

Sarah Theres **Völkel**



<please contact for personal information>

Munich, Germany



German



<please contact for personal information>



sarah.voelkel@ifi.lmu.de



www.sarahvoelkel.com

Education

since 07/2017

PhD in Human-Computer Interaction

Media Informatics Group | LMU Munich | Munich

- PhD topic: Personality: An Influencing Factor in User Interaction with Everyday Intelligent Systems
- Expected graduation date: 08/2021

10/2013 – 11/2016

M.Sc. Technical Communication & Computer Science

RWTH Aachen University | Aachen | overall grade: very good (1.3)

- Focus: HCI, technology acceptance, user diversity, e-learning, practical application of empirical methods
- Thesis: Can Tangibles Perform Magic? Learners' Requirements for Successful Performance in Computer Science Using Haptical Interfaces

08/2014 – 12/2014

International Student

Brock University | St. Catharines | Canada

Focus: Human Motivation, social psychology, professional communication

10/2010 – 09/2013

B.Sc. Technical Communication & Computer Science

RWTH Aachen University | Aachen | overall grade: very good (1.5)

- Focus: Empirical research methods, cognition psychology, interface design
- Thesis: Usability of the Multimedia Guide Aixplorer: An Empirical User Study in Aachen's Town Hall

10/2009 – 09/2015

B.Sc. Computer Science

RWTH Aachen University | Aachen | overall grade: good (1.7)

- Focus: HCI, e-learning, designing interactive systems
- Thesis: Evaluating the Impact of an Interactive Statistical Analysis System on Learning Statistics

08/2000 – 06/2009

University Entrance Exam (German A-level/SAT exam)

<please contact for personal information>, overall grade: A (1.4)

Professional Experience

since 07/2017

Research Associate

Media Informatics Group | LMU Munich | Munich

- Postgraduate research on conversational user interfaces, personality-tailored personalisation, transparent and controllable AI
- Restructuring of implementation processes as lead developer for a large-scale mobile sensing application in the interdisciplinary LMU PhoneStudy project (leading a team of six students; until 10/2018)
- Teaching classes and supervising more than 40 theses & seminar students
- Organising lab events (e.g., Open Lab Day, Internal Doctoral Colloquium) and internal processes (e.g., GDPR regulations)

- 07/2017 – 06/2020 **Cooperation Doctoral Student for User Experience**
Series Development User Experience | Audi AG | Ingolstadt
- Developing concepts, implementing and evaluating prototypes in the interdisciplinary research project “User-centred machine learning for vehicles”
 - Consulting on the development of personalised voice assistants
 - Presenting projects and giving workshops for different audiences
- 12/2016 – 03/2017
04/2016 – 05/2016 **User Experience Student Assistant / Intern**
bitstars GmbH | HoloBuilder, Inc. | Aachen
- Testing the usability of an AR/AV application
 - Developing interactive tutorials to improve web application’s UX
- 10/2013 – 12/2016 **Student Assistant in Interdisciplinary Research Projects**
HCI Centre | RWTH Aachen University | Aachen
- Preparing and implementing qualitative interviews & focus groups
 - Designing experiments and evaluating quantitative studies
 - Developing low fidelity prototypes
- 04/2013 **Scientific Junior Associate**
Media Computing Group | RWTH Aachen University | Aachen
- Implementing & evaluating a feature for an iPhone-based multimedia guide
- 04/2011 – 07/2011
04/2012 – 07/2012 **Student Assistant for a Tutorial**
Logic and Theory of Discrete Systems | RWTH Aachen University | Aachen
- Giving a tutorial for the lecture “Formal Languages, Automata, & Processes”

Scholarships & Grants

- since 01/2020 **Admission into the Faculty Mentoring Program**
awarded by the Faculty for Mathematics, Computer Science, and Statistics
- 01/2019 **SIGCHI Travel Grant**
for supporting the SIGCHI Executive Committee as student volunteer
- 2017 – 2020 **Grant for PhD studies by Audi AG**
3-year funding for PhD studies awarded by Audi AG
- 2014 **Scholarship for International Travels**
awarded by the German National Academic Foundation
- since 2012 **Admission into the German National Academic Foundation**
Honours for study achievements and social commitment

