The Upcoming RDA Permit in the Charles, Mystic and Neponset River Watersheds

A Discussion With The Association of Independent Colleges & Universities and Healthcare Without Harm

April 1, 2024

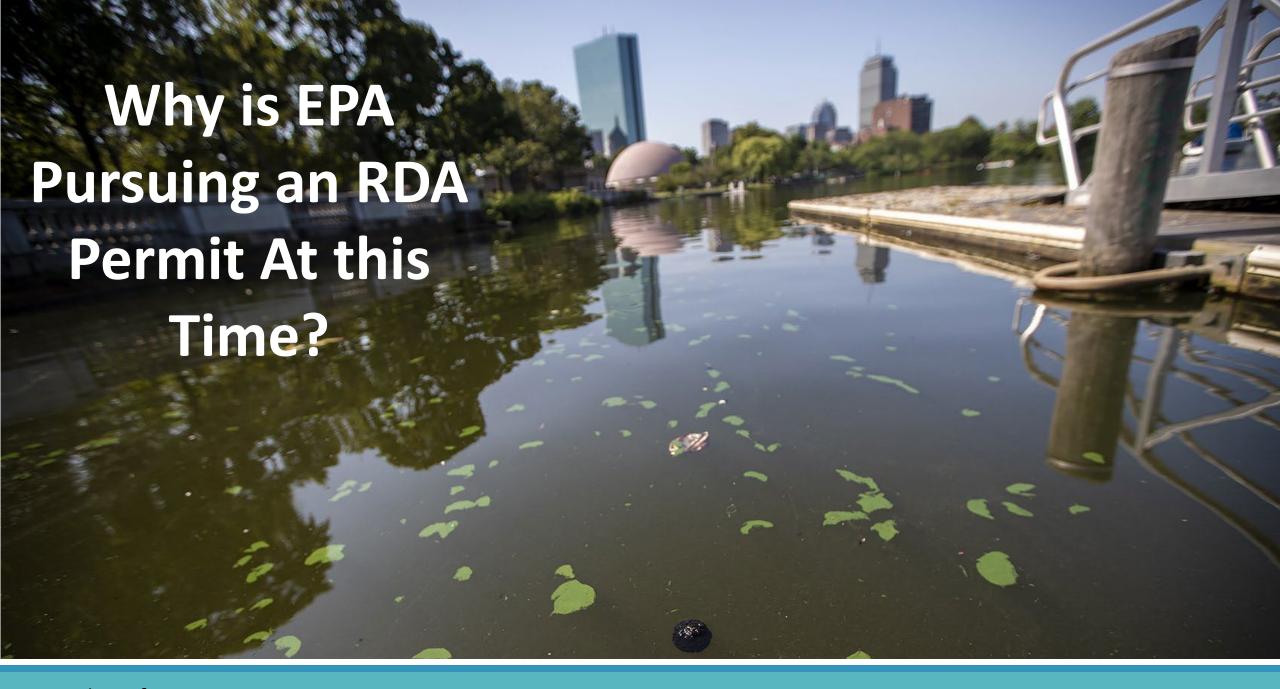
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Questions We Will Address

Note: The numbers, graphics, and technical conclusions throughout this presentation are pre-decisional, subject to change, and may be different than the final calculations relied upon in the draft and final permits. EPA will publish the availability of the draft RDA permit and RDA determination in the Federal Register for public comment and will consider all significant public comments.

- 1. Why is EPA Pursuing RDA permitting at this Time? What are its benefits and to whom?
- 2. Questions relevant to those receiving permits
- 3. Current RDA petition, permitting process and stakeholder outreach
- 4. Technical basis for this permit
- 5. Types of stormwater management controls
- 6. Permit implementation issues is EPA seeking additional feedback on





(Co) Benefits of RDA Permitting

Businesses on County Street in Attleboro, Mass. closed due to flooding from heavy rain Tuesday, Sept. 12, 2023.

(Mark Stockwell/The Sun Chronicle via AP)



We Know You Have Questions

Questions We Hope to Discuss With You Later Today and Beyond

1. Permit Administration

2. Stormwater Controls

3. Funding Mechanisms

4. Available Resources

Clean Water Act 402(p)

Defines specific sources that must be authorized by an "NPDES" permit, but also recognizes that other sources may need to be regulated.

Allows for regulation of "other sources"

Referred to as "Residual Designation Authority," or simply, "RDA."

RDA Authority Can Be Used to Require NPDES permits when:

- * the discharges contribute to a violation of water quality standards,
- * are a significant contributor of pollutant to federally protected surface waters, or
- * controls are needed for the discharge based on wasteload allocations that are part of "total maximum daily loads" (TMDLs) that address the pollutant(s) of concern.

