



The Basic Facts

Volume 2, Issue 1 January 2001

The Basic Facts, College of Basic and Applied Sciences, Middle Tennessee State University, Murfreesboro, TN

The Number 1 Army ROTC Program in the United States

The Science of Success

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According to the Military Science Department's web page, their mission is to provide 2nd Lieutenants for the United States Army, Army National Guard, and the United States Army Reserve. They are obviously fulfilling that mission.

The Military Science Department in the College of Basic and Applied Sciences has earned the United States Army's rank as the No. 1 ROTC program in the nation.

Many factors contribute to the ranking, including high marks in commissioning, retention, training, the Ranger Challenge team's back-to-back championships, student grade point averages (3.04), scholarships, and cadet performance scores.

Lt. Col. Mark Ferrell, Chair of the Military Science Department, explained that this success was achieved by "the cadets themselves. Bringing the right quality of student into the

ROTC program and the University makes for a winner. They have to be a scholar, before they can be a soldier."

MTSU's Military Science Department beat over 266 other universities for the coveted honor, including traditional military powerhouses like Texas A&M, The Citadel, and Virginia Military Institute.

To access Military Science's web page, go to <http://www.mtsu.edu/~arotc/>.

Undergraduate Research Council Funds Proposals

The College of Basic and Applied Sciences Undergraduate Research Council (UGRC) received twelve grant proposals this past fall. The Council voted to fund eight of these proposals, although according to the Chair of the Council, Dr. Dennis Mullen, "most of the proposals were of some merit, and I believe that most of the unfunded projects will still be completed by the students."

The Council was established by the College in the Fall of 1993 and has guided the program since that

time. The UGRC consists of nine faculty from the College, each serves a three-year term, and are appointed by the Dean.

The program consists of two major components — an annual undergraduate research symposium, and an undergraduate research grant program. The proposals are funded by the College and the deadline for submissions is November 1.

The College is hosting a banquet for those who received the UGRC Grants and for their mentors. For the Spring 2001 semester, it will be held January 30, in the James Union

Building at 6:00pm.

For a listing of the grant recipients and their project titles, please see *The Basic B.E.S.T.* column.

In addition, according to Dr. Mullen, "We have decided to hold the Annual Undergraduate Research Symposium on April 12, 2001 in the Alumni Center. We plan to hold the symposium late in the day (4:00pm-6:00pm) to accommodate off-campus guests."

Visit the UGRC web page at <http://www.mtsu.edu/~collbas/UndergradResearch/>.

Special points of interest:

- MTSU ROTC #1 in US
- Undergraduate Research
- BAS PR Blitz
- Who is B.E.S.T.? See Page 2 and learn what your colleagues are doing within the College, the University, and the Community.

B&A Sciences Focusing on Public Relations

The College of Basic and Applied Sciences is focusing on a public relations program to make the College, if not a household name, at least familiar to everyone.

Interim Dean Ray Phillips and Interim Associate Dean Thomas Cheatham are collaborating with Randy Weiler with MTSU News and Public Affairs and Dr. Teresa Mastin in the College of Mass

Communication to help realize this endeavor.

Mr. Weiler has written an article for *The Record* which will be published shortly regaling the ROTC program's No. 1 ranking (see above article). The News & Public Affairs office will focus on our College over the next few weeks.

Dr. Mastins's public relations' students in her PR Campaigns 474

class in the School of Journalism have been, according to Kathie Whitsitt, one of three account executives, "assigned the project of developing a communications plan which will best serve the needs" of the College. The other two account executives are Brian Gillespie and Jamie Lawwell. The three groups are competing to complete a plan for the College.

Visit our newsletter web site to view all *The Basic Facts* issues:

<http://www.mtsu.edu/~collbas/newsletters>



The Basic B.E.S.T. (Boastful Educators Showing Talents)

All departments are invited to submit items for this column

Agrribusiness/Agriscience

Dr. Cliff Ricketts received a research grant entitled "Hydrogen Research Project." The grant is for \$19,500.

Aerospace

Dr. Ronald Ferrara received two public service grants from TDOT. The grants are entitled respectively, "Aerospace Education Workshop Basic" (\$43,750) and "Aerospace Education Workshop Advanced" (\$37,250).

