

## **Exhibit 300: Capital Asset Plan and Business Case Summary**

### **Part I: Summary Information And Justification (All Capital Assets)**

#### **Section A: Overview (All Capital Assets)**

1. Date of Submission: 9/11/2007
2. Agency: Department of Transportation
3. Bureau: Federal Aviation Administration
4. Name of this Capital Asset: FAAXX248: Airport Surface Detection Equipment - Model X (ASDE-X)
5. Unique Project (Investment) Identifier: (For IT investment only, see section 53. For all other, use agency ID system.) 021-12-01-20-01-1040-00
6. What kind of investment will this be in FY2009? (Please NOTE: Investments moving to O&M in FY2009, with Planning/Acquisition activities prior to FY2009 should not select O&M. These investments should indicate their current status.) Mixed Life Cycle
7. What was the first budget year this investment was submitted to OMB? FY2001 or earlier
8. Provide a brief summary and justification for this investment, including a brief description of how this closes in part or in whole an identified agency performance gap:

ASDE-X is a surface surveillance system that provides multi-sensor airport surveillance with identification and conflict alerting to air traffic controllers. It was developed to aid in preventing surface collisions and reducing the most severe runway incursions. ASDE-X provides a visual representation of the traffic situation on the airport movement area and arrival corridors. It improves the ability of controllers to maintain awareness of the operational environment and to anticipate contingencies.

ASDE-X supports the FAA strategic goals for Increased Safety and Greater Capacity which aligns with DOT's goals of increased Safety and Mobility. It reduces the risk of runway incursions by providing: data tags for all transponder equipped vehicles, enhanced safety performance by supporting target projections and intersecting runway alerts, more accurate positions with flight call signs and aircraft intentions on the controller's display, and improved surface surveillance during rain. With data tags, ASDE-X provides the ability to: monitor whether aircraft are following their prescribed taxi routes, validate the proper beacon code is associated with each aircraft, and accurately identify each aircraft within a queue. This prevents unnecessary communication and reduces time spent between clearance deliveries.

ASDE-X was added to the Operational Evolution Plan (OEP) version 8 in April 2006. OEP is the FAA's commitment to the aviation community for building capacity and increasing efficiency at the 35 OEP airports.

ASDE-X addresses the runway safety performance gap. During FY2001-2004, there were approximately 257 million aircraft operations and 1,395 runway incursions; an average of one runway incursion per day. Historical data indicated that if no intervening actions were taken 15 fatal runway collisions at towered airports would occur over the years 2003-2022 killing 700-800 people and seriously injuring 200 others.

ASDE-X is in the Solution Implementation and In-Service phases of the FAA Acquisition Management System, equivalent to the Control and Evaluation phases of the OMB CPIC Cycle. As of September 2007, there are 10 operational systems. In FY08 and FY09 an additional 13 systems will be delivered and 8 systems will become operational. A total of 35 operational systems are planned.

In FY05, a Joint Resources Council rebaseline was requested and was based on a ROI (Return on Investment) calculation which was approved on September 5, 2005.
9. Did the Agency's Executive/Investment Committee approve this request? Yes
  - a. If "yes," what was the date of this approval? 9/5/2005
10. Did the Project Manager review this Exhibit? Yes
11. Contact information of Project Manager?

Name	Shema, Steve
Phone Number	Redacted
Email	steve.shema@faa.gov
- a. What is the current FAC-P/PM certification level of the project/program manager? TBD
12. Has the agency developed and/or promoted cost effective, energy-efficient and environmentally sustainable techniques or practices for this project? Yes
  - a. Will this investment include electronic assets (including computers)? Yes

b. Is this investment for new construction or major retrofit of a Federal building or facility? (answer applicable to non-IT assets only) No

1. If "yes," is an ESPC or UESC being used to help fund this investment?

2. If "yes," will this investment meet sustainable design principles?

3. If "yes," is it designed to be 30% more energy efficient than relevant code?

13. Does this investment directly support one of the PMA initiatives? No

If "yes," check all that apply:

a. Briefly and specifically describe for each selected how this asset directly supports the identified initiative(s)? (e.g. If E-Gov is selected, is it an approved shared service provider or the managing partner?)

14. Does this investment support a program assessed using the Program Assessment Rating Tool (PART)? (For more information about the PART, visit [www.whitehouse.gov/omb/part](http://www.whitehouse.gov/omb/part).) No

a. If "yes," does this investment address a weakness found during a PART review? Yes

b. If "yes," what is the name of the PARTed program? FAA Air Traffic Services

c. If "yes," what rating did the PART receive? Adequate

15. Is this investment for information technology? Yes

If the answer to Question 15 is "Yes," complete questions 16-23 below. If the answer is "No," do not answer questions 16-23.

For information technology investments only:

16. What is the level of the IT Project? (per CIO Council PM Guidance) Level 2

17. What project management qualifications does the Project Manager have? (per CIO Council PM Guidance) (1) Project manager has been validated as qualified for this investment

18. Is this investment or any project(s) within this investment identified as "high risk" on the Q4 - FY 2007 agency high risk report (per OMB Memorandum M-05-23) No

19. Is this a financial management system? No

a. If "yes," does this investment address a FFIA compliance area?

