

# Department of Natural Resources

## MISSION

The Department of Natural Resources leads Maryland in securing a sustainable future for our environment, society, and economy by preserving, protecting, restoring, and enhancing the State's natural resources.

## VISION

In a sustainable Maryland, we recognize that the health of our society and our economy are dependent on the health of our environment. Therefore, we choose to act both collectively and individually to preserve, protect, restore, and enhance our environment for this and future generations.

## KEY GOALS, OBJECTIVES, AND PERFORMANCE MEASURES

### Goal 1. Healthy Terrestrial Ecosystems.

- Obj. 1.1** Establish scientifically supported sustainable harvest strategies for game species populations through a variety of survey methods.
- Obj. 1.2** Restore 2,000 acres of critical plant and wildlife habitat by June 30, 2018.
- Obj. 1.3** Preserve and protect Maryland's aquatic and wildlife habitats and populations by increasing the number of conservation inspections conducted to 150,000 by 2017.
- Obj. 1.4** Restore 2,000 miles of riparian forest buffers (RFBs) in Maryland by 2025.
- Obj. 1.5** Provide multiple ecosystem benefits by annually achieving integrated resource management covering 25,000 acres of non-industrial private forest lands and guiding 700 forest landowners in natural resources management that meets their needs.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Number of deer hunting participants	70,700	66,000	66,000	62,000	70,471	70,500	70,500
Number of bear hunting participants	690	750	1,060	1,730	1,708	1,800	2,000
Number of deer harvested	87,500	95,800	86,900	84,000	85,193	85,000	85,000
Number of bear harvested	92	94	69	95	167	170	190
Cumulative number of acres of habitat restored since 2004	1,600	1,800	1,855	1,905	2,805	2,850	2,900
Cumulative acres of early successional habitat created	N/A	N/A	N/A	676	1,101	1,600	2,100
Number of Park Service acres restored to preserve biodiversity	N/A	120	120	180	210	200	200
Number of conservation inspections conducted	147,638	131,268	154,854	161,585	208,587	158,862	161,601
Number of conservation inspections per officer	923	763	927	878	1,092	913	920
Acres of RFBs established	281	263	251	258	118	150	150
Miles of RFBs restored in Maryland	16	15	17	16	8	15	15
Cumulative miles restored in Bay Watershed since 1996	1,354	1,369	1,386	1,402	1,410	1,425	1,440
Number of acres covered by Forest Stewardship Plans	17,822	17,651	19,112	32,203	28,123	25,000	25,000
Total acres of management practices implemented	22,706	15,964	23,349	28,948	25,835	22,000	22,000
Number of wildfires suppressed	134	135	135	131	126	125	125
Acres of wildfires suppressed	569	1,733	1,061	185	2,255	1,000	1,000

# Department of Natural Resources

## Goal 2. Healthy Aquatic Ecosystems.

- Obj. 2.1** Utilizing the Chesapeake and Atlantic Coastal Bays 2010 Trust Fund, annually reduce coastal non-point source pollution from entering Chesapeake, coastal, and ocean waters. Report on the status of key Chesapeake Bay resources as government, commercial, and citizen efforts to restore water and habitat quality of the Bay and its watershed continue through 2025.
- Obj. 2.2** Annually produce technical assessments on Harmful Algal Bloom (HAB) distribution and prevalence for Maryland's waters, develop new management strategies, and provide timely information to the public and agencies charged with protecting public health.
- Obj. 2.3** Assess ecosystem components within non-tidal waters to evaluate critical fisheries and habitat elements for protection and/or restoration.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Cumulative pounds of coastal non-point sources of nitrogen reduced through annual and structural land use change Best Management Plans (BMPs)	1,337,478	1,576,706	2,104,961	1,678,254	1,937,574	2,192,189	2,363,285
Cumulative pounds of coastal non-point sources of phosphorus reduced through annual and structural land use change BMPs	53,962	104,624	165,179	168,531	198,202	227,408	252,563
Cumulative pounds of coastal non-point sources of sediment reduced through annual and structural land use change BMPs (millions)	185.005	367.169	370.729	373.057	373.061	373.064	371.853
<sup>1</sup> Number of tributaries with Harmful Algal Blooms	6	12	11	7	10	11	11
<sup>1</sup> Number of fish or human health advisories events reported/responses	7	7	4	6	2	5	5
<sup>1</sup> Acres of Submerged Aquatic Vegetation (goal=114,034)	28,815	39,400	53,783	59,277	59,500	64,000	69,000
<sup>1</sup> Number of sites where Maryland Biological Stream Survey (MBSS) benthic, fish, herpetofauna, and habitat samples are collected	95	165	219	220	232	201	150
<sup>1</sup> Number of volunteer benthic samples collected and processed	362	306	240	99	61	60	60
<sup>1</sup> Number of freshwater watersheds with data available	37	43	65	60	63	57	36

