



Water Treatment Plant → Project Update

July 13th, 2022



SCIUATE MARY

Agenda

- Opening Remarks
- Website Update and New Content
- Can the Existing OOB WTP Site be Used for the New WTP?
- Should Operations be Separated Between Multiple Sites?
- Typical Abutter Impacts
- Open Comment
 - Use "+1" to agree
 - Please limit yourself to 3 minutes
- Closing Remarks

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Opening Remarks





Schedule

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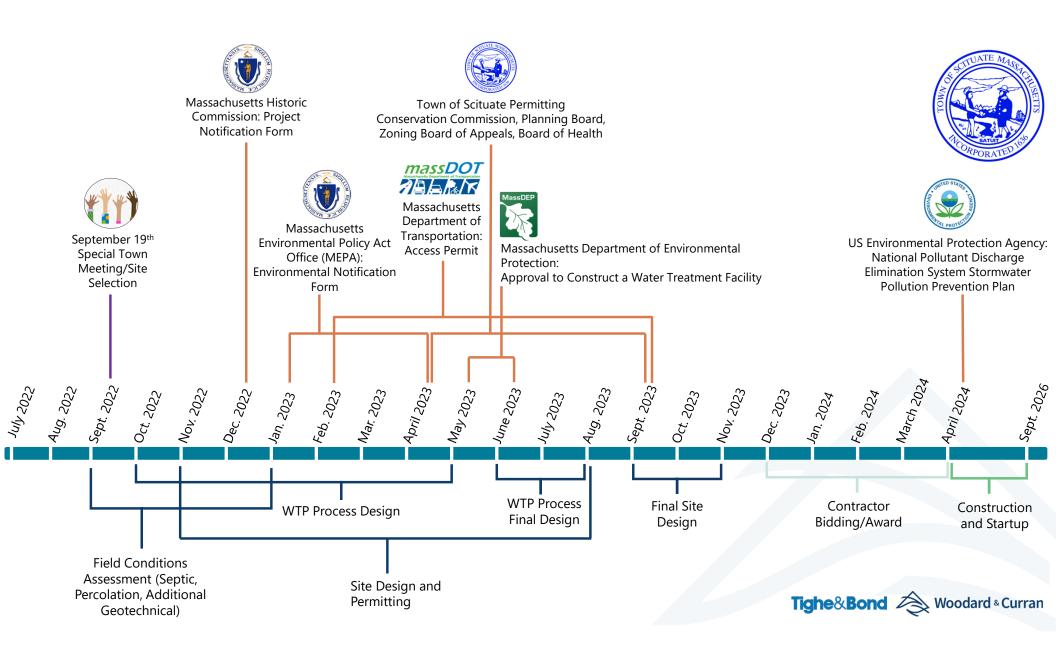
Work Done to Date

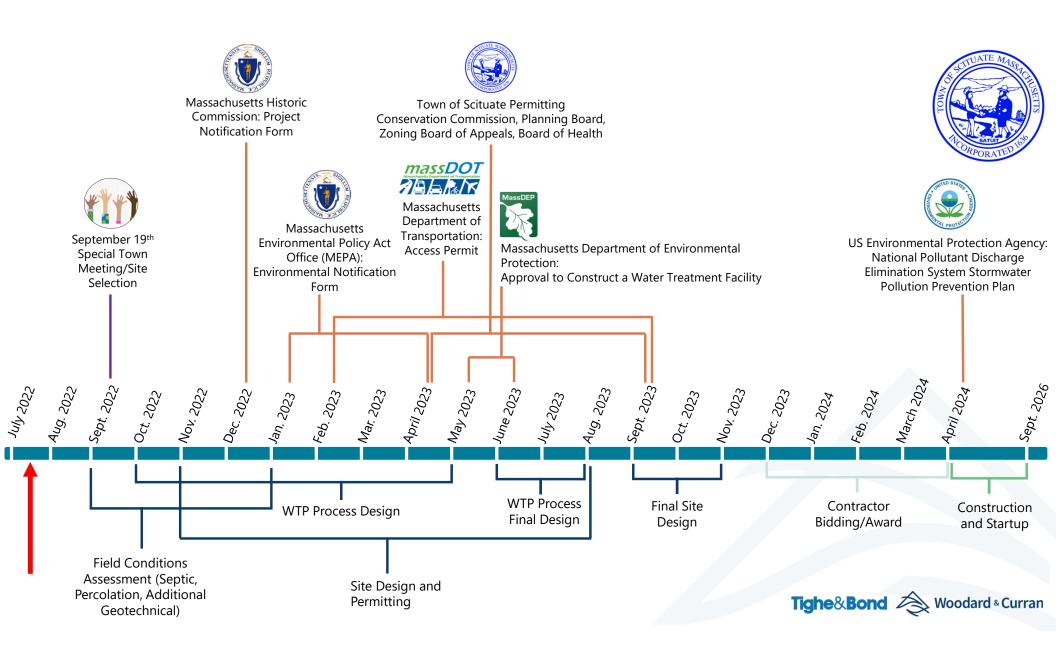
- ► 3 Phases of State Required Pilot Testing
- Preliminary Geotechnical Investigation
- Survey
- Identification of Design Criteria

