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Exhibit R-2, RDT&E Budget Item Justification: PB 2013 Navy	DATE: February 2012
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APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE							
1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>				PE 0603713N: <i>Ocean Engineering Tech Dev</i>							
COST (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total	FY 2014	FY 2015	FY 2016	FY 2017	Cost To Complete	Total Cost
Total Program Element	12.715	9.996	7.029	-	7.029	7.198	7.367	7.502	7.633	Continuing	Continuing
0099: <i>Deep Submergence Bio Med Dev</i>	3.121	3.507	3.538	-	3.538	3.619	3.696	3.760	3.824	Continuing	Continuing
0394: <i>Shallow Depth Diving EQ</i>	9.594	6.489	3.491	-	3.491	3.579	3.671	3.742	3.809	Continuing	Continuing

A. Mission Description and Budget Item Justification

Developments in this program will enable the U.S. Navy to overcome deficiencies that constrain underwater operations in the areas of search, location, rescue, recovery, salvage, construction, and protection of offshore assets. This program develops medical technology, diver life support equipment, and the vehicles, systems, tools, and procedures to permit manned underwater operations.

B. Program Change Summary (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total
Previous President's Budget	13.560	9.996	7.236	-	7.236
Current President's Budget	12.715	9.996	7.029	-	7.029
Total Adjustments	-0.845	-	-0.207	-	-0.207
• Congressional General Reductions	-	-			
• Congressional Directed Reductions	-	-			
• Congressional Rescissions	-	-			
• Congressional Adds	-	-			
• Congressional Directed Transfers	-	-			
• Reprogrammings	-	-			
• SBIR/STTR Transfer	-0.776	-			
• Program Adjustments	-	-	-0.207	-	-0.207
• Rate/Misc Adjustments	-	-	-	-	-
• Congressional General Reductions	-0.069	-	-	-	-
Adjustments					

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy									DATE: February 2012		
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)				R-1 ITEM NOMENCLATURE PE 0603713N: Ocean Engineering Tech Dev				PROJECT 0099: Deep Submergence Bio Med Dev			
COST (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total	FY 2014	FY 2015	FY 2016	FY 2017	Cost To Complete	Total Cost
0099: Deep Submergence Bio Med Dev	3.121	3.507	3.538	-	3.538	3.619	3.696	3.760	3.824	Continuing	Continuing
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0	0		

A. Mission Description and Budget Item Justification

This project:

- 1) Develops advanced biomedical and bioengineering technology for enhancing medical and life support for submarine escape and rescue;
- 2) Conducts research for diver health, safety and effectiveness; and
- 3) Supports deeper, longer, and more flexible dives.

Deliverables for DISSUB (disabled submarine) include: medical procedures for submarine escape and rescue (including new Submarine Rescue Diving and Recompression System (SRDRS)), life support parameters, medical procedures for life support, exposure guidance for atmospheric contaminants, non-chemical CO2 scrubbing, prevention and treatment of decompression illness, and senior survivor expert decision system.

Deliverables for diver enhancement include: exposure guidance for diver underwater continuous noise, impulse noise, and underwater blast, exposure guidance for oxygen breathing, collection of operational diving depth/time profiles to predict decompression risk, enhanced underwater swimming efficiency, enhanced diver thermal protection, and real-time decompression guidance.

Requirements: NAPDD #587-873, Deep Submergence Biomedical Development, 23 November 1999.

B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)

	FY 2011	FY 2012	FY 2013
Title: Deep Submergence Bio Med Dev - Diver Health and Safety	1.561	1.754	1.769
Articles:	0	0	0
<p>Description: Diver Health and Safety Research: Pulmonary oxygen toxicity exposure limits. Procedures for assessing and mitigating risk for diving in contaminated water. Procedure to determine remaining CO2 scrubber duration. Development of advanced insulation garments for diver thermal protection. Develop guidance for optimizing thermal control during decompression. Continue collection of operational dive profiles for advanced modeling. Novel methods for diver thermal protection. Improve resistance to O2 toxicity. Diver anthropometry. Chemical hardening of diving equipment. Predictive index of visual and auditory O2 toxicity. Guidelines for flying after diving. Guidelines for infra- and ultra-sound diver exposure. Develop an advanced diver thermal model. Electronic collection of operational dive data. Diver sound monitor. Investigation of diver in-water maladies, develop/improve real-time decompression guidance and dive planning.</p> <p>FY 2011 Accomplishments:</p>			

