



Guest Editorial

Istanbul Symposium on Neonatal and Pediatric
Cardiopulmonary Bypass Procedures

Last summer, after organizing two Istanbul symposiums on pediatric extracorporeal life support systems, the third one was held on December 17, 2011 at the American Hospital in Istanbul, Turkey (1). The main topic of the third symposium was “minimizing adverse effects of cardiopulmonary bypass procedures in neonates and pediatric cardiac patients.” The objective of this editorial is to present the outcomes of the third symposium and suggest more topics for future symposiums in 2012.

The third symposium is dedicated to honor Prof. Dr. Aydın Aytaç for his lifelong contributions as a pioneering surgeon and educator of the development of pediatric cardiac surgery in Turkey (Fig. 1) (2–6).

Special topics

After the welcoming remarks by Atıf Akçevin and Akif Ünder, cochairs of the symposium, Prof. Dr. Ali Ihsan Dokucu, the Health Director of Istanbul, made the opening speech (Fig. 2). After the introduction of the development of pediatric cardiac surgery in Turkey by Prof. Dr. Tayyar Sarioğlu, who is one of the most senior members of the Turkish pediatric cardiac surgery community, 16 invited speakers presented a variety of topics and covered most of the special areas for neonatal and pediatric cardiopulmonary bypass (CPB) in an intense 1-day scientific program. In addition to local invited speakers, clinicians and scientists from abroad (Chris Chin and Huriyet Ersayin-Kantas from London, UK; Thomas Markmann from Germany; and Kerem Pekkan, David Palanzo, and Akif Ünder from the US) participated and shared the latest techniques and circuits for pediatric cardiac surgery. Special topics included challenges of neonatal CPB circuitry and techniques, feasibility of serological testing of multiple biomarkers, impact of pulsatile flow on vital organ recovery, ABC's of neonatal cardiac anesthesia, cerebral protection and neuromonitoring, detection and classifi-

cation of microemboli, team approach to minimize injury, new pediatric ventricular assist device (Rotasist 2.8), bioengineering and hemodynamic design of the aortic cannula for CPB, and establishing a national pediatric cardiovascular research center in Turkey.

Wet labs

Three special neonatal and pediatric CPB circuits were brought from the UK and the US for wet labs (Fig. 3). This gave the participants an opportunity for hands-on experience with different neonatal CPB circuits used abroad. Huriyet Ersayin-Kantas, FCCP, and David Palanzo, CCP, were the instructors for



FIG. 1. Aydın Aytaç, MD.



FIG. 2. (A) Ali Ihsan Dokucu, the Health Director of Istanbul, and (B) Atif Akçevin, MD, Local Chair of the Symposium.

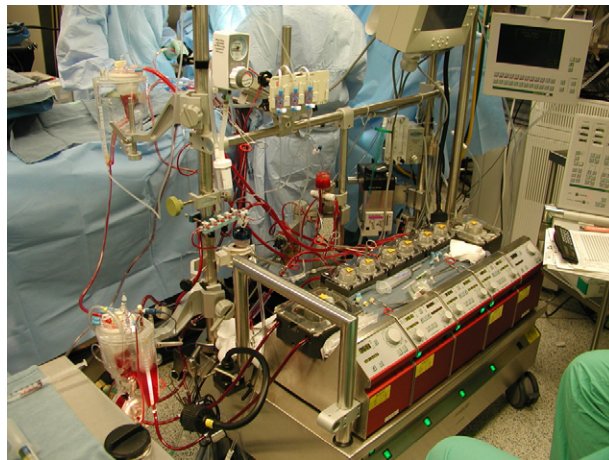


FIG. 3. Penn State Hershey Neonatal CPB circuitry (by David Palanzo, CCP).



FIG. 4. Panel discussion (from left to right: Sertaç Haydin, Rıza Türköz, David Palanzo, Huriyet Ersayın-Kantas, Tayyar Sarıoğlu, Atif Akçevin, Chris Chin).

these special wet labs. In addition, there were exhibits by several manufacturers displaying their newest products. The exposure to these products and circuits was well received and should be continued in future symposiums.

Participants

Unlike the first two symposiums, the third one was by invitation only (because of limited seating space), and over 130 clinicians (pediatric heart surgeons, cardiologists, anesthesiologists, intensivists, neurologists, perfusionists, nurses, and scientists) from 30 different pediatric cardiac centers all around Turkey participated in this event (Figs. 4 and 5). In addition to a conference program, a book entitled “A Life Dedicated to Heart” by Prof. Dr. Aydın Aytaç and a copy of the November 2011 issue of *Artificial Organs* were delivered to all participants free of charge. There were no registration fees to attend this event as was the same for the previous two events. Simultaneous translation from English to Turkish and vice versa was also provided at the third event.

