



# NPDES Phase I Large MS4 Next Generation Permit Discussion

April 3, 2019

# Agenda

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- ▶ Summary of January 29, 2019 Meeting
  - ▶ Restoration Metrics
  - ▶ Determining MEP
  - ▶ Schedule for Tentative Determination Permit
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# Meeting Minutes

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- ▶ January 29, 2019 Meeting Minutes
    - ▶ Distribute prior to April 3, 2019 Meeting for review
    - ▶ Request additional comments/additions from local program administrators
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# New MS4 Permit to Incorporate Three Metrics

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1. Impervious Acre Metric = Stormwater Management
  2. Chesapeake Bay Metric = Total Nitrogen (TN)
  3. Local Water Quality Metric = Total Suspended Solids (TSS), or other locally proposed metric
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# Accounting Principles

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1. Impervious Acres = BMPs from Chapters 3 & 5 of Maryland's Stormwater Management Manual
    - Drainage area, impervious acres
    - One inch of runoff as WQ criteria
  2. Chesapeake Bay = TN from Chesapeake Bay Program approved efficiencies
  3. Local WQ Concerns = TSS, no Bay delivery ratios; other local proposed metrics
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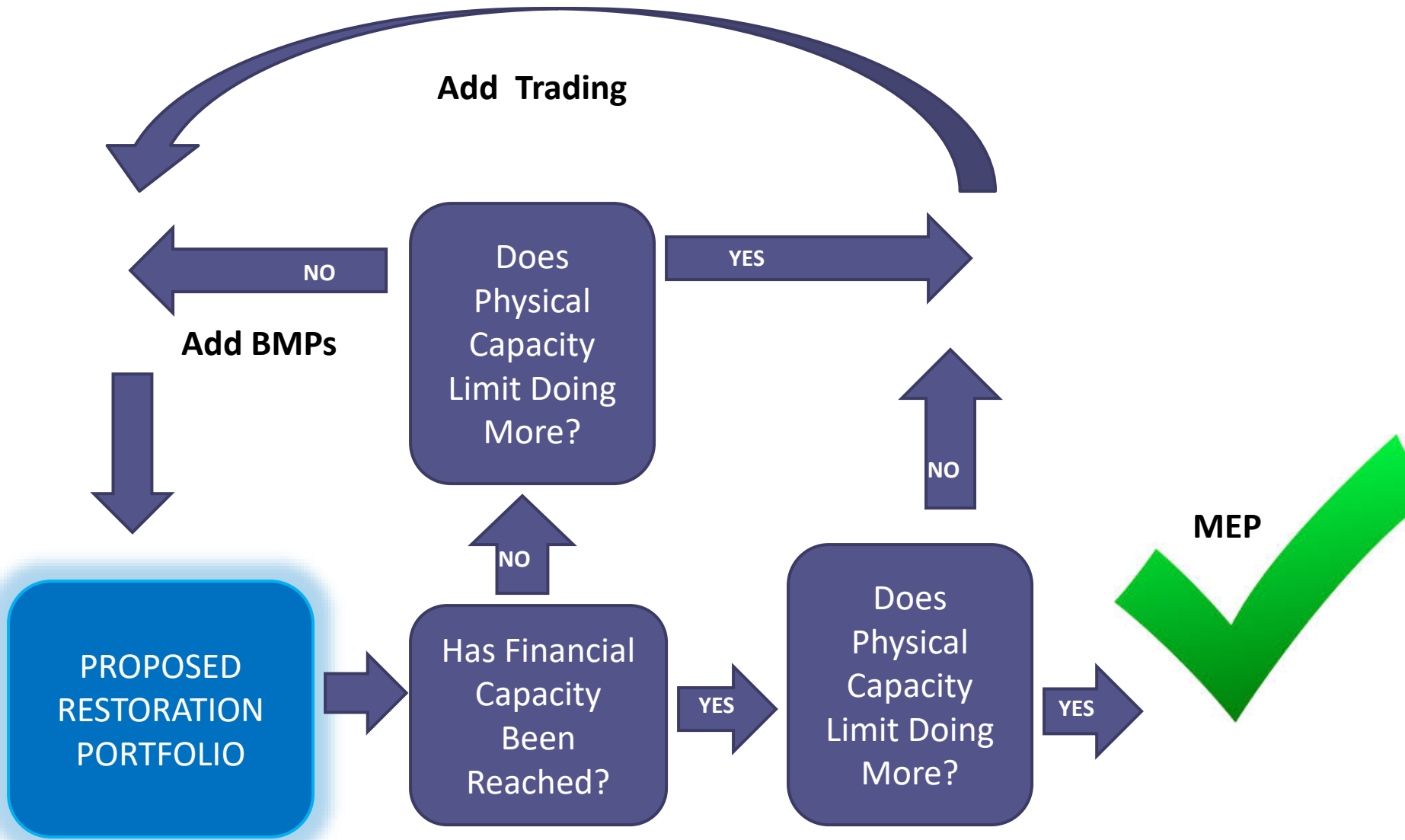
# Determining MEP



# Determining MEP

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- ▶ Proposed Restoration Portfolio
  - +
  - ▶ Financial Capacity
  - +
  - ▶ Physical Capacity = Questionnaire + Justification
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MEP Analysis

Project Portfolio



# Proposed Restoration Portfolio

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- ▶ Complete the spreadsheet for restoration projects to be planned, designed, and/or constructed from 2020 through 2027.
  - ▶ Include projects that will be in the planning or design phase but will not be completed until after 2025.
  - ▶ [Restoration Projects 2020-2027.xlsx](#)
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# MEP Analysis

Physical Capacity



# Physical Capacity

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Physical Capacity = Portfolio Schedule +  
Questionnaire + Justification

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# Physical Capacity Questionnaire

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- ▶ Project Scheduling
- ▶ Budget Approval Limitations
- ▶ Procurement Limitations
- ▶ Contractor Availability Limitations
- ▶ Permitting Limitations
- ▶ Project Complexity



# Overall Project Scheduling

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- ▶ What is the typical implementation time frame (from planning through construction) for a restoration project?