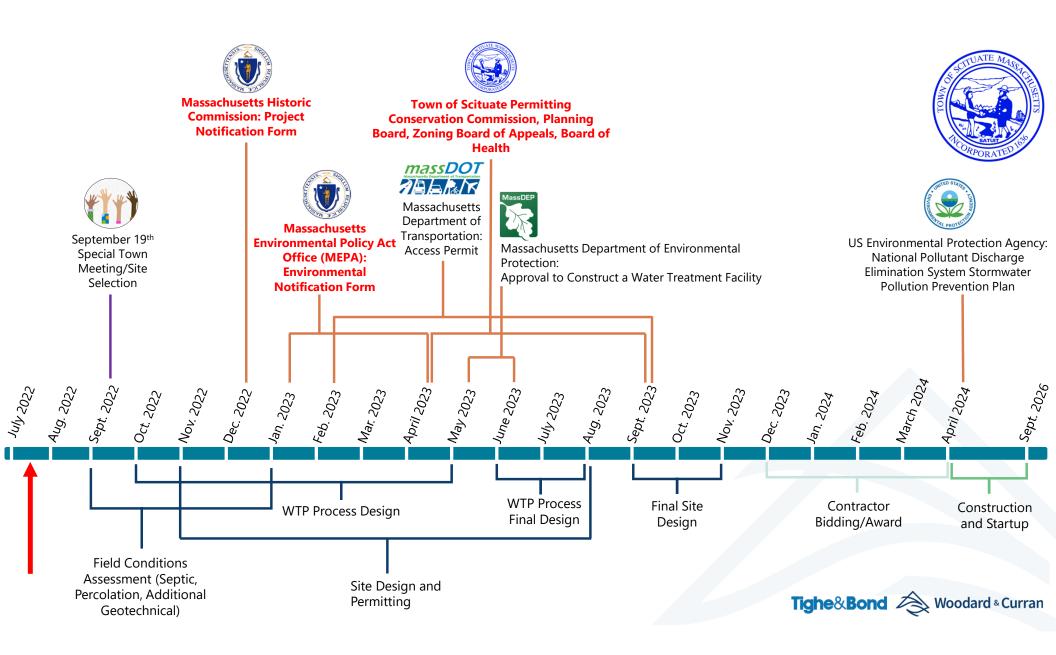


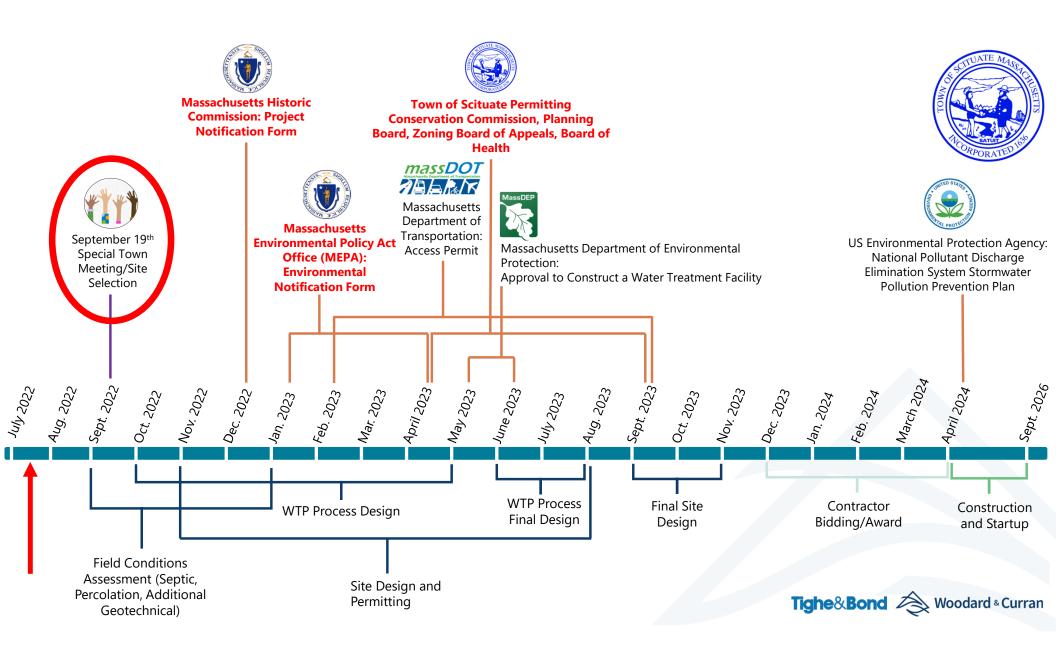












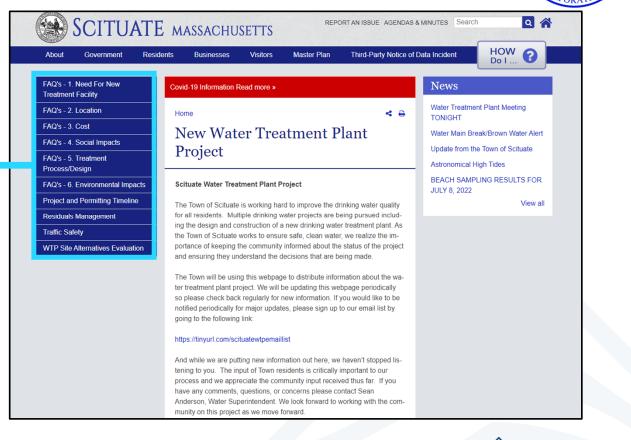


Website Update and New Content



New Website Information

FAQ's - 1. Need For New Treatment Facility	
FAQ's - 2. Location	
FAQ's - 3. Cost	
FAQ's - 4. Social Impacts	
FAQ's - 5. Treatment Process/Design	
FAQ's - 6. Environmental Impacts	
Project and Permitting Timeline	
Residuals Management	
Traffic Safety	
WTP Site Alternatives Evaluation	





Can the Existing Old Oaken Bucket WTP Site be Used for the New WTP?



Residuals Management

- Process residuals is a key driver of design criteria
 - OOB Water Treatment Plant discharges residuals to the sewer
 - The Town's sewer and wastewater treatment facility cannot handle additional residuals of the new facility the
 - Wastewater treatment facility would need rehabilitation and capacity upgrades
 - Sewer infrastructure would need to be upgraded
- The limitations on sewer capacity resulted in a design decision to manage the residuals stream via an on-site lagoon system
 - Eliminates ~16 to 20 million gallons of water per year discharged to the sewer





