



2022 Marine Debris Work Group Work Plan and Progress Report

Reporting Period: January 2022 – June 2022

Work Group Webpage: <https://www.midatlanticocean.org/ocean-planning/work-groups-collaborative-efforts/marine-debris-work-group/>

Work Group Leads: Laura McKay (VA); *(Maureen Krudner, EPA departed in mid-April)*

Work Group Members: Work Group membership is open to government and non-governmental entities operating in the 5 Mid-Atlantic states and the District of Columbia that are willing to participate in the activities of the work group. Members are expected to contribute on monthly work group calls and assist with implementation of projects.

Current Members Include:

Last Name	First Name	Organization
Bristow	Avalon	Mid-Atlantic Regional Council on the Ocean (MARCO)
Carr	Emmalee	NJ
Chesnin	Noah	Wildlife Conservation Society
Fleming	Kate	Delaware Sea Grant
Ford	Mary	MARACOOS
Gemenden	JoAnn	NJ Clean Communities
Gove	Matt	Surfrider
Gronostajski	Kyle	Alliance for a Living Ocean
Johnson	Cathy	National Park Service
Keane	Ellen	NOAA/NMFS/Protected Resources
*Krudner	Maureen	EPA Region 2, Permitting Section (through April 2022)

Kuriawa	John	NOAA/NOS/OCM
Lieske	Kristi	DE Coastal Management Program
Mazzeo-Pfoertner	Christie	NY DOS
*McKay	Laura	VA - CZM Program
Morgan	Katie	NOAA - Marine Debris Program
Morrow	Donna	MD DNR Chesapeake & Coastal Service
Muthukrishnan	Swarna	Clean Ocean Action - NJ
Neusner	Gabriella	EPA HQ Trash Free Waters
Personius	Casey	NY DEC
Raabe	Steve	OpinionWorks
Register	Katie	Clean VA Waterways
Robinson	Matt	D.C. DOEE
Rutkowski	Megan	NJ
Sanders	Hannah	EPA Region 3 Trash Free Waters
Shifren	Sheri	NJ
St. Laurent	Kari	DE NERR
Trapani	Christina	Contractor/EcoManiacs
Weis	Judith	Rutgers
Witmer	Virginia	Virginia Coastal Zone Management Program

* Co-Leads

Work Group Goals, Objectives and Actions: This work builds on Action 4 of the 2016 Mid-Atlantic Ocean Action Plan: "Develop a regionally appropriate strategy for marine debris reduction." For calendar year 2022, the Work Group is focusing on four activities: implementing a Community-Based Social Marketing (CBSM) campaign to change behavior resulting in marine debris reduction at the Mid-Atlantic regional scale, with an initial focus on reducing balloon releases; conducting shoreline marine debris surveys and documenting the quantities and types of debris found; implementing a Mid-Atlantic Marine Debris Reduction Plan; and maintaining a marine debris projects inventory website. The MDP may also begin a NOAA Marine Debris Prevention Grant aimed to reduce single-use plastic water bottles and cap litter, if the application is accepted.

ACTIVITY 1 - Continue the community-based social marketing campaign to reduce balloon releases.

Expected Completion Date: July 2022

Continue the balloon release reduction campaign based on community-based social marketing principles. This activity is funded by a 2018 NOAA Marine Debris Program grant to MARCO and builds off of the work conducted via Virginia CZM's MDP FY14 funded Joyful Send-Off Balloon Release Reduction Campaign. Doug McKenzie-Mohr, author of "Community-based Social Marketing" will review final messages for the campaign and overall dissemination strategy. In 2022, once results of the fall 2021 campaign launch have been gathered and reviewed, the campaign strategy will be adjusted as needed, and a second and spring 2022 pilot will be launched. Data collected will help measure and evaluate overall campaign success.

A1 Progress Description: January 2022- June 2022

With results and feedback from the aquarium partners to the Fall 2021 pilot, a Core Team meeting was held to refine and complete implementation of the Mid-Atlantic Prevent Balloon Litter CBSM campaign strategy. A spring pilot was launched by the aquarium partners on April 4, 2022, including an online form to collect pledges with on-site visitors, pledge decals (reminder or prompt), and a Social Media Plan. Additional partners participated in generating social media posts about the campaign.

