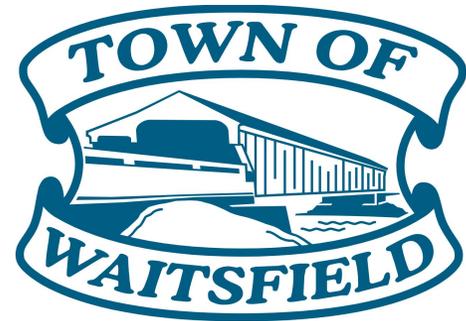


Waitsfield Community Wastewater Project

Community Meeting

Wednesday, May 8th, 2024

Chach Curtis, Waitsfield Selectboard
Annie Decker-Dell'Isola, Wastewater Project Manager



Overview

- 1. Why wastewater for Waitsfield?**
- 2. History of the project to date**
- 3. Preliminary Engineering Report findings & recommendations**
- 4. Details of the proposed wastewater system**
- 5. Proposed project costs**
- 6. Proposed funding stack**
- 7. Bond vote details**
- 8. Timeline moving forward**
- 9. Why now?**
- 10. Questions?**

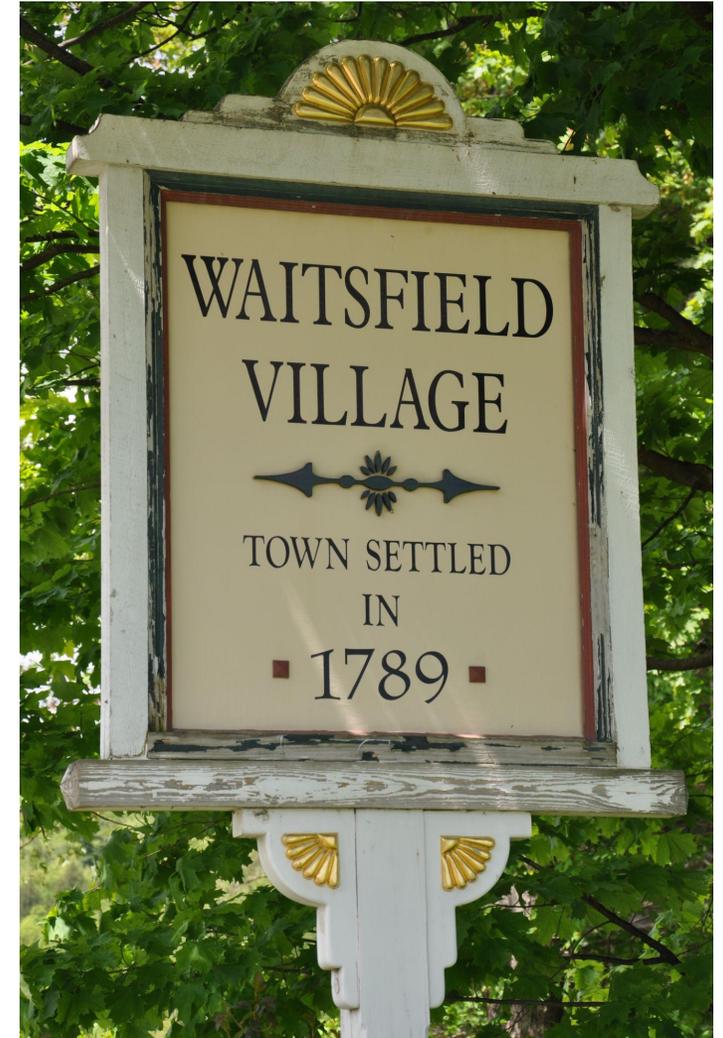
Why Wastewater?



- Aging private septic systems in Waitsfield & Irasville pose an environmental & public health risk
- Risks increase as systems age
- Cost to replace private systems can be up to \$60,000
- Lack of septic capacity severely limits new development in villages

Compact Rural Development

- Centralized wastewater will help promote a compact settlement pattern in Waitsfield's villages
- The **Waitsfield Town Plan** supports centralized wastewater alternatives in the villages, as mentioned in the *Housing, Economic Development, Facilities & Services, Natural Resource, and Land Use chapters*
- The project ties into other smart growth efforts including:
 - Bylaw Modernization (adopted 2024)
 - Neighborhood Development Area designation for Irasville (approved 2024)
 - Irasville Masterplanning (in progress)



Waitsfield Community Wastewater Project



Project Goals

- protect environmental health
- protect public health
- offset the economic hardships of replacing private septic systems
- increase housing options
- support economic activity
- incentivize compact growth in Waitsfield and Irasville Village

Project History

90% PRELIMINARY ENGINEERING REPORT
for the
TOWN OF WAITSFIELD
WATER AND WASTEWATER FEASIBILITY STUDY

June 1, 2023

Project Number 227947

Prepared for:

Town of Waitsfield
4144 Main Street
Waitsfield, Vermont 05673

Prepared by:

DuBois & King, Inc.
27 Center Street
Brandon, Vermont 05733
(802) 465-8396
Jonathan Ashley, P.E.



90% Report

TOWN OF WAITSFIELD
WATER AND WASTEWATER FEASIBILITY STUDY

November 27, 2022

Project Number 227947

Prepared for:

