U. S. Department of Transportation

Maritime Administration

REPORT TO CONGRESS

BIENNIAL ASSESSMENT

OF THE

SHIP DISPOSAL PROGRAM

January 2018

TABLE OF CONTENTS

Crosswalk for the Consolidated Report Requirements

This consolidated report is submitted pursuant to the National Defense Authorization Act for Fiscal Year 2017, Pub. L. 114-328, § 3507 ("Use of National Defense Reserve Fleet Scrapping Proceeds").		
Table of Contents Crosswalk for Consolidated Report Requirements List of Acronyms Executive Summary		Page i Page iii Page iv Page 1
Section I. Government Owned Vessels Section II. Planned Vessel Obsolescence and Service Retirement Section III. Disposal of Government Owned Vessels in the US Section IV. Distribution of Collected Sales Proceeds Section V. Distribution of Future VORF Collections Section VI. Recent Ship Disposal Program Assessments Section VII. Conclusion Section VIII. Appendices		Page 4 Page 8 Page 10 Page 27 Page 31 Page 33 Page 36 Page 38
Consolidated Report Requirements by Section		**List of Figures**
I.	**Government Owned Vessels**	
	a. Total Active and Inactive Vessels by Agency b. Inactive Vessels by Agency c. Inactive Vessel Dispositions	Figure A. Page 5 Figure B. Page 5 Figure C. Page 6
II.	**Planned Vessels Obsolescence and Service Retirement**	
	a. Vessel Service Retirement Summary FY 2018 - 2022 b. Planned Vessel Retirements by Agency FY 2018 - 2022	Figure D. Page 8 Figure E. Page 9
III.	**Disposal of Government Owned Vessels in the US**	
	a. USA Scrap Steel Price Trends FY 2015 - 2017 b. MARAD Vessel Awards by Fiscal Year c. MARAD Ship Disposal Appropriations FY's 2011 - 2017	Figure F. Page 11 Figure G Page 22 Figure H. Page 23
IV.	**Distribution of Collected Sales Proceeds**	
	a. Non-Retention Vessel Sales Revenue by Fiscal Year b. FY 2018 Start VORF Sub-Account Balance c. FY 2018 VORF C2 Funds Distribution Plan	Figure I. Page 27 Figure J. Page 29 Figure K. Page 30
V.	**Distribution of Future VORF Collections**	
	a. FY 2018 Vessels Available for Disposal b. Agency Five-Year Vessel Retirement Projections FY 2018 - 2022	Figure L. Page 31 Figure M. page 32
VI.	**Recent Ship Disposal Program Assessments**	
VI.	**Conclusion**	
VIII.	**Appendix A-J List of Vessels Owned by Each Agency**	Pages 38-53

List of Acronyms

A	
All Star Metals, LLC	(ASM)
B	
Beaumont Reserve Fleet	(BRF)
C	
Clean Water Act	(CWA)
D	
Deep Sink Exercises	(SINKEX)
Defense Federal Acquisition Regulations	(DFAR)
Defense Logistics Agency	(DLA)
Defense Working Capital Fund	(DWCF)
Department of Defense	(DOD)
Department of State	(STATE)
Department of Transportation -Inspector General	(DOTIG)
E	
Environmental Protection Agency	(EPA)
ESCO Marine, Inc.	(ESCO)
F	
Federal Acquisition Regulation	(FAR)
Federal Property and Administrative Services Act	(FPSA)
Fiscal Year	(FY)
Fleet Training Exercise (live-fire)	(SINKEX)
G	
General Services Administration	(GSA)
General Technical Proposal	(GTP)
Government Accountability Office	(GAO)
H	
HRP Brownsville, LLC	(HRP)
I	
Inactive Ships Office	(SEA 21I)
Inactive Ships Maintenance Office	(INACTSHIPMAINTO)
International Shipbreaking, LTD	(ISL)
J	
James River Reserve Fleet	(JRRF)

M

Memorandum of Agreement	(MOA)
Marine Metal, Inc.	(MMI)
Maritime Administration	(MARAD)

N

National Defense Authorization Act	(NDAA)
National Defense Reserve Fleet	(NDRF)
National Environmental Policy Act	(NEPA)
National Historic Preservation Act	(NHPA)
National Invasive Species Act	(NISA)
National Maritime Fisheries Service	(NMFS)
National Maritime Heritage Act	(NMHA)
National Maritime Heritage Grant Program	(NMHGP)
National Park Service	(NPS)
Nuclear Regulatory Commission	(NRC)

O

Occupational Safety and Health Administration	(OSHA)

P

Polychlorinated biphenyls	(PCB)

R

Ready Reserve Fleet	(RRF)
Request for Sales Offers	(RFSO)
Request for Technical Proposals	(RFTP)

S

Ship Disposal Program	(SDP)
Southern Recycling, LLC	(SOREC)
Suisun Bay Reserve Fleet	(SBRF)

T

Technical Compliance Plan	(TCP)
Test Program for Certain Commercial Items	(TPCCI)
Toxic Substances Control Act	(TSCA)

U

United States Army Corps Engineers	(USACE)
United States Merchant Marine Academy	(USMMA)
United States Navy	(NAVY)
United States Coast Guard	(USCG)

V

Vessel Operations Revolving Fund	(VORF)

MARITIME ADMINISTRATION

BIENNIAL ASSESSMENT

OF THE SHIP DISPOSAL PROGRAM

EXECUTIVE SUMMARY

The Maritime Administration (MARAD) produced this biennial assessment for Fiscal Year 2017 to provide the following; 1) an inventory of all government-owned merchant type vessels greater than 1,500 gross tons that are currently available for dismantlement[1]; 2) an inventory of government-owned merchant type vessels greater than 1,500 gross tons that are expected to be retired from service and available for dismantlement in the next five years; 3) MARAD's plan for dismantling these vessels in the United States; 4) MARAD's plan for the timely distribution of the proceeds it currently has in its ship disposal accounts; 5) projections for future distributions of such proceeds; and 6) any other assessments related to the Ship Disposal Program the Maritime Administrator determines appropriate.

Introduction

This consolidated report is submitted pursuant to the National Defense Authorization Act for Fiscal Year 2017, Pub. L. 114-328 ("FY 2017 NDAA"), § 3507 ("Use of National Defense Reserve Fleet Scrapping Proceeds") paragraph (e) ("Assessments by the Maritime Administrator"). The specific language directed MARAD to provide a biennial assessment of the ship disposal program to include the following;

(1) an inventory of each vessel, subject to a disposal agreement or memorandum of agreement with another Federal agency relating to the disposal of the vessel;
(2) an inventory of each vessel of a Federal Agency that may meet the criteria for the Maritime Administration to act as the disposal agency;
(3) MARAD's plan to serve as the vessel disposal agent for other Federal agencies;
(4) MARAD's plan for the timely distribution of the proceeds it currently has in its ship disposal accounts;
(5) MARAD's projection of future distribution of such proceeds.
(6) Appropriate Ship Disposal Program assessments.

40 U.S.C. § 548 ("Surplus Vessels") states in part: "The Maritime Administration shall dispose of surplus vessels of 1,500 gross tons or more, which the Administration determines to be merchant vessels or capable of conversion to merchant use." MARAD is therefore the exclusive disposal agent for government-owned merchant type vessels or vessels that can be converted to merchant-type use.

[1] Gross tonnage (GT) is calculated based on the total volume of all enclosed spaces of the ship. The calculation is derived using the formula from Regulation 3 of Annex 1 in the International Convention on Tonnage Measurement of Ships, 1969. See the United States Coast Guard Simplified Measurement Tonnage Guide 1, CG-5397, and the interactive Form CG-5397 found on the Coast Guard's Homeport website (http://homeport.uscg.mil) by searching on Tonnage Measurement for additional information.

The list of all government-owned vessels that are currently available for disposal quickly becomes unwieldy if every vessel from the smallest utility boat to the largest warship is accounted for in this report. The 1,500 gross ton statutory vessel threshold shall serve as the demarcation line whereby, in general, vessels less than 1,500 gross tons are sold through the General Services Administration (GSA) as excess Federal property and vessels greater than 1,500 gross tons are disposed of, in general, by MARAD, the Navy and the United States Coast Guard (USCG). For the purposes of this report, vessel inventories at the identified Federal Agencies will consist of only those vessels which meet the statutory threshold. Nuclear powered active Navy vessels comprised of aircraft carriers and submarines have been omitted from this report because they are not dismantled in MARAD qualified recycling facilities but are decommissioned and recycled at commercial or naval shipyards that have the specialized facilities, technical expertise and security protocols in place to efficiently and safely deconstruct these vessels.

This report is comprised of the following sections;

Section I – Government Owned Vessels. This section identifies the Federal Agencies that own and operate conventionally powered merchant-type vessels or vessels that can be converted to merchant type use greater than 1,500 gross tons. A table and chart summarizes the total number of active and inactive vessels with a summary total for each category by each agency and a cumulative overall total for the universe of vessels. The section focuses on the inactive vessels at those agencies available for disposal and vessels in the disposal queue. Additionally, it provides a description of the various disposal categories and an overall vessel disposal disposition summary.

Section II – Planned Vessel Obsolescence and Service Retirement. This section reviews the general decision factors agencies undertake in determining when to retire a vessel from service. Each agency has separate and unique criteria that when applied will determine if and when a vessel is retired from service or undergoes a service life extension process. Post vessel retirement activities are described which impact the date a vessel is actually offered for disposal. A table and chart covering FY's 2018-2022 provides the number of vessels each agency plans to retire from service by fiscal year with cumulative five-year totals. A list of vessels by agency analogous with the five-year service retirement schedule is included.

Section III – Disposal of Government Owned Vessels in the US. This section provides an overview of MARAD's vessel disposal program including the best-value source selection process used for awarding sales and service ship dismantling and recycling contracts, amount of appropriated funds to carry out the Ship Disposal Program (SDP) and revenues accrued and disbursed from the sale of non-retention vessels.

Section IV - Disbursement of Collected Sales Proceeds. This section reviews the accrued revenues from the sale of MARAD non-retention vessels credited to the Vessel Operations Revolving Fund (VORF) since FY 2010. A review of 54 U.S.C. § 308704 ("Funding"), part of the National Maritime Heritage Act (NMHA) as amended, defines the allocation percentage of the vessel sales proceeds to the enumerated sub-accounts and provides a brief description of the

defined purpose of each account. Identified are the allocation changes to 54 U.S.C. § 308704 by the FY 2017 NDAA. A table displays the FY 2018 start balances for each VORF sub-account and a supporting narrative provides planned disbursements from those accounts in the fiscal year.

Section V – Distribution of Future VORF Collections. This section reviews the current inventory of vessels available for disposal and those planned for retirement in the next five years, FY's 2018-2022. A brief description of the issues and factors related to actual placement of a vessel for sale is provided. Finally, MARAD provides a description of its process for future distributions from the VORF sub accounts.

Section VI – Ship Disposal Program Assessments. This section provides a listing and brief summary of recent Government Accountability Office (GAO) and Department of Transportation Office of Inspector General (DOTIG) programmatic assessments related to the SDP that the Maritime Administrator has determined are appropriate to include in this document and have contributed to success of the disposal of obsolete Government vessels.

Section VII - Conclusions

Section VIII – Appendix.
Appendix A-J lists the active and inactive vessels owned by each agency.

I. GOVERNMENT OWNED VESSELS

Government Owned Vessels by Agency

In FY 2016, MARAD initiated its annual Federal agency outreach program and identified the Federal Agencies who own and operate merchant-type vessels or vessels that can be converted to merchant type use that meet or exceed the 1,500 gross ton statutory criteria. They include the United States Army Corps of Engineers (USACE), the Department of the Army (ARMY), United States Maritime Administration (MARAD), Department of the Navy (NAVY), NAVSEA Inactive Ships Office (SEA 21I), Navy Military Sealift Command (MSC), Navy Office of Naval Research, (ONR), National Science Foundation (NSF), National Oceanic and Atmospheric Administration, (NOAA), and the United States Coast Guard (USCG).

MARAD researched the other Federal Agencies' vessel operations web sites, vessel inventories, and agency vessel disposal guidelines to compile a listing of vessels pertinent to each agency. The universe of vessels was compiled into a Federal Ship database incorporating each agency's combatant and/or merchant-type vessels comprising the following information; ownership, principal characteristics, gross tonnage, construction date, and estimated retirement date.

MARAD identified operational personnel and executive contacts at the other Federal Agencies and notified them of MARAD's role and responsibilities for vessel disposal under 40 U.S.C § 548. Each Federal Agency was informed of MARAD's ship sales and vessel disposal services that provide secure and reliable disposal of obsolete vessels through qualified ship recycling facilities which protect worker health and safety and the environment. MARAD also informed the other Federal agencies that a memorandum of agreement, outlining each agency's roles and responsibilities, would be required for the ship disposal program to dispose of other agencies' obsolete vessels.

Further, MARAD furnished each agency a list from the Federal Ship database of that agency's vessels which meet the statutory requirement for disposal by MARAD. Included in the compilation of vessels are active Navy combatant vessels with the exception of nuclear powered aircraft carriers and submarines as these vessels will be recycled by the Navy at Commercial or Naval Shipyard facilities with nuclear decontamination and dismantlement expertise.[2] MARAD also did not include any vessels under 1,500 gross tons such as mine sweepers, yard tugs and patrol craft. MARAD requested each agency confirm the identified vessels were owned by the agency and to verify the data provided. [3]

This report does not distinguish Navy Battle Force Ships from Non-Battle Force Ships. Battle Force Ships are commissioned United States Ship (USS) warships capable of contributing to combat operations, or a United States Naval Ship (USNS) that contributes directly to Navy

[2] The one carve out to the exception being the Ex-Enterprise (CVN-65). The Navy is exploring various disposal options for the vessel including, potentially, conventional dismantling of the non-nuclear sections of the vessel at a shipyard or ship recycling facility. The propulsion sections of the vessel would remain intact, made watertight, and transit on a heavy lift ship to Puget Sound Naval Shipyard for decontamination of the nuclear propulsion systems and final structural dismantlement and remediation.

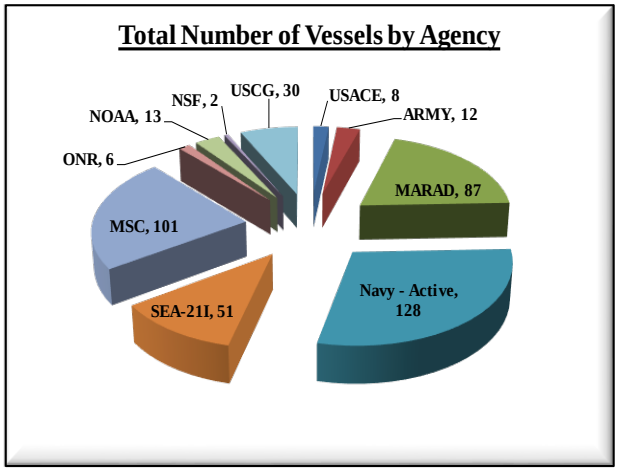
[3] MARAD compiled this information into the Office of Ship Disposal Programs Annual Report for FY 2016 which can be found on the MARAD home page at https://www.marad.dot.gov/ships-and-shipping/ship-disposal/.

warfighting or support missions. The Navy maintains the most current Battle Force Ship count on the Naval Vessel Register located on the web at www.nvr.navy.mil.

Figure A summarizes the Active and Inactive Vessels by Agency. The pie-chart below provides a graphical depiction of the total number of vessels owned by each agency. Listings of active and inactive vessels for each agency meeting the 1,500 gross ton disposal threshold are located in the appendices.

Figure A: Total Active and Inactive Vessels by Agency

Active and Inactive Vessels by Agency			
Agency	**Active**	**Inactive**	**Total Ships**
USACE	8	0	8
ARMY	12	0	12
MARAD	76	11	87
NAVY			
Navy - Active	127	1	128
SEA-21I	0	51	51
MSC	100	1	101
ONR	6	0	6
NOAA	13	0	13
NSF	2	0	2
USCG	29	1	30
Total	**373**	**65**	**438**



The largest concentration of active and inactive vessels is within the Navy, at 286 or 65 percent of the total number of vessels. MARAD is second with 87 active and inactive vessels representing 20 percent of the total. Combined MARAD and the Navy account for 373 active and inactive vessels or 85 percent of the total.

Figure B: Inactive Vessels by Agency

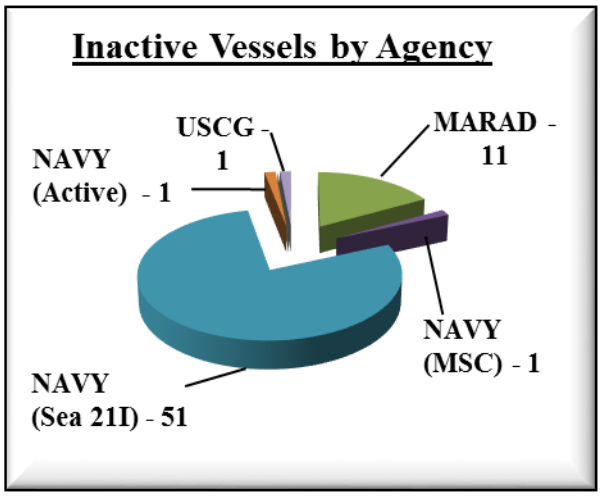


Figure B identifies each agency's portion of the 65 vessels designated as inactive. SEA21I lists 51 vessels as inactive of which 13 are still in retention status, and one vessel is being utilized as a logistics support vessel, leaving 37 vessels designated for disposal. Of the 37 one is on hold for donation, seven are targeted for Deep Sink Exercises (SINKEX), 10 are earmarked for Foreign Military Sales and 19 are scheduled for scrap. MARAD has 11 vessels designated as inactive (non-retention) and available for disposal. There is one vessel each at Navy - Active, USCG and MSC designated as inactive however, none are available for disposal. MARAD's 11 vessels represent 17 percent of the inactive vessels while the Navy SEA 211's 51 vessels represent 78 percent of the inactive vessels. Combined, MARAD and SEA 211 have 62

vessels or 95 percent of the total vessels designated as inactive. MARAD has 11 non-retention vessels available for disposal through recycling while SEA 21I has designated 19 vessels for recycling. The total number of MARAD and Navy vessels targeted for and available for recycling is 30.

Figure C lists the 48 Government vessels currently available for disposal at MARAD and SEA 21I. The vessels are sorted by design and not by priority of disposal. The vessels are identified as combatant (C) or merchant type (MT), and include; design description, active and inactive status, year built, vessel age and planned disposal disposition. For clarity, a color code is used to represent the vessel disposal disposition. Currently, only MARAD and SEA 21I have vessels available for disposal.

