



ROY COOPER
Governor
MICHAEL S. REGAN
Acting Secretary

October 1, 2017

Representative Pat McElraft, Co-Chair
Representative Roger West, Co-Chair
Senator Brent Jackson, Co-Chair
Joint Legislative Oversight Committee on Agriculture and Natural and Economic Resources
16 W. Jones Street
Raleigh, North Carolina 27601

Re: Report on the "Shallow Draft Navigation Channel Dredging and Aquatic Weed Fund"

Dear Rep. McElraft, Rep. West, and Sen. Jackson:

As per §143-215.73F(f), annually the Department of Environmental Quality is required to provide a report on the projects funded from the "Shallow Draft Navigation Channel Dredging and Aquatic Weed Fund". Attached is the report covering FY 2016-2017.

This report was prepared by the Division of Water Resources in the Department of Environment Quality. If you have questions about this report, please contact me at 707-8668

Very truly yours,

Anderson Miller

AM/de

Enclosures

cc: Lanier McRee, NCGA Fiscal Research
Daniel Sater, NCGA Fiscal Research
Michael Regan, Secretary
Shelia Holman, Assistant Secretary of the Environment
Jay Zimmerman, Division of Water Resources
Darren England, Division of Water Resources



ANNUAL REPORT

Dredging Projects

Shallow Draft Navigation Channel Dredging and Aquatic Weed Fund Chapter 94 of the 2016 Session Laws, Section 14.12 (a)(f)

