17th Biennial Conference
October 18-21, 2012
New York City, USA

Conference Program
Thursday, October 18

The special symposium on EEG Based Personalized medicine in psychiatry and the traditional Training Course will be conducted in parallel. Both programs can be found below.

EEG Based Personalized Medicine in Psychiatry Symposium

An introduction: EEG Subtypes and Endophenotypes
9.00-9.45 QEEG subtyping and treatment optimization and outcome
   Leslie Prichep
9.45-10.30 A review and integration of EEG based predictors for treatment outcome in ADHD and Depression
   Martijn Arns

10.30-11.00 Coffee break

‘EEG Cordance’ and the ATR (Antidepressant Treatment Response)
11.00 - 11.45 Neurophysiologic predictors of treatment response in major depression
   Andrew Leuchter
11.45 – 12.15 Prefrontal EEG Cordance as a predictor of response to antidepressive treatment in patients with MDD and bipolar depression
   Martin Brunovsky

12.15-13.30 Lunch

ERP approaches to Personalized Medicine and EEG Vigilance
13.30-14.15 Resting EEG and evoked potential predictors of clinical response to antidepressants
   Gerard Bruder
14.15-15.00 Can vigilance regulation be used to predict clinical response to antidepressants?
   Ulrich Hegerl

15.00-15.30 Coffee break

EEG based Personalized Medicine: The Industry perspective
15.30-16.15 Biomarker Discovery – Integrative Neuroscience and EEG Biomarkers
   Evian Gordon
16.15-17.00 Pharmacologic treatment of major depressive disorder guided by QEEG
   Daniel Hoffman

17.00-18.00 Roundtable
   Designing a roadmap for the future of EEG based Personalized Medicine in Psychiatry.
Training Course

The traditional one-day Training Course is delivered by a panel of experts. The series of lectures covers a broad spectrum of aspects related to pharmaco-EEG and its applications.

Basics
9:00-9:15 Introduction
9:15-10:00 Pharmaco-EEG/PSG Recording and Analysis in Animals
  Gé S.F. Ruigt
10:00-10:45 Pharmaco-EEG Recording and Analysis in Humans
  Marc Jobert
10:45-11:00 Coffee break
11:00-11:45 Pharmaco-Sleep Recording and Analysis in Humans
  Peter Anderer
11:45-12:30 EEG-based Functional Imaging with sLORETA
  Roberto D. Pascual-Marquí
12:30-13:15 Lunch

Applications
13:15-14:00 Preclinical EEG – a translatable Biomarker for Drug Discovery Research
  Pim Drinkenburg
14:00-14:45 Role of EEG in Early Decision-Making in Drug Development
  Frederick J. Wilson
14:45-15:00 Coffee break
15:00-15:45 Safety Pharmacology: Use of Pharmaco-EEG and Pharmaco-Sleep
  Henk J. Van der Linde
15:45-16:30 Psychiatry and Clinical Pharmacology: Use of Pharmaco-EEG
  Sebastian Olbrich
16:30-16:45 Coffee break
16:45-17:30 Cordance and Sleep-EEG – Treatment Response in Depression
  Marcel Pawlowski
17:30-18:15 State-of-the-Art Analysis of High-Frequency (gamma) EEG in Humans
  Judith Nottage

Thursday evening October 18
19.00-20.00 Dr. E. Roy John Memorial Lecture
  Roberto D. Pascual-Marquí
20.00-22.00 Cocktail party and welcome reception
Conference Program

**Friday October 19**

8:00-8:30  Coffee light-breakfast

8.30-9.00  Presidential address and welcome  
*Pim Drinkenburg (IPEG President) and Leslie Prichep (IPEG 2012)*

9.00-9.45  **Keynote 1 – The science of pharmaco-EEG: A participant’s Recollections**  
*Max Fink*

9:45 10:15  Coffee break

10:15-12:00  **Oral Presentations (session 1)**

- ERPs to emotionally loaded words as an assessment tool  
  *Einat Ofek*

- The effect of attenuating noradrenergic neurotransmission by clonidine on brain activity measures of visuospatial attention  
  *H.N. Alexander Logemann*

- Electrophysiological and fMRI assessments of perceptual function for use in clinical trials  
  *Pamela D. Butler*

12:00-13:00  Lunch

13.00-13.45  **Keynote 2 – Rostral anterior cingulate function: a potential biomarker of antidepressant treatment response?**  
*Diego Pizzagalli*

13:45-15:15  **Symposium 1 – Translational biomarkers in pharmaco-EEG – from bench to bed and back**

- Quantitative EEG in glutamatergic and serotonergic pharmacological models of schizophrenia – a translational approach  
  *Tomáš Páleníček*

- Translational validity of EEG oscillations in schizophrenia  
  *Abdellah Ahnaou*

- Intravenous ketamine for treatment-resistant unipolar depression: comparison of pharmaco-EEG changes in responders and non-responders  
  *Martin Brunovsky*