Additional media also was designed to create a campaign Exhibit Kit, including:

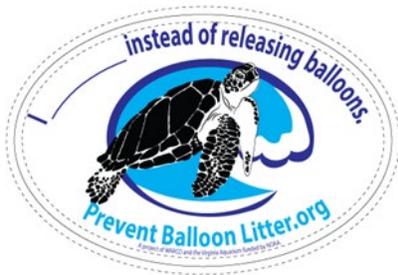
- 1) two pop-up banners (one highlighting balloon litter impacts and one highlighting release alternatives
- 2) a reusable pop-up banner to collect pledges (using round "bubble-shaped" post-its - image taken of filled pledge banner and post-its than removed and pledges counted)
- 3) a display table runner with campaign logo
- 4) four new pledge decal designs (tweaked with feedback from McKenzie-Mohr)
- 5) a 5 x 8 sheet of 5 stickers (geared for kids)
- 6) a card with DIY bubble recipes and DIY bubble wands.

Each exhibit kit also includes a bubble machine.



Image above shows Exhibit Kit pop-up banners (1), pledge banner (2), and table runner (3).

Below - Two of the four new decal designs (4).



Below - A sticker sheet (5) and DIY bubble recipe and wands card (6) were designed with kids and families in mind.



Also produced are four 10" x 10" removable-adhesive stickers with campaign messaging (two displaying alternative images and two displaying impact images). See one of the stickers below. These stickers are intended for display in public spaces such as on bathroom stall doors, and on supercans, where they would be visible to neighbors



The exhibit kit was distributed to each of the 5 Mid-Atlantic States, the 3 participating aquariums (Virginia, National - Baltimore, and New York) and MARCO for outreach events. A team at Longwood University/Clean Virginia Waterways was contracted to handle printing, packaging and distribution.

When used during events where educators are the primary audience, the Exhibit Kit also includes a one page handout for teachers that explains the purpose of the campaign and links to a new "Teacher Kit" webpage on PreventBalloonLitter.org - <https://www.preventballoonlitter.org/teacher-kit>.

This Teacher Kit webpage offers the following for download and printing:

- 1) balloon litter and alternatives fact sheets
- 2) a classroom conversation script
- 3) sheet of pledge decals
- 4) campaign posters
- 5) DIY Bubble Solution Recipes and Wands sheet

Links are provided on the Teacher Kit webpage to:

- 1) animated video - "Balloon Litter: Say No to Letting It Go!"
- 2) online purchase of bubble machine

- 3) online Prevent Balloon Litter pledge
- 4) online PDF of “Plastic Pollution and You, a resource for teachers” published by New York Sea Grant, which contains a lesson related to balloon litter.

A Media Strategy sub-group crafted a Media Outreach Plan, including a letter to the media for partners to adapt for their state and local media outlets (https://docs.google.com/document/d/1TfwoUcyQ68HXJFviSVxa3X_RCUiJxrtW/edit). The letter asks for help in ending coverage of balloon releases and instead share stories featuring the use of alternatives to balloon release. In Virginia, the Richmond Times Dispatch printed an article in the April 24 2022 Sunday paper. A Press Room was published at <https://www.preventballoonlitter.org/pressroom>, which offers media resources, including images of balloon litter and alternatives as well as campaign logos.

Other state outreach on campaign:

The NJ Clean Communities Council placed an article in their April newsletter that was mailed to every state legislator (Senate and Assembly), every Mayor and County elected official and every local clean communities coordinator. In April, the newsletter was also disseminated to attendees at the NJ Chamber Conference, Solid Waste Association of North America NJ conference, the NJ Association of Counties Conference and then the NJ Conference of Mayors in May. Later in May, NJCCC hosted their annual seminar which included a segment on balloon litter.

ACTIVITY 2 - Conduct bi-annual assessments of balloon and other debris.

Expected Completion Date: July 2022

Monitoring will be conducted on 1 mile stretches of beaches in each of the five Mid-Atlantic states. Staff and volunteers will collect data on the number and type of balloons identified as well as other types of debris. Data will be shared on the MACO Work Group pages of the MARCO website. These surveys are being conducted with funding from the 2018 NOAA Marine Debris Grant mentioned above. The results from the surveys may inform other elements of this project, including campaign strategy and success measures.

A2 Progress Description: January 2022- June 2022

State	Total Balloon Debris Pieces collected in Winter/Spring 2022	Total non-balloon debris ¹ pieces collected in Winter/Spring 2022
Virginia	109	1,366
Maryland	1	107
Delaware	16	559
New Jersey	Not available	Not available
New York	Not available	Not available

ACTIVITY 3 - Support the Implementation of the Mid-Atlantic Marine Debris Action Plan.