What is RDA?

Petitions Request that EPA Exercise its Residual Designation Authority (2019 Charles, 2020 Mystic, Neponset)

Petitioners: The Conservation Law Foundation and Charles River Watershed Association.

Request: That all commercial, industrial, and institutional (collectively "CII") properties 1 acre or greater and large Multi-Family (M) parcels (five or more housing units) in the Charles, Mystic, Neponset receive NPDES permits (an "RDA permit").

Preliminary Determination (September 2022)

EPA designates all CII parcels (but not multi-family units) with 1 acre or more of Impervious Cover* ("IC") in the Charles, Mystic and Neponset Watersheds.

Develop Permitting Framework & Issue Draft Permit

(Goal: September 2024)

EPA is moving forward with the development of a permitting framework and outreach strategy.

RDA Process

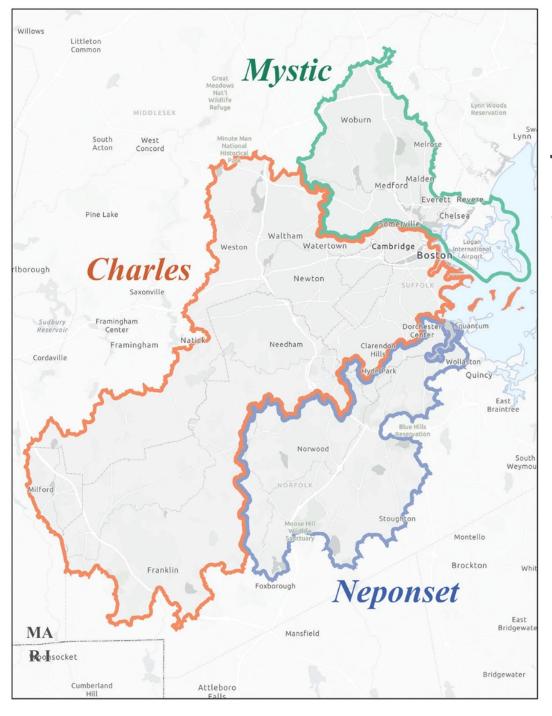
^{*}Impervious Cover - any surface that prevents or significantly impedes the infiltration of water into the underlying soil. This can include but is not limited to: roads, driveways, parking areas and other areas created using nonporous material; buildings, rooftops, structures, artificial turf and compacted gravel or soil

RDA Permitting Timeline

Draft RDA Permit Target – Fall 2024

Public Comment Period (at least 30 days 40 CFR § 124.10(b))

Final Permit Issued with a Response to the Public Comments



Stakeholder Outreach Timeline

WINTER

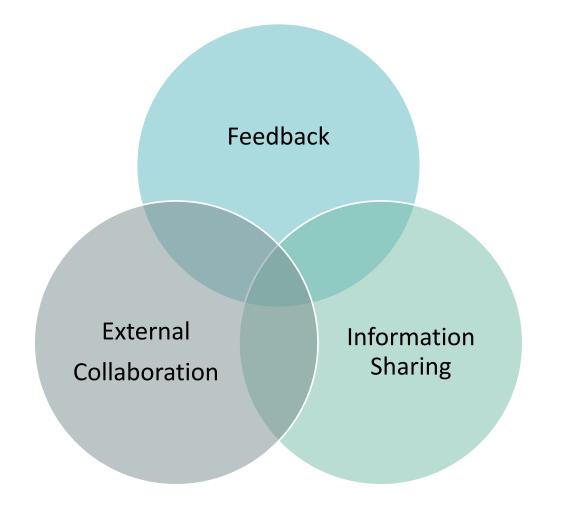
✓ Re-engage stakeholders across all three watersheds

SPRING

- Seek feedback on permit implementation
- Information sharing with stakeholders

SUMMER

Refine options for permit framework



Seek Feedback on Permit Implementation Challenges and Strategies

Facilitate Information-Sharing between stakeholders and EPA

Foster External Collaborations
With Municipalities/Watershed
Groups/Others

Goals of Stakeholder Outreach

Stakeholder Input

Seeking Feedback On:



Permit administration?

Role of municipalities

Tracking and accounting

Compliance/enforcement

BMP implementation?

Siting challenges

Timing for BMP implementation

Who to target?

Large landowners/Permit phasing

Multiple regulations?

MS4/RDA overlaps

Inconsistency of local, state, and federal requirements

Funding?

