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RDT&E BUDGET ITEM JUSTIFICATION SHEET (R-2 Exhibit)								DATE February 2002	
BUDGET ACTIVITY 04 - Demonstration and Validation				PE NUMBER AND TITLE 0603319F Airborne Laser Technology				PROJECT 4269	
COST (\$ in Thousands)	FY 2001 Actual	FY 2002 Estimate	FY 2003 Estimate	FY 2004 Estimate	FY 2005 Estimate	FY 2006 Estimate	FY 2007 Estimate	Cost to Complete	Total Cost
4269 Airborne Laser	386,130	0	0	0	0	0	0	0	TBD
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0	TBD
<p>In FY 2002, 644269, Airborne Laser efforts transferred to PE 0603883C, 4030, Air-Based Boost, in order to complete program transition from the AF to the Ballistic Missile Defense Organization (BMDO) per OSD direction.</p> <p>(U) <u>A. Mission Description</u> The Airborne Laser (ABL) Program is an Acquisition Category 1D (ACAT 1D) program to design, build and test a laser weapon system to acquire, track and kill Theater Ballistic Missiles (TBMs) in the boost phase. This weapon system integrates three major subsystems (Laser, Beam Control, and Battle Management Command, Control, Communications, Computers and Intelligence (BMC4I)) into a modified commercial Boeing 747-400F aircraft. It also includes ABL-specific ground support. The program awarded the ABL PDRR (Program Definition Risk Reduction) contract to the Boeing/TRW/ Lockheed-Martin team in November 1996, to design, fabricate, integrate, and test a half-power ABL system. An Authority-to-Proceed (ATP-1) decision point was successfully attained in FY 1998. As a result of OSD direction, FY02 and outyear funding for ABL were transferred to the Ballistic Missile Defense Organization (BMDO). The Acquisition Category and Mission Designation are being reviewed by BMDO with OSD and the Air Force.</p> <p>(U) <u>FY 2001 (\$ in Thousands)</u></p> <p>(U) \$357,464 Continue Boeing/TRW/Lockheed-Martin PDRR contract effort for design, fabrication, integration, and testing of the ABL weapon system, including design and development of the SIL at the Birk Flight Test Facility at Edwards AFB, CA</p> <p>(U) \$5,577 Continue support for special studies, simulations and analyses, technical support, risk management, and an independent review team specializing in lasers, aircraft, and aircraft integration</p> <p>(U) \$23,089 Continue support for labor, training, environmental studies, IPT participation, purchase of targets as GFP, and other government agency support requirements.</p> <p>(U) \$386,130 Total</p> <p>(U) <u>FY 2002 (\$ in Thousands)</u></p> <p>(U) \$0 All FY02 and outyear funding for ABL were transferred to BMDO per OSD direction.</p> <p>(U) \$0 Total</p>									
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<p>(U) <u>A. Mission Description Continued</u></p> <p>(U) <u>FY 2003 (\$ in Thousands)</u></p> <p>(U) \$0 No Activity</p> <p>(U) \$0 Total</p> <p>(U) <u>B. Budget Activity Justification</u></p> <p>This program is in budget activity 4 (BAC-4) - Demonstration and Validation; ABL is a major defense acquisition program and was authorized to enter PDRR at Milestone I in November 1996.</p> <p>(U) <u>C. Program Change Summary (\$ in Thousands)</u></p> <table style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="width: 50%;"></th> <th style="width: 10%; text-align: center;"><u>FY 2001</u></th> <th style="width: 10%; text-align: center;"><u>FY 2002</u></th> <th style="width: 10%; text-align: center;"><u>FY 2003</u></th> <th style="width: 10%; text-align: center;"><u>Total Cost</u></th> </tr> </thead> <tbody> <tr> <td>(U) Previous President's Budget</td> <td style="text-align: right;">148,637</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">TBD</td> </tr> <tr> <td>(U) Appropriated Value</td> <td style="text-align: right;">233,637</td> <td></td> <td></td> <td></td> </tr> <tr> <td>(U) Adjustments to Appropriated Value</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> a. Congressional/General