Figure C: Inactive Vessel Dispositions

United States Maritime Administration - MARAD								
No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal
1	Tripoli	MT	Amphibious Assault Ship	Inactive	1966	51	Scrap	X
2	Cape Florida	MT	Break Bulk	Inactive	1971	46	Scrap	X
3	Cape Gibson	MT	Break Bulk	Inactive	1968	49	Scrap	X
4	Cape Archway	MT	Break Bulk	Inactive	1963	54	Scrap	X
5	Cape Alexander	MT	Break Bulk	Inactive	1962	55	Scrap	X
6	Cape Alava	MT	Break Bulk	Inactive	1962	55	Scrap	X
7	Equality State	MT	Crane Ship	Inactive	1962	55	Scrap	X
8	Observation Island	MT	Missile Instrumentation	Inactive	1954	63	Scrap	X
9	Cape Lobos	MT	Roll-On/Roll-Off	Inactive	1972	45	Scrap	X
10	Simon Lake	MT	Submarine Tender	Inactive	1964	53	Scrap	X
11	Sumner	MT	Surveying Ship	Inactive	1992	25	Scrap	X

Navy Inactive Ships Office (SEA 21I)

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal
1	Ex-Kitty Hawk (CV-63)	C	Aircraft Carrier	Inactive	1960	57	Scrap	X
2	Ex-John F. Kennedy (CV-67)	C	Aircraft Carrier	Inactive	1967	50	Scrap	X
3	Ex-Charleston (LKA-113)	MT	Amphibious Cargo Ship	Inactive	1967	50	Scrap	X
4	Ex-Durham (LKA-114)	MT	Amphibious Cargo Ship	Inactive	1968	49	SINKEX	X
5	Ex-St. Louis (LKA-116)	MT	Amphibious Cargo Ship	Inactive	1969	48	SINKEX	X
6	Ex-El Paso (LKA-117)	MT	Amphibious Cargo Ship	Inactive	1969	48	Scrap	X
7	Ex-Mobile (LKA-115)	MT	Amphibious Cargo Ship	Inactive	1968	49	Scrap	X
8	Ex-Shreveport (LPD-12)	MT	Amphibious Transport Dock	Inactive	1966	51	Scrap	X
9	Ex-Charles F. Adams (DDG-2)	C	Destroyer	Inactive	1959	58	Donation	X
10	Ex-Barry (DD-933)	C	Destroyer	Inactive	1955	62	Scrap	X
11	Ex-Ticonderoga (CG-47)	C	Guided Missile Destroyer	Inactive	1981	36	Scrap	X
12	Ex-Yorktown (CG-48)	C	Guided Missile Destroyer	Inactive	1983	34	Scrap	X
13	Ex-Vandegrift (FFG-48)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X
14	Ex-Elrod (FFG-55)	C	Guided Missile Frigate	Inactive	1984	33	FMS	X
15	Ex-Simpson (FFG-56)	C	Guided Missile Frigate	Inactive	1984	33	FMS	X
16	Ex-Kauffman (FFG-59)	C	Guided Missile Frigate	Inactive	1986	31	FMS	X
17	Ex-Rodney M. Davis (FFG-60)	C	Guided Missile Frigate	Inactive	1986	31	FMS	X
18	Ex-McClusky (FFG-41)	C	Guided Missile Frigate	Inactive	1982	35	SINKEX	X
19	Ex-Ingraham (FFG-61)	C	Guided Missile Frigate	Inactive	1988	29	SINKEX	X
20	Ex-De Wert (FFG-45)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X
21	Ex-Robert G. Bradley (FFG-49)	C	Guided Missile Frigate	Inactive	1983	34	FMS	X
22	Ex-Halyburton (FFG-40)	C	Guided Missile Frigate	Inactive	1981	36	FMS	X
23	Ex-Ford (FFG-54)	C	Guided Missile Frigate	Inactive	1984	33	SINKEX	X
24	Ex-Klakring (FFG-42)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X
25	Ex-Carr (FFG-52)	C	Guided Missile Frigate	Inactive	1983	34	FMS	X
26	Ex-Curts (FFG-38)	C	Guided Missile Frigate	Inactive	1982	35	SINKEX	X
27	Ex-Samuel B Roberts (FFG-58)	C	Guided Missile Frigate	Inactive	1984	33	Scrap	X
28	Ex-Nicholas (FFG-47)	C	Guided Missile Frigate	Inactive	1983	34	Scrap	X
29	Ex-Underwood (FFG-36)	C	Guided Missile Frigate	Inactive	1982	35	Scrap	X
30	Ex-John L Hall (FFG-32)	C	Guided Missile Frigate	Inactive	1981	36	Scrap	X
31	Ex-Boone (FFG-28)	C	Guided Missile Frigate	Inactive	1980	37	Scrap	X
32	Ex-Stephen W Groves (FFG-29)	C	Guided Missile Frigate	Inactive	1981	36	Scrap	X
33	Ex-Hawes (FFG-53)	C	Guided Missile Frigate	Inactive	1984	33	Scrap	X
34	Ex-Mohawk (T-ATF-170)	MT	Fleet Ocean Tug	Inactive	1980	37	Scrap	X
35	Ex-Hayes (T-AGOR-16)	MT	Oceanographic Research	Inactive	1970	47	Scrap	X
36	Ex-Boulder (LST-1190)	MT	Tank Landing Ship	Inactive	1970	47	Scrap	X
37	Ex-Racine (LST-1191)	MT	Tank Landing Ship	Inactive	1970	47	SINKEX	X

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	7
Foreign Military Sales	10
Scrap	30
Donation	1
TBD	0
Total Inactive	48
Total Active	0
Total Number of Ships	48

The Disposition Summary totals are inclusive of both MARAD and SEA 21I vessels.

II. PLANNED VESSEL OBSOLESCENCE AND SERVICE

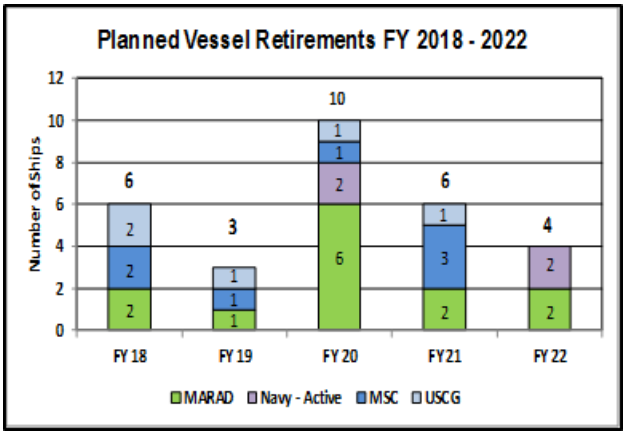
Agency Planned Vessel Retirement Schedules

Agency vessel retirement schedules reflect the year the vessel is planned to be taken out of service, not the specific year the vessel will be disposed. In each case the exact date the vessel will be available to MARAD or the Navy for disposal is predicated on completion of specific vessel disposal preparations. Each agency has definitive vessel disposal preparation procedures such as demilitarization, classified equipment removal, defueling, hazardous material remediation and historical assessments that must be completed prior to commencement of the actual disposal. In addition, as vessels are prepared for disposal, compliance with environmental regulations such the National Environmental Policy Act (NEPA), the Federal Water Pollution Control Act known as the Clean Water Act (CWA), the Clean Air Act and the National Invasive Species Act (NISA) must be incorporated into planning and budgeting decisions.

Congressional authorizations/appropriations, vessel utilization, service life extensions, vessel new build replacements and funding all affect the retirement date decision. The exact retirement dates and disposal actions are subject to continual revision. In some instances, a vessel may be taken out of service and placed in a retention status for potential re-activation at a future date or held for an indeterminate period of time for logistical support for similar class operating vessels. Congressional approval, mission utility, vessel condition and service life all play a role in a vessel retention disposal analysis. Further, relocation of a vessel to a MARAD or Navy fleet anchorage, sale of the vessel from its home port, procurement of recycling services and compliance with environmental statutes such as mitigation of invasive species all have cost implications that must be recognized, addressed and budgeted. The actual vessel disposal decision cannot be made until completion of cost benefit or service life extension analysis and the budgeting process addresses all potential vessel disposal costs. Vessel specific disposal dates are therefore unknown until completion of all vessel disposal analysis. Figure D provides a summary of the planned vessel service retirement schedules for FY's 2018-2022 for each agency. Figure E provides a listing by each agency of the vessels planned for service retirement in FY's 2018-2022.

Figure D: Vessel Service Retirement Summary by Agency FY 2018- 2022

Agency	Fiscal Year Removed from Service					5-Year Total
	FY 18	FY 19	FY 20	FY 21	FY 22	
USACE	0	0	0	0	0	0
ARMY	0	0	0	0	0	0
MARAD	2	1	6	2	2	13
NAVY						
Navy - Active	0	0	2	0	2	4
SEA 21I	0	0	0	0	0	0
MSC	2	1	1	3	0	7
ONR	0	0	0	0	0	0
NOAA	0	0	0	0	0	0
NSF	0	0	0	0	0	0
USCG	2	1	1	1	0	5
FY Removal	**6**	**3**	**10**	**6**	**4**	
	Total 5-Year Removed from Service					**29**



To avoid double counting the scheduled vessels for retirement from service, Navy - Active and MSC totals are not included in the fiscal year totals for SEA 21I or MARAD since they have not yet been transferred for final disposition.

Figure E: Planned Vessel Retirements by Agency FY's 2018 – 2022

United States Maritime Administration - MARAD

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	FB-62	MT	Barge Office	Active	1944	73	Scrap				X			2020
2	Cape Girardeau	MT	Break Bulk	Active	1968	49	Scrap				X			2020
3	Cape Jacob	MT	Break Bulk	Active	1961	56	Scrap				X			2020
4	Cape Juby	MT	Break Bulk	Active	1962	55	Scrap					X		2021
5	Cape Nome	MT	Break Bulk	Active	1969	48	Scrap						X	2022
6	Cape Avinof	MT	Break Bulk	Active	1963	54	Scrap		X					2018
7	Cape Ann	MT	Break Bulk	Active	1962	55	Scrap			X				2019
8	Cape Bover	MT	Break Bulk	Active	1966	51	Scrap				X			2020
9	Diamond State	MT	Crane Ship	Active	1960	57	Scrap				X			2020
10	Triumph	MT	Surveillance Ship	Active	1984	33	Scrap				x			2020
11	Petersburg	MT	Tanker	Active	1963	54	Scrap					x		2021
12	Chesapeake	MT	Tanker	Active	1964	53	Scrap		X					2018
13	Empire State	MT	Training Ship	Active	1962	55	Scrap						x	2022

United States Department of the Navy - MSC

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Ponce (AFSB-15)	MT	loat Forward Staging Ba	Active	1970	47	Scrap		X					2018
2	USNS Sioux (T-ATF 171)	MT	Fleet Ocean Tug	Active	1980	37	Scrap					X		2021
3	USNS Apache (T-ATF 172)	MT	Fleet Ocean Tug	Active	1981	36	Scrap					X		2021
4	USNS Catawba (T-ATF 168)	MT	Fleet Ocean Tug	Active	1979	38	Retain			X				2019
5	USNS John Lenthall (T-AO 189)	MT	Fleet Oiler	Active	1986	31	Scrap					X		2021
6	USNS Walter S. Diehl (T-AO 193)	MT	Fleet Oiler	Active	1987	30	Retain				X			2020
7	USNS Lawrence H. Gianella (T-AOT 1125)	MT	Tanker	Active	1985	32	Retain		X					2018

United States Navy - Active Vessels

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Bunker Hill (CG 52)	C	Guided Missile Cruiser	Active	1985	32	Retain				X			2020
2	USS Mobile Bay (CG 53)	C	Guided Missile Cruiser	Active	1985	32	Retain				X			2020
3	USS Antietam (CG 54)	C	Guided Missile Cruiser	Active	1986	31	Retain						X	2022
4	USS Leyte Gulf (CG 55)	C	Guided Missile Cruiser	Active	1986	31	Retain						X	2022

United States Coast Guard - USCG

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Oak Ridge	MT	Floating Dry-Dock	Active	1944	74	TBD		X					2018
2	Sherman WHEC 720	MT	High Endurance Cutter	Active	1967	51	TBD		X					2019
3	Midgett WHEC 726	MT	High Endurance Cutter	Active	1971	47	TBD			X				2019
4	Mellon WHEC 717	MT	High Endurance Cutter	Active	1967	51	TBD				X			2020
5	Munro WHEC 724	MT	High Endurance Cutter	Active	1971	47	TBD					X		2021

Legend		Disposition Summary		FY 2018	Planned Removal from Service Summary					
MT	Merchant Type Vessel	Retain	7	Avail for	Fiscal Year Removed from Service					5 -Year Total
C	Combatant Vessel	SINKEX	0	Disposal	FY 18	FY 19	FY 20	FY 21	FY 22	
Active	Operating/Readiness/Support status	Foreign Military Sales	0	0	6	3	10	6	4	29
Inactive	Non-operating/Non-retention status	Scrap	17							
X	Foreign Military Sales	Donation	0							
X	SINKEX	TBD	5							
X	Scrap	Total In-Active	0							
X	Donation	Total Active	29							
X	Remove From Service	Total Number of	29							

* This represents the total number of vessels greater than 1,500 gross tons expected to be retired from service in the next five fiscal years. Retirement dates are subject to change relative to mission ulitilty, appropriations and availabiltty of replaement vessels where applicable.

III. DISPOSAL OF GOVERNMENT OWNED VESSELS IN THE US

Legislative Limitation

The Duncan Hunter National Defense Authorization Act for Fiscal Year 2009, Pub. L. 110-417,§ 3502 prohibits the export of vessels owned by the Government of the United States to a foreign country for the purpose of dismantling, recycling, or scrapping. The prohibition does not apply if the MARAD Administrator certifies to Congress that a compelling need for dismantling, recycling, or scrapping of the vessel exists; that any dismantling, recycling, or scrapping of the vessel in a foreign country will be conducted in full compliance with environmental, safety, labor, and health requirements for ship dismantling, recycling, or scrapping that are equivalent to the laws of the United States; and that the export of the vessel under this section will only be for dismantling, recycling, or scrapping of the vessel. Per the section of the statute the term ‘‘United States’’ means the States of the United States, Puerto Rico, and Guam.

MARAD Federal Ship Outreach Program

The other Federal Agencies that own and operate merchant-type vessels or vessels that can be converted to merchant type use, and meet and exceed the 1,500 gross ton statutory criteria, have been notified of MARAD's authority as the Government's exclusive disposal agent. They were provided information outlining MARAD's successful ship disposal sales and fee-for service procurement processes. Each agency was provided the following general scenarios whereby MARAD would act as the vessel disposal agent:

1. The vessel is sold for domestic re-use
2. The vessel is sold for domestic recycling
3. Recycling services are procured for the dismantlement of the vessel
4. The vessel is transferred to a MARAD fleet anchorage

Further, each agency was provided a copy of, and invited to participate in, a Memorandum of Agreement (MOA) whereby each agency's roles and responsibilities for successful vessel disposal are clearly identified. MARAD will require an executed MOA from each agency prior to disposing of that agency's vessels.

Domestic Scrap Steel Prices

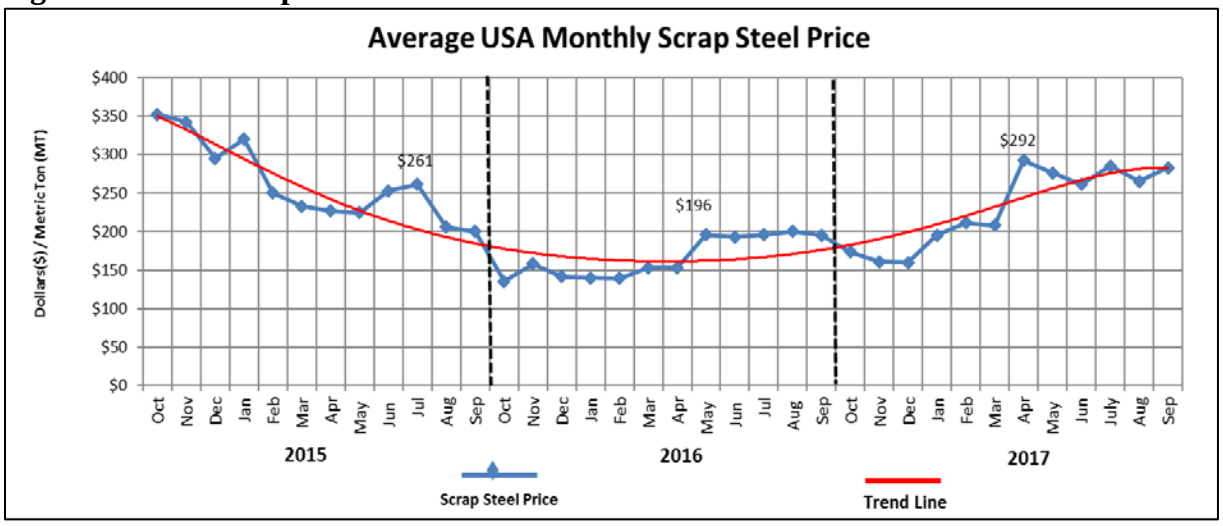
The MARAD ship disposal sales program is highly dependent on a robust domestic and international scrap steel market. When scrap steel sales are high MARAD sells non-retention vessels from its three National Defense Reserve Fleet (NDRF) sites and Navy Inactive Ship Maintenance Office (INACTSHIPMAINTO) locations in Philadelphia, PA, and Pearl Harbor, HI, for recycling at qualified facilities in Texas and Louisiana. As scrap metal prices fall, the total amount paid for each vessel also falls as the volatility in the scrap metal market makes it more difficult for each recycler to predict future scrap steel prices to sufficiently cover fixed and variable costs. Recyclers buy vessels with an eye towards future scrap steel prices because six months or more may elapse from the time they purchase a vessel to the time they actually sell the scrap steel product into the recycling market.

In FY 2017, MARAD issued two separate ship recycling sale announcements for a total of four vessels. MARAD was unable to sell a single vessel and instead awarded service contracts for the

recycling of the four vessels. While scrap steel prices rebounded somewhat in FY 2017 the projected revenue from the sale of recyclable materials was insufficient to cover the recyclers costs of removing, towing and disposing of the last two Consent Decree vessels from the Suisun Bay Reserve Fleet (SBRF). In addition, two vessels in the James River Reserve Fleet (JRRF), were offered for sale but did not sell due to the small size of one ship and the presence of mud ballast in four double bottom tanks on the larger ship.[4]

Figure F depicts the volatility in U.S. scrap steel prices during FY's 2015-2017. The domestic scrap steel market entered a downward spiral after reaching its $400 per metric ton peak in January 2014 with the most dramatic decline occurring in 2015. In January 2015, scrap steel prices were approximately $320 per metric ton and by October 2015 had dropped to a low of approximately $135 per metric ton; a 58 percent decrease. Scrap steel prices collapsed to levels not seen in the previous 15 years. By December 31, 2015, scrap steel prices had drifted upward to around $142 per metric ton. From January through April 2016 scrap steel prices hovered between $140 and $153 per metric ton. In May, 2016 prices rose to $200 per metric ton then limped along in the $190's per metric ton range through August before declining to $174 per metric ton by the end of October. In February 2017, scrap steels prices crossed the $200 per metric ton threshold and by April had reached $292 per metric ton. From May through September they hovered in the $260 - $285 per metric ton range.[5]

Figure F: USA Scrap Steel Price Trends FY's 2015 - 2017



Source data for the Average USA Monthly Scrap Steel Price Trend chart is compiled from: The Scrap Register (http://www.scrapregister.com); Recycler's World, (http://www.recycle.net); Steel Insight (http://www.steel-insight.com); and United States Steel Corporation (https://www.ussteel.com) and www.worldsteel.org.

The sharp decline in the price of scrap steel from late 2015 through mid-2017 greatly contributed to the uneconomical domestic market for ship sales. This caused ship recyclers to shun vessel purchases in favor of service contracts to subsidize recycling costs on MARAD/Navy non-

[4] The larger ship contained mud ballast, which is used as permanent ballast on board a vessel to assist with a vessels trim and stability. It is a form of drilling mud that may contain heavy metals and other contaminants. Removal of the mud ballast is accomplished during the ship recycling process, by hand, rendering removal and disposal costly and very labor intensive.

