Exhibit R-2, RDT&E Budget Item Justification: PB 2013 Air Force

R-1 ITEM NOMENCLATURE

3600: Research, Development, Test & Evaluation, Air Force

APPROPRIATION/BUDGET ACTIVITY

PE 0604436F: Next-Generation MILSATCOM Technology

BA 4: Advanced Component Development & Prototypes (ACD&P)

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	19.898	-	-	-	-	-	-	-	-	Continuing	Continuing
646001: Evolved MILSATCOM	19.898	-	-	-	-	-	-	-	-	Continuing	Continuing
Quantity of RDT&E Articles	0	0	0	0	0	0	0	0	0		

Note

A. Mission Description and Budget Item Justification

This program element funds technology demonstration, development and study efforts for future Satellite Communications (SATCOM) capability enhancements. These capabilities could be utilized on future blocks of current SATCOM systems, hosted SATCOM payloads, or next-generation SATCOM systems. The goal of the effort is to sufficiently mature new technologies, system architectures, and business concepts to reduce overall risk of future SATCOM efforts and improve space/ground/ terminal synchronization. No funds are requested in FY13.

B. Program Change Summary (\$ in Millions)	FY 2011	FY 2012	FY 2013 Base	FY 2013 OCO	FY 2013 Total
Previous President's Budget	-	-	-	-	-
Current President's Budget	19.898	-	-	-	-
Total Adjustments	19.898	-	=	-	-
 Congressional General Reductions 	-	-			
 Congressional Directed Reductions 	-	-			
 Congressional Rescissions 	-	-			
Congressional Adds	-	-			
 Congressional Directed Transfers 	-	-			
Reprogrammings	-	-			
SBIR/STTR Transfer	-	-			
Other Adjustments	19.898	-	-	-	-

Congressional Add Details (\$ in Millions, and Includes General Reductions)

Project: 646001: Evolved MILSATCOM

Congressional Add: Acquisition Planning and Studies

	FY 2011	FY 2012	
	19.898	-	
Congressional Add Subtotals for Project: 646001	19.898	-	
Congressional Add Totals for all Projects	19.898	-	

DATE: February 2012

PE 0604436F: Next-Generation MILSATCOM Technology Air Force

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Exhibit R-2, RDT&E Budget Item Justification: PB 2013 Air Force

R-1 ITEM NOMENCLATURE

APPROPRIATION/BUDGET ACTIVITY

PE 0604436F: Next-Generation MILSATCOM Technology

DATE: February 2012

3600: Research, Development, Test & Evaluation, Air Force BA 4: Advanced Component Development & Prototypes (ACD&P)

Advanced Component Development & Frototypes (ACD&F

Change Summary Explanation

FY11 Other Adjustment Row:

- -\$0.102M Congressional General Reduction
- +\$20.0M Congressional Add

C. Accomplishments/Planned Programs (\$ in Millions)	FY 2011	FY 2012
Congressional Add: Acquisition Planning and Studies	19.898	-
FY 2011 Accomplishments: Funded the extension of three commercial Broad Agency Announcement studies. Funded support of the Resilient Basis for Satellite Communications (RBS) in Joint Operations study and other related activities. The RBS will assess the future of satellite communications within the context of the National Security Space Strategy in the nuclear, contested, and benign operating environments and will focus on worldwide protected and wideband communications services. Funded Lincoln Laboratories development of a Local Area Sensor System (LASS) processor for a future MILSATCOM satellite.		
Congressional Adds Subtotals	19.898	-