1. If "yes," which compliance area:

2. If "no," what does it address?

b. If "yes," please identify the system name(s) and system acronym(s) as reported in the most recent financial systems inventory update required by Circular A-11 section 52

20. What is the percentage breakout for the total FY2009 funding request for the following? (This should total 100%)

Hardware	0.000000
Software	1.000000
Services	99.000000
Other	0.000000

21. If this project produces information dissemination products for the public, are these products published to the Internet in conformance with OMB Memorandum 05-04 and included in your agency inventory, schedules and priorities? Yes

22. Contact information of individual responsible for privacy related questions:

Name	Mauney, Carla
Phone Number	Redacted
Title	Privacy Officer
E-mail	<a href="mailto:carla.mauney@faa.gov">carla.mauney@faa.gov</a>

23. Are the records produced by this investment appropriately scheduled with the National Archives and Records Administration's approval? No

Question 24 must be answered by all Investments:

24. Does this investment directly support one of the GAO High Risk Areas? Yes

**Section B: Summary of Spending (All Capital Assets)**

1. Provide the total estimated life-cycle cost for this investment by completing the following table. All amounts represent budget authority in millions, and are rounded to three decimal places. Federal personnel costs should be included only in the row designated "Government FTE Cost," and should be excluded from the amounts shown for "Planning," "Full Acquisition," and "Operation/Maintenance." The "TOTAL" estimated annual cost of the investment is the sum of costs for "Planning," "Full Acquisition," and "Operation/Maintenance." For Federal buildings and facilities, life-cycle costs should include long term energy, environmental, decommissioning, and/or restoration costs. The costs associated with the entire life-cycle of the investment should be included in this report.

Table 1: SUMMARY OF SPENDING FOR PROJECT PHASES (REPORTED IN MILLIONS)									
(Estimates for BY+1 and beyond are for planning purposes only and do not represent budget decisions)									
	PY-1 and earlier	PY 2007	CY 2008	BY 2009	BY+1 2010	BY+2 2011	BY+3 2012	BY+4 and beyond	Total
Planning:	0	0	0	0	Redacted	Redacted	Redacted	Redacted	Redacted
Acquisition:	319.892	70.6	40.6	32.4	Redacted	Redacted	Redacted	Redacted	Redacted
Subtotal Planning & Acquisition:	319.892	70.6	40.6	32.4	Redacted	Redacted	Redacted	Redacted	Redacted
Operations & Maintenance:	6.9	2.4	3.81	4.94	Redacted	Redacted	Redacted	Redacted	Redacted
TOTAL:	326.792	73.0	44.41	37.34	Redacted	Redacted	Redacted	Redacted	Redacted
<b>Government FTE Costs should not be included in the amounts provided above.</b>									
Government FTE Costs	8.685	1.89	1.932	1.976	Redacted	Redacted	Redacted	Redacted	Redacted
Number of FTE represented by Costs:	76	14	14	14	Redacted	Redacted	Redacted	Redacted	Redacted

Note: For the multi-agency investments, this table should include all funding (both managing partner and partner agencies). Government FTE Costs should not be included as part of the TOTAL represented.

2. Will this project require the agency to hire additional FTE's? No

a. If "yes," How many and in what year?

3. If the summary of spending has changed from the FY2008 President's budget request, briefly explain those changes:  
Redacted

**Section C: Acquisition/Contract Strategy (All Capital Assets)**

1. Complete the table for all (including all non-Federal) contracts and/or task orders currently in place or planned for this investment. Total Value should include all option years for each contract. Contracts and/or task orders completed do not need to be included.



2. If earned value is not required or will not be a contract requirement for any of the contracts or task orders above, explain why:

The Program Office has implemented an EVMS-like reporting mechanism at the program level using existing contractor Cost Performance Reports. In July 2005, the ASDE-X program initiated an independent review of its program management system practices and Earned Value Management (EVM) capabilities. The review assessed the program's current EVM implementation using FAA approved compliance criteria aligned with the ANSI/EIA 748A Standard. As a result of this review the EVM Council recommended a mid-program approach to implement EVM on the program without imposing EVM on the contractors. EVM was not included on any of the contracts because the prime contract included a Cost and Schedule Status Report (C/SSR) requirement to interpret and validate cost and schedule trends of contract performance, before EVM became a standard requirement. Implementing EVM retroactively and renegotiating contracts during program performance is difficult and costly. The amount of effort was unknown at the time the contract was completed and T&M Contract Line Items (CLINs) were the only feasible option. Risk is mitigated through review of contractor invoices by the ASDE-X Program Office and Contracting Officer. The intent of using a mid program approach is to provide useful EVM performance data to program management in the near term without significant cost to the investment. This approach was recommended since the program's development is complete and the remaining effort is mostly deployment with a consistent site deployment schedule template. The transition plan and concept paper was specific in detail to help the ASDE-X PM effectively implement an EVM process that will enable the program to establish EVM practices that improve their program management capabilities in compliance with the FAA AMS and ANSI/EIA 748A Standard. In FY06, the ASDE-X program began implementing the EVM POA&M by executing recommendations from the plan to increase visibility and exercise greater control over program cost, schedule and technical performance. The current approach of implementing an EVMS within the ASDE-X program is acceptable per the EVM Council. Currently, the program has received green scores in Organizing & Change Management and is on track to be EVM compliant by December 2007. After the program completes the EVM implementation, the EVM Council will validate the ASDE-X EVMS capability and assess whether it is in compliance with the ANSI/EIA 748 Standard.

3. Do the contracts ensure Section 508 compliance? No

a. Explain why:

The sole end-users of the systems are air traffic controllers working in a restricted and secure area of an air traffic facility. The controllers must meet strict medical qualifications under U.S. Office of Personnel Management Qualification Standards, GS-2152, Air Traffic Control Series, as stated in FAA Order 3930.3A, Air Traffic Control Specialist Health Program. The GS-2152 personnel standards require controllers to meet strict qualifications with regard to hearing and vision.

4. Is there an acquisition plan which has been approved in accordance with agency requirements? Yes

a. If "yes," what is the date? 9/2/2005

b. If "no," will an acquisition plan be developed?

