

SUMMARY

Detail-oriented Laboratory Physicist with a deep knowledge of physics and laboratory operations. Oversee lab environments effectively, train graduate teaching assistants, and promote educational excellence through collaborative curriculum development. Skilled in troubleshooting lab equipment difficulties, maintaining safety standards, and ensuring compliance with rigorous protocols. Dedicated to enhancing research outcomes and fostering an engaging learning atmosphere within academic settings. Committed to advancing both student understanding and research initiatives through innovative lab practices and supportive instruction.

EXPERIENCE

Laboratory Physicist

University Research Lab

June 2024 - Present

Hattiesburg, MS

- Lead a dynamic laboratory supporting physics experiments while managing day-to-day operations. Successfully supervise and mentor graduate teaching assistants, ensuring smooth instructional flow and compliance with academic standards. Engage in proactive interactions with faculty and improve laboratory effectiveness through refined experimental designs.
- Ensure compliance with all safety regulations during ongoing laboratory experiments.
 - Trained and coordinated graduate teaching assistants, facilitating effective lab instruction across multiple course sections.
 - Troubleshoot and resolved technical malfunctions with complex experimental equipment, enhancing operational efficiency.
 - Oversaw the procurement and maintenance of laboratory equipment, ensuring tools consistently meet safety and functionality standards.
 - Collaborated with faculty to develop and innovate laboratory experiments that align with educational objectives.
 - Conducted weekly meetings with teaching assistants to maintain grading consistency and address any student concerns.

Research Assistant

Academic Research Group

August 2022 - May 2024

Starkville, MS

- Supported groundbreaking research efforts within a collaborative academic environment, contributing to significant advancements in physics. Involved in fabricating materials and maintaining essential lab apparatus while ensuring adherence to safety guidelines. Participated actively in strategy refinement discussions that shaped project directions and methodologies.
- Conducted experiments addressing critical physical phenomena, producing valuable data for further analysis.
 - Developed comprehensive reports documenting methodologies and experimental findings for publication.
 - Participated in regular team strategy sessions aimed at improving research efficacy and collaboration techniques.
 - Maintained laboratory equipment meticulously to ensure consistent performance in compliance with safety regulations.
 - Assisted in developing course materials that supported undergraduate education in physics.
 - Attended training sessions and workshops designed to advance laboratory skills specifically related to physics coursework.

LEADERSHIP & AWARDS

- Dean's List, Fall 2024
- Physics Department Scholarship, 2023

EDUCATION

Bachelor of Science in Physics

University of Mississippi

GPA: 3.8

2026

Oxford, MS

Coursework: Classical Mechanics, Electromagnetism, Quantum Mechanics, Thermodynamics

CERTIFICATIONS

- Certified Lab Technician  2025
- First Aid Certification  2024

TECHNICAL SKILLS

- **Lab Equipment Used:** Oscilloscope, Spectrometer, Laser Systems
- **Software Tools:** MATLAB, Python, Microsoft Office
- **Research Methodologies:** Experimental Design, Data Analysis, Statistical Analysis
- **Compliance Certifications:** OSHA Safety Standards, GLP Guidelines, Laboratory Safety Training
- **Teaching Techniques:** Interactive Learning, Assessment Strategies, Curriculum Development
- **Document Control Systems:** Electronic Lab Notebooks, Project Tracking Tools, Reporting Software

- **Presentation Skills:** PowerPoint, Visual Aids, Public Speaking
- **Programming Languages:** Python, HTML/CSS, JavaScript
- **Data Management:** Excel, SPSS, Database Management Systems
- **Student Engagement:** Workshops, Outreach Programs, Student Mentorship

SKILLS

- Laboratory Management
- Microsoft Office Proficiency
- Time Management
- Project Management
- Experiment Design
- Data Analysis
- Problem Solving
- Critical Thinking
- Technical Writing
- Instrumentation
- Mentoring Skills
- Physics Education
- Communication Skills
- Quality Assurance
- Team Coordination

PROFESSIONAL AFFILIATIONS

- Member of the Physics Club
- Volunteer for STEM Outreach Program

LANGUAGES

- English (Native)
- Spanish (Intermediate)

ADDITIONAL INFORMATION

Work Status : Authorized to work in United States. No sponsorship required.

REFERENCES

AVAILABLE ON REQUEST