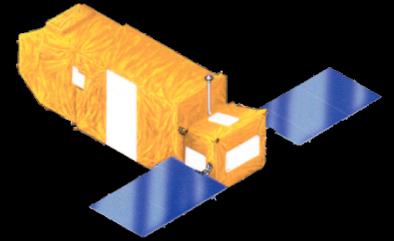


FUSE

JOHNS
HOPKINS
UNIVERSITY



The Future of FUSE: Strategies and Tradeoffs

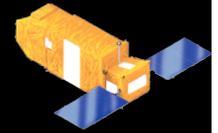
Bill Blair

FUSE Deputy PI

Chief of Observatory Operations

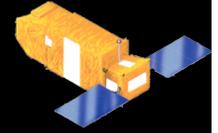
FOAC Meeting-November 2, 2004
Paris, France

Fiscal Realities:



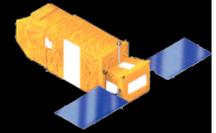
FY 2005 and 2006

- This timeframe was supported by SR04 at nearly the expected (prior) levels. (-\$100K/yr)
- But continued Project Downsizing was already built into that budget.
 - One person terminated at end of Aug. 2004.
 - Need to decrease by two at end of FY05 (by Oct. 1, 2005: note this is half way through Cy. 6!)
 - International partner support uncertain/decreasing with time.
 - Real loss of operations FTEs without any cost savings to project.
- Control center staffing to remain at 7.
- No ongoing OSC engineering support beyond 12/04.



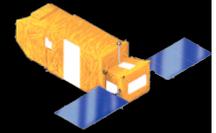
Downsizing Strategy

- Maintain all critical observing capabilities and accept lower performance and/or greater latency in other parts of the project.
 - Retention of key personnel.
 - Cross training where feasible. (Protect against attrition.)
 - Reassess manpower needs vs. time.
 - E.g., CalFUSE development winding down --> decrease FTEs.
 - Expect scientific staff to (on average) offset 1-2 months of salary with grants.
 - Helps maintain corporate memory.
 - But note loss of those partial FTEs from operations capability!
- Total ops FTEs: Spring 2004: 27 Fall 2004: 25.5
Oct. 2005: ~23 Oct. 2006: ~21



Potential Cy6 Impacts

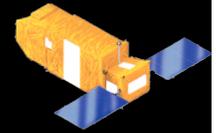
- Current plan: absorb FY05 personnel losses in user support and calibration/operations support areas.
 - Have MP and other SciOps staff “fill the gaps” in User Support.
 - Drop/limit FUSE AAS meeting presence.
 - Less frequent calibrations (and/or larger latency in implementing new calibrations).
- How far can/should this downsizing model be pushed?



Other Potential Impact Areas

- Fewer special operations (Coordinated, constrained, ToO, difficult to schedule, manual operations.)
 - Means some “accepted” targets/programs may not be executed or will be greatly delayed.
- Less frequent/more standardized channel alignments.
 - Impacts overall data quality, science return.
- Eliminate data assessment prior to archiving data.
 - Some bad data sets will be archived; problems will need to be identified by users.
 - Much longer latency in problem ID and reobservation requests.
- Eliminate weekly program accounting reports.
 - Also used to find/track problems and request reobservations.
 - George uses for proposal funding strategies.
- Greatly simplify Technical Review process for proposals.
 - May require a “conditional” acceptance of observations.
- Accept larger latency in processing/archiving of new data sets.

Fiscal Realities: FY 2007-2008



- SR04 funding levels drop considerably from FY06 level.
- Current budget exercises indicate we can make it through FY08 (i.e., end of Sept. 2008) under these assumptions:
 - No significant problems with S/C or UPRM.
 - Reduce ops staff by 4 FTE-years (e.g., drop two add'l FTEs for FY07-08).
 - Decrease in admin/mgmt staffing levels.
 - Many more of the impacts on previous page will need to be adopted.
 - Possibly more draconian measures will be needed, starting Cy7:
 - Decrease fraction (and amount) of Standard/Legacy time accepted.
 - Strongly encourage long, plain vanilla observations.
 - Further restrict any special operations, difficult targets.
- We can go to SR06 and ask for additional funding, but...
 - Timing is awkward. (We would already have to be prepared to downsize-- just a few months before FY2007.)
 - Uncertainty as to whether relief will be forthcoming. (Can't plan on it.)

