

Exhibit R-2, RDT&E Budget Item Justification							Date: February 2005		
Appropriation/Budget Activity RDT&E. Defense-Wide BA4				R-1 Item Nomenclature: Environmental Security Technology Certification Program (ESTCP) PE 0603851D8Z					
Cost (\$ in millions)	FY 2004	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY 2011	
Total ESTCP Cost	34.465	42.046	30.632	28.392	33.671	33.182	33.657	34.330	
A. Mission Description and Budget Item Justification:									
(U) This program demonstrates and validates the most promising innovative environmental technologies that target DoD's most urgent environmental needs. Technologies selected are projected to provide pay back of the investment within five years through cost savings and improved efficiencies. The program responds to: (1) congressional concern over the slow pace of remediation of environmentally polluted sites on military installations, (2) congressional direction to conduct demonstrations specifically focused on emerging new technologies, and (3) the need to improve defense readiness by reducing the drain on the Department's operation and maintenance dollars caused by environmental restoration and waste management. Preference for demonstrations are given to technologies that have successfully completed all necessary research and development objectives, and address the highest priority DoD environmental requirements.									
B. Program Change Summary:									
	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>					
Previous President's Budget:	35.191	32.546	29.992	28.709					
Current President's Budget Submit:	34.465	42.046	30.632	28.392					
Total Adjustments	-0.726	9.500	0.640	-0.317					
Adjustments to Appropriated Value									
Congressional Program Reductions:									
Congressional Rescissions:		-1.000							
Congressional Increases:		5.500							
Reprogrammings:	-0.272	5.000							
SBIR/STTR Transfers:	-0.454								
Other:							-0.317		
C. Other Program Funding Summary: Related RDT&E									
D. Acquisition Strategy. ESTCP solicits proposals from all DoD organizations. In the areas of Cleanup and Unexploded Ordnance (UXO), ESTCP solicits proposals from other Federal Agencies and the commercial sector as well. Projects are selected based on an annual competitive process through reviews conducted by multi-agency review panels.									

Exhibit R-2a, RDT&E Project Justification							Date: February 2005	
Appropriation/Budget Activity RDT&E. Defense-wide BA 4				Environmental Security Technology Certification Program (ESTCP) 0603851D8Z				
Cost (\$ in millions)	FY 2004	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009	FY 2010	FY2011
ESTCP Cost	34.465	42.046	30.632	28.392	33.671	33.182	33.657	34.330
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B. Accomplishments/Planned Program								
	FY 2004	FY 2005	FY 2006	FY 2007				
Accomplishment/ Effort/Subtotal Cost	34.465	42.046	30.632	28.392				
(U) FY 2004 Accomplishments								
<ul style="list-style-type: none"> - Reviewed and selected 36 technologies for demonstration. - Reviewed and selected sites for demonstration of technologies. - Prepared site-specific implementation plans. - Prepared sites and secured regulatory permitting. - Continued to demonstrate and evaluate 64 selected technologies. Of these, 35 were completed. 								
By Pillar:								
<ul style="list-style-type: none"> - Remediation: Successfully demonstrated and validated technologies in multiple high priority areas related to cleanup of contaminated DoD sites. ESTCP has completed the successful demonstration of new cost-effective bioremediation technologies for chlorinated solvents and perchlorate. Evaluations continued on site characterization technologies, source treatment technologies, additional perchlorate treatment approaches, and in-situ treatment for RDX and TNT. These technologies are projected to reduce future DoD liability by \$100s of millions. (\$9.651 million) - Unexploded Ordnance (UXO): ESTCP researchers continued to demonstrate improved UXO detection hardware and software technologies at the DoD UXO standardized test sites. Completed testing and transitioned new software package to assess UXO data 								

features and data quality. Continued demonstration of mechanical clearance technology. Initiated transition of previously Strategic Environmental Research Defense Program (SERDP)-funded efforts to ESTCP to demonstrate a UXO detection and characterization system in a marine environment, an approach to characterize areas with UXO based on statistical methods, and a multi-sensor cart based system to detect and characterize UXO in the 20mm to 150mm size range. Initiated new wide area assessment mapping technology, modeling for prediction of UXO mobility underwater, and various sensor system and data analysis demonstrations. (\$9.448 million)

