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Exhibit R-2, RDT&E Budget Item Justification: PB 2015 Office of Secretary Of Defense										Date: March 2014		
Appropriation/Budget Activity 0400: Research, Development, Test & Evaluation, Defense-Wide I BA 3: Advanced Technology Development (ATD)					R-1 Program Element (Number/Name) PE 0603133D8Z I Foreign Comparative Testing							
COST (\$ in Millions)	Prior Years	FY 2013	FY 2014	FY 2015 Base	FY 2015 OCO #	FY 2015 Total	FY 2016	FY 2017	FY 2018	FY 2019	Cost To Complete	Total Cost
Total Program Element	-	-	-	30.000	-	30.000	15.363	15.290	15.449	17.726	Continuing	Continuing
P313: Foreign Comparative Testing	-	-	-	30.000	-	30.000	15.363	15.290	15.449	17.726	Continuing	Continuing

The FY 2015 OCO Request will be submitted at a later date.

Note

Rapid Fielding (RF) and Comparative Test is being recast with a focus on operational and developmental prototypes derived from evaluation of foreign equipment and products that will provide the United States Armed Services and Special Operations Command (SOCOM) capabilities to counter emerging threats. The Foreign Comparative Testing (FCT) program will increase its focus on finding and leveraging foreign technology solutions that affordably extend the life of existing military platforms/capabilities, and enhance interoperability with foreign partners and between services. FCT's broad reach across our allies and friendly foreign countries will enable finding and developing innovative, cost effective, and potentially interoperable solutions for the DoD, Multi-Service and Combatant Command (COCOM) priority requirements.

In FY 2015, Foreign Comparative Testing (FCT) funding from Program Element (PE) 0605130D8Z is being realigned to PE 0603133D8Z for Budget Activity alignment and emphasis on prototypes.

A. Mission Description and Budget Item Justification

The Foreign Comparative Testing (FCT) program supports the warfighter by leveraging technologies and equipment from allied nations and coalition partners to satisfy U.S. defense requirements, thereby accelerating the United Sates acquisition process and lowering development costs. The FCTs enhance interoperability, facilitate international collaboration, expand opportunities for prototyping to increase competition in innovation and enable more efficient and affordable transition of technologies into acquisition programs of record. Authorized by Title 10, U.S. Code, Section 2350a (g), the FCT program is managed by the Office of Secretary of Defense (Deputy Assistant Secretary of Defense (DASD) Rapid Fielding), Comparative Technology Office (CTO). The FCT projects are sponsored by the Services and SOCOM. Evaluation processes for project selection include a detailed review to confirm the proposed item addresses valid requirements and DoD priorities, a thorough market survey, and development of a viable acquisition strategy.

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Appropriation/Budget Activity 0400: <i>Research, Development, Test & Evaluation, Defense-Wide I BA 3: Advanced Technology Development (ATD)</i>	R-1 Program Element (Number/Name) PE 0603133D8Z / <i>Foreign Comparative Testing</i>
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B. Program Change Summary (\$ in Millions)	FY 2013	FY 2014	FY 2015 Base	FY 2015 OCO	FY 2015 Total
Previous President's Budget	-	-	-	-	-
Current President's Budget	-	-	30.000	-	30.000
Total Adjustments	-	-	30.000	-	30.000
• Congressional General Reductions	-	-			
• Congressional Directed Reductions	-	-			
• Congressional Rescissions	-	-			
• Congressional Adds	-	-			
• Congressional Directed Transfers	-	-			
• Reprogrammings	-	-			
• SBIR/STTR Transfer	-	-			
• Transfer from PE 0605130D8Z	-	-	21.285	-	21.285
• DoD Priorities and Requirements	-	-	8.715	-	8.715

Change Summary Explanation

FY 2015: Increase of \$30.000 million reflects the \$21.285 million realignment from PE 0605130D8Z and the \$8.175 million provided to support DoD priorities and requirements for prototypes designed to counter current and emerging cross-domain (air, space, sea, cyber, etc.) threats that affect Joint and Coalition operations.

