CORE COMPETENCIES IN
MECHANICAL CIRCULATORY SUPPORT

Tuesday, April 4, 2017
8:00 AM – 5:30 PM
Manchester Grand Hyatt Hotel, San Diego, California, USA

GRAND HALL B
Scientific Program Committee
Chair: Jennifer Cowger, MD, MS, St. Vincent Heart Center of Indiana, Indianapolis, Indiana, USA
Co-Chair: Palak Shah, MD, MS, Inova Heart and Vascular Institute, Falls Church, Virginia, USA
Co-Chair: Diyar Saeed, MD, Heinrich-Heine University, Dusseldorf, Germany

Educational Goals
The educational goals of this activity are to provide a concise review of clinical knowledge and essential professional skills to facilitate best practice of surgical and medical aspects involved in the care of patients during assessment as candidates and as recipients of mechanical circulatory support.

Target Audience
While all members are invited to enroll, this course is primarily designed to be of benefit for clinicians and allied professionals who are in the early stages of their careers or who are in training and/or are part of a new program or desire an update on the current state of the field. The information presented covers core competencies and is intended to provide a strong foundation of the overarching principles of mechanical support, rather than as a detailed update for those who are already proficient experts in the field.

Learning Objectives
At the conclusion of this meeting, participants will have improved competence and professional performance in their ability to:

1. Explain how to risk stratify patient with advanced heart failure in order to assess MCS surgical risk and optimally time mechanical circulatory support (MCS) implantation.
2. Discuss the medical and social factors which impact patient outcomes during short- and long-term MCS.
3. Recognize the various types of MCS support available for patients with advanced single or biventricular heart failure and the technological differences that may impact pump selection and patient/device management.
4. Identify MCS implantation techniques and patient/pump management during the index admission intensive care unit and inpatient general care periods.
5. Describe how to manage patients and the MCS during outpatient long-term support with an understanding of interventions that can reduce patient- and device-related adverse events during MCS.
6. Diagnose and manage common clinical dilemmas and adverse encountered after MCS.

Accreditation Statement
The International Society for Heart and Lung Transplantation (ISHLT) is accredited by the Accreditation Council for Continuing Medical Education (ACCME) to provide continuing medical education for physicians.

Credit Designation Statement
ISHLT designates this live activity for a maximum of 8.00 AMA PRA Category 1 Credits™. Physicians should claim only the credit commensurate with the extent of their participation in the activity.

ANCC Credit
AMEDCO is accredited as a provider of continuing nursing education by the American Nurses Credentialing Center's Commission on Accreditation. This course is co-provided by AMEDCO and ISHLT. Maximum of 8.00 contact hours.
Disclosure
Current guidelines state that participants in CME activities must be made aware of any affiliation or financial interest that may affect the program content or a speaker’s presentation. Planners, Faculty and Chairs participating in this meeting are required to disclose to the program audience any real or apparent conflict(s) of interest related to the content of their presentations or service as Chair/Planner. These disclosures will be distributed at the meeting. Additionally, all speakers have been asked to verbally disclose at the start of their presentation if a product they are discussing is not labeled for the use under discussion or is still investigational.
SCIENTIFIC PROGRAM SCHEDULE

7:00 AM – 8:00 AM
REGISTRATION & MORNING COFFEE

8:00 AM – 8:05 AM
WELCOME AND OVERVIEW
Jennifer Cowger, MD, MS, St. Vincent Heart Center of Indiana, Indianapolis, IN, USA

8:05 AM - 9:15 AM
SESSION 1 – REVIEW OF THE CURRENT STATE OF MCS
Chair: Diyar Saeed, MD

8:05 AM  MCS Technology 101
Scott Silvestry, MD, Florida Transplant Institute, Orlando, FL, USA
Review of current technologies available, pump behaviors with different loading conditions, and the TAH.

8:25 AM  BTT and DT Outcomes
Lynne Warner Stevenson, MD, Brigham & Women’s Hospital, Boston, MA, USA
Review state of outcomes and adverse events with current technologies

8:40 AM  Short-term Support and Shock
Jonathan Haft, MD, University of Michigan, Ann Arbor, MI, USA
Overview of percutaneous technologies, biventricular support considerations, and ECMO.

9:00 AM  Q&A with Panel

9:15 AM – 10:30 AM
SESSION 2 – PATIENT SELECTION
Chair: Scott Silvestry, MD

9:15 AM  When Should Patients be Referred: Warning Signs
Douglas Horstmannhoff, MD, Integris Baptist Medical Center, Oklahoma City, OK, USA
Risk factors which presage patient decline (renal function, intolerance of medications, hospitalizations, etc, helping to risk stratify patients based on HF severity and MCS operative risk.

9:35 AM  Assessing and Optimizing RV Function Preoperatively
Jerry Estep, MD, The Methodist Hospital, Houston, TX, USA
Impact of RV failure, pre-operative assessment and management of the RV including imaging and risk prediction. Cases included.

