



## 7 September 2016

17:00–19:30 **Congress opening**

Room Aula at Wilhelmsplatz

17:00–17:15 Welcome Conference Chair  
Walter Paulus (Göttingen/DE)

17:15–17:30 Welcome by the Dean of the University Medical Center Göttingen  
Heyo Kroemer (Göttingen/DE)

17:30–18:00 Physiology of transcranial stimulation  
John C. Rothwell (London/GB)

18:00–18:30 Transcranial stimulation in psychiatry  
Mark S. George (Charleston, SC/US)

18:30–19:00 How to convince a faculty to investigate in transcranial stimulation: a researchers and dean's perspective  
Alvaro Pascual-Leone (Boston, MA/US)

19:00–19:30 Transcranial stimulation – past present future  
Mark Hallett (Bethesda, MD/US)

19:30–21:00 **Welcome Reception**

Room Alte Mensa



## 8 September 2016

08:30–10:15 [What is being stimulated?](#)

Room Plenary Hall

Chairs Alvaro Pascual-Leone (Boston, MA/US), Walter Paulus (Göttingen/DE)

08:30–08:35 Welcome Address

Walter Paulus (Göttingen/DE)

08:35–09:00 I-waves: Linked neural chains or resonant membrane properties

Ulf Ziemann (Tübingen/DE)

09:00–09:25 How TDCS polarises a highly folded cortex

Marom Bikson (New York, NY/US)

09:25–09:50 Stimulation outside of motor cortex

Carlo Miniussi (Brescia/IT)

09:50–10:15 Animal models of brain stimulation

Klaus Funke (Bochum/DE)

11:00–12:30 [Assessing brain connectivity with brain stimulation techniques](#)

Room Plenary Hall

Chairs Paolo M. Rossini (Rome/IT), Mark Hallett (Bethesda, MD/US)

11:00–11:20 The Role of Neuroimaging in Brain Stimulation

Antonio Strafella (Toronto/CA)

11:20–11:40 Basal ganglia – cortex interaction

Robert Chen (Toronto/CA)

11:40–12:00 Cerebellum – cortex interaction

Pablo Celnik (Baltimore, MD/US)

12:00–12:20 Network effects in aging

Paolo M. Rossini (Rome/IT)

12:20–12:30 Discussion



14:00–15:20	<b>Modelling and Biophysics</b>
Room	Plenary Hall
Chairs	Angel Peterchev (Durham, NC/US), Marom Bikson (New York, NY/US)
14:00–14:20	Cellular effects of transcranial DC and AC electric stimulation Lucas Parra (New York, NY/US)
14:20–14:40	TBA Davide Reato (New York, NY/US)
14:40–15:00	TBA Angel Peterchev (Durham, NC/US)
15:00–15:20	Transcranial static magnetic field stimulation of the human motor cortex: a short walk on the mechanistic side Antonio Oliviero (Toledo/ES)
14:00–15:20	<b>Therapy Neurology</b>
Room	Hall 2
Chairs	Friedhelm Hummel (Hamburg/DE), Alfons Schnitzler (Düsseldorf/DE)
14:00–14:20	TBA Friedhelm Hummel (Hamburg/DE)
14:20–14:40	Transcranial brain stimulation in post stroke dysphagia Eman M. Khedr (Assiut/EG)
14:40–15:00	NBS strategies in stroke rehabilitation Yun-Hee Kim (Seoul/KR)
15:00–15:20	TBA David Benninger (Lausanne/CH)
15:20–15:50	<b>Modelling and Biophysics</b>
Room	Plenary Hall
Chairs	Gesa Hartwigsen (Leipzig/DE), Surjo Soekadar (Tübingen/DE)
15:20–15:50	<b>Therapy Neurology</b>
Room	Hall 2
Chairs	Paola Marangolo (Rome/IT), Marcus Meinzer (Herston/AU)