UNCLASSIFIED

Exhibit R-2A, RDT&E Project Justification: PB 2015 Office of Secretary Of Defense										Date: March 2014		
Appropriation/Budget Activity 0400 / 3					R-1 Program Element (Number/Name) PE 0603133D8Z / Foreign Comparative Testing				Project (Number/Name) P313 / Foreign Comparative Testing			
COST (\$ in Millions)	Prior Years	FY 2013	FY 2014	FY 2015 Base	FY 2015 OCO #	FY 2015 Total	FY 2016	FY 2017	FY 2018	FY 2019	Cost To Complete	Total Cost
P313: Foreign Comparative Testing	-	-	-	30.000	-	30.000	15.363	15.290	15.449	17.726	Continuing	Continuing
# The FY 2015 OCO Request will be submitted at a later date.												
A. Mission Description and Budget Item Justification												
The Foreign Comparative Testing (FCT) program supports the warfighter by leveraging advanced technologies and equipment from allied nations and coalition partners to satisfy U.S. defense requirements, thereby accelerating the U.S. acquisition process and lowering development costs. The FCTs enhance interoperability, facilitate international collaboration, expand opportunities for prototyping and enable more efficient and affordable transition of technologies into acquisition programs of record. Authorized by Title 10, U.S. Code, Section 2350a(g), the FCT program is managed by the Office of Secretary of Defense (OSD), Deputy Assistant Secretary of Defense (DASD) Rapid Fielding (RF), Comparative Technology Office (CTO). The FCT projects are sponsored by the Services and U.S. Special Operations Command (USSOCOM). Evaluation processes for project selection include a detailed review to confirm the proposed item addresses valid requirements and DoD priorities, a thorough market survey, and development of a viable acquisition strategy.												
Since the program's inception in 1980, OSD has initiated 671 projects; 619 projects have been completed to date. Of the 324 evaluations that met the sponsors' requirements, 252 led to procurements worth approximately \$11.000 billion in FY 2013 constant year dollars. With an OSD investment of about \$1.170 billion, the FCT Program realized an estimated research, development, test, and evaluation (RDT&E) cost avoidance of \$7.800 billion in FY 2013 constant year dollars.												
The FCT program is a catalyst for teaming and other business relationships between foreign and U.S. industries. Many successful FCT projects result in the licensed production of the qualified foreign item in the United States. Other nations recognize the long-term value of such practices for competing in the United States defense market and the resultant strengthening of the "two-way street" in Defense procurement. The result often means the creation of jobs and contributions to local economies throughout the United States. To date, companies across 33 states benefited from FCT projects.												
B. Accomplishments/Planned Programs (\$ in Millions)									FY 2013	FY 2014	FY 2015	
Title: Lightweight M3A1 Recoilless Rifle (Army)									-	-	1.700	
Description: The current M3 Carl Gustaf Recoilless Rifle was introduced to US forces in 1991. The original version used a thin steel barrel liner containing the rifling, strengthened by a carbon fiber outer sleeve. External steel parts were eventually replaced with aluminum alloys or plastics thereby reducing the weapon weight from 36 pounds to 21 pounds. At 21 pounds the weapon is extremely heavy, especially when also carrying 84mm ammunition. This M3A1 project will eliminate 6 pounds (28 percent) from the existing system by replacing various components (bolt, trigger, venturi, and ancillary parts) without changing the firing procedures, operations or ammunition. Since the weapons' operational characteristics will not be changed, this low risk approach will produce a lighter weight 84mm shoulder fired weapon without going through a costly and time consuming process to test,												

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B. Accomplishments/Planned Programs (\$ in Millions)		FY 2013	FY 2014	FY 2015
qualify, and re-certify an entirely new modernized weapon system. This is continuing project which was previously funded during FY 2014 in PE 0605130D8Z.				
FY 2015 Plans: Continue hardware testing, developmental testing and operational testing. Write an evaluation report, the closeout report, and determine an acquisition decision.				
Title: Mobile Gunnery Live Fire Monitoring System (MGLFMS) (Navy) Description: The project will test and evaluate a Tank and Infantry Fighting Vehicle gunnery training system that wirelessly transmits live audio and video feeds of weapon systems data to a mobile monitoring station. The MGLFMS enables instructors to evaluate crew functions, make instantaneous corrections, and provides recording capability for detailed after action reviews. Foreign data has shown that training with this system significantly increases probability of gunnery crews placing first round on target. The system also provides an essential tool for instructors to evaluate and make the necessary feedback to ensure the analytical abilities that encompasses all the gunnery skills required for accurate fire. Several North Atlantic Treaty Organization (NATO) allies currently train with this same equipment. This is continuing project which was previously funded during FY 2014 in PE 0605130D8Z. FY 2015 Plans: Receive Phase I test articles during 1Q FY 2015. Initiate Phase I Technical Testing throughout 1Q – 3Q FY 2015. Receive Phase II test articles during 3Q FY 2015. Initiate Phase II Performance Testing during 3Q FY 2015. Initiate Phase II Field User Evaluation during 4Q FY 2015.		-	-	1.000
Title: Minor Resource Projects: Description: Multifunctional Information Distribution System (MIDS) Joint Tactical Radio System (JTRS) Radio Frequency Amplifier (RFA) (Navy); Energy Absorbing Material for Improved Blunt Impact/Blunt Trauma Protection (Army); Computer Network Defense (CND) Advanced Persistent Threat (APT) Detection (Navy); H-1 Crash-resistant, Ballistic-tolerant, Fuel Cell Qualification (Navy); Rapid Airfield Damage Assessment System (RADAS) (Air Force); Electronic Underwater Navigation (United States Special Operations Command (USSOCOM)); and Enhanced Optical and Transceiver Capability. These continuing projects were previously funded during FY 2014 in PE 0605130D8Z. FY 2015 Plans: The following projects will finalize testing, receive articles, and complete reporting and transition plans: Multifunctional Information Distribution System (MIDS) Joint Tactical Radio System (JTRS) Radio Frequency Amplifier (RFA); Energy Absorbing Material for Improved Blunt Impact/Blunt Trauma Protection; Computer Network Defense (CND) Advanced Persistent Threat (APT) Detection		-	-	3.150