Date of Report: October 1, 2017

Reporting Period: July 1, 2016 to June 30, 2017

Project Type	Project Sub-Type	Project Status	Project	Cooperator	Funding Receptient	State Funding Amount	Days of Dredging	CY Removed	Description
Dredging	WRDG	Complete	Pelletier Creek Dredging 2016	Town of Morehead City	Town of Morehead City	\$ 49,233	28	3,000	Channel maintenance dredging performed by bucket & barge, Carteret County
Dredging	WRDG	Complete	Carolina Beach Inlet Permit Modification	New Hanover County	New Hanover County	\$ 20,766	N/A	N/A	Permit modification in support of maintenance event scheduled for September 2017
Dredging	WRDG	Complete	Kitty Hawk Landing Jetty/Breakwater Repair & Channel Dredging	Town of Kitty Hawk	Town of Kitty Hawk	\$ 209,580	12	1,200	Breakwater repair and channel maintenance dredging, Dare County
Dredging	WRDG	Complete	Mason Inlet / AIWW Crossing Dredging 2016-2017	New Hanover County	New Hanover County	\$ 429,585	32	85,622	Inlet maintenance dredging performed by pipeline dredge, New Hanover County
Dredging	WRDG	Complete	Spooner's Creek Dredging 2016-2017	Town of Morehead City	Town of Morehead City	\$ 38,412	14	2,400	Channel maintenance dredging performed by bucket & barge, Carteret County
Dredging	WRDG	Complete	Pine Knoll Shores Waterway Dredging 2016	Town of Pine Knoll Shores	Town of Pine Knoll Shores	\$ 40,000	17	2,000	Channel maintenance dredging performed by bucket & barge, Carteret County
Dredging	WRDG	Complete	Wainwright Slough 2016	Carteret County	Carteret County	\$ 410,047	34	34,540	Channel maintenance dredging performed by pipe-line dredge, Dare County
Dredging	LTMOA	Complete	Bogue Inlet Summer 2016	Various	USACE - Wilmington District	\$ 70,000	20	60,861	Inlet maintenance dredging performed by side-cast dredge, Carteret County
Dredging	LTMOA	Complete	Bulkhead Channel Summer 2016	Town of Beaufort	USACE - Wilmington District	\$ 80,000	7	8,995	Channel maintenance dredging performed by hopper dredge, Carteret County
Dredging	LTMOA	Complete	Bulkhead Channel Spring 2017	Town of Beaufort	USACE - Wilmington District	\$ 142,000	12	11,750	Channel maintenance dredging performed by hopper dredge, Carteret County
Dredging	LTMOA	Complete	Carolina Beach Inlet Late Fall 2016	New Hanover County	USACE - Wilmington District	\$ 300,000	15	42,282	Inlet maintenance dredging performed by side-cast dredge, New Hanover County
Dredging	LTMOA	Complete	Carolina Beach Inlet Late Winter 2017	New Hanover County	USACE - Wilmington District		12	27,200	Inlet maintenance dredging performed by side-cast dredge, New Hanover County
Dredging	LTMOA	Complete	East Taylor's Creek Spring 2017	Carteret County	USACE - Wilmington District	\$ 70,000	12	4,940	Channel maintenance dredging performed by hopper dredge, Carteret County
Dredging	LTMOA	Complete	Lockwood Folly AIWW Xing Winter 2017	Town of Holden Beach / Brunswick County	USACE - Wilmington District	\$ 304,000	9	61,000	Channel maintenance dredging performed by private pipeline dredge, Brunswick County
Dredging	LTMOA	Complete	Oregon Inlet FY 2016 - 2017	Dare County	USACE - Wilmington District	\$ 1,768,000	229	450,510	Inlet maintenance dredging performed by side -cast and hopper dredge, Dare County
Dredging	LTMOA	Complete	Wanchese Harbor Emergency Dredging	Dare County	USACE - Wilmington District	\$ 232,000	12	11,805	Channel maintenance dredging performed by hopper dredge, Carteret County
Dredging	AWMOA	Complete	Hatteras Inlet Connecting Channel - Spring 2017	Dare County	USACE - Wilmington District	\$ 375,000	23	55,824	Inlet maintenance dredging performed by side -cast, Dare County
Dredging	WRDG	Active	Sunset Beach Channel Dredging	Town of Sunset Beach	Town of Sunset Beach	\$ 2,779,327	tbd	tbd	Maintenance dredging of "West Channel", Dare/Hyde County
Dredging	WRDG	Active	Lake Lure General Navigation Dredging 2017	Town of Lake Lure	Town of Lake Lure	\$ 300,000	tbd	tbd	Channel maintenance dredging performed by bucket & barge, Carteret County
Dredging	WRDG	Active	Hatteras Inlet Dredging 2017	Dare County	Dare County	\$ 82,722	tbd	tbd	Inlet maintenance dredging performed by pipeline dredge, Onslow County
Dredging	WRDG	Active	Atlantic Beach Channel Dredging 2017	Atlantic Beach	Atlantic Beach	\$ 96,000	tbd	tbd	Inlet maintenance dredging performed by pipeline dredge, New Hanover County
Dredging	WRDG	Active	Ocean Bar Dredging @ New River Inlet	Town of North Topsail Beach	Town of North Topsail Beach	\$ 5,661,000	tbd	tbd	Inlet maintenance dredging performed by pipeline dredge, Onslow County
Dredging	WRDG	Active	Doughs Creek Canal Dredging 2017	Town of Manteo	Town of Manteo	\$ 436,333	tbd	tbd	Channel maintenance dredging performed by bucket & barge, Carteret County
Dredging	WRDG	Active	BHI Marina Channel Complex Dredging 2017	Village of Bald Head Island	Village of Bald Head Island	\$ 358,291	tbd	tbd	Channel maintenance dredging performed by bucket & barge, Carteret County

Total: \$ 14,252,296

Legend:

WRDG = Water Resources Development Grant
LTMOA = Long Term Memorandum of Agreement w/ U.S. Army Corps of Engineers
AWMOA = Addition Work Memorandum of Agreement w/ U.S. Army Corps of Engineers (Hatteras Inlet Complex)

ANNUAL REPORT

Aquatic Weed Program Projects

Shallow Draft Navigation Channel Dredging and Aquatic Weed Fund

Chapter 94 of the 2016 Session Laws, Section 14.12 (a)(f)

Date of Report: October 1, 2017

Coverage Period: July 1, 2016 to June 30, 2017

NOTE: The following is a list of the aquatic weed projects included on the 2016 work plan.

