

Tomas Ortiz Hernandez

Associate Professor of Biology
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Education

Master of Science, Biology, Sul Ross State University (1995), Alpine, TX.

Masters Thesis: *Flavonoid Compound Chemistry and its Systematic Implications in the Genus Quercus of Trans-Pecos, Texas.*

Bachelor of Science, Biology, Sul Ross State University (1991), Alpine, TX

Teaching Experience

Full Time:

1995- 2016, **Biology Professor**, Midland College, Midland, TX.

Courses taught:

- Biology 1406, General Biology lecture and lab
- Biology 1407, General Biology lecture and lab
- Biology 1408, Introductory Biology for non-majors, lecture/lab
- Biology 1409, Introductory Biology for non-majors, lecture/lab
- Biology 2421, Microbiology for majors lecture
- Biology 2420, Microbiology for non-majors lecture
- Developed and taught Biology 1424, Systematic Botany lecture and lab.
- Developed and taught Environmental Science lecture and lab section.

Adjunct Teaching:

2016-Spring Semester, Sul Ross State University, Mammalogy lab section (Biol. 4409)

Fall Semester (current) SRSU, Herpetology lab section (Biol. 4403)

2015- Spring Semester Sul Ross State University, Ornithology (Biol 4404) lab section.

Fall Semester SRSU, Ichthyology (Biol 4402) lab section.

2014- Fall semester, Sul Ross State University, Herpetology (Biol. 4403) lab section.

Spring semester, Sul Ross State University, Mammalogy (Biology 4409) lab section.

2012- Fall semester, Sul Ross State University, Herpetology (Biol. 4403) lab section.

2011- Spring semester, Sul Ross State University, Ornithology (Biol 4404) lab section

2009- Spring semester, Sul Ross State University, Mammalogy (Biology 4409) lab section on the Midland College campus.

2007- Spring semester, Continuing Education course; "Plant Collecting, Identification, and Herbarium Techniques." Midland College

2005 - Spring semester, Sul Ross State University, Herpetology (Biol. 4403) lab section on the Midland College campus.

2004 - Fall semester, Morphology of Vascular Plants (Biol. 4408) laboratory section for Sul Ross State University on the Midland College campus.

1992-1994, **Graduate Teaching Assistant**, Microbiology (Biol 2406) and General Zoology (Biol. 1402) labs, Sul Ross State University.

1991-1992, **Undergraduate Teaching Assistant**, Microbiology labs, Sul Ross State University.

Other Academic Positions

2008- 2010, **Project Director**, *College Cost Reduction and Access Act Cooperative Grant (CCRAA)*, Midland College and Sul Ross State University.

- Select, supervise, and evaluate other project personnel,
- Oversee all equipment purchases and maintain inventory of CCRAA-acquired equipment
- Develop procedures for tracking transfer students for a minimum of seven years (2008-2015)
- Oversee laboratory build out and instrumentation,
- Oversee and facilitate course development activities
- Assist External Evaluator and Evaluation Team in ongoing formative and annual summative project evaluation
- Oversee development of all aspects of Articulation Agreements
- Assure that the program operates in total compliance with Ed. Dept. rules and regulations during the funding period
- Oversee preparation of fiscal and progress reports for the partners and the Department of Education
- Authorize all expenditures and maintain responsibility for appropriate utilization of funds (2.5 million dollar budget)

2002- 2007, **Transfer Specialist**, *Title V Midland College-Sul Ross State University Science Initiative Grant*.

- Academic advisor for Biology majors involved in our Science Initiative
- Facilitate a seamless transfer of courses between the two institutions
- Attend meetings with the Program Director and colleagues at the Sul Ross campus to discuss program development, budget, course development, and other issues that might arise.
- Degree plan evaluation
- Advise students with application, financial aid, and online registration procedures.

1998-2001, **Director**, *Louis Stokes Alliance for Minority Participation (LSAMP) partnership with the University of Texas at El Paso*.

- Advise and mentor minority science majors in preparation for transferring to a UT system institution.

Research

May 2016- *Reptile and Amphibian survey in the Sierra Rica Mountains, state of Chihuahua, Mexico*. Collaboration with Dr. Sean Graham, Sul Ross State University.

Research: continued

2011-2015, **Mentor Undergraduate Research Project**: Flavonoid compound isolation and identification in the genus *Quercus*. Direct research, train students in the process of

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research in the biological sciences and prepare them for poster presentations. Midland College.