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B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)		FY 2011	FY 2012	FY 2013
Continue pulmonary oxygen toxicity exposure limits. Data collection of long-term health effects of Navy dives completed, now undergoing analyses. Continue the investigations into Immersion Pulmonary edema, Continue the effects of exercise, thermal environment, negative breathing on Nitrogen uptake and elimination. Continue dive data collection effort. Continue Topside Decompression Monitor. Continue investigations into probabilistic decompression models and dive planning. FY 2012 Plans: Continue human performance and pulmonary oxygen toxicity investigation and guidance for repeated long duration dives. Continue enhanced thermal protection efforts for divers. Continue probabilistic and deterministic models decompression algorithm investigation. Continue real-time decompression guidance and planning efforts. FY 2013 Plans: Continue evaluation of susceptibility to immersion pulmonary edema. Other projects to be approved in late FY2011 and FY2012.				
Title: Deep Submergence Bio Med Dev - Submarine Rescue Articles: Description: Submarine Rescue: Decompression procedures for pressurized SRDRS operators. Use of perfluorocarbons to accelerate decompression in submarine rescue. Adjunctive therapies for treating DISSUB survivors. Guidance for food, water, clothing, medical supplies to enhance survival of submarine crews awaiting rescue. Flexible computer generated decompression schedules for wide range of conditions in a DISSUB. Develop DISSUB triage procedures. DISSUB survival trial. Develop oxygen metabolizer for closed vehicles. Treatment guidance for decompression sickness and arterial gas embolism in submarine escape and rescue. Interventions for toxicological problems with rescued submariners. Minimizing decompression sickness and arterial gas embolism with Submarine Escape and Immersion Suit (SEIS) training. Use of pharmacologic agents to reduce decompression risk in submarine rescuees. Development of toxic gas analyzer for use in pressurized DISSUB. FY 2011 Accomplishments: Begin full-scale testing of the oxygen delivery system for pressurized DISSUB submariner decompression. Determine ascent rate of small stature personnel using submarine Escape Immersion Equipment (SEIE). Improving prediction for DISSUB Rescue using 70 kg swine dropout decompression from 50-30 fsw. Begin compilation of previously existing sheep and swine data for pressurized DISSUB decompression guidance. Continue development and evaluation of toxic gas analyzer for use in pressurized DISSUB. Begin negative pressure breathing to enhance nitrogen elimination during pressurized DISSUB rescue. FY 2012 Plans:		1.560 0	1.753 0	1.769 0

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy		DATE: February 2012	
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0099: <i>Deep Submergence Bio Med Dev</i>	
B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)		FY 2011	FY 2012
Continue prediction improvement for DISSUB Rescue using 70 kg swine dropout decompression from 50-30 fsw. Continue decompression enhancement using combined animal models for depths too risky for human subject testing. Continue negative pressure breathing to enhance nitrogen elimination during pressurized DISSUB rescue.			
FY 2013 Plans: To be determined based on projects selected in late FY 2011 and FY 2012.			
Accomplishments/Planned Programs Subtotals		3.121	3.507
C. Other Program Funding Summary (\$ in Millions) N/A			
D. Acquisition Strategy Integrated thrust area teams (e.g., decompression research) are established with university, commercial, and in-house Navy labs to jointly execute biomedical R&D. Peer review of research proposals accomplished by independent Technical Advisory Board. Annual review of progress by Executive Review Board (CNO/NAVSEA/ONR/BUMED). Program management by 0-6 Undersea Medical Officer. Contracting by competitive process using BAA and leveraging ONR capabilities.			
E. Performance Metrics Quarterly Program Reviews			

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2013 Navy											DATE: February 2012			
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)				R-1 ITEM NOMENCLATURE PE 0603713N: Ocean Engineering Tech Dev				PROJECT 0099: Deep Submergence Bio Med Dev						

Test and Evaluation (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Development Test & Evaluation	WR	NEDU:Panama City, FL	13.833	2.020	Oct 2011	2.040	Oct 2012	-		2.040	Continuing	Continuing	Continuing
Development Test & Evaluation	WR	NMRC:Silver Spring, MD	4.644	1.347	Oct 2011	1.358	Oct 2012	-		1.358	Continuing	Continuing	Continuing
Subtotal			18.477	3.367		3.398		-		3.398			

