From Drops to Diversity: Accounting for Biodiversity Benefits in Corporate Water Stewardship

Side Event at Stockholm World Water Week 2025

August 26, 2025

PACIFIC INSTITUTE

UN GLOBAL COMPACT CEO WATER MANDATE

LimnoTech

The Nature Conservancy

Second Nature ECOLOGY + DESIGN

SESSION CONVENERS

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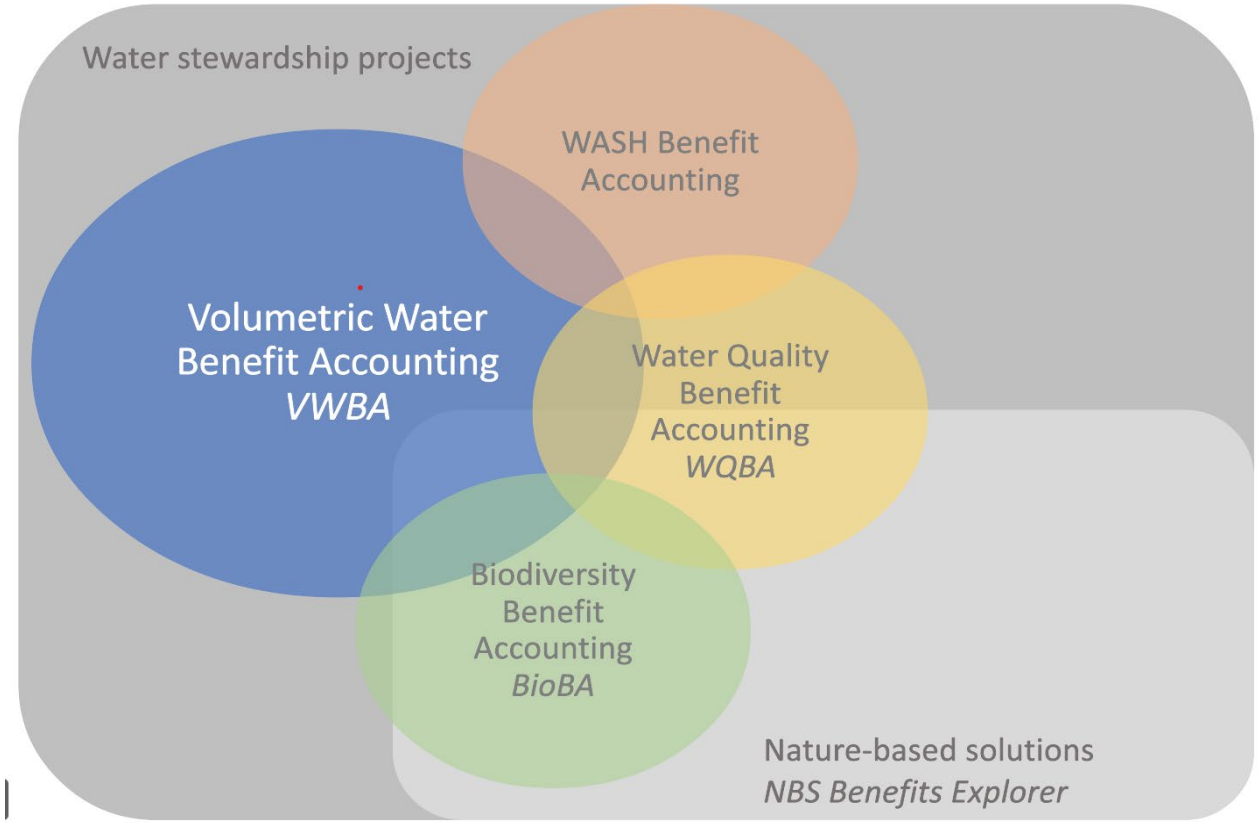
AGENDA

- Overview of BioBA
- Audience Engagement
- Panel Discussion
- Audience Q&A
- Closing

Why Biodiversity Benefit Accounting (BioBA)?