1994-1995, **Research Assistant**, Isozymes in Madrones, National Science Foundation Grant awarded to Dr. James Zech, Sul Ross State University, Alpine, TX

1990-1991, **Research Assistant**, Genetic, Biochemical, and Reproductive Studies of the Hinckley Oak (*Quercus hinckleyi*) in the Big Bend Country of Texas, Texas Parks and Wildlife research grant awarded to Dr. Richard Hilsenbeck, Sul Ross State University, Alpine, TX.

1988-1990, **Research Assistant**, Phytochemical Investigations of Rangeland Grasses Emphasizing Cyanogenic Compounds, National Science Foundation Grant awarded to Dr. Richard Hilsenbeck, Sul Ross State University, Alpine, TX.

Publication

2016- *NEW DISTRIBUTION RECORDS FOR AMPHIBIANS AND REPTILES OF EAST-CENTRAL CHIHUAHUA, MEXICO*. Tomas Hernandez, Dr. Sean Graham, Mark Herr. Submitted: Acta Zoologica Mexicana.

Grants

2000- **Midland College Teaching Excellence Award Mini-grant**. Grant funds were utilized to establish and maintain a Midland College Herbarium.

Presentation

March 19, 2016 - History of Classification with an emphasis in Botany and field identification to the Midland chapter of Master Naturalist – (8 hours)

September 28, 2013 - History of Classification with an emphasis in Botany and field identification to the Midland chapter of Master Naturalist – (8 hours)

April 12, 2013 – Plant Family field identification seminar to the Midland chapter of Master Naturalist

February 2007- Developed and presented teaching module at the National Tropical Botanical Garden Kenan fellow meeting at the Kampong Gardens in Miami Florida

Spring 2004- **Moderator**, “Teaching Undergraduate Microbiology Students,” annual meeting of the Rio Grande Branch of the American Society for Microbiology, Sul Ross State University

Professional Development

September 9th-10th 2016 – Louis Stokes Alliance for Minority Participation Science Research Conference, UTEP

April 02, 2016 – Texas Tech Annual Biological Symposium

September 30, 2013 - First Generation Presentation by Jeff Davis Ph.D. (2 hours) Midland College

September 19th- 21st 2013 - LSAMP conference at UTPB, attendee and poster presentation Judge

August 2013 - Course flipping with Mark Frydenberg 3 hour presentation- Midland College inservice presentation

June 03 2013- GK - 12 Building Bridges: Intergrating Math, Science, and Engineering on the South Plains. TTU

March 22-23, 2013 - Texas Tech Annual Biological Symposium

November 2012 - 4-hour webinar offered by Lena Arthur of Dionex Centers of Excellence. This training is for learning the Chromeleon 6.8 software for the HPLC instrument

November 2012 - 4-hour on-site training for the Teledyne Combiflash Chromatography system offered by Deen Johnson, Teledyne Inc.

October 2012 - 1st Annual Midland College STEM conference, attendee and judge

September 2012 - LSAMP undergraduate research conference at UTPB. My research team presented a poster, "Method Development for Extracting Flavonoid Compounds from the Quercus and Juglans."

September 2012 - LSAMP undergraduate research conference at UT Arlington.

May 2012 - TCCTA Great Teaching Roundup in Kerrville, TX

Spring 2012 - Texas Tech Biological Sciences Symposium

March 2010 – CCRAA Project Director's conference in Washington D.C.

June 2006- National Tropical Botanical Garden Kenan Fellowship. Two week course on tropical plant research and teaching module development at the Kampong Gardens in Miami FL.

April 2004- Annual meeting of the Rio Grande Branch of the American Society for Microbiology, Sul Ross State University, Alpine, TX.

March 2001- “Evolution of Intelligence,” Texas Lutheran University Symposium, Sequin, TX.

August 1997- “Mexican Cultures and Values,” – Midland College as given by Diane Wynn.

May 1997- NISOD conference attendee, Austin, TX.

April 1997- “Emerging Diseases of the 21st Century,” Cottle Lecture Series, Sul Ross State University, Alpine, TX.

Committees

Fall 2015- present, Academic Policies committee

Fall 2014- Faculty Senate Leadership committee

May 2005-2012, Davidson Distinguished Lecture Series Advisory Committee

Fall 2004-present, Hospitality Committee

Fall 2000-Spring 2001, Teaching Excellence Committee

Student Organizations

2001-2005 - **Founder and sponsor**, Psi Pi-Midland College Math and Science Club.

2004-2005- **Founder and sponsor**, G-nome Society-Midland College/Sul Ross State University Science Initiative Student Club