**Obj. 2.4** Complete comprehensive reviews of local Critical Area Programs to assure consistency with law and regulations.

**Obj. 2.5** Maximize the preservation and protection of living resources and aquatic habitat by providing annual, comprehensive surveys, charts, and accurate markings of State waterways.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Percentage of Critical Area Programs reviewed and completed during the six-year cycle as required by law, and fully consistent with the Critical Area law and regulation	20%	16%	4%	8%	0%	33%	25%
<sup>1</sup> Number of monitoring stations reporting water quality trends	N/A	N/A	196	196	221	222	226
Number of oyster habitat and oyster location surveys completed	167	735	109	147	190	100	101
Number of waterway violation cases supported	171	132	66	65	134	100	101

K00

<http://dnr.maryland.gov>

# Department of Natural Resources

**Obj. 2.6** Annually achieve fishery sustainability objectives (target fishing level and/or biomass threshold) for blue crab, striped bass and oyster fisheries.

**Obj. 2.7** Restore native oyster habitat and populations in 10 tributaries (5 in Maryland) by 2025 and ensure their protection.

**Obj. 2.8** Facilitate the development of the Maryland aquaculture industry through collaboration with the Maryland Aquaculture Coordinating Council.

**Obj. 2.9** Annually achieve statewide finfish population restoration and enhancement Sportfish Restoration objectives through 2020.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
<sup>1</sup> Number of fisheries being tracked/reviewed annually in accordance to a management plan	N/A	20	22	26	26	26	26
<sup>1</sup> Harvest rate (exploitation fraction) of female blue crabs relative to target harvest rate (25.5 percent)	23%	17%	15%	25%	25%	25%	25%
<sup>1</sup> Crab winter dredge survey index of stock size (density-crabs/1000m)	32	32	50	58	47	50	50
<sup>1</sup> Striped bass juvenile index (abundance of young of the year fish)	5.8	11.0	24.2	2.2	11.7	11.7	11.7
<sup>1</sup> Number of bushels of oysters harvested	343,575	422,382	393,588	385,000	224,685	150,000	200,000
<sup>1</sup> Oyster biomass index (1994 base =1; goal = 10)	2.0	2.0	2.1	1.8	1.4	1.3	1.2
<sup>1</sup> Number of hatchery oysters planted (millions)	655.0	635.0	816.7	831.0	800.0	500.0	500.0
<sup>1</sup> Acres of oyster habitat rehabilitated through planting of shell or non-shell habitat	0.0	61.0	126.5	182.0	80.0	75.0	75.0
Number of new or expanded aquaculture businesses	36	57	54	68	53	60	60
<sup>1</sup> Stock hatchery-cultured finfish to support population restoration, population enhancement, corrective stocking, put-and-take fishing, outreach, education, and research (millions)	10.1	7.1	5.7	6.6	7.5	5.0	5.0

