Exhibit P-40, Budget Line Item Justification: PB 2020 Navy	Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N: Other Procurement, Navy / BA 02: Communications & Electronics Equip / BSA 3: ASW Electronic Equipment	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)
ID Code (A=Service Ready, B=Not Service Ready): B	**Program Elements for Code B Items:** N/A — **Other Related Program Elements:** N/A
Line Item MDAP/MAIS Code: N/A	

Resource Summary	Prior Years	FY 2018	FY 2019	FY 2020 Base	FY 2020 OCO	FY 2020 Total	FY 2021	FY 2022	FY 2023	FY 2024	To Complete	Total
Procurement Quantity *(Units in Each)*	-	-	-	-	-	-	-	-	-	-	-	-
Gross/Weapon System Cost *($ in Millions)*	165.124	12.867	4.777	12.439	0.000	12.439	13.149	13.372	13.532	13.800	Continuing	Continuing
Less PY Advance Procurement *($ in Millions)*	-	-	-	-	-	-	-	-	-	-	-	-
Net Procurement (P-1) *($ in Millions)*	165.124	12.867	4.777	12.439	0.000	12.439	13.149	13.372	13.532	13.800	Continuing	Continuing
Plus CY Advance Procurement *($ in Millions)*	-	-	-	-	-	-	-	-	-	-	-	-
Total Obligation Authority *($ in Millions)*	**165.124**	**12.867**	**4.777**	**12.439**	**0.000**	**12.439**	**13.149**	**13.372**	**13.532**	**13.800**	**Continuing**	**Continuing**
(The following Resource Summary rows are for informational purposes only. The corresponding budget requests are documented elsewhere.)												
Initial Spares *($ in Millions)*	-	0.853	0.799	0.264	-	0.264	0.441	0.241	0.475	0.528	Continuing	Continuing
Flyaway Unit Cost *($ in Dollars)*	-	-	-	-	-	-	-	-	-	-	-	-
Gross/Weapon System Unit Cost *($ in Dollars)*	-	-	-	-	-	-	-	-	-	-	-	-

Description:

The FY 2020 funding request was reduced by $0.223 million to account for the availability of prior year execution balances.

Surface Ship Torpedo Defense (SSTD) provides a layered torpedo defense capability to protect surface ships. Under the OPN appropriation, SSTD funds the AN/SLQ-25 (NIXIE) system and the Torpedo Warning System (TWS). The AN/SLQ-25 (NIXIE) system provides towed persistent countermeasure capability. The TWS provides automated torpedo detection, classification, localization, and alertment capability. TWS is a component of The Anti-Torpedo Torpedo Defense System, a CVN based hard kill Torpedo Defense System.

WL101 AN/SLQ-25A UPGRADE KITS: Procures the upgrade of the AN/SLQ-25A (NIXIE) towed acoustic countermeasure system to the AN/SLQ-25C configuration. The AN/SLQ-25C enhances ship survivability against future torpedo threats.

WL102 Torpedo Warning System (TWS): Procures the Torpedo Warning System (TWS). TWS is an automated Torpedo Detection, Classification, and Localization (TDCL) system that generates warning alerts on incoming threat torpedoes. The TWS consists of towed active acoustic source and receive sensors, processing cabinets, workstations, and Countermeasure Anti-Torpedo (CAT) ready stows. The TWS sub functional groups are called the Target Acquisition Group (TAG), Tactical Control Group (TCG), and Ready Stow Group (RSG).

