

**Contributions of Holly & Jim Akenson
To the success of
Taylor Ranch Field Station**

**Holly Akenson & Jim Akenson
Self Evaluation 2/1/04**

Our level of responsibility at Taylor Ranch Field Station has increased significantly with the concurrent growth of new programs and facility use. We have personally initiated, administered, supervised, and obtained funding for many new projects. These include undergraduate research and educational internships, a graduate research assistantship, a 4-year carnivore research project, seed grants to encourage new faculty involvement, and cooperative endeavors with partners from other universities and agencies. A new focus we have for Taylor Ranch is to participate in regional and national ecological networks of research stations, such as the NSF NEON program, which will provide funding and added value to our unique field station. We nurture personal relationships with Taylor Ranch donors. We have been successful in obtaining \$500,000 of funding for the field station from government sources, partnerships, and private donors. We have moved Taylor Ranch into the technological age with satellite telephone, Internet, and email communication and an on-site hydro electric power system. Data management, archiving, and dissemination have become more important. Field station administrative tasks like budgeting and billing have become more complex. Our workload has increased due to our efforts to develop new programs, a 5-fold increase in facility use, a decrease in temporary help, and an increase in maintenance needs post-fire.

Personal Character & Abilities: We possess an extremely wide array skills and abilities that have contributed to the development of Taylor Ranch Field Station. Our academic backgrounds and professional work experiences in natural resources provided us with the experience to develop research and monitoring programs. We have a welcoming personal style that helps forge lasting relationships with Taylor Ranch visitors, partners, and donors. Our long-term friendship with Janet & Jim Pope was instrumental in the establishment of ties between Taylor Ranch and the DeVlieg Foundation. Since their first contributions to the carnivore project in 1999, the DeVlieg Foundation has provided over \$320,000 for Taylor Ranch facilities, educational programs, and research activities. We have the technical abilities to oversee maintenance and troubleshooting for carpentry and plumbing as well as the computer network and hydro power plant. We are self-motivated to set and accomplish goals for building Taylor Ranch programs and excel with the independent nature of our position. Our role has grown beyond "maintaining a research site" to developing programs for an active research station.

New Research and Educational Programs: We are committed to fostering research and educational opportunities at Taylor Ranch Field Station. We have developed new programs and acquired funding for these projects.

- 4 year large carnivore – ungulate research: We initiated and managed this complex wilderness research project in cooperation with the Hornocker Wildlife Institute, obtained \$180,000 in

external funding, collaborated with Maurice Hornocker and John Seidensticker on long term data sets, and hired UI students.

- Undergraduate Research Program: We designed the DeVlieg Undergraduate Research Internship in 2001 to allow undergraduates an opportunity to create their own funded field research project. This hallmark program has appealed to outstanding young scholars who often use their project for a Senior Thesis. We particularly enjoy mentoring these highly motivated students.
- Taylor Ranch Masters Program: We developed the idea for funding a masters degree assistantship in order to promote graduate research at the field station and foster cooperative relationships with other agencies; we successfully solicited 3 year funding support from the DeVlieg Foundation (\$15,000/year) in 2003 and a \$20,000 annual commitment from IDFG, additional funding is pending.
- Taylor Ranch Bleak Internship: This high profile, popular internship provides hands-on experience for Natural Resources students. It is used as a promotional tool for CNR student recruitment. We have revamped this internship into a skill-based program that gives students experience with vegetation and wildlife field sampling and research techniques that they will use in their careers. We received the UI Cooperative Education Employer of the Year Award in 2001 for our outstanding development and supervision of this internship program.
- Data management: We want to improve the accessibility of research data and reports from Taylor Ranch. Holly participated in a National Science Foundation sponsored Ecological Informatics workshop to learn how to develop relational databases for scientific data management and archiving and develop interactive websites for data dissemination. We received \$10,000 from the DeVlieg Foundation for development of a database management system.
- DeVlieg Foundation Seed Money: 4 \$1,000 grants are being offered for 2-3 day teaching commitments at Taylor Ranch to encourage visiting scientists; \$1,000 travel grants will assist scientists to continue long term monitoring programs at Taylor Ranch. The purpose of the grants is to encourage increased research activity at Taylor Ranch Field Station.

