2010 Meeting - Session Summaries

Boosting BMET Leadership and Communication Skills

Chris Nowak, CBET, *is a member of the TMC, and is also the new Chair of the BMET Board of Examiners. He's also the president of the Mid-America Clinical Engineering Society (MACES).* Mr Nowak will be moderating a round table discussion on CE and IT convergence.

Newport HT50 Ventilator Technical Training Class

The VBA is proud to announce that we will be holding the HT50 Technical Training class again in 2010. Due to the popular demand we will be hosting the class at our annual meeting on September 15th and 16th 2010. **David Goodman with Newport Medical** will be returning to present the class with his great personality and expert knowledge of the HT50 Ventilator. This is a Full Manufactures training and attendees will receive a training Certificate upon completion. This Class will enable you to maintain the Newport HT50 Vent and will cover the following:

- Theory of Pneumatic Operation
- Theory of Electronic Operation
- Electronic Calibration
- Operation Verification Procedure
- Removal /Installation of Major Sub Assemblies

Service and Training Manuals will be provided

- Newport Medical does not provide HT50 Vents or tools for the training.
- Each Student will need to bring an HT50 and the required tools from there facility. (Required tools for the class will be emailed to you after registering for the class)
- Attendees should have basic electronic skills and have adequate training to be qualified to service and repair a life support medical device.

Registration:

 The VBA will keep the class size to a maximum of 25 people; therefore we will ask you to pre-register for the class. The first 25 people to register will be accepted into the class. Call Ashley Kindig to register for the class, and then if accepted, you will need to register for the VBA annual Meeting. There is no additional fee for this class. *If interested please register as soon as possible.*
 If you have any question or would like to register contact: *Ashley Kindig at 434-654-7095*

Implementing Wireless in the Hospital Enterprise: Medical Device Considerations and an Update on IEC 80001 *presented by Philips*

There are a variety of types of wireless technologies in use today in the hospital environment. Whether using WMTS, 802.11, 802.15 and/or proprietary RFID technologies, it is important to understand that technologies continue to evolve and "one size does not fit all" when it comes to wireless technology. Hospital IT departments need a wireless strategy in place and clear guidelines between IT and clinical engineering to ensure patient safety when using wireless medical devices. We will go over some recommendations around 802.11 deployments that clinical engineers can discuss with their IT colleagues and also provide an overview of and an update on IEC 80001.

Slashing Medical Equipment Maintenance Cost in 2010

Patrick Lynch, CBET, CCE *with GMI* will present this session.
The class will show a practical way to analyze maintenance cost and expand your biomedical program. This seminar will present a new and innovative way to evaluate medical equipment maintenance costs, provide a mechanism for comparing these costs to other internal and external sources. We also will embark upon a discussion of how to reduce these costs by more than ½ in many cases, while maintaining quality and uptime.

AGM Gas Analyzer *by Sage Services Group*
Philips ended support on the M1026A AGM 12/31/2009 leaving many hospitals with the costly decision to replace or not. We'll walk you through the ins and outs of these units, how to keep them up and running yourself for years to come, and ultimately save your organization hundreds of thousands of dollars! We'll also cover the currently supported Models m1026B and M1019A (G5) AGM's.
Need Help with Your Philips AGM's?
Course outline:
- Introduction
- AGM Anatomy
- Troubleshooting
- Sub-assembly replacements
- Calibration techniques
- Hands on demonstrations
- Question and answer

Career Planning for Biomedical Engineering Personnel Presented on behalf of MEDRAD Service
Myron Hartman MS, SASHE, CCE, CBET, CRES *Program Coordinator, Biomedical Engineering Technology, Penn State University*
As a technician or a supervisor in the field of biomedical engineering, what are the next steps you need to plan for in your career: education, training, certification or experience? Most individuals do not have written plans for their careers and they just happen by accident or being at the right place at the right time. This session will discuss what actions you need to take for planning a career in medical equipment support.

NIBP QA Testing by *Fluke Biomedical*
Why we test, what we test, how we test (including when to use static pressure and when to include dynamic pressures)

Human Impedance Variability and Defib Testing *by Fluke Biomedical*
Why we test, what we test, how we test (including when loads in addition to the standard 50 ohm load are required)

AEM Technologies - Stray Laparoscopic Burns . . . A Preventable Tragedy
Presented by **Steve Koehler** with Encision Inc.
Monopolar electrosurgery is the method of choice for cutting and coagulation in laparoscopic procedures. Although it serves an important clinical function, it also poses a risk of unrecognized internal burns as a result of stray currents induced by insulation failure and capacitive coupling. This presentation describes the components of monopolar electrosurgical systems, explains the magnitude and the causes of the problem of stray electrosurgical energy in laparoscopy, and offers ways of avoiding these problems.