Management Services (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Program Management Support	Various	Various:Various	0.086	0.070	Oct 2011	0.070	Oct 2012	-		0.070	Continuing	Continuing	Continuing
Travel	Various	Various:Various	0.183	0.070	Oct 2011	0.070	Oct 2012	-		0.070	Continuing	Continuing	Continuing
*SBIR Assessment	Various	Various:Various	0.182	-		-		-		-	Continuing	Continuing	Continuing
Acquisition Workforce	Various	Various:Various	0.016	-		-		-		-	Continuing	Continuing	Continuing
Subtotal			0.467	0.140		0.140		-		0.140			

			Total Prior Years Cost	FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total	Cost To Complete	Total Cost	Target Value of Contract
Project Cost Totals			18.944	3.507		3.538		-		3.538			

Remarks

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Exhibit R-4, RDT&E Schedule Profile: PB 2013 Navy		DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603713N: Ocean Engineering Tech Dev	PROJECT 0099: Deep Submergence Bio Med Dev

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Exhibit R-4A, RDT&E Schedule Details: PB 2013 Navy			DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0099: <i>Deep Submergence Bio Med Dev</i>	

Schedule Details

Events by Sub Project	Start		End	
	Quarter	Year	Quarter	Year
Proj 0099				
FY11 DSBDP R&D Execution	1	2011	4	2011
FY12 Broad Agency Announcement Published (DSBDP R&D Priorities)	3	2011	3	2011
Invitation for FY12 Pre-Proposals	3	2011	3	2011
Submission of FY12 Pre-Proposals	3	2011	3	2011
Request for Full Proposals from Approved FY12 Pre-Proposals	3	2011	4	2011
Submission of FY12 Full Proposals	3	2011	4	2011
Full FY12 Proposal Review by DSBDP Technical Advisory Board (TAB)	4	2011	4	2011
TAB Meets to Prioritize DSBDP FY12 Proposals	4	2011	4	2011
Brief Sponsor on TAB Prioritized DSBDP FY12 R&D Program	4	2011	4	2011
Forward FY12 Proposal Approval Letters, Navy Lab Guidance Letters	4	2011	4	2011
FY12 DSBDP R&D Execution	1	2012	4	2012
FY13 Broad Agency Announcement Published (DSBDP R&D Priorities)	3	2012	3	2012
Invitation for FY13 Pre-Proposals	3	2012	3	2012
Submission of FY13 Pre-Proposals	3	2012	3	2012
Request for Full Proposals from Approved FY13 Pre-Proposals	3	2012	4	2012
Submission of FY13 Full Proposals	3	2012	4	2012
Full FY13 Proposal Review by DSBDP Technical Advisory Board (TAB)	4	2012	4	2012
TAB Meets to Prioritize DSBDP FY13 Proposals	4	2012	4	2012
Brief Sponsor on TAB Prioritized DSBDP FY13 R&D Program	4	2012	4	2012
Forward FY13 Proposal Approval Letters, Navy Lab Guidance Letters	4	2012	4	2012
FY13 DSBDP R&D Execution	1	2013	4	2013

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy									DATE: February 2012		
APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)				R-1 ITEM NOMENCLATURE PE 0603713N: Ocean Engineering Tech Dev				PROJECT 0394: Shallow Depth Diving EQ			
COST (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total	FY 2014	FY 2015	FY 2016	FY 2017	Cost To Complete	Total Cost
0394: Shallow Depth Diving EQ	9.594	6.489	3.491	-	3.491	3.579	3.671	3.742	3.809	Continuing	Continuing
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0	0		

A. Mission Description and Budget Item Justification

This project is to develop systems to support submarine escape, survivability, rescue missions, and conventional diver operations. Diver operations include ship husbandry, salvage/recovery, and submarine rescue operations to support national, as well as, Navy needs around the world. Modern certifiable diving systems that ensure diver safety and allow maximum work efficiency will replace currently antiquated systems. Efforts through FY15 focus on the Submarine Rescue Diving and Recompression System (SRDRS) to provide a new rapidly deployed emergency submarine rescue capability. SRDRS provides a new capability of pressurized transportation of rescuees from a stricken submarine directly to the decompression system replacing the Deep Submergence Rescue Vehicles and Mother Submarines. SRDRS includes an air transportable rapid Assessment/Underwater Work System (AUWS), a Pressurized Rescue Module (PRM) or Rescue Capable System (RCS), and a Submarine Decompression System (SDS). The AUWS is a manned system that provides intervention system capability. To reduce operational risk, an initiative is in process to transition from AUWS to an unmanned Remote Operated Vehicle (ROV). Intervention assets support clearing disabled submarine seating surfaces, delivery of emergency life support stores, and disabled submarine assessment. The Submarine Rescue System-Rescue Capable System (SRS-RCS) completed OPEVAL in FY08 and is rescue ready. The Submarine Rescue System-Submarine Decompression System (SRS-SDS) is scheduled for IOC in FY15. The SRDRS will provide a global rapid response capability to support submarine rescue missions with an increase in capability at a fraction of the cost of the currently available systems.

