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### TRR241 Retreat Jena 5th-7th October

The TRR241 welcomed all members at the Retreat in Jena. In addition to progress reports from all projects, Sebastian Zundler (Department of Medicine 1, University Clinic Erlangen) and Ashley D. Sanders (European Molecular Biology Laboratory, Genome Biology Unit) presented guest lectures. During the Project Leader Assembly, progress and aims regarding the IBDome project, sequencing of stimulated organoids and the establishment of a data base were discussed. Furthermore, the TRR241 members agreed that Lump Sum Funds will be used in 2021 to support projects of young researchers, high risk projects and projects bridging Erlangen, Berlin, Kiel and Innsbruck.



#### Save the Date - Vision 2030: Changing Paradigms in IBD

In **2021, June 10<sup>th</sup>-11<sup>th</sup>**, the International Symposium "**Vision 2030: Changing Paradigms in IBD**" will take place in the Berlin-Brandenburgische Akademie der Wissenschaften in Berlin. We are looking forward to meet you there. Further information, registration and AGENDA will follow soon.







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### We proudly present the PhD students of the TRR241

My name is Mariam Mohamed Abdou. I embarked my scientific career by being awarded a B.Sc in Plant Biology and Chemistry from Ain Shams University, Cairo, Egypt. Earlier this year, I obtained my M.Sc in Molecular Biology from Umea University,



# Mariam Mohamed Abdou

Sweden. In October 2020, I started off with a new chapter in my academic journey by joining the group of PD Dr. Nathalie Britzen-Laurent and Prof Dr. Michael Stürzl as a PhD candidate in the Division of Molecular and Experimental Surgery, in the University Clinic of Erlangen. The aim of my doctorate thesis is to elucidate the involvement of the intestinal vascular barrier in the inflammatory bowel disease pathogenesis and especially to tackle the impact of the inflammation-induced intestinal vascular barrier dysfunction on the immune-epithelial crosstalk.



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### We proudly present the PhD students of the TRR241



I am Aayushi Shah, a PhD candidate in the group of Dr. habil. Hyun-Dong Chang at the German Rheumatism Research Center in Berlin. I obtained my B.Sc in Applied Biology and M. Sc in Biomedical Sciences from Hochschule Bonn-Rhein-Sieg, Sankt Augustin. In May 2018, I started my doctoral research, which focuses on the interaction between microbiota and T helper cells in the setting of chronic inflammation.

# Ayushi Shah



My name is Eva-Maria Spath, I obtained both my B.Sc and my M.Sc in Biology at Julius-Maximilians-University of Würzburg. Since September 2020 I am a PhD-student in the group of PD Dr. Clemens Neufert, PhD in the Medical Department 1 of University Clinic Erlangen. My project focuses on the crosstalk between induced intraepithelial lymphocytes and intestinal epithelial cells in intestinal homeostasis and intestinal inflammation.

# **Eva-Maria Spath**



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### New TRR 241 First and Senior Author Publications

Raja Atreya (C02/C03/INF) published with the support of Markus F. Neurath (C04) the article Cobitolimod for moderate-to-severe, left-sided ulcerative colitis (CONDUCT): a phase 2b randomised, double-blind, placebo-controlled, dose-ranging induction trial in the journal The Lancet – Gastroenterology & Hepatology

Jay Patankar (B05) published with the support of Anja Kühl (INF), Raja Atreya (C02/C03/INF), Christoph Becker (A03/Z02), Claudia Günther (A02), Britta Siegmund (B01/Z02) and Markus F. Neurath (C04) the article the SARS-CoV-2 attachment receptor ACE2 is decreased in Crohn's disease and regulated by microbial and inflammatory signaling in the journal Gastroenterology.

Christoph Becker (A03/Z02) published the review at the Forefront of the Mucosal Barrier: The Role of Macrophages in the Intestine in the journal Cells.

Martin Herrmann (B04) published with the support of Moritz Leppkes (B04) and Stefan Wirtz (A03) the article Neutrophil Extracellular Traps Promote the Development and Growth of Human Salivary Stones in the journal Cells.

Raja Atreya (C02/C03/INF) published with the support of Markus F. Neurath (C04) and Britta Siegmund (B01/Z02) the review Personalizing Treatment in IBD: Hype or Reality in 2020? Can We Predict Response to Anti-TNF? in the journal Frontiers of Medicine.

