



Trauma Nurses Speak at NTI

By Lynn Gerber Smith, RN, MS, Clinical Educational Coordinator, Shock Trauma Center

The R Adams Cowley Shock Trauma Center was well represented at the 2005 National Teaching Institute (NTI) held May 7-12 in New Orleans by the American Association of Critical Care Nurses. This large annual critical care nursing conference was attended by more than 7,500 nurses. Here are the trauma nurses who spoke at this conference from our trauma center:

- **Karen McQuillan, RN, MS, Clinical Nurse Specialist** for the Shock Trauma Center, was selected as one of the 10 nurses from across the country to plan this enormous annual conference. As a member of the NTI Work Group, Karen was on hand all week to assist with the NTI. In addition, she presented her own lecture on “How to be an NTI Speaker”.
- **Lynn Gerber Smith, RN, MS, Clinical Education Coordinator**, and **Suzanne Sherwood, RN MS, Full Partner** in the TRU and Clinical Instructor at the University of Maryland School of Nursing, co-led a day-long pre-conference on trauma. The trauma pre-conference “Current Strategies for Successful Management of the Trauma Patient”, has been sponsored by the Shock Trauma Center for the last five consecutive years.
- **P. Milo Frawley, Acute Care Nurse Practitioner** at the trauma center, presented “Airway Pressure Release Ventilation (APRV) and Pediatrics: A New Mode for Young Patients”.
- **Trish Martin, Nurse Practitioner**, teaching for the first time at NTI, presented her new lecture on the ever-popular topic of “NASTI Situations: Necrotizing Acute Soft Tissue Infections”.



Nurses from across the country on the 2005 NTI Work Group are, from left to right: Dennis Cheek (Chair), Carol Goodyear-Bruch, Marcheta Lynn Rodgers, Karen A. McQuillan (center in light colored skirt and dark top), Kristine Peterson, Alisa Shackelford, Lisa Gingerich, Shawn M. McCabe and Nancy Munro. Karen is the only nurse in this photo who works at UMMC, and Nancy Munro is a nurse practitioner and a clinical instructor at the School of Nursing at the UMB.

According to other staff who attended this year's NTI, the 2005 NTI was a wonderful opportunity to network and share the R Adams Cowley Shock Trauma Center with critical care nurses nation-wide.

Communication Slip-Ups Are Top Cause of Errors Nationwide

The Joint Commission collects data from hospitals across the country to study trends and causes of sentinel events. A sentinel event is an unexpected adverse patient event such as death or serious physical or psychological injury.

The JCAHO Sentinel Event Database includes statistics from hospitals across the country, and it provides a useful overview of different sentinel events, and more importantly, their root causes. Knowing the causes gives us important information on how we can prevent or reduce mistakes.

The data below is not from UMMC, but from hospitals nationwide. As you can see in Table 3 below, communication is the leading cause of errors across the country. These causes are the reason the Medical Center has been emphasizing the importance of:

- Reading back critical lab results;
- Quick “time-out” before invasive procedures;
- Giving or getting complete information about the patient during hand-offs and transfers from one unit to the other, shift change, and information from one clinical team member to the other, or before doing anything invasive;
- **NOT taking verbal orders** except in urgent and emergent clinical situations;
- If you accept verbal orders, be sure to write the order in the medical record and then **read back the verbal order** (including who the order is for) to the prescriber to confirm that the order was heard correctly;
- Not using or accepting **orders or forms using dangerous abbreviations** in medication related documentation;
- Documenting the plan of care, interventions and the patient’s progress or improvement;
- Reading transfer notes and other documentation and information that comes with the patient; and
- Escalating a patient safety concern up the chain of command if resolution is not achieved, or by calling the Patient Safety Hotline at **8-SAFE**.

Table 1. Type, Number, and Percentage of Sentinel Events

Type of Sentinel Event	Number of Events	Percentage
Patient suicide	415	14.0%
Wrong-site surgery	370	12.5%
Operative/postoperative complication	365	12.3%
Medication error	326	11.0%
Delay in treatment	221	7.5%
Patient fall	144	4.9%
Patient death/injury in restraints	124	4.2%
Assault/rape/homicide	107	3.6%
Transfusion error	85	2.9%
Perinatal death/loss of function	84	2.8%
Infection-related event	57	1.9%
Patient elopement	57	1.9%
Fire	51	1.7%
Anesthesia-related event	49	1.7%
Ventilator death/injury	39	1.3%
Maternal death	38	1.3%
Medical equipment-related event	37	1.2%
Infant abduction/wrong family	21	0.7%
Utility systems-related event	18	0.6%
Other less frequent types	358	12.1%

©JCAHO 2005

Table 2. Outcomes, Number, and Percentage of Sentinel Events

Sentinel Event Outcome	Number of Events	Percentage
Patient death	2,279	74%
Loss of function	312	10%
Other	492	16%
Total patients affected	3,083	100%

©JCAHO 2005

Table 3. Root Causes and Percentage of Sentinel Events

Root Cause of Sentinel Event	Percentage of All Sentinel Events
Communication	66%
Orientation/training	57%
Patient assessment processes	42%
Staffing levels	22%
Information availability	20%
Competency/credentialing	20%
Procedural compliance	19%
Environmental safety/security	16%
Leadership	13%
Continuum of care	13%
Care planning	12%
Organization culture	10%

©JCAHO 2005



Are You Ready For The Surveyors?

By Cynthia J. Polen, RN, CCRN, BSN

Critical Care Coordinator, The Washington Hospital, Washington, PA

Now more than ever before, JCAHO surveyors increasingly wish to speak with direct caregivers. Manager and supervisors can be present during unit visits, but surveyors want to hear from frontline staff. Consider playing the role of the surveyor and asking your co-workers some of the following questions.

Reviewing these questions and actual patient charts with staff members will help them feel more confident and prepared for a surveyor's visit. With the new JCAHO tracer methodology, it is possible for surveyors to visit your department several times during a site visit, so all caregivers should be ready to discuss their patients and locate appropriate documentation. But remember, the best advice for employees is to remain calm, answer questions to the best of their ability, and be proud of the quality of care they give.