**Obj 2.10** Certify five additional Clean Marinas annually.

**Obj 2.11** Screen 20 applications per year to provide grants for the purchase and installation of marine sewage pumpout stations.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
<sup>1</sup> Clean marinas certified	6	6	3	3	0	4	4
<sup>1</sup> Cumulative number of clean marinas in State adopting best management practices (including those decertified over time)	150	154	155	156	154	155	156
Total number of pumpout stations operating in the State	360	350	350	340	359	360	361
New pumpout stations installed	1	2	1	1	1	1	1
Pumpout stations replaced or upgraded	12	14	9	9	5	10	10

# Department of Natural Resources

## Goal 3. Fiscal Responsibility: Efficient Use of Energy & Resources and Support of Long-Term Economic Prosperity.

**Obj. 3.1** Protect Maryland's ecologically-valuable lands and waters through effective project review, including permit applications, and policy strategies.

**Obj. 3.2** Protect high value natural resources and outdoor recreational opportunities on public and private lands by reviewing more than 2,500 proposed projects and permits, on an annual basis, to minimize environmental harm and preserve investments in public lands.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Number of requests for new critical maintenance capital projects on DNR lands	N/A	71	92	116	74	100	100
Number of requests for new major capital development projects on DNR land (not including critical maintenance projects)	N/A	45	27	43	24	40	40
Number of projects on DNR lands initiated or completed	393	260	349	258	234	270	270
Percent of major capital development projects on DNR lands initiated or completed	95%	94%	86%	86%	88%	90%	88%
Number of reviews for projects on public lands	293	247	268	280	305	296	301
Number of external permits and projects reviewed for impacts	2,290	2,340	2,405	2,372	2,112	2,207	2,174
Number of project proposals reviewed for impacts to threatened and endangered species and other species of concern	1,881	2,181	2,848	1,989	1,871	1,900	1,900

**Obj. 3.3** Increase the number of State and local governments prepared for the impacts of future storm-events, shoreline changes, and sea level rise.

**Obj. 3.4** Annually issue assessments and recommendations to minimize the environmental, public health, and socioeconomic impacts of electric energy facilities.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Cumulative number of Maryland's state agencies and coastal communities who have incorporated sea level and climate considerations into planning and management strategies	2	4	8	8	14	18	22
<sup>1</sup> Number of new power plant/transmission line projects under review	34	44	35	41	30	33	30

## Goal 4. Citizen Stewardship, Outdoor Recreation, & Opportunities to Take Action.

**Obj. 4.1** Annually increase the number of youth conservation program participants and projects.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Additional number of youth participants in corps programs	339	359	369	383	498	400	400
Number of stewardship projects completed by youth corps	2,012	2,473	2,388	2,400	2,755	2,500	2,500

# Department of Natural Resources

**Obj. 4.2** Increase attendance of Maryland Environmental Trust (MET) sponsored workshops and trainings.

**Obj. 4.3** Contribute to achieving State education mandates and goals for environmental literacy by providing a combination of workshops, training, and educational opportunities that support schools (through professional development for educators and classroom and outdoor experiences for students), parks, and partner environmental education providers.

**Obj. 4.4** Annually provide outdoor recreational, historical, and cultural resource experiences for over 10 million visitors to State Parks.