Reductions</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> b. Small Business Innovative Research</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> c. Omnibus or Other Above Threshold Reprogram</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> d. Below Threshold Reprogram</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> e. Rescissions</td> <td style="text-align: right;">-507</td> <td></td> <td></td> <td></td> </tr> <tr> <td>(U) Adjustments to Budget Years Since FY 2002 PBR</td> <td style="text-align: right;">153,000</td> <td style="text-align: center;">0</td> <td></td> <td></td> </tr> <tr> <td>(U) Current Budget Submit/FY 2003 PBR</td> <td style="text-align: right;">386,130</td> <td style="text-align: center;">0</td> <td style="text-align: center;">0</td> <td style="text-align: center;">TBD</td> </tr> </tbody> </table> <p>(U) <u>Significant Program Changes:</u></p> <p>Congress added \$85.0 million to the FY01 appropriation. Congress added an additional \$153M in FY01 funds as part of a supplemental appropriation. As a result of OSD direction, all FY02 and outyear funding for ABL were transferred to the Ballistic Missile Defense Organization (BMDO).</p> <p>Note: Quantity of RDT&E articles total includes purchase of a commercial 747-400F aircraft for the Program Definition and Risk Reduction (PDRR) phase only. The PDRR commercial 747-400F aircraft was purchased in FY1998 and was delivered in January 2000.</p>				<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>Total Cost</u>	(U) Previous President's Budget	148,637	0	0	TBD	(U) Appropriated Value	233,637				(U) Adjustments to Appropriated Value					a. Congressional/General Reductions					b. Small Business Innovative Research					c. Omnibus or Other Above Threshold Reprogram					d. Below Threshold Reprogram					e. Rescissions	-507				(U) Adjustments to Budget Years Since FY 2002 PBR	153,000	0			(U) Current Budget Submit/FY 2003 PBR	386,130	0	0	TBD
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(U) <u>D. Other Program Funding Summary (\$ in Thousands)</u>									
	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>	<u>FY 2004</u>	<u>FY 2005</u>	<u>FY 2006</u>	<u>FY 2007</u>	<u>Cost to</u>	<u>Total Cost</u>
	<u>Actual</u>	<u>Estimate</u>	<u>Estimate</u>	<u>Estimate</u>	<u>Estimate</u>	<u>Estimate</u>	<u>Estimate</u>	<u>Complete</u>	
(U) AF RDT&E									
(U) Other APPN									
Note 1 -Beginning in FY02 all ABL outyear funding was transferred to the Ballistic Missile Defense Organization (BMDO) per OSD direction. The specific PEs are still being determined.									
Note 2 - PE 0603605F, Advanced Weapons - supports ABL by developing technologies for potential performance enhancements above current requirements identified in ABL Operational Requirements Document (ORD).									
(U) <u>E. Acquisition Strategy</u>									
Milestone (MS) I decision was November 1996 authorizing entry into PDRR. MS II for EMD is projected in FY 2004; MS III decision for Production is projected for FY 2008. The PDRR program is structured to demonstrate technical risk reduction achievements at key junctures throughout the PDRR phase. The Air Force established reviews of the program at two key points: Authority-to-Proceed I and II (ATP-1 and ATP-2, respectively) during PDRR to ensure planned progress is attained. ABL successfully completed ATP-1 on 26 Jun 98. The acquisition strategy is being reviewed by BMDO with OSD and the Air Force									
(U) <u>F. Schedule Profile</u>									
		<u>FY 2001</u>				<u>FY 2002</u>			<u>FY 2003</u>
	1	2	3	4	1	2	3	4	1
(U)	Virtual ABL Facility Surveillance/Tracking Test	*							
(U)	Turret Window Fabrication Complete		*						
(U)	Laser Module Airworthiness Test				X				
(U)	Aircraft Modifications Complete				X				
* = Completed Event									
X = Planned Event									
As a result of OSD direction, all FY02 and outyear funding for ABL were transferred to the Ballistic Missile Defense Organization (BMDO).									
