

- A-125** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**The Use of Proteomics to Identify Molecular Markers of Opioid Tolerance** Howard B. Gutstein, MD; Heju Zhang, BS, *Anesthesiology, UT-MD Anderson Cancer Center, Houston, TX, United States.* New proteomic technology permits the *a priori* identification of molecular markers of opioid tolerance and dependence.
- A-126** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**Phosphorylation of p90 Ribosomal S6 Kinase by Mitogen-Activated Protein Kinase in the Signal Transduction Pathway of the  $\mu$  Opioid Receptor** Takehiro Shoda, M.D.; Hisatoshi Uga, M.D.; Hiroyuki Mima, M.D.; Kazubiko Fukuda, M.D., *Department of Anesthesia, Kyoto University Hospital, Kyoto.* p90RSK are phosphorylated by  $\mu$  opioid receptor activation via PTX-sensitive G-protein and MAPK cascade.
- A-127** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**Acute Treatment with Opioids and Stimulants Alter RGS4 mRNA Levels in Rat Brain** Gavin B. Bishop, B.S.; Eileen J. Curran; Stanley J. Watson; Huda Akil, Ph.D.; Howard B. Gutstein, M.D., *Anesthesiology, M.D. Anderson Cancer Center, Houston, TX, United States.* The current study demonstrates RGS4 mRNA is altered by acute treatment of opioids and psychostimulants.
- A-128** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**Do Opioids Acutely Activate ERK in Neuronal Cell Lines?** Howard B. Gutstein, MD, *Anesthesiology, UT-MD Anderson Cancer Center, Houston, TX, United States.* The activation of extracellular-signal related kinase(ERK) by opioids varies in different neuronal cell lines. This suggests that the effects of opioids on neurons depend on the cell types and second messenger molecules present.
- A-129** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**Do Propofol and Remifentanyl Interact in a Supraadditive Manner?** Sven Albrecht, M.D.; Jorg Fechner, M.D.; Harald Ibmsen, M.Sc.; Thomas Palmaers, M.D.; Helmut Schwilden, MD, Ph.D., *Department of Anesthesiology, University of Erlangen-Nuremberg, Erlangen, Germany.* From a clinical point of view propofol and remifentanyl as measured by the EEG median frequency show an additive type of pharmacodynamic interaction.
- A-130** Room 302, 10/17/2000 9:00 AM - 10:30 AM (PD)  
**Remifentanyl Dose-EEG Bispectral Response during Propofol/Regional Anesthesia** Toshiji Koitabashi, MD; Jay W. Johansen, MD, PhD; Anne M. McKenzie-Brown, MD; Peter S. Sebel, MB, BS, PhD, MBA, *Anesthesiology, Emory University, Atlanta, GA, United States.* The addition of remifentanyl, in a effect site concentration of 0.5 to 10 ng/ml, to a stable propofol anesthetic, decreases BIS in a dose related manner.
- Anesthetic Action: Local & Regional Anesthesia**
- A-131** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Comparative Cardiac Effect of R(+) and S(-) Bupivacaine with S(-) Ropivacaine** Roberto T. Sudo, M.D., Ph.D.; Margarete M. Trachez, M.D., Ph.D.; Gisele Zapata-Sudo, M.D., Ph.D.; Thomas E. Nelson, Ph.D., *Dept. of Basic and Clin. Pharmacol., ICB, UFRJ, Rio de Janeiro, Brazil.* S(-) ropivacaine is less cardiotoxic than racemic, R(+), or S(-) bupivacaine.
- A-132** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Volume Determination of the Thoracolumbar Epidural Space through Magnetic Resonance and Relationship with Anthropometric Parameters** Jose Otavio C. Auler, Jr., Charmain; Mauro R. Piazza, Doctor; Carmen N. Bello, Doctor, *Anesthesia Dept., Hospital das Clinicas - FMUSP, Sao Paulo, Sao Paulo, Brazil.* EPS volume measure through Magnetic Resonance Image: importance in clinical epidural anesthesia technique.
- A-133** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Block of the Brachial Plexus Branches by the Humeral Route with Ropivacaine 0,75%** Elisabeth Gaertner; Guy Freys; Catherine Cuby; Krassimir Dilovsky; Thierry Pottecher, *Anesthesiology, CHU Hautepierre, Strasbourg, France*
- A-134** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Effect of Lidocaine Pretreatment in Preventing the Induction of Acute Necrotizing Pancreatitis in the Rat** Mei-Yung Tsou, MD., Ph.D.; Sylvia Cechova, Ph.D.; Paul Yeaton, M.D.; Thomas N. Pajewski, Ph.D., M.D., *Department of Anesthesiology, Health Science Center, University of Virginia, Charlottesville, VA, United States.* Lidocaine decreases pro-inflammatory cytokine concentrations in acute necrotizing pancreatitis.
- A-135** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Postoperative Femoral Nerve Block Improves Analgesia, Enhances Rehabilitation, and Reduces Length of Hospital Stay after Total Knee Replacement** Hong Wang; Bob B. Doctor; James Verner, *Anesthesiology, Henry Ford Hospital, Detroit, MI, United States.* Femoral nerve block reduces morphine use, improves analgesia, rehabilitation outcome and reduces length of hospital stay.
- A-136** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**How Much Are Na and K Channels Involved in Evoked Cytosolic Ca<sup>2+</sup>-Transients and Local Anesthetic Effects?** Fang Xu, Ph.D.; Esperanza Recio-Pinto, Ph.D.; Jin Zhang, MD; Thomas J.J. Blanck, MD, PhD, *Anesthesiology, The Hospital for Special Surgery, New York, NY, United States.* A major action of various LAs is to inhibit [Ca<sup>2+</sup>]<sub>cyt</sub> in addition to their effects on Na and K channels
- A-137** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Effects of Bupivacaine on Mitochondrial Energy Metabolism in Left Ventricles of Rats Submitted to Chronic Hypoxia** Francois Sztark, MD, PhD; Karine Nouette, MD; Monique Malgat, PhD; Jean-Pierre Mazat, PHD, *Laboratoire d'Anesthesiologie, Universite de Bordeaux 2, Bordeaux, France.* Chronic hypoxia alters energy metabolism in left ventricle and increases bupivacaine toxicity on mitochondria.
- A-138** Room 302, 10/17/2000 2:00 PM - 3:30 PM (PD)  
**Eicosanoid-Shift Using General and Epidural Anaesthesia Compared to Single General Anaesthesia** Anne M. Harks, Dr.; Gerhard Brodner, Dr. Dr.; Hugo Von Aken, Univ.-Prof.; Norbert Senninger, Univ.-Prof.; Guenther Winde, Prof., *General Surgery, University of Muenster, Muenster, Germany.* Combined GA+TEA has an influence on the cyclooxygenase- and lipoxigenase-pathway increasing leukotriens and decreasing thromboxanes.