[5] MARAD Monthly Average USA Scrap Steel Price Trend Report.

retention vessels. The collapse in scrap steel prices reversed the MARAD ship sales program to the point where ship sales were no longer feasible. MARAD had to procure ship recycling services with most of its remaining available appropriated funds.

The Defense Logistics Agency (DLA) had similar results when selling Navy combatant vessels for recycling.[6] DLA sold six vessels in February 2015 for $52,888 and canceled its most recent sales solicitation in August 2016 when it received no technically qualified offers. DLA did not issue a sales solicitation in FY 2017 because it is constrained from selling additional Navy combatant vessels until the Navy completes a programmatic environmental assessment for the disposal of its inactive ships. The Navy continues its consultation with the National Marine Fisheries Service (NMFS) regarding the completion of an environmental biological programmatic assessment designed to evaluate the Inactive Ships Program and its effects on threatened or endangered species and their dependent ecosystem. A component of the biological programmatic assessment is the development of a management approach to address the uncertainties with the transfer for recycling of inactive vessels, that contain biofouling organisms and what impact their transit may have on the environment.

Since FY 2013, Navy has focused on expending its appropriations on recycling its backlog of obsolete conventionally powered aircraft carriers. Five aircraft carriers have been awarded to three ship recyclers in Brownsville, TX.[7]

Numerous factors affect whether the recycling of non-retention vessels is accomplished through vessel sales with revenue to the Government or in the procurement of recycling services with appropriated funds. The primary factors include the market price of scrap metals, the vessel's size/condition, the type and quantity of hazardous materials, the quantity and type of recyclable materials, the amount of competition for each vessel, the duration/cost of the tow from the fleet to the recycling facility, and the cost to remove marine growth prior to towing to different bio-geographical areas. The highest costs are typically associated with SBRF vessels due to the current environmental requirement to dry-dock each vessel to remove marine growth prior to removal and start of the 5,000-mile tow to a Gulf Coast recycling facility. These cost factors render the sale of SBRF vessels the first impacted by, and the last to recover from, volatile scrap steel prices.

During periods of low scrap steel prices, revenues from the sale of the vessel scrap is ferrous and non-ferrous metals are insufficient to cover the fixed costs of purchase, towing, insurance, and labor much less the unknown costs for hazardous material remediation. Predicting the market price of scrap steel five to six months after contract award, when the vessels are undergoing dismantlement, in a declining scrap steel market, along with disposal of unknown quantities of ship board hazardous materials, is too great a risk for the smaller recyclers to accept. These factors limit competition for the purchase of vessels, with the recycling industry looking to

[6] The Defense Logistics Agency is the Navy's designated sales agent for the disposal of conventional combatant type-vessels via recycling.

[7] MARAD and the Navy have qualified a number of the same facilities to perform ship recycling. The three facilities qualified by Navy to dismantle aircraft carriers are also the largest recyclers qualified by MARAD. Collectively they account for the majority of MARAD and Navy ship recycling contract awards.

MARAD and the Navy to subsidize the disposal of non-retention vessels through the procurement of ship recycling services.

MARAD requests annual ship disposal program funding to mitigate the volatility of the scrap steel markets, to continue disposal of the worst conditioned vessels and to help maintain an industrial base of qualified ship recycling facilities. Flexibility to quickly pivot from ship sales, due to the volatile downturns of scrap steel prices, to procurement of recycling services provides MARAD continuity of ship disposal awards, which minimizes increasing the backlog of obsolete vessels in the fleets, continues the removal of the worst conditioned vessels and minimizes the threat of potential environmental incidents.

Scrap Steel Market Outlook

International scrap steel prices have declined in the latter half of 2017 primarily due to the decelerating Chinese economy. China closed most of its outdated induction furnaces in FY 2017, shifting demand for this sector to mainstream steel makers. In 2018, global growth is expected to moderate, mainly due to slower growth in China, while in the rest of the world, steel demand will continue to maintain its current momentum. The lack of a strong growth economy to replace China will continue to dampen steel demand in the future. However, bright spots in the international scrap steel arena include: the European Union economic recovery is broadening, Indian government reforms are expected to bring about a better investment climate enhancing growth potential, and Turkish steel demand is expected to resume growth momentum in 2018. Japanese steel demand is showing better than expected performance benefitting from the government stimulus package, improving exports and preparations for the 2020 Olympic Games. The overall outlook for international scrap steel markets is moderate but continued growth.[8]

The US economy continues to exhibit sturdy economic fundamentals supported by strong consumer spending and rising business confidence. Steel mill inventory levels remain high and mills were able to procure all the scrap material needed through September. Steel mills tend to reduce operations in November and December which may soften the demand for scrap steel beginning in 2018.[9] The price of scrap steel usually rebounds in the second quarter of each year as growth escalates due to rising demand. The advent of tax reform in the US coupled with a proposed infrastructure stimulus package, if enacted, should bode well for the construction and steel industries in 2018.

In the absence of inflationary and recessionary pressures in the commodity markets, political turmoil provides the primary risk to future domestic and international scrap steel prices and overall commodity demand. Policy shifts toward protectionism, trade re-negotiations, lack of tax reform and economic stimulus, Brexit talks, international anxieties on the Korean peninsula and continuing tensions with Iran can all conspire to dampen demand, reduce growth and pose a structural risk to the global economy.

[8] Worldsteel Association October 2017 Short Range Outlook.
[9] Scrap Price Bulletin, (http:// www.scrappricebulletin.com).

Domestic Ship Recycling Industry

At the start of FY 2015, there were eight qualified MARAD ship recycling facilities all located on the Gulf Coast in Louisiana and Texas. By the end of FY 2017 there were five qualified MARAD ship facilities located in Texas and Louisiana. MARAD currently does not have qualified ship recycling facilities on either the East or West coasts. The lack of qualified ship recycling facilities on the East and West coasts contributes to higher ship recycling costs particularly during down turns in the price of scrap steel. This is especially evident on the West coast where MARAD must use appropriated funds to procure dry-docking services to remove aquatic fouling from the underwater hulls of SBRF vessels prior to tow to a Gulf Coast recycling facility. Sales offers are generally lower, dry-docking costs are a requirement and towing costs are higher for SBRF vessels due the cost of the long tow and Panama Canal transit fees. Ship recycling sale solicitations are inclusive of the costs of towing and Panama Canal fees. However, MARAD independently procures dry-docking services for the SBRF vessels and must include estimated costs for these services in its annual budget requests.

Three of the five qualified ship recycling facilities are located in Brownsville, TX, and include International Shipbreaking Ltd., (ISL), All Star Metals, LLC., (ASM), and HRP Brownsville, LLC, (HRP).[10] Since 2014, ISL has focused on dismantling obsolete, conventionally-powered naval aircraft carriers. They have expanded their facility to accommodate up to two aircraft carriers at a time. ISL has successfully dismantled the Ex-CONSTELLATION, is finishing the dismantlement of the Ex-RANGER and since its arrival in June, is actively dismantling the Ex-INDEPENDENCE. ASM completed the dismantlement of the Ex-FORRESTAL in 2015. They have been active in the commercial ship recycling market as well as recycling MARAD vessels. They are currently dismantling the last two SBRF vessels removed under the Consent Decree, the CAPE BRETON and CAPE BORDA and they are recycling the two JRRF vessels awarded in September of 2017.

The sharp drop in scrap steel prices severely impacted the domestic ship recycling industry. In March 2015, ESCO Marine, Inc. (ESCO), the largest MARAD qualified ship recycling facility, filed for bankruptcy protection in the U.S. District Court for the Southern District of Texas, Brownsville Division. [11] At the time of its closing, ESCO was dismantling the Navy aircraft carrier, Ex-SARATOGA and two former MARAD vessels SHENANDOAH and YELLOWSTONE. ESCO's closing removed ship recycling capacity from MARAD and the Navy. Court supervised proceedings for ESCO's re-organization culminated on May 1, 2017, with the novation of the two MARAD and Navy ship recycling contracts from ESCO Marine, Inc. to HRP. HRP has re-started ship recycling operations at the old ESCO facility and is actively recycling the Ex-SARATOGA, and the two former MARAD vessels SHENANDOAH and YELLOWSTONE.

[10] ISL is a subsidiary of Southern Recycling, LLC which in turn is owned by the European Metal Recycling Group. ASM is a subsidiary of Scrap Metal Services, Inc. HRP, Hilco Redevelopment Partners, is the former ESCO Marine, Inc., which emerged from bankruptcy re-organization in May of 2017.

[11] While in court-administered bankruptcy re-organization ESCO Marine Inc., retained its MARAD qualified ship recycling status as the court does not allow actions that limit the company's ability to re-organize and resume operations.

Southern Recycling, LLC, (SOREC) based in New Orleans, operates the other two MARAD qualified ship recycling facilities, one in New Orleans and the other located in Amelia, LA. SOREC is a large metals recycling company with multiple recycling operations and locations throughout the Gulf. Ship recycling is but one line of business for this diversified company.

As the price of scrap steel continued its steep decline smaller recycling facilities found it harder to obtain financing to continue operations and to acquire new scrapping projects. Several MARAD qualified ship recycling facilities reduced the scope of their operations due to the falling scrap steel markets. Two smaller qualified ship recyclers in Brownsville, TX, lost their qualifications in FY 2015. In September 2015, Marine Metal, Inc., (MMI) lost its status as a MARAD-qualified facility due to concerns regarding financial viability. In July 2015, MMI repudiated two awarded SBRF ship recycling contracts. MARAD was forced to re-procure both ship recycling contracts at higher cost. Seeking fresh capital, MMI was sold to new owners in November 2015 who chose not to regain MARAD technical qualification status. Further, MMI was sold again to new owners in November of 2016. Bay Bridge Texas, LLC, (BBT) underwent organizational restructuring, shedding personnel and limiting operations to reduce expenses and was actively seeking a buyer in FY 2016. Due to concerns regarding operational effectiveness, key personnel and several crane accidents, one involving a death, BBT lost its status as a MARAD-qualified facility. New owners acquired BBT in early 2017. Both MMI and BBT have chosen, at this time, not to reapply to participate in the MARAD's ship recycling program. The SOREC Calcasieu ship recycling facility located in Sulphur, LA, was closed in July 2016 as a result of restructuring due to the ongoing depressed scrap steel market.

Domestic Ship Recycling Capacity

The domestic ship recycling industry is recovering from the economic downturn driven by the collapse of the international and domestic scrap steel market. The largest MARAD qualified ship recycling facility has emerged from bankruptcy re-organization and is again recycling MARAD and Navy ships and is competing in MARAD ship recycling announcements. Smaller recycling facilities have been sold, consolidated or closed. Recyclers are diversifying operations by looking to auto shredding operations, dismantlement of oil rigs and purchase of commercial vessels to sustain and or expand revenues.

In FY's 2015-2016, low scrap steel prices further reduced available capacity as ship recyclers, unable to cover fixed costs through vessel sales, chose not to participate in MARAD ship recycling sales announcements. Volatile scrap steel prices coupled with future price uncertainty increase risk for profits from ship recycling operations. Under capitalized companies are less competitive and increasingly rely on Government service contracts to sustain operations.

Domestic ship recycling capacity is currently adequate to meet MARAD's requirements given the decreasing number of non-retention ships available for disposal, the impact of falling scrap steel prices on ship sales and limited appropriations to procure ship recycling services. However, there is concern that competition for MARAD's vessels will decrease due to the continued dismantling/recycling of the Navy aircraft carriers at the remaining MARAD qualified recycling facilities. The Navy recently awarded the carrier Ex-INDEPENDENCE for recycling and should

soon award the Ex-KITTY HAWK.[12] The Navy had solicited technical proposals for the sectional dismantlement, at commercial shipyards and/or ship recycling facilities, of the non-nuclear sections of the Ex-ENTERPRISE. The initial request for proposals called for construction of a watertight containment for the propulsion section. The watertight nuclear propulsion section would be placed on a heavy lift ship for transit to Puget Sound Naval Shipyard for decontamination and dismantlement. While the RFP has been canceled, the Navy continues to investigate commercial ship recycling options for the vessel. This diminished available capacity first became evident in 2014 when the three largest MARAD-qualified recycling facilities were awarded Navy aircraft carriers chose not to participate in MARAD ship recycling announcements. Furthermore, Hurricane Harvey caused widespread flooding and damage in the Houston, TX, area in August 2017. Strong winds and the high storm surge damaged or grounded numerous vessels. The ship recycling facilities in Brownsville have been very active recycling damaged barges, vessels and other floating equipment from that recent disaster.

MARAD Ship Disposal Program

MARAD acquires vessels in accordance with 46 U.S.C. § 57101 ("Placement of Vessels in National Defense Reserve Fleet"), subsection (a) of which states: "any vessel acquired by the Maritime Administration of 1,500 gross tons or more or such other vessels as the Secretary of Transportation determines are appropriate shall be placed in the National Defense Reserve Fleet maintained under section 11 of the Merchant Ship Sales Act of 1946 (50 App. U.S.C. 1744)."

The Floyd D. Spence National Defense Authorization Act for Fiscal Year 2001, Pub. L. 106-398, § 3502, required the disposal of all vessels in MARAD's NDRF that were not assigned to the Ready Reserve Force or otherwise designated to be used for a particular purpose. Prior to 2001, the law provided that non-retention vessels should be sold "in a manner that maximizes the return on the vessels to the US." (46 U.S.C Sec. 57102). However, § 3502 directed MARAD to take into account environmental, worker safety and vessel scheduling issues to make a "best value" determination consistent with the Federal Acquisition Regulation (FAR) regarding non-retention vessel disposal decisions.[13] Congress also authorized MARAD to pay for vessel disposal services.

Since the establishment of the Program in 2001, MARAD has aggressively pursued all feasible disposal alternatives including domestic recycling, the sale of ships for re-use, artificial reefing, deep-sinking and the potential for donation. However, the presence of polychlorinated biphenyls (PCBs), the high cost of vessel acquisition, preparation and environmental clean-up limits these disposal alternatives as viable disposal options. The disposal alternatives are demand-based and vessel specific requiring the requestor to obtain funding, permits and environmental clearances prior to submitting proposals or applications to MARAD for disposal of the vessel. Domestic recycling has proven to be the most expedient and cost-effective disposal alternative for MARAD's non-retention vessels. The other permitted disposal alternatives are evaluated for disposal opportunities as industry demand warrants. In the 17-year period since FY 2001, MARAD awarded disposal contracts for 219 non-retention vessels, removed 221 ships from the

[12] The Navy awarded a $6M two -year contract on August 25, 2016 for the recycling of the Ex-Independence to International Shipbreaking Ltd., located in Brownsville TX. The carrier arrived in Brownsville, TX in June 2017.
[13] MARAD utilizes FAR Part 13 ("Simplified Acquisition Procedures").

three MARAD NDRF and the two Navy Inactive Ship sites and completed disposal actions on 220 ships. Ninety-five percent of all vessel disposal actions have been via recycling. During this period, 135 ships were downgraded from retention to non-retention status and added to the disposal queue.

Through the use of full and open competition, MARAD primarily uses sales and service contracts to achieve environmentally acceptable removal and disposal of its non-retention vessels. Recognizing the origin of the greatest environmental risks, MARAD continues to adhere to the policy of prioritizing removal for disposal of those non-retention vessels that are in the worst material condition. The annual goal is to remove non-retention vessels at an overall rate that is greater than or equal to the number added to the disposal queue each year.

Historic Low Number of MARAD Ships Awaiting Disposal

At the beginning of FY 2017 13 non-retention vessels remained in MARAD's three NDRF sites awaiting disposal through the MARAD SDP. As of October 1, 2017, there were 13 non-retention vessels awaiting disposal in MARAD's three NDRF sites and three inactive naval vessels at the Navy's INACTSHIPMAINTO in Philadelphia, PA, awaiting disposal through the MARAD SDP. MARAD and Navy have executed a MOA whereby MARAD disposes of specified Navy merchant type vessels from the INACTSHIPMAINTOs located in Pearl Harbor, HI and Philadelphia, PA. The 13 non-retention NDRF vessels in the MARAD fleet sites are a historic low compared to the 152 vessels awaiting disposal in the NDRF at the beginning of FY 2007.

MARAD's SDP's success includes exceeding the annual cumulative target requirements in each year of the March 2010 California Consent Decree for the removal of non-retention vessels from the SBRF, located north of San Francisco. At the beginning of FY 2017, 55 of 57 SBRF vessels, listed in the Consent Decree, 96 percent, had been removed from the SBRF for disposal, leaving two ships remaining to be removed by the September 30, 2017 deadline. MARAD completed the removal of the remaining two SBRF vessels in July of 2017 ahead of the consent decree deadline.[14]

These results are especially significant because MARAD is required to comply with environmental statutes that do not apply to a number of other Federal entities[15]. As a result, MARAD's environmental responsibilities with respect to ship disposal include some of the most stringent and costly environmental requirements applicable to any Federal Agency. For example, MARAD currently must pay to dry-dock and clean the hulls of all non-retention SBRF vessels prior to their final tow to the nearest qualified dismantling/recycling facility. MARAD only recycles vessels at facilities in the US that have been prequalified and the nearest facilities from San Francisco are located over 5,000 nautical miles away in Louisiana and Texas.

[14] The March 2010 Consent Decree can be found at http://www.waterboards.ca.gov/water_issues/programs/enforcement/docs/suisunbay_decree.pdf

[15] The Navy and Coast Guard are exempt from certain provisions of the Ballast Water Management Act and the Aquatic Invasive Species Act for national security reasons.

Simplified Acquisition for Vessel Recycling

In January 2005, MARAD utilized the Test Program for Certain Commercial Items (TPCCI) authorized by the FAR Part 13.5 to implement the use of Standing Quotations as the primary method for soliciting vessel recycling services. The TPCCI was made permanent with the passage of the FY 2015 National Defense Authorization Act. The use of Standing Quotations is a simplified acquisition procedure for the competitive procurement of commercial vessel dismantling and recycling services. The Standing Quotation process allows interested vendors to submit proposals on a continuous basis. Proposals are evaluated and those offerors whose proposals are determined to be technically acceptable form a pool of standing quotations that are qualified to respond to ship specific recycling announcements for sales and fixed price service offers.

Since it is not possible to predict which vessels may have a positive recycling value (ability for MARAD to sell to qualified facilities (Offerors)), the Standing Quotation process includes a solicitation that allows for both sales offers and fixed price service offers. Those ships not receiving sales offers are considered for fixed price service contracts. Sales and service contracts are awarded in accordance with FAR Part 13 Simplified Acquisition Procedures for the offers that represent the best value to the Federal Government. MARAD's ship disposal authority under the NMHA directs MARAD to make awards on the basis of best value, consistent with the FAR, to qualified facilities considering price/cost, timeliness to perform, worker safety and the environment

MARAD Ship Disposal Solicitation Process

MARAD's ship disposal solicitation, posted on the Federal Business Opportunity web site www.fbo.gov, describes the two-step process for companies to become qualified ship recycling facilities eligible to compete for the recycling of MARAD's non-retention vessels. In step one, companies submit a General Technical Proposal (GTP) inclusive of the Technical Compliance Plan (TCP) and all supporting documents. The solicitation describes the evaluation criteria of the GTPs, the establishment of a pool of qualified ship disposal facilities, the process for solicitation, among the qualified facilities, of sales offers and revised price quotations and the criteria for award of ship disposal sale contracts or ship disposal service contracts. MARAD has established a pool of qualified ship disposal facilities, among which it competes and awards contracts for disposal of non-retention vessels in the NDRF and excess vessels of other Federal Agencies. The pool is comprised of ship disposal facilities whose GTPs have been evaluated as technically acceptable. In step two, qualified facilities in the pool are eligible to compete for (a) sales contracts under which the Agency will sell the vessels for disposal; or (b) service contracts under which the Agency will consider acquiring ship disposal services if no sale offers are received. MARAD will periodically solicit ship-specific pricing and schedules from the pool of qualified ship disposal facilities and award disposal contracts in accordance with the evaluation criteria described in the solicitation. The Request for GTPs remains open until closed by an amendment to the Ship Disposal Solicitation.