- Show me the patient's history and physical. Was it completed within 24 hours of admission? If it was dictated, has the provider signed it?
- How do you handle a verbal or telephone order?
- Where is it documented that the surgeon identified the right patient and right site prior to surgery? Where is the surgical time-out documented?
- Have advanced directives been addressed?
- Show me evidence that pain has been addressed?
- Was the patient medicated for pain? If so, show me where there was follow-up to see if pain was eased / relieved.
- Has smoking cessation been assessed? Where is it documented that you gave the patient information on smoking cessation? Show me an example of the information you gave.
- Show me your restraint policy. What is the difference between medical, behavioral, and chemical restraints?
- How were you educated or oriented to take care of this patient?
- How do you identify your patient when giving medications or doing procedures?
- What is an acceptable length of time to answer an equipment alarm? Have audible alarms been set loud enough to be heard over a busy unit?
- Show me the interdisciplinary care plan for this patient. What are the goals? How do you update the care plan?
- How are critical lab/radiology values handled at this institution?
- How do you know when equipment is clean? Do your infusion pumps have free-flow protection?
- How do you check controlled substances? How do you waste them?
- Do you hold patient care conferences with other disciplines? If yes, where are they documented? If no, how do you know what is going on with this patient?
- How do you handle an order that was written using an abbreviation identified as dangerous and not appropriate for use?
- What's the nurse-to-patient ratio on this unit? How do you ensure staffing is adequate when there is a call-out?
- How do you protect your patient's privacy?
- How would you handle an ethical issue?
- What's the scope of service for this unit? Are there ever exceptions?
- How are medications with a range of doses handled?
- How are blanket orders handled?
- What's your policy for procedural sedation?
- What dedicated patient equipment do you have for isolation patients?
- How do you report a medication error? Is there any recrimination for reporting an error?
- What measures have been instituted in this facility to reduce medication errors?
- How do you assess fall risk?
- Where is your personal protection equipment located?
- Show me your blood product transfusion documentation?
- How do you care for a patient who is latex sensitive?
- How often do you have fire drills? Where's the nearest fire extinguisher? Where's the nearest evacuation route?
- Is your patient diabetic? What education have you provided for him?
- What education or in-service do you feel you most need and would attend today if provided?
- What triggers a consultation to nutritional services, physical therapy, social services, or other disciplines? Do you need an order or can nurses contact other disciplines when needed?
- How do you communicate patient information to the next shift, upon patient transfer to another unit, or upon transfer to another facility?
- What time did this patient come to the emergency department? What time did he/she get admitted to his/her room?

Are You Ready For The Surveyors? *continued*

- Is an antibiotic ordered? What time was it ordered and what time was it started?
- How is pharmacy inventory controlled on your unit?
- Show me your crash cart and other emergency equipment. How often is the equipment checked? Who's responsible for checking for outdated medications and sterile supplies on crash carts?
- If you're very busy and becoming overwhelmed with your assignment, can you ask for more help? From where would this come?
- How would you be notified of a disaster? Is there a specific area for contaminated patients in the event of a disaster?
- Do you screen for depression in all patients? How do you handle the psychosocial needs of your patient?
- Can you read the healthcare provider's orders and progress notes? What do you do if they're not legible?
- What skills are critical to competently work on this unit?
- What programs are available for your patients? Are there any community programs also available?
- How do you handle referrals to a hospice or palliative care program? Have you been educated in palliative care?
- When do you institute discharge planning?
- Where's your MSDs for substances on the unit?
- How do you obtain newly ordered medications on evening or night shifts?

Adapted from *Nursing Management*. 2005 Mar; 36(3): 28-9



Hong Kong Nurses Tour and Observe at Shock Trauma Center

On Monday May 2nd, four nurses from Hong Kong spent the day touring the R Adams Cowley Shock Trauma Center and observing on units throughout the Trauma Center. **Janice Yeung Hiu Hung**, the Trauma Nurse Coordinator at the Prince of Wales Hospital, **Leung Ming**, the Trauma Nurse Coordinator at Princess Margaret Hospital, **Annice Miu Ling Chang**, Advanced Practice Nurse at Queen Elizabeth Hospital and **Henry Kwok-hung Kwong**, Intensive Care Operations Manager at Princess Margaret Hospital asked questions and learned about the latest technology used at the Shock Trauma Center.

For Janice Yeung Hiu Hung, it was her second visit to the Trauma Center. Janice said that after her first visit to Baltimore she had a much better idea of her role as the Trauma Nurse Coordinator. Again during this visit she and her colleagues met with Robbi Hartsock, Trauma Nurse Coordinator, to discuss current issues and trends. All four nurses were here to attend the annual American Trauma Society meeting. **Robbi Hartsock** was the moderator when Janice presented two abstracts about trauma care in Hong Kong.

International nurses are frequent visitors to Shock Trauma and the rest of the Medical Center. Our trauma staff enjoy knowing their visitors will be able to return home to share what they have learned here.



Four nurses from Hong Kong visit our Shock Trauma Center with Lynn Gerber Smith (second from left) and Robbi Hartsock (second from right) as their guides.



Important Points to Remember in Blood Glucose Testing

The Joint Commission on Accreditation of Healthcare Organizations (JCAHO), the College of American Pathologists (CAP) and the Clinical Laboratory Improvement Amendments (CLIA) regulates bedside blood glucose testing performed at UMMC. These regulations are in place to assure patient safety, accurate results, and quality patient care. Several compliance requirements bear reiteration and are listed below.

Patient Identification:

- Identify the patient as per UMMC policy using two identifiers (their name and date of birth) *every time a glucose testing procedure is performed*.
- Verify that the patient's medical record number on their identification bracelet matches the patient's number on their flowsheet or chart and, enter that number into the glucose meter before dosing the strip.
- Use comment codes for all follow-up actions (for example, "nurse notified").
- Immediately record the result in the patient's record.

Glucose Control Labeling:

- Control solutions (both vials – Low and High) must be dated upon opening with two dates: **"Opened Date"** and **"Discard Date"**. The "Discard Date" is three months past open date or manufacturer's expiration date, whichever comes first).
- Do NOT use any control solutions past the discard date.
- Do NOT use any control solutions that are opened, but undated. Discard, then open and date a new set of controls.
- Do NOT use any controls that are uncapped. Discard, then open and date a new set of controls.
- Use comment codes to describe actions taken when controls do not pass (for example, "Repeat Control").
- Only trained, competent glucometer operators who routinely perform patient glucose testing may perform daily control checks.