Shallow Depth Diving Equipment managed under SEA00C - This project develops systems to support submarine escape and rescue missions, and conventional diver operations. Diver operations include ship husbandry, salvage/recovery, and submarine rescue operations to support national, as well as Navy, needs around the world. Modern certifiable diving systems that ensure diver safety and allow maximum work efficiency will replace currently antiquated systems. R&D will be performed in the areas of contaminated water diving, diver thermal protection, and diver sound protection.

B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)

	FY 2011	FY 2012	FY 2013
Title: Shallow Depth Diving EQ - SRDRS	8.435	5.273	2.268
Articles:	0	0	0
Description: Continue design, fabrication, and acceptance testing of the prototype Submarine Decompression System and support equipment. Continue integration of all SRDRS components.			
FY 2011 Accomplishments: Continued design/development/fabrication of Submarine Decompression System Primary Elements including: Submarine Decompression Chamber 1 and 2 repairs and modifications; Pressurized Flexible Manways 1, 2, and 3; Deck Transfer Lock; and Mission and Auxiliary Support Equipment. Performed developmental testing for Deck Interconnects and Submarine			

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy		DATE: February 2012	
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0394: <i>Shallow Depth Diving EQ</i>	
B. Accomplishments/Planned Programs (\$ in Millions, Article Quantities in Each)		FY 2011	FY 2012
Decompression Chambers 1 and 2, and Pressurized Flexible Manways 1 and 2. Plan to complete material audits for Deck Interconnects. FY 2012 Plans: Continue design/development/fabrication of Submarine Decompression System Primary Elements including: Submarine Decompression Chamber 1 and 2 repairs and modifications; Pressurized Flexible Manways 1, 2, and 3; Deck Transfer Lock; and Mission and Auxiliary Support Equipment. Plan to complete material audits for Submarine Decompression System Ship Interface Template Sets, Pressurized Flexible Manways 1,2, and 3, Deck Transfer Lock, Submarine Decompression Chambers 1 and 2, and Morgan Breathing System 2000. Plan to perform developmental testing for Modified Transfer Lock, Ship Interface Template Sets, Pressurized Flexible Manways 1, 2, and 3, Morgan Breathing System 2000, and the Deck Transfer Lock. FY 2013 Plans: Plan to complete system configuration audit for the Submarine Rescue System - Transfer Under Pressure. Plan to perform integration and sea-trials testing including shipment to Deep Submergence Unit, San Diego.			
Title: Shallow Depth Diving EQ - Diving Articles: Description: Continue research on contaminated water diving and research on diver thermal protection and CO2 monitors, and diver sound protection. FY 2011 Accomplishments: Continue research on contaminated water diving, CO2 monitors, and diver sound protection. Continue research on the prototype diver cooling system. Continue research on validation of air and oil monitors. FY 2012 Plans: Continue research on contaminated water diving, diver thermal protection, CO2 monitors, and diver sound protection. Continue the research on prototype diver cooling system. Continue research on validation of air and oil monitors. FY 2013 Plans: To be determined based on projects selected in late FY2011 and FY2012.		1.159 0	1.216 0
		1.223 0	
Accomplishments/Planned Programs Subtotals		9.594	6.489
C. Other Program Funding Summary (\$ in Millions) N/A			