Submittal of a General Technical Proposal – Step One
Companies interested in having one or more of their facilities become part of the pool of qualified ship disposal facilities are required to submit GTPs for each facility proposed to become part of the pool. GTPs must identify the locations of all operations where the work required by this Ship Disposal Solicitation will be performed. Preparation and dismantlement locations are parts of the single facility covered by the submitted GTP and will be evaluated per the stated evaluation criteria. The GTP must satisfactorily address all of the elements to performing ship recycling at the proposed facility as required in the solicitation inclusive of the following six elements:

1) Management, resources and facilities;
2) Production throughput/capacity;
3) Environmental considerations;
4) Worker safety and health considerations;
5) Hazardous material abatement considerations; and
6) Requisite and relevant experience.

If MARAD determines a proposed facility or dismantling methodology presents an increased risk to vessel stability, watertight integrity or hazardous material discharge, MARAD may require additional assessments, plans and/or procedures, from independent, third-party naval architects or professional engineers to be submitted with the GTP. Based on these submissions, a facility's qualification may be conditioned on the submission of certain ship specific deliverables with a sales offer or price quotation.

The GTP must include a TCP that consists of the following four elements: an Operational Plan, a Business Plan, a Worker Safety and Health Plan, and an Environmental Compliance Plan. The TCP is the primary basis for the evaluation of: (1) The degree to which the Offeror's claims of performance capability are supported; (2) The ability of the Offeror to perform in accordance with the contract requirements; and (3) The intent to dismantle the vessels domestically, in accordance with all applicable local, state, and Federal environmental, safety and health processes, procedures, laws, regulations and guidance. The TCP must provide sufficient detail to demonstrate a thorough understanding of regulations, production processes, and project management associated with the dismantling of a ship and demonstrates the ship disposal facility uses a valid and practical solution to the technical problems inherent in ship dismantling. The TCP must be sufficiently detailed, specific and complete to enable MARAD personnel to make a thorough evaluation of the TCP and a sound determination that the Offeror will have a reasonable likelihood of meeting the requirements and objectives of the Government. When accepted, the TCP is incorporated as part of the contract, as an addendum to the statement of work.

General Technical Proposal Evaluation Criteria
MARAD assesses the GTP for the comprehensiveness of the material relative to the TCP guidelines and the six elements listed above. The following criteria are utilized to evaluate the technical acceptability of the GTP's submitted based on the Offerors response to the six elements listed under the section - Submittal of a General Technical Proposal – Step One on page 16.

1) Feasibility and likelihood of success of engineering/technical/management approach for the disposal of non-retention vessels and the risks associated with the proposed approach.
2) Productivity of the proposed approach(s) including schedule assessments.
3) Type and sufficiency of proposed methods, processes and procedures for environmental abatement of hazardous materials, worker safety and health considerations proposed and compliance with applicable laws.
4) Depth, relevance and currency of requisite experience with the complete disposal of non-retention vessels.

The iterative evaluation process includes early notification by MARAD of any major threshold deficiencies in the proposal that inhibit the feasibility of the successful implementation of the GTP. MARAD may request and review additional necessary information in order to fully evaluate the GTP to ensure the Offeror has sufficient knowledge, resources and capabilities to successfully dispose of non-retention MARAD, Navy or other Federal Agencies vessels while protecting the environment and worker health and safety. Once the GTP is materially complete, reviewed and determined to be feasible, MARAD may elect to conduct an on-site visit to evaluate facility infrastructure, meet key personnel and verify-proposal information. The culmination of the iterative evaluation process will be the notification by MARAD that the GTP has been assigned one of the following ratings:

1) Technically Acceptable – A technically acceptable proposal demonstrates the Offeror has adequately addressed the six elements and can successfully remediate and dismantle non-retention vessels in a timely manner that is environmentally sound and satisfactorily takes into account worker health and safety.
2) Technically Unacceptable but Susceptible to Being Made Acceptable – A proposal that is deficient in some aspects of one or more of the six elements necessary to be technically acceptable; however, the deficiencies are considered to be correctable within a reasonable timeframe.
3) Technically Unacceptable – A proposal that fails to demonstrate the Offeror has adequately addressed one of more of the six elements necessary to be technically acceptable and is able to successfully remediate and dismantle non-retention vessels and the deficiencies are significant and not considered to be correctable, within a short timeframe. A technically unacceptable proposal will not be afforded the opportunity for corrections and the offer will have to resubmit a new proposal to merit further consideration.

Facilities with GTPs rated Technically Acceptable become part of the pool of qualified ship disposal facilities and are eligible to compete for specific vessels offered for recycling via ship sales and or prices revision announcements. Once a facility's GTP is found Technically Acceptable, the Offeror is required to operate its qualified facility and perform ship disposal contracts in accordance with its approved GTP and the awarded contract. Updates to the GTP are submitted to the Acquisitions Contracting Officer whenever there is a substantive change in the qualified facility, remediation/dismantling methodology, resources (including financial, equipment, direct labor and subcontractors), ownership, key personnel or other circumstances that affect the ship remediation/dismantling production, capacity, efficiency, worker safety, environmental protection or responsibility.

Submittal of Sales Offer or Price Revision - Step Two
MARAD periodically identifies specific vessel(s) for disposal via an electronic Announcement issued only to qualified ship recycling facilities. The announcement contains both a Request for Sales Offers (RFSO) and a Request for Price Quotations (RFPQ) as identified under the solicitation. The requests are independent of each other and only when no sales offers are received will MARAD officially request RFPQs. The Announcement will identify-the non-retention vessels currently located in the NDRF; SBRF, Beaumont Reserve Fleet (BRF), JRRF, or the Navy's INACTSHIPMAINTO in Philadelphia, PA, Pearl Harbor, HI and Bremerton, WA, and/or other locations to be recycled. The Announcement identifies the fleet at which the vessel is located and the price offered shall include all of the work required for preparation of the vessel in that fleet for transit to the recycling facility. When applicable, MARAD will take into consideration and minimize the geographic distance that a vessel must be towed. The non-retention vessels are offered on an "AS-IS, WHERE-IS" basis, with no warranty, express or implied, at their current fleet mooring site, or delivery location. MARAD makes no guarantees or warranties, express or implied, regarding the condition of any non-retention vessel and does not guarantee, by expression or implication, or the size, tonnage, or other descriptions of the non-retention vessel.

Evaluation and Award of Sales or Price Quotation Offers
For each sale or price offer received MARAD conducts a threshold evaluation in accordance with the FAR and best value consisting of the following:

1) Offerors are required to maintain continued technical acceptance by MARAD of their GTP. Updates to the GTP are required to be submitted with sales of price offers. Updates to the GTP will be evaluated to determine whether the proposal remains technically acceptable.
2) Sales and price offers that take exception to, unilaterally change, or are contrary to the terms and conditions in the Ship Disposal Solicitation, any vessel specific announcement, or Ship Sales or Service Contracts clauses will not be considered for award.

Three evaluation factors are considered when making the best value selection decision. The factors are not listed in any particular order of priority or importance, as permitted by the simplified acquisition procedures of the FAR. The evaluation factors for award are as follows:

1) Performance Schedule and the Vendor's available capacity (non-price factor).
2) Price Factor - The price offered (sales or service) for each vessel's dismantling services.
3) Past Performance (non-price factor).

Performance Schedule and the vendors available capacity pertains to the Offerors existing MARAD, Navy and Commercial work load and its ability to accept the vessel for recycling at its facility, the ability to mobilize resources, including infrastructure, labor and financial to accomplish the work, the ability to remove the vessel from the fleet within the required duration and the ability to actively dismantle the vessel upon its arrival at the recycling facility within the parameters of a reasonable contractor produced performance schedule. Price factor pertains to the Offerors submitted price for each vessel which includes the sales price or fee-for-service recycling costs. MARAD evaluates the following areas of an Offeror's performance under prior

MARAD contracts consistent with FAR 42.1501 ("Contractor Performance Information"). A positive record in each of the past performance elements is advantageous to the Government.

Basis for Best-Value Award

Awards are made on a best-value basis, utilizing non-price and price factors consistent with 54 U.S.C. § 308704(c)(1)(B) and FAR Part 13 ("Simplified Acquisition Procedures"). Awards are made to the Offeror with a technically acceptable proposal whose offer, in conformance with the Ship Disposal Solicitation is evaluated to be most advantageous to MARAD, price and non-price factors considered. Awards will be made on a "best-value" basis consistent with the FAR. "Best-Value" means the expected outcome of an acquisition that, in the Government's estimation, provides the greatest overall benefit in response to the requirement.[16]

Award on the basis of "best-value" allows the trade-off of price and non-price factors to achieve the greatest overall benefit to the Government for each individual vessel or groups of vessels. A trade-off is appropriate when it may be in the best interest of the Government to consider an award to other than the highest-priced sales offer (or lowest-priced quotation for ship disposal services) because of differences in schedule, capacity and/or past performance. When determining "best-value", MARAD considers price and the non-price factors of performance schedule, facility capacity and past performance. As permitted under the simplified acquisition procedures, the relative order of importance of the evaluation factors is not stated in the solicitation. The importance of the evaluation factors for each of the vessel awards is not specified because the trade-offs necessary for selecting the multiple awards are often made on a case-by-case basis given the specific offers received for the particular recycling announcement. No dollars-for-days formula or fixed ratio is used to determine when a tradeoff is appropriate. This approach results in a reasonable and timelier selection process.

MARAD Vessel Awards by Fiscal Year

Figure G shows the number of MARAD vessels awarded for disposal since 2001 by each method. The 209 ships awarded in recycling contracts represents 95 percent of the total 219 vessels awarded by MARAD since 2001. The other ten vessels were awarded through the other four disposal methods, partly due to significantly less demand by coastal states for artificial reefing projects, applications from non-profit organizations for specific vessel donations, curtailment of the Navy's deep-sinking program, and limitations on vessel usage for sales for re-use. The high cost of vessel acquisition, PCB and hazardous material remediation, and environmental preparations render these disposal alternatives costly when compared to domestic recycling.

[16] In accordance with FAR Part 13 ("Simplified Acquisition Procedures").

Figure G: MARAD Vessel Awards by Fiscal Year

Vessel Awards by Disposal Option by Fiscal Year																		
Type of Disposal	FY01	FY02	FY03	FY04	FY05	FY06	FY07	FY08	FY09	FY10	FY11	FY12	FY13	FY14	FY15	FY16	FY17	Totals
Recycling (Fee for Service)	5	2	15	11	16	13	14	4	8	11	10	0	0	3	2	1	4	119
Recycling (Sales)	0	0	0	2	1	5	4	16	5	0	8	16	19	8	5	1	0	90
Artificial Reefing	1						2			1								4
SINKEX					2													2
Donation								1										1
Sale for Reuse							3											3
Totals	6	2	15	13	19	18	23	21	13	12	18	16	19	11	7	2	4	219

Awards for FY 2017 are through 9/30/2017

The Agency currently has five qualified ship recycling facilities, three in Brownsville, TX and one each in New Orleans and Amelia, LA.[17] The Navy's Program, which includes Navy service contracts for inactive vessels and inactive vessel sales for recycling through the DLA utilizes most of the same facilities. The three recycling contractors currently used by the Navy for dismantling/recycling of its conventional aircraft carriers in Brownsville, TX, are also qualified contractors under MARAD's Program and are currently considered the three domestic facilities with the greatest industrial capacity. The award by the Navy of two-year recycling contracts in FY's 2014-2017 for five aircraft carriers and the contract awards for smaller inactive vessels by DLA in FY 2015 resulted in initial industrial capacity shortages and less competition for contract awards. The collapse of the price of scrap steel, lack of ship sales by MARAD and the Navy in FY's 2016-2017 and minimal appropriations to fund ship recycling service contracts have mitigated industrial capacity shortages but remain one of the prevalent influences in the lack of competition for contract awards.

MARAD Ship Disposal Funding

There are numerous factors that affect whether the recycling of non-retention vessels is accomplished through vessel sales with revenue to the Government or in the procurement of recycling services with appropriated funds. The primary factors include the market price of scrap metals, the vessel's size/condition, the type and quantity of hazardous materials, the quantity and type of recyclable materials, the amount of competition for each vessel, the duration/cost of the tow from the fleet to the recycling facility and the cost to remove marine growth prior to towing to different bio-geographical areas. The highest costs are typically associated with SBRF vessels due to the current environmental requirement to dry-dock each vessel to remove marine growth prior to removal and start of the 5,000-mile tow to a Gulf Coast

[17] ESCO Marine, Inc. a qualified ship recycler in Brownsville, TX, ceased operations in February 2015. On March 6, 2015, ESCO filed for Chapter 11 bankruptcy reorganization. On May 1, 2017 ESCO emerged from bankruptcy as HRP Brownsville, LLC and commenced recycling operations at the facility.

recycling facility. Included in the Offeror's sales/price proposals are tug mobilization, towing costs, fuel and Panama Canal transit fees.

Funding for the protective storage of the NS SAVANNAH (NSS) has historically been apportioned from the overall SDP budget. Continuing resolutions in FY's 2010-2011 coupled with an increase in vessel sales led to larger than anticipated fund carryovers. Reduced SDP appropriations from FY's 2012-2017, a decrease in vessel sales, an increase in the procurement cost for dry-docking and ship recycling services to remove the SBRF vessels contributed to the spend down of SDP carryover funds by FY 2015. Figure H shows the enacted appropriations to the SDP for FY's 2011-2017 and the apportionments to the NSS for FY's 2015-2017.[18]

Figure H: MARAD Ship Disposal Appropriations FY's 2011 - 2017

Annual Ship Disposal Approprations by Fiscal Year							
Fiscal Year	**FY 2011**	**FY 2012**	**FY 2013**	**FY 2014**	**FY 2015**	**FY 2016**	**FY 2017**
Appropriation	$12.0M	$2.5M	$2.4M	$2.0M	$2.0M /1	$3.0M /2	$7.0M /3

/1 Represents the Ship Disposal Program apportionment of the $4.0M Ship Disposal appropriation in the Consolidated and Further Continuing Appropriations Act, 2015. The $2.0M balance was apportioned to the NS Savannah for ongoing protective storage activities required under the Nuclear Regulatory Commission license.
/2 Represents the Ship Disposal Program apportionment of the $5.0M Ship Disposal appropriation in the Consolidated Appropriations Act, 2016. The $2.0M balance was apportioned to the NS Savannah for ongoing protective storage activities required under the Nuclear Regulatory Commission license.
/3 Represents the Ship Disposal Program apportionment of the $10.0M Ship Disposal appropriation in the Consolidated Appropriations Act of 2017. The $3.0M balance was apportioned to the NS Savannah for ongoing protective storage activities required under the Nuclear Regulatory Commission license.

Appropriations for ship disposal had been at $12M annually from FY 2007 through FY 2011. Favorable industry and scrap steel market conditions from FY 2006 through FY 2008 boosted ship recycling sales, accumulation of annual carryover funds and the surpassing of annual ship award and removal goals. Additionally, the suspension of costly SBRF vessel removals from FY 2007 through FY 2009 as a result of on-going litigation in California contributed to annual funding carryover. The economic downturn in 2008 resulted in the decline in vessel sales. No vessels were sold in FY 2010 resulting in the spend-down of some funding carryover, which totaled approximately $26M at the start of FY 2010. However, the economy and scrap steel markets began to recover in FY 2011 resulting in an increase in vessel sales for the Program and reduced the need for appropriations at the $12M level.

In FY 2012, with a carryover of $20M, appropriations were decreased to $2.5M, which coincided with strong scrap steel market conditions and strong competition for contracts by domestic recyclers resulting in an increasing number of vessel sales from FY 2011 through FY 2013. While the scrap steel markets remained strong in early FY 2014, available ship recycling capacity decreased due to the award of four Navy aircraft carrier recycling contracts, which resulted in weaker competition for MARAD non-retention vessels. With a carryover level of $6.6M at the start of FY 2014, appropriations were decreased to $2.0M. Appropriations for FY 2015 were $4.0M of which $2.0M was apportioned to the NSS for continuation of protective

[18] In FY 2017 The NSS received a separate line item appropriation in the amount of $24M to commence the decommissioning of the de-fueled nuclear power plant on board the vessel.

storage activities required under the NRC license. Apportionment of the appropriations to SDP for FY 2015 was $2.0M with a carryover of $3.6M.

In FY 2015, MARAD utilized the majority of its ship disposal funding to procure ship recycling and dry-dock services to facilitate the removal of two SBRF vessels. Scrap steel prices declined throughout all of FY 2015 to levels not seen in 15 years. The collapse in scrap steel prices caused one recycler to rescind an offer to purchase a non-retention vessel, led to the repudiation of two awarded MARAD ship recycling contracts by another recycler, and was a contributing factor in the cessation of operations at another MARAD/Navy qualified recycling facility. In FY 2016, funds retained due to the termination of two SBRF ship recycling service contracts, one SBRF dry-dock contract and the re-procurement of one of the two SBRF ship recycling service contracts resulted in a carryover level of approximately $902K into FY 2016.

Savings from reduced expenditures in FY 2016 plus carryover funds from FY 2015 proved sufficient to award service contracts for the recycling and dry-docking, totaling $1.65M, for one SBRF vessel in May 2016. At the beginning of FY 2017 two of the original 57 SBRF non-retention vessels included in the 2010 Consent Decree remained in the fleet. Sufficient appropriations were received in FY 2017 to remove both the SBRF vessels in July 2017, ahead of the consent decree deadline. Prior year appropriation carryovers accrued during the FY's 2011–2015 period of increased ship sales have been expended in conjunction with reduced appropriations from FY's 2012–2016. Increasing scrap steel prices in 2017 provided cost savings from lower than expected award amounts for the remaining two SBRF vessels. The savings resulted in the award of two vessels from the JRRF in September 2017. FY 2017 SDP carryover is estimated at $2.7M and will be utilized to prepare a high priority JRRF vessel for disposal.

Navy Ship Disposal Program

The Navy Inactive Ships Office (SEA 21I) manages the US Navy ships and craft that have reached the end of their expected service life and vessels designated as viable for potential future use, which are placed into storage until a later decision is made as to disposal. SEA 21I is responsible for the planning, programming, budgeting, and execution of the Navy's inactivation and disposal of conventionally powered surface ships and craft. SEA 21I utilizes vessel donation, Fleet Training Exercise (live-fire) (SINKEX), foreign military sales, dismantlement and recycling (through either sales or procurement contracts) to dispose of its conventionally powered surface inactive vessels. Nuclear powered vessels are not included in the listed disposal options as they are dismantled/recycled under a separate process.

