**BIOLOGY**

**Carolyn L. Bouma.** Study of carbohydrate transport in bacteria, and its genetic regulation, using techniques of molecular biology, biochemistry, microbiology, and genetics; applied environmental microbiology.

**Donna Byers.** Natural bioactive compounds and their effectiveness as chemotherapeutics, using cell culture and molecular techniques. Genetic and morphological changes due to cholinesterase inhibition during early development of the mammalian brain.

**Jason Fritzler.** Evaluation and elucidation of novel chemotherapeutic agents against a number of different human, animal, amphibian and avian pathogens using conventional and molecular techniques. Evaluation, diagnosis and management of infectious diseases as they relate to humans, livestock, and wildlife.

**Nabarun Ghosh.** Aerobiology, allergy, air quality and evaluating air purifiers, digital, fluorescent and electron microscopy; cytology: cell and chromosome research; tissue culture in plants; plant pathology—virology: sugar beet and wheat viruses.

**James B. Johnson.** Fish and amphibian conservation, anuran predator-prey ecology, wildlife disease ecology, biometry, morphometric analysis, statistical computing in the R programing language.

**Stephen Karaganis.** Circadian biology of the murine gastrointestinal tract. Gut motility and hormone rhythms in vivo and in vitro.

**Richard T. Kazmaier.** Conservation biology, demography, communities, and the effects of management practices on animals and plants (particularly herpetofauna).

**J. Rex Lee.** Study of genetic and morphological changes in chick embryo associated with altering media environment during the developmental period.

# Raymond S. Matlack. Population and community ecology of mammals, including development of a monitoring protocol for free-tailed bats; study of responses of small mammals to frequency of fire in shortgrass prairie; ecology of small mammals in Palo Duro Canyon and other locations in the Texas Panhandle.

**W. David Sissom.** Systematics and natural history of scorpions and other arachnids; biodiversity inventory of terrestrial arthropods in Texas.

**ENVIRONMENTAL SCIENCE/GEOLOGY**

**Joseph Cepeda.** Study of volcanic and metamorphic rocks of the western United States as well as the landscape evolution and hydrogeology of that region.

**Erik Crosman**. Study of satellite remote sensing of the environment, numerical earth system modeling, air quality, and atmospheric boundary layer processes.

**Naruki Hiranuma.** Study of atmospheric ice nucleation, aerosol-cloud-climate interactions, weather modification (e.g., precipitation enhancement, hail prevention) and aerosols’ impact on public health.

**Mark Holland.** Study of the origin and evolution of continental crust; understanding plate tectonic processes by synthesizing structural geology, igneous and metamorphic petrology, geochemistry, geochronology, and thermochronology in field-based studies of orogenic terranes.

**William Jim Rogers.** Environmental assessment, decision support modeling, environmental risk modeling, toxicology, environmental remediation, waste management and handling with emphasis on natural resource and environmental quality protection.