9:55 AM  Quality of Life After VAD and the Impact of Frailty and Social Behaviors on VAD Success
Kathleen Grady, PhD, APN, FAAN, Northwestern Memorial Hospital, Chicago, IL, USA
Other factors that can have a significant impact on success after VAD and some screening tools available for risk assessment.

10:15 AM  Q&A with Panel

10:30 AM – 10:45 AM
COFFEE BREAK
10:45 AM – NOON
SESSION 3 – SURGICAL CONSIDERATIONS
Chair: Vivek Rao, MD, PhD

10:45 AM  **Key Surgical Aspects of Implantation**
Nader Moazami, MD, Cleveland Clinic, Cleveland, OH, USA
*Overview of the most crucial surgical considerations: inflow cannula/pump placement, driveline, etc.*

11:05 AM  **How Much Else is Too Much?**
Daniel Zimpfer, MD, Medical University of Vienna, Vienna, Austria
*Concomitant operative procedures: TV, Aortic valve, prior Dor, congenitals*

11:25 AM  **Tailoring Pumps to Patients**
Diyar Saeed, MD, Heinrich-Heine University, Dusseldorf, Germany
*Case based discussion of considerations for pump-patient matching*

11:45 AM  Q&A with Panel

NOON – 1:00 PM
LUNCH BREAK (a box lunch is included in the registration fee)

1:00 PM – 2:15 PM
SESSION 4 – POSTOPERATIVE CARE
Chair: Andreas Zuckerman, MD

1:00 PM  **Managing the RV Postop**
Christopher Salerno, MD, St Vincent Heart Center of Indiana, Indianapolis, Indiana, USA
*Considerations for impact of LVAD pump speed on RV function and use of inotropes, pulmonary vasodilators, and temporary RV support postoperatively*

1:20 PM  **Anticoagulation and Antiplatelet Therapy**
Vivek Rao, MD, PhD, Toronto General Hospital, Toronto, ON, Canada
*Current MCS recommendation on when to start anticoagulation, antiplatelet therapy regimens, as well as data on platelet function testing and heparin level monitoring.*

1:40 PM  **Pump Speed Optimization: The Role of Imaging and Hemodynamics**
Jerry Estep, MD, Houston Methodist DeBakey Heart & Vascular Center, Houston, TX, USA
*Overview of how to meld imaging and hemodynamics to optimize pump settings*

2:00 PM  Q&A with Panel

2:15-3:15 PM
SESSION 5 – TRANSITION TO HOME
Chair: Nir Uriel, MD

2:15 PM  **VAD Education: Patient/Caregiver Assessments and Strategies for Successful VAD Self-Care**
Thomas Schlöglhofer, BSc, Medical University of Vienna, Vienna, Austria
*Approaches to education of the patient and caregiver prior to discharge, and strategies for educating the local medical community*
2:30 PM  Starting New: How to Start and Succeed in MCS  
Michael Dickinson, MD, Spectrum Health, Grand Rapids, MI, USA  
Challenges to starting a VAD program and key elements of success.

2:45 PM  Optimal Outpatient Management of VAD Recipients  
Jennifer Cowger, MD, MS, St. Vincent Heart Center of Indiana, Indianapolis, IN, USA  
Lab, blood pressure and echo monitoring of VAD patients in the outpatient setting.

3:00 PM  Q&A with Panel

3:15 PM - 3:30 PM  
COFFEE BREAK

3:30 PM - 5:20 PM  
SESSION 6 – LONG TERM MANAGEMENT OF PATIENTS AND COMPLICATIONS  
Chair: Nader Moazami, MD

3:30 PM  LVAD Infections: Prevention, Diagnosis, and Management  
Paolo A Grossi, MD, PhD, University of Insubria, Varese, Italy  
VAD infections, radiology studies important for diagnosis, and therapeutic recommendations

3:50 PM  Stroke: Risk Factors for Hemorrhagic and Embolic CNS Complications and Management Strategies  
Samer Najjar MD, MedStar Washington Hospital Center, Washington, DC, USA  
Discuss diagnosis, risk factors, and management strategies for CNS events in MCS patients.

4:10 PM  Pump Thrombosis: Diagnostic Strategies and Management Algorithms  
Palak Shah, MD, MS, Inova Heart and Vascular Institute, Falls Church, VA, USA  
Frequency, diagnosis, and management strategies for suspected pump thrombosis.

4:30 PM  Aortic Insufficiency in LVAD Recipients: Incidence, Screening, and Management  
Jennifer Cowger, MD, MS, St Vincent Heart Center of Indiana, Indianapolis, IN, USA  
Cumulative incidence, clinical consequences, and management of AI after LVAD.

4:50 PM  GI Bleeding  
Anna Meyer, MD, Leipzig University Heart Center, Leipzig, Germany  
Frequency, diagnosis and management of GI bleeding after LVAD therapy, including new data on octreotide

5:10 PM  Q&A with Panel

5:20 PM  SUMMARY  
Palak Shah, MD, MS, Inova Heart and Vascular Institute, Falls Church, VA, USA

5:30 PM  ADJORN