Project Type	Project Sub-Type	Project	Cooperator	Funding Recipient *	Proposed State Funding Amount	Proposed Cooperator Funding Amount	Description
Aquatic Weed	Hydrilla	Aberdeen Lake	Aberdeen, Town of	N/A	\$ 100.00	\$ 100.00	Site inspection
Aquatic Weed	Alligatorweed	City Lake Park	Albemarle, City of	N/A	\$ 700.00	\$ 700.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Cashie River	Bertie County	N/A	\$ 950.00	\$ 950.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Lake Santeetlah	Brookfield Smoky MountainHydropower	N/A	\$ 1,500.00	\$ 1,500.00	Lake-wide survey - Hydrilla
Aquatic Weed	Alligatorweed	Joyce Creek DD	Camden County	N/A	\$ 300.00	\$ 300.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Portohonk Creek	Camden County	N/A	\$ 200.00	\$ 200.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Run Swamp	Camden County	N/A	\$ 300.00	\$ 300.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Phragmites Australis	Sound shoreline	Camden County	N/A	\$ 200	\$ 200.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Hydrilla	Chowan River sites	Chowan Soil & Water	N/A	\$ 500.00	\$ 500.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Cape Colony	Chowan Soil & Water	N/A	\$ 1,250.00	\$ 1,250.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Alligatorweed	Columbia canals	Columbia, Town of	N/A	\$ 800.00	\$ 800.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Badin Lake	Cube Hydro (formerly APGI)	N/A	\$ 750	\$ 750.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Badin Lake	Cube Hydro (formerly APGI)	N/A	\$ 1,250	\$ 1,250.00	Lake-wide survey - Hydrilla
Aquatic Weed	Hydrilla	Badin subimpoundments	Cube Hydro (formerly APGI)	N/A	\$ 1,750	\$ 1,750.00	Installation of grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Badin subimpoundments	Cube Hydro (formerly APGI)	N/A	\$ 2,550	\$ 2,550.00	Survey / Monitoring of Hydrilla
Aquatic Weed	Hydrilla	Badin subimpoundments	Cube Hydro (formerly APGI)	N/A	\$ 650	\$ 650.00	Survey / Monitoring of Hydrilla
Aquatic Weed	Hydrilla	Falls Reservoir	Cube Hydro (formerly APGI)	N/A	\$ 200	\$ 200.00	Lake-wide survey - Hydrilla
Aquatic Weed	Hydrilla	Tuckertown Lake	Cube Hydro (formerly APGI)	N/A	\$ 1,000	\$ 1,000.00	Lake-wide survey - Hydrilla
Aquatic Weed	Creeping Water Primrose	Tuckertown Lake	Cube Hydro (formerly APGI)	N/A	\$ 300	\$ 300.00	Herbicide applications for treatment of Creeping Water Primrose
Aquatic Weed	Alligatorweed	HWY 64 drainage canals	Dare County	N/A	\$ 2,500.00	\$ 2,500.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Blewett Falls	Duke Energy	N/A	\$ 3,000.00	\$ 3,000.00	Installation of 750 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Lake Tillery	Duke Energy	N/A	\$ 600.00	\$ 600.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Mountain Island Reservoir	Duke Energy	N/A	\$ 2,500.00	\$ 2,500.00	Installation of 610 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Filbert's Creek	Edenton, Town of	N/A	\$ 1,250	\$ 1,250.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Queen Anne's Creek	Edenton, Town of	N/A	\$ 400	\$ 400.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Egeria densa	BMP-17 structure	Fayetteville, City of	N/A	\$ 500.00	\$ 500.00	Herbicide applications for treatment of Egeria densa
Aquatic Weed	Hydrilla	Mintz Pond	Fayetteville, City of	N/A	\$ 2,500	\$ 2,500.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Mintz Pond	Fayetteville, City of	N/A	\$ 500	\$ 500.00	Lake-wide survey - Hydrilla

* Typically, funds are not provided to the cooperator. For each project completed as proposed, the State funding will be matched dollar for dollar by the listed cooperator. Cooperators are invoiced for their matching contribution at the end of the weed season in November. Occasionally (1-2 times a year) a cooperator will pay for a project up front and the Department will reimburse them for 50% of the cost.

