

October 31, 2014

**To:** Dr. T. Gregory Guzik - HASP Project Director  
**From:** Seth Frick – Team Lead  
**RE:** HASP Monthly Status Report

### **1. Activities**

Continued analyzing flight data from the GPS, IMU, and detector systems.

Prepared the camera experiment and GPS to be re-flown locally on a small sounding balloon. The camera experiment was not in the payload during the HASP flight as we encountered last minute hardware issues, and the GPS flew on the HASP flight, but did not perform well. The flight is scheduled for November 2.

Began developing a plan for the 2015 payload proposal, including experiment and design changes, a crossover with a group from the aerospace engineering Senior Design class, and collaboration with a small local company (Aster Labs) and the Johns Hopkins University Applied Physics Laboratory.

Began developing new team structure, recruitment methods, and internal development schedule to accommodate students who will be graduating in the middle of the 2015 project cycle.

### **2. Issues Encountered**

None.

### **3. Milestones Achieved**

None—flight data processing still in progress.

#### 4. Current Student Team

Name	Gender	Ethnicity	Race	Student Status	Responsibilities
Seth Frick	M	Non-hispanic	Caucasian	Graduate 2 <sup>nd</sup> year	Team lead, detector systems and photon energy measurement, GPS and IMU operation
Andrew Mahon	M	Non-hispanic	Caucasian	Undergraduate Senior	Detector systems, hardware configuration, and structure fabrication
Haley Rorvick	F	Non-hispanic	Caucasian	Undergraduate Senior	Structure design and fabrication, hardware configuration
Josiah DeLange	M	Non-hispanic	Caucasian	Undergraduate Senior	Flight computer and power systems, flight software
Alec Forsman	M	Non-hispanic	Caucasian	Undergraduate Senior	Flight computer and power systems, flight software
Seth Merrifield	M	Non-hispanic	Caucasian	Undergraduate Senior	Thermal monitoring and protection.
John Jackson	M	Non-hispanic	Caucasian	Undergraduate Senior	Detector energy measurement and testing
Guy Squillace	M	Non-hispanic	Caucasian	Graduate – 1 <sup>st</sup> year	New team member