Awards

- CHI 2020 **Honourable Mention Award** (Top 5% of submissions)
[Sarah Theres Völkel](#), Ramona Schoedel, Daniel Buschek, Clemens Stachl, Verena Winterhalter, Markus Bühner, and Heinrich Hussmann. 2020. Developing a Personality Model for Speech-based Conversational Agents Using the Psycholexical Approach. In Proceedings of the 2020 CHI Conference on Human Factors in Computing Systems (CHI ’20).
- IUI 2019 **Outstanding Paper Award** (Top 5% of submissions)
Malin Eiband, [Sarah Theres Völkel](#), Daniel Buschek, Sophia Cook, and Heinrich Hussmann. 2019. When people and algorithms meet: user-reported problems in intelligent everyday applications. In Proceedings of the 24th International Conference on Intelligent User Interfaces (IUI ’19).
- 2013, 2011 **DeansList of RWTH Aachen University**
Honours for study achievements
- 2009 **Silver coin for valedictorian honour**
Silver coin for special social commitment
Awarded by the school’s support association

Volunteer Work

since 03/2020

Project Manager and Front-end Developer

Retla e.V. | Munich

- Developing a website and online data management solution to register seniors and helpers and match them as phone pals
- Project management, requirement analysis, stakeholder communication
- Developing the front-end using HTML, CSS, JavaScript, jQuery, Bootstrap, DataTables

since 03/2020

Private Tutor

Corona School e.V.

- Supporting a pupil online in Math, Computer Science, and German during Covid-19 lockdowns of schools

01/2015 – 12/2016
03/2014 – 08/2014

Head of Team

University's Welcome Week Team (ESA Team) | RWTH Aachen University

- Organising the university's Welcome Week for 8,000 students and coordinating the 2,000 involved helpers
- Managing the 17-person team
- Developing the financial concept and acquiring sponsoring
- Communicating with project partners from the university and Aachen city
- Representing the project at the university and in the press

05/2015 – 04/2017

Project Manager for Strategy Development

Students' Union Executive Committee | RWTH Aachen University

- Developing the strategic and innovative orientation
- Organising conceptual workshops and public relations

2015/2016

Deputy Member, Member of the Committee for Mobility

Student Parliament | RWTH Aachen University

10/2011 – 05/2016

Deputy Head of Welcome Week

Student Council for Communication Science | RWTH Aachen University

- Mediating and communicating between students and university regarding education quality, member of several faculty and university committees

Research Community

Program Committee

- Conversational User Interfaces Conference 2021 (CUI '21)
- Transparency and Explainable Smart Systems Workshop (TExSS) at IUI '21
- Explainable Smart Systems Workshop (ExSS) at IUI '20

Organisation

- Publication Chair at AutoUI '19
- Workshop Proceedings Chair at MuC '19

Student Volunteer

- SIGCHI Executive Committee Volunteer for ACM Executive Vice President Helena Mentis
- MobileHCI '19
- AutoUI '17
- MuC '16

Peer Reviewing

- Conferences: CHI '21, WI '21, CHI '20, NordiCHI '20, ECIS '20, CHI '19, Interact '19, MobileHCI '18, AutomotiveUI '18
- Journals: ToCHI, IxD&A, European Journal of Personality
- I received 7 recognitions for outstanding reviews for CHI '19, '20 and '21

Teaching Experience

2021	Guest lecture on ExplainableAI (Master) LMU Munich
2020/21, 2019/20	Tutorial for " Intelligent User Interfaces " (Master) LMU Munich
2020/21	Practical class " Media Design " (Bachelor) LMU
2020	Invited guest lecture for online " AI Campus " class DFKI Saarbrücken
2020	Tutorial for " User Experience II " (Bachelor) LMU Munich
2019	Invited guest lecture in Psychology seminar " Personality-centred personalisation " (Master) LMU Munich
2019	Seminar " Media Informatics " (Master) LMU Munich
2019, 2018	Guest lecture " Advanced Topics in HCI " (Master) LMU Munich

Skills

Project Management & Organisation

Structuring processes, managing teams, organising events (Certificate for Event Management)



Qualitative Research Methods

Interviews, focus groups, thematic analysis, Grounded theory, inductive open coding



Experimental Design

Designing suitable experiments with respect to validity, reliability, and replicability



Data Analytics

Python, R, statistical inference, text analytics, NLTK, Google Natural Language API, Mallet, Gensim



Web, App, and Conversational UI Development

JavaScript, HTML, CSS, Java, Python, jQuery, DataTables, Bootstrap, MongoDB, MySQL, Alexa Developer Console, Telegram Bot



Design

Adobe Photoshop, Illustrator, InDesign



Languages

German: mother tongue English: fluent

French: basic

Spanish: basic

Publications

Peer-reviewed Conference Papers

[Sarah Theres Völkel](#), Daniel Buschek, Malin Eiband, Benjamin Cowan, and Heinrich Hussmann. **Eliciting and Analysing Users' Ideal Dialogues with Voice Assistants**. To appear in Proceedings of the 2021 CHI Conference on Human Factors in Computing Systems (CHI '21). ACM, New York, NY, USA.

