



RESEARCH DAY 2011

FRIDAY, APRIL 29

DOBRIN LECTURE

sponsored by the Department of Earth & Atmospheric Science with financial support from Shell

CALLING ALL GEOSCIENCES STUDENTS BE A PART OF RESEARCH DAY!

PARTICIPATE IN THE POSTER OR ORAL PRESENTATION FOR A CHANCE TO WIN TRAVEL SCHOLARSHIPS. SUBMIT YOUR ENTRIES TO TANIA MUKHERJEE (tmukher2@mail.uh.edu).



8:00AM to 12:00PM ORAL COMPETITION (S&R1, room 136)

9:00AM to 3:00PM POSTER COMPETITION (S&R1, 1st floor)

NOON STUDENTS LUNCHEON (S&R1, 1st floor)

3:00PM DOBRIN LECTURE (S&R1, room 116)

4:00PM AWARDS CEREMONY (S&R1, room 116)

DEPARTMENT PICTURE WILL BE TAKEN ON THE FRONT STEPS OF SCIENCE AND RESEARCH BLDG. 1 IMMEDIATELY AFTER THE AWARD CEREMONY. Mucky Duck ALUMNI GET-TOGETHER TO FOLLOW.

GEOSCIENCES LABORATORIES

OPEN HOUSE

OUR LABS WILL BE OPEN TO VISITORS FROM 9AM TO 3PM



- Laser Ablation Multi-collector Inductively-coupled Plasma Mass Spectrometer (MC-ICP-MS) **S&R1, room 317**
- Thermal Ionization Mass Spectrometry **S&R1, room 317**
- Laser Ablation Quadruple Inductively Coupled Mass Spectrometry Lab **S&R1, room 332**
- Cameca SX50 Electron Microprobe **S&R 1, room 236**
- Permeability Lab **S&R1, room 405**
- AGL Seismic Acoustic Lab **S&R 1, room 60**
- Petroleum Geochemistry Lab **S&R 1, room 203**
- High Performance Computer Lab **S&R 1, room 230**
- Geosciences Learning Center **Science Bldg., room 9**
- Remote Sensing Lab **S&R1, room 309**



THOMAS D. BOWMAN

Mr. Bowman is the VP of Evaluation for Zaza Energy (Houston, Texas). He has 29 years experience in advanced exploration techniques in both domestic and international petroleum exploration. Mr. Bowman has a Bachelor of Science degree from Montana College of Mineral Science and Technology. He is a licensed Texas Professional Geoscientist.

CHANGING EVOLUTION OF GEOPHYSICS IN RESOURCE PLAYS

With the onset of unconventional resource plays the role of geophysics and geophysicists is transforming to meet a new set of challenges. Exploration geophysicists are now required to adapt to completion geophysicists and are requiring a new set of tools to resolve reservoirs in more detail than ever before required. Horizontal completions are requiring careful planning and execution and now 3D seismic is being used to locate, mitigate, and avoid subtle completion obstacles to enhance the efficiency of the expensive completions. And seismologists are now following completion throughout the entire process from analysis of these plays; to horizontal planning; risk mitigation; horizontal steering; completion design; and finally through monitoring the completion efficiency.

What does the next step in the geophysical supported process demand? With the integrated collection of the robust amount of geophysical information through the completion process the next stride in the progression is going to be the full field development of these assets using geophysics as the foundation. This result is not without its challenges and is going to require the essential collection and integration of more detailed data. Whether is data is higher frequency conventional seismic data or analysis of the detailed micro-seismic data the common thread is going to be understanding the subtle details of the formations to be completed and the surrounding strata.

This presentation will cover these various steps leading from the identification through the completion process of unconventional resource plays and beyond; focusing on the utilization of the various collections of geophysical data and then will conclude on the future and where geophysics is headed as a critical support for efficiently developing these vast hydrocarbon resources.

UNIVERSITY of HOUSTON
Science & Research Bldg. 1, room 116

Friday, April 29, 2011
2:00PM - Social hour
3:00PM - Lecture

Parking passes are available at the Alumni Center Visitor's booth on Cullen Blvd. (\$3) Please call (713) 743-3402 or email tnguye36@mail.uh.edu for more information.

Questions about Geosciences Research Day? Call (713) 743-3402