- Pollution Prevention: ESTCP continued to validate and transition environmentally benign technologies that directly support the military mission. Examples include the demonstrations of environmentally friendly alternatives for hard chrome plating and cadmium replacements for a wide variety of weapon systems and components, demonstration of an new combustor design for DoD aircraft and fuel additives which result in reduced emissions, demonstration of lead free primers for small and medium caliber munitions, and environmentally benign coating removal technologies. (\$10.315 million)

- Compliance: Significant progress was made in the development of waste treatment and environmental monitoring technologies required by DoD to ensure DoD facilities and ranges are in compliance. These include, testing of treatment system for oily and non-oily waste, effluent discharges in marine environments, blast noise emission, and air emissions monitoring and control technologies. (\$5.051 million)

FY 2005 Plans: The FY 2005 funds will be invested in projects that address priority DoD environmental requirements. The focus of the program is on UXO cleanup, range sustainment and pollution prevention required for DoD weapon systems. Funds are primarily required to continue ongoing investments.

- Continue 65 demonstration projects
- Review and select 24 new technologies for demonstration.
- Review and select sites for demonstration of technologies.
- Prepare site-specific implementation plans.
- Prepare sites and secure regulatory permitting.
- Award demonstration testing and evaluation for selected technologies.

Additional funding provided by Congress will be invested in perchlorate treatment and wide area site assessment pilot program for UXO contaminated sites.

By Pillar:

- Remediation: (\$13.810 million)
- UXO: (\$14.526 million)
- Pollution Prevention: (\$8.900 million)
- Compliance: (\$4.810 million)

FY 2006 Plans: The FY 2006 funds are planned for investment in projects that address priority DoD environmental requirements.

The focus of the program is on UXO cleanup, range sustainment and pollution prevention required for DoD weapon systems. Funds are primarily required to continue ongoing investments.

- Review and select technologies for demonstration.
- Review and select sites for demonstration of technologies.
- Prepare site-specific implementation plans.
- Prepare sites and secure regulatory permitting.
- Award demonstration testing and evaluation for selected technologies.

By Pillar:

- Remediation: (\$8.320 million)
- UXO: (\$9.272 million)
- Pollution Prevention: (\$8.160 million)
- Compliance: (\$4.880 million)

FY 2007 Plans: The FY 2007 funds are planned for investment in projects that address priority DoD environmental requirements. The focus of the program is on UXO cleanup, range sustainment and pollution prevention required for DoD weapon systems. Funds are primarily required to continue ongoing investments.

- Review and select technologies for demonstration.
- Review and select sites for demonstration of technologies.
- Prepare site-specific implementation plans.
- Prepare sites and secure regulatory permitting.
- Award demonstration testing and evaluation for selected technologies.

By Pillar:

- Remediation: (\$7.610 million)
- UXO: (\$9.072 million)
- Pollution Prevention: (\$7.100 million)
- Compliance: (\$4.610 million)

C. Other Program Funding Summary: Related RDT&E

D. Acquisition Strategy: ESTCP solicits proposals from all DoD organizations and competes them with a multi-agency review panel. In Cleanup and UXO, ESTCP solicits proposals from other Federal Agencies and the commercial sector as well. These are also competed using review panels.

Exhibit R-3 Cost Analysis							Date: February 2005	
APPROPRIATION/BUDGET ACTIVITY RDT&E, Defense-wide/BA 4			PROGRAM ELEMENT 0603851D8Z				PROJECT NAME AND NUMBER Environmental Security Technology Certification Program (ESTCP) 0603851D8Z	
Cost Categories	Contract Method & Type	Performing Activity & Location	Total FY 2004 Cost	FY 2005 Cost	FY 2006 Cost	FY 2007 Cost	Cost to Complete	Total Cost
Demonstration and Validation	C	DoD	32.365	38.946	28.632	26.492	Continuing	Continuing
Overhead			2.10	3.1	2.0	1.9		
Subtotal Management			2.10	3.1	2.0	1.9		
Total Cost			34.465	42.046	30.632	28.392	Continuing	Continuing
Remarks								