- As corporations embrace water stewardship, there are opportunities to **recognize multi-benefits** and synergize water and biodiversity efforts
- Water and biodiversity are closely linked, but little guidance currently exists for **how corporations should account for biodiversity-related benefits** of their water stewardship projects.
- BioBA responds to the growing need for **credible and transparent quantification** of the biodiversity benefits
- BioBA **aligns** with broader global biodiversity accounting initiatives (NPI, Align Project) and complements previously developed quantification guidance (VWBA, WQBA, NBS Benefits Explorer)



Biodiversity Benefit Accounting (BIOBA)

- Guidance for corporate water stewardship practitioners to evaluate the **terrestrial and aquatic biodiversity multi-benefits** associated with water-related projects

https://ceowatermandate.org/biodiversity

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PRIMARY OBJECTIVES OF BIOBA

- Provide businesses and project partners investing in corporate water stewardship (CWS) with clear guidance on how to:
  - **Incorporate biodiversity objectives** into CWS strategies and projects
  - **Select appropriate methods and metrics** with which to evaluate the biodiversity benefits of CWS projects
  - **Communicate the biodiversity benefits** of CWS project implementation in scientifically defensible language for internal and/or public communications

BioBA Impact Pathway for Water Stewardship Activities

Shared Water and Biodiversity Challenge

INPUTS	ACTIVITIES	OUTPUTS	OUTCOMES	IMPACTS
Define biodiversity objectives Define pre-project baseline conditions	**Investment in water stewardship**	**Water stewardship activity with biodiversity-related interventions**	Tangible changes in the conditions presumed favorable for biodiversity directly related to project implementation	Explicitly characterized direct or indirect change in biodiversity indicators resulting from project implementation	Indirect benefits related to short or long-term environmental, social, and economic value creation

Focus of BioBA Guidance

Entry Points for BioBA Application

Output-Level Project

1. Biodiversity is a secondary corporate water stewardship consideration.
2. Follows existing VWBA guidance, tracking activities that capture output measures related to biodiversity.
3. Indicators are discrete, numeric output measures: area, trees planted, stream length, etc.
4. Evidence is shorter term, presumptive.

Outcome-Level Project

1. Biodiversity is a co-driver of the project. Strong alignment with corporate values beyond water.
2. Builds on VWBA guidance, but incorporates more complex biodiversity indicators toward outcomes.
3. Indicators are contextually-derived based on biodiversity objective.
4. Evidence is longer term, demonstrative.

7-STEP BioBA PROCESS

1	2	3	4	5	6	7
IDENTIFY	**DEFINE**	**PLAN**	**IMPLEMENT**	**QUANTIFY**	**EVALUATE**	**COMMUNICATE**
Identify projects with potential biodiversity benefits	Work with ecology experts and stakeholders to define biodiversity objectives	Develop a project plan aligned with the biodiversity objectives	Implement project activities and collect data	Quantify outputs from activity implementation	Evaluate outco mes from activity implementation	Communicate biodiversity benefits

Identify Project and Define Objectives
Hypothetical Case Study – Wetland Restoration

1 **IDENTIFY**

Identify projects with potential reportable biodiversity co-benefits

2 **DEFINE**

Work with local ecology experts to define biodiversity objectives

- 8-acre wetland near Bay Area of CA
- Area was once part of the southern end of a ~1,000-acre seasonal wetland disrupted in 1916, currently under restoration
- Old culvert allows water to enter creek, regulates wetland extent
- Mix of riparian, woodland and wetland species, including invasive plants, debris, and trash

Project Objectives: Enhance and restore important habitats under threat

In **five years** achieve the following **outputs**:

- Increase permanently inundated wetland and depth of ponding to 3.5 ft. Remove 100% anthropogenic debris and invasive species. Plant 5 ac. of native wetland plants and 3,000 ft. of riparian shrubs. Install 4,000 ft of exclusionary fencing.