Residuals Lagoon in Falmouth, MA



Zero Liquid Discharge







Zero Discharge

Filtration & Underdrain System



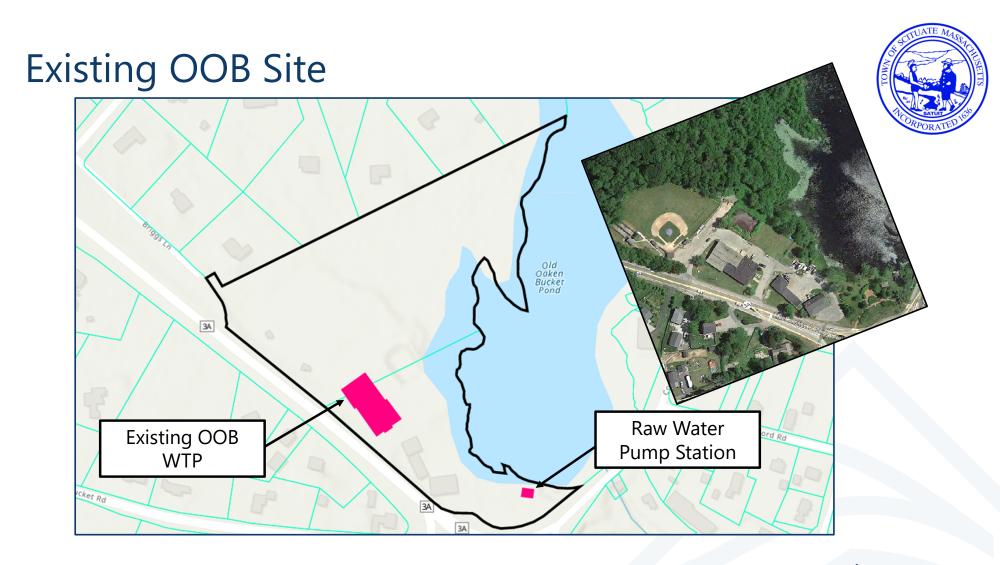


Dry Solids Periodically hauled offsite for disposal



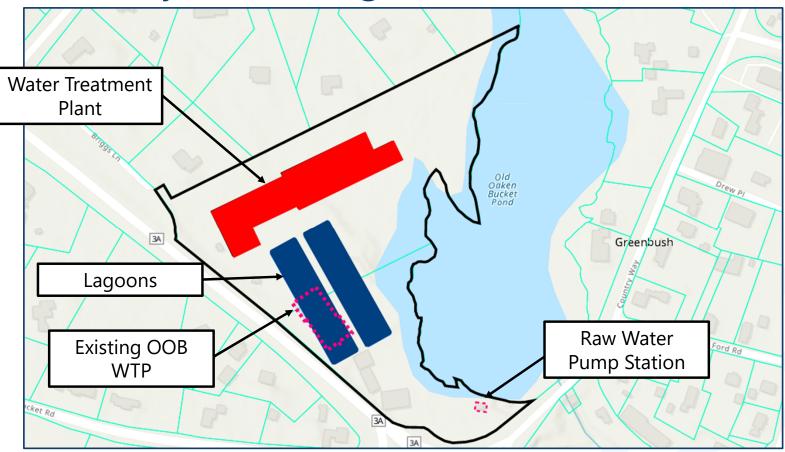
Clean Lagoon Filtrate recycled to the treatment facility





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New Facility on Existing OOB Site

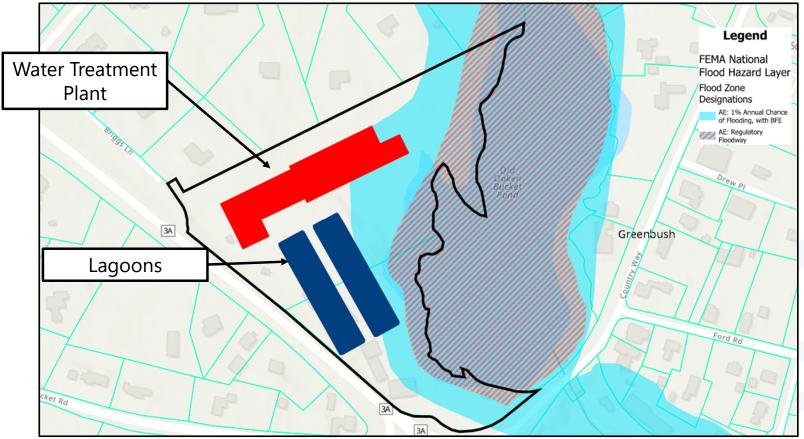




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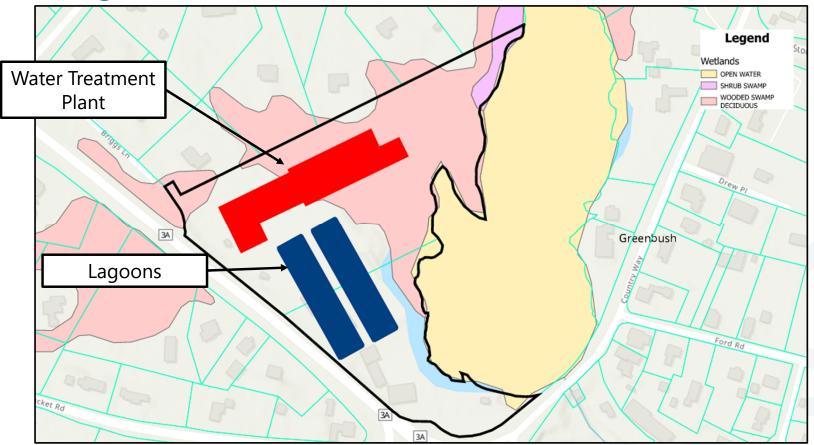




