Study of Applied Cognition and Media Science, University of Duisburg-Essen, Germany
2004-2007	Bachelor of Sciences, Study of Applied Communication and Media Science, University of Duisburg-Essen, Germany
2004	Abitur (high school diploma), Albert-Einstein-Gymnasium, Neubrandenburg, Germany

Methods and Research Interests

Mechanisms of learning and extinction in visceral pain

Dissociable mechanisms of pain- and safety predictive associations in fear conditioning

Sex differences in acute pain as well as in the etiology and pathophysiology of chronic pain

Neural mechanisms underlying learning and “unlearning” of pain-related fear

Publications

Labrenz, F., Icenhour, A., Thürling, M., Schlamann, M., Forsting, M., Timmann, D. & Elsenbruch, S. (2015). Sex differences in cerebellar mechanisms involved in pain-related safety learning. *Neurobiology of Learning and Memory*, 123, 92-99.

Labrenz, F., Icenhour, A., Schlamann, M., Forsting, M. & Elsenbruch, S. From Pavlov to pain – How predictability affects the anticipation and processing of visceral pain in a fear conditioning paradigm. Under review.

Labrenz, F., Icenhour, A., Benson, S. & Elsenbruch, S. Contingency awareness shapes acquisition and extinction of emotional responses in a conditioning model of pain-related fear. Under review.

Poster Presentations and Talks **(selected)**

Labrenz, F., Icenhour, A., Theysohn, N. & Elsenbruch, S. (2015). From Pavlov to Pain: Der Einfluss emotionalen Lernens auf die Antizipation und Verarbeitung viszeraler Schmerzen. Poster presented at *the Annual Meeting of the German Pain Associatio*n, Mannheim, Germany.

Labrenz, F., Icenhour, A., Thürling, M., Schlamann, M., Timmann, D. & Elsenbruch, S. (2014). Geschlechtsspezifische Beteiligung des menschlichen Kleinhirns an Erwerb und Extinktion konditionierter Furcht im viszeralen Schmerzmodell. *Poster presented at the Annual Meeting of the German Pain Associatio*n, Hamburg, Germany.

Labrenz, F. & Elsenbruch, S. (2014). Der Einfluss der Kontingenzbewusstheit auf die Schmerzbewertung bei der Furchtkonditionierung im viszeralen Schmerzmodell. *Poster presented at the Annual Meeting of the German Pain Associatio*n, Hamburg, Germany.

Grants / Scholarships / Awards

Poster prize at the Annual Meeting of the German Pain Society 2015

Member of the Global Young Faculty, Stiftung Mercator since 2015

G.A. Lienert Scholarship 2015

Poster prize at the Annual Meeting of the German Pain Society 2014

Brain Products Young Scientist Award 2014

Travel Grant from Ruhr-University Bochum 2012

Title of the Poster

Contingency awareness shapes acquisition and extinction of emotional responses in a conditioning model of pain-related fear.

M.Sc. Psych. Laura Ricarda Koenen

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University of Duisburg-Essen
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Web: http://ww2.uk-essen.de/medizinische-psychologie

Curriculum Vitae

Since 2014	**Doctoral candidate, Institute of Medical Psychology and Behavioral Immunobiology**, University Hospital Essen, Germany
2013 - 2014	Research Fellow, Catholic University of Applied Sciences, North Rhine-Westphalia
2011 - 2013	Master of Sciences, Social- and Cognitive Psychology, University of Mannheim, Germany
2008 - 2011	Bachelor of Sciences, Psychology, Saarland University, Germany
2008	Abitur (high schooldiploma), Liebfrauenschule Köln-Lindenthal, Germany

Methods and Research Interests

Mechanisms of learning and extinction in visceral pain

Modality-specific pain anticipation and processing

Poster Presentations and Talks **(selected)**

L. R. Koenen, A. Icenhour, K. Forkmann, A. Pasler, N. Theysohn, U. Bingel, und S. Elsenbruch (2015). Unterschiede in der Antizipation und Bewertung viszeraler und somatischer Schmerzstimuli bei wiederholter Reizdarbietung. Poster presented at *the Annual Meeting of the German Pain Associatio*n, Mannheim, Germany.

Grants / Scholarships / Awards

1st Poster Prize at the NeuroDoWo Cologne

Member of the DGPS, German Society of Psychology, since 2013

Title of the Poster

Differential emotional processing in the anticipation and perception of visceral and somatic pain

Thank you

FOR 1581

P1

Onur Güntürkun
Maik Stüttgen
Daniel Lengersdorf
Sarah Starosta

P2

Denise Manahan-Vaughan

P3

Manfred Schedlowski
Harald Engler
Martin Hadamitzky
Laura Lückemann

P4

Harald Lachnit
Metin Üngör
Sara Lucke

P5

Oliver Wolf
Christian Merz,
Tanja Hamacher-Dang
Valerie Kinner
Shira Meir Drexler

P6

Silke Lissek
Martin Tegenthoff
Anne Golisch

P7

Sigrid Elsenbruch
Sven Benson
Jost Langhorst
Adriane Icenhour
Ricarda Koenen
Franziska Labrenz

P8

Dagmar Timmann-Braun
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Thomas Ernst

P9

Armin Zlomuzica
Jürgen Margraf
Silvia Schneider
Friederike Preusser

Coordination Team

Sandra Linn
Janet Mertzen

Notes

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