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CLASSIFICATION:

EXHIBIT R-2, RDT&E Budget Item Justification							DATE: February 2003	
APPROPRIATION/BUDGET ACTIVITY RESEARCH DEVELOPMENT TEST & EVALUATION, NAVY / BA-7					R-1 ITEM NOMENCLATURE 0207163N AMRAAM			
COST (\$ in Millions)	FY 2002	FY 2003	FY 2004	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009
Total PE Cost	9.692	7.928	9.297	7.972	2.736	4.691	1.952	0.973
E0981 AMRAAM	9.692	7.928	9.297	7.972	2.736	4.691	1.952	0.973

(U) A. MISSION DESCRIPTION AND BUDGET ITEM JUSTIFICATION:
 This joint Navy/Air Force program is structured in response to the Joint Service Operational Requirement and Mission Element Need Statement to develop an air superiority air-to air missile with significant improvements in operational utility and combat effectiveness. This program supports the integration of the AMRAAM into Navy aircraft with analysis of Navy unique applications, simulation capability development, aircraft missile integration tasks, pre-planned product improvement (P3I) efforts, and procurement of hardware to support Navy test and evaluation tasks.

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EXHIBIT R-2a, RDT&E Project Justification							DATE: February 2003	
APPROPRIATION/BUDGET ACTIVITY RDT&E, N / BA-7		PROGRAM ELEMENT NUMBER AND NAME 0207163N AMRAAM			PROJECT NUMBER AND NAME E0981 AMRAAM			
COST (\$ in Millions)	FY 2002	FY 2003	FY 2004	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009
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RDT&E Articles Qty								
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Exhibit R-2a, RDTEN Project Justification
(Exhibit R-2a, page 2 of 9)

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EXHIBIT R-2a, RDT&E Project Justification			DATE: February 2003	
APPROPRIATION/BUDGET ACTIVITY RDT&E, N / BA-7	PROGRAM ELEMENT NUMBER AND NAME 0207163N AMRAAM	PROJECT NUMBER AND NAME E0981 AMRAAM		

(U) B. Accomplishments/Planned Program

	FY 02	FY 03	FY 04	FY 05
Accomplishments/Effort/Subtotal Cost	7.117	5.307	6.674	5.297
RDT&E Articles Quantity				

Continued system engineering activities in AMRAAM P3I Phase 3 EMD program which include conducting proof of Manufacturing (POM) testing of Phase 3 system hardware, developing, coding, and testing P3I Phase 3 software, and integrating hardware and software into missile test articles for use in ground and initial captive carriage flight testing. Initiate follow-on P3I engineering efforts in FY2004 to include GPS/Advanced Data Link/Kinematics improvements to meet remaining P3I ORD requirements. Continue systems engineering/aircraft integration activities in AMRAAM P3I program with emphasis on Navy unique compatibility requirements and aircraft integration/compatibility requirements. Above in consonance with USAF funding of \$51.221 in FY02, \$35.810 in FY03, \$31.273 in FY04, and \$32.875 in FY05.

	FY 02	FY 03	FY 04	FY 05
Accomplishments/Effort/Subtotal Cost	2.575	2.071	2.273	2.325
RDT&E Articles Quantity				

Continued engineering support of AMRAAM, including investigation and analysis of technologies that offer potential improvements in AMRAAM lethality/performance and compatibility with related weapons systems.

	FY 02	FY 03	FY 04	FY 05
Accomplishments/Effort/Subtotal Cost	0.000	0.550	0.350	0.350
RDT&E Articles Quantity				

Continue aircraft integration activities and test and evaluation for Navy unique requirements.