In **seven years** achieve the following **outcomes**:

- Increase extent of established, native plant species-dominated wetland ecosystem within the project site from 3 ac. to 7 ac.
- Improve wetland ecosystem condition: Increase plant height and density of native wetland vegetation, improve wetland plant species composition, increase function as effective habitat for Yellow-breasted Chats and Yellow Warblers.

Develop Project Plan and Implement Activities

- Remove debris and trash
- Install fence to exclude livestock degrading wetland
- Modify existing culvert to increase depth and extent of ponding and saturation, expanding the wetland and areas providing high freshwater marsh functions and values.
- Expand wetted perimeter into areas dominated by nonnative invasive plants (stinkwort) that do not survive in saturated conditions
- Invasive plants removal

3

DESIGN

Develop a project plan aligned with the biodiversity objectives

4

IMPLEMENT

Implement project activities and collect data

All smiles from volunteers after removing stinkwort

Site visit with biologists and hydrologists

Volunteers working to remove stinkwort

Load 1 of 2 of old fence & wire taken to the dump

Weir gate installed as part of culvert upgrade – wetland area retains water after a storm [Dec. 2023]

Estimate outputs from activity implementation

5

ESTIMATE

Estimate outputs from activity implementation

- Outputs are **tangible, direct changes associated with project implementation** that improve the conditions (quality or quantity) presumed to be favorable for biodiversity.
- Four potential output categories are relevant to CWS activities: length, area, count, and weight

Output	Example	Potential method for measurement
Count	Number of invasive plants/species removed; number of native trees planted; number of barriers removed	Direct count from humans in field; estimated count from photo quadrats.
Length	Wetted area created - 5 acres (20,234 m2) of permanently wetted wetland.	Direct measurement using a measuring tape or measuring wheel; Indirect measurement using secondary or geospatial data
	Depth of inundation - 3 ft (0.9 m) of additional water depth created in the deepest sections of the wetland area.	
Area	Area treated or managed; area planted, seeded, or revegetated; area protected or conserved; area inundated	Direct measurement using a measuring tape or measuring wheel to calculate area using geometric formulas; Direct measurement by traversing project perimeter utilizing a GPS-enabled device to record project boundaries and estimate the project area
Weight	Weight of trash removed - 200 lbs (90.7 kg) of trash was removed	Direct weight using a calibrated scale, or weigh in separate loads and sum the total of each load
	Weight of invasive species removed	

Evaluate biodiversity-related outcomes as appropriate

6

EVALUATE

Evaluate biodiversity-related outcomes as appropriate

Outcome	Summary	Example of metric	Example methodology
Ecosystem extent	Spatial area or geographic boundaries wherein which an ecosystem exists.	Increase in the spatial extent (acreage) of established upland meadow pollinator habitat over time	Define ecosystem classification, select metric like land area, utilize GIS tools, ground-truth data (Guidance to provide more detail)
Ecosystem condition	State or health of an ecosystem, including its structure, function, and composition.	Increase in the canopy volume and structural complexity within forest habitat over time	Fragmentation indices
Species	The flora and fauna within a given ecosystem and their overall health and viability.	Increase in priority species abundance over timer	Species Threat Abatement and Restoration (STAR) metric

Outcome-level benefit categories align with the Align project and the Nature Positive Initiative's (NPI) emerging framework