**Obj. 4.5** Annually increase customer service satisfaction rating and improve fiscal sustainability.

<b>Performance Measures</b>	<b>2013 Act.</b>	<b>2014 Act.</b>	<b>2015 Act.</b>	<b>2016 Act.</b>	<b>2017 Act.</b>	<b>2018 Est.</b>	<b>2019 Est.</b>
MET Workshop and conference attendance	205	287	253	377	360	365	370
Number of educators and volunteers trained	629	1,985	2,006	1,978	1,920	1,950	1,950
Number of students participating in classroom, field and other activities	55,363	54,556	63,978	69,102	61,729	67,000	67,000
Number of DNR social media followers	43,950	86,500	90,000	125,000	215,000	245,000	275,000
<sup>2</sup> Number of State Park acres available to the public	140,500	140,500	138,015	138,270	137,716	140,500	141,500
Acres of Wildlife Management Areas (WMAs)	112,575	112,575	119,808	123,530	123,790	128,790	128,790
Number of visitors using parks (millions)	10.09	10.30	11.26	12.94	13.99	13.00	13.00
Number of trail miles available	N/A	591	880	919	1,020	1,046	1,073
Number of Park Service interpretive and environmental education program participants	N/A	N/A	100,135	245,547	248,901	249,500	250,500
Percent of visitors rating their park experience as excellent or above average	N/A	92%	91%	90%	90%	92%	92%

**Obj. 4.6** Annually reduce the number of accidents and injuries through education programs, to include public relations outreach efforts targeted at the prior years boating and hunting accident stats for causal factors.

<b>Performance Measures</b>	<b>2013 Act.</b>	<b>2014 Act.</b>	<b>2015 Act.</b>	<b>2016 Act.</b>	<b>2017 Act.</b>	<b>2018 Est.</b>	<b>2019 Est.</b>
Number of reportable boating accidents	123	120	130	150	154	133	136
Number of hunting accidents	24	8	7	16	18	14	14

# Department of Natural Resources

**Obj. 4.7** Ensure safe and enjoyable recreational opportunities for boaters, hunters, park visitors, and others participating in outdoor recreation activities by providing effective law enforcement services as a public safety agency.

**Obj. 4.8** Conduct and perform daily patrols and activities that support Maritime Homeland Security designed to provide a safe and secure environment for Maryland citizens and visitors alike.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Number of hunters checked	13,767	13,425	16,561	16,501	16,614	15,138	15,399
Number of boating inspections	31,337	23,271	34,405	43,281	38,897	33,756	34,338
Number of law enforcement officers	160	172	167	184	191	174	177
Number of law enforcement contacts	261,250	237,955	294,075	309,427	270,877	271,440	276,276
Number of law enforcement citations/warnings	35,712	35,603	31,489	31,239	29,826	32,364	32,959
Hours spent on Waterway Patrols	30,177	29,517	39,736	42,018	40,457	35,844	37,008
Hours spent on Public Land Patrols	60,894	58,741	59,647	62,544	63,272	60,204	61,366
Uniform Crime Report data – Part 1 crimes	245	253	227	149	163	206	208
Number of Homeland Security patrol checks	7,061	4,589	6,681	12,142	15,054	13,398	13,629

**Obj. 4.9** Coordinate with Departmental units and other Federal, State and local agencies to develop assessments of existing and potential boating access sites and maps for the general boating public and annually provide new or enhanced public boating access sites throughout the State.

**Obj 4.10** Support the Maryland State Boat Act Advisory Committee in reviewing and implementing regulations affecting the equipment and operation of vessels in Maryland waters. Ensure that State-owned and State-leased marina facilities remain viable. Oversee the completion of capital projects at these facilities to maximize slip occupancy and public access.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
<sup>1</sup> Potential public access boating sites identified	5	5	5	5	8	5	5
Number of projects provided technical assistance	22	24	25	25	66	65	65
<sup>1</sup> Number of public boating sites enhanced or created	39	23	30	52	49	47	47
Number abandoned vessels removed from State waters	22	19	16	23	26	25	25
Cumulative miles of water trails established in State	695	709	737	745	753	768	783
Number of waterway projects funded annually	42	25	35	59	60	49	50
Amount of funding awarded for waterway projects (\$)	7,431,000	4,740,000	4,000,000	6,000,000	10,500,000	10,500,000	12,500,000
Number of projects incorporating sustainable components	25	6	24	40	39	38	38
Number of dredge projects funded annually	3	1	8	15	14	14	15
Amount of funding awarded for dredge projects (\$)	943,000	97,000	1,575,272	2,949,847	4,279,975	5,659,475	6,000,000
<sup>1</sup> Number of long-term slip leases realized	340	331	300	325	223	250	275
<sup>1</sup> Number of transient slip leases realized	775	823	550	555	575	600	650

# Department of Natural Resources

## Goal 5. Vibrant Communities & Neighborhoods.

**Obj. 5.1** Annually meet Departmental land conservation goals to protect strategic natural resources while providing recreational and economic opportunities.