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<p>(U) C. PROGRAM CHANGE SUMMARY:</p> <table style="width: 100%; border-collapse: collapse;"> <thead> <tr> <th style="text-align: left;"></th> <th style="text-align: right;">FY 2002</th> <th style="text-align: right;">FY 2003</th> <th style="text-align: right;">FY 2004</th> <th style="text-align: right;">FY 2005</th> </tr> </thead> <tbody> <tr> <td>(U) Funding:</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td>Previous President's Budget:</td> <td style="text-align: right;">10.700</td> <td style="text-align: right;">8.124</td> <td style="text-align: right;">9.527</td> <td style="text-align: right;">8.156</td> </tr> <tr> <td>Current BES/ President's Budget</td> <td style="text-align: right;">9.692</td> <td style="text-align: right;">7.928</td> <td style="text-align: right;">9.297</td> <td style="text-align: right;">7.972</td> </tr> <tr> <td>Total Adjustments</td> <td style="text-align: right; border-top: 1px solid black;">-1.008</td> <td style="text-align: right; border-top: 1px solid black;">-0.196</td> <td style="text-align: right; border-top: 1px solid black;">-0.230</td> <td style="text-align: right; border-top: 1px solid black;">-0.184</td> </tr> <tr> <td colspan="5" style="padding-top: 10px;">Summary of Adjustments</td> </tr> <tr> <td> Congressional program reductions</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> Congressional undistributed reductions</td> <td></td> <td style="text-align: right;">-0.047</td> <td></td> <td></td> </tr> <tr> <td> Congressional rescissions</td> <td style="text-align: right;">-0.023</td> <td></td> <td></td> <td></td> </tr> <tr> <td> SBIR/STTR Transfer</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> Economic Assumptions</td> <td style="text-align: right;">-0.028</td> <td style="text-align: right;">-0.149</td> <td style="text-align: right;">-0.221</td> <td style="text-align: right;">-0.177</td> </tr> <tr> <td> Reprogrammings</td> <td style="text-align: right;">-0.957</td> <td></td> <td></td> <td></td> </tr> <tr> <td> Other Navy/OSD Adjustments</td> <td></td> <td></td> <td style="text-align: right;">-0.009</td> <td style="text-align: right;">-0.007</td> </tr> <tr> <td> Congressional increases</td> <td></td> <td></td> <td></td> <td></td> </tr> <tr> <td> Subtotal</td> <td style="text-align: right; border-top: 1px solid black; border-bottom: 1px solid black;">-1.008</td> <td style="text-align: right; border-top: 1px solid black; border-bottom: 1px solid black;">-0.196</td> <td style="text-align: right; border-top: 1px solid black; border-bottom: 1px solid black;">-0.230</td> <td style="text-align: right; border-top: 1px solid black; border-bottom: 1px solid black;">-0.184</td> </tr> </tbody> </table> <p style="margin-top: 20px;">(U) Schedule: Not applicable.</p> <p style="margin-top: 40px;">(U) Technical: Not applicable.</p>						FY 2002	FY 2003	FY 2004	FY 2005	(U) Funding:					Previous President's Budget:	10.700	8.124	9.527	8.156	Current BES/ President's Budget	9.692	7.928	9.297	7.972	Total Adjustments	-1.008	-0.196	-0.230	-0.184	Summary of Adjustments					Congressional program reductions					Congressional undistributed reductions		-0.047			Congressional rescissions	-0.023				SBIR/STTR Transfer					Economic Assumptions	-0.028	-0.149	-0.221	-0.177	Reprogrammings	-0.957				Other Navy/OSD Adjustments			-0.009	-0.007	Congressional increases					Subtotal	-1.008	-0.196	-0.230	-0.184
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(U) D. OTHER PROGRAM FUNDING SUMMARY:

Line Item No. & Name	FY 2002	FY 2003	FY 2004	FY 2005	FY 2006	FY 2007	FY 2008	FY 2009	To Complete	Total Cost
WPN/P1#6 \$	36.538	49.962	37.648	36.115	82.876	114.148	87.417	86.957	88.308	1,715.002
Quantity	55	100	53	46	101	150	140	150	87	2419
<u>Related RDT&E</u>										
PE 0207130F F-15										
PE 0204126N F/A-18 Squadrons										
PE 0207163F AMRAAM P3I										
PE 0207133F F-16										
PE 0604239F F-22										
PE 0207134F F-15E										

(U) E. ACQUISITION STRATEGY:

With the December 1997 merger of Raytheon and Hughes into the Raytheon Systems Company, the government implemented a new acquisition strategy labeled AMRAAM Vision 2000. The Vision 2000 strategy capitalizes on a multi-year hardware pricing agreement between Raytheon and the government under the auspices of the Department of Justice which supported the Raytheon/Hughes merger and a shift in government business practices toward a more "commercial" business arrangement. The lot 16 procurement contract award again includes an overarching price control strategy with Total System Performance Responsibility (TSPR) with the prime contractor, Raytheon Defense Systems Segment in Tucson, Arizona. The purchase includes missiles, warranties, spares, missile performance tracking, and reliability tests. Raytheon assumes responsibility for all specifications below missile performance. Also included in the Lot 16 contract are pre-priced options for Lots 17 thru 21 (FY2003 thru FY2007).

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Exhibit R-3 Cost Analysis (page 1)								DATE: February 2003				
APPROPRIATION/BUDGET ACTIVITY			PROGRAM ELEMENT			PROJECT NUMBER AND NAME						
RDT&E, N / BA-7			0207163N AMRAAM			E0981 AMRAAM						
Cost Categories	Contract Method & Type	Performing Activity & Location	Total PY s Cost	FY 03 Cost	FY 03 Award Date	FY 04 Cost	FY 04 Award Date	FY 05 Cost	FY 05 Award Date	Cost to Complete	Total Cost	Target Value of Contract
Primary Hardware Development	SS/CPAF	Raytheon, Tucson, AZ	26.082	4.414	11/02	5.579	11/03	4.406	11/04	1.514	41.995	41.995
Primary Hardware Development	WX	NAWC-AD Patuxent River MD		0.021	11/02	0.020	11/03	0.021	11/04	0.000	0.062	
Primary Hardware Development	WX	NAWC-WD Pt Mugu CA		0.072	11/02	0.070	11/03	0.072	11/04	0.000	0.214	
Primary Hardware Development	WX	NSWC Dahlgren VA		0.021	11/02	0.021	11/03	0.021	11/04	0.000	0.063	
Award Fees	SS/CPAF	Raytheon, Tucson, AZ	3.095	0.779	11/02	0.984	11/03	0.777	11/04	0.267	5.902	5.902
Prior Years Development/Acft Integ	Various	Various	19.650								19.650	
Subtotal Product Development			48.827	5.307		6.674		5.297		1.781	67.886	
Remarks: Prior year award fees were \$3.095 and are estimated to be approximately 15% of contract value for future years.												
Development Support	SS/FFP	JHU/APL Laurel MD		0.378	01/03	0.384	01/04	0.390	01/05	0.750	1.902	1.902
Development Support	RX	NSMA VA		0.875	12/02	0.900	12/03	0.926	12/04	1.050	3.751	
Development Support	WX	NAWC-WD Pt Mugu CA	8.577	0.051	10/02	0.050	10/03	0.050	10/04	0.000	8.728	
Subtotal Support			8.577	1.304		1.334		1.366		1.800	14.381	
Remarks:												

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Cost Categories	Contract Method & Type	Performing Activity & Location	Total PY s Cost	FY 03 Cost	FY 03 Award Date	FY 04 Cost	FY 04 Award Date	FY 05 Cost	FY 05 Award Date	Cost to Complete	Total Cost	Target Value of Contract
Developmental Test & Evaluation	WX	NAWC WD Pt Mugu CA	0.956	0.100	11/02	0.350	11/03	0.350	11/04	4.600	6.356	
Developmental Test & Evaluation	MIPR	Raytheon, Tucson, AZ		0.450	12/02	0.000		0.000			0.450	
Subtotal T&E			0.956	0.550		0.350		0.350		4.600	6.806	
Remarks:												
Program Management Support	WX	NAWC WD Pax River MD	2.188	0.513	10/02	0.680	10/03	0.696	10/04	1.377	5.454	
Travel	MIPR	PMA-259 Eglin AFB FL	0.950	0.254	10/02	0.259	10/03	0.263	10/04	0.794	2.520	
Subtotal Management			3.138	0.767		0.939		0.959		2.171	7.974	
Remarks:												
Total Cost			61.498	7.928		9.297		7.972		10.352	97.047	
Remarks:												

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Exhibit R-4, Schedule Profile
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