Rose-Hulman Robotics Team

Rose-Hulman Institute of Technology, Terre Haute IN, USA Distance to International Event: 2500 miles

About the Team:

The Robotics Team at the Rose-Hulman Institute of Technology is a student-led extracurricular group dedicated to exploring a diverse array of robotics applications. Other projects include autonomous rovers and networked quadcopters. 2014-2015 is the fourth year we have built a remotely-operated underwater vehicle. We are grateful to Rockwell-Collins for continued sponsorship and support.

Team Members:



Peter Heath Junior Mechanical Engineering Company President



Joe Schornak Junior Mechanical Engineering **ROV Project Manager**



Senior Mechanical Engineering Software Engineering Mechanical Engineering Mechanical Engineering



Nathan Blank Sophomore



Carolyn Holthouse Sophomore



Aaron Jones Sophomore



Sam Lawrence Sophomore Computer Engineering



Sabeeh Khan Freshman Computer Engineering



Lecea Sun Freshman Mechanical Engineering



Betsy Tainer Freshman Mechanical Engineering



Colton Watson Freshman Biomedical Engineering

ROV: Ægir

Namesake: A Norse giant associated with wild oceanic festivity.

Approximate Total Cost: \$7000

Dimensions: 80cm L x 52cm W x 35cm H

Approximate Mass: 20kg

Structure: Aluminum, Stainless Steel

Flotation: Polystyrene

Safety Features:

30A master breaker Durable waterproof tether **Ducted thrusters** Minimal sharp edges Dedicated lifting handles

Other Features:

Infrared illumination

2-axis servo-driven camera gimbal Networked underwater cameras Pneumatic parallel-jaw gripper Vectored thrust for 4-DOF motion Inertial navigation system Hot stab mounting hardpoint Passive algae collector