Environmental Stewardship

MARAD remains committed to disposing of non-retention vessels in a manner that minimizes any adverse effect on the environment. In addition to developing a NEPA Programmatic Environmental Assessment (EA) for ship disposal, MARAD initiated a series of best management practices related to maintenance, transport and disposal of non-retention vessels. As part of that effort, the Agency initiated underwater hull cleaning prior to towing those vessels to recycling facilities in other bio-geographical areas to reduce the risk of transporting aquatic invasive species.

Pursuant to an agreement with the State of California, MARAD began cleaning marine growth and loose exterior paint from the vessels through dry-docking prior to towing SBRF vessels to recycling facilities in different bio-geographical areas. The process was designed to mitigate the transfer of potential invasive marine species and the discharge of exfoliating paint during transit. In 2009, MARAD contracted with, at that time, the only available San Francisco area facility for dry-docking services to remove marine growth from the hull and exfoliated paint from topside surfaces. In addition, MARAD worked with Louisiana, Texas and Virginia, to address each of those states environmental concerns related to the transport of aquatic invasive species.

The Navy is currently engaged in programmatic Endangered Species Act consultations with the NMFS regarding the development of a programmatic biological opinion that encompasses all potential inactive ship disposal dispositions. The goal is to comprehensively evaluate the biological impact to marine ecosystems of the entire Inactive Ship Program process from storage of inactive ships at fleet anchorages and ports, towing to disposal locations or recycling facilities through dismantlement and/or final disposition.

Environmental Regulation and Related Legal Challenges

The challenges related to the NISA and the CWA compliance require appropriate financial resources to mitigate invasive species impact to the environment. MARAD is complying with the NISA obligations in administering ship disposal activities and in doing so, has agreed to clean the underwater hulls of vessels to remove soft aquatic growth prior to towing non-retention vessels from the biogeographic areas in which they are located. NDRF vessels are cleaned waterborne in Texas and Virginia prior to transit for recycling in Texas and Louisiana. Vessels must depart the fleet locations within 14 days after completion of the hull cleaning to prevent new growth on the underwater hull. Waterborne marine growth mitigation costs have ranged from $75-150 thousand per ship and have reduced sales revenues when the recyclers procure the service. MARAD directly procures the service when awarding ship recycling service contracts. MARAD has qualified two commercial diving companies capable of performing waterborne hull cleaning while the Navy utilizes their own contractor. Availability of the diving companies has impacted the rate of vessel removal from the fleets.

For ships in the SBRF, MARAD further agreed with California, as memorialized in the Consent Decree, to perform cleaning in dry-dock because of concerns related to possible paint discharges. California now allows in-water hull cleaning of Ready Reserve Fleet (RRF) vessels in San Francisco Bay waters with an approved discharge capture method. However, because of unique concerns regarding specific aquatic species in Texas and Louisiana, MARAD currently continues to clean SBRF vessels destined for those two States in dry-dock. Due to these concerns, the cleaned SBRF vessels must also be removed from San Francisco Bay waters within 14 days of undocking. The requirement to dry-dock SBRF ships in California to clean underwater hulls of marine growth before departure has cost an average of approximately $500 thousand per ship. The rate of SBRF vessel departures has been impacted by the available shipyards in the San Francisco Bay area because the vessels must be cleaned of aquatic growth prior to departure from San Francisco. The availability of dry docks has been limited to one or two companies over the years and for the shipyards, MARAD vessels are low priority after commercial and US military vessels. Further, mobilizing towing assets to remove the vessels after dry-docking within the prescribed timeframe is subject to their availability

IV. DISTRIBUTION OF COLLECTED SALES PROCEEDS

MARAD Ship Sales Revenues

Accrued revenue from the sale of non-retention vessels over the past eight years FY's 2010-2017 has been approximately $67 million from the sale for dismantling/recycling of 57 ships as shown in Figure I. Revenues from the sale of non-retention vessels do not supplement the SDP appropriations and are credited to the VORF.

Figure I: Non-Retention Vessel Sales Revenue by Fiscal Year

Vessel Sales Revenue by Fiscal Year									
Fiscal Year	**FY 2010**	**FY 2011**	**FY 2012**	**FY 2013**	**FY 2014**	**FY 2015**	**FY 2016**	**FY 2017**	**Total**
Annual Sales Revenue ($):	$0	$7.6M	$18.9M	$24.6M	$9.8M	$6.1M	$52K	$0	$67M
Vessel Sales Contracts:	0	8	16	19	8	5	1	0	57

* For this table vessel sale revenues are calculated using the vessel contract award date as the date of receipt of sale revenues in each fiscal year. Figures in FY 2017 reflect awards through September 30, 2017.

The volatility of the price of scrap steel and its impact on vessel sales is evident in the above table depicting the sale of vessels for recycling for FY's 2010–2017. The table indicates a trough of zero vessel sales in FY 2010, increasing to a peak of 19 vessels sold in FY 2013 with a slow slide to another trough of zero vessels sold in FY 2017. In FY 2010, MARAD did not sell a single vessel for recycling but awarded service contracts for the recycling of 11 vessels. The price of scrap steel began rebounding in FY 2010, and from FY's 2011-2014 MARAD sold 51 ships and generated approximately $61 million in revenue. The decline in vessel sales for recycling in FY's 2015–2017 is directly attributable to the slowdown in domestic and international economic activity, reduced global demand for commodities, especially metals, and the subsequent collapse in the scrap metal markets.

National Maritime Heritage Act (NMHA) – Until recently, 54 U.S.C. § 308704 provided the following allocation of non-retention vessel sales proceeds within the VORF:

> "(a)(1) Notwithstanding any other provision of law, the amount of funds credited in a fiscal year to the Vessel Operations Revolving Fund established by section 50301(a) of title 46 that is attributable to the sale of obsolete vessels in the National Defense Reserve Fleet that are scrapped or sold under section 57102, 57103, or 57104 of title 46 shall be available until expended as follows:
>
> (A) [VORF A] Fifty percent shall be available to the Administrator of the Maritime Administration for such acquisition, maintenance, repair, reconditioning, or improvement of vessels in the National Defense Reserve Fleet as is authorized under other Federal law.
>
> (B) [VORF B] Twenty-five percent shall be available to the Administrator of the Maritime Administration for the payment or reimbursement of expenses incurred by or on behalf of State maritime academies or the United States Merchant Marine Academy for facility and training ship maintenance, repair, and modernization, and for the purchase of simulators and fuel.
>
> (C) [VORF C] The remainder (25%) shall be available;

(i) [VORF C1] To the Secretary to carry out the National Park Service's (NPS) National Maritime Heritage Grant Program (NMHGP),[19] and
(ii) [VORF C2] If otherwise determined by the Administrator of the Maritime Administration, for use in the preservation and presentation to the public of maritime heritage property of the Maritime Administration."[20]

National Maritime Heritage Act – Amended by the FY 2017 NDAA
Section 3507 of the FY 2017 NDAA amended 54 U.S.C. § 308704, effective December 23, 2016, as follows:
(A) [VORF A] 50% shall be available to the Administrator of the Maritime Administration for such acquisition, maintenance, repair, reconditioning, or improvement of vessels in the National Defense Reserve Fleet.
(B) [VORF B] 25% percent shall be available to the Administrator of the Maritime Administration for the payment or reimbursement of expenses incurred by or on behalf of State Maritime Academies or the United States Merchant Marine Academy for facility and training ship maintenance, repair, and modernization, and for the purchase of simulators and fuel.
(C) (VORF C) 25%, the remainder, shall be available to the Secretary to carry out the Program.
(i) (VORF C1) 25% provided to the Secretary to carry out the NPS NMHGP.
(ii) (VORF C2) Set Aside - Not less than 25% of the amounts available in (C)(i) each fiscal year for the NMHGP shall be used for preservation and presentation to the public of maritime heritage property of the Maritime Administration.[21]

The set aside ensures MARAD will receive at a minimum 25 percent of the 25 percent (approximately 6.25 percent) of the funds allocated to the VORF C2 sub-account for the preservation and presentation to the public of MARAD's maritime heritage property.

MARAD has determined the FY 2017 NDAA VORF C sub-account allocation changes does not require a retroactive reallocation of previously credited sales proceeds prior to the passage of the statute. Funds in the VORF sub-accounts, prior to passage of the FY 2017 NDAA, will therefore be allocated in accordance with the previous allocation process. Sales proceeds credited to the VORF after passage of the FY 2017 NDAA will be allocated under the new allocation process.

FY 2018 Start VORF Account Balances
MARAD has created VORF sub-accounts patterned on the NMHA funding allocation requirements of § 308704 to actively manage the ship recycling sale revenues credited into the VORF account. The FY 2018 start sub-account fund balances are listed in Figure J.

[19] The Secretary referenced in this statute is the Secretary of the Interior, the home agency of the NPS, the recipient agency for VORF funds and administrator of the National Maritime Heritage Grants Program.
[20] In 2013 MARAD and the NPS entered into a Memorandum of Agreement which established the 12.5% allocation of the VORF C funds. The amounts are adjustable based on consultation and each agencies requirement. https://www.marad.dot.gov/wp-content/uploads/pdf/MARAD_-_NPS_MOA_for_National_Maritime_Heritage.pdf
[21] The intent of the amendment to the VORF C fund distribution is to designate the remaining 25% of available funds to the Secretary of the Interior to carry out the National Park Service's National Maritime Heritage Grant Program. Not less than 25% of the funds designated to the NPS are to be set aside for preservation and presentation to the public of maritime heritage property of the Maritime Administration.

MARAD has created VORF sub-accounts, A, B, C1 and C2 patterned on the NMHA funding distribution requirements of § 308704 to actively manage the ship recycling sale revenues credited into the VORF account.

Figure J: FY 2018 Start - VORF Sub-Account Balances

Vessel Operations Revolving Fund	
Sub-Account Balances	
VORF A (NDRF)	$2,476,704
VORF B (SMA's & USMMA)	$2,404,138
VORF C1 (NPS)	$456,981
VORF C2 (MARAD)	$2,923,601
Suspense Account	$0
Total	$8,261,424

Fund balance as of October 1, 2017.

MARAD will continue to disburse funds from the VORF sub-accounts in FY 2018. Below is a breakdown of the October 1, 2017, balance in each of the sub-accounts and the planned disbursements of funds from each sub-account is provided.

- **VORF A -** Funds from this sub-account are used for repairs and maintenance of NDRF vessels. In FY 2018 $1.5 M will be obligated for the planned dry-docking and repairs to the vessel FREEDOM STAR. The balance of the funds in this account will be used in future years for maintenance and repairs to the vessel.

- **VORF B –** Funds in this sub-account are used to help defray expenses at the USMMA and the six Maritime Academy's. The USMMA is slated to receive approximately $1,244,817 of the current fund balance in this sub-account. The remaining funds will be distributed to the six maritime academies.

- **VORF C1** – Funds in this sub-account are made available to the NPS upon request to fund the NMHGP. The NPS received distributions totaling $5,035,398 from this sub-account in FY 2017. MARAD will transfer the remaining balance to the NPS upon their request.

- **VORF C2** – Funds in this sub-account are used for preservation and presentation to the public of maritime heritage property of the MARAD. For FY 2018, the Maritime Administrator has approved additional maritime heritage projects related to the preservation and education of MARAD artifacts, vessels and facilities. Figure K identifies the approved heritage projects scheduled for commencement during the fiscal year. These projects include historical documentation preservation, public outreach, and heritage asset conservation. MARAD will continue to identify projects that preserve and present its maritime history and heritage for the public

Figure K: FY 2018 VORF C2 Funds Distribution Plan

FY 2018 VORF C2 Funds Distribution Plan		
VORF C2 (HQ)	**MARAD FY 2018 Planned Maritime Heritage Projects**	**Estimated Cost**
Project	**Project Description**	
1	Photograph 16 ship models in the U.S. Maritime Commissions Long-Range Ship Building Program for use in the MARAD on-line exhibit.	$20,000
2	Repair and conserve two damaged ship models including display bases and cases.	$6,500
3	Clean, conserve and construct a stand for the display of the Cape Johnson's original ships bell.	$2,500
4	Complete the necessary infrastructure and preservation efforts at MARAD's historic property repository at Cheatham Annex. The objective is preserve and protect MARAD's historic artifiacts in accordance with Federal curation standards.	$15,000
5	MARAD Vessel History Database Research/Normalization support. Continues MARAD's responsibilites for preservation of historic and archiological resources IAW with the National Historic Preservations Act. Fosters MARAD's efforts to compile data and records on approximatley 2,000 merchant ships sunk primarily during WWII under the Sunken Military Craft Act.	$162,000
6	Digitize for online access a donated collection of approximatley 6,000 postcards of merchant ships and maritime related items dating back to WWI.	$22,000
7	IT Support for MARAD's Vessel History database. Improvements will clean-up ship history pages and provide better functionally and search capabilities	$65,000
8	Travel necessary to fulfill program responsibilities	$9,500
9	Miscellaneous expenses for program and heritage asset management	$3,000
	Total Estimated Costs	$305,500

V. DISTRIBUTION OF FUTURE VORF COLLECTIONS

Distribution of future VORF collections is dependent on two major factors; 1) stable prices for domestic and international scrap steel which covers the risks encountered by the ship recyclers, and 2) a sustained supply of obsolete Federal vessels entering the disposal queue. MARAD ship sales are the only source of revenues credited to the VORF account. Proceeds from the Navy ship sales, via DLA, are credited to the Defense Working Capital Fund. As of October 1, 2017, MARAD and the Navy, Inactive Ships Office, are the only two Federal Agencies listing vessels available for disposal. Figure L provides a breakdown of the MARAD and Navy Inactive Ships vessel dispositions by vessel disposal category. Of the 48 vessels listed 30 (11 MARAD and 19 Navy) or 63 percent are listed as available for scrapping. Eighteen, or 38 percent of the total Navy Inactive ships, are on hold for FMS, SINKEX and Donation disposition. Durations for keeping a vessel on hold vary depending upon the planned final disposition. For example, one of the Navy vessels on hold is the destroyer Ex-CHARLES F. ADAMS (DDG-2). Completing the donation process to accept a vessel of this size takes years. Vessels sold in the FMS program are subject to multiple reviews by the Department of Defense (DOD), Department of State (State) and Congress requiring unknown durations for vessel retention. SINKEX actions are planned years in advance and require obtaining and holding obsolete vessels until the live fire exercises commence.

Figure L: FY 2018 Vessels Available for Disposal

Vessels Avaiable for Disposal					
Agency/Disposition	Scrap	FMS	Sinkex	Donation	Totals
MARAD	11	0	0	0	11
Navy Inactive Ships	19	10	7	1	37
Totals	30	10	7	1	48

There are four agencies which indicate planned vessel retirements in the next five years, FY's 2018 – 2022. Figure M shows the number of vessels by each fiscal year over the next five years each of the four agencies plan to retire. These vessels are still for the most part operational and are subject to changes in mission requirements, appropriations, maintenance, and new build replacements which may shorten or extend the vessels service life. Decisions affecting the final dispositions of some of the 29 vessels projected to be retired in the next five years are yet be made. Not all these vessels will be scrapped as they will be divided amongst the various disposal dispositions as needed by each Agency. Of the 29 vessels projected for retirement only the 13 owned by MARAD, 45 percent, are planned for disposal, initially via sales for recycling. Most if not all of these vessels will undergo decommissioning procedures, equipment stripping actions and historic assessments before they can actually be offered for sale. This process, accomplished independently by each agency, can take years adding significant time from the date the vessel is retired to the date the vessel is available for disposal and thus offered for sale. It is impossible to predict how many vessels from which agency will be available to MARAD for sale in any given year.

Figure M: Agency Five-Year Ship Retirement Projections FY 2018 - 2022

Agency	Fiscal Year Removed from Service					5-Year Total
	FY 18	FY 19	FY 20	FY 21	FY 22	
Maritime Administration	2	1	6	2	2	13
Military Sealift Command	2	1	1	3	0	7
NAVY Active	0	0	2	0	2	4
United States Coast Guard	2	1	1	1	0	5
Projected Annual Total Vessels Removed from Service	6	3	10	6	4	
	Total 5-Year Removed from Service					**29**

MARAD will continue to monitor the price of scrap steel on a monthly basis, ascertain the throughput capacity of its qualified ship recyclers based on their current workloads and offer available obsolete vessels for sale to maximize sales revenue and to maintain a healthy ship recycling industrial base. Sales proceeds collected will be allocated first via the VORF suspense account to protect the Agency against claims or contingencies against the sales proceeds and allocated secondly to the various VORF sub-accounts required in 54 U.S.C. § 308704, as amended by the FY 2017 NDAA, once potential claims or contingencies against the sales proceeds are extinguished.

VI. RECENT SHIP DISPOSAL PROGRAM ASSESSMENTS

The ship recycling industry has always maintained a healthy interest in the policies, procedures and acquisition processes of the SDP. The industry has been instrumental in providing feedback and informative critiques on how the SDP conducts ship sales and procures ship recycling services. The SDP is a better program today due to their diligence in striving for continuous improvements in the program operations. Three recent independent assessments of the SDP highlight the efficacy of existing processes, the need for areas of improvements, compliance with Federal statutory requirements and quick implementation of process improvements. A brief overview of the highlights of each investigation is provided with recommendations and SDP implemented outcomes where applicable. Links to the actual reports are provided.

Government Accountability Office Audits

GAO Report-14-223

The Coast Guard and Maritime Transportation Act of 2012 mandated that GAO conduct an assessment of the source selection procedures and practices used to award MARAD ship recycling contracts, including the process, procedures and practices used for qualification of ship disposal facilities, whether MARAD's contract source selection procedures and practices are consistent with the law, and best practices associated with making source selection decisions, as well as any other aspect GAO deemed appropriate to review. This report assesses MARAD's 1) source selection process; 2) communication strategy with ship disposal facility contractors; and 3) long-term ship disposal strategy.

MARAD uses a source selection process to determine which offer provides the best value to the government. This process allows the government to accept an offer other than the best priced offer, considering both price and non-price factors. MARAD uses the following three evaluation criteria to determine which offers provide the best value for the government:

- price,
- schedule and capacity, and
- past performance.

Because it is using simplified acquisition procedures, MARAD is not required to disclose the relative importance assigned to each evaluation factor.

<u>What the GAO Found</u>

GAO issued its report in February, 2014 and determined that MARAD uses a two-step source selection process, first by qualifying contractors and then awarding contracts for ship recycling services based on best value. The GAO determined this process was consistent with the FAR. The best value source selection process allows the government to accept an offer other than the best-priced offer, considering both price and non-price factors, that provides the greatest overall benefit to the government. MARAD considers three evaluation criteria: price, schedule and capacity, and past performance. GAO also found that there was some confusion in the industry with regard to how MARAD utilized the best value methodology in conducting ship recycling award evaluations.

GAO Recommendations

GAO recommended MARAD improve its communication strategy with the ship recyclers to maximize the transparency of its source selection process. GAO also recommended MARAD improve its communication process to let industry know of its strategic plan for short and long-term disposal of MARAD's obsolete ships. The SDP improved its debriefing process by formalizing its process for notification of best value for each ship recycling announcement, offering clearer de-briefings by expanding the narrative sections on capacity and best value to its pre-debriefing form and responding informally to the recyclers inquiries. MARAD initiated an annual town hall meeting whereby senior MARAD leadership meets with recycling executives and provides an outlook for future MARAD ship recycling disposal plans.

The GAO Report can be found at http://www.gao.gov/products/GAO-14-223.

