

# ANESTHESIA NEWSLETTER



The University of Texas Medical School at Houston, Department of Anesthesiology, 6431 Fannin, MSB 5.020, Houston, TX 77030-1503  
Web site address: <http://www.uth.tmc.edu/anes/> Anne Starr, Editor

## Chairman's Corner

By Carin A. Hagberg, M.D.

1. I want to welcome the new residents! Today is a great time to be in academic anesthesia. We attract the best medical students in record numbers. We just graduated a superb group of residents and are welcoming an equally superb group of residents this year. I am looking forward to working with all of you.
2. We are developing new educational initiatives to provide better training for our residents. There are going to be several changes in the residents' curriculum, including the addition of simulation and disaster training, education of business matters and much more to come. The Education Committee will meet this month for further discussion. The Joseph C. Gabel Visiting Professorship will begin next month with Dr. Elizabeth Cordes Behringer, Professor, Cedars-Sinai Medical Center, who will lecture on Extubation of the Difficult Airway.

## Residency Director's Update

By Mary Rabb, M.D.

Congratulations to all of our graduating class!! The banquet was a huge success. Everyone had a great time!! Thank you to all of the residents who planned and worked so hard on this for the department. Recipients of the outstanding junior resident award are: Olga Lyuksyutova and Sam Gumbert. MacArthur Baker is the recipient of the outstanding senior resident award. The outstanding teaching awards were presented to Dr. Evan Pivalizza and Dr. Sara Guzman. Keep up the good work.

### INSIDE THIS ISSUE

Chairman's Corner	1
Residency Director's Update	1
Faculty & Research News	2
Political Corner	3
Chief Chat	3
Credentialing information	3
Multimodal Approach	4
Announcements	5
Remembering Michael DeBakey	5

3. The transport policy continues to be addressed with Dr. William Andrews. There are still several issues to be worked out, but one thing that will begin immediately is that residents will be responsible for transporting all 7:30 a.m. (8:30 a.m. on Thursday) posted cases.
4. Dr. Dailey's condition continues to improve with hopes that he will return to work. Thank you all for your continued concern and efforts to hold down the fort in his absence.

*"Today is a great time to be in academic anesthesia."*

We have a lot of new faces in the OR. Welcome to our new CA 1 class. Please stop and say hi to the new residents. Richard Beaton, Trey Burrow, Theresa Dang, Phillip Gallegos, Amy Graham - Carlson, Timothy Hollenbeck, Bradley Keneson, Peter Killoran, David Leiman, Jay Pinsky, and Esi Rhett.

*"We have a lot of new faces in the OR. Welcome to our new CA 1 class."*

## Faculty News

### Abstracts:

1. Sciard D, Hwang L, Nguyen AT, Lee C, Nguyen TT, Kocieniewska D: Peripheral nerve blocks for ambulatory surgery in a private practice setting. ESRA, 2008.
2. Vahdat K, Hagberg CA, Pivalizza E, Tandon N : A comparison of coagulation parameters using hextend vs. crystalloid in intracranial surgical procedures – a pilot study. Accepted, Society of Neurosurgical Anesthesia & Critical Care, 2008.

### Articles:

1. Ghelber O, Gebhard R, Vora S, Hagberg C, Szmuk P: Identification of the epidural space utilizing pressure measurements with the Compuflu® injection pump – A pilot study. Reg Anesth Pain Med. In press, 2008.

### Chapters:

1. Hagberg C, Henderson J, Pereira K: Anesthesia for laparoscopic procedures. In: E Frezza, M Gagner, M Lee, B Dellamagne (eds) *International Principles of Laparoscopic Surgery*. Cine-Med, Inc., Woodbury, CT 2008.

### Guest Lectures:

1. Fife C: “Synergistic Effects of Negative Pressure and Hyperbaric Oxygen Therapy on Diabetic Foot Ulcers”, Istanbul University, Turkey, July 14, 2008
2. Fife C: “The Safety of negative Pressure Wound Therapy in the Outpatient Setting”, Conference of European Wound Management, Lisbon, Portugal, May, 2008; World Union of Wound Healing Societies, Toronto, Canada, June, 2008
3. Matuszczak M: 6<sup>th</sup> Biannual Ultrasound Guided Regional Anesthesia Workshop, MD Anderson, Houston, TX, July 2008
4. Hagberg CA: “Practice Guidelines for Perioperative Management of the Patient with Obstructive Sleep Apnea (OSA)”, Methodist Hospital, July 2008
5. Hagberg CA. “Current Concepts in the Management of the Difficult Airway.” St. Luke’s Hospital, July, 2008

### Upcoming Lectures:

1. Maus E: “Near Infrared Imaging of the Lymphatic System”, National Lymphedema Network Meeting, San Diego, CA 8/23/08
2. Maus E: “Management of Lymphedema in the Presence of Severe Heart Failure”, National Lymphedema Network Meeting, San Diego, CA