Expected Completion Date: Implementation to continue through 2026

The Mid-Atlantic Marine Debris Action Plan brings together the Mid-Atlantic marine debris communities to document entities working on marine debris with the purpose of increasing coordination, adding value to existing efforts, and identifying future actions. The action plan strengthens Mid-Atlantic regional effectiveness by bringing our marine debris community together to develop a regional marine debris action plan that addresses current marine debris issues in the region and creates a road map for the future. In collaboration with NOAA Marine Debris Program, this work group will support the implementation of the action plan and coordinate semi-annual monitoring for actions with leads and partners and share summary updates through 2026.

A3 Progress Description: January 2022- June 2022

Semi-Annual Reporting (January - June 2022): During the development of the Mid-Atlantic Marine Debris Action Plan, partners agreed to submitting progress updates in January and July of each year. NOAA Marine Debris Program solicited updates from all 97 Action Plan partners in January 2022, and compiled full progress updates into a document which was shared with partners in February 2022.

¹ Non-balloon related debris include but are not limited to: bags (paper, plastic, and other materials), bottles (glass, plastic, other), bottle caps, cans, cigarette butts, lighters, clothing, fishing materials, k-cups, foam fragments, hard or film plastic pieces, rope, shotgun shells, straws, construction material.

MACO is a partner on 10 of the 54 Actions in the Mid-Atlantic Marine Debris Action Plan. As of January 2022, MACO has reported 7 of the 10 Actions they partner on are in-progress. In addition, MACO leads Action 1.1.1.3, and has made significant progress on this action, as reflected by the updates above in Activities 1 and 2.

Action	Status Update (as of January 2022)	Status Updated (as of July 2022)
1.1.1.3 (Lead) - By the end of 2026, support outreach, advocacy, and education campaigns based on community-based social marketing techniques to prevent the intentional release of balloons using strategies developed with regional partners and promoted through preventballoonlitter.org	In progress	
1.2.1.1 - Each year of the Action Plan, compile existing consumer debris research on the Mid-Atlantic Marine Debris Collaboration Portal to enable analysis of information gaps, best practices, and available resources.	In progress	
1.2.1.2 - By the end of 2026, promote consumer debris research by conducting stream, river, and shoreline monitoring surveys, monitoring study sites, promoting citizen science, and collecting stormwater data to better inform decision-makers and raise public awareness.	In progress	
1.2.2.1 - By the end of 2026, analyze the effectiveness of community-based social marketing techniques and behavior change campaigns to target, inform, transfer, and influence at least three consumer debris campaigns that are inclusive of the Mid-Atlantic regional community	In progress	
2.1.1.1 - By the end of 2026, promote at least 10 new outreach products to be shared at targeted outreach events to engage the public and recreational fishing and boating communities in derelict gear prevention. Make them available online for diverse audiences through the	In progress	

Mid-Atlantic Marine Debris Collaboration Portal and other platforms.		
2.1.1.3 - By the end of 2026, develop and share at least five new outreach products on proper disposal and recycling of monofilament line to fishers, boaters, and the general public, and build at least 10 new private partnerships on recycling monofilament line and soft bait	In progress	
3.1.1.1 - By the end of 2026, create and implement at least 15 outreach products and/or education campaigns that are relevant to or could be replicated across the region that raise awareness of microplastic and microfiber issues among Mid-Atlantic residents as an initial step to lead to long-term changes in behavior, and make them available on the Mid-Atlantic Marine Debris Collaboration Portal and other platforms	In progress	
3.2.1.1 - Each year of the Action Plan, share microplastic data, research, best practices, literature, resources, and funding sources on the Mid-Atlantic Marine Debris Collaboration Portal.	Not started	
4.2.1.1 - By the end of 2023, identify opportunities to create state inventory programs and identify derelict vessel hotspots with state and local authorities and share resources with the Mid-Atlantic community	Not started	
4.5.1.1 - By the end of 2026, document the successful techniques and legislative approaches of at least five federal, state, and local agencies to share lessons learned on ADV removal, disposal options, and prevention approaches, and explore opportunities for new legislation.	Not started	

Action Plan coordination calls (January - June 2022): Partners to the Mid-Atlantic Marine Debris Action Plan met several times from January to June to network, discuss collaboration opportunities, and share progress on ongoing projects in the region and/or lessons learned from their work.