Donor Relations: Taylor Ranch donors are important to the well being and growth of Taylor Ranch Field Station. Donors have been catalysts for development of new programs and they create excitement about the future for Taylor Ranch. We value these donors and are committed to give back to them the pleasure of personally experiencing how their funds benefit students and Taylor Ranch Field Station. Each year we invite our donors and friends of Taylor Ranch (potential donors) to visit and work alongside the student interns. Students send letters and photo albums to their sponsors, and we communicate throughout the year about the activities of "their students" and happenings at Taylor Ranch.

Conflict & Adversity: We have proven our professional ability to cope with conflict and adversity and work through challenges in a positive manner. For example, we dealt with construction coordination and communication problems last year in a non-confrontational manner and wrote a list of actions to salvage efforts to date. We provided written testimony to the Acting Provost and CNR Dean explaining why a proposed scenic easement would be detrimental to the field station and university. We have managed crowded housing conditions and septic system overload at Taylor Ranch since the forest fire. We have maintained open dialog with the Forest Service concerning contentious issues regarding hydropower authorization and water rights. Our actions during the forest fires demonstrated that we function well under extreme adversity. We were

awarded the University of Idaho President's Medallion Award, 2000 for contributions to Idaho for community service and leadership during the wilderness forest fires.

Facility Upgrades: Taylor Ranch Field Station facilities have been significantly upgraded since we became Managers. When we arrived at Taylor Ranch in 1997 solar panels and propane provided lights and power; one computer was available for word processing. Communication was limited to calls over the backcountry radio or weekly mail delivery. Today, a state-of-the-art micro hydro electric power system provides 110 volt electricity to all cabins. We use a satellite telephone and a satellite Internet provider and email for instantaneous communication. Three computers and a printer are connected via a wireless network that provides Internet connections for visitors also. The modernization of Taylor Ranch has led to a major change in how we work and what we do. It has enabled us to coordinate projects, develop new programs, and communicate effectively, but we now spend a considerable amount of time interacting with others over the Internet. Facility management and system maintenance has become more complex with the addition of these technological innovations.

Facility Use: We have cultivated a desirable environment to conduct research and educational activities and we make an effort to facilitate activities, such as supplying students to assist Wayne Minshall and Jim Peek in collecting long term monitoring data. Annual use of Taylor Ranch Field Station in recent years is 5 times greater than use in the mid 1990s.

Administrative complexity: Administrative responsibility has increased in amount and complexity. We now manage 5 budgets (operations, wildlife research, income, cabin construction, and donor funded special projects). We collect fees and have set up a billing system for lodging and satellite telephone use. We supervise development of the Taylor Ranch website and data base management system. We communicate extensively via email. We handle all aspects of supervision from interviewing to training; we have written over 30 letters of recommendation for students and employees.

Cooperative Projects: We believe that more can be accomplished with partners, than alone. So we have worked to establish partnerships and collaborative endeavors. We collaborate with scientists from state and federal agencies and private organizations. Not only do we exchange information and share projects, but also often the goodwill that is generated through partnerships has led to support on other projects, such as the recent commitment by Idaho Department of Fish and Game to provide funding for the bighorn sheep masters project at Taylor Ranch. Idaho State University faculty who conduct research at Taylor Ranch have proposed an ISU/UI collaborative research program at Taylor Ranch. A joint program will benefit all involved, by sharing research expertise and grant writing experience. We will work to make this partnership happen. An upcoming partnership we are planning for, that hasn't even been authorized by congress yet, is the National Science Foundation's National Ecological Observatory Network (NEON). An affiliation with this nationwide consortium of research stations will bring monitoring and research funding, technological equipment, and stature to Taylor Ranch Field Station.

Our primary goals for Taylor Ranch Field Station are to develop valuable research and educational programs and promote sustainable use of the research station by scientists. We have made solid progress toward our goals and have demonstrated that we continue to embrace new ways to achieve these goals.

Taylor Ranch Wilderness Field Station Manager/Scientist **Position Description**

**Based on Job Activities Done by Jim Akenson and Holly Akenson, 1997-2005
February 2, 2005**

The Field Station Manager/Scientist position requires a person with a complex array of professional and technical skills and abilities. The remote location of Taylor Ranch means that the manager/scientist needs to possess trouble-shooting skills and resources to solve problems that would normally be taken care of by hiring outside help and also be willing to do jobs that would normally be done by subordinates, when assistance isn't available. On the other end of the spectrum, the manager/scientist is the top level of field station administration and serves in a lead role in program development, administration, communicating with researchers and educators, and fundraising. The Station Manager/Scientist is responsible for all aspects of running the field station including facility management, program administration, conducting and facilitating research, conducting and facilitating educational activities, grant writing and donor relations, supervision, and collaboration and outreach with public and private entities.