Communicate biodiversity benefits

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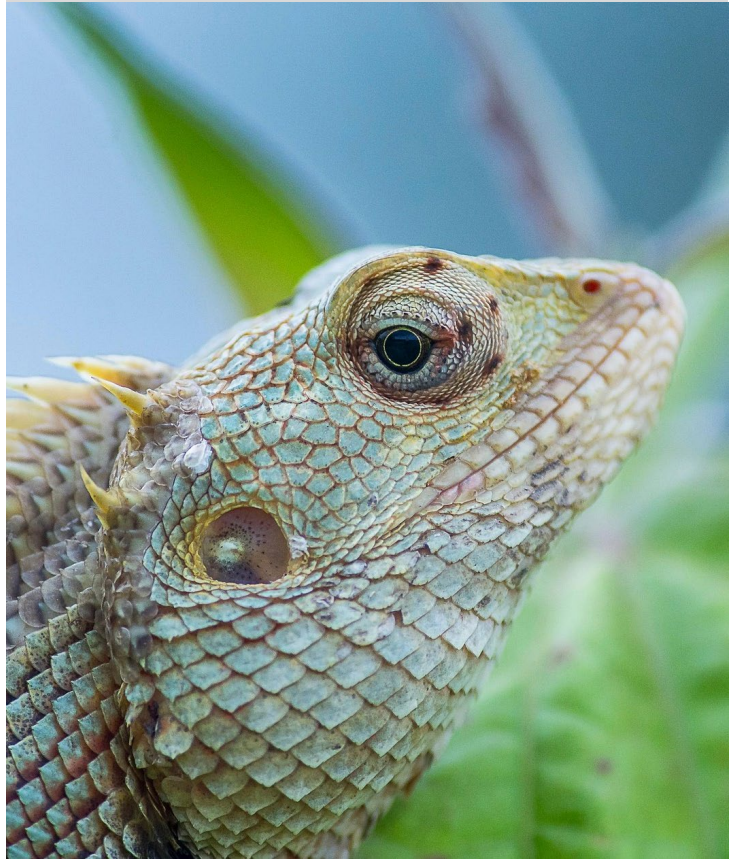
COMMUNICATE

Communicate biodiversity benefits

- Communicating biodiversity benefits requires additional nuance and caution
- Key differences between claims and reporting
- How to communicate activities implemented and associated outputs and outcomes
- How to communicate outputs or outcomes over time

VALUE ADD OF BIOBA

- Guidance is applicable for both water stewardship and biodiversity projects – anticipate water stewardship as primary use case
- Provides 7-step methodology aligned with existing global guidance (e.g., NPI, Align)
- Unlike VWBA and WQBA, BioBA pushes to outcome level where applicable
- Illustrates application of methods through case studies
- Links to key resources for credible monitoring and reporting of biodiversity benefits



Audience Participation

QUACK COUNT 1

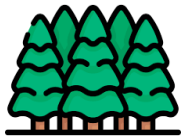
Where are you in your biodiversity journey?

Mentimeter.com
Code:7644 9958

- **Seed**: Haven’t started but willing to learn more – that's why I’m in this room

- **Seedling**: Just starting out and finding my feet

- **Sapling**: We have some momentum but looking to go even further



- **Forest**: We’re pretty advanced in our biodiversity work and look forward to scaling

QUACK COUNT 2

- *What is your favourite biodiversity "beauty"?*

Mentimeter.com
Code:7644 9958

Blobfish

Scrotum frog

Marabou stork

Elephant seal

THE UGLY ANIMAL PRESERVATION SOCIETY

Panel Discussion

Ben Wilinsky
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Arbor Day Foundation™

Lauren Maul
Director of Corporate Sustainability

DUCKS UNLIMITED

Paulina Concha Larrauri
Senior Program Manager, Water Positive

Microsoft

Andre Fourie
Global VP: Sustainability

ABInBev

QUESTIONS?

QUACK COUNT 3

Where are you planning on addressing biodiversity?

Where can you apply BioBA?

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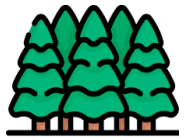
Forests


Mangroves


Wetlands


Grasslands


Urban


Agricultural areas


Rivers, lakes or ponds


Other

LOOKING AHEAD

- Draft 1 revisions underway
- Pilot case study implementation
- Anticipated publication end of 2025

Contact Us for More Information!

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