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Existing OOB Site Wetlands

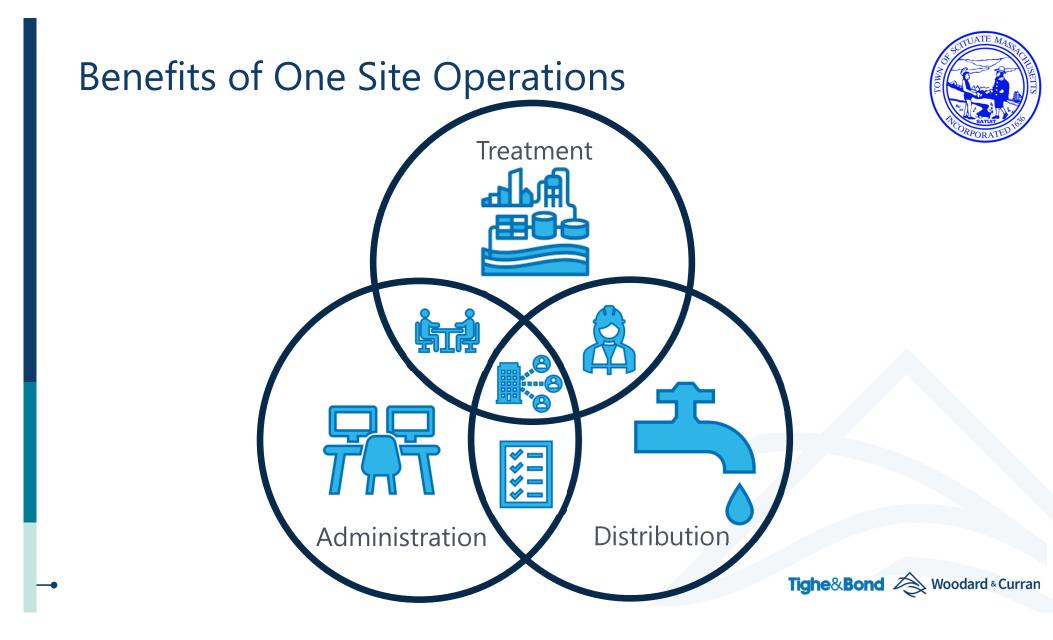


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Should Operations be Separated Between Multiple Sites?





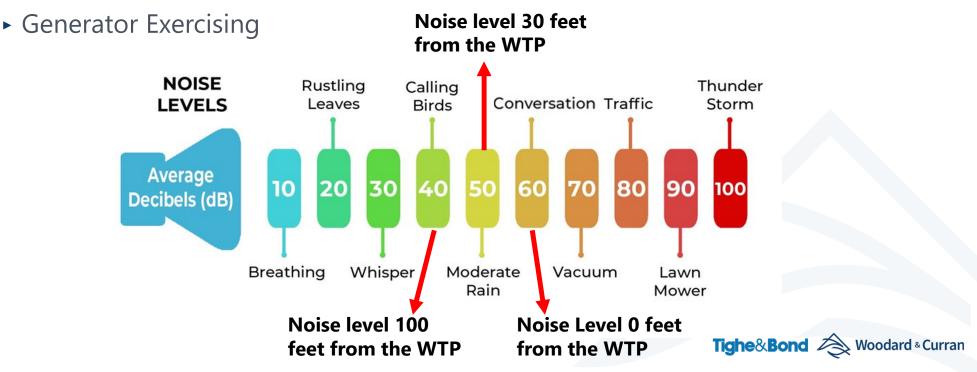


Abutter Impacts



Noise Considerations

- Operations & Maintenance Activities
- Routine Vehicular Traffic
- Periodic Truck Deliveries





Lighting Considerations

- Safety and Security
- Access
- Tree and Land Buffer Areas
- Directional Lighting
- Hours of Operation

Note: Lighting plans will be reviewed and approved by the Town of Scituate's Planning Board during the design phase.





