KySat History, Status, Direction

CubeSat @ SmallSat, Logan UT 13 August 2006
KySat History

- Kentucky Science and Technology Corporation
  - Science and Technology Education
  - Research and Development
  - Technology Innovation
  - Workforce & Economic Development

- KSTC Branch Office
  - NASA Ames Research Center
  - Bob Twiggs
  - Stanford KatySat

- KySat Consortium Formed
  - Public Organizations
  - Private Companies
  - Five Kentucky Universities
KySat Status & Direction

- Technology Team “Retreat”
  - Seven Students, Five Universities, Ten Weeks
  - KSTC Branch Office at NASA Ames
  - Stanford Class Interaction

- Status
  - Full Bill of Materials
  - Mechanical Designs Complete
  - Software Systems Specified

- Direction
  - Engineering Model by December
  - KySat2 New Students in January
  - Software Locked/Flight Model by March
  - Ship to Launch Integrator by July
KySat Technology Team

- **Alaa Aly**
  - University of Louisville
  - Software Systems

- **Jennifer Carter**
  - Morehead State University
  - Ground Operations

- **Garrett Chandler**
  - University of Kentucky
  - Systems Design

- **Daniel Erb**
  - Murray State University
  - Support Systems

- **Bill Hutchison**
  - University of Louisville
  - Mechanical Systems

- **Dale McClure**
  - University of Kentucky
  - RF Systems

- **Greg Strickler**
  - Western Kentucky University
  - Software Systems
KySat1 Mission

- Lay Foundation for Advanced KySat Missions
  - Reliable Satellite Platform
  - High-Bandwidth Ground Station
  - Terrestrial Data Distribution Methodology
  - Draw Positive Attention to KySat Enterprise

- Science and Engineering Education on Orbit
  - K-12 Target Audience
  - Interest Children in Science and Education
Standout Deltas

- HAM APRS Compatible
- 21-Meter S-Band Dish
- S-Band Radio as Payload
- Audio Telemetry
- Rapid Design & Build
- Educational Focus
More Info:  
http://www.engr.uky.edu/idea/go/?10

Garrett Chandler  
gchandler@uky.edu