Infection Control:

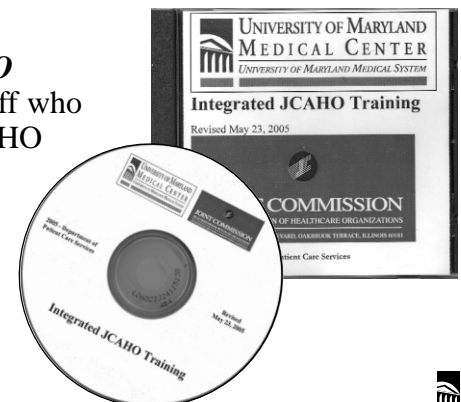
- Remember to clean your hands (Avagard-D or soap and water) before AND after patient testing.
- Remember to WEAR GLOVES for patient testing, control testing, and *any time* the meter is handled.
- Glucose meters may NOT be taken into any isolation room. The meter must be set up just outside of the room and dosed from standing in the doorway using either a micropipette or a syringe.



Integrated JCAHO Training CD-ROM Now Available

All of the PowerPoint presentations from our 2004-2005 *Integrated JCAHO Training* program for in-patient staff are available on **CD-ROM** for any staff who wishes to use them or adapt them to use in preparing their staff for the JCAHO survey. The CD-ROMs are available from the front desk in the Office of Clinical Practice & Professional Development, telephone 410-328-6257, on the 10th floor of the South Building.

All of the presentations on this CD match the content in the *Integrated JCAHO Training Syllabus*; copies of this syllabus are also available from our office to save unit staff from having to print out their own copies.



New HIPAA Training Required

In 2003, staff at UMMC and University Specialty Hospitals (USH) completed the first phase of staff education on HIPAA. HIPAA stands for the Health Insurance Portability and Accountability Act of 1996 (HIPAA), which came out of efforts by the Clinton Administration and Congress to reform healthcare. The rulings in HIPAA are complex, but it essentially has four primary objectives aimed at:

1. Assuring health insurance portability, that is, allowing persons to qualify immediately for comparable health insurance coverage when they change employers;
2. Reducing healthcare fraud and abuse;
3. Enforcing standards for health information; and
4. Guaranteeing security and privacy of patients' health information.

During 2003, all employees completed a one-time training session on the HIPAA Privacy Regulations using our on-line training program, HealthStream®. These Privacy regulations do not require an annual training update so employees only need to complete it one time. New UMMC hires complete the Privacy modules during their orientation.

We now need to complete the second phase of staff education on HIPAA standards. This phase focuses on our responsibilities and processes on securing protected patient information that is collected and stored **electronically**. The purpose of this staff education is to increase staff knowledge about basic security requirements when accessing electronic protected health information. This training covers information stored on hard drives, removable or transportable digital memory medium, such as diskettes, and information being transported electronically via Internet e-mail, or other means. It does not cover fax or voice telephone transmission, though the HIPAA privacy rule does cover these modes of transmission.

All staff need to complete the HealthStream® training for HIPAA between June 1 and June 30, 2005. Like the initial Privacy training, this new Security training must be completed by every employee at the Medical Center and the Specialty Hospital. But unlike the initial Privacy training, this second training becomes part of our annual training and we must complete it once each year.

This new HIPAA training is:

- Available in HealthStream®.
- Based on your job title;
- Titled, "HIPAA Information Security for [Medical Staff, Clinicians or Health Care Workers]" with the actual title you see online depending on your job title;
- About 30 minutes long with a short competency test at the end; and
- A part of the HealthStream® modules included in every employee's "My Courses" online Annual Training requirements.

As usual, HealthStream® will maintain a record of each employee's training and their score at the end of the session. Our Human Resources Development Staff will distribute reports of this training to Managers and Directors who will track the percent completion for their Department or Unit.



HIPAA - NEED TO KNOW

- Just because you have access to patient information does NOT mean you have the right to look at it!
- Only share patient information with other staff for treatment, payment or operations.
- Do NOT look at medical records, either in the computer or on paper, that are not needed to do your job.
- When finished accessing patient information, log off the computer. You are responsible for all information accessed on your password.
- Do NOT share your password.
- Failure to comply will result in corrective action.



Call the Helpline at 410-328-5357 or the Hotline at 410-328-DUTY (3889)

Robbi Hartsock Gets Lifetime Achievement Award in Trauma Nursing

Robbi Hartsock, MSN, RN, RNP, Trauma Designation and Process Improvement Manager at the Shock Trauma Center, and also President of the Maryland Division of the American Trauma Society, was presented the *Society of Trauma Nurses' Trauma Nursing Lifetime Achievement Award* at their annual meeting in Las Vegas this past March. According to the Society of Trauma Nurses, their Trauma Nursing Lifetime Achievement Award recipient must be a nurse with greater than 10 years in trauma nursing who has demonstrated outstanding leadership, research, education, clinical practice, injury prevention, and publications.

Robbi was nominated for this award by Susan Zieggfeld, the Pediatric Trauma Coordinator at the Johns Hopkins Children's Center. Her 3-page nomination letter is too long to reprint here, but it summarizes Robbi's leadership, teaching, clinical practice, research, injury prevention and writing experiences over her past 24 years in trauma nursing. It's impressive reading.



Robbi Hartsock was presented the Society of Trauma Nurses' Trauma Nursing Lifetime Achievement Award in March.

And, equally important is that four of the past six recipients of this award for six-years have been from either MIEMSS or the Shock Trauma Center. These four recipients include Mary Beachley, Connie Walleck, Ginny Cardona, and now Robbi Hartsock. The strengths of our trauma nursing staff become evident when over half of the recipients, for an award with only a six-year history, come from our campus.

How to Document Universal Protocol

Universal protocol, not to be mistaken for universal precautions, was created to address the continuing occurrence of tragic medical errors in Joint Commission accredited hospitals. Designed to **prevent wrong site, wrong procedure, or wrong person surgery**, it is based on the consensus of experts from the relevant clinical specialties and professional disciplines, and it is endorsed by more than 40 professional healthcare associations and organizations. Universal Protocol was officially implemented as an accreditation requirement by the JCAHO on July 1, 2004; that is, we must comply with it to remain accredited.

The Universal Protocol has three parts:

- Pre-op or pre-procedure patient identification,
- Site marking, and
- “Time Out”.

At UMMC, we have three ways to document completion of this protocol. Use only one of them that fits the situation (described below) under which the procedure will occur.

Use the **Universal Protocol Label** (shown to the right) for patients who are having bedside (invasive) or minor procedures performed under only a local anesthetic, and who are **not being sedated**. The person performing the procedure and their assistant (nurse, resident or attending) sign it. This label is printed on a peel off label, which is then affixed to a Progress Note page in the patient’s medical record.