WL106 AN/SLQ-25 ENGINEERING CHANGES: The AN/SLQ-25 NIXIE is the Navy's primary Surface Ship Torpedo Defense (SSTD) system, providing towed persistent countermeasure capability to protect over 179 surface ships, including hulls that are duel tow from torpedoes. WL106, AN/SLQ-25 ENGINEERING CHANGES, consists of two major efforts starting in FY 2018 and continuing into FY2019: (1) Engineering Changes for AN/SLQ-25C and earlier variants and (2) continuation of the system technical insertion, started in FY 2018, that will result in the new configuration baseline, known as the AN/SLQ-25E. The following details each of the two major efforts. (1) Funding for AN/SLQ-25 Engineering Changes provides for hardware and software configuration changes to current production baselines to resolve emergent hardware obsolescence issues, software updates, and cyber security and program protection updates to the AN/SLQ-25A/C. These recurring efforts include investigation and resolution of AN/SLQ-25 Trouble Reports, including those resulting from service-identified issues resulting in operational downtime. These efforts are critical to the extension of the military service life of the system until all AN/SLQ-25A/C systems are modified to AN/SLQ-25E. (2) As a result of hardware obsolescence issues with the AN/SLQ-25A/C baseline that have precluded the continued production of this variant, a technical insertion began in FY 2018 under the nomenclature AN/SLQ-25E, which now is a government design and Request For Proposal (RFP) release as a hybrid build to print/build to spec contract. The AN/SLQ-25E updates the hardware and software architecture to a Commercial Off The Shelf (COTS-based), open, and modular configuration. The nonrecurring design efforts being completed by the Navy, began in FY 2018 and will continue into FY 2019. In FY 2019, systems design and software development will be on-going. This supports the RFP release in third quarter FY 2019. In FY2020, two major Engineering Changes will continue to support

Exhibit P-40, Budget Line Item Justification: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N: Other Procurement, Navy / BA 02: Communications & Electronics Equip / BSA 3: ASW Electronic Equipment	P-1 Line Item Number / Title: 2213 / Surface Ship Torpedo Def (SSTD)	
ID Code (A=Service Ready, B=Not Service Ready): B	Program Elements for Code B Items: N/A	Other Related Program Elements: N/A
Line Item MDAP/MAIS Code: N/A		

the in-service ships. Efforts for AN/SLQ 25-E system test and integration have been delayed due to the FY19 mark. These efforts are required to validate the new AN/SLQ-25E systems to be delivered to new construction ships starting in FY 2023. Procurement of AN/SLQ-25E system upgrade kits begins in FY 2022 to resolve AN/SLQ-25C obsolescence issues by back fitting systems in the existing fleet.

WL830 PRODUCTION ENGINEERING (IN-HOUSE): Funding provides specification preparation and validation, production planning, contract deliverable monitoring, prime contractor monitoring for cost, schedule, and performance and Integrated Logistics Support (ILS) planning, review and evaluation of obsolescence issues, and coordination of government furnished information (GFI) and government furnished equipment (GFE).

WL840 QUALITY ASSURANCE: Funding provides for quality assurance efforts including conducting quality assurance reviews of the contractor and subcontractors, documentation indicating contractor conformity to product performance requirements, and review of objective quality evidence.

WL860 ACCEPTANCE TEST & ENGINEERING: Funding provides for production acceptance of contractor hardware. Acceptance testing includes government acceptance testing and Environmental Qualification Testing(EQT) in support of the AN/SLQ-25E development with operationally trained subject matter experts and software support engineers.

WL900 PRODUCTION ENGINEERING (OUT-HOUSE): Consulting services in prior years provided production monitoring, installation planning and coordination support.

WL900 CONSULTING SERVICES: Funding provides for contractor support to the program office for production monitoring, installation planning and coordination support.

WL905 PRODUCTION ENGINEERING CONTRACTOR: Funding provides for production engineering tasks performed by the hardware contractor.