Town of Waitsfield
4144 Main Street
Waitsfield, Vermont 05673

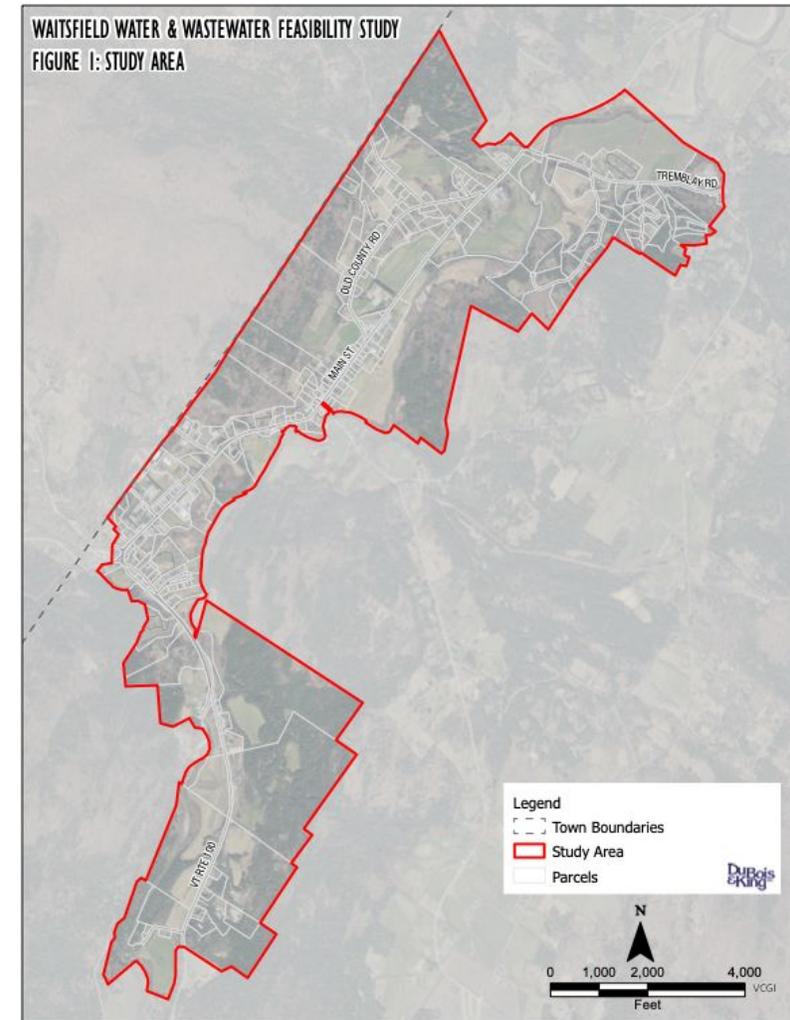
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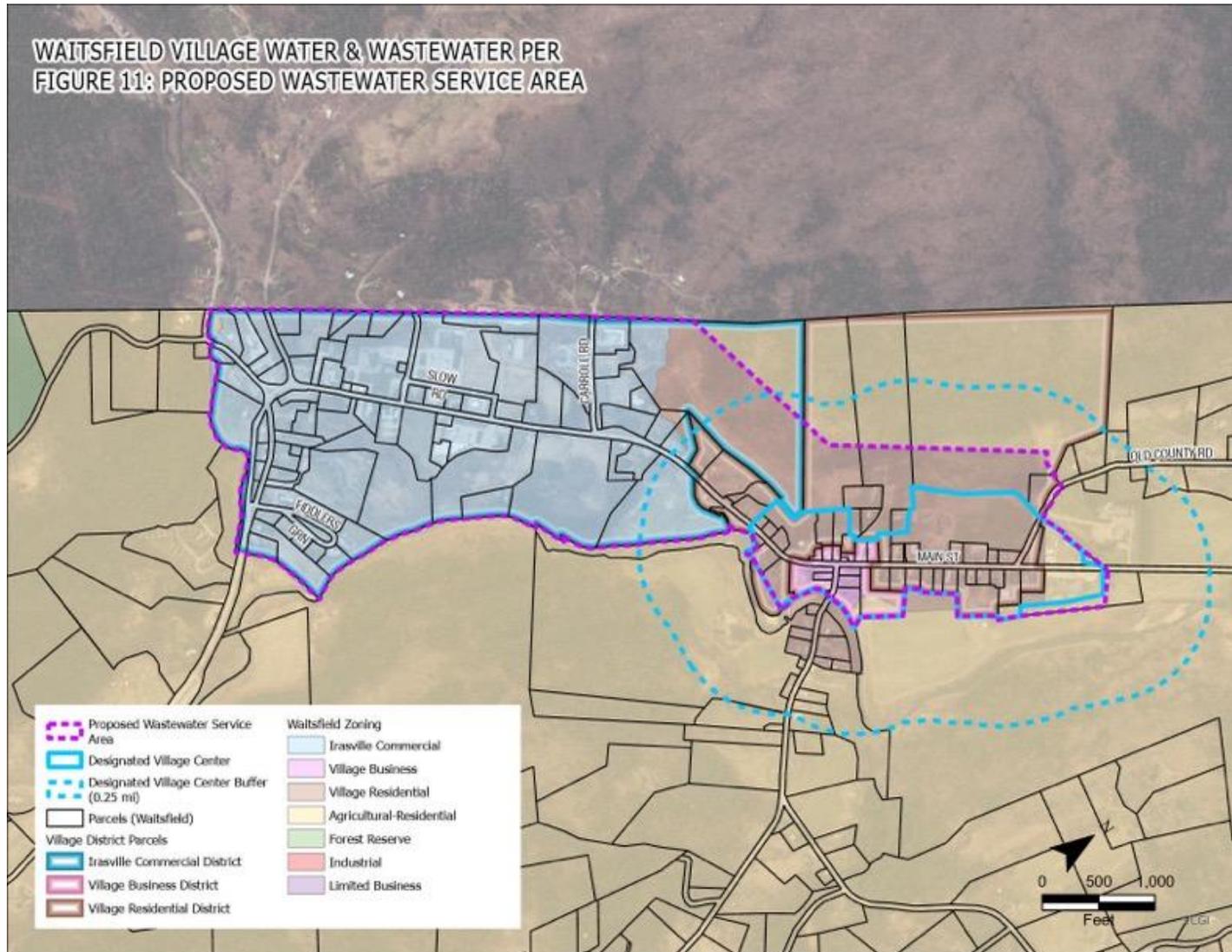
Feasibility Study

- Fall 2021 - January 2023
- Led by the Water and Wastewater Feasibility Committee
- Project engineer tasked with evaluating the need for and feasibility of providing wastewater services to the study area and develop potential alternatives for wastewater disposal
- Eight potential disposal scenarios were reviewed and after considering feasibility and costs, the Selectboard proceeded with further study of treatment and disposal at the Town owned Munn Site



Preliminary Engineering Report (PER)

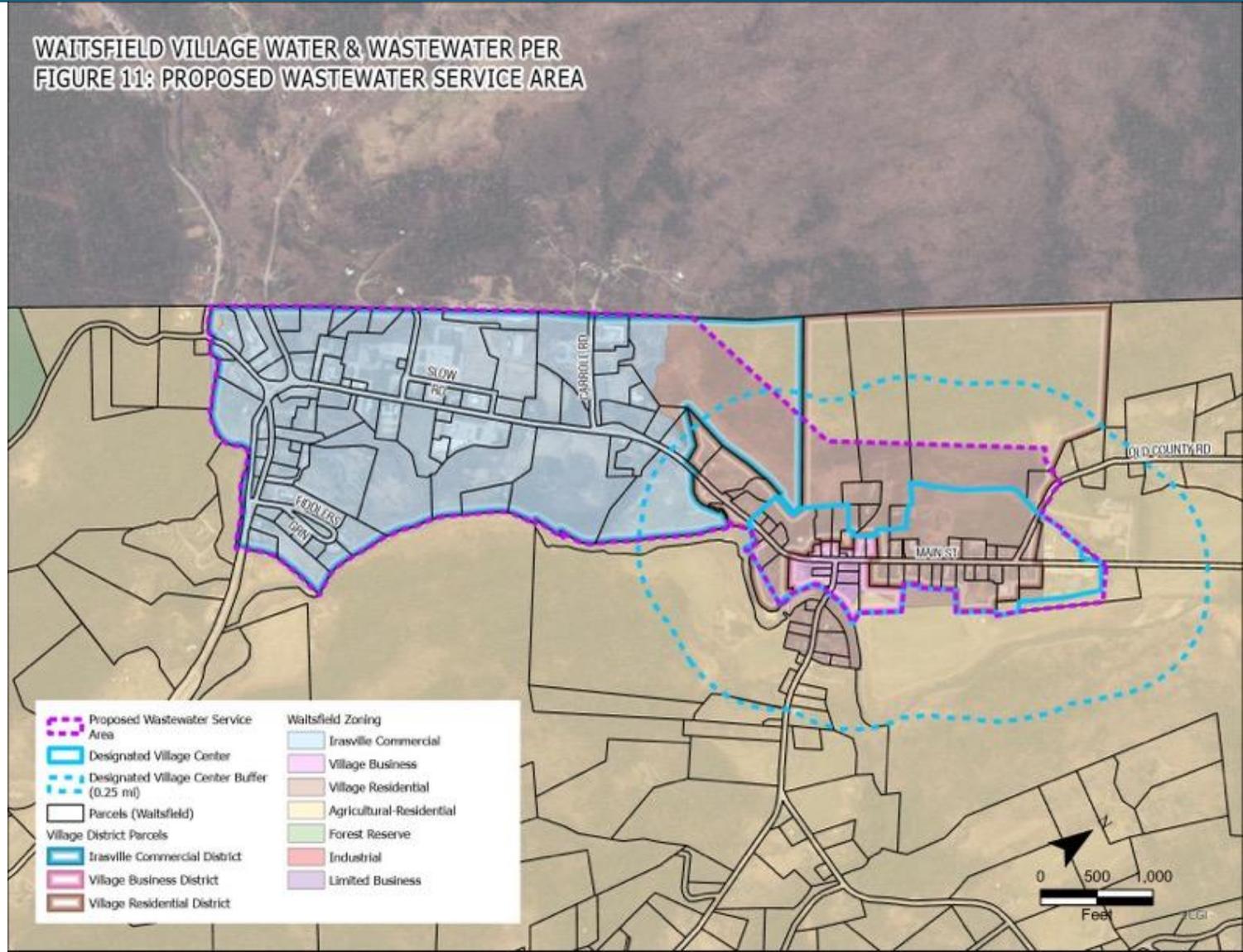
WAITSFIELD VILLAGE WATER & WASTEWATER PER
FIGURE 11: PROPOSED WASTEWATER SERVICE AREA



