Strosacker Science Center and Joseph H. Moss Family Laboratory Wing

STROSACKER SCIENCE CENTER AND JOSEPH H. MOSS FAMILY LABORATORY WING has well-equipped facilities for the Departments of Biology, Chemistry/Biochemistry, and Physics.The Moss Wing, which opened in January 2008, is a state-of-the-art facility with large, open laboratories and modern air-handling equipment. It includes a general/organic chemistry lab, along with a large preparation room; a microbiology/cell biology lab; an anatomy/physiology lab
with cadavers obtained annually; a specialized conservation genetics lab; a water lab housing simulated lake and stream environments, a greenhouse for the botanical collections needed for classes and student research programs, 14 faculty offices, two staff offices, and the D.M. Fisk Museum of Natural History, which features two dinosaur skeletons. Biology instrumentation includes a genetic analyzer, Real Time purified PCR enclosure with thermal cycler, electrophoresis and gel
documenting equipment, Steris autoclave, NanoDrop spectrophotometer, high-speed and ultracentrifuges, bio-tek plate reader, computer-based digital sound-analysis apparatus, cryostat and microtomes, chromatographs, research-grade microscopes with digital imaging capabilities, and a variety of vivaria, incubators and culture chambers. Chemistry/Biochemistry instrumentation includes high-performance liquid chromatograph, gas chromatograph/mass spectrometer with auto-sampler, FTIR spectrophotometer, diode array UV-Vis absorbance, thermal cycler, DNA and protein electrophoresis/gel documenting equipment, laser lab/Raman spectrometer, and 60 MHz and 400 MHz Nuclear Magnetic Resonance spectrophotometers. Physics instrumentation includes a multimode atomic force microscope, melt-spinner, powder X-ray diffractometer, high purity Germanium detector for particle detection, sophisticated analysis software, and a machine shop. The Radio Telescope Remote Command Center (RTRCC) is also located in the Physics Department and connects students to two of the largest radio telescopes in the world: The Green Bank Telescope in West Virginia, and the Arecibo Observatory in Puerto Rico. By operating these telescopes remotely from the Hillsdale campus, students observe pulsars (rapidly rotating neutron stars) across the galaxy for the purpose of gravitational wave detection. The RTRCC is also used as a laboratory for post-observation data analysis, and for the construction of small radio telescopes for use on campus.