1. If "no," briefly explain why:

**Section D: Performance Information (All Capital Assets)**

In order to successfully address this area of the exhibit 300, performance goals must be provided for the agency and be linked to the annual performance plan. The investment must discuss the agency's mission and strategic goals, and performance measures (indicators) must be provided. These goals need to map to the gap in the agency's strategic goals and objectives this investment is designed to fill. They are the internal and external performance benefits this investment is expected to deliver to the agency (e.g., improve efficiency by 60 percent, increase citizen participation by 300 percent a year to achieve an overall citizen participation rate of 75 percent by FY 2xxx, etc.). The goals must be clearly measurable investment outcomes, and if applicable, investment outputs. They do not include the completion date of the module, milestones, or investment, or general goals, such as, significant, better, improved that do not have a quantitative or qualitative measure.

Agencies must use the following table to report performance goals and measures for the major investment and use the Federal Enterprise Architecture (FEA) Performance Reference Model (PRM). Map all Measurement Indicators to the corresponding "Measurement Area" and "Measurement Grouping" identified in the PRM. There should be at least one Measurement Indicator for each of the four different Measurement Areas (for each fiscal year). The PRM is available at [www.egov.gov](http://www.egov.gov). The table can be extended to include performance measures for years beyond FY 2009.

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
2005	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2005	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$2.0M comprised of \$0.7M in aircraft direct operating costs and \$1.3M in passenger value of time.	\$2,149M of cost savings comprised of \$763M in aircraft direct operating costs and \$1,387 in passenger value of time
2005	Safety	Mission and Business Results	Transportation	Air Transportation	Number of Category A&B Runway	Projected to be 3.9 at the 10 ASDE-X airports;	Reduce to 3.3 at the 10 ASDE-X airports; 6.2 at	2 Category A&B Runway Incursions at the

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
					Incursions per year for technology deployed in 2005	6.2 at the 25 ASDE-3X airports.	the 25 ASDE-3X airports.	10 ASDE-X airports; 7 Category A&B Runway Incursions at the 25 ASDE-3X airports.
2005	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2005	Weighted average is 6.04 minutes per departure for 10 ASDE-X and 25 ASDE-3X airports based on FY04 data	Reduce weighted average Taxi-Out delay by 0.30 seconds per departure for 10 ASDE-X and 25 ASDE-3X airports.	Weighted average is 5.66 Minutes per departure for 10 ASDE-X and 25 ASDE-3X airports based on FY05 data
2005	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2005	Projected to be 4.4 at the 10 ASDE-X airports; 10.9 at the 25 ASDE-3X airports	Reduce to 3.8 at the 10 ASDE-X airports; 10.9 at the 25 ASDE-3X airports.	9 surface deviations caused by operational errors at the 10 ASDE-X airports; 6 at the 25 ASDE-3X airports
2005	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	15.87 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	70.08 unscheduled outage hours per system per year for deployed ASDE systems
2006	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2006	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$14.7M comprised of \$4.9M in aircraft direct operating costs and \$9.8M in passenger value of time	\$2,149M total cost comprised of \$763M in aircraft direct operating costs and \$1,387M in passenger value of time
2006	Safety	Mission and Business Results	Transportation	Air Transportation	Number of Category A&B Runway Incursions per year for technology deployed in 2006	Projected to be 3.9 at the 10 ASDE-X airports; 6.0 at the 25 ASDE-3X airports	Reduce to 2.8 at the 10 ASDE-X airports; 5.9 at the 25 ASDE-3X airports	2 Category A&B Runway Incursions at the 10 ASDE-X airports; 5 Category A&B Runway Incursions at the 25 ASDE-3X airports
2006	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2006	Weighted average is 6.04 minutes per departure for 10 ASDE-X and 25 ASDE-3X airports based on FY04 data	Reduce weighted average Taxi-Out delay by 2.42 seconds per departure for 10 ASDE-X and 25 ASDE-3X airports	Weighted average is 6.32 Minutes per departure for 10 ASDE-X and 25 ASDE-3X airports based on FY06 data. (Overall Taxi times have increased as a function of demand. However, for the comparable levels of traffic, taxi times decreased at ASDE-X sites)
2006	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2006	Projected to be 4.3 at the 10 ASDE-X airports; 10.5 at the 25 ASDE-3X airports	Reduce to 1.3 at the 10 ASDE-X airports; 7.7 at the 25 ASDE-3X airports	3 surface deviations caused by operational errors at the 10 ASDE-X airports; 38 at the 25 ASDE-3X airports. (Surface Deviations have increased as a function of demand. However, for comparable

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
								levels of traffic, incursions have decreased at ASDE-X sites.)
2006	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	15.87 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	24 unscheduled outage hours per system per year for deployed ASDE systems
2007	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2007	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$13.7M comprised of \$4.9M in aircraft direct operating costs and \$8.8M in passenger value of time.	January 2008 - Actual measurement will be provided January 2008 based on receipt of data November 2007 and 2 months to analyze and reconcile ASPM taxi values.
2007	Safety	Mission and Business Results	Transportation	Air Transportation	Number of Category A&B Runway Incursions per year for technology deployed in 2007.	Projected to be the 10.2 at the 35 ASDE-X airports. (There is no longer a differentiation of benefits between new ASDE-X establishments and ASDE-3X upgrade sites; new targets and baselines reflect this change for goals FY07 and beyond)	Reduce to 8.5 at the 35 ASDE-X airports	February 2008 - Actual measurement will be provided February 2008 based on receipt of ARI data November 2007 and 3 months to analyze and reconcile results
2007	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2007	Weighted average taxi-out delay of 6.04 minutes per departure for 35 ASDE-X airports based on FY04 data	Reduce weighted average taxi-out delay by 2.6 seconds per departure for 35 ASDE-X airports.	January 2008 - Actual measurement will be provided January 2008 based on receipt of data November 2007 and 2 months to analyze and reconcile ASPM taxi values.
2007	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2007	Projected to be the 15.6 at the 35 ASDE-X airports	Reduce to 9.5 at the 35 ASDE-X airports	February 2008 - Actual measurement will be provided February 2008 based on receipt of ARI data November 2007 and 3 months to analyze and reconcile surface deviations data
2007	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	15.37 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	February 2008 - Actual measurement will be provided February 2008 based on receipt of ARI data November 2007 and 3 months to analyze and reconcile surface deviations data
2008	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2008	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in	Reduce projected total cost by \$18.9M comprised of \$6.5M in aircraft direct operating costs and	January 2009 - Actual measurement will be provided January 2009 based on receipt of data

