PE NUMBER: 0605864F
PE TITLE: Space Test Program

Exhibit R-2, RDT&E Budget Item Justification	DATE: May 2009
BUDGET ACTIVITY: 06 RDT&E Management Support	PE NUMBER AND TITLE: 0605864F Space Test Program

	Cost ($ in Millions)	FY 2008 Actual	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost to Complete	Total
	Total Program Element (PE) Cost	50.019	47.654	47.215	0.000	0.000	0.000	0.000	0.000	Continuing	TBD
2617	Free-Flyer Spacecraft Missions	50.019	47.654	47.215	0.000	0.000	0.000	0.000	0.000	Continuing	TBD

(U) A. Mission Description and Budget Item Justification

(U) The Space Test Program (STP) conducts space test missions for the purpose of accelerating DoD space technology transformation while lowering developmental risk. The program flies an optimally selected number of DoD sponsored experiments consistent with priority, opportunity, and funding. STP missions are the most cost-effective way to flight test new space system technologies, concepts and designs, providing an inexpensive way to:

- Support the space acquisition block development approach
- Demonstrate and develop responsive research and development (R&D) space capabilities
- Provide early operational capabilities to quickly react to new developments
- Perform operational risk reduction through direct flight test of prototype components
- Improve operational design by characterizing the space environment, event, or sensor physics proposed for an operational system/system upgrade
- Develop, test, and acquire advanced payload support hardware for small and medium expendable launch vehicles and manned spaceflight vehicles

(U) The Deputy Secretary of Defense issued a Space Test Program Management & Funding Policy in Jul 2002, reaffirming STP as the primary provider of spaceflight for the entire DoD space research community. The policy states in part that "the STP funding level must be sufficient to provide spaceflight for DoD Space Experiments Review Board (SERB) approved experiments in a timely manner. As a goal the Air Force funding level should provide for a Small-Launch-Vehicle-Class mission every 2 years and a Medium-Launch-Vehicle-Class mission every 4 years. This is in addition to funding required to support secondary payload and spacecraft missions on other organizations' spacecraft and launch vehicles." The Jul 2002 policy statement also reaffirms STP's role as the single manager for all DoD payloads on the Space Shuttle and the International Space Station. Air Force Space Command issued a policy in May 2004 that establishes STP as the sole gateway for all agencies requesting launch services as a piggyback payload or secondary satellite on a Combatant Command mission. STP maintains a SERB ranked list of these prospective payloads seeking assistance. There were 62 experiments approved by the SERB in 2008.

(U) STP has a continually evolving mission portfolio, whereby space experiments and technology payloads are selected for spaceflight from the most recent list approved by the SERB. STP is authorized to initiate new missions from the prioritized, SERB-approved list. STP may also support non-SERB customers, both DoD and other U.S. Government, on a cost-reimbursable basis. Selection of the most appropriate spaceflight mode for a payload is dependent on optimizing the combination of SERB list priority, timing and readiness of experiments, launch opportunity, and availability of funding. STP support for these payloads includes some or all of the following: mission planning and related support activities; acquisition of a dedicated satellite, launch vehicle, and/or associated integration hardware; integration onto a host satellite, launch vehicle, NASA shuttle, and/or the International Space Station; readiness reviews, launch support, and approximately one year of on-orbit operations. This flexible approach is essential in order to take advantage of 'target of opportunity' space hardware, including operational spacecraft and launch vehicles with margin, and ensures the maximum amount of DoD space research is accomplished with the resources available.

Exhibit R-2, RDT&E Budget Item Justification	DATE May 2009
BUDGET ACTIVITY 06 RDT&E Management Support	PE NUMBER AND TITLE 0605864F Space Test Program

(U) STP is in Budget Activity 6, RDT&E Management Support, because it supports RDT&E satellite launches.

(U) B. Program Change Summary ($ in Millions)

		FY 2008	FY 2009	FY 2010
(U)	Previous President's Budget	47.129	48.072	49.070
(U)	Current PBR/President's Budget	50.019	47.654	47.215
(U)	Total Adjustments	2.890	-0.418	
(U)	Congressional Program Reductions			
	Congressional Rescissions		-0.418	
	Congressional Increases			
	Reprogrammings	3.900		
	SBIR/STTR Transfer	-1.010		

(U) Significant Program Changes:

FY08: BTR $5.0M for Communications/Navigation Outage Forecasting System (C/NOFS) solar panels; BTR out $1.1M.