GAO Report-17-280

The Coast Guard Authorization Act of 2015 included a provision for GAO to conduct an audit of VORF funds since fiscal year 2005. In this report, GAO assessed the extent to which, 1) MARAD's accounting for and allocation of the proceeds in the VORF were consistent with applicable law and 2) MARAD's disbursement of those proceeds was consistent with applicable law. GAO recalculated the allocation of proceeds against requirements, examined support for VORF payments related to NPS and the maritime academies, and tested a statistical sample of VORF-funded MARAD and NDRF expenses.

What the GAO Found

GAO issued its report in February, 2017 and found that MARAD's disbursements from the VORF to the NDRF, USMMA and six maritime academies and the NPS were consistent with applicable law.

GAO Recommendations

GAO offered no recommendations for changes to MARAD's VORF disbursement procedures.

The GAO Report can be found at http://www.gao.gov/products/GAO-17-280.

DOT Office of Inspector General Audit

The DOT Office of Inspector General (DOTIG) investigated for weaknesses in MARAD's management controls for risk mitigation, workforce development, and program implementation that hindered the Agency's ability to meet its mission.

What the DOTIG Found

The DOTIG issued its report in December 2015 affirming MARAD's legal authority as the disposal agent for obsolete NDRF vessels and merchant-type vessels owned by other Government agencies. DOTIG found MARAD's Ship Disposal Program lacked policies and procedures for notifying other Federal agencies of its role as the disposal agent and for identifying the universe of Government-owned vessels it is responsible for disposing.

DOTIG Recommendations

The Report recommended MARAD develop or update policies and procedures to carry out MARAD's ship disposal responsibilities under 40 U.S.C. § 548, including policies and procedures for: 1) identifying the universe of Government-owned vessels that meet the statutory criteria for MARAD to serve as the disposal agent; and 2) notifying agencies that own these vessels of MARAD's disposal agent role.

In 2016, the SDP initiated its annual Federal outreach program which identified the other Federal agencies which own or operate merchant-type vessels that met the statutory 1500 gross ton threshold for MARAD disposal. The universe of ships was identified and the results were published in the FY 2016 Office of Ship Disposal Program Annual Report.

The DOTIG Report ST-2016-011 can be found at: https://www.oig.dot.gov/sites/default/files/MARAD%20Management%20Controls%20Final%20Report_12-10-15.pdf.

VII. CONCLUSION

An aggressive program of maximizing vessel sales, coupled with the use of ship disposal appropriations and pursuit of all feasible disposal options has resulted in the removal of 221 obsolete NDRF vessels since FY 2001. Those removals from the fleet sites have reversed a trend in the growth of the number of obsolete ships in MARAD's custody. As of October 1, 2017, there were only 11 NDRF non-retention ships available for disposal remaining in MARAD's three fleet sites, which is a historic low.

Moreover, the best-value award and removal of all of the Program's high priority ships has significantly mitigated the threat of residual oil spills and exfoliating paint discharges into the environment.

The market price of recyclable steel is the primary factor that affects the Government's ability to sell vessels for recycling and/or procure recycling services. The price of scrap steel is volatile in nature, unpredictable, and derived from worldwide economic conditions. It directly affects other ship recycling variables such as; the availability of competitive recycling facilities with available capacity and adequate production throughput; dry-dock availability (for SBRF ships); the costs of environmental remediation of hazardous material streams such as asbestos, PCBs and loose exterior paint present on the non-retention vessels; and the nature and number of vessels recycled in the US both government and non-government.

The collapse of scrap steel prices beginning in 2015 and lasting through mid-2017, was fueled by a slowing worldwide demand for processed and finished steel products. The resulting impact depressed the domestic ship recycling industry whereby recycling facilities were unable to purchase MARAD/Navy vessels for recycling. The low price of scrap steel makes it uneconomical for ship recyclers to recycle MARAD/Navy non-retention vessels without an award of a service contract to subsidize costs. The slow rebound in scrap steel prices beginning in early 2017 has reduced the cost of procuring recycling services. However, steel prices have not significantly rebounded to levels necessary to reduce the recycler's risk in overcoming factors such as towing distance, vessel size and condition and type of hazardous materials on board the ships.

The decline in vessel sales reduces proceeds credited into the VORF account, and when combined with reduced ship disposal appropriations lessens the SDP's flexibility to award vessel recycling service contracts in the face of declining scrap steel prices. This imbalance between the award of vessel sales and service contracts leaves both MARAD and the Navy unable to respond to volatile scrap steel prices, sustain a steady flow of vessels in the disposal queue, and preserve the ship disposal industrial base. Extended declines in the scrap steel markets churn the ship recycling industry. Smaller qualified ship recycling facilities are the first to feel the effects of lower prices and reduced scrap steel demand. Severe market downturns, as we have recently experienced, reduces their access to financing, decreases their competitive advantage and leads to consolidation, buyouts and closures. Uncorrected, the imbalance will lead to an increase in the backlog of obsolete vessels in the MARAD's fleet anchorages, greater environmental risk, less competition and available ship recycling capacity and lower sales offers and higher costs for procurement of recycling services.

Significant market fluctuations in scrap steel prices and trends in any one or a combination of those variables are beyond MARAD control and can significantly affect meeting performance targets. Positive trends in the majority of the variables boost vessel sales, increasing sales revenue which increases funds available in the VORF. Negative trends in the variables reduce or eliminate vessel sales, decrease sales revenue and require appropriated funds to dispose of non-retention vessels.

The volatility of the scrap steel market, the low number of Federal vessels in the disposal queue, the projected low number of future vessel retirements and fewer qualified ship recycling facilities are indicators that MARAD ship sales for recycling will not mirror the large vessel sales numbers of FY's 2011-2014. The expectation is for continued volatility in the international and domestic scrap steel markets with fewer vessel sales and lower offers for those vessels that are sold.

Reliance on MARAD ship sales as the primary revenue stream into the VORF to fund projects in the NDRF, provide additional funds to the USMMA and the six state Maritime Academy's and fund maritime heritage projects in the NPS's NMHGP, is not sustainable in the long term given the volatility of the scrap steel market, the minimal number of non-retention vessels in the disposal queue and the projected low number of future vessel retirements.

MARAD will continue to investigate all alternatives that MARAD identifies in the future, to expedite the disposal of non-retention vessels at qualified facilities and at the best-value to the Government, while giving consideration to worker safety and the environment, as required by the Floyd D. Spence National Defense Authorization Act for Fiscal Year 2001, Pub. L. 106-398, § 3502.

APPENDIX A

United States Army Corps of Engineers – List of Vessels

United States Army Corp of Engineers-USACE

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	Wheeler	MT	Dredge	Active	1982	35								TBD
2	Essayons	MT	Dredge	Active	1983	34								TBD
3	McFarland	MT	Dredge	Active	1966	51								TBD
4	Hurley	MT	Dredge	Active	1993	24								TBD
5	Yaquina	MT	Dredge	Active	1981	36								TBD
6	Jadwin	MT	Dredge	Active	1933	84								TBD
7	Potter	MT	Dredge	Active	1932	85								TBD
8	Mississippi	MT	Towboat	Active	1993	24								TBD

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	0
Total Active	8
Total Number of Ships*	8

Planned Removal from Service Summary						
Avail for	Fiscal Year Removed from Service					
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22	
0	0	0	0	0	0	

* This represents the total number of vessels greater than 1,500 gross tons owned by the USACE

APPENDIX B

United States Department of the Army – List of Vessels

United States Department of the Army - ARMY

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USAV General Frank S. Besson, Jr (LSV-1)	MT	Logistics Support Vessel	Active	1988	29								2029
2	USAV CW3 Harold C. Clinger (LSV-2)	MT	Logistics Support Vessel	Active	1988	29								2029
3	USAV General Brehon B. Somervell (LSV-3)	MT	Logistics Support Vessel	Active	1988	29								2029
4	USAV Lt. General William B. Bunker (LSV-4)	MT	Logistics Support Vessel	Active	1988	29								2029
5	USAV Major General Charles P. Gross (LSV-5)	MT	Logistics Support Vessel	Active	1991	26								2029
6	USAV SP4 James A. Loux (LSV-6)	MT	Logistics Support Vessel	Active	1995	22								2029
7	USAV SSGT Robert T. Kuroda (LSV-7)	MT	Logistics Support Vessel	Active	2003	14								2027
8	USAV Major General Robert Smalls (LSV-8)	MT	Logistics Support Vessel	Active	2003	14								2027
9	Keystone State 6801	MT	Barge Derrick	Active	1998	19								2029
10	Saltillo 6802	MT	Barge Derrick	Active	1999	18								2029
11	Springfield 6803	MT	Barge Derrick	Active	2000	17								2030
12	Delaware 6804	MT	Barge Derrick	Active	2000	17								2030

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	0
Total Active	12
Total Number of Ships*	12

Planned Removal from Service Summary

Avail for Disposal	Fiscal Year Removed from Service				
	FY 18	FY 19	FY 20	FY 21	FY 22
0	0	0	0	0	0

* This represents the total number of vessels greater than 1,500 gross tons owned by the ARMY

APPENDIX C

United States Maritime Administration – List of Vessels

United States Maritime Administration - MARAD														
No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	Tripoli	MT	Amphibious Assault Ship	Inactive	1966	51	Scrap	X						2015
2	FB-62	MT	Barge Office	Active	1944	73	Scrap				X			2020
3	Cape Farewell	MT	Barge Ship	Active	1973	44								2033
4	Cape Flattery	MT	Barge Ship	Active	1973	44								2033
5	Cape Fear	MT	Barge Ship	Active	1971	46								2031
6	Cape Florida	MT	Barge Ship	Inactive	1971	46	Scrap	X						2017
7	Cape May	MT	Barge Ship	Active	1972	45								2025
8	Cape Mendocino	MT	Barge Ship	Active	1972	45								2032
9	Cape Mohican	MT	Barge Ship	Active	1973	44								2023
10	Curtiss	MT	Break Bulk	Active	1969	48								2025
11	Wright	MT	Break Bulk	Active	1970	47								2026
12	Cape Gibson	MT	Break Bulk	Inactive	1968	49	Scrap	X						2015
13	Cape Girardeau	MT	Break Bulk	Active	1968	49	Scrap				X			2020
14	Cape Johnson	MT	Break Bulk	Awarded	1962	55	Contracted							2012
15	Cape Jacob	MT	Break Bulk	Active	1961	56	Scrap				X			2020
16	Cape Juby	MT	Break Bulk	Active	1962	55	Scrap					X		2021
17	Cape Nome	MT	Break Bulk	Active	1969	48	Scrap						X	2022
18	Cape Archway	MT	Break Bulk	Inactive	1963	54	Scrap	X						2009
19	Cape Avinof	MT	Break Bulk	Active	1963	54	Scrap		X					2018
20	Cape Ann	MT	Break Bulk	Active	1962	55	Scrap			X				2019
21	Cape Bover	MT	Break Bulk	Active	1966	51	Scrap				X			2020
22	Del Monte	MT	Break Bulk	Active	1968	49								2029
23	Cape Chalmers	MT	Break Bulk	Active	1963	54								2029
24	Cape Alexander	MT	Break Bulk	Inactive	1962	55	Scrap	X						2009
25	Cape Alava	MT	Break Bulk	Inactive	1962	55	Scrap	X						2013
26	Gopher State	MT	Crane Ship	Active	1973	44								2028
27	Flickertail State	MT	Crane Ship	Active	1969	48								2024
28	Cornhusker State	MT	Crane Ship	Active	1969	48								2024
29	Keystone State	MT	Crane Ship	Active	1967	50								2026
30	Grand Canyon State	MT	Crane Ship	Active	1966	51								2025
31	Gem State	MT	Crane Ship	Active	1966	51								2025
32	Diamond State	MT	Crane Ship	Active	1960	57	Scrap				X			2020
33	Equality State	MT	Crane Ship	Inactive	1962	55	Scrap	X						2016
34	Green Mountain State	MT	Crane Ship	Active	1965	52								2025
35	Algol	MT	Roll-On/Roll-Off	Active	1973	44								2033
36	Bellatrix	MT	Roll-On/Roll-Off	Active	1973	44								2033
37	Capella	MT	Roll-On/Roll-Off	Active	1973	44								2033
38	Antares	MT	Roll-On/Roll-Off	Active	1972	45								2032
39	Denebola	MT	Roll-On/Roll-Off	Active	1974	43								2034
40	Regulus	MT	Roll-On/Roll-Off	Active	1973	44								2033
41	Altair	MT	Roll-On/Roll-Off	Active	1973	44								2033
42	Pacific Tracker	MT	Missile Instrumentation	Active	1965	52								2027
43	Observation Island	MT	Missile Instrumentation	Inactive	1954	63	Scrap	X						2015

United States Maritime Administration - MARAD

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
44	Pacific Collector	MT	Missile Instrumentation	Active	1970	47								2027
45	NS Savannah	MT	Nuclear Ship	Active	1962	55								2031
46	Harkness	MT	Surveying Ship	Awarded	1968	49	Contracted							2017
47	Cape Hudson	MT	Roll-On/Roll-Off	Active	1979	38								2029
48	Cape Horn	MT	Roll-On/Roll-Off	Active	1979	38								2029
49	Cape Henry	MT	Roll-On/Roll-Off	Active	1979	38								2029
50	Cape Inscription	MT	Roll-On/Roll-Off	Active	1976	41								2026
51	Cape Isabel	MT	Roll-On/Roll-Off	Active	1977	40								2027
52	Cape Island	MT	Roll-On/Roll-Off	Active	1977	40								2027
53	Cape Intrepid	MT	Roll-On/Roll-Off	Active	1976	41								2026
54	Admiral Callaghan	MT	Roll-On/Roll-Off	Active	1968	49								2023
55	Pollux	MT	Roll-On/Roll-Off	Active	1973	44								2033
56	Cape Washington	MT	Roll-On/Roll-Off	Active	1982	35								2032
57	Cape Wrath	MT	Roll-On/Roll-Off	Active	1982	35								2032
58	Cape Victory	MT	Roll-On/Roll-Off	Active	1985	32								2035
59	Cape Vincent	MT	Roll-On/Roll-Off	Active	1984	33								2034
60	Cape Texas	MT	Roll-On/Roll-Off	Active	1977	40								2027
61	Cape Taylor	MT	Roll-On/Roll-Off	Active	1977	40								2027
62	Cape Kennedy	MT	Roll-On/Roll-Off	Active	1979	38								2029
63	Cape Knox	MT	Roll-On/Roll-Off	Active	1979	38								2029
64	Cape Orlando	MT	Roll-On/Roll-Off	Active	1981	36								2031
65	Cape Lobos	MT	Roll-On/Roll-Off	Inactive	1972	45	Scrap	X						2014
66	Cape Rise	MT	Roll-On/Roll-Off	Active	1977	40								2027
67	Cape Ray	MT	Roll-On/Roll-Off	Active	1977	40								2027
68	Cape Race	MT	Roll-On/Roll-Off	Active	1977	40								2027
69	Cape Diamond	MT	Roll-On/Roll-Off	Active	1972	45								2032
70	Cape Domingo	MT	Roll-On/Roll-Off	Active	1973	44								2033
71	Cape Decision	MT	Roll-On/Roll-Off	Active	1973	44								2033
72	Cape Douglas	MT	Roll-On/Roll-Off	Active	1973	44								2033
73	Cape Ducato	MT	Roll-On/Roll-Off	Active	1972	45								2032
74	Cape Edmont	MT	Roll-On/Roll-Off	Active	1971	46								2031
75	Cape Trinity	MT	Roll-On/Roll-Off	Active	1978	39								2028
76	Simon Lake	MT	Submarine Tender	Inactive	1964	53	Scrap	X						2006
77	Triumph	MT	Surveillance Ship	Active	1984	33					X			2020
78	Sumner	MT	Surveying Ship	Inactive	1992	25	Scrap	X						2014
79	Petersburg	MT	Tanker	Active	1963	54						X		2021
80	Chesapeake	MT	Tanker	Active	1964	53	Scrap		X					2018
81	Samuel L Cobb	MT	Tanker	Active	1985	32								2045
82	Paul Buck	MT	Tanker	Active	1985	32								2045
83	Richard G Matthiesen	MT	Tanker	Active	1983	34								2045
84	Kennedy	MT	Training Ship	Active	1967	50								2024
85	Empire State	MT	Training Ship	Active	1962	55	Scrap						X	2022
86	State Of Maine	MT	Training Ship	Active	1989	28								2034
87	Golden Bear	MT	Training Ship	Active	1971	46								2034
88	State Of Michigan	MT	Training Ship	Active	1985	32								2035
89	General Rudder	MT	Training Ship	Active	1984	33								2034

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	22
Donation	0
TBD	0
Total Inactive	11
Total Active	76
Total Number of Ships*	87

Planned Removal from Service Summary					
Avail for	Fiscal Year Removed from Service				
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22
11	2	1	6	2	2

* This represents the total number of vessels greater than 1,500 gross tons owned by MARAD

APPENDIX D

United States Navy NAVSEA - List of Navy Active Ships

United States Department of the Navy

Navy Active Ships - NAVSEA

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Enterprise (CVN -65)	C	Aircraft Carrier	Inactive	1960	57	Retain							2017
2	USS America (LHA-6)	MT	Amphibious Assault Ship	Active	2012	5								TBD
3	USS Makin Island (LHD-8)	MT	Amphibious Assault Ship	Active	2006	11								TBD
4	USS WASP (LHD 1)	MT	Amphibious Assault Ship	Active	1987	30								TBD
5	USS Essex (LHD-2)	MT	Amphibious Assault Ship	Active	1991	26								TBD
6	USS Kearsarge (LHD-3)	MT	Amphibious Assault Ship	Active	1992	25								TBD
7	USS Boxer (LHD-4)	MT	Amphibious Assault Ship	Active	1993	24								TBD
8	USS Bataan (LHD-5)	MT	Amphibious Assault Ship	Active	1996	21								TBD
9	USS Bonhomme Richard (LHD-6)	MT	Amphibious Assault Ship	Active	1997	20								TBD
10	USS Iwo Jima (LHD-7)	MT	Amphibious Assault Ship	Active	2000	17								TBD
11	USS Blue Ridge (LCC-19)	MT	Amphibious Command Ship	Active	1969	48								TBD
12	USS Mount Whitney (LCC-20)	MT	Amphibious Command Ship	Active	1970	47								TBD
13	USS Lewis B Puller (T-ESB 3)	MT	Expeditionary Sea Base	Active	2015	2								TBD
14	USS San Antonio (LPD-17)	MT	Amphibious Transport Dock	Active	2003	14								TBD
15	USS New Orleans (LPD-18)	MT	Amphibious Transport Dock	Active	2004	13								TBD
16	USS Mesa Verde (LPD-19)	MT	Amphibious Transport Dock	Active	2004	13								TBD
17	USS John P. Murtha (LPD-26)	MT	Amphibious Transport Dock	Active	2014	3								TBD
18	USS Somerset (LPD-25)	MT	Amphibious Transport Dock	Active	2012	5								TBD
19	USS Arlington (LPD-24)	MT	Amphibious Transport Dock	Active	2010	7								TBD
20	USS Anchorage (LPD-23)	MT	Amphibious Transport Dock	Active	2011	6								TBD
21	USS San Diego (LPD-22)	MT	Amphibious Transport Dock	Active	2010	7								TBD
22	USS New York (LPD-21)	MT	Amphibious Transport Dock	Active	2007	10								TBD
23	USS Green Bay (LPD-20)	MT	Amphibious Transport Dock	Active	2006	11								TBD
24	USS Rushmore (LSD-47)	MT	Dock Landing Ship	Active	1989	28								TBD
25	USS Ashland (LSD-48)	MT	Dock Landing Ship	Active	1989	28								TBD
26	USS Tortuga (LSD-46)	MT	Dock Landing Ship	Active	1988	29								TBD
27	USS Comstock (LSD-45)	MT	Dock Landing Ship	Active	1988	29								TBD
28	USS Gunston Hall (LSD-44)	MT	Dock Landing Ship	Active	1987	30								TBD
29	USS Fort McHenry (LSD-43)	MT	Dock Landing Ship	Active	1986	31								TBD
30	USS Germantown (LSD-42)	MT	Dock Landing Ship	Active	1984	33								TBD
31	USS Whidbey Island (LSD-41)	MT	Dock Landing Ship	Active	1983	34								TBD
32	USS Chancellorsville (CG 62)	C	Guided Missile Cruiser	Active	1988	29								TBD
33	USS Bunker Hill (CG 52)	C	Guided Missile Cruiser	Active	1985	32	Retain				X			2020
34	USS Mobile Bay (CG 53)	C	Guided Missile Cruiser	Active	1985	32	Retain				X			2020
35	USS Antietam (CG 54)	C	Guided Missile Cruiser	Active	1986	31							X	2022
36	USS Leyte Gulf (CG 55)	C	Guided Missile Cruiser	Active	1986	31							X	2022
37	USS San Jacinto (CG 56)	C	Guided Missile Cruiser	Active	1986	31								TBD
38	USS Lake Champlain (CG 57)	C	Guided Missile Cruiser	Active	1987	30								TBD
39	USS Philippine Sea (CG 58)	C	Guided Missile Cruiser	Active	1987	30								TBD
40	USS Princeton (CG 59)	C	Guided Missile Cruiser	Active	1987	30								TBD
41	USS Monterey (CG 61)	C	Guided Missile Cruiser	Active	1988	29								TBD
42	USS Cowpens (CG 63)	C	Guided Missile Cruiser	Active	1989	28								TBD
43	USS Gettysburg (CG 64)	C	Guided Missile Cruiser	Active	1989	28								TBD
44	USS Chosin (CG 65)	C	Guided Missile Cruiser	Active	1989	28								TBD
45	USS Hue City (CG 66)	C	Guided Missile Cruiser	Active	1990	27								TBD
46	USS Shiloh (CG 67)	C	Guided Missile Cruiser	Active	1990	27								TBD

