



MID-ATLANTIC ENVIRONMENTAL LITERACY STRATEGIES

SUMMARY OVERVIEW OF FEDERAL AND AFFILIATE STRATEGIES

SHANNON SPRAGUE & ANN REGN
CO-CHAIRS, MID-ATLANTIC EDUCATION WORKGROUP

Environmental Literacy Summit

November 3, 2011



Purpose of Session

2

To **INTRODUCE** participants to federal and affiliate strategies

To provide an opportunity to **ASK CLARIFYING QUESTIONS**

To set the **FOUNDATION FOR THIS AFTERNOON'S REVIEW** of the strategy documents





Environmental Literacy Planning in the Region

Chesapeake Bay Program Education Workgroup



Federal Strategy

- To ensure that federal programs and resources are coordinated, informed by state priorities, and fully available to and used by state partners
- Federal agencies in partnership with state DOEs, natural resource agencies, and NAAEE affiliates
- NOAA with EPA, FWS, NPS

Regional Roundtable

- To compare the status of environmental education in each state, identify gaps and create a regional action plan
- State NAAEE affiliates in partnership with state DOEs, natural resource agencies, non-profits, and federal agencies
- PAEE through EPA Region 3

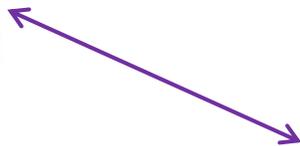
State Literacy Plans

- To provide the framework for school systems to expand and improve their environmental education programs
- State DOEs in partnership with state natural resource agencies, non-profits, and the public
- State governments

Overarching Objective: To ensure that environmental education priorities and programs are coordinated, informed by state priorities, and fully available to and used by partners



Coordinated Approach



4 Main Goal Areas:

- ❖ Education Community
- ❖ Students
- ❖ Educators
- ❖ Schools

Shared Vision (NAAEE Affiliates & Federal Agencies)

Shared Edu Community Goals & Outcomes

Shared Student Goals & Outcomes

Shared Educator Goals & Outcomes

Shared School Goals & Outcomes

Federal Strategies & Commitments	Regional Strategies & Commitments
----------------------------------	-----------------------------------

Federal Strategies & Commitments	Regional Strategies & Commitments
----------------------------------	-----------------------------------

Federal Strategies & Commitments	Regional Strategies & Commitments
----------------------------------	-----------------------------------

Federal Strategies & Commitments	Regional Strategies & Commitments
----------------------------------	-----------------------------------

Shared Edu Community Metric(s)

Shared Student Metric(s)

Shared Educator Metric(s)

Shared School Metric(s)