Impact to Stormwater Utilities

Public private partnerships

Communities with Environmental Justice Concerns

Climate/Resilience Planning



Not Seeking Feedback on:

- * Whether EPA should go forward with exercise of residual designation
- * Legally/technically-required permitting provisions
- * Parcel thresholds or pollution reduction targets
- * Any consensus position by any group or group of individuals

Resources

Feedback

Questions

More Information:

https://www.epa.gov/npdes-permits/watershed-based-residual-designation-actions-new-england

RDA Petitions for Charles, Mystic and Neponset River Watersheds

EPA's Initial RDA Designation

Monthly RDA Updates

Parcel-level analyses for all three watersheds

Tools and Informational Fact Sheets

Stakeholder Events/Upcoming Focus Groups

Check the website for more information on upcoming events.

Feedback and Questions:

Do you have any feedback on permit implementation challenges or ideas for solutions to those permit challenges?

Email us: R1.RDA@epa.gov

Improvements in Pollution Control

1970s to now

99% of CSO and illicit discharges reduced

2000s to now

90% Phosphorus from WWTPs reduced

2016 MS4

Municipal Stormwater Programs manage stormwater from the entire municipality and are responsible for all required load reductions

RDA

Private CII land uses cover 14-18% of the area in the three watersheds. An RDA program will distribute stormwater management responsibilities among municipalities and designated private sources

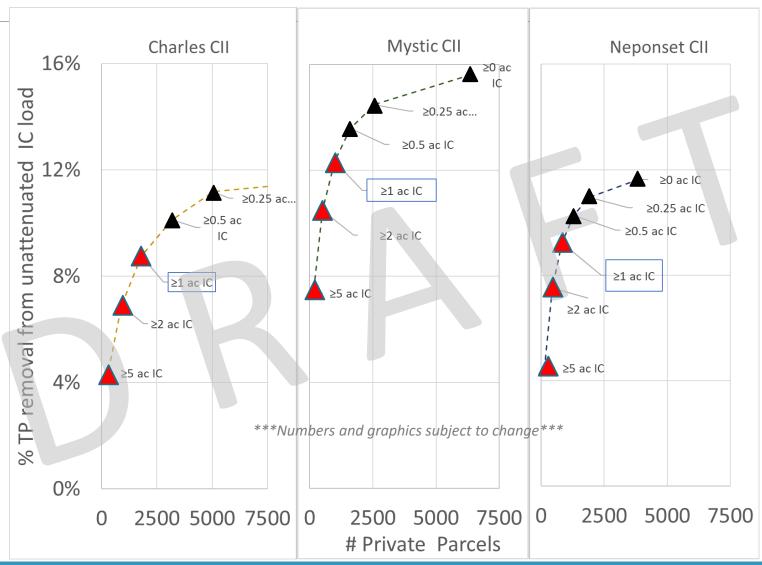
How did EPA designate CII properties?

- Identified use codes from tax assessor's database that indicate commercial, industrial, institutional land uses
- Geospatial analysis to determine impervious cover* acreage per parcel
- Maximize environmental benefit by permitting the fewest number of CII sources led to 1 acre impervious cover permitting threshold

Parcel level analysis reports: https://www.epa.gov/npdes-permits/january-2024-update-residual-designation-authority-rda-activities-underway-charles

Finding a balance for the RDA program

- "Knee of the curve"
 - Balance highest pollution reduction potential with permitting fewest number of CII properties
- Same acreage threshold for all CII properties
- Differences in estimated pollution reductions reflect variations in non-CII land use and overall impervious cover of the watershed.



What does stormwater management under an RDA Program look like?

STRUCTURAL CONTROLS

Infiltration Practices

- Infiltration trenches
- Infiltration basins/ Rain gardens
- Biofiltration/ Tree filters
- Gravel Wetlands
- Enhanced Biofiltration with internal storage
- Sand Filters
- Porous Pavements

Disconnection

Impervious Cover
 Disconnection with and without storage

Storage/Detention

- Dry Ponds Water Quality
 Swale with Detention
- Enhanced Biofiltration with internal storage
- Wet Ponds

Stormwater Reuse

Manufactured
Treatment Devices *

NON-STRUCTURAL CONTROLS

Street and parking lot sweeping

Catch basin cleaning

Leaf litter collection program

Types of Questions EPA Seeks Feedback On:

1. Permit Administration

- Phasing of permit
- Compliance timeframes
- Accounting& tracking of obligations

2. Stormwater Controls

- Stormwater Control options
- Credits for existing stormwater controls

3. Funding Mechanisms

- Regionalized stormwater management
- Impact on stormwater utilities

4. Needed Resources

- Data tools & technical assistance
- EPA support
- Assistance w/ Reporting