Scientific and financial support

The International Society for Pediatric Mechanical Cardiopulmonary Support; Penn State Hershey College of Medicine, Penn State Hershey Children’s Hospital; Istanbul Mehmet Akif Ersoy Thoracic and Cardiovascular Surgery Training and Research Hospital, Istanbul, Turkey; Istanbul Bilim University; Dr. Siyami Ersek Thoracic and Cardiovascular Surgery Training and Research Hospital, Istanbul, Turkey; Marmara University, Department of Cardiology,



FIG. 5. (A–C) Participants and the Faculty Gala Dinner of the Third Istanbul Symposium at the American Hospital, Istanbul on December 17, 2011.

Istanbul, Turkey; Baskent University Istanbul, Acıbadem Bakırköy Hospital, and Acıbadem University all supported this event scientifically.

Covidien, Ares Medical (CasMed), Vascomed Medical (Terumo), ATS Biomedical (Medos), Medi-

call Biomedical (Medtronic), Bicakcilar (Sorin), and Maquet were exhibitors for the third event. To balance the budget, Dr. Ündar has financially supported this event using his personal funds as he did for the past two ECLS symposiums.

Special thanks go to the American Hospital, Istanbul, for not only allowing organization of the symposium in their outstanding conference facilities, but also for providing the lunch and coffee breaks throughout the entire day.

Symposium evaluations

Participants have requested to grade not only the scientific program including the quality of the lectures, invited speakers, and topics, but also the quality of registration as well as catering. Uniformly, participants enjoyed all of this scientific activity and graded to excellent in all categories except that a few speakers went over their allotted time so the entire program had to be extended in the morning sessions. We will make sure that this will not happen at the fourth symposium in 2012. All invited lecturers also enjoyed a Gala Dinner at the end of the night which took place at the University of Istanbul faculty dinner facility next to the Bosphorus with a remarkable view between Asia and Europe (Fig. 5C).

CONCLUSIONS

The latest technology and techniques about neonatal and pediatric cardiopulmonary bypass have been discussed with local clinicians as we did with ECLS last summer (7,8). Several clinical protocols by the invited speakers have been shared and discussed thoroughly with the participants. Overall, all three symposiums have reached their objectives and generated a significant number of collaborations among local participants as well as other collaborations with investigators who live abroad (1,7,8). Future topics such as pediatric CPB, mechanical circulatory support, and extracorporeal life support systems were suggested and will be included in 2012 symposiums.

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*Akif Ündar, PhD, †Tijen Alkan-Bozkaya, MD, *David Palanzo, CCP, ‡Huriyet Ersayin-Kantas,

FCCP, §Chris Chin, MD, ¶Ender Ödemiş, MD,
 **††Kerem Pekkan, PhD, ‡‡Mehmet A. Ağırbaşlı,
 MD, §§Ayda Türköz, MD, §§Rıza Türköz, MD,
 ¶Sertaç Haydin, MD, ¶Ersin Ereke, MD,
 ¶¶Yusuf K. Yalçınbaş, MD, ***Ahmet Şaşmazel,
 MD, ***Ali Rıza Karacı, MD, ¶Halime Erkan, RN,
 †††Ali Ekber Çicek, BS,
 ¶İhsan Bakır, MD, ‡‡‡Tayyar Sarioğlu, MD,
 †††Atıf Akçevin, MD,
 and †††Aydın Aytaç, MD
 *Professor of Pediatrics, Surgery, and
 Bioengineering
 Penn State Hershey Pediatric Cardiovascular
 Research Center
 Department of Pediatrics, Surgery and
 Bioengineering
 Penn State Hershey College of Medicine
 Penn State Hershey Children's Hospital
 Hershey, PA, USA
 †Department of Cardiovascular Surgery
 Istanbul Bilim University
 Istanbul, Turkey
 ‡Guy's and St Thomas' NHS Foundation Trust
 Pediatric Perfusion
 London, UK
 §Guy's and St Thomas' NHS Foundation Trust
 Pediatric Anesthesia
 London, UK
 ¶Istanbul Mehmet Akif Ersoy Thoracic and
 Cardiovascular Surgery Training and Research
 Hospital
 Istanbul, Turkey
 **Department of Biomedical Engineering
 Carnegie Mellon University
 Pittsburgh, PA, USA
 ††Department of Cardiology
 Istanbul, Turkey
 ‡‡Department of Cardiology
 Marmara University
 Istanbul, Turkey

§§Departments of Cardiovascular Surgery and
 Anesthesiology
 Başkent University
 Istanbul, Turkey

¶¶Department of Cardiovascular Surgery
 Acibadem Bakırköy Hospital
 Istanbul, Turkey

***Dr. Siyami Ersek Thoracic and Cardiovascular
 Surgery Training and Research Hospital
 Istanbul, Turkey

†††Department of Cardiovascular Surgery
 Amerikan Hospital
 Istanbul, Turkey

‡‡‡Department of Cardiovascular Surgery
 Acibadem University
 Istanbul, Turkey
 E-mail: aundar@psu.edu

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