- A functional data analysis framework for pharmaco-EEG modeling and inference  
  *Junshui Ma*

15:15-15:30  Coffee break
15:30-17:00  **Symposium 2 – Genetic influences on the pharmaco-EEG in psychiatric diseases and its potential for new pharmacological treatments**  
Genetic influences on the resting EEG, alcoholism and anxiety – convergent findings
Mary-Anne Enoch  
A mouse model of 15q13.3 microdeletion syndrome display pre-attentive processing deficits and EEG phenotypes seen in schizophrenia
Jesper F. Bastlund  
Interindividual differences in the acute effects of cannabis on performance monitoring and inhibitory control
Desirée Spronk  
Modulation of different EEG parameters and depressive impact mood influencing genes of COMT and BDNF
Niels Veth

17.45-late Conference visit to September 11th Memorial and dinner at the NY Academy of Science
Saturday October 20

8:00-8:30    Coffee light-breakfast

8:30-9:15    **Keynote 3 – Contribution of QEEG and subtyping to outcome prediction**  
             Leslie Prichep

9.15-11:30   **Symposium 3 – EEG-based biomarkers in diagnosis and prediction of psycho-pharmacological treatment in neuropsychiatric disorders**
             EEG-vigilance regulation in major depression – from theory to treatment prediction  
             Sebastian Olbrich
             Response prediction to antidepressants using alpha power and asymmetry and anterior cingulate cortex theta activity  
             Natalia Jaworska
             Cordance as a biomarker in sleep-EEG for treatment response in depression – a naturalistic study after antidepressant medication  
             Marcel Pawlowski
             ADHD – Predicting response to stimulant medication on the basis of event-related potentials  
             Geir Ogrim
             qEEG features and medicinal response in epilepsy  
             Hamlin W. Emory

11:30-13:00  **Poster Session**
             (note that the posters will be presented in the conference hall from Friday morning until Saturday evening)

13:00-14:00  Lunch

14:00-14:45  **Keynote 4 – Why have sleep deprivation pro-manic and psychostimulants anti-manic effects? The wakefulness regulation model of affective disorders.**  
             Ulrich Hegerl

14:45-16:30  **Symposium 4 – Pharmaco-EEG and pharmaco-Sleep in drug discovery and development**
             The role of EEG and PSG in decision-making in early drug development  
             Frederick J. Wilson
             Lost in translation  
             Gé S.F. Ruigt
             Visual scoring and computerized data processing are complementary tools – a pharmaco-sleep study investigating the effects of a new antidepressant compared to imipramine  
             Marc Jobert
             Sleep architecture as a translatable biomarker of central pharmacology in the development of PF-04457845, an inhibitor of fatty acid amide hydrolase  
             Rachel Gurrell
16.30-17.00  Coffee break

17:00-18:30  **Oral Presentations (session 2)**

- Effects of the novel anxiolytic drug ABIO 08/01 on sleep and awakening quality in generalized anxiety disorder - polysomnographic and psychometric studies
  *Sergio Rosales-Rodriguez*

- Single-blind, randomized, increasing-dose study of the novel anxiolytic drug ABIO 08/01 in generalized anxiety disorder - clinical and qEEG findings
  *Bernd Saletu*

- Towards a normative database for sleep macro- and microstructure
  *Peter Anderer*

- Music therapy added to standard care modulates fronto-temporal activity in the rest-EEG in depressed clients with comorbid anxiety
  *Jörg Fachner*

18:30-19:30  **IPEG General Assembly**
Sunday October 21

8:00-8:30 Coffee light-breakfast

8:30-9:45 Oral Presentations (session 3)
   EEG vs. Psychometry
   John Marks
   EEG and ERP changes following oral intake of specified oregano extracts: similarities and differences to antidepressant markers
   Peter H. Boeijinga
   Nicotine-related alterations of p50-indexed sensory gating in cannabis users
   Derek J. Fisher

9:45-10:30 Keynote 5 – Relationship between ADHD and sleep problems: A new etiology perspective
   Martijn Arns

10:30-11:00 Coffee break

11.00-12.15 Oral Presentations (session 4)
   Functional connectivity in schizophrenic patients who were treated with aripiprazole
   Masafumi Yoshimura
   Electroencephalographic patterns of the internal connectivity networks of the brain as revealed by simultaneous EEG/fMRI measurements
   Tamer Demiralp
   The qEEG characteristics of ADHD children, responders and non-responders to long-term treatment with Atomoxetine
   Giuseppe A. Chiarenza

12.15-12.30 Werner Hermann Prize winner announcement

12.30-13.00 Farewell and adjourn
   Pim Drinkenburg (IPEG President)
The "International Pharmaco-EEG Society, Association for Electrophysiological Brain Research in Preclinical and Clinical Pharmacology and Related Fields" (IPEG) is a non-profit organisation, established in 1980 and composed of scientists and researchers actively involved in electrophysiological brain research in preclinical and clinical pharmacology, neurotoxicology and related areas of interest.