

Briefing on Region III Response to EFAB Report,  
“Illustrative Private Equity Capital Model: Chesapeake Bay Water Quality Project”

### Background

In April 2017, the Environmental Finance Advisory Board (EFAB) invited EPA offices to submit ideas for projects requiring the Board’s finance expertise. EPA Chesapeake Bay Program Office staff and Budget & Finance Workgroup members crafted a proposed charge based on two action items in [The Path Forward report](#)<sup>1</sup>, a Chesapeake Bay Program response to the Chesapeake Bay Environmental Finance Symposium [Recommendations and Final Report](#)<sup>2</sup>. The proposed charge had the approval and support of then Acting Regional Administrator, Cecil Rodrigues. EPA Chesapeake Bay Program Office staff and Budget & Finance Workgroup members presented the proposed charge to EFAB in August 2017. The proposed project “Identify Finance Metrics of Success” contained the following three areas for exploration:

1. How does one measure the financial success or failure of individual restoration projects? How should this information inform the overall restoration effort?
2. How does one ensure the decisions being made are yielding desired financial results in terms of watershed-wide water quality restoration efforts?
3. Have restoration efforts translated to increasing economic benefits derived from the natural environment, i.e. ecosystem services?

**The EFAB report deviates from this charge** – more detail is available below.

### EFAB Report and Model

#### Overview

EFAB’s work product includes a report that describes the structure of a private equity fund to finance projects that generate credits available for purchase. Communities that benefit would purchase such credits to “meet their legal requirements” more cheaply than continuing to implement Best Management Practices (BMPs) on their own.

The report describes different structure options and inputs, illustrated in the model, that can impact the attractiveness of an investment opportunity. The “primary financial metric for private capital” is the expected Internal Rate of Return (IRR). The amount of risk associated with projects, and the degree to which that risk can be mitigated, is also a factor. The report discusses risks associated with the demand for a product, project execution, possibilities for mitigation, and the existence of a “clear and defined exit strategy.”

The model associated with the report is designed to “provide insight into how an investor organizes an opportunity and structures the transaction.” The spreadsheet summarizes project indicators and inputs

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<sup>1</sup> [The Path Forward report](#), published in May 2017, was a Chesapeake Bay Program response to the Chesapeake Bay Environmental Finance Symposium. This report outlines a “path forward” or schedule for actions needed to address the Symposium’s recommendations.

<sup>2</sup> The Environmental Finance Center (EFC) at the University of Maryland, in collaboration with the EPA Chesapeake Bay Program (CBP), convened the Chesapeake Bay Environmental Finance Symposium in April 2016. This event was catalyzed by Chesapeake Executive Council Resolution 2015-2, which charged CBP with bringing together a symposium to identify innovative approaches to leverage or incentivize private investment in Bay restoration and protection efforts. Their [Recommendations and Final Report](#) was published in August 2016 and includes key findings and core recommendations based on the symposium.

based on sample projects representing specific BMPs (e.g., Urban Tree Planting). The model helps to identify the costs and risk points for an investment, but the report is clear that the model is not designed as a decision tool to determine whether a project or set of projects would be worth pursuing.

### Comparison to the Original Charge

The content in the report seems to differ from the original charge. The report begins by summarizing the Chesapeake Bay Program's request that EFAB "help clarify the requirements of private equity capital providers to improve access to private equity capital ...." That summary of the request seems to focus on the metrics that potential investors care about, while the original charge considered metrics of success that the Program could use to determine whether it was attracting more of that private equity capital, at both the project and Program levels. It is possible that in considering the original charge, EFAB determined that the design of projects with the requirements of private equity capital providers in mind was a prerequisite for designing metrics to demonstrate the success in bringing in private equity capital.

### Application to Chesapeake Bay Program Partnership Work

Even though the report deviated from the original charge, the report and its associated model can still be informative for the Chesapeake Bay Program. The proposed application of this report includes involving two groups: the Budget & Finance workgroup under the Enhance Partnership, Leadership and Management Goal Implementation Team of the Chesapeake Bay Program, and the Conowingo Watershed Implementation Plan (WIP) Steering Committee.

The Chesapeake Bay Program's Budget & Finance workgroup serves as a focal point for coordination related to an overall program finance system. Potential areas for exploration with the Budget & Finance workgroup include:

- Compare this report with recommendations from the Chesapeake Bay Environmental Finance Symposium [Recommendations and Final Report](#) (August 2016) and [The Path Forward report](#) (May 2017)
- Examine components of fund structure to determine what already exists
- Investigate model inputs and determine availability of that information
- Consider reduction of identified risk factors
- Consider availability of information needed to calculate the internal rate of return (IRR) for a project or collective suite of projects

The structure and model discussed in this report could be informative for the Conowingo Watershed Implementation Plan (WIP) Steering Committee, which will oversee the entity that develops the finance strategy for the WIP. That project can apply this work in the following ways:

- Use the report framework and model to structure a financing strategy for Conowingo, and consider lessons learned as part of that work
- Identify best management practices (BMPs) expected to have the greatest initial impact and that could generate credits quickly, thus giving the best internal rate of return
- Define an exit strategy for equity investors, given the requirement to verify the continued optimal operation of best management practices beyond initial implementation