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RDT&E PROGRAM ELEMENT/PROJECT COST BREAKDOWN (R-3)							DATE February 2002				
BUDGET ACTIVITY				PE NUMBER AND TITLE			PROJECT				
04 - Demonstration and Validation				0603319F Airborne Laser Technology			4269				
(U) <u>A. Project Cost Breakdown (\$ in Thousands)</u>											
						<u>FY 2001</u>		<u>FY 2002</u>		<u>FY 2003</u>	
(U)	Major Contracts (PDRR contract and Concept Design)					357,464		0			
(U)	Support Contracts (Technical Support, Analysis)					5,577		0			
(U)	Test/Other Government/Misc Support/Salaries/IPTs					23,089		0			
(U)	Total					386,130		0			
Congress added \$85.0 million to the FY01 appropriation. Congress added an additional \$153.0 million in FY01 funds as part of a supplemental appropriation. Beginning in FY02 all ABL FY02 and outyear funding were transferred to the Ballistic Missile Defense Organization (BMDO) per OSD direction.											
(U) <u>B. Budget Acquisition History and Planning Information (\$ in Thousands)</u>											
(U) <u>Performing Organizations:</u>											
	<u>Contractor or Government</u>	<u>Contract Method/Type</u>	<u>Award or Obligation Date</u>	<u>Performing Activity EAC</u>	<u>Project Office EAC</u>	<u>Total Prior to FY 2001</u>	<u>Budget FY 2001</u>	<u>Budget FY 2002</u>	<u>Budget FY 2003</u>	<u>Budget to Complete</u>	<u>Total Program</u>
<u>Product Development Organizations</u>											
	Boeing Defense & Space Group Seattle, WA	CPAF	12 Nov 96	TBD	TBD	705,936	357,717	0			1,063,653
	Concept Design Contract (Rockwell International, CA)	CPFF	9 May 94	22,071	22,071	22,071	0	0			22,071
	Concept Design Contract (Boeing Defense & Space Group, WA)	CPFF	9 May 94	21,689	21,689	21,689	0	0			21,689
Note - The Performing Activity EAC is TBD pending contractor input.											
<u>Support and Management Organizations</u>											
	Technical Support Contracts	Various	Varies	N/A	N/A	25,605	5,324	0			30,929
	Government In-House and Other External Support	Various	Varies	N/A	N/A	58,537	18,464	0			77,001
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RDT&E PROGRAM ELEMENT/PROJECT COST BREAKDOWN (R-3)							DATE	
BUDGET ACTIVITY							PROJECT	
04 - Demonstration and Validation							0603319F Airborne Laser Technology	
							4269	
(U) <u>Performing Organizations Continued:</u>								
<u>Test and Evaluation Organizations</u>								
Air Force Flight Test Center	MIPR	Varies	N/A	N/A	4,159	4,625	0	8,784
(AFFTC)								
Beginning in FY02 all ABL FY02 and outyear funding were transferred to the Ballistic Missile Defense Organization (BMDO) per OSD direction.								
(U) <u>Government Furnished Property:</u>								
<u>Contract</u>								
<u>Method/Type</u> <u>Award or</u>								
<u>Item</u>	<u>or Funding</u>	<u>Obligation</u>	<u>Delivery</u>		<u>Total Prior</u>	<u>Budget</u>	<u>Budget</u>	<u>Budget</u>
<u>Description</u>	<u>Vehicle</u>	<u>Date</u>	<u>Date</u>		<u>to FY 2001</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>
<u>Product Development Property</u>								
The government is providing miscellaneous support equipment during the test phase of the PDRR program. In addition, the government is also providing hardware items to facilitate Infrared Search and Track (IRST) tests. The costs of these two categories of GFP fall below the \$1M reporting threshold.								
<u>Support and Management Property</u>								
<u>Test and Evaluation Property</u>								
					<u>Total Prior</u>	<u>Budget</u>	<u>Budget</u>	<u>Budget</u>
					<u>to FY 2001</u>	<u>FY 2001</u>	<u>FY 2002</u>	<u>FY 2003</u>
<u>Subtotals</u>								<u>Budget to</u>
								<u>Complete</u>
								<u>Total</u>
Subtotal Product Development					749,696	357,717	0	1,107,413
Subtotal Support and Management					84,142	23,788	0	107,930
Subtotal Test and Evaluation					4,159	4,625	0	8,784
Total Project					837,997	386,130	0	1,224,127
Beginning in FY02 all ABL FY02 and outyear funding were transferred to the Ballistic Missile Defense Organization (BMDO) per OSD direction.								