Biology

Dr. Thomas Hemmerly is featured in the current issue of the University's newsletter, *The Record*. Dr. Hemmerly is the recent recipient of the Distinguished Scientist Award from the Tennessee Academy of Science (also see the December issue of *The Basic Facts*). Visit *The Record's* web site to read the article:

http://www.mtsu.edu/~proffice/Record/Rec_v09/rec9014/body.html#TAS.

Dr. Cindi Smith-Walters was recently recognized by Oklahoma Project Learning Tree during their 15th Anniversary Year meeting. The program was begun by Smith-Walters when she was Education Coordinator for the Oklahoma Conservation Commission. The PLT program is an international interdisciplinary K-12 curriculum that teaches traditional subject and skill areas by using the forest as a window into the natural world.

Dr. John Zamora received a commendation plaque for training over 100

people in the TIPS (Training for Intervention Procedures) program.

Mathematical Sciences

Dr. Diane Miller, Dr. Paul Lee (PHYS), and Dr. Diane Gower (ELED) were recipients of a NOVA Grant. The grant (funded by NASA) is presented to enhance the teaching of mathematics and the physical sciences for pre-service elementary majors.

Nursing

Dr. Pam Holder had an abstract accepted for publication in the journal, *SCI Nurse*. The title of the manuscript is "Leading from the Rear" and will be featured in the *Leadership Column* of the journal.

Drs. Suzanne Prevost and Karen Ward had abstracts selected for paper presentation for the 12th International Nursing Research Conference held in Copenhagen, Denmark in June. The conference is sponsored by Sigma Theta Tau International (Honor Society for Nursing).

Dr. Suzanne Prevost has been invited as one of three nurses from the US to represent Sigma Theta Tau International to serve on a strategic planning panel for the international nursing library to be held in Indianapolis, IN in January. Nurses from Belgium, Canada, Iceland and Taiwan participate in the meeting.

Ms. Kate Moore, MSN, RN, presented "Physiologic Considerations of Projectile Injuries: A Nursing Perspective" at the 7th Annual Leadership Symposium, 330th Combat Support Hospital, Milling-

ton, TN in January.

Dr. Lynn Parsons published "Leadership Concepts in the Nursing Curricula: Competencies Needed for Practicing Nurses in the 21st Century" in the January issue of the *Tennessee District 15 Heartbeat*.

Ms. B. Renee' Dugger has been re-certified as a Clinical Specialist in Gerontological Nursing by the American Nurses Credentialing Center through 2005.

Dr. Stephen Krau's manuscript ("Living the Healthy Heart Path: Rehabilitation after a Cardiac Event") will be published in the 3rd issue of *Critical Care Nursing Clinics of North America*.

Ms. Shelia Marquart and Dr. Jenny Sauls will be published in the 3rd issue of *Critical Care Nursing Clinics of North America* for their manuscript "Survivorship: Living Through a Life Altering Event."

Dr. Karen Ward will be published in the 3rd issue of *Critical Care Nursing Clinics of North America* for her manuscript "Managing the Stress of Caring for Rehabilitation Patients."

Physics

Dr. Paul Lee, Dr. Diane Miller (MATH) and Dr. Diane Gower (ELED) were recipients of a NOVA Grant. The grant (funded by NASA) is presented to enhance the teaching of mathematics and the physical sciences for pre-service elementary majors.

The following students were recipients of Undergraduate Research Council awards:

BIOL

Jarrett B. Foust ("Effects of Vibration on Cancer Cell Growth")

Amanda E. Wagner ("Lipopolysaccharide neutralization by *Acanthamoeba polypharphay*")
Faculty Advisor for both: Dr. Anthony Farone

CHEM

Elizabeth Childress ("Characterization of Organosilane Modified Silica Spheres Using Atomic Force Microscopy")
Faculty Advisor: Dr. Andrienne Friedli

Jaime Rheinecker ("Quantum Chemical Data Mining for Insights into Classical Chemistry")
Faculty Advisor: Dr. Preston MacDougal

Freneka Minter ("The Chemistry of Telluric Acid")

S. Timothy Decha-Umphria ("Syntheses of Selenium Alkoxides as a Precursor")
Faculty Advisor for both: Dr. Judith Iriarte-Gross

ETIS

Randi McNeil ("Limitations of a Single Phase Power Meter Using an 8-bit vs. a 16-bit Microprocessor")
Faculty Advisor: Terry Hayes

PHYS

John Ash ("Acoustic Tunneling")
Faculty Advisor: Dr. William Robertson