Exhibit P-40, Budget Line Item Justification: PB 2020 Navy	Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N: Other Procurement, Navy / BA 02: Communications & Electronics Equip / BSA 3: ASW Electronic Equipment	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)
ID Code (A=Service Ready, B=Not Service Ready): B	**Program Elements for Code B Items:** N/A	**Other Related Program Elements:** N/A
Line Item MDAP/MAIS Code: N/A		

Exhibits Schedule					Prior Years	FY 2018	FY 2019	FY 2020 Base	FY 2020 OCO	FY 2020 Total
Exhibit Type	Title*	Subexhibits	ID CD	MDAP/ MAIS Code	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*
P-40a	Surface Ship Torpedo Def (SSTD)				- / 156.934	- / -	- / -	- / -	- / -	- / -
P-3a	1 / WL106 ENGINEERING CHANGES (TBD)				- / 8.190	- / 12.867	- / 4.777	- / 12.439	- / 0.000	- / 12.439
P-40	**Total Gross/Weapon System Cost**				**- / 165.124**	**- / 12.867**	**- / 4.777**	**- / 12.439**	**- / 0.000**	**- / 12.439**

Exhibits Schedule					FY 2021	FY 2022	FY 2023	FY 2024	To Complete	Total
Exhibit Type	Title*	Subexhibits	ID CD	MDAP/ MAIS Code	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*	Quantity / Total Cost *(Each) / ($ M)*
P-40a	Surface Ship Torpedo Def (SSTD)				- / -	- / -	- / -	- / -	- / -	- / -
P-3a	1 / WL106 ENGINEERING CHANGES (TBD)				- / 13.149	- / 13.372	- / 13.532	- / 13.800	Continuing	Continuing
P-40	**Total Gross/Weapon System Cost**				**- / 13.149**	**- / 13.372**	**- / 13.532**	**- / 13.800**	**Continuing**	**Continuing**

*Title represents 1) the Number / Title for Items; 2) the Number / Title [DODIC] for Ammunition; and/or 3) the Number / Title (Modification Type) for Modifications. Title represents the P-40a Title when only the P-40a Summary/Total is shown.

Note: Totals in this Exhibit P-40 set may not be exact or sum exactly due to rounding.

Justification:
The FY 2020 funding request was reduced by $0.223 million to account for the availability of prior year execution balances.

Exhibit P-40a, Budget Item Justification For Aggregated Items: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Aggregated Items Title:** Surface Ship Torpedo Def (SSTD)

Item Number / Title [DODIC]	ID CD	MDAP/ MAIS Code	Prior Years			FY 2018			FY 2019			FY 2020 Base			FY 2020 OCO			FY 2020 Total		
			Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)
1) WL101 AN/SLQ-25A UPGRADE KITS																				
1.1) 25A Modification Kits	A		528,387.85	214	113.075	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 1) WL101 AN/SLQ-25A UPGRADE KITS			**-**	**-**	***113.075***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
3) WL103 AN/SLQ-25X (TWS COMPATIBLE SYSTEM) HARDWARE																				
3.1) WL103 AN/ SLQ-25X (TWS COMPATIBLE SYSTEM) HARDWARE	A		3,788K	1	3.788	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 3) WL103 AN/SLQ-25X (TWS COMPATIBLE SYSTEM) HARDWARE			**-**	**-**	***3.788***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
4) WL104 AN-SLQ-25D EC-2 ()																				
4.1) AN-SLQ-25C EC-2 ()	A		13,447K	1	13.447	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 4) WL104 AN-SLQ-25D EC-2 ()			**-**	**-**	***13.447***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
5) WL105 AN-SLQ-25C CVN BATTLE SPARE																				
5.1) HARDWARE	A		-	-	1.500	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 5) WL105 AN-SLQ-25C CVN BATTLE SPARE			**-**	**-**	***1.500***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
6) WL106 ENGINEERING CHANGE																				
6.1) EC-1 UPDATE SLQ-25	A		-	-	2.100	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
6.2) TECH INSERTION EC SLQ-25	A		-	-	0.936	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 6) WL106 ENGINEERING CHANGE			**-**	**-**	***3.036***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
7) WL830 PRODUCTION ENGINEERING																				
7.1) PRODUCTION ENGINEERING IN-HOUSE	A		-	-	13.281	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 7) WL830 PRODUCTION ENGINEERING			**-**	**-**	***13.281***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
8) WL840 QUALITY ASSURANCE																				
8.1) QUALITY ASSURANCE (IN-HOUSE)	A		-	-	1.264	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
8.2) Torpedo Warning System (TWS) Quality Assurance	A		-	-	0.212	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Exhibit P-40a, Budget Item Justification For Aggregated Items: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Aggregated Items Title:** Surface Ship Torpedo Def (SSTD)