Microsoft Office 2010 Moves to the Clouds & Windows 7 Operating System
Let's kick it up to the next level with the next version of Office. See for yourself the rich and powerful new ways to deliver your best work - whether you're on a computer at work or at home, Web browser, or Smartphone with Office. Wait until the students see the new enhanced tools like the backstage area, screen clipping tool, the slicer, customizable templates, and photo editing capabilities well beyond the last version. Finally, a real work environment that allows multiple people from different locations to work together, at the exact same time, using new collaboration capabilities. Windows 7 is what Vista should have been!!! See tons of new features that will make teaching a technology experience such as HomeGroup, Snap, Snip, Shake, the Action Center, and Windows Movie Maker 7. You can even record the steps to a process with this new version.! Wait until you see a Windows Multi-Touch Tablet running Windows 7 live – the ultimate "way cool!"

O.R. Integration; The Future is Now by Victory Products

Scott Emerick, *Northeast Regional Manager for Skytron's partner Global Device Management.*
A critical look at so called smart room technologies. This course is designed to answer the questions of why we should invest in integration, what factors should be considered in construction, space planning and cord management? Is conferencing ability, digital streaming, archiving and voice control necessary, why or why not? Are there less costly alternatives? Planning for the future. The course is designed to be interactive informative and educational.

ESU QA Testing *by Fluke Biomedical*

Why we test, what we test, how we test (including human physiology considerations and patient safety considerations)

How Real-time Location Solutions (RTLS) What is it and how can I get it?

Mike Picarello, *Northeast Regional VP for Skytron's partner Awarepoint.*
Repairing, calibrating and performing preventative maintenance on thousands of medical devices is a constant challenge. Locating equipment with pinpoint precision and linking to recommended maintenance schedules, Real-time Location Solutions (RTLS) can minimize equipment out-of -service time and improve staff work environment while reducing the potential for clinical incidents. Mike Picarello will discuss the evaluation criteria used in selecting a solution and how the installation will affect the IT department, biomedical or clinical technology functions. Mr. Picarello will also provide tangible lessons learned during the actual installation process and will highlight clinical and biomedical use cases and measurable outcomes.

Hot Technologies 2010/ Social Networking

Warning: Only attend this session if you can handle an exciting and high energy presentation. Take a front row seat to see what is earth-shaking in the Technology World in 2010! Come see a dozen new technologies that will make your life easier. Have you used Posterous yet, or Ustream, or Qik, and many more cutting edge hot technologies that are all FREE! Expand your boundaries!
Corinne Hoisington is a full-time Professor of Information Systems Technology at Central Virginia Community College in Lynchburg, VA with over 25 years of teaching experience. Corinne also travels over 200,000 miles a year speaking to college & university professors and K12 venues in over 50 cities this year for such customers as the Microsoft Corporation, Cengage Learning, and many other universities and K12 groups. Professor Hoisington is the recipient of the Microsoft Most Valuable Professional in Computer Programming. Corinne presently has authored several books such as the Visual Basic 2010 and many video courses. Her newest projects just came out this Spring called "The Guided Tour of Windows 7", "The Guided Tour of Office 2010", and "The Guided Tour of Hot Technologies 2010".

How to Start a Hospital-Based Imaging Program

presented by **Patrick Lynch, CBET, CCE, MBA**
Are you doing as much for your hospital as you could? Do you feel that you are being limited? Would you like to grow your career, salary, and responsibility? If so, join us for a detailed presentation on how to move your career (and biomedical program) into the exciting, rewarding, fast-paced world of medical imaging service.
This 2 hour presentation will examine the pros and cons of bringing the service of Imaging equipment into the hospital. Topics covered include: evaluating your chances for success, obstacles you will encounter, steps to assure success, how to sell to department managers and administrators. We will also explore how to determine whether to move quickly or gradually into a complete in-house imaging service program.

The Basics of Surgical Microscopes

Corey Shellenberger *from Prescott's Inc* will present this education session.
This class will focus on the terminology, simple cleaning and troubleshooting of various types of surgical microscopes. The class will start off with basic terminology which will discussion the various parts of the microscope; model identification; technical support buzzwords. There will be a surgical microscope on hand to

demonstrating basic cleaning techniques and to help demonstrate a practical PM. This class will help Biomedical Engineers to be more confident when working with microscope as well help them when they are seeking Technical Support. All Microscopes are different, this class will not focus on one specific model. Technicians should gain knowledge and basic microscope skills by attending this session.

Infusion Device QA Testing *by Fluke Biomedical*
Why we test, what we test, how we test (including understanding the variety of test instruments, their relative accuracy, and the amount of technician-time they take to use compared with the number of infusion devices to be tested. Explore the concept of batch testing.