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Exhibit R-2A, RDT&E Project Justification: PB 2013 Navy		DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0394: <i>Shallow Depth Diving EQ</i>
<u>D. Acquisition Strategy</u> <p>The Submarine Rescue system (SRS) segment of the SRDRS is largely based on the use of Commercial-Off-the-Shelf (COTS) technology and maximum use of Non-Developmental Items (NDI). The SRS segment is being procured using performance based specifications. Many of the SRS contracts were awarded competitively and were based on technical capability and cost considerations (best value). Program management of SRDRS is accomplished through the use of Program Executive Officer, Submarines (PEO SUB) leadership. This change was enacted in February 2003 realigning the responsibility from SEA00C to PEOSUB. The Prototype system provides full operational capability and no additional procurement is planned. The system is designed to be Government Owned/Commercially Operated/Commercially Maintained (GO/CO/CM).</p>		
<u>E. Performance Metrics</u> <p>Quarterly Program Reviews and Critical Design Reviews.</p>		

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Exhibit R-3, RDT&E Project Cost Analysis: PB 2013 Navy **DATE:** February 2012

APPROPRIATION/BUDGET ACTIVITY 1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0603713N: Ocean Engineering Tech Dev	PROJECT 0394: Shallow Depth Diving EQ
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Product Development (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Pressurized Rescue Module System (PRMS)	C/CPIF	Oceanworks:Ontario, Canada	23.824	-		-		-		-	0.000	23.824	
PRMS	C/FFP	Oceanworks:Ontario, Canada	4.150	-		-		-		-	0.000	4.150	
Systems Engineering - Design, Integration	C/CPAF	Oceaneering:Hanover, MD	21.155	0.424	Oct 2011	0.427	Oct 2012	-		0.427	Continuing	Continuing	Continuing
Systems Engineering - Technical	Various	Various:Various	0.537	-		-		-		-	Continuing	Continuing	Continuing
Systems Engineering - Design, Integration	C/CPAF	Oceaneering:Hanover, MD	1.986	2.014	Feb 2012	0.184	Jan 2013	-		0.184	0.000	4.184	
Systems Engineering - Design, Integration	C/CPAF	Oceaneering:Hanover, MD	2.145	1.289	Apr 2012	0.187	Apr 2013	-		0.187	0.000	3.621	
Systems Engineering - Design & Integration	C/CPAF	Oceaneering:Hanover, MD	0.635	0.309	Sep 2012	0.067	Sep 2013	-		0.067	0.000	1.011	
Subtotal			54.432	4.036		0.865		-		0.865			

Remarks

- Oceaneering is the prime for SRDRS Transfer Under Pressure (TUP) capability; scheduled for IOC in FY15.

Support (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Development Support	Various	Various:Various	4.806	1.035	Oct 2011	1.158	Oct 2012	-		1.158	Continuing	Continuing	Continuing
Integrated Logistics Support	Various	Various:Various	0.841	-		-		-		-	Continuing	Continuing	Continuing
Configuration Management	C/CPAF	Oceaneering:Hanover, MD	0.489	-		-		-		-	Continuing	Continuing	Continuing
Subtotal			6.136	1.035		1.158		-		1.158			

Remarks

- Items citing various are contracts issued to multiple government activities. Competitions for these efforts are in process.

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APPROPRIATION/BUDGET ACTIVITY				R-1 ITEM NOMENCLATURE				PROJECT					
1319: Research, Development, Test & Evaluation, Navy BA 4: Advanced Component Development & Prototypes (ACD&P)				PE 0603713N: Ocean Engineering Tech Dev				0394: Shallow Depth Diving EQ					
Test and Evaluation (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Developmental Test & Evaluation	Various	Various:Various	3.187	-		-		-		-	Continuing	Continuing	Continuing
Operational Test & Evaluation	WR	COMOPTEVFOR:Norfolk, VA	0.575	0.050	Oct 2011	0.080	Oct 2012	-		0.080	Continuing	Continuing	Continuing
Subtotal			3.762	0.050		0.080		-		0.080			
Management Services (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total			
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract
Contractor Engineering Support	Various	QBS/Various:Richmond BC, Canada/Various	0.074	-		-		-		-	Continuing	Continuing	Continuing
Government Engineering Support	WR	NFESC:Port Hueneme, CA	0.197	-		-		-		-	Continuing	Continuing	Continuing
Government Engineering Support	WR	PSNSY/ Various:Bremerton, WA/Various	2.197	-		-		-		-	Continuing	Continuing	Continuing
Government Engineering Support	Various	Various:Various	1.859	-		-		-		-	Continuing	Continuing	Continuing
Program Management Support	Various	Perot:Washington, DC	2.110	-		-		-		-	Continuing	Continuing	Continuing
Travel	Various	NAVSEA:Washington, DC	0.589	0.165	Oct 2011	0.165	Oct 2012	-		0.165	Continuing	Continuing	Continuing
SBIR Assessment	Various	Various:Various	0.443	-		-		-		-	Continuing	Continuing	Continuing
Acquisition Workforce	Various	Various:Various	0.021	-		-		-		-	Continuing	Continuing	Continuing
Program Management Support	Various	Various:Various	0.430	0.448	Oct 2011	0.421	Oct 2012	-		0.421	0.000	1.299	
Program Management Support	Various	Various:Various	0.269	0.280	Jan 2012	0.263	Jan 2013	-		0.263	0.000	0.812	
Program Management Support	Various	Various:Various	0.377	0.348	Apr 2012	0.276	Apr 2013	-		0.276	0.000	1.001	