D. Other Program Funding Summary (\$ in Millions
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			FY 2013	FY 2013	FY 2013					Cost To	
<u>Line Item</u>	FY 2011	FY 2012	<u>Base</u>	OCO	<u>Total</u>	FY 2014	FY 2015	FY 2016	FY 2017	Complete To	tal Cost
• R-30: <i>RDT&E AF, PE 0603430F,</i>	385.033	276.675	175.578	0.000	175.578	64.357	38.167	0.000	0.000	0.000 6,	932.493
Advanced EHF MILSATCOM											
(SPACE), BPAC 644050											
• R30: <i>RDT&E AF, PE 0603430F,</i>	0.000	120.771	53.593	0.000	53.593	89.500	100.867	120.365	100.087	Continuing Co	ontinuing
Advanced EHF MILSATCOM											
(SPACE), BPAC 64A030											
• P-15: <i>MPAF, PE 0303604F,</i>	256.863	551.458	557.205	0.000	557.205	543.036	487.802	698.306	1,039.230	Continuing Co	ontinuing
Advanced EHF											
• R-39: <i>RDT&E AF, PE 0603854F,</i>	56.683	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	0.000	411.339
Wideband Global SATCOM											
• P-17: <i>MPAF, PE 0303600F,</i>	558.752	792.857	36.835	0.000	36.835	60.998	88.200	86.396	85.800	38.000 3,	375.899
Wideband Gapfiller Satellites											
• R-180: <i>RDT&E AF, PE 0303601F,</i>	298.736	236.581	107.237	0.000	107.237	157.787	58.209	8.202	8.310	Continuing Co	ontinuing
MILSATCOM Terminals											
• P-46: <i>OPAF</i> , <i>PE 0303601F</i> ,	186.263	36.229	47.333	0.000	47.333	37.674	80.191	138.021	130.982	Continuing Co	ontinuing
MILSATCOM Terminals											

PE 0604436F: Next-Generation MILSATCOM Technology Air Force

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Exhibit R-2, RDT&E Budget Item Justification: PB 2013 Air Force

DATE: February 2012

APPROPRIATION/BUDGET ACTIVITY

R-1 ITEM NOMENCLATURE

3600: Research, Development, Test & Evaluation, Air Force

PE 0604436F: Next-Generation MILSATCOM Technology

BA 4: Advanced Component Development & Prototypes (ACD&P)

D. Other Program Funding Summary (\$ in Millions)

			FY 2013	FY 2013	FY 2013					Cost To	
<u>Line Item</u>	FY 2011	FY 2012	Base	OCO	Total	FY 2014	FY 2015	FY 2016	FY 2017	Complete	Total Cost
• TBD: <i>APAF, PE 0303601F,</i>	12.030	3.821	4.580	0.000	4.580	4.320	77.174	204.981	180.096	Continuing	Continuing
MILSATCOM Terminals											

E. Acquisition Strategy

Upon completion of the Resilient Basis for SATCOM in Joint Operations study, a Materiel Development Decision (MDD) will be conducted which will determine the mix of enhancments to existing systems and potential for incorporating new military-unique and/or commercial capabilities.

F. Performance Metrics

Please refer to the Performance Base Budget Overview Book for information on how Air Force resources are applied and how those resources are contributing to Air Force performance goals and most importantly, how they contribute to our mission.

PE 0604436F: Next-Generation MILSATCOM Technology Air Force

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Exhibit R-4, RDT&E Schedule Profile: PB 2013 Air Force		DATE: February 2012
APPROPRIATION/BUDGET ACTIVITY 3600: Research, Development, Test & Evaluation, Air Force BA 4: Advanced Component Development & Prototypes (ACD&P)	R-1 ITEM NOMENCLATURE PE 0604436F: Next-Generation MILSATCOM Technology	PROJECT 646001: Evolved MILSATCOM

PE 0604436F: *Next-Generation MILSATCOM Technology* Air Force

DATE: February 2012 Exhibit R-4A, RDT&E Schedule Details: PB 2013 Air Force

APPROPRIATION/BUDGET ACTIVITY R-1 ITEM NOMENCLATURE PROJECT

3600: Research, Development, Test & Evaluation, Air Force PE 0604436F: Next-Generation MILSATCOM 646001: Evolved MILSATCOM BA 4: Advanced Component Development & Prototypes (ACD&P)

Technology

Schedule Details

	Start		Eı	nd
Events	Quarter	Year	Quarter	Year
Resilient Basis for SATCOM in Joint Operations study	4	2011	3	2012
Mission Area Situation Awareness Processor System Requirements Review	1	2012	1	2012
Outbrief Commercial Broad Area Announcements (BAAs)	1	2012	1	2012

PE 0604436F: Next-Generation MILSATCOM Technology Air Force