**Raja Atreya (C02/C03/INF)** published with the support of **Markus F. Neurath (C04)** the article **Successful cyclosporin and ustekinumab combination therapy in a patient with severe steroid-refractory ulcerative colitis** in the journal **Therapeutic Advances in Gastroenterology.** 

Raja Atreya (C02/C03/INF) published with the support of Markus F. Neurath (C04) the case report Mild COVID-19 Symptoms in an Infliximab-Treated Ulcerative Colitis Patient: Can Ongoing Anti-TNF Therapy Protect against the Viral Hyperinflammatory Response and Avoid Aggravated Outcomes? in the journal Visceral Medicine.

Raja Atreya (C02/C03/INF) published with the support of Markus F. Neurath (C04) the article Functional Molecular Network Analysis Enables Prediction of Response to Vedolizumab Therapy in Anti-TNF Refractory IBD Patients in the journal Crohn's & Colitis 360.

Matthias Engel (B05) published with the support of Mohammad Khalil (B05) the article Menthacarin attenuates experimental colitis in the journal Phytomedicine.

Britta Siegmund (B01), Anja Kühl (INF) and Malte Lehmann supported the publication Olfactory transmucosal SARS-CoV-2 invasion as a port of central nervous system entry in individuals with COVID-19 in the journal Nature Neuroscience, 2020



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## New drug tested against ulcerative colitis - International phase II clinical trial published under the direction of Erlangen

**Raja Atreya (C02/C03/INF)** head of the IBD department and senior physician at Medical Clinic 1 - Gastroenterology, Pneumology and Endocrinology (Director: Prof Dr. Markus F. Neurath) and the German Center for Immunotherapy at the University Hospital Erlangen, led a clinical phase II study at 91 centers in twelve European countries that tested a novel approach to treat ulcerative colitis. The results have now been published in the journal Lancet Gastroenterology & Hepatology.

### Workshop "Speaker Coaching for Women in Academia" on 03.09.2020

In the workshop "Speaker Coaching for Women in Academia" the participants restaged typical situations of academic and clinical everyday life and developed possibilities to communicate authentically, competently and self-confidently in these. The situations included, e.g. discussions with colleagues, superiors and supervisors, the particularities of lateral leadership as well as dynamics in meetings and committees. The participants were able to identify their individual strengths. In addition, the basics of professional communication as well as hierarchy and gender in Academia were discussed. The workshop became particularly lively when trying out different strategies in dealing with unfair communication strategies and flippant comments. The focus was on humor and empowerment to constructively master communicative challenges. The exchange amongst the participants was also an important element of the workshop.

The trainer was Dr. Neela Enke, PhD in biology, mediator and coach with a focus on career development, communication, gender & diversity and conflict management at universities and scientific institutions. She is managing director and owner of Scienza Science Coaching (<u>www.scienza-berlin.de</u>) as well as book author.





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### **Congratulations in 2020!**

#### Our new professor of mucosal infection biology in Erlangen– PD Dr. rer. nat. Dr. habil. med. Claudia Günther

Congratulations to **Claudia Günther (A02).** She was appointed as new professor of *Mucosal Infection Biology* at the Friedrich-Alexander-University Erlangen. Claudia was trained in infectious, biomedical and translational research at the Johannes Gutenberg-Universität Mainz and the Friedrich-Alexander-Universität Erlangen-Nürnberg. In 2017 she completed her habilitation within the subject *Molecular Gastroenterology and Hepatology* and currently heads the research group *"Mucosal Infection Biology"* at the University Hospital Erlangen. Her research focuses on gastrointestinal pathophysiology including immune-mediated inflammatory and infectious diseases with a particular focus on immunebased therapies and diagnostics in the context of inter-organ communication. A strength of her group is the interdisciplinary and translational research approach, spanning the spectrum from basic cellular and molecular methods to pre-clinical animal models and the validation of our findings in a clinical setting.

**Congratulations to the new Privatdozentin Dr. Magdalena Prüß and Privatdozent Dr. Michael Schumann** on their successful habilitations. The title of his habilitation thesis is "Die mukosale Barriere bei Zöliakie.", the title of her habilitation thesis is "Der motorische Kortex als Vermittler von Schmerzreduktion und Zielstruktur zur Einschätzung von Krankheitsstadien"

### Congratulations to Prof. Dr. Chiara Romagnani

In February 2020 Chiara Romagnani became W3-Professorship at the Charitè Universitätsmedizin and chair of the Leibniz Science Campus "Chronic Inflammation" Berlin, a joint initiative between the Deutsches Rheuma Forschungszentrum and the Charitè Universitätsmedizin, supported by the Leibniz Gemeinschaft.



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