Item Number / Title [DODIC]	ID CD	MDAP/ MAIS Code	Prior Years			FY 2018			FY 2019			FY 2020 Base			FY 2020 OCO			FY 2020 Total		
			Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)	Unit Cost ($)	Qty (Each)	Total Cost ($ M)
Subtotal: 8) WL840 QUALITY ASSURANCE			**-**	**-**	***1.476***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
9) WL860 ACCEPTANCE TEST AND ENGINEERING																				
9.1) ACCEPTANCE TESTING & ENGINEERING	A		-	-	1.824	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
9.2) TWS Acceptance Testing & Engineering	A		-	-	0.496	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 9) WL860 ACCEPTANCE TEST AND ENGINEERING			**-**	**-**	***2.320***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
10) WL900 SERVICES																				
10.1) PRODUCTION ENGINEERING (OUT-HOUSE)	A		-	-	0.925	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
10.2) CONSULTING SERVICES	A		-	-	1.944	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 10) WL900 SERVICES			**-**	**-**	***2.869***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
11) WL905 PRODUCTION ENGINEERING CONTRACTOR																				
11.1) PRODUCTION ENGINEERING CONTRACTOR	A		-	-	2.142	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Subtotal: 11) WL905 PRODUCTION ENGINEERING CONTRACTOR			**-**	**-**	***2.142***	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**
Total			**-**	**-**	**156.934**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**	**-**

Note: Subtotals or Totals in this Exhibit P-40a may not be exact or sum exactly, due to rounding.

Exhibit P-3a, Individual Modification: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Modification Number / Title:** 1 / WL106 ENGINEERING CHANGES
ID Code (A=Service Ready, B=Not Service Ready) :		**MDAP/MAIS Code:**

Resource Summary	Prior Years	FY 2018	FY 2019	FY 2020 Base	FY 2020 OCO	FY 2020 Total	FY 2021	FY 2022	FY 2023	FY 2024	To Complete	Total
Procurement Quantity *(Units in Each)*	-	-	-	-	-	-	-	-	-	-	-	-
Gross/Weapon System Cost *($ in Millions)*	8.190	12.867	4.777	12.439	0.000	12.439	13.149	13.372	13.532	13.800	Continuing	Continuing
Less PY Advance Procurement *($ in Millions)*	-	-	-	-	-	-	-	-	-	-	-	-
Net Procurement (P-1) *($ in Millions)*	8.190	12.867	4.777	12.439	0.000	12.439	13.149	13.372	13.532	13.800	Continuing	Continuing
Plus CY Advance Procurement *($ in Millions)*	-	-	-	-	-	-	-	-	-	-	-	-
Total Obligation Authority *($ in Millions)*	**8.190**	**12.867**	**4.777**	**12.439**	**0.000**	**12.439**	**13.149**	**13.372**	**13.532**	**13.800**	**Continuing**	**Continuing**
(The following Resource Summary rows are for informational purposes only. The corresponding budget requests are documented elsewhere.)												
Initial Spares *($ in Millions)*	-	-	-	-	-	-	-	-	-	-	-	-
Gross/Weapon System Unit Cost *($ in Dollars)*	-	-	-	-	-	-	-	-	-	-	-	-

Description:

[WL106 Engineering Changes SLQ-25] WL106 AN/SLQ-25 ENGINEERING CHANGES: The AN/SLQ-25 NIXIE is the Navy's primary Surface Ship Torpedo Defense (SSTD) system, providing towed persistent countermeasure capability to protect over 185 surface ships from torpedoes. WL106, AN/SLQ-25 ENGINEERING CHANGES, consists of two major efforts starting in FY 2018 and continuing into FY2019: (1) Engineering Changes for AN/SLQ-25C and earlier variants and (2) continuation of the system technical refresh, started in FY 2018, that will result in the new configuration baseline, AN/SLQ-25E. The following details each of the two major efforts. (1) Funding for AN/SLQ-25 Engineering Changes provides for hardware and software configuration changes to current production baselines to resolve emergent hardware obsolescence issues, provides for software updates, and provides for cyber security and program protection updates. These recurring efforts include investigation and resolution of AN/SLQ-25 Trouble Reports, including those resulting from service-identified issues. These efforts are critical to the extension of the military service life of the system until all AN/SLQ-25C systems are modified to AN/SLQ-25E. (2) As a result of hardware obsolescence issues with the AN/SLQ-25C baseline that have precluded the continued production of this variant, a technical refresh began in FY 2018 under the nomenclature AN/SLQ-25E, which now is a government design and Request For Proposal (RFP) release as a build to print. The AN/SLQ-25E updates the hardware and software architecture to a Commercial Off The Shelf (COTS-based), open, and modular configuration. The nonrecurring design efforts being completed by the Navy, began in FY 2018 and will continue into FY 2019. In FY 2019, systems design and software development will be completed along with system testing and integration. This supports the RFP release of Second Quarter FY 2019. FY 2020 will continue Engineering Change on the fleet. These EC's extend the system longevity by addressing obsolescence with system until AN/SLQ 25E backfit is available. These efforts are required to deliver AN/SLQ-25E systems to new construction ships starting in FY 2023. Procurement of AN/SLQ-25E system upgrade kits begins in FY 2022 to resolve AN/SLQ-25C obsolescence issues by back fitting systems in the existing fleet.

Exhibit P-3a, Individual Modification: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Modification Number / Title:** 1 / WL106 ENGINEERING CHANGES
ID Code (A=Service Ready, B=Not Service Ready) :	**MDAP/MAIS Code:**	
Models of Systems Affected: [No Model Specified]	**Modification Type:** TBD	**Related RDT&E PEs:**