UNIVERSAL PROTOCOL DOCUMENTATION Bedside/Minor Procedures	
Patient Name: _____	
Procedure: _____	Date: _____
<input type="checkbox"/> Patient Name and Date of Birth Verified <input type="checkbox"/> Site Marked <input type="checkbox"/> Not applicable <input type="checkbox"/> Time Out Completed	
_____ Signature of MD or CRNP Performing the Procedure	
_____ Signature of Assisting Practitioner	

Each unit using these labels was provided with an original copy of the label in their initial box of labels. Each of these units is responsible for maintaining their own supply of these labels when their initial supply is depleted. Boxes of the blank labels can be ordered from Corporate Express; the Label # is #5164 and the size is 3 1/3” x 4”. Once you get the new box of blank labels from Corporate Express, send them to BCP Printing to copy more labels. An original copy of the label is also on file at BCP Printing. BCP Printing’s pick-up area is in the Mail Room on the ground floor of the South Building.

University of Maryland Medical Center		Addressograph	
Surgical/Procedure Verification Protocol Checklist		PATIENT IDENTIFICATION	
I D E N T I F I C A T I O N	Section I. Complete in the Pre-op Areas unless the patient is admitted directly to the OR/Procedure Room. Patient Identification:		
	<input type="checkbox"/> ID Band checked for Name and DOB, or Trauma Doe #. <input type="checkbox"/> Patient Statement/Surrogate <input type="checkbox"/> Patient Record Reviewed Procedure: _____		
	Procedure Confirmed By: <input type="checkbox"/> Patient Statement/Surrogate <input type="checkbox"/> Schedule <input type="checkbox"/> Consent <input type="checkbox"/> Patient Record Reviewed Signature: _____		
Site Marking	Section II to be completed by Practitioner performing the surgery or procedure (Check all applicable boxes)		
	<input type="checkbox"/> Left <input type="checkbox"/> Right <input type="checkbox"/> Bilateral <input type="checkbox"/> Site Marking Not Applicable per policy <input type="checkbox"/> Multiple sites simultaneously 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ <input type="checkbox"/> Tooth/teeth removal marked on Dental Diagram (See Dental Diagram on page 2 of EP19) <input type="checkbox"/> Site marked on radiologic image. Signature: _____		
Section III. Complete in OR Suite/Procedure Unit, or Patient Care Unit			
Patient Identification:			

Use the **Surgical/Procedure Verification Protocol Checklist** for patients who are having their procedures performed in one of our Operating Rooms. This form, #EP19, has three sections and the nurse on the unit sending the patient to the OR must complete only the first section, which verifies the patient’s identity and procedure.

Use the **Special Procedure Nurses' Note** for patients who are having their procedures with moderate sedation. This newly revised form is required documentation in all inpatient (acute care and ICU), ambulatory, and procedural areas when a moderate sedation procedure is performed. It includes the universal protocol form for verifying the patient's identity and procedure.



University of Maryland Medical Center		Addressograph
Special Procedure/Nurses' Notes		
PATIENT IDENTIFICATION		
IDENTIFICATION	Section I. Complete In the Pre-op Areas unless the patient is admitted directly to the OR/Procedure Room.	
	Patient Identification: <input type="checkbox"/> ID Band checked for Name and DOB, or Trauma Doe #. <input type="checkbox"/> Patient Statement/Surrogate <input type="checkbox"/> Patient Record Reviewed Procedure: _____ Procedure Confirmed By: <input type="checkbox"/> Patient Statement/Surrogate <input type="checkbox"/> Schedule <input type="checkbox"/> Consent <input type="checkbox"/> Patient Record Reviewed Signature: _____	
Site Marking	Section II to be completed by Practitioner performing the surgery or procedure (Check all applicable boxes) <input type="checkbox"/> Left <input type="checkbox"/> Right <input type="checkbox"/> Bilateral <input type="checkbox"/> Site Marking Not Applicable per policy <input type="checkbox"/> Multiple sites simultaneously 1. _____ 2. _____ 3. _____ 4. _____ 5. _____ <input type="checkbox"/> Tooth / teeth removal marked on Dental Diagram (See Dental Diagram at top of page 3 of EP25.) <input type="checkbox"/> Site marked on radiologic image. Signature: _____	
	Section III. Complete in OR Suite/Procedure Unit, or Patient Care Unit Patient Identification:	

The **Surgical/Procedure Verification Protocol Checklist** can also be used for dental patients who are having their dental procedures performed under local anesthesia without sedation. The advantage of using this form with dental patients is the dental diagrams on the back of this form. These dental diagrams provide an easy way to document site markings. The diagram side of this form would not be used with all other non-dental surgery patients.

How Should The Site Be Marked?

The physician or practitioner performing the procedure **marks** the procedure or operative site before the patient goes to the procedure/surgical area or before the procedure begins.

- The site is marked with a “✓”, which must be visible after the patient is prepped and draped.
- **Do not use an “X”** which has been shown to be very confusing.
- If possible, the marking should take place with the patient involved, awake and aware.
- Site marking applies to invasive/surgical procedures involving:
 - Laterality (right or left side) of the organ, anatomy or site
 - Multiple structures (fingers, toes, or lesions)
 - Multiple levels (spines)
 - Midline procedures intended to treat an organ that is “right or left”
- Site marking is not required (nor prohibited) in
 - Single organ cases (C-section, cardiac surgery)
 - Interventional procedures for which the site is not known such as cardiac catheterization or arteriogram.
 - Teeth (dental diagram and X-rays may be used)
 - Obvious wounds or lesions
 - Infants for whom it may become a permanent tattoo
 - Emergency situations
 - Cases in which the individual performing the procedure is in continuous attendance from the time of the decision to perform the procedure to the start of the procedure.

“Time-Out” for What?

The clinical team performing the procedure must take a brief period of time, sometimes less than a minute, immediately before the start of the procedure to match patient identity, side/site of the procedure, and planned procedure with the patient's ID band, signed consent form and the procedure area schedule (if any exists). Also during this “Time-Out”, they should verify any required patient positioning, implant or supply availability, and equipment needed before they start the procedure or begin administering sedation. This requirement applies to procedures in which only one individual is involved in the procedure. This “Time-Out” must be documented on one of the above forms using the label, the checklist or the special procedure form.