United States Department of the Navy

Navy Active Ships - NAVSEA

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
47	USS Anzio (CG 68)	C	Guided Missile Cruiser	Active	1990	27								TBD
48	USS Vicksburg (CG 69)	C	Guided Missile Cruiser	Active	1991	26								TBD
49	USS Lake Erie (CG 70)	C	Guided Missile Cruiser	Active	1991	26								TBD
50	USS Cape St. George (CG 71)	C	Guided Missile Cruiser	Active	1992	25								TBD
51	USS Vella Gulf (CG 72)	C	Guided Missile Cruiser	Active	1992	25								TBD
52	USS Port Royal (CG 73)	C	Guided Missile Cruiser	Active	1992	25								TBD
53	USS Normandy (CG 60)	C	Guided Missile Cruiser	Active	1988	29								TBD
54	USS Howard (DDG-83)	C	Guided Missile Destroyer	Active	1999	18								TBD
55	USS Winston S. Churchill (DDG-81)	C	Guided Missile Destroyer	Active	1999	18								TBD
56	USS Bulkeley (DDG-84)	C	Guided Missile Destroyer	Active	2000	17								TBD
57	USS Lassen (DDG-82)	C	Guided Missile Destroyer	Active	1999	18								TBD
58	USS Farragut (DDG-99)	C	Guided Missile Destroyer	Active	2005	12								TBD
59	USS McCampbell (DDG-85)	C	Guided Missile Destroyer	Active	2000	17								TBD
60	USS Shoup (DDG-86)	C	Guided Missile Destroyer	Active	2000	17								TBD
61	USS Mason (DDG-87)	C	Guided Missile Destroyer	Active	2001	16								TBD
62	USS Preble (DDG-88)	C	Guided Missile Destroyer	Active	2001	16								TBD
63	USS Mustin (DDG-89)	C	Guided Missile Destroyer	Active	2001	16								TBD
64	USS Chafee (DDG-90)	C	Guided Missile Destroyer	Active	2002	15								TBD
65	USS Pinckney (DDG-91)	C	Guided Missile Destroyer	Active	2002	15								TBD
66	USS Momsen (DDG-92)	C	Guided Missile Destroyer	Active	2003	14								TBD
67	USS Chung-Hoon (DDG-93)	C	Guided Missile Destroyer	Active	2002	15								TBD
68	USS Nitze (DDG-94)	C	Guided Missile Destroyer	Active	2004	13								TBD
69	USS James E. Williams (DDG-95)	C	Guided Missile Destroyer	Active	2003	14								TBD
70	USS Bainbridge (DDG-96)	C	Guided Missile Destroyer	Active	2004	13								TBD
71	USS Forrest Sherman (DDG-98)	C	Guided Missile Destroyer	Active	2004	13								TBD
72	USS Kidd (DDG-100)	C	Guided Missile Destroyer	Active	2004	13								TBD
73	USS Gridley (DDG-101)	C	Guided Missile Destroyer	Active	2005	12								TBD
74	USS Sampson (DDG-102)	C	Guided Missile Destroyer	Active	2006	11								TBD
75	USS Truxtun (DDG-103)	C	Guided Missile Destroyer	Active	2007	10								TBD
76	USS Sterett (DDG-104)	C	Guided Missile Destroyer	Active	2007	10								TBD
77	USS Dewey (DDG-105)	C	Guided Missile Destroyer	Active	2008	9								TBD
78	USS Stockdale (DDG-106)	C	Guided Missile Destroyer	Active	2008	9								TBD
79	USS Gravely (DDG-107)	C	Guided Missile Destroyer	Active	2009	8								TBD
80	USS Wayne E. Meyer (DDG-108)	C	Guided Missile Destroyer	Active	2008	9								TBD
81	USS Jason Dunham (DDG-109)	C	Guided Missile Destroyer	Active	2009	8								TBD
82	USS William P. Lawrence (DDG-110)	C	Guided Missile Destroyer	Active	2009	8								TBD
83	USS Spruance (DDG-111)	C	Guided Missile Destroyer	Active	2010	7								TBD
84	USS Michael Murphy (DDG-112)	C	Guided Missile Destroyer	Active	2011	6								TBD
85	USS Halsey (DDG-97)	C	Guided Missile Destroyer	Active	2004	13								TBD
86	USS Oscar Austin (DDG-79)	C	Guided Missile Destroyer	Active	1998	19								TBD
87	USS Roosevelt (DDG-80)	C	Guided Missile Destroyer	Active	1999	18								TBD
88	USS Milius (DDG-69)	C	Guided Missile Destroyer	Active	1995	22								TBD
89	USS John S. McCain (DDG-56)	C	Guided Missile Destroyer	Active	1992	25								TBD
90	USS Mitscher (DDG-57)	C	Guided Missile Destroyer	Active	1993	24								TBD
91	USS Laboon (DDG-58)	C	Guided Missile Destroyer	Active	1993	24								TBD

United States Department of the Navy+D480:G508

Navy Active Ships - NAVSEA

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
92	USS Russell (DDG-59)	C	Guided Missile Destroyer	Active	1993	24								TBD
93	USS Paul Hamilton (DDG-60)	C	Guided Missile Destroyer	Active	1993	24								TBD
94	USS Fitzgerald (DDG-62)	C	Guided Missile Destroyer	Active	1994	23								TBD
95	USS Stethem (DDG-63)	C	Guided Missile Destroyer	Active	1994	23								TBD
96	USS Carney (DDG-64)	C	Guided Missile Destroyer	Active	1994	23								TBD
97	USS Benfold (DDG-65)	C	Guided Missile Destroyer	Active	1994	23								TBD
98	USS Gonzalez (DDG-66)	C	Guided Missile Destroyer	Active	1995	22								TBD
99	USS Curtis Wilbur (DDG-54)	C	Guided Missile Destroyer	Active	1992	25								TBD
100	USS The Sullivans (DDG-68)	C	Guided Missile Destroyer	Active	1995	22								TBD
101	USS John Paul Jones (DDG-53)	C	Guided Missile Destroyer	Active	1991	26								TBD
102	USS Hopper (DDG-70)	C	Guided Missile Destroyer	Active	1996	21								TBD
103	USS Ross (DDG-71)	C	Guided Missile Destroyer	Active	1996	21								TBD
104	USS Mahan (DDG-72)	C	Guided Missile Destroyer	Active	1996	21								TBD
105	USS Decatur (DDG-73)	C	Guided Missile Destroyer	Active	1996	21								TBD
106	USS McFaul (DDG-74)	C	Guided Missile Destroyer	Active	1997	20								TBD
107	USS Donald Cook (DDG-75)	C	Guided Missile Destroyer	Active	1997	20								TBD
108	USS Higgins (DDG-76)	C	Guided Missile Destroyer	Active	1997	20								TBD
109	USS O'Kane (DDG-77)	C	Guided Missile Destroyer	Active	1998	19								TBD
110	USS Porter (DDG-78)	C	Guided Missile Destroyer	Active	1997	20								TBD
111	USS Cole (DDG-67)	C	Guided Missile Destroyer	Active	1995	22								TBD
112	USS Stout (DDG-55)	C	Guided Missile Destroyer	Active	1992	25								TBD
113	USS Arleigh Burke (DDG-51)	C	Guided Missile Destroyer	Active	1989	28								TBD
114	USS Ramage (DDG-61)	C	Guided Missile Destroyer	Active	1994	23								TBD
115	USS Barry (DDG-52)	C	Guided Missile Destroyer	Active	1991	26								TBD
116	USS Zumwalt (DDG 1000)	C	Guided Missile Destroyer	Active	2013	4								TBD
117	USS Carter Hall (LSD-50)	MT	Landing Ship Dock	Active	1993	24								TBD
118	USS Harpers Ferry (LSD-49)	MT	Landing Ship Dock	Active	1993	24								TBD
119	USS Pearl Harbor (LSD-52)	MT	Landing Ship Dock	Active	1996	21								TBD
120	USS Oak Hill (LSD-51)	MT	Landing Ship Dock	Active	1994	23								TBD
121	USS Milwaukee (LCS-5)	C	Littoral Combat Ship	Active	2013	4								TBD
122	USS Fort Worth (LCS-3)	C	Littoral Combat Ship	Active	2010	7								TBD
123	USS Freedom (LCS-1)	C	Littoral Combat Ship	Active	2006	11								TBD
124	USS Jackson (LCS-6)	C	Littoral Combat Ship	Active	2013	4								TBD
125	USS Coronado (LCS-4)	C	Littoral Combat Ship	Active	2012	5								TBD
126	USS Detroit (LCS 7)	C	Littoral Combat Ship	Active	2014	3								TBD
127	USS Montgomery (LCS 8)	C	Littoral Combat Ship	Active	2014	3								TBD
128	USS Independence (LCS-2)	C	Littoral Combat Ship	Active	2008	9								TBD

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	3
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	1
Total Active	127
Total Number of Ships*	128

Planned Removal from Service Summary

Avail for Disposal	Fiscal Year Removed from Service				
	FY 18	FY 19	FY 20	FY 21	FY 22
0	0	0	2	0	2

* This represents the total number of vessels greater than 1,500 gross tons owned by Navy that are conventionally powered with the exception of the Ex-Enterprise (CVN-65)

APPENDIX E

United States Navy Military Sealift Command – List of Vessels

United States Department of the Navy

Military Sealift Command Active & Inactive Vessels

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Ponce (AFSB-15)	MT	Afloat Forward Staging Base	Inactive	1970	47	Scrap		X					2018
2	USNS Lewis and Clark (T-AKE 1)	MT	Ammo/Dry Cargo	Active	2005	12								TBD
3	USNS Sacagawea (T-AKE 2)	MT	Ammo/Dry Cargo	Active	2006	11								TBD
4	USNS Alan Shepard (T-AKE 3)	MT	Ammo/Dry Cargo	Active	2006	11								TBD
5	USNS Richard E. Byrd (T-AKE 4)	MT	Ammo/Dry Cargo	Active	2007	10								TBD
6	USNS Robert E. Peary (T-AKE 5)	MT	Ammo/Dry Cargo	Active	2007	10								TBD
7	USNS Amelia Earhart (T-AKE 6)	MT	Ammo/Dry Cargo	Active	2008	9								TBD
8	USNS Carl Brashear (T-AKE 7)	MT	Ammo/Dry Cargo	Active	2008	9								TBD
9	USNS Wally Schirra (T-AKE 8)	MT	Ammo/Dry Cargo	Active	2009	8								TBD
10	USNS Matthew Perry (T-AKE 9)	MT	Ammo/Dry Cargo	Active	2010	7								TBD
11	USNS Charles Drew (T-AKE 10)	MT	Ammo/Dry Cargo	Active	2010	7								TBD
12	USNS Washington Chambers (T-AKE 11)	MT	Ammo/Dry Cargo	Active	2011	6								TBD
13	USNS William McLean (T-AKE 12)	MT	Ammo/Dry Cargo	Active	2011	6								TBD
14	USNS Medgar Evers (T-AKE 13)	MT	Ammo/Dry Cargo	Active	2011	6								TBD
15	USNS Cesar Chavez (T-AKE 14)	MT	Ammo/Dry Cargo	Active	2012	5								TBD
16	USNS Zeus (T-ARC 7)	MT	Cable Laying/Repair	Active	1982	35								2033
17	USS Mount Whitney (LCC 20)	MT	Command Ship	Active	1970	47								2039
18	USNS SGT Matej Kocak (T-AK 3005)	MT	Container Roll-On/Roll-	Active	1983	34								TBD
19	USNS PFC Eugene A. Obregon (T-AK 3006)	MT	Container Roll-On/Roll-	Active	1983	34								TBD
20	USNS MAJ Stephen W. Pless (T-AK 3007)	MT	Container Roll-On/Roll-	Active	1983	34								TBD
21	USNS 1st LT Harry L. Martin (T-AK 3015)	MT	Container Roll-On/Roll-	Active	1983	34								TBD
22	USNS LCPL Roy M. Wheat (T-AK 3016)	MT	Container Roll-On/Roll-	Active	1987	30								TBD
23	USNS Supply (T-AOE 6)	MT	Fast Combat Support Ship	Active	1990	27								TBD
24	USNS Arctic (T-AOE 8)	MT	Fast Combat Support Ship	Active	1993	24								TBD
25	USNS Mercy (T-AH 19)	MT	Hospital Ship	Active	1987	30								TBD
26	USNS Comfort (T-AH 20)	MT	Hospital Ship	Active	1976	41								TBD
27	USNS Guam (HST 1)	MT	High Speed Transport	Active	2008	9								TBD
28	USNS Puerto Rico (HST 2)	MT	High Speed Transport	Active	2004	13								TBD
29	USNS Spearhead (JHSV 1)	MT	Expeditionary Fast Transport	Active	2012	5								TBD
30	USNS Fall River (JHSV 4)	MT	Expeditionary Fast Transport	Active	2014	3								TBD
31	USNS Millinocket (JHSV 3)	MT	Expeditionary Fast Transport	Active	2014	3								TBD
32	USNS Choctaw County (JHSV 2)	MT	Expeditionary Fast Transport	Active	2013	4								TBD
33	USNS Watson (T-AKR 310)	MT	Medium Roll-On/Roll-Off	Active	1997	20								TBD
34	USNS Gordon (T-AKR 296)	MT	Medium Roll-On/Roll-Off	Active	1972	45								TBD
35	USNS Shughart (T-AKR 295)	MT	Medium Roll-On/Roll-Off	Active	1980	37								TBD
36	USNS Soderman (T-AKR 317)	MT	Medium Roll-On/Roll-Off	Active	2002	15								TBD
37	USNS Pomeroy (T-AKR 316)	MT	Medium Roll-On/Roll-Off	Active	2000	17								TBD
38	USNS Watkins (T-AKR 315)	MT	Medium Roll-On/Roll-Off	Active	2000	17								TBD
39	USNS Gilliland (T-AKR 298)	MT	Medium Roll-On/Roll-Off	Active	1972	45								TBD
40	USNS Red Cloud (T-AKR 313)	MT	Medium Roll-On/Roll-Off	Active	1999	18								TBD
41	USNS Bob Hope (T-AKR 300)	MT	Medium Roll-On/Roll-Off	Active	1997	20								TBD
42	USNS Charlton (T-AKR 314)	MT	Medium Roll-On/Roll-Off	Active	1999	18								TBD
43	USNS Yano (T-AKR 297)	MT	Medium Roll-On/Roll-Off	Active	1980	37								TBD

United States Department of the Navy

Military Sealift Command Active & Inactive Vessels

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
44	USNS Benavidez (T-AKR 306)	MT	Medium Roll-On/Roll-Off	Active	1999	18								TBD
45	USNS Brittin (T-AKR 305)	MT	Medium Roll-On/Roll-Off	Active	2000	17								TBD
46	USNS Mendonca (T-AKR 303)	MT	Medium Roll-On/Roll-Off	Active	1999	18								TBD
47	USNS Fisher (T-AKR 301)	MT	Medium Roll-On/Roll-Off	Active	1997	20								TBD
48	USNS Howard O. Lorenzen (T-AGM 25)	MT	Missile Range	Active	2010	7								TBD
49	USNS Invincible (T-AGM 24)	MT	Missile Range	Active	1987	30								TBD
50	USNS John Glenn (MLP 2)	MT	Mobile Landing Platforms	Active	2012	5								TBD
51	USNS Montford Point (MLP 1)	MT	Mobile Landing Platforms	Active	2012	5								TBD
52	USNS Waters (T-AGS 45)	MT	Navigation Test Support	Active	1992	25								TBD
53	USNS Impeccable (T-AGOS 23)	MT	Ocean Surveillance	Active	1998	19								TBD
54	USNS Able (T-AGOS 20)	MT	Ocean Surveillance	Active	1991	26								TBD
55	USNS Loyal (T-AGOS 22)	MT	Ocean Surveillance	Active	1992	25								TBD
56	USNS Victorious (T-AGOS 19)	MT	Ocean Surveillance	Active	1991	26								TBD
57	USNS Effective (T-AGOS 21)	MT	Ocean Surveillance	Active	1991	26								TBD
58	USNS Sioux (T-ATF 171)	MT	Fleet Ocean Tug	Active	1980	37	Scrap					X		2021
59	USNS Apache (T-ATF 172)	MT	Fleet Ocean Tug	Active	1981	36	Scrap					X		2021
60	USNS Catawba (T-ATF 168)	MT	Fleet Ocean Tug	Active	1979	38	Retain			X				2019
61	USNS Mary Sears (T-AGS 65)	MT	Oceangraphic Survey	Active	2000	17								TBD
62	USNS Bruce C. Heezen (T-AGS 64)	MT	Oceangraphic Survey	Active	1999	18								TBD
63	USNS Henson (T-AGS 63)	MT	Oceangraphic Survey	Active	1996	21								TBD
64	USNS Bowditch (T-AGS 62)	MT	Oceangraphic Survey	Active	1994	23								TBD
65	USNS Pathfinder (T-AGS 60)	MT	Oceangraphic Survey	Active	1993	24								TBD
66	USNS John Lenthall (T-AO 189)	MT	Fleet Oiler	Active	1986	31	Scrap					X		2021
67	USNS Walter S. Diehl (T-AO 193)	MT	Fleet Oiler	Active	1987	30	Retain				X			2020
68	USNS John Ericsson (T-AO 194)	MT	Fleet Oiler	Active	1990	27								TBD
69	USNS Joshua Humphreys (T-AO 188)	MT	Fleet Oiler	Active	1986	31								TBD
70	USNS Henry J. Kaiser (T-AO 187)	MT	Fleet Oiler	Active	1985	32								TBD
71	USNS Pecos (T-AO 197)	MT	Fleet Oiler	Active	1989	28								TBD
72	USNS Laramie (T-AO 203)	MT	Fleet Oiler	Active	1995	22								TBD
73	USNS Leroy Grumman (T-AO 195)	MT	Fleet Oiler	Active	1988	29								2022
74	USNS Rappahannock (T-AO 204)	MT	Fleet Oiler	Active	1995	22								TBD
75	USNS Kanawha (T-AO 196)	MT	Fleet Oiler	Active	1990	27								TBD
76	USNS Yukon (T-AO 202)	MT	Fleet Oiler	Active	1993	24								TBD
77	USNS Patuxent (T-AO 201)	MT	Fleet Oiler	Active	1994	23								TBD
78	USNS Guadalupe (T-AO 200)	MT	Fleet Oiler	Active	1991	26								TBD
79	USNS Tippecanoe (T-AO 199)	MT	Fleet Oiler	Active	1992	25								TBD
80	USNS Big Horn (T-AO 198)	MT	Fleet Oiler	Active	1991	26								TBD
81	USNS Vadm K. R. Wheeler (T-AG 5001)	MT	Offshore Petroleum	Active	2007	10								TBD
82	USNS Salvor (T-ARS 52)	MT	Rescue/Salvage	Active	1984	33								TBD
83	USNS Grasp (T-ARS 51)	MT	Rescue/Salvage	Active	1985	32								TBD
84	USNS Seay (T-AKR 302)	MT	Large, Medium-Speed Ro/Ro	Active	1998	19								TBD
85	USNS SGT William R. Button (T-AK 3012)	MT	Large, Medium-Speed Ro/Ro	Active	1986	31								TBD

