A-203 Room B, 10/17/2000 2:00 PM - 4:00 PM (PS) Tissue Oxygenation during Acute Normovolemic Hemodilution with a Newly Designed Hydroxyethyl Starch Solution in Volunteers Frank Schroeder, MD; Thomas G. Standl, MD; Axel Nierhaus, MD; Marc A. Burmeister, MD; Jochen Schulte am Esch, MD, Dept. of Anesthesiology, University Hospital Eppendorf, Hamburg, Germany. HES 130,000 provides continuously increased tissue oxygen tensions after hemodilution

A-204 Room B, 10/17/2000 2:00 PM - 4:00 PM (PS) Synthetic Hemoglobin Reduces Perioperative Blood Transfusions in Vascular, Orthopedic and Abdominal Surgery Armin Schubert, MD, MBA; Edward Mascha, MS; Jerome F. O'Hara, Jr, MD; Andrew Novick, MD; Kenneth Marks, MD, Anesthesiology, Cleveland Clinic Foundation, Cleveland, OH, United States. Synthetic hemoglobin results in sparing of PRBC transfusion in 24% of patients undergoing major non-cardiac surgery.

A-205 Room B, 10/17/2000 2:00 PM - 4:00 PM (PS) Evaluation of the Anticoagulation Effect of Heparin Distal to Aortic Occlusion in Vascular Reconstructive Surgery Jaydeep S. Shah, MD; Robert Mueller, MD; Mark Farber, MD; Joseph J. Naples, MD; James E. Szalados, MD, Department of Anesthesiology, University of Texas Health Science Center, San Antonio, TX, United States. Heparinization during aortic reconstruction is maintained distal to the aortic clamp.

A-206 Room B, 10/17/2000 2:00 PM - 4:00 PM (PS) Reducing the Incidence of Heparin Resistance: An Evidence-Based Guideline for Heparin Dosing for Cardiopulmonary Bypass Thomas G. Standl, MD; Yu Chiao Chang, PhD; Sandra de-Bronkart, BSN; Derrick B. Willsey, M.D.; Michael N. D'Ambra, M.D., Dept. of Anes. and Critical Care, Mass. Gen. Hospital, Boston, MA, United States. A practice guideline for heparin in 1310 CPB pts. sig. reduced heparin resistance.

## Clinical Circulation: Pharmacology / Physiology

A-207 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) The Effect of Supplemental Fluid Administration on Tissue Perfusion and Tissue Oxygen Pressure Cem F. Arkilic, M.D.; Akiko Taguchi, M.D.; Arundhathi Ahluwalia, M.D.; Daniel I. Sessler, M.D.; Andrea Kurz, M.D., Anesthesiology, Washington University, St. Louis, MO, United States. Perioperative additional fluid administration significantly increases tissue perfusion and oxygen pressure.

A-208 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Comparison of Peripheral Tissue Perfusion in In-patient Vs. Same Day Admitted Patients Cem F. Arkilic, MD; Akiko Taguchi, MD; Arundhathi Ahluwalia, MD; Neeru Sharma, MD; Andrea Kurz, MD, Anesthesiology, Washington University, St. Louis, MO, United States. Patients admitted to hospital on the same day of surgery are hypovolemic and can not restore normal peripheral perfusion intraoperatively.

A-209 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Circulatory Effects of IV Bolus Fenoldopam John L. Atlee, M.D.; M. Saeed Dhamee, M.D., Anesthesiology, Medical College of Wisconsin, Milwaukee, W.I, United States. Compared to a saline control, IV bolus fenoldopam (0.4, 0.8, 1.2 mcg/kg) decreased blood pressure by 4-8% before anesthesia induction. No dose effectively blunted increased blood pressure after tracheal intubation.

A-210 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Exhaled Nitric Oxide during Liver Transplantation Robert E. Black, BS; Michael A.E. Ramsay, MD; Mario T. Cancemi, BS; Tillmann Hein, MD; Kenneth T. Hicks, CBET, Anesthesiology, Baylor University Medical Center, Dallas, TX, United States. Exhaled nitric oxide levels remain elevated during liver transplantation until reperfusion of the healthy liver.

A-211 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) The Effect of Diprivan<sup>TM</sup> on Ischaemia-Reperfusion Injury after Abdominal Aortic Aneurysm Surgery Patrick J. Breen, FFARCSI; Neil J. McDonald, FFARCSI; Clive W. Mulholland, Ph.D., Department of Anesthesia, St. Vincent's Hospital, Dublin, Ireland. This pilot study shows that Diprivan<sup>TM</sup> fails to attenuate ischaemia-reperfusion injury in marked contrast to thiopentone/isoflurane.

A-212 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Attenuating the Hemodynamic Consequences of Tracheal Stimulation E.G. Czeslick, MD; P.A. Klock, MD; J.M. Klafta, MD; J. Moss, MD; A. Ovassapian, MD, Anesthesia, Universitaet Halle, Halle, Germany. This study examined the effect of 2 doses of sevo and des on attenuating the cough reflex and hemodynamic consequences of tracheal stimulation. At 1 MAC sevo better prevented HR increases and coughing.

A-213 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Endothelium-Dependent Thrombin-Induced Biphasic Regulations of Vascular Tone in Porcine Renal Artery Dmitry N. Derkach, M.D.; Tetsuzo Nakayama, M.D.; Shosuke Takabashi, M.D., Pb.D., Department of Anesthesia and Critical Care Medicine, Graduate School of Medical Sciences, Kyushu University, Fukuoka, Japan. Thrombin induce relaxation and contraction in porcine renal artery.

A-214 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Protecting the Heart with Ischemic Preconditioning and Enflurane Anesthesia during Off-Pump Coronary Surgery Benjamin Drenger, M.D.; Yuval Maroz, M.D.; Dan Gilon, M.D.; Amir Elami, M.D.; Yaacov Gozal, M.D., Anesthesiology, Hadassah University Hospital, Jerusalem, Israel. Ischemic preconditioning and enflurane improved myocardial function and reduced free radical production in off-pump CABG

A-215 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Matrix Metalloproteinase-9 during Cardiopulmonary Bypass Helen F. Galley, PbD; Graeme D. Macaulay, BSc; Nigel R. Webster, MB PbD FRCA, Anaesthesia and Intensive Care, University of Aberdeen, Aberdeen, United Kingdom. TNFα and MMP-9 are both increased during cardiopulmonary bypass. We conclude that iv heparin does not release MMP-9 and that the early rise in TNFα is not due to MMP-9.

A-216 Room C, 10/17/2000 2:00 PM - 4:00 PM (PS) Heart Failure Does Not Alter Propofol Effects on Sarcoplasmic Reticular Calcium Cycling *P.M. Heerdt, MD,PhD; A. The, BA; D.L. Lee, MD, Cornell Univ., New York, NY, United States.* Propofol effects upon SR membranes isolated from failing human hearts with decreased expression of Ca<sup>2+</sup> cycling genes was determined. The data show impaired SR function with CHF but no direct effects of propofol.