If you have any questions about our Universal Protocol, contact **Fe Nieves-Khouw** at 8-7575 or fnieves@umm.edu.



Improving Performance with PI Projects

Performance Improvement (PI) is one of the priorities in the UMMC Annual Operating Plan and a JCAHO accreditation requirement. We hear PI mention all the time, but what is it? What should the staff know? What PI activities are being performed at UMMC?

What is PI?

Simply stated, PI

- Improves the way we do things;
- Corrects problems; and
- Sets goals.

As defined by JCAHO¹

- Performance improvement is a continuous process.
- It involves measuring important processes and services, and identifying changes that could improve performance.
- These changes are incorporated into new or existing work processes, products or services, and subsequent performance is monitored to ensure that the improvements are achieved and sustained.
- PI focuses on outcomes of care, treatment, and services.
- Organizational leadership establishes the planned approach to PI, sets the priorities, and ensures that all disciplines involved work in a collaborative fashion.
- An important aspect of improving organizational performance is effectively reducing factors that contribute to unanticipated adverse events and/or outcomes.

Components of the PI Process

- Identify the problem and engage staff who are invested in the process (stakeholder);
- Write a goal that is measurable;
- Assess what is happening...collect, analyze, and interpret data;
- Plan and implement the change; and
- Track and evaluate the progress.

What Staff Are Expected To Know

- Identify hospital PI initiatives;
- Tie unit-based activities into hospital priorities;
- Describe unit-based work around PI;
- Use chart and posters to help describe; and
- Describe the process and outcome succinctly.

PI Projects at UMMC

UMMC has many PI projects underway. Below is a sample, not all-inclusive, of some of our current PI projects. If you see something listed here that could be relevant to your unit, call the manager of the unit listed here to get more details and copies of their templates so you don't have to start from scratch.

Some Current UMMC PI Projects:

- Improving family satisfaction in Shock Trauma by investigating Family Centered Care, focus is on visiting hours
- General OR - Improving on-time first case starts
- Adult PACU – Improving pain score documentation regarding pre and post administration
- Peds SurgiCenter – Patient and family satisfaction with NPO status and OR start time
- STC OR – Blood product management and OR start times
- ED – Improving patient flow
- CTICU – Fast tracking cardiac surgical patients, blood glucose monitoring/postoperative glycemic control, labeling tubes and lines
- Mother Baby Unit – Improving PKU slip completion which includes a hearing screen and PKU test
- NeuroCare ICU and IMC – Lowering the rate of ventriculitis in patients with IVCs and the percentage of false positive blood cultures (pseudobacteremia)
- Transplant – Improving nurse responsiveness and documentation of pre and post pain scores
- 10 West – Improving patient identification and customer satisfaction
- Gudelsky 5 – Reducing rate of patient falls
- Trauma MTCC – Achieving better glucose control for patient's requiring insulin infusions, decreasing catheter-related blood stream infection
- Trauma MTIMC – Decrease incidence of sustained supraventricular tachycardia and number of tracheostomy complications
- Trauma NTCC – Improve patient/family satisfaction, decrease incidence of catheter-related blood stream infections
- Trauma NTIMC – Decrease number of transfers to higher acuity areas related to respiratory complications
- 4 STA – Decrease patient over-sedation and patient falls
- SICU – Decrease false positive blood culture rates
- 7IMC – Decrease length of stay

There are additional performance improvement initiatives in the Medical Center's Annual Operating Plan related to improving the availability of resources such as equipment, supplies, and medications. One of which is to implement a nursing strategic plan that supports the professional development of nursing staff and the delivery of patient care. For more information on the Medical Center's performance improvement process or initiatives, please contact Carla Middleton, 8-0909 or cmiddleton@umm.edu.

¹Source: 2004 JCAHO Comprehensive Accreditation Manual for Hospitals: The Official Manual



New Acute Care Surgical Unit Opens on 13 West

A new acute care unit will be opening this summer on 13 West, currently the location of the Cancer Center Infusion Center. 13 West will be a 16 bed unit with a surgical focus. The patient population will consist of primarily Otolaryngology (ENT), Oral-Maxillofacial, Plastics and Urology. The unit will also care for over-flow patients from Shock Trauma when needed. The patient rooms will be a combination of private and semi-private rooms with a separate family waiting area.

Once the Cancer Center relocates to the first floor, 13 West will undergo a major renovation, which will take approximately six weeks. The entire unit will be freshly painted, with all new curtains, furniture and equipment. There will be a staff locker room and lounge area along with office space for the Manager and Senior Partners. The unit will have a total of 37 FTEs (Full-time-equivalents). There will

be 17 RN, 13 PCT and 3 Unit Secretary positions. The anticipated nurse-to-patient ratio is 1:4-5.

Opening a new unit is an exciting experience. It is also an excellent opportunity for a first-time Manager, as well as Full Partners who are ready to move to a Senior Partner role. The manager of 13 West will have the opportunity to select his or her own staff, including two Senior Partners. Together, the Manager and Senior Partners, will develop standards of care for their patient population as well as unit operational policies including staff orientation and assessment approaches for clinical competencies.

Anyone interested in learning more about 13 West Acute Care should contact **Judy A. Slide**, RN, BA, Interim Director, Surgery and NeuroCare @ 8-8567 or jslide@umm.edu.



Critical Thinking Workshop Pilot Is a Home Run

Twenty-three staff attended our first **Critical Thinking Workshop** on March 29th, and they were a mix of new grads and experienced nurses, coming from quality improvement, other facilities, and our acute care areas. This half-day workshop is an “application-based” program at the end of which participants are expected to demonstrate critical thinking skills through the application to real-life case scenarios. The informal atmosphere promoted ample discussion of contents and opportunities to share experiences, strengths, and weaknesses in a non-judgmental environment.

The evaluation score for the over-all workshop was 4.8 on a scale where a score of 5 = excellent. Some of the participants’ comments were:

- “I really like it”
- “Listening to others and their viewpoints helped”
- “Interesting topic, good discussion”
- “Role playing and real life clinical scenarios”
- “Interaction, not just a straight lecture”
- “Open, pleasant, and comfortable atmosphere”
- “Useful, practical content”
- “Got everybody involved in the discussions”.

The next Critical Thinking workshop is scheduled for June 14, from 1 to 4:30 PM, in the Learning Center. Call 8-6257 to register.