Exhibit 300: FAAXX248: Airport Surface Detection Equipment - Model X (ASDE-X) Redacted 1-25-2008

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
						passenger value of time	\$12.4M in passenger value of time.	November 2008 and 2 months to analyze and reconcile ASPM taxi values.
2008	Safety	Mission and Business Results	Transportation	Air Transportation	Number of Category A&B Runway Incursions per year for technology deployed in 2008	Projected to be the 10.8 at the 35 ASDE-X airports	Reduce to 8.5 at the 35 ASDE-X airports	February 2009 - Actual measurement will be provided February 2009 based on receipt of ARI data November 2008 and 3 months to analyze and reconcile results
2008	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2008	Weighted average taxi-out delay of 6.04 minutes per departure for 35 ASDE-X airports based on FY04 data	Reduce weighted average taxi-out delay by 2.89 seconds per departure for 35 ASDE-X airports.	January 2009 - Actual measurement will be provided January 2009 based on receipt of data November 2008 and 2 months to analyze and reconcile ASPM taxi values.
2008	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2008	Projected to be the 16.4 at the 35 ASDE-X airports	Reduce to 9.9 at the 35 ASDE-X airports	February 2009 - Actual measurement will be provided February 2009 based on receipt of ARI data November 2008 and 3 months to analyze and reconcile surface deviations data
2008	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	14.73 unscheduled outage hours per year (based on prorated improvement from deployed systems)	February 2009 - Actual measurement will be provided February 2008 based on receipt of site data November 2008 and 3 months to analyze and reconcile results
2009	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2009	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$42.2M comprised of \$14.8M in aircraft direct operating costs and \$27.4M in passenger value of time.	January 2010 - Actual measurement will be provided January 2010 based on receipt of data November 2009 and 2 months to analyze and reconcile ASPM taxi values.
2009	Safety	Mission and Business Results	Transportation	Air Transportation	Number of Category A&B Runway Incursions per year for technology deployed in 2009	Projected to be the 11.3 at the 35 ASDE-X airports	Reduce to 8.2 at the 35 ASDE-X airports	February 2010 - Actual measurement will be provided February 2010 based on receipt of ARI data November 2009 and 3 months to analyze and reconcile results
2009	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2009	Weighted average taxi-out delay of 6.04 minutes per departure for 35 ASDE-X airports based on FY04 data	Reduce weighted average taxi-out delay by 6.2 seconds per departure for 35 ASDE-X airports.	January 2010 - Actual measurement will be provided January 2010 based on receipt of data November 2009 and 2 months to analyze and



Exhibit 300: FAAXX248: Airport Surface Detection Equipment - Model X (ASDE-X) Redacted 1-25-2008

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
								reconcile ASPM Taxi data
2009	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2009	Projected to be the 17.3 at the 35 ASDE-X airports	Reduce to 10.4 at the 35 ASDE-X airports	February 2010 - Actual measurement will be provided February 2010 based on receipt of ARI data November 2009 and 3 months to analyze and reconcile surface deviations data
2009	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	13.36 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	February 2010 - Actual measurement will be provided February 2010 based on receipt of site data November 2009 and 3 months to analyze and reconcile results
2010	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2010	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$63.9M comprised of \$22.5M in aircraft direct operating costs and \$41.4M in passenger value of time.	January 2011 - Actual measurement will be provided January 2011 based on receipt of data November 2010 and 2 months to analyze and reconcile ASPM taxi values.
2010	Safety	Mission and Business Results	Transportation	Air Transportation	Number of category A&B runway incursions per year for technology deployed in 2010	Projected to be the 11.9 at the 35 ASDE-X airports	Reduce to 7.4 at the 35 ASDE-X airports	February 2011 - Actual measurement will be provided February 2011 based on receipt of ARI data November 2010 and 3 months to analyze and reconcile results
2010	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2010	Weighted average taxi-out delay of 6.04 minutes per departure for 35 ASDE-X airports based on FY04 data	Reduce weighted average taxi-out delay by 9.6 seconds per departure for 35 ASDE-X airports.	January 2011 - Actual measurement will be provided January 2011 based on receipt of data November 2010 and 2 months to analyze and reconcile ASPM Taxi data
2010	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2010	Projected to be the 18.2 at the 35 ASDE-X airports	Reduce to 11.0 at the 35 ASDE-X airports	February 2011 - Actual measurement will be provided February 2011 based on receipt of ARI data November 2010 and 3 months to analyze and reconcile surface deviations data
2010	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	12.36 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	February 2011 - Actual measurement will be provided February 2011 based on receipt of site data November 2010 and 3 months to analyze and reconcile results
2011	Mobility	Customer	Timeliness and	Delivery Time	Cost of taxi-out	\$2,294M	Reduce	January 2012 -