- January 2023 - December 2023
- Led by the Wastewater Project Planning Team with support from MRVPD
- Includes findings from the Feasibility Study and recommendations for priority connections to the system as well as a proposed service area

PER Findings

- **128 parcels** with existing wastewater systems in Irasville & Waitsfield Village
- **102,506 gallons per day (gpd)** of existing wastewater flows in the villages
- **75%** of the original study area's existing wastewater demand is located in the villages



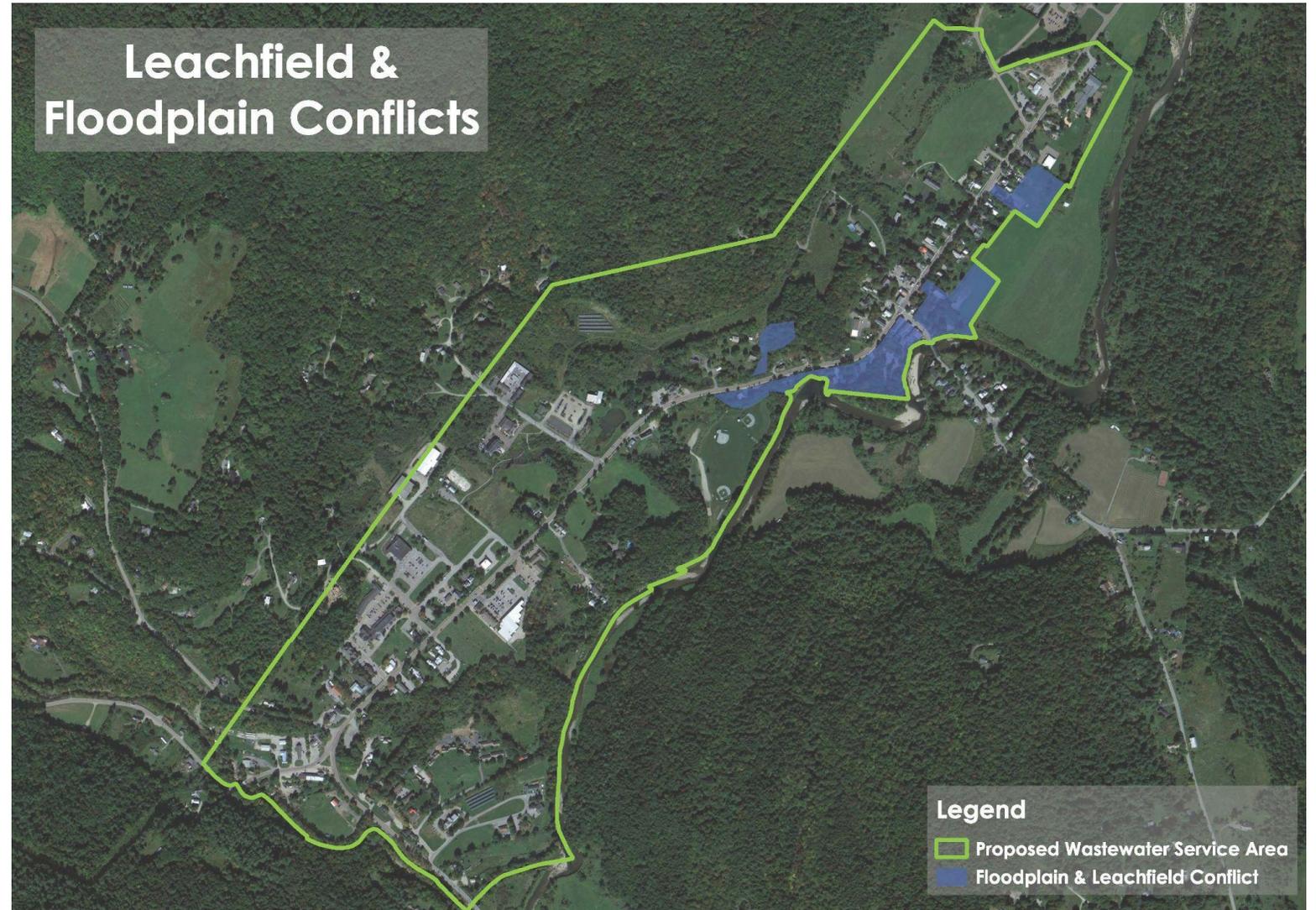
PER Findings: Health, Sanitation, & Security

- Functioning wastewater disposal is critical to public health and environmental health
- The Town's village centers are geographically constrained by the Mad River, its associated floodplain, and wetlands
- "Development of a village wastewater system, particularly for management of wastewater from small village lots, would provide protection for water quality in the Mad River."



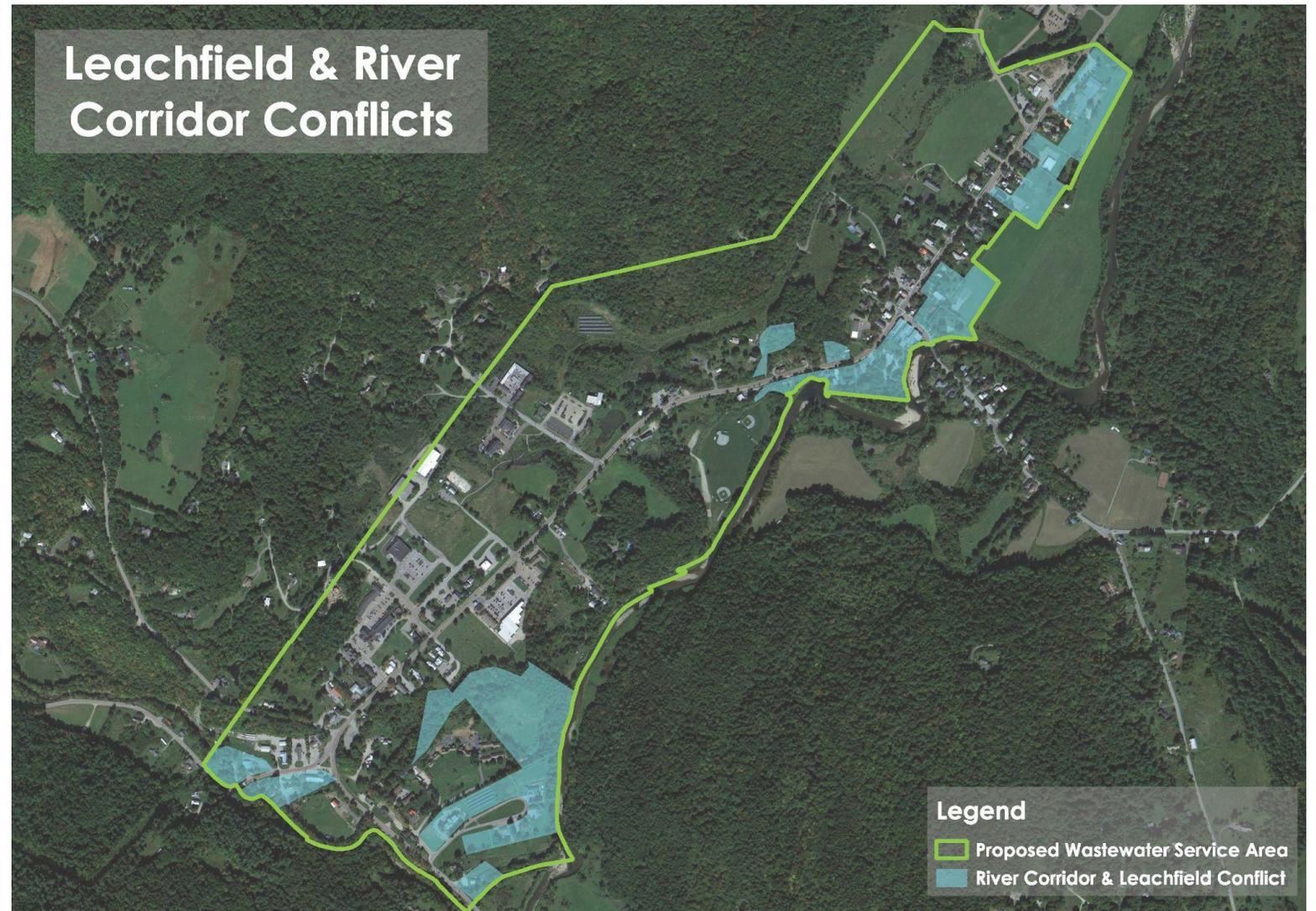
PER Findings: Health, Sanitation, & Security