Financial Plan	Prior Years	FY 2018	FY 2019	FY 2020 Base	FY 2020 OCO	FY 2020 Total	FY 2021	FY 2022	FY 2023	FY 2024	To Complete	Total
	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*
Procurement												
Modification Item 1 of 1: WL106 ENGINEERING CHANGES												
B Kits												
Recurring												
1.1.1) WL106 Engineering Changes SLQ-25 - NonOrganic	- / -	- / -	- / -	- / -	- / -	- / -	- / -	3 / 0.836	5 / 3.060	3 / 1.836	Continuing	Continuing
1.1.2) WL106 ECPs - Organic	- / -	- / -	- / -	- / 0.670	- / -	- / 0.670	- / 1.129	- / 0.999	- / 0.825	- / 0.960	Continuing	Continuing
1.1.3) WL106 TECH INSERTION EC SLQ-25 - Organic	- / -	- / 0.718	- / 0.536	- / 0.654	- / -	- / 0.654	- / 0.646	- / 0.675	- / 0.500	- / -	- / -	- / 3.729
1.1.4) WL106 EC-1 UPDATE SLQ-25 - Organic	- / -	- / 0.713	- / 0.713	- / 0.727	- / -	- / 0.727	- / 0.800	- / 0.830	- / 0.770	- / 0.880	- / -	- / 5.433
Subtotal: Recurring	*- / 0.000*	*- / 1.431*	*- / 1.249*	*- / 2.051*	*- / -*	*- / 2.051*	*- / 2.575*	*- / 3.340*	*- / 5.155*	*- / 3.676*	*Continuing*	*Continuing*
Non-Recurring												
1.2.1) WL106 AN/SLQ-25 Tech Insertion - Non - Organic [1]	- / 8.190	- / 5.400	- / 0.785	- / 4.408	- / -	- / 4.408	- / 4.078	- / 3.199	- / -	- / 1.200	- / -	- / 27.260
1.2.2) WL106 AN/SLQ-25 Tech Insertion - Organic [2]	- / -	- / 4.206	- / 0.849	- / 1.260	- / -	- / 1.260	- / 0.900	- / 0.920	- / -	- / 0.854	- / -	- / 8.989
Subtotal: Non-Recurring	*- / 8.190*	*- / 9.606*	*- / 1.634*	*- / 5.668*	*- / -*	*- / 5.668*	*- / 4.978*	*- / 4.119*	*- / -*	*- / 2.054*	*- / 0.000*	*- / 36.249*
Subtotal: WL106 ENGINEERING CHANGES	*- / 8.190*	*- / 11.037*	*- / 2.883*	*- / 7.719*	*- / -*	*- / 7.719*	*- / 7.553*	*3 / 7.459*	*5 / 5.155*	*3 / 5.730*	*Continuing*	*Continuing*
Subtotal: Procurement, All Modification Items	*- / 8.190*	*- / 11.037*	*- / 2.883*	*- / 7.719*	*- / -*	*- / 7.719*	*- / 7.553*	*- / 7.459*	*- / 5.155*	*- / 5.730*	*Continuing*	*Continuing*
Support *(All Modification Items)*												
2.1) WL830 AN/SLQ-25 Production Engineering In House [3]	- / -	- / 0.514	- / 0.360	- / 1.607	- / -	- / 1.607	- / 1.579	- / 1.725	- / 1.659	- / 1.818	Continuing	Continuing
2.2) WL840 AN/SLQ-25 Quality Assurance [4]	- / -	- / 0.204	- / 0.200	- / 0.861	- / -	- / 0.861	- / 0.895	- / 0.920	- / 0.752	- / 1.587	Continuing	Continuing
2.3) WL860 AN/SLQ-25 Acceptance Test and Engineering [5]	- / -	- / 0.509	- / 0.329	- / 0.690	- / -	- / 0.690	- / 0.722	- / 0.899	- / 0.642	- / 0.890	Continuing	Continuing
2.4) WL900 AN/SLQ-25 Consulting Services [6]	- / -	- / 0.255	- / 0.650	- / 1.100	- / -	- / 1.100	- / 1.200	- / 1.269	- / 0.979	- / 1.000	Continuing	Continuing
2.5) WL905 AN/SLQ-25 Production Engineering Contractor [7]	- / -	- / 0.348	- / 0.355	- / 0.462	- / -	- / 0.462	- / 1.200	- / 1.100	- / 0.345	- / 0.375	Continuing	Continuing
Subtotal: Support	*- / 0.000*	*- / 1.830*	*- / 1.894*	*- / 4.720*	*- / -*	*- / 4.720*	*- / 5.596*	*- / 5.913*	*- / 4.377*	*- / 5.670*	*Continuing*	*Continuing*
Installation												
Modification Item 1 of 1: WL106 ENGINEERING CHANGES	- / 0.000	- / 0.000	- / 0.000	- / 0.000	- / 0.000	- / 0.000	- / 0.000	- / 0.000	- / 4.000	- / 2.400	- / 0.612	- / 7.012
Subtotal: Installation	*- / 0.000*	*- / -*	*- / -*	*- / -*	*- / -*	*- / -*	*- / -*	*- / -*	*- / 4.000*	*- / 2.400*	*- / 0.612*	*- / 7.012*
Total												
Total Cost (Procurement + Support + Installation)	**8.190**	**12.867**	**4.777**	**12.439**	**0.000**	**12.439**	**13.149**	**13.372**	**13.532**	**13.800**	**Continuing**	**Continuing**

Exhibit P-3a, Individual Modification: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Modification Number / Title:** 1 / WL106 ENGINEERING CHANGES
ID Code (A=Service Ready, B=Not Service Ready) :		**MDAP/MAIS Code:**

Modification Item 1 of 1: WL106 ENGINEERING CHANGES

Installation Information

Method of Implementation: [none specified]:: Installation Name: WL106 Engineering Changes SLQ-25