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
		Results	Responsiveness		delays per year for technology deployed in 2011	projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	projected total cost by \$76.1M comprised of \$26.6M in aircraft direct operating costs and \$49.5M in passenger value of time.	Actual measurement will be provided January 2012 based on receipt of data November 2011 and 2 months to analyze and reconcile ASPM taxi values.
2011	Safety	Mission and Business Results	Transportation	Air Transportation	Number of category A&B runway incursions per year for technology deployed in 2011	Projected to be the 12.5 at the 35 ASDE-X airports	Reduce to 7.1 at the 35 ASDE-X airports	February 2012 - Actual measurement will be provided February 2012 based on receipt of ARI data November 2011 and 3 months to analyze and reconcile results
2011	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2011	Weighted average taxi-out delay of 6.04 minutes per departure for 35 ASDE-X airports based on FY04 data	Reduce weighted average taxi-out delay by 11.4 seconds per departure for 35 ASDE-X airports.	January 2012 - Actual measurement will be provided January 2012 based on receipt of data November 2011 and 2 months to analyze and reconcile ASPM Taxi data
2011	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2011	Projected to be the 19.0 at the 35 ASDE-X airports	Reduce to 11.5 at the 35 ASDE-X airports	February 2012 - Actual measurement will be provided February 2012 based on receipt of ARI data November 2011 and 3 months to analyze and reconcile surface deviations data
2011	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	12.36 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	February 2012 - Actual measurement will be provided February 2012 based on receipt of site data November 2011 and 3 months to analyze and reconcile results
2012	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2012	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$78.2M comprised of \$27.2M in aircraft direct operating costs and \$51.0M in passenger value of time.	January 2013 - Actual measurement will be provided January 2013 based on receipt of data November 2012 and 2 months to analyze and reconcile ASPM taxi values.
2012	Safety	Mission and Business Results	Transportation	Air Transportation	Number of category A&B runway incursions per year for technology deployed in 2012	Projected to be the 13.1 at the 10 ASDE-X and 25 ASDE-3X airports	Reduce to 7.2 at the 10 ASDE-X and 25 ASDE-3X airports	February 2013 - Actual measurement will be provided February 2013 based on receipt of ARI data November 2012 and 3 months to analyze and reconcile results
2012	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in	Weighted average taxi-out delay of 6.04 minutes per departure for 10	Reduce weighted average taxi-out delay by 11.4 seconds per departure for 10	January 2013 - Actual measurement will be provided January 2013

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
					2012	ASDE-X and 25 ASDE-3X airports based on FY04 data	ASDE-X and 25 ASDE-3X airports.	based on receipt of data November 2012 and 2 months to analyze and reconcile ASPM Taxi data
2012	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2012	Projected to be the 19.9 at the 10 ASDE-X and 25 ASDE-3X airports	Reduce to 12.0 at the 10 ASDE-X and 25 ASDE-3X airports	February 2013 - Actual measurement will be provided February 2013 based on receipt of ARI data November 2011 and 3 months to analyze and reconcile surface deviations data
2012	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	12.36 unscheduled outage hours per system per year (based on prorated improvement from deployed systems)	February 2013 - Actual measurement will be provided February 2013 based on receipt of site data November 2012 and 3 months to analyze and reconcile results
2013	Mobility	Customer Results	Timeliness and Responsiveness	Delivery Time	Cost of taxi-out delays per year for technology deployed in 2013	\$2,294M projected total cost comprised of \$814M in aircraft direct operating costs and \$1,480M in passenger value of time	Reduce projected total cost by \$78.2M comprised of \$27.2M in aircraft direct operating costs and \$51.0M in passenger value of time	January 2014 - Actual measurement will be provided January 2014 based on receipt of data November 2013 and 2 months to analyze and reconcile ASPM taxi values.
2013	Safety	Mission and Business Results	Transportation	Air Transportation	Number of category A&B runway incursions per year for technology deployed in 2013	Projected to be the 13.7 at the 10 ASDE-X and 25 ASDE-3X airports	Reduce to 7.5 at the 10 ASD-X and 25 ASDE-3X airports	February 2014 - Actual measurement will be provided by February 2014 based on receipt of ARI data November 2013 and 3 months to analyze and reconcile results
2013	Reduced Congestion	Mission and Business Results	Transportation	Air Transportation	Taxi-out delays per plane per departure for technology deployed in 2013	Weighted average taxi-out delay of 6.04 minutes per departure for 10 ASDE-X and 25 ASDE-3X airports based on FY04 data	Reduce weighted average taxi-out delay by 11.4 seconds per departure for 10 ASDE-X and 25 ASDE-3X airports.	January 2014 - Actual measurement will be provided January 2014 based on receipt of data November 2013 and 2 months to analyze and reconcile ASPM taxi values.
2013	Safety	Processes and Activities	Quality	Errors	Number of surface deviations caused by operational errors per year for technology deployed in 2013	Projected to be the 20 at the 10 ASDE-X and 25 ASDE-3X airports	Reduce to 12.6 at the 10 ASDE-X and 25 ASDE-3X airports	February 2014 - Actual measurement will be provided February 2014 based on receipt of ARI data November 2013 and 3 months to analyze and reconcile surface deviations data.
2013	Safety	Technology	Reliability and Availability	Availability	Number of unscheduled outage hours per system per year	17.52 unscheduled outage hours per system per year for legacy ASDE systems	12.36 unscheduled outage hours per system per year (based on prorated improvement	February 2014 - Actual measurement will be provided February 2013 based on receipt of site data

Performance Information Table								
Fiscal Year	Strategic Goal(s) Supported	Measurement Area	Measurement Category	Measurement Grouping	Measurement Indicator	Baseline	Target	Actual Results
							from deployed systems)	November 2013 and 3 months to analyze and reconcile results

**Section E: Security and Privacy (IT Capital Assets only)**

In order to successfully address this area of the business case, each question below must be answered at the system/application level, not at a program or agency level. Systems supporting this investment on the planning and operational systems security tables should match the systems on the privacy table below. Systems on the Operational Security Table must be included on your agency FISMA system inventory and should be easily referenced in the inventory (i.e., should use the same name or identifier).