- **27% of existing leachfields** in the villages are in the ***floodplain*** or



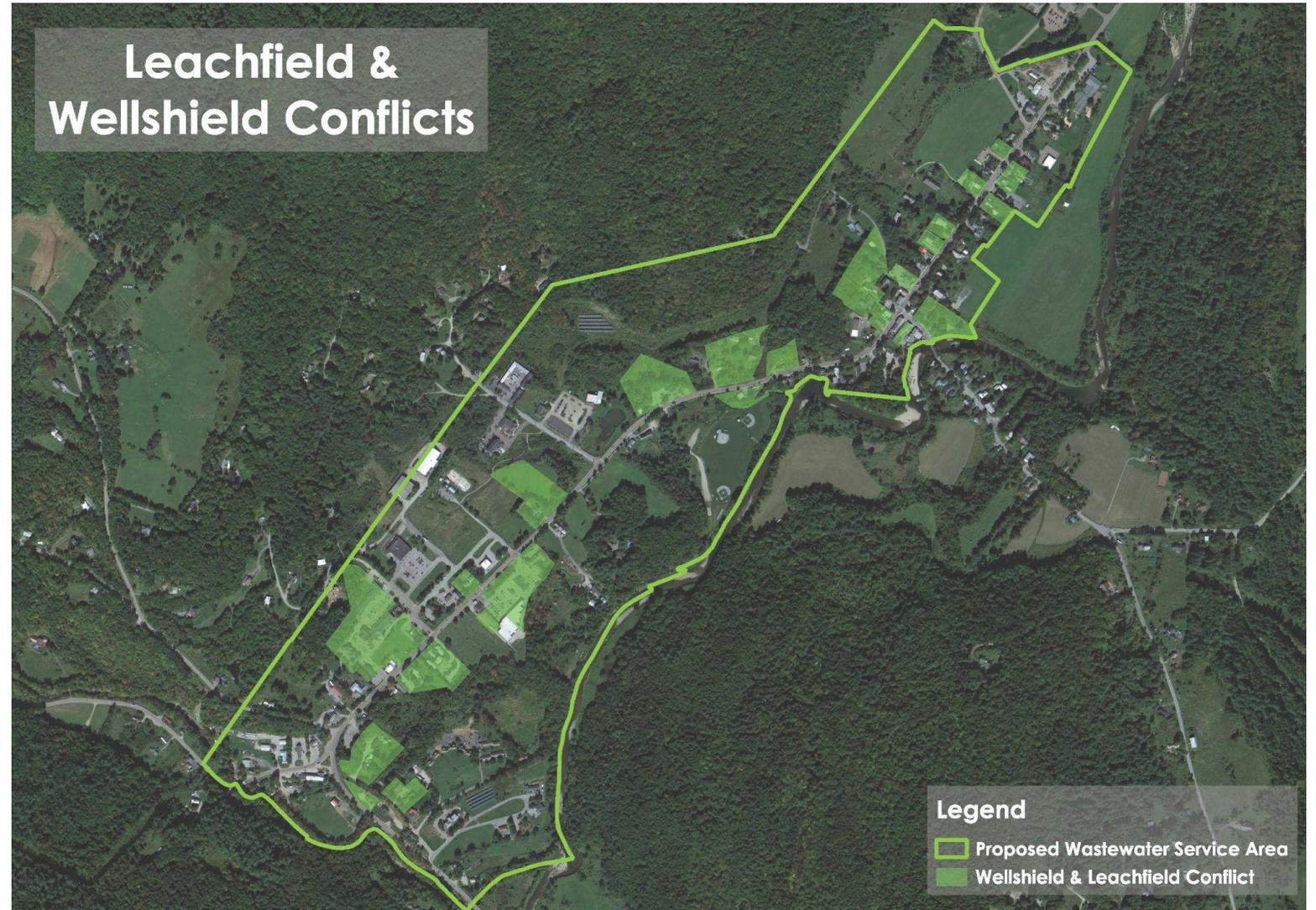
PER Findings: Health, Sanitation, & Security

- **27% of existing leachfields** in the villages are in the ***floodplain*** or ***river corridor***