ANNUAL REPORT

Aquatic Weed Program Projects

Shallow Draft Navigation Channel Dredging and Aquatic Weed Fund

Chapter 94 of the 2016 Session Laws, Section 14.12 (a)(f)

Page 2 - Continued

Project Type	Project Sub-Type	Project	Cooperator	Funding Recipient *	Proposed State Funding Amount	Proposed Cooperator Funding Amount	Description
Aquatic Weed	Alligatorweed	City Lake	High Point, City of	N/A	\$ 1,500.00	\$ 1,500.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	West Fork Eno Reservoir	Hillsborough, Town of	N/A	\$ 400	\$ 400.00	Lake-wide survey - Hydrilla
Aquatic Weed	Hydrilla	West Fork Eno Reservoir sediment structure	Hillsborough, Town of	N/A	\$ 350	\$ 350.00	Installation of 50 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	West Fork Eno Reservoir sediment structure	Hillsborough, Town of	N/A	\$ 250	\$ 250.00	Installation of 30grass carp for Hydrilla control
Aquatic Weed	Eurasian Milfoil	Kitty Hawk Bay	Kill Devil Hills, Town of	N/A	\$ 1,500	\$ 1,500.00	Herbicide applications for treatment of Eurasian Milfoil
Aquatic Weed	Hydrilla	Lake Gaston	Lake Gaston Weed Council	N/A	\$ 25,000.00	\$ 25,000.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Lake Norman	Lake Norman Marine Comm.	N/A	\$ 1,250	\$ 1,250.00	Installation of 300 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Lake Wylie	Lake Wylie Marine Comm.	N/A	\$ 400	\$ 400.00	Installation of 90 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Falmouth Lake	Lewisville, Town of	N/A	\$ 150	\$ 150.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Marblehead Lake	Lewisville, Town of	N/A	\$ 450	\$ 450.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Alligatorweed	Buckridge Coastal Reserve	NC Division of Coastal Management	N/A	\$ 500.00	\$ 500.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Lake Waccamaw	NC Division of Parks & Recreation	N/A	\$ 116,500.00	\$ 116,500.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Eno River	NC Division of Parks & Recreation	N/A	\$ 28,000.00	\$ 28,000.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Morrow Mountain	NC Parks & Recreation	N/A	\$ 550	\$ 550.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Umstead (Big Lake)	NC Parks & Recreation	N/A	\$ 400	\$ 400.00	Installation of 50 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Umstead (Big Lake)	NC Parks & Recreation	N/A	\$ 200	\$ 200.00	Lake-wide survey - Hydrilla
Aquatic Weed	Hydrilla	Umstead (Reedy Creek)	NC Parks & Recreation	N/A	\$ 200	\$ 200.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Umstead (Sycamore Lake)	NC Parks & Recreation	N/A	\$ 100	\$ 100.00	Survey / Monitoring of Hydrilla
Aquatic Weed	Phragmites Australis	Carolina Beach S.P.	NC Parks & Recreation	N/A	\$ 3,250	\$ 3,250.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Fort Fisher S.P.	NC Parks & Recreation	N/A	\$ 750	\$ 750.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Goose Creek S.P.	NC Parks & Recreation	N/A	\$ 1,500	\$ 1,500.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Hammocks Beach	NC Parks & Recreation	N/A	\$ 500	\$ 500.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Jockeys Ridge S.P.	NC Parks & Recreation	N/A	\$ 250	\$ 250.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Pettgrew S.P.	NC Parks & Recreation	N/A	\$ 600	\$ 600.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Phragmites Australis	Run Hill	NC Parks & Recreation	N/A	\$ 700	\$ 700.00	Herbicide applications for treatment of Phragmites Australis
Aquatic Weed	Research	Non-target impacts of Hydrilla treatments	NC State University	N/A	\$ 7,500	\$ 7,500.00	Study of secondary effects of Hydrilla treatments regimens
Aquatic Weed	Hydrilla	Lake Rim	NC WRC - Division of Inland Fisheries	N/A	\$ 400	\$ 400.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Phragmites Australis	River Drive Pond	North Topsail Beach, Town of	N/A	\$ 1,700	\$ 1,700.00	Herbicide applications for treatment of Phragmites Australis

* Typically, funds are not provided to the cooperator. For each project completed as proposed, the State funding will be matched dollar for dollar by the listed cooperator. Cooperators are invoiced for their matching contribution at the end of the weed season in November. Occasionally (1-2 times a year) a cooperator will pay for a project up front and the Department will reimburse them for 50% of the cost.