16:30–17:50	<b>Modelling and Biophysics</b>
Room	Plenary Hall
Chairs	Axel Thielscher (Hvidovre/DK), Risto Ilmoniemi (Helsinki/FI)
16:30–16:50	New concepts in the design of coils and TMS pulse sequences Risto Ilmoniemi (Helsinki/FI)
16:50–17:10	TBA Pedro Cavaleiro Miranda (Lisabon/PT)
17:10–17:30	New methods for electrode optimization in high-definition transcranial current stimulation Carsten Wolters (Münster/DE)
17:30–17:50	Intracranial electric field measurements during TES in human and non-human primates. What can we learn for accurately modelling TES? Alexander Opitz (Göttingen/DE)
16:30–18:20	<b>Therapy Neurology</b>
Room	Hall 2
Chairs	Christian Gerloff (Hamburg/DE), Jean-Pascal Lefaucheur (Créteil/FR)
16:30–16:50	Transcranial stimulation in the treatment of pain Luis Garcia-Larrea (Lyon/FR)
16:50–17:10	Transcranial stimulation in the treatment of tinnitus Berthold Langguth (Regensburg/DE)
17:10–17:30	Transcranial stimulation in the treatment of stroke Gottfried Schlaug (Boston, MA/US)
17:30–17:50	Generating evidence: On the validity of metaanalyses of transcranial stimulation trials Roy Hamilton (Philadelphia, PA/US)
17:50–18:20	Summary Jean-Pascal Lefaucheur (Créteil/FR)
17:50–18:20	<b>Modelling and Biophysics</b>
Room	Plenary Hall
Chairs	Andreas Neef (Göttingen/DE), N. N.



## 9 September 2016

- 08:30–10:15 **Interaction with ongoing brain activity: cognition**  
Room Plenary Hall  
Chairs Christoph Herrmann (Oldenburg/DE), Gregor Thut (Glasgow/GB)
- 08:30–08:50 Highlights of the Thursday afternoon sessions by their chairs
- 08:50–09:12 Feedback control of stimulus timing  
Hartwig Siebner (Hvidovre/DK)
- 09:12–09:34 Interaction of tACS with ongoing brain rhythms  
Christoph Herrmann (Oldenburg/DE)
- 09:34–09:56 Interaction of TMS with oscillatory activity  
Gregor Thut (Glasgow/GB)
- 09:56–10:15 Ethics and brain stimulation  
J. Brockmöller (Göttingen/DE)
- 11:00–12:30 **Computational Neurostimulation**  
Room Plenary Hall  
Chairs John C. Rothwell, Sven Bestmann (London/GB)
- 11:00–11:20 How could models help to enhance the specificity of cognitive stimulation effects?  
Juha Silvanto (London/GB)
- 11:20–11:40 Using network models to understand the impact of tES on behaviour  
Sven Bestmann (London/GB)
- 11:40–12:00 Using computational models to capture the effects of tDCS on neural activity and behaviour  
Biyu Jade He (Washington D. C./US)
- 12:00–12:20 Plasticity, networks and TMS  
Ido Kanter (Ramat Gan/IL)
- 12:20–12:30 Discussion
- 14:00–15:20 **TMS: what is stimulated? M1**  
Room Plenary Hall  
Chairs Yoshikazu Ugawa (Fukushima/JP), David Liebetanz (Göttingen/DE)
- 14:00–14:20 TMS activates and modulates multiple cortical circuits  
Vincenzo Di Lazzaro (Rome/IT)