# Budget Approval Limitations

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- ▶ What is the time to authorize CIP budgets for project planning through construction?
- ▶ Can you combine phases or do you have to get CIP approval for each phase consecutively?





# Procurement Limitations

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- ▶ Provide the average time to procure professional planning, design, and construction services.
  - ▶ Is procurement done in phases - planning, design, construction?
  - ▶ How would a pay for performance type of contract or a design-build-operation-maintenance contract affect these time frames?
  - ▶ Provide information on innovative contracting.
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# Contractor Availability Limitations

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- ▶ Provide the number of RFPs for BMP construction and BMP design advertised during the past 5 years.
- ▶ How many bids were submitted for each RFP and how many required re-advertising?
- ▶ Was there a trend over the permit term in the number of bid submittals received?
- ▶ How many unique companies provided bids for all RFPs?



# Contractor Availability Limitations

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- ▶ Provide information on contracting limitations that result in longer project implementation times.
- ▶ Examples: WBE or MBE





# Permitting Limitations

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- ▶ What is a typical time frame to obtain permits (local, State, federal)
  - ▶ How does permitting time affect overall project implementation?
  - ▶ How can these time frames be reduced to help get these projects out the door faster?
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# Project Complexity

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- ▶ What type of a project do you consider as “low-hanging fruit”?
  - ▶ What is your remaining capacity of available “low-hanging fruit” projects?
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## Other Information

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- ▶ Provide a copy of your 5 year CIP for restoration projects (2020-2027)
  - ▶ Provide a copy of your operating budget for annual restoration projects (FY2020)
  - ▶ Provide a copy of your operating and maintenance budget for all BMPs implemented under the MS4 permit? (FY2020)
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# Permit Schedule

# June 30, 2019

Milestone	Date
Accounting Principles	April 12th
Develop MEP Application	
• Financial Capacity	April 30th
• Physical Capacity Questionnaire	April 12th
MEP Submittal and Portfolio	May 15 <sup>th</sup> – May 30th
Determine MEP	May 30 <sup>th</sup> - June 10th
Submit First Year Project Portfolio	June 10th
MS4 Guidance	June 30th
Tentative Determination	June 30th





# Permit Restoration Requirements



# Permit Restoration Requirement

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- ▶ First Year Restoration Project Portfolio
  - +
  - ▶ Impervious Surface Restoration Requirement
  - +
  - ▶ TN Load Reduction Requirement
  - +
  - ▶ Local Water Quality Requirement
  - +
  - ▶ Milestone Schedule for remaining 4 Years
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## GATHER DATA

Review MEP Portfolio  
Review 2019-2027 CIP  
Review Operating Budget  
for 2020-2025

## DETERMINE PROPOSED LEVELS OF ISR, TN REDUCTION, OTHER PROPOSED POLLUTANT REDUCTION

Subtract ISR equivalent achieved through trading in previous permit from Total ISR level achieved at end of this 5 year plan. Remainder is proposed ISR for this permit term.

ISR for 5 year permit term

Determine level of TN achieved by annual practices implemented in year 5

Determine level of reduction of TN addressed by other alternative BMPs

Convert structural BMPs proposed to meet ISR to a TN reduction credit. Add the proposed TN reduction credit from alternative and annual TN BMPs.

TN reduction for 5 year permit term

Determine level of reduction of other pollutants addressed by other alternative BMPs

Other pollutant reduction level for 5 year permit term

# Evaluation of Restoration Portfolio



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- ▶ At a minimum, Water Quality Trades from previous permit must be replaced with BMPs (annual or capital). Is level of trading implemented at the end of previous permit maintained each year and replaced completely by the end of the 5 year term?
  - ▶ At a minimum, the level of annual practice implementation must be maintained each year until replaced with trading or permanent practices. Are annual practices maintained each year and/or replaced by the end of the 5 year term?
  - ▶ What is total level of impervious acres proposed to be restored (ISR)? What percent of baseline impervious surface is proposed to be restored? By structural BMPs only? How does this compare to 10% vs. 20%? How does this compare to level of ISR achieved by the end of the previous permit? Is it similar or at least ½ of the level achieved by the previous permit?
  - ▶ Are all annual practices in the operating budget?
  - ▶ What other credits are proposed to be achieved? (TN, TSS, other)
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# Evaluation of Restoration Portfolio

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- ▶ Evaluate the other permanent structures and annual practices that are addressing other pollutants. Do these BMPs address a local TMDL? Are these BMPs in a local TMDL implementation plan?
  - ▶ What is the total level of TN reduction proposed? Does the total equal the proposed TN reduction in the WIP? How does the level of proposed TN reduction compare to that achieved in the previous permit?
  - ▶ Is there a balance of upland BMPs, in stream BMPs and alternative annual BMPs?
  - ▶ How much TN reduction and ISR is proposed through trading? Is this greater than  $\frac{1}{2}$  of the total TN reduction or ISR?
  - ▶ How does the proposed restoration portfolio compare to the previous permit work effort?
  - ▶ Does the work proposed in years 1 and 2 align with the 5 year CIP from previous years?
  - ▶ Does the overall portfolio represent a reasonable pace to achieve the 5 year goal?
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