

The University of Arkansas Pine Bluff is accredited by the Higher Learning Commission North Central Association

Statement from the Department Chair

Welcome to the Department of Chemistry and Physics at the University of Arkansas at Pine Bluff. UAPB is a dynamic institution that embodies an ideal academic standard in an ever changing technological world of science. We are in line with the University's mission and vision and we are in the process of launching new programs especially for undergraduate programs that target new and emerging areas in nanotechnology, nanomaterials, space physics, energy and biomedical. Under the supervision of faculty, the department has progressively engaged in various research activities. This has enabled us to post several patents and publications in peer reviewed journals as we continue to explore the area of innovation through the hard work of competent members of staff. The faculty and staff are excited and ready to serve all students, Pine Bluff community and Arkansans.

Admission Process

Any new student (first time, transfer or special students) who desire to enroll in classes, whether seeking a degree or not, must file a formal application for admissions and must submit complete official transcript of all previous academic work. Transcripts must be sent directly to the Office of Admissions by the issuing schools. All new students having taken less than 30 semester hours must have ACT scores on file with the University prior to registering for classes. The ACT is administered on-campus during the orientation period for those students who were unable to take it earlier. All students must be admitted to the University prior to registration. Contact the Office of Admissions and Academic Records for more information.

Financial Aid and Scholarships

Contact us for more information

Contact Us

Phone: 870-575-7154 Web: www.uapb.edu

Chemistry Program



UNIVERSITY OF ARKANSAS AT PINE BLUFF 1200 N. University Drive Pine Bluff, AR 71601



Department of Chemistry & Physics

Preparation for a Competitive Edge in Technological Era

Introduction

The Chemistry Program at University of Arkansas at Pine Bluff is student-centered and designed to provide students with opportunities and experiences to allow them to pursue future careers in a variety of areas. One of the key tenants of the program is the hands-on emphasis on laboratory experience as well as classroom instruction. This practice is aided by industry-related equipment and techniques.

The field of chemistry is emerging to meet the demands of the economic future as new technologies and interdisciplinary fields become increasingly important. The Chemistry Degree programs at University of Arkansas at Pine Bluff helps prepare students for graduate school in chemistry and other professionals that includes Medicine, Dentistry, Veterinary, Physical Therapy, Pharmacy and Biotechnology, in addition to the rapidly growing areas of nanoscience, petroleum research, forensics and laboratory technologist.

Degrees Offered

The Chemistry Program offers the Bachelor of Science Degree in Chemistry and Physics with options in Chemistry, Biochemistry and Forensic Chemistry. These degree options are designed for those students, who wish to pursue graduate studies in chemistry or related fields, attend professional schools or work as laboratory chemists. A Bachelor of Science Degree with endorsement in education is offered to those students who plan to become high school chemistry teachers. A Master's Degree in General Science Education is also offered.

Out of Class Opportunities

The Chemistry Program options strongly encourages undergraduate research. Research experiences with financial remuneration are sometimes available to students who qualify for federally funded programs. UAPB is in close proximity to major biomedical research facilities at the National Center for Toxicological Research and the University of Arkansas for Medical Sciences. Research experiences at these locations are available to students through cooperative research programs. A cooperative educational program also exists which allows students to obtain relevant work experience in off-campus UAPB has an active American settings. Chemical Society Student Affiliates Chapter and offers educational opportunities for students in HBCU-UP (STEM Scholars Academy) and ARK-LSAMP.

What makes chemistry Unique?

The Chemistry and Physics Department provides an engaged learning community between students and faculty through small class sizes, undergraduate research with faculty and personal advisors. This environment is enhanced by stateof-the-art equipment that is used in many professional and research settings not normally available in the undergraduate setting. Another unique aspect is the significant amount of exploratory learning available to students. This environment of exploration utilizes and sharpens critical thinking skills vital to any chemistry profession. By making a wide scope of highquality instrumentation available in core laboratory courses, students are exposed to unique learning opportunities to hone their skills for a variety of careers.

Chemistry Programs

All students in the chemistry major options take a core set of courses listed below. There are additional required courses listed at; <u>http://www.uapb.edu/academics/school_of_arts</u> <u>sciences/chemistry physics/undergraduate de</u> gree programs.aspx

Common Core Program Requirement

General Chemistry I/Lab General Chemistry II/Lab Organic Chemistry I/Lab Organic Chemistry II/Lab Calculus I Quantitative Analysis/Lab Physical Chemistry I/Lab Principles of Biology Biochemistry I/Lab Chemistry Seminar Biology Elective

Chemistry Faculty

Richard Walker, PhD, Professor, University of California, San Francisco, CA. Pharmaceutical Chemistry. Abul Kazi, PhD, Professor, University of Manchester, England; Organic Chemistry Grant Wangila, PhD, Professor, University of Alberta, Edmonton, AB, Canada. Analytical/Inorganic Chemistry. Daoyuan Wang, PhD, Assistant Professor, University of Arkansas at Little Rock; Little Rock, AR. Applied Chemistry. **Oinglong Jiang**, PhD, Assistant Professor, Northern Illinois University (NIU); DeKalb, IL. Nano-materials Chemistry. Zeeshan Habeeb, PhD, Assistant Professor, University of Wisconsin-Milwaukee; Milwaukee, WI. Physical Chemistry. Janee' Adams. MEd. Instructor. Jackson State University, Jackson, MS. Science/Mathematics Shaheen Khan, BS, Lane College, Jackson TN;

Lab Instructor

Administration

Grant W. Wangila, PhD, Chairperson. University of Alberta, Edmonton, AB, Canada. *Kimberly Ross*, BA, Administrative Specialist III. University of Arkansas at Little Rock, AR.