- 14:20–14:40 Network modeling of M1 stimulation  
Peter Fox (San Antonio, TX/US)
- 14:40–15:00 TBA  
Martin Sommer (Göttingen/DE)
- 15:00–15:20 Where do we stimulate M1? A combined neurophysiological and modelling approach  
Axel Thielscher (Hvidovre/DK)
- 14:00–15:20 **Cognitive and multimodal stimulation**  
Room Hall 2  
Chairs Carlo Miniussi (Brescia/IT), Alexander T. Sack (Maastricht/NL)
- 14:00–14:20 TMS effects at the systems level: new insights from neuroimaging.  
Christian Grefkes (Cologne/DE)
- 14:20–14:40 TBA  
Alexander Sack (Maastricht/NL)
- 14:40–15:00 Cognitive processes of motor behavior revealed by tDCS  
Nadia Bolognini (Milan/IT)
- 15:00–15:20 tDCS-enhanced learning in aging and neurodegenerative disease  
Agnes Floel (Berlin/DE)
- 15:20–15:50 **TMS: what is stimulated? M1**  
Room Plenary Hall  
Chairs Antonio Suppa (Rome/IT), Yuichiro Shirota (Göttingen/DE)
- 15:20–15:50 **Cognitive and multimodal stimulation**  
Room Hall 2  
Chairs Rafael Polania (Zurich/CH), Min-Fang Kuo (Dortmund/DE)
- 16:30–17:50 **TMS: What is stimulated? Beyond M1**  
Room Plenary Hall  
Chairs Hartwig Siebner (Hvidovre/DK), Klaus Funke (Bochum/DE)
- 16:30–16:50 Hebbian plasticity in the parieto-frontal network  
Giacomo Koch (Rome/IT)
- 16:50–17:10 TMS to cerebellum what is stimulated?  
Sabine Meunier (Paris/FR)



- 17:10–17:30 Spinal cord stimulation  
Dirk De Ridder (Dunedin/NZ)
- 17:30–17:50 To what extent can motor cortex stimulation results be generalised to other cortical areas?  
Walter Paulus (Göttingen/DE)
- 16:30–17:50 **tDCS/tACS: what is stimulated?**  
Room Hall 2  
Chairs Michael Nitsche (Göttingen/DE), Alberto Priori (Milan/IT)
- 16:30–16:50 Targeting the biased brain. Non-invasive brain stimulation to ameliorate cognitive control  
Christian Plewina (Tübingen/DE)
- 16:50–17:10 Combining tDCS with MR - novel insights into the mechanisms underlying plasticity in humans  
Charlotte Stagg (Oxford/GB)
- 17:10–17:30 tDCS: beyond neuronal excitability changes  
Alberto Priori (Milan/IT)
- 17:30–17:50 ACS treatment for brain network reorganization and vision restoration  
Bernhard A. Sabel (Magdeburg/DE)
- 17:50–18:20 **TMS: What is stimulated? Beyond M1**  
Room Plenary Hall  
Chairs Lukas J. Volz (Santa Barbara, CA/US), Zaira Cattaneo (Milan/IT)
- 17:50–18:20 **tDCS/tACS: what is stimulated?**  
Room Hall 2  
Chairs Zsolt Turi (Göttingen/DE), Dennis Schutter (Nijmegen/NL)
- 19:30–00:00 **Social evening**  
Room Civic Hall



## 10 September 2016

- 08:30–10:30     **Plasticity: real or imaginary?**  
Room              Plenary Hall  
Chairs             Joseph Classen (Leipzig/DE), Ulf Ziemann (Tübingen/DE)
- 08:30–09:00     Highlights of the Friday afternoon sessions by their chairs
- 09:00–09:22     Complexity in the after-effects of tDCS  
Michael Nitsche (Göttingen/DE)
- 09:22–09:44     Optimizing logical coupling between brain stimulation and pharmacotherapy with use of animal models  
Alexander Rotenberg (Boston, MA/US)
- 09:44–10:06     Reliability and reproducibility: the problem  
Angelo Quararone (Messina/IT)
- 10:06–10:30     Reliability and reproducibility: the solution  
Yoshikazu Ugawa (Fukushima/JP)
- 11:00–12:15     **Is therapy a realistic option at the present time?**  
Room              Plenary Hall  
Chairs             Frank Padberg (Munich/DE), Felipe Fregni (Boston, MA/US)
- 11:00–11:10     For  
Colleen Loo (Sydney/AU)
- 11:10–11:20     For  
Felipe Fregni (Boston, MA/US)
- 11:20–11:30     Against  
Andrea Antal (Göttingen/DE)
- 11:30–11:40     Against  
Dennis Schutter (Nijmegen/NL)
- 11:40–12:15     Discussion
- 14:00–15:20     **Learning**  
Room              Plenary Hall  
Chairs             Leonardo G. Cohen (Bethesda, MD/US), Reinhard Dengler (Hanover/DE)
- 14:00–14:20     TBA  
Leonardo G. Cohen (Bethesda, MD/US)
- 14:20–14:40     TBA  
N. N.



