

Apprenticeship Title:	Influence of Water Mineral Composition in Meat Marination
Duration:	12 weeks (approximately May – August, 2018)
Compensation:	\$500/week plus benefits and travel allowance for job-related travel
Minimum age:	18
Minimum requirements:	<ul style="list-style-type: none"> • Must be currently enrolled in a four-year accredited college or university in a course of study relevant to the mission of Extension. • Must have completed sophomore year prior to the start of the apprenticeship. Must <u>NOT</u> be eligible to graduate prior to December 2018. • Must possess a minimum GPA of 3.0 based on a 4.0 scale at the time of application (exceptions will be considered with substantial justification). • Must be a U.S. citizen, national, or permanent resident. • Must have a valid driver’s license and reliable personal vehicle. • Must be willing to travel (regionally and possibly internationally) and work flexible hours. This position requires travel connected with official duties, including attendance at night and weekend meetings, conferences, etc. (Travel reimbursement will be provided.) • Must have Microsoft Office skills and familiarity with Excel.
Preferred qualifications:	<ul style="list-style-type: none"> • Have knowledge of food science, animal/poultry science, and/or meat science principles. • Experience in a food processing environment or laboratory. • Able to work effectively and build relationships with others. • Have good organization and planning skills and be able to demonstrate effective project coordination, facilitation, and implementation based on past work or school experiences. • Possess deductive reasoning skills and be able to analyze and synthesize information. • Have a personal commitment to working with diverse clientele and colleagues.
Physical requirements:	<ul style="list-style-type: none"> • Comfortable working in a food processing facility. • Ability to lift project materials.
General Apprenticeship Description:	<ul style="list-style-type: none"> • Work with an MSU Extension faculty specialist/mentor and other Extension personnel to coordinate research and implement related outreach program events and activities. • Maintain an ongoing, professional relationship with your assigned faculty mentor. • Participate in meetings where local issues are identified and prioritized, and program results and plans are discussed. • Assist in preparations for planned events and activities by gathering information, assembling materials, contacting participants, and soliciting support from external sources. As appropriate, conduct the teaching, training or other program presentations.

	<ul style="list-style-type: none"> • In some cases, the apprentice may identify and develop a value-added process, program, or training tool that may be implemented within the hosting unit's current operations. • Maintain and submit a weekly reflective journal outlining apprenticeship experiences. • Will be expected to develop and present a poster or presentation at an industry-related conference or professional meeting identified by the Extension faculty specialist/mentor. • Overview of Apprenticeship <p>The purpose of apprenticeship opportunity is to determine how different water compositions affect the functionality of phosphates during meat marination. The goal is to give the apprentice an opportunity to research, develop, and disseminate practical and cost-effective practices and guidance for the meat and poultry industry that utilize phosphates in further processing. Findings will be incorporated into marination programs, educational materials, and outreach so industry entities may implement research based guidance.</p> • Specific Duties <ul style="list-style-type: none"> ○ Interpret food laws and regulations from the Mississippi Department of Agriculture and Commerce (MDAC) and the United States Department of Agriculture (USDA) related to the meat, poultry and catfish industry. ○ Develop an appropriate assessment and analyze data related to water usage and/or internal water treatment in the Mississippi meat, poultry and catfish industry ○ Conduct a pilot study to test the influence of water composition (minerals) on the effectiveness on muscle food marination systems, analyze and interpret data and research findings ○ Analyze pilot study data to meaningful data using statistics ○ Develop summary of findings and compose a research abstract ○ Write a short paper with a literature review, materials and methods, results and discussion and conclusion with appropriate scientific support and citations and/or an extension publication to disseminate to the Mississippi industry stakeholders. ○ Develop and present a research poster based on study findings • Stakeholders and Partners <ul style="list-style-type: none"> ○ State Regulatory Agencies ○ Research and Extension Faculty ○ Extension Agents and County Coordinators ○ Research Associates and Graduate Students
<p>Other Information:</p>	<ul style="list-style-type: none"> • Housing is not provided. However, program administrators may be able to assist you in finding an affordable place to live. • This position is funded by the FY16 USDA NIFA AFRI ELI Research and Extension Experiential Learning for Undergraduates (REEU) Fellowships Program of the National Institute of Food and Agriculture, USDA, Grant #2017-67033-26015.

Apprenticeship Faculty Mentor:	Dr. Courtney Crist Assistant Extension Professor Food Science, Nutrition, and Health Promotion cac400@msstate.edu 662-325-0852 (office)
Apprenticeship Program Director:	Dr. Marina Denny mdd269@msstate.edu 662-325-1175 (office)
Application Process:	Online application and supplemental documentation due by 11:59 PM on February 28, 2018. Supplemental documentation for this apprenticeship opportunity must be e-mailed directly to the Apprenticeship Program Director : <ul style="list-style-type: none">• Unofficial Transcripts• Two Letters of Recommendation