Beat Rossmly, [Sarah Theres Völkel](#), Elias Naphausen, Patricia Kimm, Alexander Wiethoff, and Andreas Muxel. 2020. **Punishable AI: Examining Users' Attitude Towards Robot Punishment**. In Proceedings of the 2020 ACM Designing Interactive Systems Conference (DIS '20). ACM, New York, NY, USA. <https://doi.org/10.1145/3357236.3395542>

[Sarah Theres Völkel](#), Penelope Kempf, and Heinrich Hussmann. 2020. **Personalised Chats with Voice Assistants: The User Perspective**. In Proceedings of the 2nd Conference on Conversational User Interfaces (CUI '20). ACM, New York, NY, USA. <https://doi.org/10.1145/3405755.3406156>

[Sarah Theres Völkel](#), Ramona Schoedel, Daniel Buschek, Clemens Stachl, Verena Winterhalter, Markus Bühner, and Heinrich Hussmann. 2020. **Developing a Personality Model for Speech-based Conversational Agents Using the Psycholexical Approach**. In Proceedings of the 2020 CHI Conference on Human Factors in Computing Systems (CHI '20). ACM, New York, NY, USA. <https://dx.doi.org/10.1145/3313831.3376210>
🏆 Honourable Mention Award

[Sarah Theres Völkel](#), Renate Häuslschmid, Anna Werner, Andreas Butz, and Heinrich Hussmann. 2020. **How to Trick AI: Users' Strategies for Protecting Themselves Against Automatic Personality Assessment**. In Proceedings of the 2020 CHI Conference on Human Factors in Computing Systems (CHI '20). ACM, New York, NY, USA. <https://dx.doi.org/10.1145/3313831.3376877>

[Sarah Theres Völkel](#), Christina Schneegass, Malin Eiband, and Daniel Buschek. 2020. **What is "Intelligent" in Intelligent User Interfaces? A Meta-Analysis of 25 years of IUI**. In Proceedings of the 25th International Conference on Intelligent User Interfaces (IUI '20). ACM, New York, NY, USA. <https://dx.doi.org/10.1145/3377325.3377500>

[Sarah Theres Völkel](#), Daniel Buschek, Jelena Pranjic, and Heinrich Hussmann. 2019. **Understanding Emoji Interpretation through User Personality and Message Context**. In Proceedings of the 21st International Conference on Human-Computer Interaction with Mobile Devices and Services (MobileHCI '19). ACM, New York, NY, USA. <https://doi.org/10.1145/3338286.3340114>

Malin Eiband, [Sarah Theres Völkel](#), Daniel Buschek, Sophia Cook, and Heinrich Hussmann. 2019. **When People and Algorithms Meet: User-reported Problems in Intelligent Everyday Applications**. In Proceedings of the 24th International Conference on Intelligent User Interfaces (IUI '19). ACM, New York, NY, USA. <https://doi.org/10.1145/3301275.3302262> 🏆 Outstanding Paper Award

Niklas Müller, Bettina Eska, Richard Schäffer, [Sarah Theres Völkel](#), Michael Braun, Gesa Wiegand, and Florian Alt. 2018. **Arch'n'Smile: A Jump'n'Run Game Using Facial Expression Recognition Control For Entertaining Children During Car Journeys**. In Proceedings of the 17th International Conference on Mobile and Ubiquitous Multimedia (MUM 2018). ACM, New York, NY, USA. <https://doi.org/10.1145/3282894.3282918>

Michael Braun, [Sarah Theres Völkel](#), Gesa Wiegand, Thomas Puls, Daniel Steidl, Yannick Weiß, and Florian Alt. 2018. **The Smile is The New Like: Controlling Music with Facial Expressions to Minimize Driver Distraction**. In Proceedings of the 17th International Conference on Mobile and Ubiquitous Multimedia (MUM 2018). ACM, New York, NY, USA. <https://doi.org/10.1145/3282894.3289729>

Michael Braun, Anna-Katharina Frison, [Sarah Theres Völkel](#), Florian Alt, Heinrich Hussmann, and Andreas Riener. 2018. **Beyond Transportation: How to Keep Users Attached When They Are Neither Driving nor Owning Automated Cars?** In Adjunct Proceedings of the 10th International Conference on Automotive User Interfaces and Interactive Vehicular Applications (AutomotiveUI '18). ACM, New York, NY, USA. <https://doi.org/10.1145/3239092.3265963>