14:40–15:00 Neural predictors of the effect of transcranial electrical stimulation on learning  
Roi Cohen Kadosh (Oxford/GB)

15:00–15:20 Cerebellar stimulation effects on motor learning  
Asha Kishore (Trivandrum/IN)

14:00–15:20 **Therapy Psychiatry**  
Room Hall 2  
Chairs Mark S. George (Charleston/US), Sarah Lisanby (Bethesda, MD/US)

14:00–14:20 TBA  
Felipe Fregni (Boston, MA/US)

14:20–14:40 Optimizing rTMS for enhanced efficacy in depression  
Zafiris Jeffrey Daskalakis (Toronto/CA)

14:40–15:00 Transcranial stimulation in psychiatry – translational research towards treatment?  
Frank Padberg (Munich/DE)

15:00–15:20 rTMS in depression - is more always better?  
Paul Fitzgerald (Melbourne/AU)

15:20–15:50 **Learning**  
Room Plenary Hall  
Chairs Janine Reis (Freiburg/DE), Melanie Wilke (Göttingen/DE)

15:20–15:50 **Therapy Psychiatry**  
Room Hall 2  
Chairs Kerrie-Anne Ho (Sydney/AU), Adam Woods (Gainesville, FL/US)

16:20–17:40 **Plasticity**  
Room Plenary Hall  
Chairs Andrea Antal (Göttingen/DE), Ying-Zu Huang (Taoyuan/TW)

16:20–16:40 A brain network perspective on tDCS induced neuroplasticity: single versus dual or multiple sites stimulation  
Shapour Jaberzadeh (Victoria/AU)

16:40–17:00 Influence of anti-parkinson drugs on plastic changes induced by quadripulse transcranial magnetic stimulation (QPS)  
Ritsuko Hanajima (Tokyo/JP)



- 17:00–17:20 What do we learn from the interaction between physical activities and effects of transcranial brain stimulation?  
Ying-Zu Huang (Taoyuan/TW)
- 17:20–17:40 TBA  
Masashi Hamada (Tokyo/JP)
- Therapy Psychiatry
- 16:20–18:00  
Room Hall 2  
Chairs Frank Padberg (München/DE), Andre Brunoni (São Paulo/BR)
- 16:20–16:40 Non-invasive brain stimulation for the treatment of negative symptoms in schizophrenia: clinical and biological effects  
Alkomeit Hasan (Munich/DE)
- 16:40–17:00 tDCS for the treatment of mood disorders  
Andre Brunoni (São Paulo/BR)
- 17:00–17:20 tDS in patients with schizophrenia  
Jerome Brunelin (Bron/FR)
- 17:20–17:40 Electrophysiological correlates and prognostic biomarkers of TMS clinical effectiveness  
N. N.
- 17:40–18:00 Summary  
Sarah Lisanby (Bethesda, MD/US)
- 17:40–18:00  
Room Plenary Hall  
Chairs Diane Ruge (London/GB), Brita Fritsch (Freiburg/DE)
- 18:00–18:20 Highlights of Saturday afternoon sessions  
Room Plenary Hall
- 18:20–18:30 Final remarks  
Room Plenary Hall
- 18:30–18:35 Closure and Farewell  
Room Plenary Hall