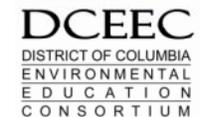


Partnerships Provide a Solid Foundation

5

About       

Executive Order Partners

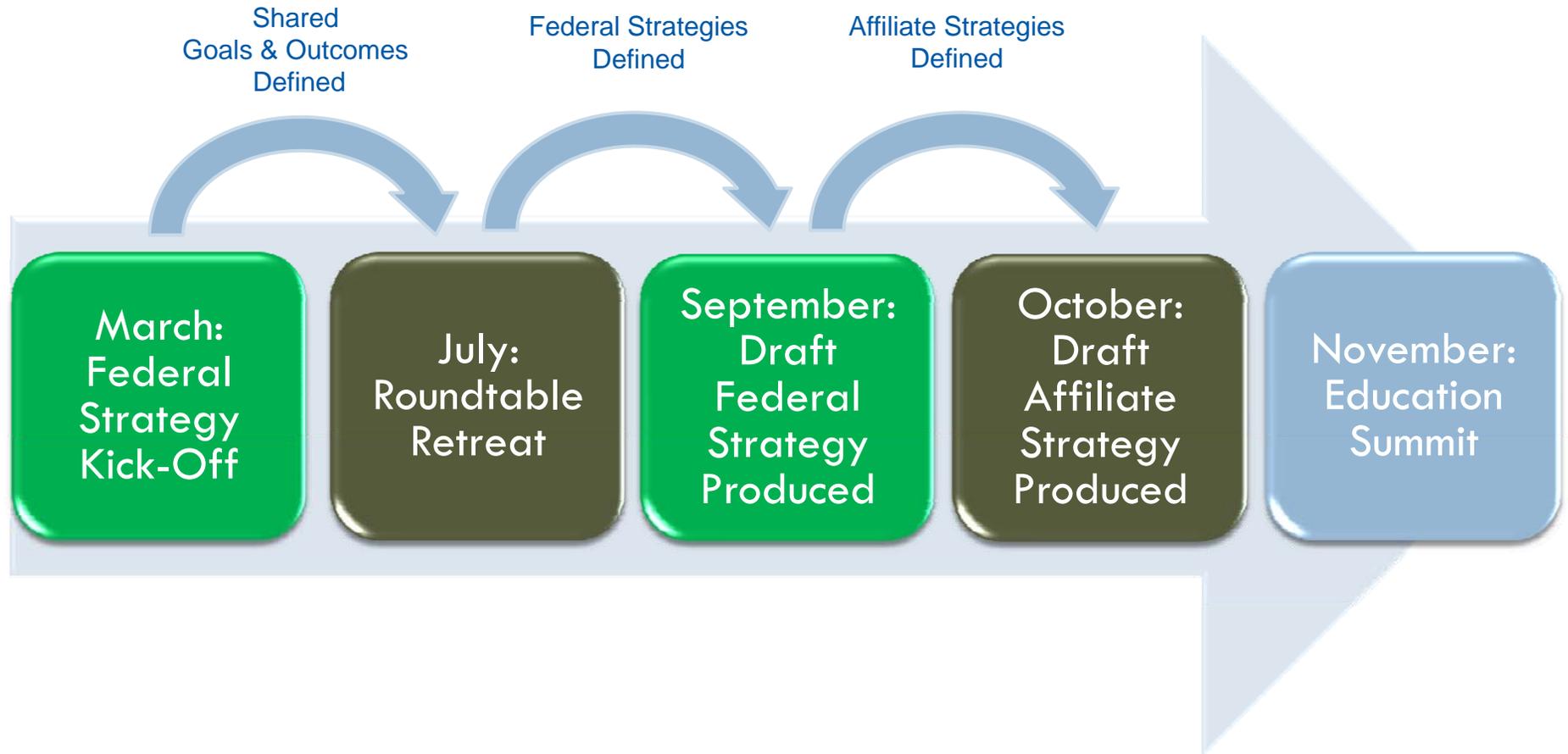


Pennsylvania Association of Environmental Educators





Path to the Summit





Students

GOAL 1: Every student in the region graduates with the knowledge and skills to make informed environmental decisions.





Students

8

Outcome 1.1: States engage students at every grade level in outdoor activities designed to increase environmental literacy

Federal: Increase access to federal funding and resources (including lands and facilities), support network of EE providers, and reduce barriers to outdoor programs

Affiliates: Encourage and identify opportunities for outdoor learning and site visits for school divisions, schools, and educators, and support development of place-based sites and investigation of real issues





Students

9

Outcome 1.2: Students participate in interdisciplinary learning about the key relationships between dynamic earth, energy, and human systems, including STEM content knowledge and thinking skills

Federal: Work with LEAs to increase environmental content; and connect students with authentic science experiences and civic engagement responsibilities/opportunities

Affiliates: Better integrate reading, technology, and social studies in EE, connect students with service learning projects in their community, and increase use of technology to discuss issues with students in distant geographies





Students

10

Outcome 1.3: Students have information about career opportunities and requisite skills for environment-based jobs and the opportunity to participate in programs that prepare them for a future in these careers

Federal: Increase federal agency involvement in school job events; increase opportunities for student opportunities with federal agencies, and provide guidance counselors information about careers and advanced training – with an emphasis on underserved communities

Affiliates: Identify and provide information to guidance counselors on jobs, internships, camps, mentorships, and other opportunities.





Students

11

Outcome 1.4: Students have the opportunity to pursue enrichment programs and experiences that support in depth understanding of environmental issues and solutions

Federal: Encourage and support enrichment programs, student leadership opportunities, and family recreation and other out-of-school opportunities connected to student learning.