## Research News

### Current Protocols:

1. Novel Method of Non-invasive Detection and Assessment of Gas Emboli and DCS. Bruce Butler, Co-P.I., University of Houston), Office of Naval Research (ONR), U.S. Navy.
2. CT-Imaging, T-5. Bruce Butler, Co-P.I., U. S. Army Research, MMRD (\$40,550)

## Coding/Billing Information

By Shirley Hillman

### Anesthesia Coding 101

We will be introducing anesthesia procedural coding to the residents and staff. September will be our start date. The anesthesia code, a 5 digit code, must be written on the "Data Entry Sheet" (Yellow Sheet). Laminated sheets of anesthesia codes are attached to the anesthesia machines in the ORs. There will be RVU books and crosswalk books available in the PACU dictation area. Please do not remove those books from the area, and please become familiar with the codes when you are in the OR. If there are no laminated sheets in the OR you are in, please let Debi or Nancy know. Additionally, we will try to have additional copies for each resident and staff to carry with them. I will be presenting at Grand Rounds in August.



*Anesthesia procedural coding will be introduced to the residents and staff in September.*

## Political Corner

By Evan Pivalizza, MBChB

Success and perseverance! With overwhelming physician input, most of our representatives and both TX senators in Washington overturned President Bush's veto of 6331, thus blocking Medicare payment cuts for 18 months, providing a 1.1% increase for 2009 and importantly restoring full Medicare payment to anesthesiology teaching programs from 2010 (incorporating original language authored by Rep Pete Sessions (TX)). Thanks to all those that e-mailed and called via either the ASA or AMA websites. Don't underestimate the power of the collective 'individual' in an election year! I would encourage you to e-mail/call thanks to those that supported access to care for Medicare beneficiaries - see list to check how your house representatives

Republican U.S. Reps. Michael Burgess, MD (R-Lewisville), Ralph Hall (R-Rockwall), Mike McCaul (R-Austin), Ted Poe (R-Humble), and Lamar Smith (R-San Antonio) voted for the bill initially and also voted to override the veto. Democrats taking the same stand

were Reps. Henry Cuellar (D-Laredo), Lloyd Doggett (D-Austin), Chet Edwards (D-Waco), Charlie Gonzalez (D-San Antonio), Al Green (D-Houston), Gene Green (D-Houston), Ruben Hinojosa (D-Mercedes), Sheila Jackson-Lee (D-Houston), Eddie Bernice Johnson (D-Dallas), Nick Lampson (D-Stafford), Solomon Ortiz (D-Corpus Christi), and Ciro Rodriguez (D-San Antonio).

U.S. Reps. John Culberson (R-Houston), Kay Granger (R-Fort Worth), Pete Sessions (R-Dallas), and Mac Thornberry (R-Clarendon) all voted against the bill, but then voted to override the veto.

U.S. Reps. Louie Gohmert (R-Tyler) and Silvestre Reyes (D-El Paso) missed the first House vote on HR 6331 but didn't miss the chance to vote to override the president's veto.

*"Don't underestimate the power of the collective 'individual' in an election year!"*

## Chief Chat

Welcome to the July CA-1s. We know the first month is overwhelming, but we're hearing great comments about the new class. Thanks to the CA-2 and CA-3s for their hard work during T-moding. Now that the In-training exam is over, we can shift our focus to more enjoyable matters... PARTYing! In August, we will be having a resident get-together once the new crew starts. Be on the look-out for the invite.

The anesthesia techs are willing to help cases run more efficiently in the mornings. Remember to leave a list of special items you would like set up for the next day in the scheduling room, i.e. art line, fiberoptic cart, rae tubes, hot line, etc.

The ICU transport policy has been revised. We will try the new pilot study and see if this improves room turnover times. The new policy will be emailed out once it is finalized...very soon!

Dr. Ho is still providing his review courses FREE for our residents. Take advantage of this wonderful opportunity. The next sessions are Sat.7/19 and 8/9.

Thanks!

*"Now that in-training exam is over, we can shift our focus to more enjoyable matters..."*

## Multimodal Approach to Decrease Major Complications Associated with Peripheral Nerve Blocks

By Didier Sciard, M.D.

Complications after peripheral nerve blocks have been reported frequently and range from minor to major complications including death.

Cardiac arrest following intravascular injection is by far the worst complication associated with regional anesthesia and has been shown not to be exceptional.

Multiple techniques have been described to further decrease the risk associated with intravascular injection including test dose with solution containing epinephrine, fragmented injection and lately the use of ultrasound guided regional block.

None of these techniques have proved to completely eliminate this complication and all information provided by the patient, the type of drug, the nerve stimulator and ultrasound should help us to minimize the risk of intravascular injection and if any the risk of cardiac arrest associated with intravascular injection.

### Type and Degree of Sedation

Cardiac arrhythmia and cardiac arrest as the first sign of local anesthetic toxicity has been described but is often preceded by some signs of neurotoxicity that can be missed if the block is placed under general anesthesia or heavy sedation.