For existing Mixed-Life Cycle investments where enhancement, development, and/or modernization is planned, include the investment in both the "Systems in Planning" table (Table 3) and the "Operational Systems" table (Table 4). Systems which are already operational, but have enhancement, development, and/or modernization activity, should be included in both Table 3 and Table 4. Table 3 should reflect the planned date for the system changes to be complete and operational, and the planned date for the associated C&A update. Table 4 should reflect the current status of the requirements listed. In this context, information contained within Table 3 should characterize what updates to testing and documentation will occur before implementing the enhancements; and Table 4 should characterize the current state of the materials associated with the existing system.

All systems listed in the two security tables should be identified in the privacy table. The list of systems in the "Name of System" column of the privacy table (Table 8) should match the systems listed in columns titled "Name of System" in the security tables (Tables 3 and 4). For the Privacy table, it is possible that there may not be a one-to-one ratio between the list of systems and the related privacy documents. For example, one PIA could cover multiple systems. If this is the case, a working link to the PIA may be listed in column (d) of the privacy table more than once (for each system covered by the PIA).

The questions asking whether there is a PIA which covers the system and whether a SORN is required for the system are discrete from the narrative fields. The narrative column provides an opportunity for free text explanation why a working link is not provided. For example, a SORN may be required for the system, but the system is not yet operational. In this circumstance, answer "yes" for column (e) and in the narrative in column (f), explain that because the system is not operational the SORN is not yet required to be published.

Please respond to the questions below and verify the system owner took the following actions:

1. Have the IT security costs for the system(s) been identified and integrated into the overall costs of the investment:
  - a. If "yes," provide the "Percentage IT Security" for the budget year: 3.38
2. Is identifying and assessing security and privacy risks a part of the overall risk management effort for each system supporting or part of this investment.

3. Systems in Planning and Undergoing Enhancement(s), Development, and/or Modernization - Security Table(s):			
Name of System	Agency/ or Contractor Operated System?	Planned Operational Date	Date of Planned C&A update (for existing mixed life cycle systems) or Planned Completion Date (for new systems)
Redacted			

4. Operational Systems - Security Table:							
Name of System	Agency/ or Contractor Operated System?	NIST FIPS 199 Risk Impact level (High, Moderate, Low)	Has C&A been Completed, using NIST 800-37? (Y/N)	Date Completed: C&A	What standards were used for the Security Controls tests? (FIPS 200/NIST 800-53, Other, N/A)	Date Complete(d): Security Control Testing	Date the contingency plan tested
Redacted							

5. Have any weaknesses, not yet remediated, related to any of the systems part of or supporting this investment been identified by the agency or IG?
  - a. If "yes," have those weaknesses been incorporated into the agency's plan of action and milestone process? Yes
6. Indicate whether an increase in IT security funding is requested to remediate IT security weaknesses? Redacted
  - a. If "yes," specify the amount, provide a general description of the weakness, and explain how the funding request will

7. How are contractor security procedures monitored, verified, and validated by the agency for the contractor systems above?  
Redacted

8. Planning & Operational Systems - Privacy Table:					
(a) Name of System	(b) Is this a new system? (Y/N)	(c) Is there at least one Privacy Impact Assessment (PIA) which covers this system? (Y/N)	(d) Internet Link or Explanation	(e) Is a System of Records Notice (SORN) required for this system? (Y/N)	(f) Internet Link or Explanation
ASDE-X (Deployment to Future Sites)	No	No	The system does not contain, process, or transit personal identifying information.	No	The system is not a Privacy Act system of records.
ASDE-X (Systems Already Deployed)	No	No	The system does not contain, process, or transit personal identifying information.	No	The system is not a Privacy Act system of records.

**Details for Text Options:**  
 Column (d): If yes to (c), provide the link(s) to the publicly posted PIA(s) with which this system is associated. If no to (c), provide an explanation why the PIA has not been publicly posted or why the PIA has not been conducted.  
 Column (f): If yes to (e), provide the link(s) to where the current and up to date SORN(s) is published in the federal register. If no to (e), provide an explanation why the SORN has not been published or why there isn't a current and up to date SORN.  
 Note: Working links must be provided to specific documents not general privacy websites. Non-working links will be considered as a blank field.

**Section F: Enterprise Architecture (EA) (IT Capital Assets only)**

In order to successfully address this area of the capital asset plan and business case, the investment must be included in the agency's EA and Capital Planning and Investment Control (CPIC) process and mapped to and supporting the FEA. The business case must demonstrate the relationship between the investment and the business, performance, data, services, application, and technology layers of the agency's EA.

1. Is this investment included in your agency's target enterprise architecture? Yes
  - a. If "no," please explain why?
  
2. Is this investment included in the agency's EA Transition Strategy? Yes
  - a. If "yes," provide the investment name as identified in the Transition Strategy provided in the agency's most recent annual EA Assessment. Airport Surface Detection Equipment - Model X (ASDE-X)
  - b. If "no," please explain why?
  