Exhibit R-2a, RDT&E Project Justification			DATE: May 2009
BUDGET ACTIVITY: 06 RDT&E Management Support	PE NUMBER AND TITLE: 0605864F Space Test Program	PROJECT NUMBER AND TITLE: 2617 Free-Flyer Spacecraft Missions	

	Cost ($ in Millions)	FY 2008 Actual	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost to Complete	Total
2617	Free-Flyer Spacecraft Missions	50.019	47.654	47.215	0.000	0.000	0.000	0.000	0.000	Continuing	TBD
	Quantity of RDT&E Articles	0	0	0	0	0	0	0	0		

(U) A. Mission Description and Budget Item Justification

(U) The Space Test Program (STP) conducts space test missions for the purpose of accelerating DoD space technology transformation while lowering developmental risk. The program flies an optimally selected number of DoD sponsored experiments consistent with priority, opportunity, and funding. STP missions are the most cost-effective way to flight test new space system technologies, concepts and designs, providing an inexpensive way to:

- Support the space acquisition block development approach
- Demonstrate and develop responsive research and development (R&D) space capabilities
- Provide early operational capabilities to quickly react to new developments
- Perform operational risk reduction through direct flight test of prototype components
- Improve operational design by characterizing the space environment, event, or sensor physics proposed for an operational system/system upgrade
- Develop, test, and acquire advanced payload support hardware for small and medium expendable launch vehicles and manned spaceflight vehicles

(U) The Deputy Secretary of Defense issued a Space Test Program Management & Funding Policy in Jul 2002, reaffirming STP as the primary provider of spaceflight for the entire DoD space research community. The policy states in part that "the STP funding level must be sufficient to provide spaceflight for DoD Space Experiments Review Board (SERB) approved experiments in a timely manner. As a goal the Air Force funding level should provide for a Small-Launch-Vehicle-Class mission every 2 years and a Medium-Launch-Vehicle-Class mission every 4 years. This is in addition to funding required to support secondary payload and spacecraft missions on other organizations' spacecraft and launch vehicles." The Jul 2002 policy statement also reaffirms STP's role as the single manager for all DoD payloads on the Space Shuttle and the International Space Station. Air Force Space Command issued a policy in May 2004 that establishes STP as the sole gateway for all agencies requesting launch services as a piggyback payload or secondary satellite on a Combatant Command mission. STP maintains a SERB ranked list of these prospective payloads seeking assistance. There were 62 experiments approved by the SERB in 2008.

(U) STP has a continually evolving mission portfolio, whereby space experiments and technology payloads are selected for spaceflight from the most recent list approved by the SERB. STP is authorized to initiate new missions from the prioritized, SERB-approved list. STP may also support non-SERB customers, both DoD and other U.S. Government, on a cost-reimbursable basis. Selection of the most appropriate spaceflight mode for a payload is dependent on optimizing the combination of SERB list priority, timing and readiness of experiments, launch opportunity, and availability of funding. STP support for these payloads includes some or all of the following: mission planning and related support activities; acquisition of a dedicated satellite, launch vehicle, and/or associated integration hardware; integration onto a host satellite, launch vehicle, NASA shuttle, and/or the International Space Station; readiness reviews, launch support, and approximately one year of on-orbit operations. This flexible approach is essential in order to take advantage of 'target of opportunity' space hardware, including operational spacecraft and launch vehicles with margin, and ensures the maximum amount of DoD space research is accomplished with the resources available.

(U) STP is in Budget Activity 6, RDT&E Management Support, because it supports RDT&E satellite launches.

Exhibit R-2a, RDT&E Project Justification		DATE: May 2009
BUDGET ACTIVITY: 06 RDT&E Management Support	PE NUMBER AND TITLE: 0605864F Space Test Program	PROJECT NUMBER AND TITLE: 2617 Free-Flyer Spacecraft Missions

	B. Accomplishments/Planned Program ($ in Millions)	FY 2008	FY 2009	FY 2010
(U)	Provide program support for piggyback/secondary, Small Launch Vehicle, Medium Launch Vehicle, and manned spaceflight missions	1.049	1.270	1.420
(U)	Initiate, develop, and continue integration of payloads onto piggyback/secondary, Small Launch Vehicle, Medium Launch Vehicle, and manned spaceflight missions to include acquisition of associated spacecraft and integration hardware	34.938	24.066	19.804
(U)	Initiate and continue purchase of launch vehicles and launch vehicle support for piggyback/secondary, Small Launch Vehicle, Medium Launch Vehicle, and manned spaceflight missions	5.893	15.285	15.236
(U)	Initiate, develop, and continue first year operations and operations planning for piggyback/secondary, Small Launch Vehicle, Medium Launch Vehicle, and manned spaceflight missions	6.939	5.533	9.564
(U)	Conduct studies to explore future launch opportunities, risk reduction activities, and mission planning	1.200	1.500	1.191
(U)	Total Cost	50.019	47.654	47.215

(U) C. Other Program Funding Summary ($ in Millions)

	FY 2008 Actual	FY 2009 Estimate	FY 2010 Estimate	FY 2011 Estimate	FY 2012 Estimate	FY 2013 Estimate	FY 2014 Estimate	FY 2015 Estimate	Cost to Complete	Total Cost
(U) Related Procurement: N/A										

(U) D. Acquisition Strategy

N/A