**Obj. 5.2** Protect an additional 1,000 acres annually with MET conservation easements, and seek to visually inspect (monitor) each property once annually.

<b>Performance Measures</b>	<b>2013 Act.</b>	<b>2014 Act.</b>	<b>2015 Act.</b>	<b>2016 Act.</b>	<b>2017 Act.</b>	<b>2018 Est.</b>	<b>2019 Est.</b>
Program Open Space (POS) acquisition acres approved by the Board of Public Works (BPW)	5,695	4,124	4,425	5,596	2,222	5,300	5,300
Rural Legacy easement/fee simple acres approved by the BPW	1,340	3,114	2,862	3,533	3,778	6,000	7,000
Conservation Reserve Enhancement Program (CREP) permanent easement acres approved by the BPW	184	0	830	259	1,123	500	600
Number of acres protected annually by MET easements	1,370	2,438	763	808	1,465	1,000	1,000
Number of acres of protected lands	8,589	9,676	8,880	10,196	8,588	12,500	13,600
Percent of POS Stateside acquisition acres approved by the BPW located within a Targeted Ecological Area	94%	93%	91%	97%	88%	85%	85%
Percent of all easements monitored and under compliance with easement conditions	100%	100%	100%	100%	100%	100%	100%
Number of MET easements monitored by volunteers	70	191	145	40	53	75	90
Number of MET easements monitored by local land trusts	249	189	137	101	124	230	260

# Department of Natural Resources

**Obj. 5.3** Annually fund more than 100 projects to assist local subdivisions in the planning, acquisition, and/or development of recreation land or open space area.

**Obj. 5.4** Annually, 80 percent of acquisition contracts negotiated by Land Acquisition and Planning (LAP) are below the highest appraised value for acquisitions.

**Obj. 5.5** Work with communities and jurisdictions to conserve existing tree canopy and expand it by 45 acres annually.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Number of local POS projects	112	110	138	131	107	100	100
Number of community parks and playgrounds projects	23	31	32	55	29	23	25
Number of negotiations conducted annually by LAP	30	48	30	26	24	30	32
Percent of approved contracts negotiated by LAP with contract price below the highest appraised value	90%	88%	80%	81%	100%	80%	80%
Acres of trees planted in developed areas	N/A	N/A	100	81	136	134	135
Acres of trees planted in rural areas (non-buffer)	N/A	N/A	326	292	85	100	100
Acres reforested for Forest Conservation Act (FCA) mitigation	265	312	318	759	589	590	590
Acres conserved through FCA long-term protection	2,050	2,280	2,040	4,503	2,729	2,750	2,750
Number of roadside tree permits issued	706	732	1,043	1,190	1,632	1,600	1,600
Acres of practices on Municipal Watersheds	116	130	120	127	230	120	120
Acres of restored forest land (afforestation and reforestation)	N/A	N/A	1,136	1,007	734	1,000	1,000

**Obj. 5.6** Preserve and restore the protective functions of near shore tidal habitats such as marshes, beaches, dunes, and wetlands.

Performance Measures	2013 Act.	2014 Act.	2015 Act.	2016 Act.	2017 Act.	2018 Est.	2019 Est.
Square feet of near shore habitat created or protected	150,000	150,000	150,000	66,000	33,615	154,600	142,000

## NOTES

<sup>1</sup> Data for 2017 is estimated because it is reported on a calendar year basis.

<sup>2</sup> Acreage declines in 2017 due to resolution of errors in State Park acreage data.