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Management Services (\$ in Millions)				FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total				
Cost Category Item	Contract Method & Type	Performing Activity & Location	Total Prior Years Cost	Cost	Award Date	Cost	Award Date	Cost	Award Date	Cost	Cost To Complete	Total Cost	Target Value of Contract	
Government Engineering Support	WR	PNSY:Portsmouth, NH	-	0.127	Oct 2011	0.263	Oct 2012	-		0.263	0.000	0.390		
Subtotal			8.566	1.368		1.388		-		1.388				
Remarks Items citing various are due to contract competitions in process.														
			Total Prior Years Cost	FY 2012		FY 2013 Base		FY 2013 OCO		FY 2013 Total	Cost To Complete	Total Cost	Target Value of Contract	
Project Cost Totals			72.896	6.489		3.491		-		3.491				
Remarks														

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Exhibit R-4, RDT&E Schedule Profile: PB 2013 Navy		DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0394: <i>Shallow Depth Diving EQ</i>

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Exhibit R-4A, RDT&E Schedule Details: PB 2013 Navy			DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 1319: <i>Research, Development, Test & Evaluation, Navy</i> BA 4: <i>Advanced Component Development & Prototypes (ACD&P)</i>	R-1 ITEM NOMENCLATURE PE 0603713N: <i>Ocean Engineering Tech Dev</i>	PROJECT 0394: <i>Shallow Depth Diving EQ</i>	

Schedule Details

Events by Sub Project	Start		End	
	Quarter	Year	Quarter	Year
Proj 0394				
Acquisition Milestones	1	2011	4	2017
SRDRS IOC	3	2015	3	2015
Design & Development-SDS Primary Elements	1	2011	4	2012
SDC 1 & 2 Repairs & Modifications	1	2011	1	2012
PFM 1 & 2	1	2011	1	2012
PFM 3	1	2011	4	2012
DTL	1	2011	4	2012
SDS MSE & AE	1	2011	4	2012
MBS 2000 Base Unit Upgrades	1	2011	1	2011
SDS Deck Interconnects (54)	1	2011	1	2011
SDS Templates (SDS SITS)	1	2011	4	2012
SDS Templates (SDS SITS) CDR	3	2011	3	2011
MTL 1 & 2 Mods & Base SITS	1	2011	4	2012
MTL 1 & 2 Mods & Base SITS CDR	3	2011	3	2011
Configuration Audits	1	2011	2	2013
Material Audits (PCAs)	1	2011	4	2012
System Integration Audits (FCAs)	2	2013	2	2013
T&E Milestones	1	2011	2	2015
Developmental Testing (SDS Elements)	1	2011	4	2012
Integration & Sea Trials Testing	1	2011	2	2014
SDS Element Integration @ OII	1	2011	3	2013

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Exhibit R-4A, RDT&E Schedule Details: PB 2013 Navy

DATE: February 2012

APPROPRIATION/BUDGET ACTIVITY

1319: Research, Development, Test & Evaluation, Navy
BA 4: Advanced Component Development & Prototypes (ACD&P)

R-1 ITEM NOMENCLATURE

PE 0603713N: *Ocean Engineering Tech Dev*

PROJECT

0394: *Shallow Depth Diving EQ*

	Start		End	
Events by Sub Project	Quarter	Year	Quarter	Year
Ship to DSU	3	2013	3	2013
SRS System Integration @ DSU	3	2013	2	2014
OPEVAL & ORE	1	2014	2	2015
Post Delivery Shakedown	1	2011	2	2016
Preplanned Product Improvements (RCS & TUP)	1	2015	4	2017