Ensuring Safe Medication Practices

To ensure safe medication management, the Medical Center has made some important policy changes that are in compliance with JCAHO's medication management standards and national patient safety goals. Please familiarize yourself with them as you continue to practice here.

Important Medication Order Prescribing Tips

Medication-order prescribing is a critical step in the medication administration process. This is the process where mistakes can occur, but most importantly, can be **prevented**. The clear and accurate writing of medication orders will ensure safety to our patients at UMMC. Please pay attention to the important elements involved in correct and accurate medication order prescribing.

- **Contents of a medication order:** Patient allergy, time and date of order, medication name (generic preferred) and dosage, route and frequency of administration, signature of prescriber, **indication for use for "prn" and range orders**.
- **Order rewrites required:** Orders must be re-written when there is a change in level of care, change in service, or if the patient is Post-Op (except for minor procedures). The Shock Trauma Center will re-write all orders weekly. A blanket statement to "Resume previous orders" is dangerous and will not be accepted.
- **Pediatric orders:** Weight is required on each **medication order sheet** for pediatric patients. Medication orders must display the dosing method in addition to the actual dose (i.e., For Baby Smith who weighs 8 kg, the order should be written "Ranitidine 16 mg (2mg/kg) daily").
- **Verbal orders** may be used only in situations absolutely necessary per the clinician to expedite appropriate care of the patient. Verbal orders must be documented in the medical record, then read back verbatim to prescribers for confirmation.
- **Hold orders** must contain name of drug and period of time or condition for the hold. If hold order is >24 hours or a period of time is not specified, the order will be discontinued by Pharmacy and a new physician order will be required to resume the medication.
- **PRN Orders:** Per hospital policy, **all prn orders** must contain a **reason**. All prn orders received without a reason for the order will be considered incomplete, and a call to the prescriber will be made for correction and rewrite.

Example:

- Incorrect - Acetaminophen 650 mg q6h prn
- **Correct - Acetaminophen 650 mg q6h prn headache**

Medication Range Orders:

- **Pharmnet Order Entry:**
 - Pharmacist will enter the **maximum** dose and **shortest** frequency. This default ensures dose range checking of maximum dose.
 - Original order: "Labetalol 5-10 mg IV push every 1-2 hours prn SBP >170 mmHg"
 - Pharmacist Entry into Pharmnet: Labetalol 10 mg q1h prn
 - Order comments section and MAR: Labetalol 5-10 mg IV q1-2 hours prn SBP >170 mmHg
- **Nursing Documentation for Range Dose Orders**
 - Actual dose/time administered on MAR
 - Response to therapy or effectiveness of dose
 - Medication waste
 - Patient education about the medication, and document this education on the Interdisciplinary Patient Education Form
- **Avoid prescribing practices that increase the chances for misinterpretation**
- **Avoid** the use of a **leading decimal point or trailing zero**
- **Leading zero:** Digoxin .125 mg- not acceptable: Digoxin 0.125 mg- **acceptable**
- **Trailing zero:** Warfarin 1.0 mg- not acceptable: Warfarin 1 mg- **acceptable**

What are Dangerous Abbreviations?

The elimination of dangerous abbreviations in our hospital documents (medication order sheets, progress notes) will help prevent medical mistakes and ensure patient safety.

Dangerous abbreviations are not to be used in prescribing and **are not accepted**

Dangerous abbreviations	Write Instead
CC, QD, U, QOD, g,	ML, Daily/Qday, Units, Every other day, mcg
SC/SQ, MSO4/MS, AD	Subcut/Subcutaneous, Morphine Sulfate, Right ear
AU, IU, MgSO4/MS, qn	Both ears, International Units, Magnesium Sulfate, Nightly

This table does not contain **all recognized dangerous abbreviations. Go to the UMMC Intranet to view the full table.*

Procedure for Eliminating Dangerous Abbreviations

- Avoid using dangerous abbreviations
- Nurses screen orders for dangerous abbreviations generated by the practitioner prior to faxing to pharmacy. If detected prior to faxing, the prescriber will be asked to rewrite.
- Pharmacists will screen all orders received for the use of dangerous abbreviations.
- If an order is faxed to pharmacy with a dangerous abbreviation, depending on the status of the order (i.e., emergent vs. non-emergent) the pharmacist will wait to dispense the drug until the order is appropriately rewritten.
- If an order is faxed to pharmacy with a dangerous abbreviation, the pharmacist will either call the floor and ask for rewrite and/or attach a green dangerous abbreviation sticker to the order identifying which order needs to be rewritten and the order will be delivered back to the unit.
- If the order is emergent (i.e., STAT medication order, first dose antibiotics, continuous infusions), the pharmacist will dispense the drug without delay and call the unit for a rewrite to follow.
- All rewritten orders will be saved by the pharmacy for monthly audit purposes.

What are medications brought from home?

Medications patients bring from home into UMMC may remain if authorized by a UMMC prescriber, and if appropriate storage can be ensured. The prescriber should state on the order form that the "patient may use home supply." Medications not authorized are removed or returned to the patient's home as soon as possible. Medications that are controlled, i.e., Schedules II-V, cannot be used within the hospital, they must be returned home.

Once the prescriber has authorized the use from home, the pharmacist must go to the unit and verify the medication brought from home. Once the drug has been verified, the pharmacist writes the name of the medication and "Pharmacist verified" with the pharmacist's initial on the patient's MAR. If the pharmacist is unable to leave the pharmacy the nurse can bring the patient's medication and MAR to the satellite pharmacy for verification. The Pediatric ED does not have a paper MAR. The pharmacist will document "**Pharmacist verified**" on the physician's order sheet.

What are High Alert and SALA Medication?

High alert medications are medications identified by the Institute for Safe Medication Practices (ISMP) that have high potential for causing significant patient harm when used in error. These medications include concentrated electrolytes, which coincides with one of JCAHO's national patient safety goals stating that concentrated electrolytes (including, but not limited to potassium chloride, potassium phosphate, sodium chloride >0/9%) should be removed from patient care units.

To meet this very important safety initiative all concentrated electrolyte vials have been removed from unit-based cabinets except in exempt areas. A policy and procedure was also developed to ensure the safe storage, distribution, and usage of 3% sodium chloride in 500 ml bags. These bags are currently stored in automated dispensing devices in four exempted units: Pediatric intensive care unit, 4 South Trauma intensive care unit, 4 North Trauma intensive care unit, and the TRU.