Privacy Considerations



- Additional Plantings
- Privacy Fencing
- Hours of Operation







Other Considerations



- Residuals Handling (Lagoon) Area
- No Additional Land Use Restrictions
- Traffic Safety
- Stormwater Management



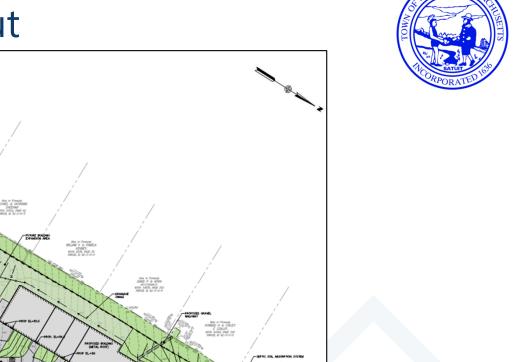
Lagoons at the University of New Hampshire



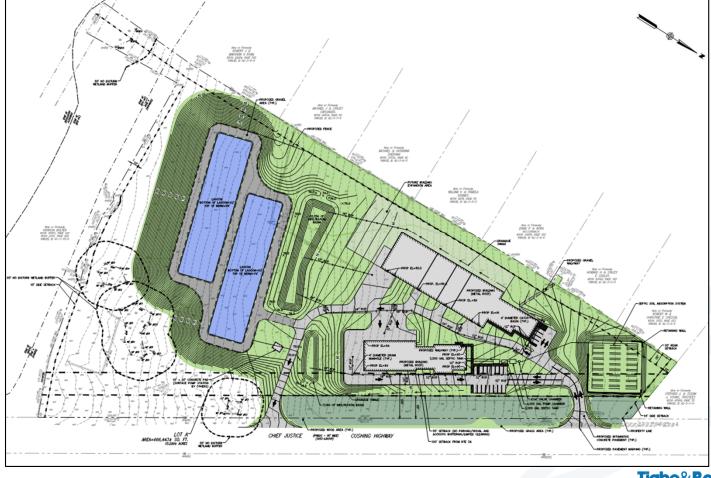


Site Layout Progression

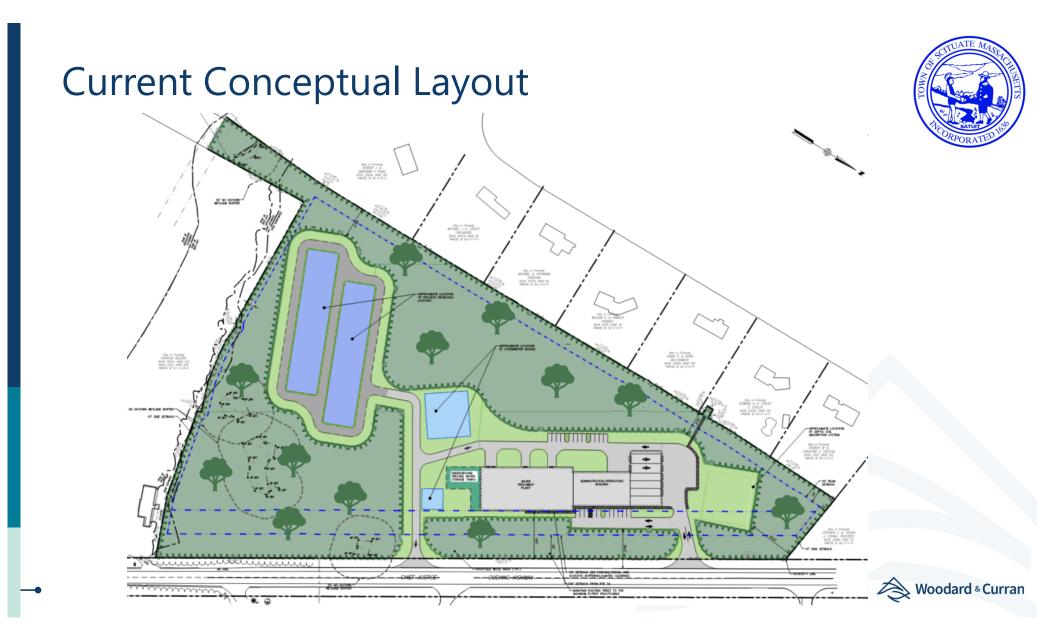




Original Conceptual Layout



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Open Comment



ACCRETED IN

Open Comment

- Use the raise hand feature and we will call on you in order
- Please give your name and address
- Limit to 3 minutes to allow everyone to speak
- If you agree, you can use +1 to indicate that
- If you didn't get to say something, or want to provide us something additional, please email <u>scituatewtp@scituatema.gov</u>

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Thank you!