### Modality of Injection

Even if most of the reported cases of cardiac arrest following a peripheral nerve block showed that frequent aspiration and fragmented injection didn't help in recognizing intravascular injection this modality of injection is essential.

### Type of Local Anesthetic

There is a correlation between local anesthetic potency and CNS and cardiac toxicity. For example, in dogs, a study indicates that the relative CNS toxicity of bupivacaine, etidocaine and lidocaine is 4:2:1.

When an indwelling catheter is placed for a continuous regional block lidocaine or mepivacaine should be used as the induction drug followed by a continuous infusion of a low concentration of ropivacaine or bupivacaine.

### Ultrasound

Ultrasound guidance during peripheral nerve blocks can reduce the volume of anesthetic for a

reliable block and the administration of multiple smaller aliquots of local anesthetics can minimize the risk of injection of large dose of local anesthetic. Furthermore, direct visualization of the local anesthetic spread around the nerve should prevent intravascular injection of large volume of local anesthetic.

Lately 2 case reports of intravascular injection following ultrasound guided regional block should temper the use of ultrasound as the sole technique for placement of peripheral nerve blocks.

### Nerve Stimulation

An appropriate use of a nerve stimulator should by itself give valuable information. When an adequate stimulation is elicited with a low intensity the muscle twitch should disappear when a couple of cc of local anesthetic is injected. Stimulation should return after a short period of time or when intensity is increased. Another bolus should make the twitch disappear again and a new increase in the intensity of stimulation should bring a twitch back. Any twitch that keeps being elicited at the same level of intensity after local anesthetic injection should be alarming.

In summary, even if ultrasound has been shown to improve the practice of regional anesthesia it should be considered as one more tool to improve safety and quality in our practice. A multimodal approach should be encouraged in order to minimize the risk of intravascular injection of large doses of local anesthetic.

\*\*\*\*\*

## Anesthesia Cart Stays in the Room !!!



After discussion with the Infectious Diseases team and the hospital administration, we will no longer be taking the anesthesia cart out into the hallway for isolation cases. We will also have better "isolation carts" that will be emptied and cleaned between cases (see picture). These carts will be kept in the workroom and stocked for our use. If you need to, you can access the anesthesia cart, dispose of your isolation gown and gloves, dawn new gown and gloves, and get what you need. Hopefully this will be a safer and more efficient practice for these cases.

Mike Mullens

## Announcements

### Appointments:



Carin A. Hagberg,  
M.D. was appointed  
Chairman of our



department July 11, 2008.

### CONGRATULATIONS!

Didier Sciard, M.D. recently became a Reviewer for Anesthesiology.

Mary Rabb, M.D. also took the Advanced Cardiac Life Support Recertification Course.

### Welcome New Faculty

Xavier Adrien, M.D. – July  
Davide Cattano, M.D., Ph.D. – July  
Richard Layman, M.D. – July  
Mark McMasters, M.D. – August

**Kudos** to Shirley Hillman for passing the AAPC Anesthesia Specialty Exam and Guille King for coordinating the administrative staff move.

**William Daily, M.D.** is recovering well at home. He is getting stronger both mentally and physically everyday.

Latisha Smith, M.D. recently underwent back surgery on July 9 is recovering nicely at home.

### Changes, Changes

Administration office locations are changing. The personnel listed below have changed office locations:

Theresa Le, DMO	MSB 5.020
Glorimar Medina-Rivera, M.D.	MSB 5.186A
Anne Starr	MSB 5.018

Additionally, the following staff are **temporarily** re-located while their offices are being renovated.

Jonetha Davidson	MSB 5.186A
Cheryl Loudd	MSB 5.174
Shirley Hillman	MSB 5.176
Guille King	MSB 5.184
Leslie Martinez	MSB 5.184
Karen Lam	MSB 5.182

## Remembering Michael DeBakey

Excerpted from the Houston Chronicle July 13, 2008 Issue



Having saved countless thousands of lives through his many innovations in surgical techniques and medical technology, Dr. Michael Ellis DeBakey's pioneering aneurysm treatment was used

to save the doctor's own life in 2006. On Tuesday at age 99, and leaving a legacy that will long endure, DeBakey died here in the Methodist Hospital.

DeBakey developed life-saving procedures that required surgeons to open up the chest cavity — heart bypasses, corrections of aortic aneurysms, patch-graft angioplasties and others. Many of these surgeries were made possible by his invention, when he was still in medical school, of a modified roller pump, a critical component of the heart-lung machine. Today, doctors try to minimize the size of incisions, but it was DeBakey's pioneering methods that allowed for this advance.

Often thought of as a heart specialist, DeBakey's major contributions were actually in the field of vascular surgery, treatments for diseases of the aorta and other arteries. He and a handful of other notable physicians made Houston a world-renowned center for excellence in heart treatments.