

Advanced Satellite Aviation-weather Products (ASAP)

PROGRAM/PROJECT: Aviation Safety Program/Weather Accident Prevention Project

LEAD AGENCY/COLLABORATING AGENCIES: National Aeronautics and Space Administration (NASA), Federal Aviation Administration (FAA), and National Weather Service (NWS)

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SERVICE AREA(S)/INITIATIVE (S)

- *National Aviation Weather Initiatives:*

2: 9 3: 6 5: 11 7: 12 8: 7

FUNDING

- *Programmed/Planned (\$'s/FY):* \$1700K /FY03 \$1700K/FY04

Note: R&D is jointly funded by the Aviation Safety Program and NASA's Earth Science Applications Division.

TYPE OF PROGRAM/APPLICATION

R&D/Product Development

SCOPE OF PROGRAM/PROJECT

- *What's being developed, procured, etc:* Technologies to use current and next-generation satellite data to improve aviation weather products. Technology will be used in the FAA Aviation Weather Research Program for product development. Feasible products include convection, turbulence, icing, volcanic ash, and winds.
- *How will operations be changed/improved:* Better aviation forecasts and weather hazard information will lead to improved safety and efficiency within the National Airspace System.

PROGRAM/PROJECT MANAGEMENT

- *Basic guidance document for this program:* AWIN Level III Plan.
- *Program/Project verification process:* Weather Accident Prevention Project Reviews, NRC Review, Industry Review, FAA AWRP reviews and Aviation Weather Technology Transfer (AWTT) process.
- *Method used for product validation:* AWTT process.
- *Operational training for the user:* TBD

SCHEDULE/IMPLEMENTATION

- *Next major program milestone:* Collect data sets during Atlantic THORP Experiment in fall 2003.
- *Program becomes operational:* NASA will rely on FAA and NWS to implement technologies in new weather products.
- *Plans for further improvements:* Initial effort focusing on use of existing satellite data; future work will prepare for use of data from next-generation high-resolution satellite sounders.