3. Is this investment identified in a completed (contains a target architecture) and approved segment architecture? Yes
  - a. If "yes," provide the name of the segment architecture as provided in the agency's most recent annual EA Assessment. Air Traffic

4. Service Component Reference Model (SRM) Table: Identify the service components funded by this major IT investment (e.g., knowledge management, content management, customer relationship management, etc.). Provide this information in the format of the following table. For detailed guidance regarding components, please refer to <a href="http://www.egov.gov">http://www.egov.gov</a> .								
Agency Component Name	Agency Component Description	FEA SRM Service Domain	FEA SRM Service Type	FEA SRM Component (a)	Service Component Reused Name (b)	Service Component Reused UPI (b)	Internal or External Reuse? (c)	BY Funding Percentage (d)
Surface Separation Capability	Aircraft are separated from vehicle movements on the airport movement area and from designated critical zones, etc. Standards are employed to ensure safe operation on the surface. Surface separation of	Business Analytical Services	Knowledge Discovery	Modeling			No Reuse	15

4. Service Component Reference Model (SRM) Table:								
Identify the service components funded by this major IT investment (e.g., knowledge management, content management, customer relationship management, etc.). Provide this information in the format of the following table. For detailed guidance regarding components, please refer to <a href="http://www.egov.gov">http://www.egov.gov</a> .								
Agency Component Name	Agency Component Description	FEA SRM Service Domain	FEA SRM Service Type	FEA SRM Component (a)	Service Component Reused Name (b)	Service Component Reused UPI (b)	Internal or External Reuse? (c)	BY Funding Percentage (d)
	aircraft while they are operating on the airport surface is a shared responsibility. (ATC Separation Capability)							
Surface Separation Capability	Aircraft are separated from vehicle movements on the airport movement area and from designated critical zones, etc. Standards are employed to ensure safe operation on the surface. Surface separation of aircraft while they are operating on the airport surface is a shared responsibility. (ATC Separation Capability)	Business Analytical Services	Knowledge Discovery	Simulation			No Reuse	15
Surface Separation Capability	Aircraft are separated from vehicle movements on the airport movement area and from designated critical zones, etc. Standards are employed to ensure safe operation on the surface. Surface separation of aircraft while they are operating on the airport surface is a shared responsibility. (ATC Separation Capability)	Business Analytical Services	Visualization	Mapping / Geospatial / Elevation / GPS			No Reuse	70

a. Use existing SRM Components or identify as "NEW". A "NEW" component is one not already identified as a service component in the FEA SRM.

b. A reused component is one being funded by another investment, but being used by this investment. Rather than answer yes or no, identify the reused service component funded by the other investment and identify the other investment using the Unique Project Identifier (UPI) code from the OMB Ex 300 or Ex 53 submission.

c. 'Internal' reuse is within an agency. For example, one agency within a department is reusing a service component provided by another agency within the same department. 'External' reuse is one agency within a department reusing a service component provided by another agency in another department. A good example of this is an E-Gov initiative service being reused by multiple organizations across the federal government.

d. Please provide the percentage of the BY requested funding amount used for each service component listed in the table. If external, provide the percentage of the BY requested funding amount transferred to another agency to pay for the service. The percentages in the column can, but are not required to, add up to 100%.

5. Technical Reference Model (TRM) Table:				
To demonstrate how this major IT investment aligns with the FEA Technical Reference Model (TRM), please list the Service Areas, Categories, Standards, and Service Specifications supporting this IT investment.				
FEA SRM Component (a)	FEA TRM Service Area	FEA TRM Service Category	FEA TRM Service Standard	Service Specification (b) (i.e., vendor and product name)
Modeling	Component Framework	Presentation / Interface	Content Rendering	Sun Solaris OS
Mapping / Geospatial / Elevation / GPS	Component Framework	Presentation / Interface	Dynamic Server-Side Display	Sun Solaris OS

**5. Technical Reference Model (TRM) Table:**

To demonstrate how this major IT investment aligns with the FEA Technical Reference Model (TRM), please list the Service Areas, Categories, Standards, and Service Specifications supporting this IT investment.

FEA SRM Component (a)	FEA TRM Service Area	FEA TRM Service Category	FEA TRM Service Standard	Service Specification (b) (i.e., vendor and product name)
Mapping / Geospatial / Elevation / GPS	Service Platform and Infrastructure	Hardware / Infrastructure	Network Devices / Standards	Redacted
Mapping / Geospatial / Elevation / GPS	Service Platform and Infrastructure	Hardware / Infrastructure	Servers / Computers	Redacted
Simulation	Service Platform and Infrastructure	Software Engineering	Integrated Development Environment	Redacted
Modeling	Service Platform and Infrastructure	Software Engineering	Modeling	Redacted

a. Service Components identified in the previous question should be entered in this column. Please enter multiple rows for FEA SRM Components supported by multiple TRM Service Specifications

b. In the Service Specification field, agencies should provide information on the specified technical standard or vendor product mapped to the FEA TRM Service Standard, including model or version numbers, as appropriate.

6. Will the application leverage existing components and/or applications across the Government (i.e., FirstGov, Pay.Gov, etc)?  No

a. If "yes," please describe.

**Exhibit 300: Part II: Planning, Acquisition and Performance Information**

**Section A: Alternatives Analysis (All Capital Assets)**

Part II should be completed only for investments identified as "Planning" or "Full Acquisition," or "Mixed Life-Cycle" investments in response to Question 6 in Part I, Section A above.

In selecting the best capital asset, you should identify and consider at least three viable alternatives, in addition to the current baseline, i.e., the status quo. Use OMB Circular A-94 for all investments and the Clinger Cohen Act of 1996 for IT investments to determine the criteria you should use in your Benefit/Cost Analysis.

- 1. Did you conduct an alternatives analysis for this project? Yes
  - a. If "yes," provide the date the analysis was completed? 8/1/2005
  - b. If "no," what is the anticipated date this analysis will be completed?
  - c. If no analysis is planned, please briefly explain why:

2. Alternative Analysis Results: \* Costs in millions  
 Use the results of your alternatives analysis to complete the following table:

Alternative Analyzed	Description of Alternative	Risk Adjusted Lifecycle Costs estimate	Risk Adjusted Lifecycle Benefits estimate
Redacted			

3. Which alternative was selected by the Agency's Executive/Investment Committee and why was it chosen?

Redacted

4. What specific qualitative benefits will be realized?

Redacted

5. Will the selected alternative replace a legacy system in-part or in-whole? Yes

a. If "yes," are the migration costs associated with the migration to the selected alternative included in this investment, the legacy investment, or in a separate migration investment. This Investment

b. If "yes," please provide the following information:

List of Legacy Investment or Systems		
Name of the Legacy Investment of Systems	UPI if available	Date of the System Retirement
ASDE-3/AMASS		1/31/2011

**Section B: Risk Management (All Capital Assets)**

You should have performed a risk assessment during the early planning and initial concept phase of this investment's life-cycle, developed a risk-adjusted life-cycle cost estimate and a plan to eliminate, mitigate or manage risk, and be actively managing risk throughout the investment's life-cycle.