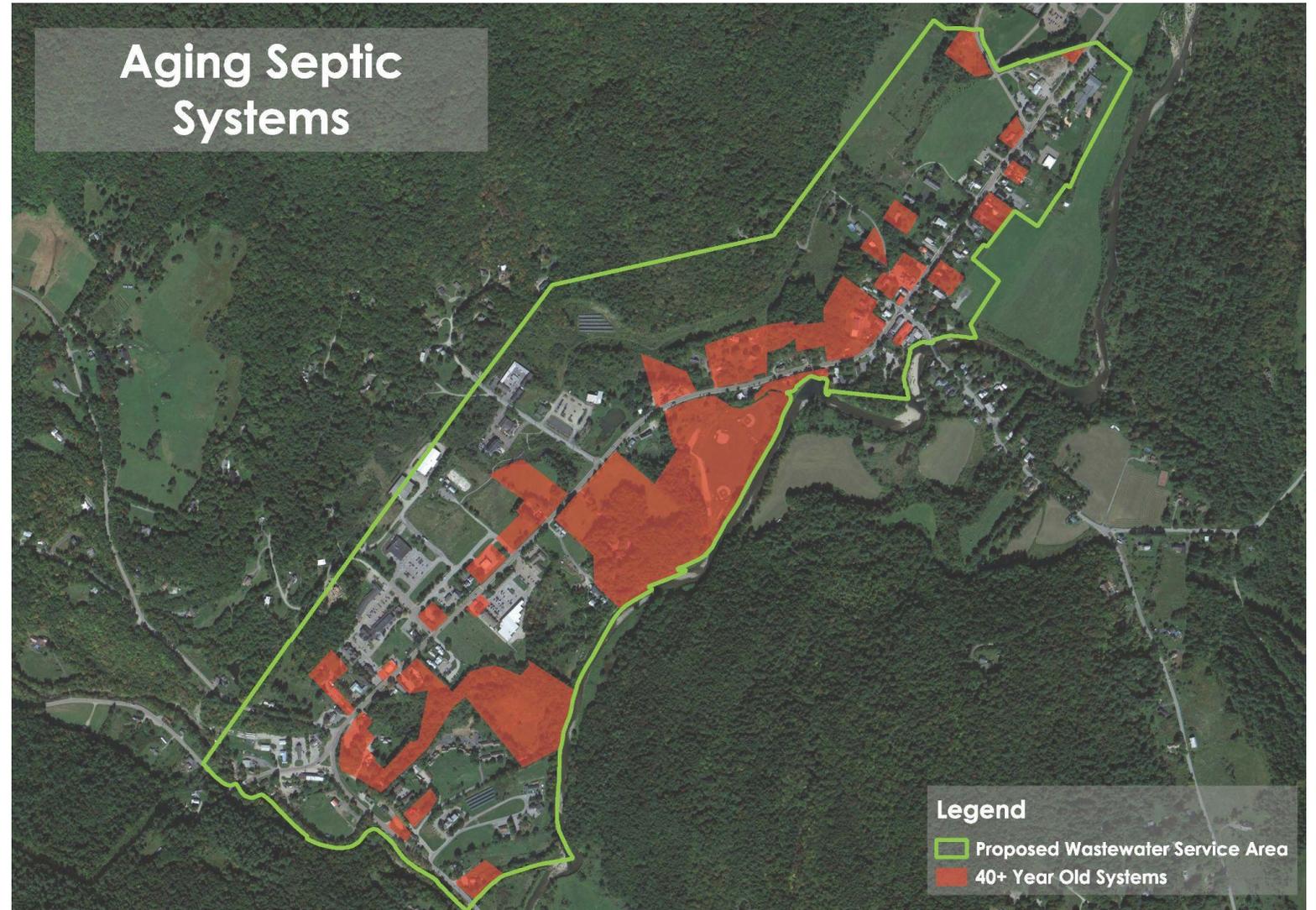
PER Findings: Health, Sanitation, & Security

- **27% of existing leachfields** in the villages are in the *floodplain* or *river corridor*
- **26% of existing leachfields** in the villages are located **within well shields**



PER Findings: Aging Infrastructure

- The average lifespan of a septic system is **15 to 40 years**
- The estimated cost to replace a septic system could cost as much as **\$60,000+** due to poor soils and/or environmental constraints
- **43%** of systems in the villages near or past their usable life (>30 years)



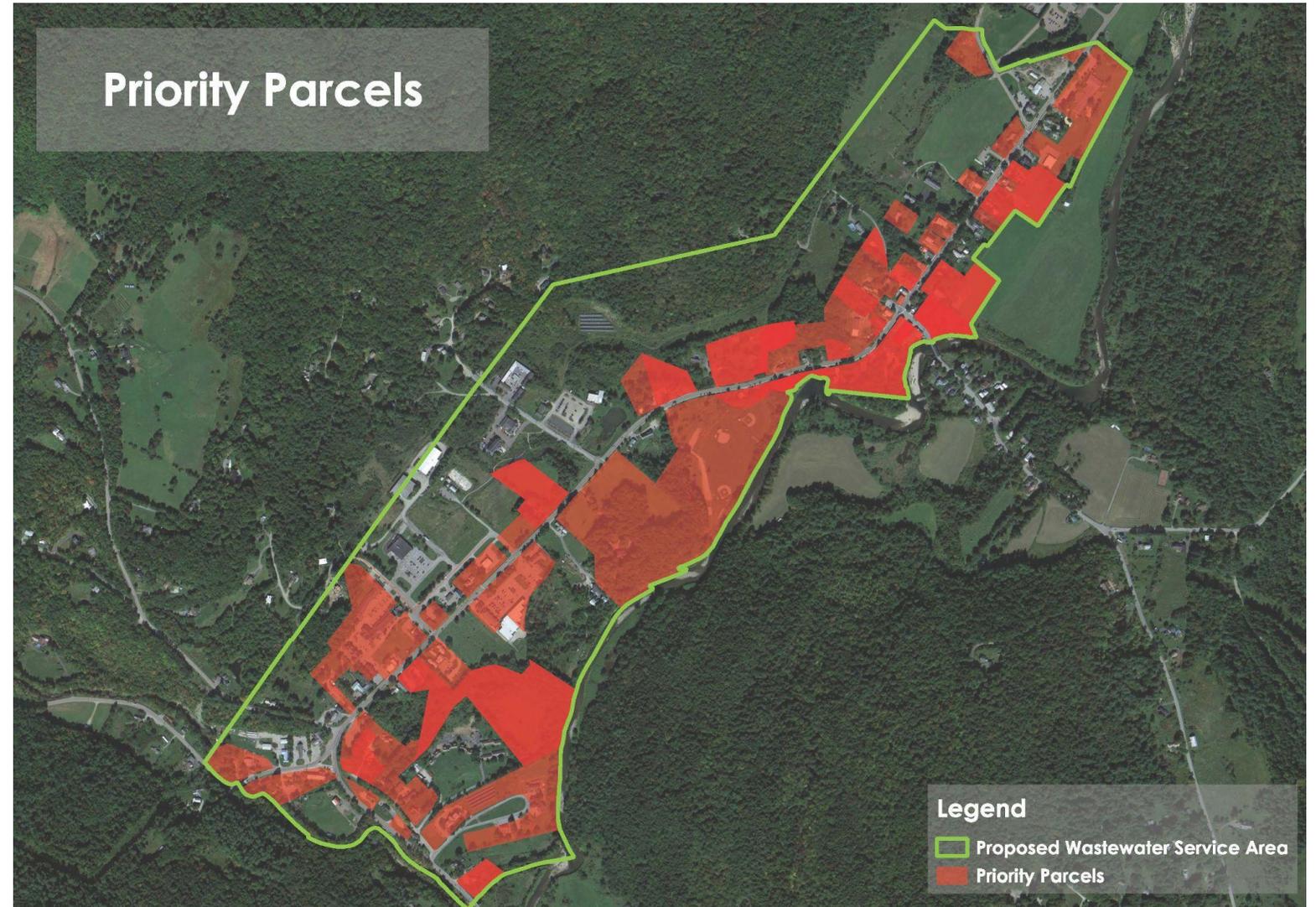
PER Recommendation: Connections

Priority connections for parcels with leach fields that are:

- 40 or more years old;
- located in a mapped floodplain;
- located in the River Corridor;
- Located within well shields for existing private and public drinking water wells;