Affiliates: Encourage multi-year explorations of environmental issues and student leadership opportunities, including contributing to a calendar of out-of-school youth activities





Educators

12

GOAL 2: All educators in the region responsible for instruction about or in the environment are provided with sustained professional development, tools, and resources that support their role in providing students with high-quality environmental education





Educators

13

Outcome 2.1: Educators have access to high-quality, curriculum-based lesson plans, resources, and information on training opportunities that focus on environmental issues for all grade levels and subjects

Federal: Increase data sets and classroom resources from federal government and federally funded entities are readily available, including via Bay Backpack

Affiliates: Encourage members to align curriculum and lesson plans with learning standards and disseminate professional development and materials via Bay Backpack and state education agencies





Educators

14

Outcome 2.2: Teachers have sustained professional development related to environmental education content, outdoor learning strategies, and pedagogy to promote environmental literacy in their students

Federal: Define, offer incentives, and work with states to establish certification for teacher professional development in EE; Conduct outreach with administrators and connect teachers with STEM professionals

Affiliates: Provide resources and up-to-date information, and ensure current research informs training and certification programs; Identify personnel to provide technical assistance to school division; Ensure availability of trainings on environmental data





Educators

15

Outcome 2.3: Pre-service teachers enter the workforce with knowledge and experience in interdisciplinary environmental education content, outdoor learning strategies, and pedagogy

Federal: Work with colleges to develop EE coursework and training, and with states to include EE as requirement for licensure or certification in elementary, science, and other appropriate fields

Affiliates: Work with colleges to develop EE coursework and training, and involve pre-service teachers in professional development training opportunities





Educators

16

Outcome 2.4: Informal environmental educators in the region understand and can communicate current scientific findings and have knowledge of research-based environmental education best practices

Federal & Affiliates: Provide training and opportunities to conduct research with natural resource personnel, and encourage the adoption of certification requirements for environmental educators; increase collaboration between formal and informal providers.





Educators

17

Outcome 2.5: Federal, state, and local natural resource personnel are actively engaged in environmental education and outreach and have adequate training in instructional techniques and the needs of educational audiences

Federal: Increase the number of government personnel engaged in EE and ensure adequate training for their level of involvement in program delivery

Affiliates: Contribute to an inventory of resource personnel and support federal, state, and local personnel with information, resources, and training





School Grounds and Infrastructure

18

GOAL 3: Every school in the region maintains its buildings, grounds, and operations to support positive environmental and human health outcomes





Schools: Federal Outcomes

19

Outcome 3.1: School buildings, grounds, and operations are models of sustainability for the community, making continual progress towards net-zero environmental impacts, including carbon, solid waste, wildlife habitat, and hazardous waste and learning about the environment

Federal: Promote facility mgmt plans that focus on greenhouse gas and waste reduction, water quality and conservation, alternative transportation, and installation of habitats.

Affiliates: Identify organizations to partner with schools and on public education campaigns, and support best mgmt practices that encourage student responsibility for the environment





Schools

20

Outcome 3.2: The school environment has a positive effect on the health of students, staff, and the surrounding community

Federal: Support the development of school environmental health plans, including focus on indoor environment, outdoor spaces for mixed use, and healthy food options

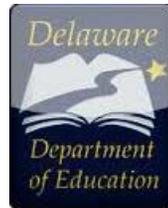
Affiliates: Identify local partners and stakeholders, and include green school concepts in professional development and conferences





Education Community

GOAL 4: The education community in the region functions in a unified manner and coordinates with key national, regional, and state programs to represent the full suite of information and opportunities available for PK-12 audiences





Education Community

22

Outcome 4.1: States in the mid-Atlantic establish and implement a robust plan for ensuring that all students graduate environmentally literate

Federal: Support development and implementation of ELPs and EE programming that includes administrative priorities (including next generation science standards), including increased support by state and local administrators for outdoor, inquiry-based and service learning

Affiliates: Work with partners on metrics development, including sharing local examples





Edu Community

23

Outcome 4.2: Education programs are developed and refined using the best available research on the effectiveness of environmental education, and support continued research in this field

Federal: Support the development and use of best and research-based practices, including providing funding focus on programs using best practices

Affiliates: Encourage the liaison between researchers and projects to ensure actual case studies are used in evaluation research





Edu Community

24

Outcome 4.3: Federal, state, and nongovernmental organizations with PK-12 programs actively communicate to increase collaboration related to environmental literacy planning and implementation