- 1. Does the investment have a Risk Management Plan? Yes
  - a. If "yes," what is the date of the plan? 8/8/2007
  - b. Has the Risk Management Plan been significantly changed since last year's submission to OMB? Yes
- c. If "yes," describe any significant changes:

The ASDE-X investment baseline costs and schedule estimates were risk adjusted, resulting in a comprehensive risk adjusted JRC-approved baseline. The total risk-adjusted costs are \$549.8M for F&E and \$256.6M for O&M. The total non risk-adjusted costs are \$537.6M for F&E and \$246.2M for O&M. The schedule is also risk adjusted to include reserve with the program anticipating the Last ORD in May 2011. The management reserve for schedule is reflected in table II.C.9. Risk analysis was performed to assess the impact of changes to various factors and assumptions on the overall result. The point estimate results were modified to address the uncertainty associated with the estimates as well as the risk associated with meeting the program



objectives. For individual inputs into the cost model, probability distributions were defined to capture the range of possible results. To determine the overall effect of the individual probability ranges on the cost of the program, Monte Carlo simulation was used. The risk-adjusted cost estimate was defined by an 80% probability that actual costs would be less than or equal to the given value. The dollar increase required to provide an 80% confidence level in the program estimate was apportioned to the individual WBS elements based on the relative risk level. The proposed schedule baseline by airport is identified in the basis of estimate (BOE) documentation. The schedule baseline was developed using input from actual durations from implemented ASDE-X sites and input from the implementation and systems engineering team to determine the optimistic, likely, and pessimistic durations for each activity in the course of a site implementation. The schedules were constructed using the likely durations. The life cycle cost estimates reflect the resources necessary to execute the schedule.

The PART review did not find weaknesses specific to ASDE-X.

2. If there currently is no plan, will a plan be developed?

- a. If "yes," what is the planned completion date?
- b. If "no," what is the strategy for managing the risks?

3. Briefly describe how investment risks are reflected in the life cycle cost estimate and investment schedule:

The ASDE-X investment baseline costs and schedule estimates were risk adjusted, resulting in a comprehensive risk adjusted JRC-approved baseline. The total risk-adjusted costs are \$549.8M for F&E and \$256.6M for O&M. The total non risk-adjusted costs are \$537.6M for F&E and \$246.2M for O&M. The schedule is also risk adjusted to include reserve with the program anticipating the last ORD in February 2011. The management reserve for schedule is reflected in table II.C.9.

Risk analysis was performed to assess the impact of changes to various factors and assumptions on the overall result. The point estimate results were modified to address the uncertainty associated with the estimates as well as the risk associated with meeting the program objectives. For individual inputs into the cost model, probability distributions were defined to capture the range of possible results. To determine the overall effect of the individual probability ranges on the cost of the program, Monte Carlo simulation was used. The risk-adjusted cost estimate was defined by an 80% probability that actual costs would be less than or equal to the given value. The dollar increase required to provide an 80% confidence level in the program estimate was apportioned to the individual WBS elements based on the relative risk level.

The proposed schedule baseline by airport is identified in the basis of estimate (BOE) documentation. The schedule baseline was developed using input from actual durations from implemented ASDE-X sites and input from the implementation and systems engineering team to determine the optimistic, likely, and pessimistic durations for each activity in the course of a site implementation. The schedules were constructed using the likely durations. The life cycle cost estimates reflect the resources necessary to execute the schedule.

### **Section C: Cost and Schedule Performance (All Capital Assets)**

EVM is required only on DME portions of investments. For mixed lifecycle investments, O&M milestones should still be included in the table (Comparison of Initial Baseline and Current Approved Baseline). This table should accurately reflect the milestones in the initial baseline, as well as milestones in the current baseline.

1. Does the earned value management system meet the criteria in ANSI/EIA Standard-748? No
2. Is the CV% or SV% greater than +/- 10%? (CV%= CV/EV x 100; SV%= SV/PV x 100) No
  - a. If "yes," was it the CV or SV or both?
  - b. If "yes," explain the causes of the variance:
  - c. If "yes," describe the corrective actions:
3. Has the investment re-baselined during the past fiscal year? No
  - a. If "yes," when was it approved by the agency head?

4. Comparison of Initial Baseline and Current Approved Baseline

Complete the following table to compare actual performance against the current performance baseline and to the initial performance baseline. In the Current Baseline section, for all milestones listed, you should provide both the baseline and actual completion dates (e.g., "03/23/2003"/ "04/28/2004") and the baseline and actual total costs (in \$ Millions). In the event that a milestone is not found in both the initial and current baseline, leave the associated cells blank. Note that the 'Description of Milestone' and 'Percent Complete' fields are required. Indicate '0' for any milestone no longer active.

Milestone Number	Description of Milestone	Initial Baseline		Current Baseline				Current Baseline Variance		Percent Complete
		Planned Completion Date (mm/dd/yyyy)	Total Cost (\$M) Estimated	Completion Date (mm/dd/yyyy)		Total Cost (\$M)		Schedule (# days)	Cost (\$M)	
				Planned	Actual	Planned	Actual			
Redacted										