[Sarah Theres Völkel](#), Julia Graefe, Ramona Schödel, Renate Häuslschmid, Clemens Stachl, Quay Au, and Heinrich Hussmann. 2018. **I Drive My Car and My States Drive Me: Visualizing Driver's Emotional and Physical States**. In Adjunct Proceedings of the 10th International Conference on Automotive User Interfaces and Interactive Vehicular Applications (AutomotiveUI '18). ACM, New York, NY, USA. <https://doi.org/10.1145/3239092.3267102>

Sarah Theres Völkel, Wiktorija Wilkowska, and Martina Ziefle. 2018. **Gender-specific Motivation and Expectations toward Computer Science**. In Proceedings of the 4th Conference on Gender & IT (GenderIT '18). ACM, New York, NY, USA. <https://doi.org/10.1145/3196839.3196858>

Chat Wacharamanotham, Krishna Subramanian, Sarah Theres Völkel, and Jan Borchers. 2015. **Statsplorer: Guiding Novices in Statistical Analysis**. In Proceedings of the 33rd Annual ACM Conference on Human Factors in Computing Systems (CHI '15). ACM, New York, NY, USA. <https://doi.org/10.1145/2702123.2702347>

Journals

Malin Eiband, Sarah Theres Völkel, Daniel Buschek, Sophia Cook, and Heinrich Hussmann. 2020. **A Method and Analysis to Elicit User-reported Problems in Intelligent Everyday Applications**. ACM Trans. Interact. Intell. Syst. (TiiS), Article 28. <https://doi.org/10.1145/3370927>

Clemens Stachl, Quay Au, Ramona Schoedel, Samuel D. Gosling, Gabriella M. Harari, Daniel Buschek, Sarah Theres Völkel, Tobias Schuwerk, Michelle Oldemeier, Theresa Ullmann, Heinrich Hussmann, Bernd Bischl, and Markus Bühner. 2020. **Predicting Personality from Patterns of Behavior Collected with Smartphones**. Proceedings of the National Academy of Sciences (PNAS). <https://doi.org/10.1073/pnas.1920484117>

Ramona Schoedel, Florian Pargent, Quay Au, Sarah Theres Völkel, Tobias Schuwerk, Markus Bühner, and Clemens Stachl. **To Challenge the Morning Lark and the Night Owl: Using Smartphone Sensing Data to Investigate Day-Night Behaviour Patterns**. 2020. European Journal of Personality. <https://doi.org/10.1002/per.2258>

Ramona Schoedel, Quay Au, Sarah Theres Völkel, Florian Lehmann, Daniela Becker, Markus Bühner, Bernd Bischl, Heinrich Hussmann, and Clemens Stachl. 2018. **Digital Footprints of Sensation Seeking: A Traditional Concept in the Big Data Era**. In Zeitschrift für Psychologie, 226, 242-245. Hogrefe Publishing, Göttingen. <https://doi.org/10.1027/2151-2604/a000342>

Peer-reviewed Bookchapter

Sarah Theres Völkel, Ramona Schödel, Daniel Buschek, Clemens Stachl, Quay Au, Bernd Bischl, Markus Bühner, and Heinrich Hussmann. 2019. **Opportunities and challenges of utilizing personality traits for personalization in HCI**. In Personalized Human-Computer Interaction. Chapter 2. <https://doi.org/10.1515/9783110552485-002>

Peer-reviewed Workshop Papers

Sarah Theres Völkel, Penelope Kempf, and Heinrich Hussmann. 2020. **Personalised Chats with Voice Assistants: The User Perspective**. In CHI Workshop "CUI@CHI".

Michael Chromik, Malin Eiband, Sarah Theres Völkel, and Daniel Buschek. 2019. **Dark Patterns of Explainability, Transparency, and User Control for Intelligent Systems**. In IUI Workshop "Explainable Smart Systems".

Daniel Buschek, Sarah Theres Völkel, Clemens Stachl, Lukas Mecke, Sarah Prange, and Ken Pfeuffer. 2018. **Experience Sampling as Information Transmission: Perspective and Implications**. In Proceedings of the 2018 ACM International Joint Conference and 2018 International Symposium on Pervasive and Ubiquitous Computing and Wearable Computers.

Sarah Theres Völkel, Ramona Schödel, and Heinrich Hussmann. 2018. **Designing for Personality in Autonomous Vehicles: Considering Individual's Trust Attitude and Interaction Behaviour**. In CHI Workshop "Interacting with Autonomous Vehicles: Learning from other Domains".