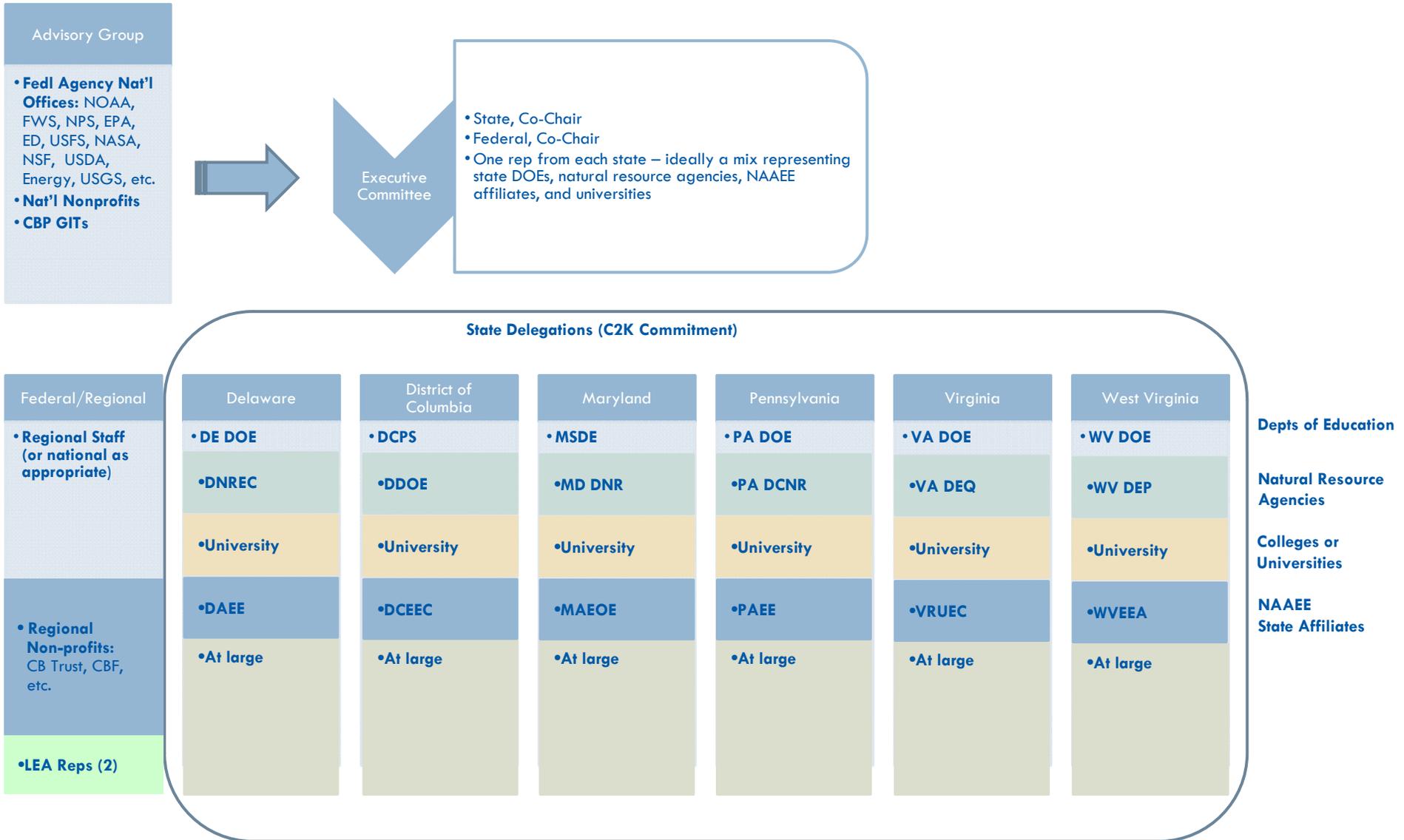
Federal: Maintain an Education Workgroup to better coordinate programs and funding, connect with other citizen stewardship activities, and non-traditional partners

Affiliates: Meet annually to coordinate activities and participate in communications forum to share ideas specific to affiliates, act as hub for engagement of non-formal EE providers and engage community partners not traditionally engaged in EE





Education Workgroup Structure (proposed)





26

Contact Information for Education Workgroup

Shannon Sprague
Environmental Literacy Manager
NOAA Chesapeake Bay Office
410-267-5664
Shannon.Sprague@noaa.gov

Ann Regn
Director
Virginia Office of EE
804-698-4442
Ann.Regn@deq.virginia.gov