Installation Cost	Prior Years	FY 2018	FY 2019	FY 2020 Base	FY 2020 OCO	FY 2020 Total	FY 2021	FY 2022	FY 2023	FY 2024	To Complete	Total
	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*	Qty *(Each)* / Total Cost *($ M)*
Prior Years	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -
FY 2018	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -
FY 2019	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -
FY 2020	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -
FY 2021	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -
FY 2022	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	3 / 4.000	- / -	0 / 0.000	3 / 4.000
FY 2023	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	5 / 2.400	0 / 0.000	5 / 2.400
FY 2024	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	3 / 0.612	3 / 0.612
To Complete	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	0 / 0.000	- / -
Total	- / -	- / -	- / -	- / -	- / -	- / -	- / -	- / -	3 / 4.000	5 / 2.400	3 / 0.612	11 / 7.012

Installation Schedule

	PYS	FY 2018				FY 2019				FY 2020				FY 2021				FY 2022				FY 2023				FY 2024				TC	Tot
		Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4	Q1	Q2	Q3	Q4		
In	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	2	-	2	2	1	-	3	11
Out	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	1	2	-	2	2	1	3	11

Method of Implementation (Organic): WL106 ECPs - Not Installed

Installation Quantity: 0

Footnotes:

(1) The increase in FY 20 supports AN/SLQ-25C Engineering Change updates not completed to reduce CASREPs and resolve parts obsolescence in the fleet; non-recurring engineering government design for the AN/SLQ-25E system hardware and software technical insertion; and hardware procurement for the government build of Design Qualification Units (DQU) used to support system integration and design validation.

(2) The increase in FY 20 supports AN/SLQ-25C Engineering Change updates not completed to reduce CASREPs and resolve parts obsolescence in the fleet; non-recurring engineering government design for the AN/SLQ-25E system hardware and software technical insertion; and hardware procurement for the government build of Design Qualification Units (DQU) used to support system integration and design validation.

(3) Moved Support Costs to P-3a from P-40A to show all costs associated with Engineering Changes. In House Production Support increases in FY 20 due to the parts obsolescence modal forecasted increases in Engineering Change Proposals (ECPs) needed for the obsolete 25C system; and developing first article testing requirements prior to production supporting first article delivery.

(4) Quality Assurance funding increases in FY 20 to establish requirements for the AN/SLQ-25E production and finalize the Quality Assurance Plan with the vendor.

Exhibit P-3a, Individual Modification: PB 2020 Navy		Date: March 2019
Appropriation / Budget Activity / Budget Sub Activity: 1810N / 02 / 3	**P-1 Line Item Number / Title:** 2213 / Surface Ship Torpedo Def (SSTD)	**Modification Number / Title:** 1 / WL106 ENGINEERING CHANGES
ID Code (A=Service Ready, B=Not Service Ready) :	**MDAP/MAIS Code:**	

(5) The increase in FY 20 supports AN/SLQ-25C software validation, CASREPS, AN/SLQ-25E technology insertion test and acceptance. The program will utilize subject matter experts to ensure industry can manufacture the 25E and prototypes can be produced through government machine shops allowing earlier hands-on assessment of system hardware components used as schedule risk reduction strategy supporting system deliveries to the fleet.

(6) The increase in FY 20 supports AN/SLQ-25C software validation, CASREPS, AN/SLQ-25E technology insertion test and acceptance. The program will utilize subject matter experts to ensure industry can manufacture the 25E and prototypes can be produced through government machine shops allowing earlier hands-on assessment of system hardware components used as schedule risk reduction strategy supporting system deliveries to the fleet.

(7) The increase in FY 20 supports AN/SLQ-25C software validation, CASREPS, AN/SLQ-25E technology insertion test and acceptance. The program will utilize subject matter experts to ensure industry can manufacture the 25E and prototypes can be produced through government machine shops allowing earlier hands-on assessment of system hardware components used as schedule risk reduction strategy supporting system deliveries to the fleet.