Don't Leave Your Patients in a P.I.N.C.H!

The Medication Error Adverse Drug Event Advisory Council (M.E.A.D.E.) has selected the following medications that have a greater potential for causing harm as **high-alert at UMMC**:

Potassium
Insulin
Narcotics
Chemotherapy
Heparin

Please use this '**PINCH**' acronym to remember these very important medications and use caution when prescribing, preparing, dispensing and administering them.

Sound Alike Look Alike (SALA) Medications

UMMC has identified a list of SALA medications (e.g., DOPamine and DOBUTamine, EPINEPHrine and EPHEDrine). The Pharmacy has placed pop-up alerts in Pharmnet and CPOME and has placed alerts on pharmacy labels and on the MAR. TALLMAN lettering on select SALA medication labels has been implemented to distinguish the drug name from similar drugs.

Medications are Prepared Safely. What is Admixing?

Only Pharmacy compounds or admixes all sterile medications, intravenous admixtures, or other drugs except in emergencies or when not feasible.

Nurses may use the word "admixing" and "reconstituting" interchangeably not realizing the difference between the two. JCAHO defines IV admixing as 'the preparation of a pharmaceutical product that requires the measured addition of a medication to a 50 ml or greater bag or bottle of IV fluid.' This definition does not apply to reconstitution, drawing into a syringe, or adding to a buretrol. The Pharmacy currently admixes all sterile medications except phenytoin and ampicillin (for pediatrics) due to short-stability once admixed.

The Intranet has references on all of these safe practices. If you have any questions about this information, or need additional clarification, contact **Barbara Sabatino** at bsabatino@umm.edu.



Checking On Physician Competence

All attending physicians, nurse practitioners, nurse anesthetists, midwives, and physician assistants at UMMC are approved for privileges to perform various clinical procedures through the hospital's credentialing process. The Medical Center does not "credential" residents. Instead, we distinguish residents by the level of supervision they require. Residents are physicians in training, and they gain competency performing various procedures throughout the course of their clinical training here. Eventually residents achieve competence to independently perform a variety of clinical procedures or other activities. But, before this independence is achieved residents may require varying levels of supervision by an attending physician or otherwise qualified senior physician. The old traditional model of medical education – dominated by unfettered resident autonomy – is, thankfully, giving way to something better. Now residents are not granted unregulated autonomy. Instead, they must be supervised and their competency for selected independent practice granted.

If staff is unsure if any of these practitioners are "approved" to perform a certain procedure, they can access one of two sources. One source (MIDAS) provides access to credentialing information for attending physicians and other licensed independent practitioners, and the other source (e-value.com) provides information about residents or dentists in training required levels of supervision for various procedures.

Short-term rotating residents, who are not a part of one of the Medical Schools established residency programs, are not included in the e-value.com database

Checking on Attending Physicians and Other LIPS Credentials

1. Access to MIDAS requires an icon installed on selected or designated PCs where a designated staff person has been granted access to the MIDAS database via a password.
2. Accessing Midas requires a password, which most staff nurses would most likely not have, but a supervisor, manager or coordinator would have or should have.
3. Person with the password enters their User ID and Password and clicks OK (Midas is case-sensitive and requires ALL CAPS). If your unit does not have a designated person to access MIDAS or a MIDAS icon on a handy PC, contact Kathy Fridley, 8-1148 or kfridley@umm.edu.
4. Click on the Privileges Inquiry button (or click on Function to access same);
5. Enter the Physician's last name or just the first few letters of the last name – then hit the tab key, then select the desired name and click OK;
6. After you've selected the provider, you should see the Dept/Division of the practitioner. The physician will be listed as follows: ACTIVE or INACTIVE. If the status is INACTIVE, or no status is listed, then the practitioner does not have current hospital privileges. Contact Medical Staff Services at 8-2902 or the Administrator-on-Call outside of normal business hours for further information.
7. Some departments group their privileges into categories. To see a description of these categories, highlight the privilege then click on the notepad button to view the narrative. When you are finished, click Cancel to exit description.
8. To review individual privileges, click on the magnifying glass button. All individual privileges, either ACTIVE or INACTIVE, for a particular specialty will appear.
9. Once viewing is complete, click OK.

If an attending physician or LIP is competent to manage sedation the listing of "conscious sedation" will appear in his or her listing in the MIDAS computer system.

Checking on Residents Level of Supervision

To find out what procedures residents can and can not do independently, staff can access the E-value.com Website.

1. Resident supervision requirements and procedures for which they do and do not require supervision are listed on E-Value Website (on the UMMC Intranet).
2. To get resident supervision requirements you need to go to the Intranet home page and click on "Clinical Resources", then look under the listing in the "Clinical Resources" text box (bottom left text box).
3. Once you have been linked to the E-Value Website, type in the username: **nurseone** (all one word), then the password: **managerone** (all one word).
4. Then, click on "Program Selection" in the left margin menu and pick a medical or surgical service on which the resident in questions works.
5. Click on "Procedures" in the left margin menu, then go to the users' pull down menu to get the name of the resident you want to check out.
6. Then, select a procedure, like "Moderate Sedation" from the "Select the procedure performed" list then click "Next".
7. There you will see the level of supervision required for that procedure.
8. There are four levels, namely:
 - N = Resident/fellow achieved competence to perform procedure or activity independently;
 - A = Supervisor immediately **available** by phone or pager, and can be physically present within a reasonable time;
 - P = Supervisor **physically** present for key portions, immediately available by phone or pager, and can be physically present within a reasonable time; and
 - No privileges granted.

What About Moderate Sedation?

A resident may independently manage patients receiving moderate sedation if he or she has been supervised by an attending physician or LIP credentialed in moderate sedation while he or she has safely and effectively managed five patients receiving moderate sedation. After five safely managed sedations, these supervised residents will have their "moderate sedation" listing in e-value.com show "N = Resident/fellow achieved competence to perform procedure or activity independently". This listing essentially means they are competent to manage sedation, and they no longer require supervision to do so.

If you have any questions about:

- Attending physician credentialing contact Allison Andrus, Director, Medical Staff Services, at ext. 8-1151, or aandrus@umm.edu;
- Resident supervision contact Laura Pounds at 8.1004 or lzanti@umm.edu
- MIDAS icon placement on PCs, or a password to use MIDAS, contact Kathy Fridley, at ext. 8-1148 or kfridley@umm.edu.



Where To Look – Paper or Electronic?