United States Department of the Navy

Military Sealift Command Active & Inactive Vessels

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
86	USNS 1st LT Jack Lummus (T-AK 3011)	MT	Large, Medium-Speed Ro/Ro	Active	1986	31								TBD
87	USNS 1st LT Baldomero Lopez (T-AK 3010)	MT	Large, Medium-Speed Ro/Ro	Active	1985	32								TBD
88	USNS PFC Dewayne T. Williams (T-AK 3009)	MT	Large, Medium-Speed Ro/Ro	Active	1985	32								TBD
89	USNS 2ND LT John P. Bobo (T-AK 3008)	MT	Large, Medium-Speed Ro/Ro	Active	1985	32								TBD
90	USNS GYSGT Fred W. Stockham (T-AK 3017)	MT	Large, Medium-Speed Ro/Ro	Active	1980	37								TBD
91	USNS Dahl (T-AKR 312	MT	Large, Medium-Speed Ro/Ro	Active	1998	19								TBD
92	USNS Pililaau (T-AKR 304)	MT	Large, Medium-Speed Ro/Ro	Active	2000	17								TBD
93	USNS Sisler (T-AKR 311)	MT	Large, Medium-Speed Ro/Ro	Active	1998	19								TBD
94	Sea-Based X-Band Radar	MT	Semi-Submersible	Active	2006	11								TBD
95	USS Frank Cable (AS 40)	MT	Sub Tenders	Active	1978	39								TBD
96	USS Emory S. Land (AS 39)	MT	Sub Tenders	Active	1977	40								TBD
97	USNS Lewis B Puller (MLP/AFSB 3)	MT	Expeditionary Sea Base	Active	2015	2								TBD
98	USNS Maury (T-AGS-66)	MT	Surveying Ship	Active	2016	1								TBD
99	USNS Trenton (T-EPF 5)	MT	Expeditionary Fast	Active	2015	2								TBD
100	USNS Carson City (T-EPF 7)	MT	Expeditionary Fast	Active	2016	1								TBD
101	USNS Brunswick (T-EPF 6)	MT	Expeditionary Fast	Active	2016	1								TBD
102	USNS Lawrence H. Gianella (T-AOT 1125)	MT	Tanker	Active	1985	32	Retain		X					2018

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	3
SINKEX	0
Foreign Military Sales	0
Scrap	4
Donation	0
TBD	0
Total Inactive	1
Total Active	101
Total Number of Ships*	102

Planned Removal from Service Summary					
Avail for	Fiscal Year Removed from Service				
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22
0	2	1	1	3	0

* This represents the total number of vessels greater than 1,500 gross tons operated by MSC.

APPENDIX F

United States Navy Inactive Ships – SEA 21I - List of Vessels

United States Department of the Navy

Navy Inactive Ships Office - (SEA 21I)

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	Ex-Kitty Hawk (CV-63)	C	Aircraft Carrier	Inactive	1960	57	Scrap	X						TBD
2	Ex-John F. Kennedy (CV-67)	C	Aircraft Carrier	Inactive	1967	50	Scrap	X						2007
3	Ex-Peleliu (LHA-5)	MT	Amphibious Assault Ship	Inactive	1978	39	Retain							2015
4	Ex-Tarawa (LHA-1)	MT	Amphibious Assault Ship	Inactive	1973	44	Retain							2009
5	Ex-Nassau (LHA-4)	MT	Amphibious Assault Ship	Inactive	1978	39	Retain							2011
6	Ex-Charleston (LKA-113)	MT	Amphibious Cargo Ship	Inactive	1967	50	Scrap	X						2015
7	Ex-Durham (LKA-114)	MT	Amphibious Cargo Ship	Inactive	1968	49	SINKEX	X						1994
8	Ex-St. Louis (LKA-116)	MT	Amphibious Cargo Ship	Inactive	1969	48	SINKEX	X						1992
9	Ex-El Paso (LKA-117)	MT	Amphibious Cargo Ship	Inactive	1969	48	Scrap	X						1994
10	Ex-Mobile (LKA-115)	MT	Amphibious Cargo Ship	Inactive	1968	49	Scrap	X						1994
11	Ex-Shreveport (LPD-12)	MT	Amphibious Transport Dock	Inactive	1966	51	Scrap	X						2007
12	Ex-Dubuque (LPD-8)	MT	Amphibious Transport Dock	Inactive	1966	51	Retain							2011
13	Ex-Denver (LPD-9)	MT	Amphibious Transport Dock	Inactive	1965	52	Retain							2014
14	Ex-Nashville (LPD-13)	MT	Amphibious Transport Dock	Inactive	1967	50	Retain							2009
15	Ex-Juneau (LPD-10)	MT	Amphibious Transport Dock	Inactive	1966	51	Retain							2008
16	Ex-Cleveland (LPD-7)	MT	Amphibious Transport Dock	Inactive	1966	51	Retain							2011
17	Ex-Charles F. Adams (DDG-2)	C	Destroyer	Inactive	1959	58	Donation	X						1990
18	Ex-Barry (DD-933)	C	Destroyer	Inactive	1955	62	Scrap	X						1982
19	Ex-Ticonderoga (CG-47)	C	Guided Missile Destroyer	Inactive	1981	36	Scrap	X						2004
20	Ex-Yorktown (CG-48)	C	Guided Missile Destroyer	Inactive	1983	34	Scrap	X						2004
21	Ex-Vandegrift (FFG-48)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X						2015
22	Ex-Elrod (FFG-55)	C	Guided Missile Frigate	Inactive	1984	33	FMS	X						2015
23	Ex-Simpson (FFG-56)	C	Guided Missile Frigate	Inactive	1984	33	FMS	X						2015
24	Ex-Kauffman (FFG-59)	C	Guided Missile Frigate	Inactive	1986	31	FMS	X						2015
25	Ex-Rodney M. Davis (FFG-60)	C	Guided Missile Frigate	Inactive	1986	31	FMS	X						2015
26	Ex-McClusky (FFG-41)	C	Guided Missile Frigate	Inactive	1982	35	SINKEX	X						2015
27	Ex-Ingraham (FFG-61)	C	Guided Missile Frigate	Inactive	1988	29	SINKEX	X						2015
28	Ex-De Wert (FFG-45)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X						2014
29	Ex-Robert G. Bradley (FFG-49)	C	Guided Missile Frigate	Inactive	1983	34	FMS	X						2014
30	Ex-Halyburton (FFG-40)	C	Guided Missile Frigate	Inactive	1981	36	FMS	X						2014

United States Department of the Navy

Navy Inactive Ships Office - (SEA 21I)

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
31	Ex-Ford (FFG-54)	C	Guided Missile Frigate	Inactive	1984	33	SINKEX	X						2013
32	Ex-Klakring (FFG-42)	C	Guided Missile Frigate	Inactive	1982	35	FMS	X						2013
33	Ex-Carr (FFG-52)	C	Guided Missile Frigate	Inactive	1983	34	FMS	X						2013
34	Ex-Curts (FFG-38)	C	Guided Missile Frigate	Inactive	1982	35	SINKEX	X						2013
35	Ex-Samuel B Roberts (FFG-58)	C	Guided Missile Frigate	Inactive	1984	33	Scrap	X						2015
36	Ex-Nicholas (FFG-47)	C	Guided Missile Frigate	Inactive	1983	34	Scrap	X						2014
37	Ex-Underwood (FFG-36)	C	Guided Missile Frigate	Inactive	1982	35	Scrap	X						2013
38	Ex-John L Hall (FFG-32)	C	Guided Missile Frigate	Inactive	1981	36	Scrap	X						2012
39	Ex-Boone (FFG-28)	C	Guided Missile Frigate	Inactive	1980	37	Scrap	X						2012
40	Ex-Doyle (FFG-39)	C	Guided Missile Frigate	Inactive	1982	35	Contracted							2011
41	Ex-Stephen W Groves (FFG-29)	C	Guided Missile Frigate	Inactive	1981	36	Scrap	X						2012
42	Ex-Hawes (FFG-53)	C	Guided Missile Frigate	Inactive	1984	33	Scrap	X						2010
43	Ex-Rainier (T-AOE 7)	MT	Fast Combat Support Ship	Inactive	1991	26	Retain							2016
44	Ex-Bridge (T-AOE 10)	MT	Fast Combat Support Ship	Inactive	1996	21	Retain							2016
45	Ex-Navajo (T-ATF 169)	MT	Fleet Ocean Tug	Inactive	1979	38	LSA							2017
46	Ex-Mohawk (T-ATF-170)	MT	Fleet Ocean Tug	Inactive	1980	37	Scrap	X						2015
47	Ex-Hayes (T-AGOR-16)	MT	Oceanographic Research	Inactive	1970	47	Scrap	X						2008
48	Ex-Safeguard (T-ARS 50)	MT	Rescue/Salvage	Inactive	1983	34	Retain							2017
49	Ex-Grapple (T-ARS 53)	MT	Rescue/Salvage	Inactive	1984	33	Retain							2017
50	Ex-Boulder (LST-1190)	MT	Tank Landing Ship	Inactive	1970	47	Scrap	X						1994
51	Ex-Racine (LST-1191)	MT	Tank Landing Ship	Inactive	1970	47	SINKEX	X						1993

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Logistics Support Asset
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	12
SINKEX	7
Foreign Military Sales	10
Scrap	19
Logistics Support Asset	1
Donation	1
TBD	0
Total Inactive	50
Total Number of Ships*	51

Planned Removal from Service Summary

Avail for Disposal	Fiscal Year Removed from Service				
	FY 18	FY 19	FY 20	FY 21	FY 22
37	0	0	0	0	0

Does not included is the awarded vessel Ex-Doyle or the Patrol Gunboat Canon

* 51 represents the total number of Inactive vessels greater than 1,500 gross tons in the SEA 21I disposal queue. Not included for scrapping is Patrol Gunboat (PG) Canon which is less than 1,500 gross tons

Other Navy Ships Utilized by Other Organizations (Not Part of Inactive Fleet Inventory)

1	Ex-Paul F. Foster (DD-964)	C	Destroyer	On-Loan	1974	43	Retain							2003
2	Ex-Cassin Young (DD-793)	C	Destroyer	On-Loan	1943	74	Retain							1960
3	Ex-Shadwell (LSD-15)	MT	Dock Landing Ship	On-Loan	1944	73	Retain							1970
4	Ex-Narragansett (T-ATF-167)	MT	Fleet Ocean Tug	On-Loan	1979	38	Retain							1999
5	Ex-McKee (AS-41)	MT	Submarine Tender	On-Loan	1980	37	Retain							1999
			On-Loan *	5			* 5 represents other Navy ships on loan to other organizations.							

APPENDIX G

United States Navy Office of Naval Research – List of Vessels

United States Department of the Navy

Office of Naval Research - ONR

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	RV Sally Ride	MT	Research Vessel	Active	2015	2								2046
2	RV Neil Armstrong	MT	Research Vessel	Active	2014	3								2045
3	RV Atlantis	MT	Research Vessel	Active	1997	20								2042
4	RV Roger Revelle	MT	Research Vessel	Active	1996	21								2041
5	RV Thomas G Thompson	MT	Research Vessel	Active	1991	26								2036
6	RV Kilo Moana	MT	Research Vessel	Active	2002	15								2032

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	0
Total Active	6
Total Number of Ships*	6

Planned Removal from Service Summary

Avail for Disposal	Fiscal Year Removed from Service				
	FY 18	FY 19	FY 20	FY 21	FY 22
0	0	0	0	0	0

* This represents the total number of vessels greater than 1,500 gross tons owned by ONR

APPENDIX H

National Oceanic and Atmospheric Administration – List of Vessels

National Oceanic and Atmospheric Administration - NOAA

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	Rainier	MT	Research Vessel	Active	1967	50								2028
2	Fairweather	MT	Research Vessel	Active	1968	49								2025
3	Thomas Jefferson	MT	Research Vessel	Active	1991	26								2028
4	Gordon Gunter	MT	Research Vessel	Active	1989	28								2025
5	Okeanos Explorer	MT	Research Vessel	Active	1988	29								2025
6	Oscar Elton Sette	MT	Research Vessel	Active	1987	30								2023
7	Hi'ialakai	MT	Research Vessel	Active	2002	15								2025
8	Reuben Lasker	MT	Research Vessel	Active	2012	5								TBD
9	Pisces	MT	Research Vessel	Active	2007	10								TBD
10	Oscar Dyson	MT	Research Vessel	Active	2004	13								TBD
11	Henry B. Bigelow	MT	Research Vessel	Active	2005	12								TBD
12	Bell M. Shimada	MT	Research Vessel	Active	2010	7								TBD
13	Ronald Brown	MT	Research Vessel	Active	1997	20								TBD

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	0
Total Active	13
Total Number of Ships*	13

Planned Removal from Service Summary						
Avail for	Fiscal Year Removed from Service					
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22	
0	0	0	0	0	0	

* This represents the total number of vessels greater than 1,500 gross tons owned by NOAA

APPENDIX I

National Science Foundation – List of Vessels

National Science Foundation - NSF

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	RV Sikuloaq	MT	Research Vessel	Active	2012	5								2044
2	RV Marcus Langseth	MT	Research Vessel	Active	1991	26								2030

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	0
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	0
Total Active	2
Total Number of Ships*	2

Planned Removal from Service Summary						
Avail for	Fiscal Year Removed from Service					
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22	
0	0	0	0	0	0	

* This represents the total number of vessels greater than 1,500 gross tons owned by NSF

APPENDIX J

United States Coast Guard – List of Vessels

United States Coast Guard - USCG

No.	Name	Type	Vessel Design	Status	Year Built	Age	Disposal Disposition	Avail for Disposal	Fiscal Year Removed from Service (Retirement)					Retirement Year
									FY 18	FY 19	FY 20	FY 21	FY 22	
1	USS Oak Ridge	MT	Floating Dry-Dock	Active	1944	73			X					2018
2	Sherman WHEC 720	MT	High Endurance Cutter	Active	1967	50			X					2018
3	Midgett WHEC 726	MT	High Endurance Cutter	Active	1971	46				X				2019
4	Mellon WHEC 717	MT	High Endurance Cutter	Active	1967	50					X			2020
5	Munro WHEC 724	MT	High Endurance Cutter	Active	1971	46						X		2021
5	USS Oak Ridge	MT	Floating Dry-Dock	Active	1944	73								TBD
6	Polar Sea WAGB-11	MT	Heavy Ice Breaker	Inactive	1977	40	Retain							TBD
7	Polar Star WAGB-10	MT	Heavy Ice Breaker	Active	1976	41								TBD
8	Forward WMEC 911	MT	Medium Endurance Cutter	Active	1989	28								TBD
9	Alex Haley WMEC-39	MT	Medium Endurance Cutter	Active	1968	49								TBD
10	Bear WMEC 901	MT	Medium Endurance Cutter	Active	1980	37								TBD
11	Escanaba WMEC 907	MT	Medium Endurance Cutter	Active	1985	32								TBD
12	Harriet Lane WMEC 903	MT	Medium Endurance Cutter	Active	1984	33								TBD
13	Legare WMEC 912	MT	Medium Endurance Cutter	Active	1989	28								TBD
14	Mohawk WMEC 913	MT	Medium Endurance Cutter	Active	1989	28								TBD
15	NorthlandWMEC 904	MT	Medium Endurance Cutter	Active	1982	35								TBD
16	Seneca WMEC 906	MT	Medium Endurance Cutter	Active	1984	33								TBD
17	Spencer WMEC 905	MT	Medium Endurance Cutter	Active	1984	33								TBD
18	Tahoma WMEC 908	MT	Medium Endurance Cutter	Active	1987	30								TBD
19	Tampa WMEC 902	MT	Medium Endurance Cutter	Active	1984	33								TBD
20	Thetis WMEC 910	MT	Medium Endurance Cutter	Active	1986	31								TBD
21	Campbell WMEC 909	MT	Medium Endurance Cutter	Active	1986	31								TBD
22	Kimball WMSL 756	MT	National Security Cutter	Active	2017	0								TBD
23	Bertholf WMSL 750	MT	National Security Cutter	Active	2006	11								TBD
24	Waesche WMSL 751	MT	National Security Cutter	Active	2008	9								TBD
25	Stratton WMSL 752	MT	National Security Cutter	Active	2010	7								TBD
26	Hamilton WMSL 753	MT	National Security Cutter	Active	2013	4								TBD
27	James WMSL 754	MT	National Security Cutter	Active	2014	3								TBD
28	Munro WMSL-755	MT	National Security Cutter	Active	2015	2								TBD
29	Mackinaw WLBB-30	MT	Heavy Ice Breaker	Active	2005	12								TBD
30	Healy WAGB-20	MT	Medium Icebreaker	Active	1997	20								TBD

Legend	
MT	Merchant Type Vessel
C	Combatant Vessel
Active	Operating/Readiness/Support status
Inactive	Non-operating/Non-retention status
X	Foreign Military Sales
X	SINKEX
X	Scrap
X	Donation
X	Remove From Service

Disposition Summary	
Retain	1
SINKEX	0
Foreign Military Sales	0
Scrap	0
Donation	0
TBD	0
Total Inactive	1
Total Active	30
Total Number of Ships*	31

Planned Removal from Service Summary					
Avail for	Fiscal Year Removed from Service				
Disposal	FY 18	FY 19	FY 20	FY 21	FY 22
0	2	1	1	1	0

* This represents the total number of vessels greater than 1,500 gross tons owned by USCG