AND

Maintain capacity for new housing and commercial development

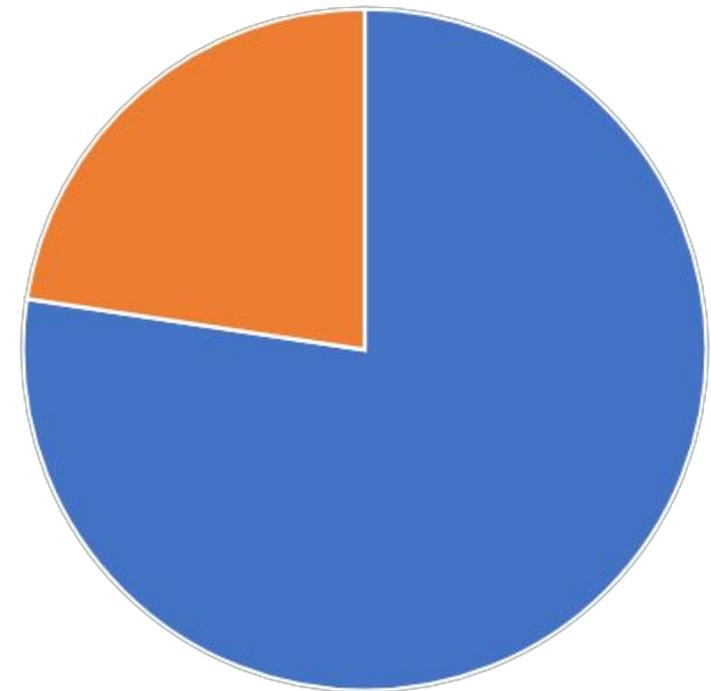


PER Recommendation: Treatment & Capacity

- Available disposal capacity of Munn site :
~89,000 (gallons per day) gpd
- Wastewater demand of priority parcels:
~65,000 gpd or 73% of capacity
- Capacity available for additional demand:
~24,000 gpd or 27%

**Supports ~70 new 1&2 BR homes, and
8-10% increase in commercial demand**

Recommended Demand
Allocation for Munn Site w/Tertiary
Treatment



■ Identified Priorities ■ Additional Demand

30% Design Phase

- January 2024 - now
- Begin the design of the proposed system
- Includes engagement with potential users and easement holders



