HASP 2014

UND-UNF Payload

Monthly Status Report for May 2014

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Students:

Team is waiting for addition of one or two students from UND.

UND-UNF team did the following work during May 2014:

(1) The fabrication and testing of another series of ITO and ZnO+ITO thin films sensors for detection of ozone and WO3+ITO thin films for detection of reducing gases are going on. Sensors were tested with the ozone gas generator. Sensors were calibrated with different concentration of ozone gas. New series of sensors will be tested and calibrated in the next month. Brittany is working on further testing of sensors.

(2) We are modifying alpha phase of silver tungstate (Ag_2WO_4) to enhance the response of sensors with ozone.

(3) The fabrication of sensors boxes and payload were completed. We are using the same design as the last year.

(4) The microcontroller card was tested and found working in good conditions. The microcontroller card was interfaced with the sensors and found satisfactory working.

(5) Ken has developed the program for testing the HASP payload. He developed different style of screens for monitoring data directly from the LSU website server. This will save time to download the files and then apply software program to put data in EXCEL and then make plots. This will help us monitoring data easily during the thermal vacuum test as well as during the flight. One of screen picture is shown in fig.1.

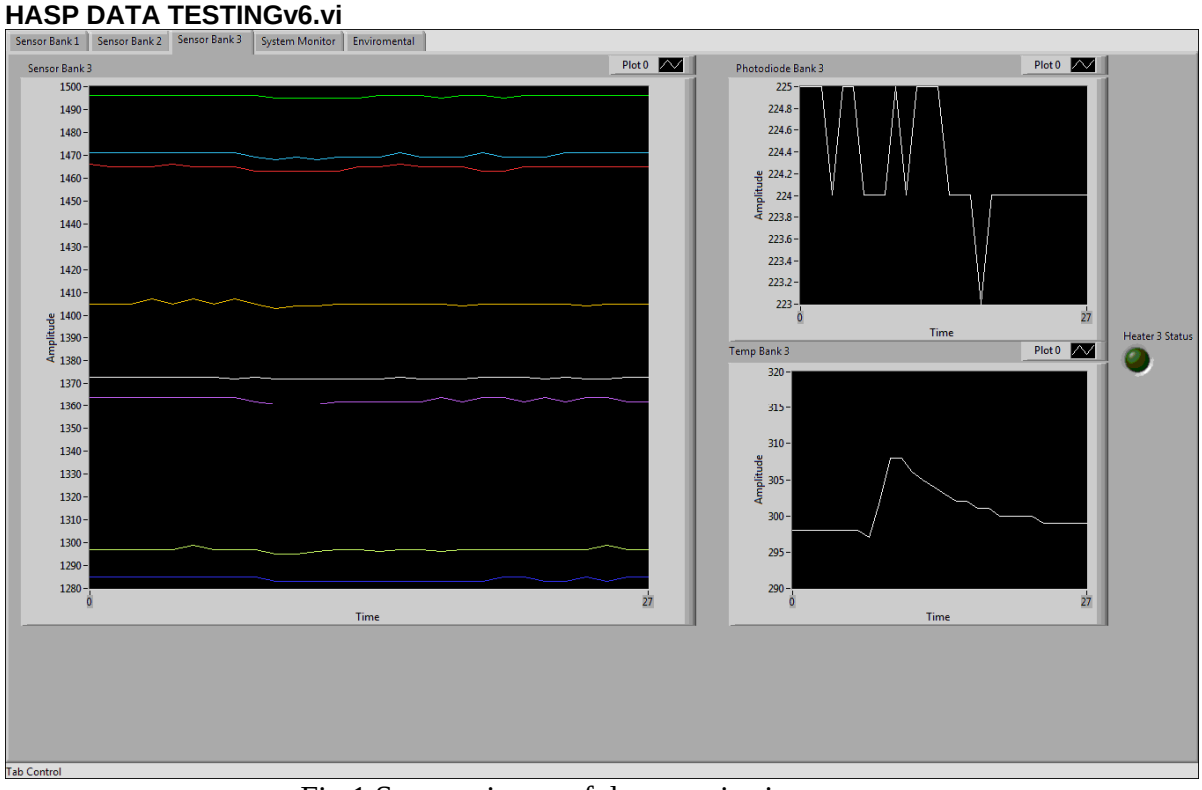

Fig.1 Screen picture of data monitoring.