## 1. Calf Management Plan for the University of Wyoming Rodeo Team

Cooperators: McKensie Harris, Beau Clark

**Background information:** The University of Wyoming Rodeo Team buys calves each spring to be used throughout the semester. Rodeo works with Jeff Berry at Producer's Livestock to procure calves that are suitable to use for practice by the college team (Tuesdays and Thursdays) and Laramie High School Rodeo Team (Fridays) each week. These calves are owned, fed, and managed by the UW rodeo team. Ideally, calves are managed in a way that promotes calf growth because calves will be sold when the rodeo team is finished using them. However, these calves are also managed for use at practices, which can impact growth and performance. The objective of this project proposal is to determine best management practices that optimize calf growth and utility.

**Project description:** The student selected for this project will develop and execute a management plan for the rodeo calves. This plan will need to consider the practice needs of the UW and Laramie High School Rodeo teams, reflect ways in which the UW Rodeo Team can benefit financially, and prioritize the welfare, health, and condition of the calves.

**Duties and responsibilities:** The student selected for this project will first spend one week intensively shadowing the UW Rodeo Team and its coaches to gain an understanding of how calves are managed currently. The student will then work with the cooperators to determine the focus of a proposed management plan; there are many directions that can be taken and the cooperators want to ensure the student's interests align with the focus. Once determined, students will complete a comprehensive written work that outlines the management plan and details the expectations of the student and cooperators. The student will work out at the Rodeo facilities to execute the plan. This may include, but is not limited to, cleaning pens, handling calves, feeding calves, assisting with rodeo practices. The student will prepare material (paper, video, podcast, etc.) that explains why the plan was constructed the way it was i.e. what science motivates the plan? Finally, the student will prepare an oral presentation that informs the cooperators and stakeholders of the UW Rodeo program of ways to more efficiently manage calves based on experiences and data generated throughout the semester.

The student will be guided in this experiential learning opportunity, but the cooperators expect the student to take ownership and be extremely involved in the development and execution of the plan.

## 2. Effects of space on steer health, vigor, and performance

Cooperators: McKensie Harris, Beau Clark

**Background information:** Up until the fall 2020 semester, the steers leased by the UW Rodeo Team have been housed in a dry lot confinement setting with a high stocking density. There are new facilities being built to better accommodate rodeo livestock in the future. One of these new facilities is a larger pen with an open trap that is intended to house all future rodeo steers. The rodeo team would like to assess how these new accommodations might positively impact the performance of their roping steers. Any data obtained in such study will be considered when building future rodeo stock facilities.

**Project description:** The student selected for this project will study the relationship between stocking density, animal housing, and animal performance. The student will accomplish this by working with the cooperators to design a study that will allow comparison of two groups of steers each housed in areas with varying stocking densities.

**Duties and responsibilities:** The student selected for this project will first spend one week intensively shadowing the UW Rodeo Team and its coaches to gain an understanding of how steers are managed and used for practices currently. Following this, the student will obtain baseline data. It will be the student's responsibility to determine best ways to assess animal performance using proven industry assessment tools. Assessment of the animals will be completed by the student out at the Rodeo and Laramie Research and Extension Center facilities throughout the semester. Tasks may include, but are not limited to, feeding, observing animal behavior and movement multiple times/day, hauling animals, weighing animals, and assisting with preparation for rodeo practices on the days the steers are used. Finally, the student will prepare an oral presentation that informs the cooperators and stakeholders of the UW Rodeo program about how their project results may benefit future rodeo facility construction.

The student will be guided in this experiential learning opportunity, but the cooperators expect the student to take ownership and be extremely involved in the development and execution of the plan.