Proposed Wastewater System

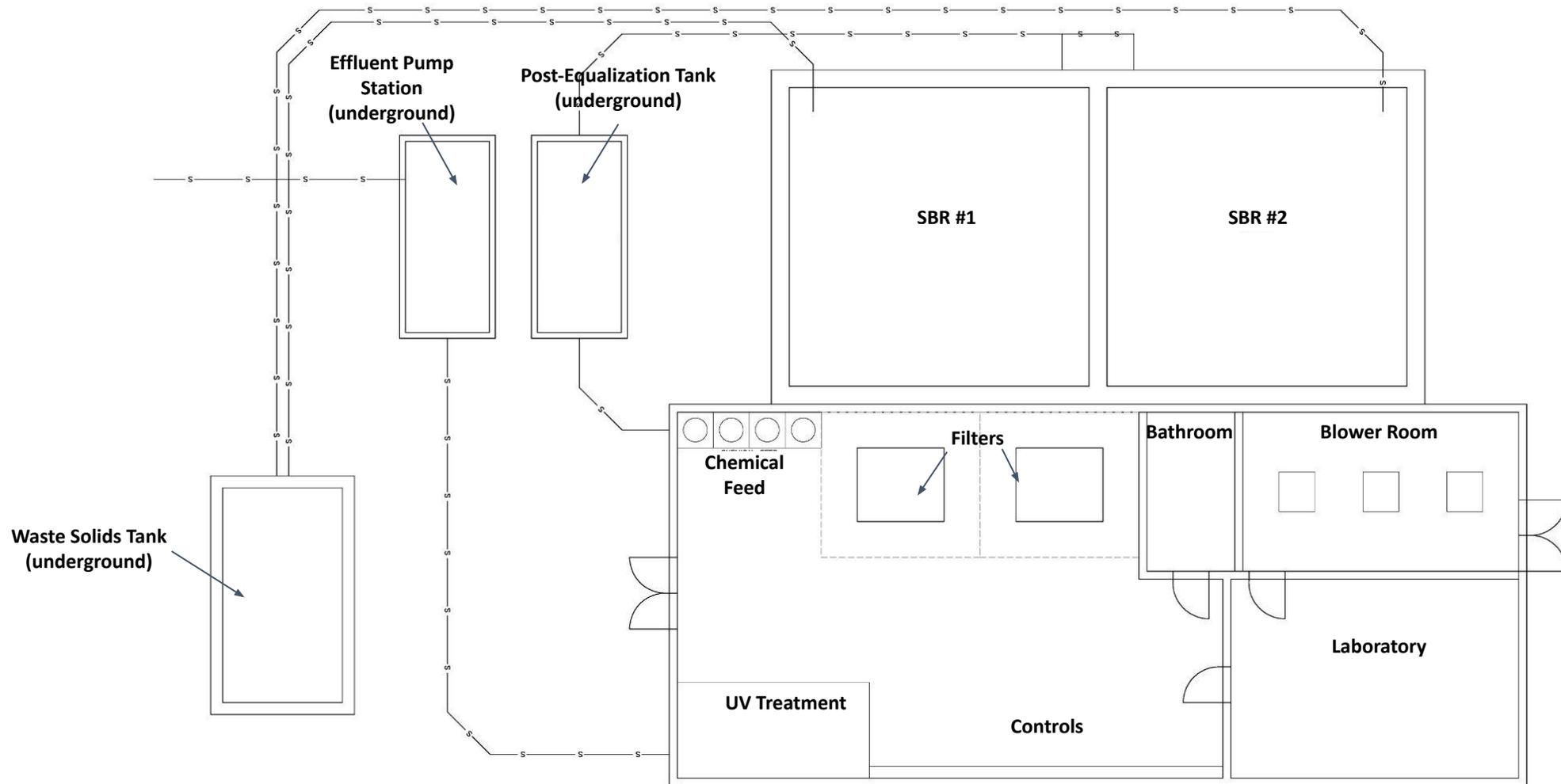


Advanced Treatment System: SBR

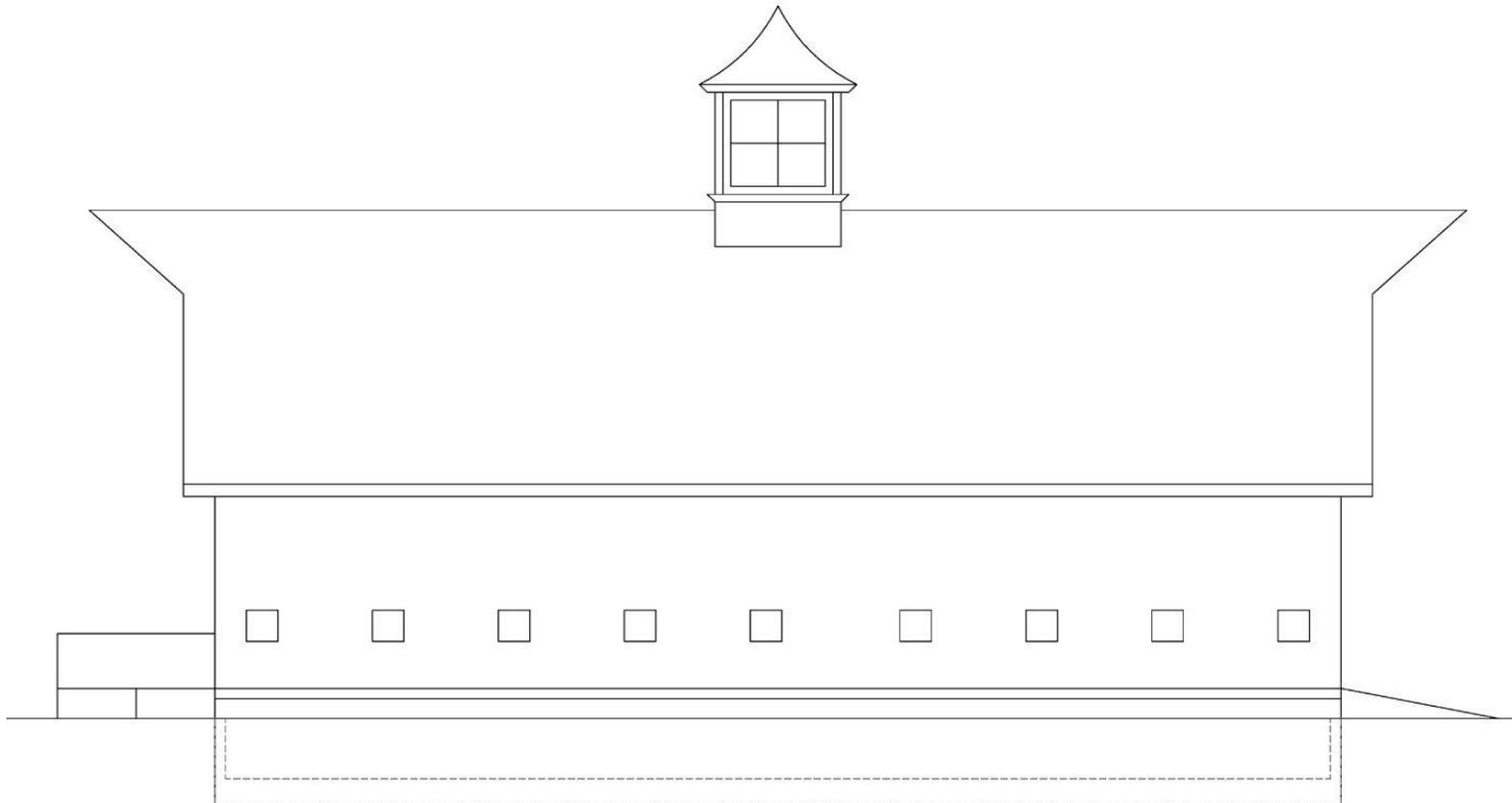


- The project team used a number of evaluation criteria before selecting the SBR system
- The proposed SBR system includes a control building, tanks (buried as much as possible for minimum visual impact), and a leach field
- Seen here is the Sugarbush SBR system (67,000 gpd)

Advanced Treatment System: SBR

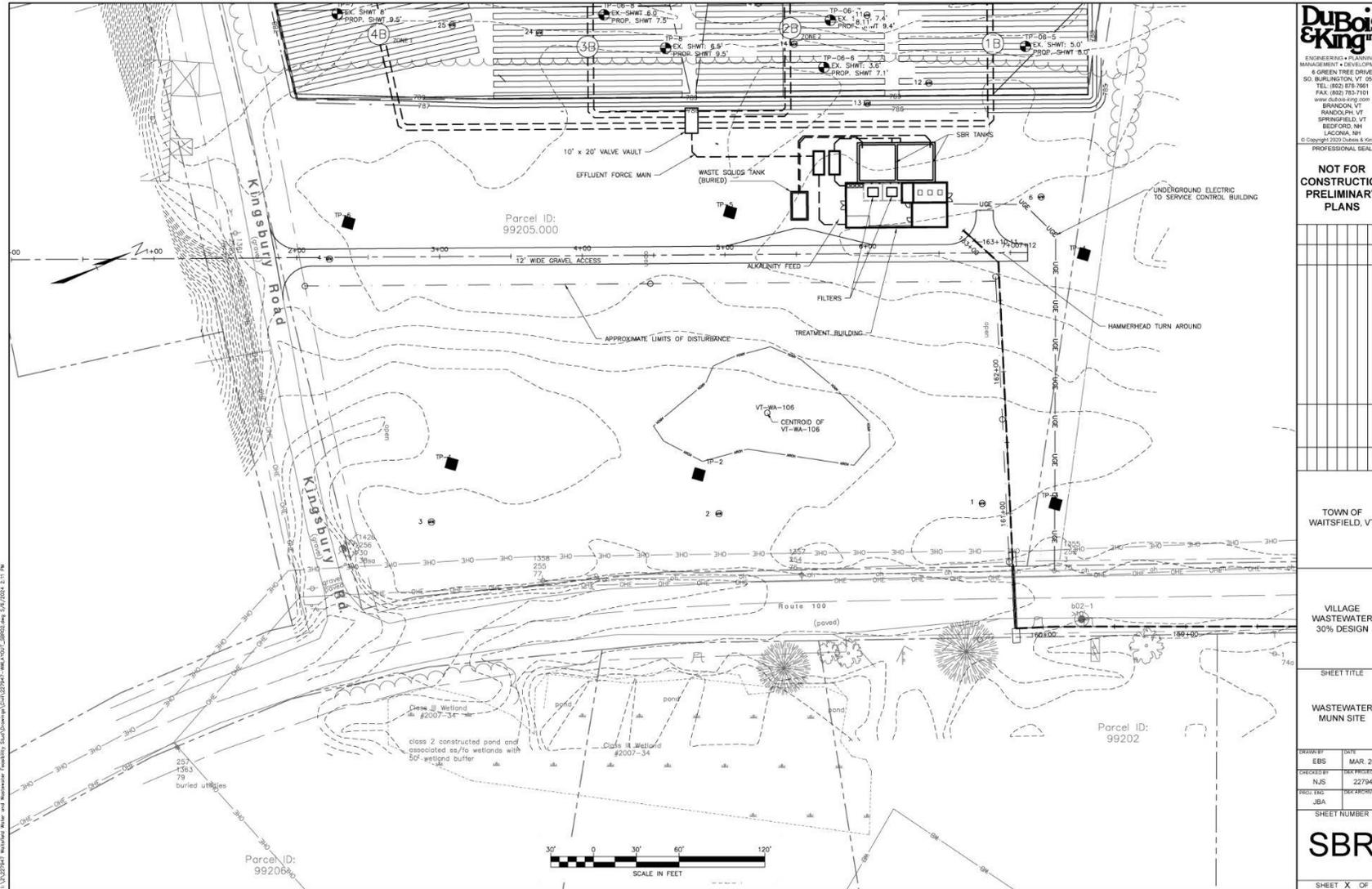


Advanced Treatment System: SBR



**proposed front view of
building from road,
parallel to Route 100**

Advanced Treatment System: SBR



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 ENGINEERING • PLANNING •
 MANAGEMENT • DEVELOPMENT
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 LACONIA, NH
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**NOT FOR
 CONSTRUCTION
 PRELIMINARY
 PLANS**