ANNUAL REPORT

Aquatic Weed Program Project

Shallow Draft Navigation Channel Dredging and Aquatic Weed Fun

Chapter 94 of the 2016 Session Laws, Section 14.12 (a)(

Page 3 - Continue

Project Type	Project Sub-Type	Project	Cooperator	Funding Recipient *	Proposed State Funding Amount	Proposed Cooperator Funding Amount	Description
Aquatic Weed	Hydrilla	Lake Orange	Orange County	N/A	\$ 2,500	\$ 2,500.00	Herbicide applications for treatment of Hydrilla / Survey
Aquatic Weed	Hydrilla	Lake Orange	Orange County	N/A	\$ 1,200	\$ 1,200.00	Installation of 150 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Sediment structure #1	Orange County	N/A	\$ 1,250	\$ 1,250.00	Herbicide applications for treatment of Hydrilla / Survey
Aquatic Weed	Hydrilla	Sediment structure #1	Orange County	N/A	\$ 550	\$ 550.00	Installation of 65 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Sediment Structure #2	Orange County	N/A	\$ 900	\$ 900.00	Herbicide applications for treatment of Hydrilla / Survey
Aquatic Weed	Alligatorweed	Cane Creek Reservoir	Orange County Water & Sewer	N/A	\$ 1,100.00	\$ 1,100.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Cane Creek Reservoir	Orange County Water & Sewer Authority	N/A	\$ 1,000	\$ 1,000.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Alligatorweed	Newland Drainage Canal	Pasquotank County	N/A	\$ 400.00	\$ 400.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Pinelakes Canal System	Pasquotank County	N/A	\$ 500.00	\$ 500.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Pasquotank River	Pasquotank County	N/A	\$ 750.00	\$ 750.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Nicanor Drainage Area	Perquimans County	N/A	\$ 1,750.00	\$ 1,750.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Creeping Water Primrose	Randleman Reservoir	Piedmont Triad Regional H2O Authority	N/A	\$ 2,000	\$ 2,000.00	Herbicide applications for treatment of Creeping Water Primrose
Aquatic Weed	Alligatorweed	Tar River Reservoir	Rocky Mount, City of	N/A	\$ 750.00	\$ 750.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Tar River Reservoir	Rocky Mount, City of	N/A	\$ 450	\$ 450.00	Installation of 55 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Tar River Reservoir	Rocky Mount, City of	N/A	\$ 400	\$ 400.00	Lake-wide survey - Hydrilla
Aquatic Weed	Creeping Water Primrose	Tar River Reservoir	Rocky Mount, City of	N/A	\$ 750	\$ 750.00	Herbicide applications for treatment of Creeping Water Primrose
Aquatic Weed	Alligatorweed	Scuppernong	Tyrrell County	N/A	\$ 750.00	\$ 750.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Alligatorweed	Lake Wilson	Wilson, City of	N/A	\$ 700.00	\$ 700.00	Herbicide applications for treatment of Alligatorweed
Aquatic Weed	Hydrilla	Buckhorn Lake	Wilson, City of	N/A	\$ 500	\$ 500.00	Herbicide applications for treatment of Hydrilla
Aquatic Weed	Hydrilla	Buckhorn Lake	Wilson, City of	N/A	\$ 7,250	\$ 7,250.00	Installation of 1,790 grass carp for Hydrilla control
Aquatic Weed	Hydrilla	Buckhorn Lake	Wilson, City of	N/A	\$ 600	\$ 600.00	Lake-wide survey - Hydrilla
Aquatic Weed	Creeping Water Primrose	Toisnot Lake	Wilson, City of	N/A	\$ 250	\$ 250.00	Herbicide applications for treatment of Creeping Water Primrose
Total:					\$ 250,150	\$ 250,150	

* Typically, funds are not provided to the cooperator. For each project completed as proposed, the State funding will be matched dollar for dollar by the listed cooperator. Cooperators are invoiced for their matching contribution at the end of the weed season in November. Occasionally (1-2 times a year) a cooperator will pay for a project up front and the Department will reimburse them for 50% of the cost.