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B. Accomplishments/Planned Programs (\$ in Millions)		FY 2013	FY 2014	FY 2015
(Navy); H-1 Crash-resistant, Ballistic-tolerant, Fuel Cell Qualification; Rapid Airfield Damage Assessment System (RADAS); Electronic Underwater Navigation; and Enhanced Optical and Transceiver Capability.				
Title: Foreign Comparative Testing (FCT) FY 2015 Focal Areas: Force Application Description: FCT will invest in cross-domain, innovative Force Application technologies for new and emerging capabilities with international partners, including but not limited to these defense-wide requirements: Anti-Access / Area Denial (A2/AD); Robotics and Autonomous Systems; Interoperability across Platforms and Systems; and Countering Unmanned Systems. FY 2015 Plans: During FY 2015, FCT will focus on selecting projects supporting the below Force Application Areas: -Anti-Access / Area Denial (A2/AD) will provide innovative technologies that enhance position, navigation and timing accuracies, improve targeting/delivery in GPS-denied environments and prevent exploitation of systems lost in denied areas (e.g., anti-tamper capabilities). -Robotics and Autonomous Systems will remotely control assets that reduce troop tasks and exposure for daily operations, including force protection, special operations, and detection. -Interoperability across Platforms and Systems invest into technologies for mission-based on-demand routing, network, and information management, with a focus on command and control interoperability with coalition capabilities through integrated multi-level security enabled networks. Transition of Modular Open Systems Approach (MOSA) capabilities which are portable, modular, partitioned, scalable, extendable, and secure. -Countering Unmanned Systems (Unmanned Aerial Vehicles (UAVs), Unmanned Underwater Vehicle (UUVs), and Unmanned Surface Vehicles (USVs)) will provide technologies that detect, monitor, and counter hostile threats with small signatures, including special operations missions in surface, underwater and onshore environments.		-	-	9.750
Title: Foreign Comparative Testing (FCT) FY 2015 Focal Areas: Force Logistics Description: FCT will invest in cross-domain, innovative Force Logistic technologies for new and emerging capabilities with international partners, including but not limited to these defense-wide requirements: Reducing Soldier Load and Interoperability across Platforms and Systems. FY 2015 Plans: During FY 2015, FCT will focus on selecting projects supporting the below Force Logistics Areas: -Reducing soldier load reduces the weight currently sustained by the individual dismounted soldier, including materials that enable weight reduction to individual weapons, ammunition, or portable missile systems. -Interoperability across Platforms and Systems will invest into technologies for mission-based on-demand routing, network, and information management, with a focus on command and control interoperability with coalition capabilities through integrated multi-		-	-	7.200

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B. Accomplishments/Planned Programs (\$ in Millions)		FY 2013	FY 2014
level security enabled networks. Transition of Modular Open Systems Approach (MOSA) capabilities which are portable, modular, partitioned, scalable, extendable, and secure.			
Title: Foreign Comparative Testing (FCT) FY 2015 Focal Areas: Force Support		-	-
Description: FCT will invest in cross-domain, innovative Force Support evaluation of new and emerging capabilities with international partners, including but not limited to these defense-wide requirements: Increase Human Performance, Energy Solutions, and Training Systems.			7.200
FY 2015 Plans: During FY 2015, FCT will focus on selecting projects supporting the below Force Support Areas: -Increasing human performance involves developing and demonstrating advanced technologies to assess and optimize human cognitive load during combat operations and training. Increasing human performance will also utilize cognitive-load assessment technologies to enhance training of tasks with high cognitive load such as in aviation operations, combined arms engagements, mission command, air and missile defense, or multiple intelligence sensor training. -Energy solutions will include power systems and electronics designed for extreme cold to support Arctic strategy and renewable energy options that can reduce force support and logistics requirements. -Training Systems will demonstrate augmented reality capability that allows representation of fixed objects from a synthetic terrain environment and ability to overlay those objects within the augmented reality display.			
Accomplishments/Planned Programs Subtotals		-	30.000
C. Other Program Funding Summary (\$ in Millions) N/A			
Remarks			
D. Acquisition Strategy N/A			
E. Performance Metrics In FY 2015, generic performance metrics applicable to these RDT&E initiatives includes attainment of DoD Strategic Objective 3.5.2D. The title of this objective is "Maintain a strong technical foundation within the Department's Science and Technology (S&T) program" and the metrics for this objective is to transition 40 percent of completing demonstration programs per year. Since the program's inception in 1980, Office of Secretary of Defense has invested about \$1.170 billion in FY2013 constant year dollars to initiate 671 projects; 619 projects have been completed to date. Of the 324 evaluations that met the sponsors' requirements, 252 led to procurements worth over \$11.000 billion. In FY 2013, efforts in FCT Program Element 0605130D8Z had a transition rate of 84 percent for completed projects, exceeding the objective of 40 percent for demonstration programs.			