Our increased use of information technology (IT) in our patients' medical records has and will continue to evolve. During this time, the location of various documents and reports typically found in the traditional paper version of patients' medical records will move into its electronic version. PowerChart is our electronic clinical system into which our paper documents migrate. Staff increasingly use PowerChart to view patient information, place orders, chart forms, review results, and access reports in the patient's electronic medical record.

New Directory Guides You Where to Look

A new *In-Patient Medical Record Directory* has been developed to help staff find information in the two versions of our patients' medical records. It is designed to help staff know where to look - paper chart or electronic.

This directory, shown below, lists the documentation that resides in our current paper medical record. Also, this directory will be:

- Located in the front of each hard copy of our patients' medical record binder;
- Placed in heavy-weight, clear plastic protectors to keep them from tearing or getting soiled;
- Dated;

- Updated as various documents migrate from paper to PowerChart; and
- Included with the medical record when it is disassembled and sent to HIM for document imaging.

This imaged directory will help subsequent readers find the location of all medical record documentation.

These directories will be delivered in a clear plastic protectors, and placed in each medical record binder. The clear plastic protector remains in each binder, and the directories will be replaced with updated directories as documents move from paper to electronic format. A process to manage subsequent updating of these directories is currently being developed, and will be communicated to staff as it is finalized.

Providing reliable, efficient individualized care requires an ongoing mastery of both information and coordination. Our increased use of information technology (IT) is one way we are trying to achieve both. Yet, communication failures, particularly those that result from inadequate "handoffs" between clinicians, remain among the most common factors contributing to the occurrence of adverse events. This directory can help staff find the information required to provide safe, reliable, efficient, and individualized care.

More information about this directory will be available before it is delivered to each unit. Until then, if you have any questions about it, call Susan Carey at 8-2730.

Inpatient Medical Record Directory (updated as of 6/10/05)					
Inpatient Medical Record Documentation	Location of MR		Inpatient Medical Record Documentation	Location of MR	
	First Net/Power	Paper		First Net/Power Chart	Paper
1. Admission/Discharge Data			8. Imaging and Diagnostic Reports		
Emergency Services Patient Registration		x	Diagnostic Imaging	x	
Intake/Triage with Risk Assessments	x		Cardio Rpts (Cardiac Cath, Echo, EKG, EP Studies, Stress Test)		x
Emergency Physician Record - (TS forms)		x	Vascular Diagnostics/GI Lab Results	x	
Inpatient Registration (TRU)		x	EEG/EMG/ENG and Neurosensory Reports		x
TRU Nursing Assessment		x	Pulmonary Functions		x
Initial Trauma Evaluation		x			
Rapid Intake (TRU)	x		9. Ancillary Documentation		
F.A.S.T. Documentation Report (TRU)		x	Respiratory Therapy		x
Allergies	x		Physical Therapy	x	
Pain Evaluation	x		Occupational Therapy	x	
Admitting Note	x		Speech Therapy	x	
Discharge Summary/Death Note	x		Dietary		x
Discharge Instructions (except in the following areas as noted below)		x			
Adult ED and Pediatric ED	x		10. Physician Orders		
Death Certificate		x	Medication/Infusion (except in the following inpatient areas as noted below)		x
			L&D, I/P Perinatal, Transitional Nursery	x	
2. Progress Notes (H&P and Activity and Treatment Records/Observations)			Non-Medication (except for the following Orders as noted below)	x	
History and Physical		x	EEG, EMG, ENG, Pulmonary Function, Anatomic Pathology, Physician Consults		x
Multidisciplinary Plan of Care	x		PLEASE NOTE: All inpatient units in STC are still using paper for Non-Med Orders except for the following Orders as noted below:		
Progress Note		x	Diag. Radiology, Cardiology, Pulmon. Function, Vascular Lab	x	
STC Anesthesia Pain Service Log	x				
APMS Progress Note	x		11. Advanced Directives		
			Advance Directive brought in by patient		x
3. Consultations					
Consultation (except as noted below)		x	12. Patient Education		
Urology, Cardiology, ENT		x	Patient/Family Education	x	
STC Anesthesia Pain Consult		x			
4. Clinical Pathways			13. Medication Records		
Pathways		x	MAR (except in the following inpatient areas as noted below)		x
5. Operative Records			Labor and Delivery, Mother/Baby, Full Term Nursery	x	
Pre-op and Post-op forms		x			
Operative/Procedure Notes		x	14. Flowsheets		
Full Operative Summary	x		Flowsheets		x
Recovery Room Record		x			
6. Pathology Reports			15. Consents and Correspondence		
Anatomic Pathology Results	x		Consents/Release forms		x
			Birth Certificate		x
7. Laboratory Results			Financial documents		x
Clinical Lab, Blood Bank and HLA	x		Outside Hospital Information		x
Cytogenetics		x			

Our JCAHO Survey starts on July 12th and ends on July 15th

Our Top Ten JCAHO Areas Needing Improvement for JCAHO Survey

This list shows the ranking of the top ten practice areas we need to improve before our forthcoming JCAHO re-accreditation survey during the second week of July. Each unit varies in their compliance rates among these areas listed here. To see how your unit is performing on each of these JCAHO standards, ask your manager or Senior Partner about your unit's compliance data and what you and other staff can do to improve areas with low compliance.

1. **Controlled Substances** – Dose ordered equals dose administered;
2. **Controlled Substances** – Waste documented with two signatures;
3. **Controlled Substances** - Documentation completed on *Controlled Substance Tracking Form* (PO-Injection-Supp-Patch) and/or *IV Controlled Substance Infusion Form* complete for Locked Box Narcotics at the end of each shift;
4. **Medical restraints** protocol complete;
5. Patient asked about **Advanced Directives**;
6. **Plan of care** updated;
7. **Moderate sedation** documentation complete;
8. Initial **pain assessment** documentation complete;
9. Pre and post analgesic **pain scores** documented; and
10. **Effectiveness of PRN medication** documented

Source: MIDAS Inpatient Audit Results May 22, 2005

Note: Items 1, 2, and 3 require 100% compliance
Items 4 – 10 require 90% compliance



News & Views is published bimonthly by the
Department of Patient Care Services

Robert H. Welton, *Editor*
Office - 410-328-6257 or Fax - 410-328-8258
Email: rwelton@umm.edu
Office of Clinical Practice & Professional Development
University of Maryland Medical Center
22 South Greene Street, Baltimore, MD 21201