Meeting Date	Meeting Topic	MACO Engagement
April 4, 2022	Kick-off call for consumer debris workgroup to determine future meeting frequency and discussion topics	11 MACO Marine Debris Workgroup members attended this meeting. There were 27 total meeting attendees.
April 12, 2022	Kick-off call for derelict fishing gear workgroup to determine future meeting frequency and discussion topics	5 MACO Marine Debris Workgroup members attended this meeting. There were 15 total meeting attendees.
April 22, 2022	Kick-off call for abandoned and derelict vessels workgroup to determine future meeting frequency and discussion topics	3 MACO Marine Debris Workgroup members attended this meeting. There were 6 total meeting attendees.
April 27, 2022	Kick-off call for microplastics workgroup to determine future meeting frequency and discussion topics	5 MACO Marine Debris Workgroup members attended this meeting. There were 15 total meeting attendees.
June 16, 2022	Consumer Debris Workgroup call to discuss Action Plan Objective 1.1.3: <i>identify and promote industry partnerships in supply chain and production operations to promote reusable systems and extended producer responsibility in sectors such as food service, hotels, tourism, retail, manufacturing, and wholesale.</i>	Three MACO Marine Debris Workgroup partners presented on their work at this meeting: <ul style="list-style-type: none"> ● Surfrider Foundation ● WCS New York Aquarium ● Clean Ocean Action

ACTIVITY 4 - Update Projects Database in the Mid-Atlantic Marine Debris Collaborative Portal.**Expected Completion Date:** Continual

In order to determine on which type of marine debris and what type of projects the work group should focus, the group created an Excel file of previously conducted projects in all five states. Meanwhile, NOAA had been working with the Great Lakes states to create a collaborative website which served the same function, but also included a mapping feature for the projects. Subsequently, NOAA offered to create a similar collaborative website for the Mid-Atlantic into which the data from the Excel file could be uploaded. This “Mid-Atlantic Marine Debris Collaborative” website allows identified staff in each state to upload information about marine debris reduction efforts. This website can also be viewed by all stakeholders and the general public [here](#).

A4 Progress Description: January 2022- June 2022

There are currently 96 projects in the database.

Following the Mid-Atlantic Marine Debris Action Plan Semi-Annual Reporting period in January 2022, NOAA Marine Debris Program updated the collaboration portal with new reports produced by action plan partners. Included on the portal were the Virginia Marine Debris Reduction Plan (published Nov 2022) and a bioplastics toolkit created by Surfrider Foundation. Additional documents are being prepared for upload, including the Virginia Abandoned and Derelict Vessel Workgroup report, a report on turtle excluder devices, and more.

ACTIVITY 5 - Reduce single-use plastic water bottles on Mid-Atlantic waterfront recreation zone**Expected Completion Date:** TBD

The work group has identified single-use plastic water bottle reduction on beaches and other waterfront recreation areas as a priority and is compiling a proposal to the Marine Debris Prevention Program to utilize Community- Based Social Marketing (CBSM) techniques to increase the use of reusable water bottles and decrease the use of single-use water bottles and cap litter in the marine environment. The project will focus on access to clean water through water bottle refilling stations, an identified barrier to the behavior of single use water bottle use. This campaign will provide sustainable improvement to coastal and ocean habitats identified as critical for federally and state listed marine species including sea turtles, marine mammals, and shorebirds.

Additionally, the use of reusable water bottles reduces known human health hazards posed by plastic water bottles, and contactless water bottle refill stations are especially important in an ongoing COVID era. If funded, this project would also enable continued beach monitoring (Task 2) for the duration of the project.

A5 Progress Description: January 2022- June 2022

The marine debris work group submitted a full proposal *“Preventing single-use plastic water bottles on Mid-Atlantic waterfront recreational zones”* for a FY22 NOAA Marine Debris Prevention grant. The project was not selected for funding, but would have launched a focused campaign for tourists and residents to bring reusable water bottles rather than single-use plastic bottles to waterfront recreation areas. Twenty permanent water bottle refilling stations were planned to be installed at 18 waterfront recreational zones (four in New York, two in New Jersey, three in Delaware, four in Maryland, two in Washington D.C., and three in Virginia), and a map layer showing station locations and frequency of use would have been added to the marine debris data layers on the free and public Mid-Atlantic Ocean Data Portal. Additionally, a virtual tool/application that includes a usage ticker and station locator would have been created to make it easier for visitors to find the water refill stations.

Although this proposal was not selected for funding, the Work Group remains committed to the concept and is seeking other funding to begin this effort - particularly to study the barriers to this desired behavior change.