Specific responsibilities include:

Program Development:

- Initiate new programs at TRFS: develop a proposal or syllabus, solicit grants and partnership funding, and conduct successful programs.
- Obtain funding to provide incentives to encourage new activities at TRFS by other researchers or educators. Develop funding for programs that will enhance long term TRFS research objectives: in graduate student education and interdisciplinary research.
- Develop collaborative programs with UI faculty, other universities, and agencies for interdisciplinary research and educational activities at TRFS.
- Upgrade station data management system and website and attend NSF sponsored ecological informatics course and regional network organizational meeting in order to position the field station for participation in the upcoming NSF funded National Ecological Observatory Network.

Program Administration:

- Communication: Communicate extensively by email to potential visitors, researchers, educators, students, donors, and serve as the primary contact for field station inquiries. Develop and maintain TRFS website and use it to market programs to students and scientists, and provide information to the public. Plan and schedule facility use. Update and enforce station policies.
- Budgets: monitor 5 or more budgets simultaneously, including operations, income, research project, construction, student projects, special programs, and individual grants and contracts. Budget responsibilities include identifying and reporting

appropriate budget for each TRFS purchases, developing project budgets, and maintaining fiscal responsibility for budgets.

- Billing & Procurement: Bill for lodging, collect and process lodging fees, record keeping. Categorize monthly satellite phone bill; assign charges to users, bill users. Maintain a UI Visa card and follow UI purchase card procedures. Make purchases, document and turn in receipts, and set up accounts at retailers.
- Coordinate TRFS Advisory Committee meetings, write annual reports, develop annual work plans and objectives.
- Represent TRFS and make presentations on the field station at regional and national meetings, other universities, and agencies. Obtain permits for the field station from regulatory agencies.

Fundraising:

- Develop long term relationships with private donors to enhance funding opportunities for TRFS programs including frequent correspondence; host donors and encourage their participating in field station research and educational activities; attend foundation board meetings, present funding requests to foundation board, report and make presentations to the board on projects funded by the foundation, express gratitude to donors for their contributions to TRFS programs and participants.
- Seek out funding opportunities through state and federal grant programs and create partnerships to obtain funds to develop or enhance TRFS programs.

Research:

- Conduct research in area of specialization. Research activities include develop study design and proposal, apply for grants and obtain external funding, supervise technicians and students, provide work opportunities for UI students and graduates, collaborate with other agencies, statistically analyze data, write research reports and publications, make presentations at regional, national, and international scientific meetings.
- Facilitate research collaborations among universities and agencies through meeting participation and organization, presentations, and hosting visits at TRFS.
- Initiate and conduct long term monitoring programs. Maintain monitoring databases. Assist or supervise students collecting monitoring data for other researchers.
- Develop undergraduate research program: design an independent research program for students, solicit grants, advise students on research study design, evaluate applicants and select award recipients, mentor and supervise students in the field, and coordinate with student and faculty advisor on student's written report.

Education:

- Participate in long term planning for education program and research program development at TRFS.
- Solicit grants to support field courses and workshops at the field station. Develop course syllabus, teach ecological concepts and field techniques to undergraduate students, and integrate other professionals into courses. Coordinate and conduct workshops.

- Work with university partners to plan a multidisciplinary multi-instructor field course.
- Give presentations on research finding, ecological relationships, local history or TRFS to field courses, university courses, high school students, and agencies.

Facility Management:

- Assess and prioritize long and short term maintenance needs Write annual facilities work plan. Develop a TRFS maintenance manual and schedule of maintenance activities.
- Hire and supervise temporary maintenance workers, schedule and oversee construction contractors, coordinate with regulatory agencies and obtain building permits.
- Possess trouble-shooting skills to maintain utilities including micro-hydroelectric plant, solar power system, domestic water and sewage system, satellite telephone. Possess abilities and repair skills in carpentry and construction, small engines, electrical wiring, plumbing, propane appliances, and use of mules in harness for airstrip maintenance and heavy hauling.
- Maintain hardware and software upgrades for a wireless computer network consisting of 3 laptop computers, a satellite Internet connection, remote printer, and 2 wireless routers.

Supervision:

- Supervise 1-8 temporary employees and student workers, as well as volunteers for maintenance, research, and operations. Supervisory responsibilities include writing job descriptions, interview, hire, develop work plans, supervise, quality assurance, sign time sheets, take disciplinary action, evaluate performance, and provide job recommendations by phone or in writing.