Sustainable Technology Internship

The Hurricane Island Center for Science and Leadership is a learning community on Hurricane Island, in Penobscot Bay, Maine, offering experiential, hands-on education programs and research opportunities focusing on marine sciences, STEAM education, sustainable living technology, citizen science initiatives, and leadership.

Hurricane Island facilities operate completely off the grid, with no potential connection to mainland power sources. We have installed several photovoltaic arrays that serve both small and isolated systems, as well as a 6KW array that supplies power to our primary buildings. Our drinking water is pumped by a solar pump and is filtered and treated through components powered by a stand-alone array. Our toilet facilities utilize composting systems that reduce our dependence on water and result in a beneficial byproduct of human waste. All grey water produced in our shower house and our kitchen is filtered through a state-approved constructed wetland. The hot water in our shower house is produced from solar thermal evacuated tubes. We have an extensive composting system for all food waste produced in the kitchen. We have developed several garden systems (including straw bale gardening) and we are continually seeking to expand our on-island food production.

We encourage program participants to think critically about how their behaviors can impact the environment, and how to be better stewards of the natural world. We are working to create a campus environment on Hurricane that is a living laboratory which incorporates both low tech and advanced system design that participants can actively learn from through common daily interactions. We have been very deliberate about our facilities infrastructure design and have created systems and functionality that seeks to teach and encourage participants in our programs to change their behaviors and recognize to become a more conscious of their use of resources in their own lives.

We are looking for an intern who is enthusiastic about being involved in sustainable system operation and implementation and who is excited about educating participants (youth and adult) about our infrastructure and sustainable technology. The Sustainable Technology Intern will work alongside staff to monitor, maintain, operate, and continue to develop the infrastructure and sustainable technology systems on Hurricane Island.

2015 Sustainable Technology Goals

- Develop an Island Systems Map with technical system descriptions and data collection points;
- Install data monitoring systems (e.g. data loggers) to be able to better monitor our energy and water production and consumption;
- Install small-scale photovoltaic systems in residential cabins;
- Expansion of food systems production through greenhouse construction, composting systems and additional gardens.

Expectations of the Sustainable Technology Intern
• Assist with waste management - trash, recycling, and compost;
• Assist our Water System Operator with daily monitoring of our fresh water system (pumps, filtration, and treatment);
• Monitor and analyze daily use and production of power through the various photovoltaic arrays;
• Monitor and maintain proper biological decomposition of the various composting toilet systems;
• Monitor solar thermal (hot water) systems to help collect data;
• Carpentry, plumbing, electrical skills are beneficial; and,
• Develop curriculum and teach about sustainable technology and systems on Hurricane and surrounding islands.

Eligibility & Qualifications

• Interest in developing curriculum and communicating sustainable technology and practices to students during summer programs. Teaching experience is not required, but the applicant should be interested in participating in portions of our programs.
• Ability and willingness to work and live in a remote, island community with rustic and off-the-grid accommodations where all staff share living and work spaces;
• Essential qualities include hard working, strong communication skills, and the ability to work as a positive group member;
• Willingness to work evenings and weekends as needed;
• Certified in basic CPR/ First Aid; Wilderness First Aid or Wilderness First Responder (WFR) certification is preferred;
• Minimum of 2 years completed towards an undergraduate or graduate degree program;
• Holds a valid driver’s license with good driving record (a vehicle is not required, but is helpful during off-island errands and exploration);
• Proficiency with Microsoft Word and Excel is essential; knowledge of GIS and CAD software is beneficial;
• U.S. Citizen or non-citizen permanent resident; and
• United States Coast Guard Captain’s license or other boating certifications are beneficial.

The Hurricane Island Foundation is dedicated to a policy of nondiscrimination in employment on any basis including race, creed, color, age, sex, religion, or national origin. Because we work with middle and high school students, we are required to do background checks on all seasonal and full-time staff.

Compensation

Each intern will receive room and board while on Hurricane Island for duration of the internship (June 15 to August 23, 2015). Interns will also receive a stipend. We are happy to help make this internship fulfill graduation requirements. If this is of interest to the qualifying candidate, please make HIF staff aware of steps needed to make receipt of credits possible.
Application Materials

Applications are due by February 16, 2015.

- Cover letter explaining your interest in this position and your relevant experience;
- Resumé or CV, which includes contact information for three references. We want a complete picture of you so don’t be afraid to include details that may not pertain directly to this job;
- A letter of recommendation from a professor who can speak to your strengths, abilities, and opportunities for personal and professional growth; and,
- A college transcript (unofficial is acceptable).
- A writing sample between 250-500 words. We would like to get a sense of your writing style, as we will expect that you regularly contribute program updates through our blogs.

Application Submission:

To submit an application electronically via email, please send to: jobs@hurricaneisland.net

Or send a hard copy to:
Hurricane Island Center for Science and Leadership, P.O. Box 1280, Rockland, ME 04841

If we feel from your application that you are a candidate for this position, we will contact you to schedule an interview.