NO.	DATE	DESCRIPTION	BY	CHK

TOWN OF
 WAITSFIELD, VT

VILLAGE
 WASTEWATER
 30% DESIGN

SHEET TITLE

WASTEWATER
 MUNN SITE

DESIGNED BY
 EBS

DATE
 MAR 2024

CHECKED BY
 NJS

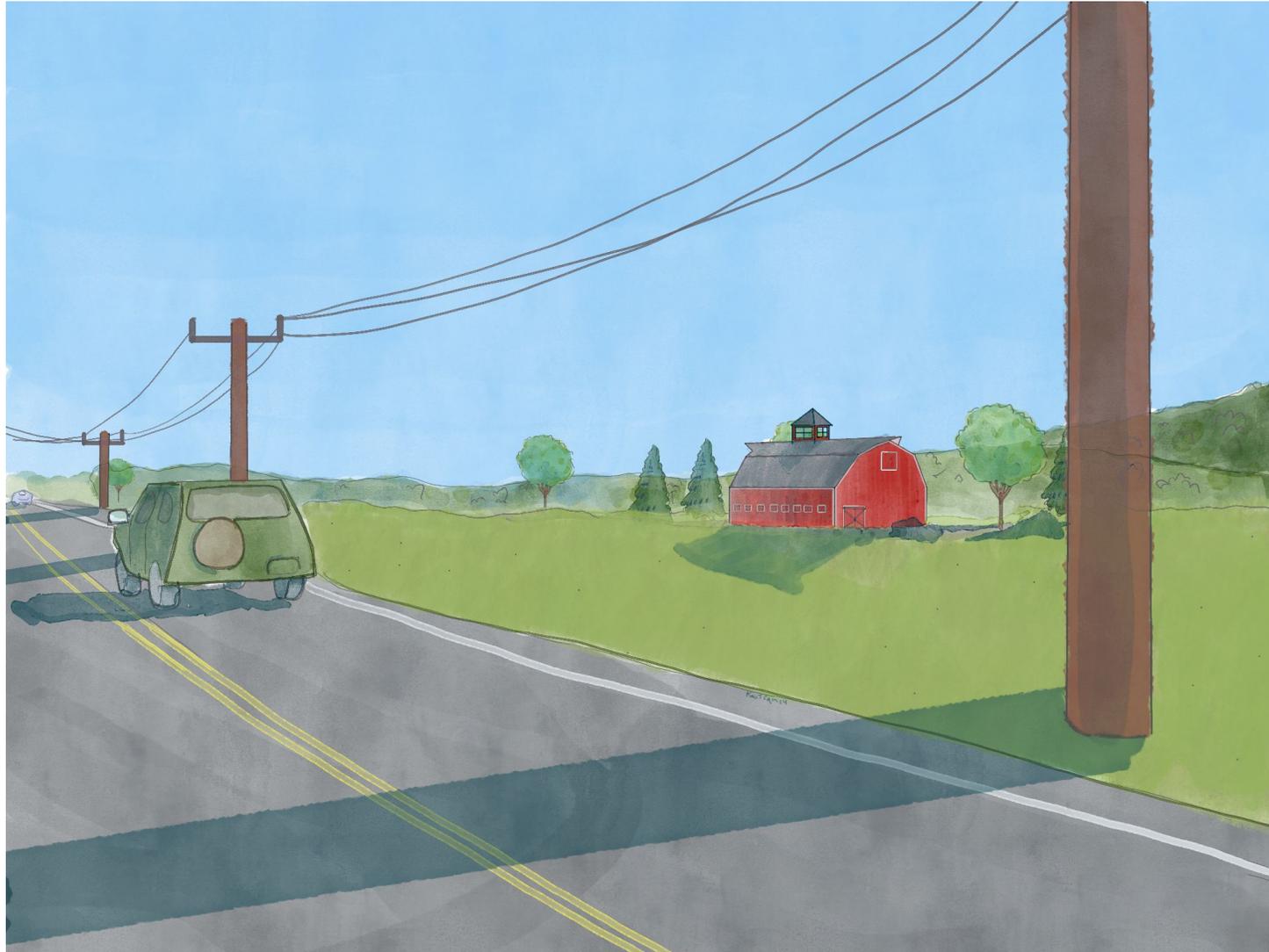
SHEET NUMBER
SBR

SHEET X OF 41

Advanced Treatment System: SBR



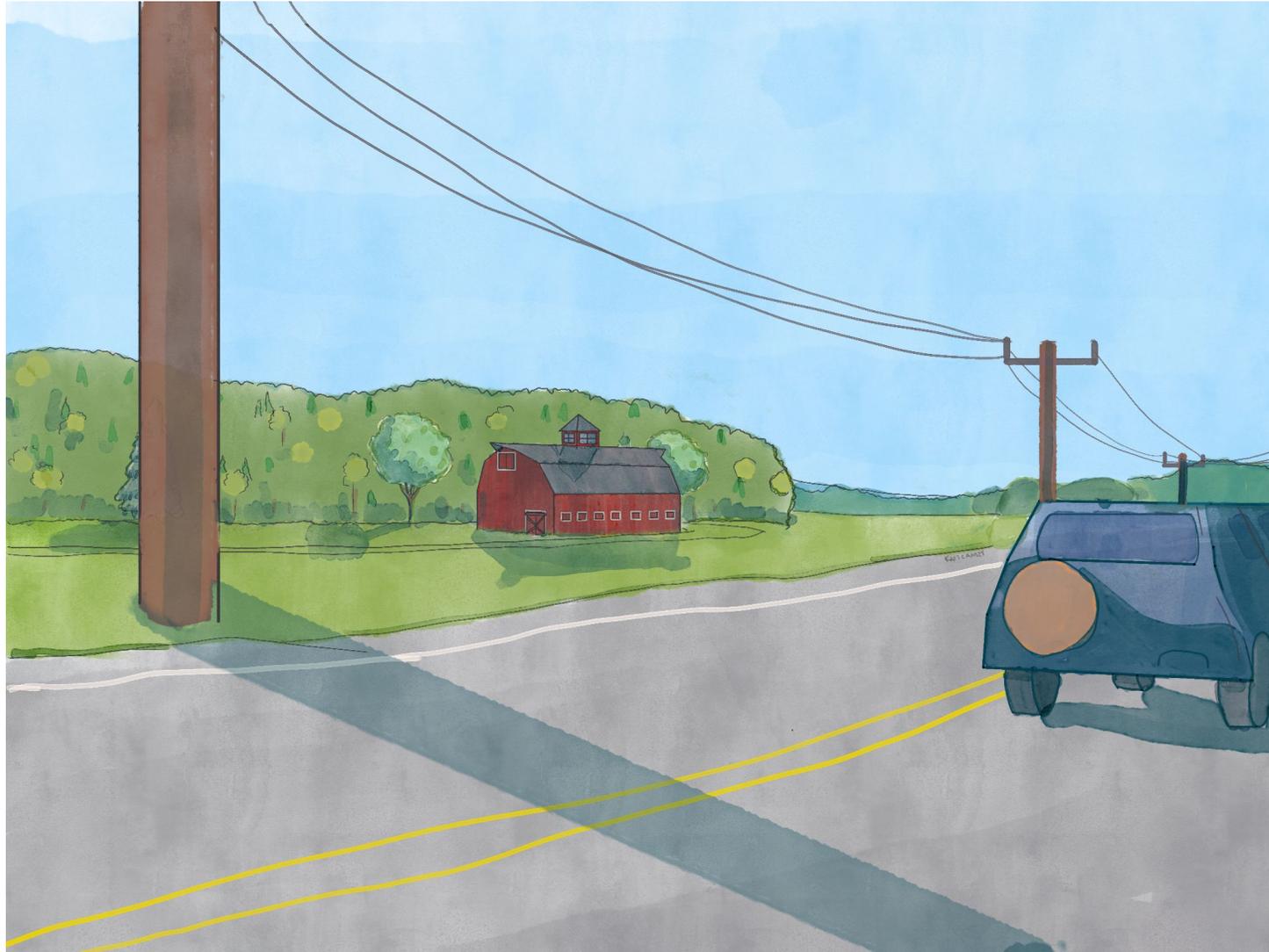
Advanced Treatment System: SBR



Advanced Treatment System: SBR



Advanced Treatment System: SBR



Proposed Project Capital Costs

Capital Costs	
Amount	Description
\$3,702,900	Munn Site treatment and disposal system construction and site work
\$8,639,300	Wastewater collection system construction, site work, materials
\$199,418	Feasibility Study and PER
\$604,400	Engineering Final Design
\$1,108,100	Construction Engineering
\$751,400	Archaeology, administration costs, legal costs, short term financing, etc.
\$15,005,518	

Proposed Funding Stack

Waitsfield Community Wastewater Project Proposed Funding Stack (5/8/24)		
Funding Source	Amount	Notes
VT DEC CWSRF (grant)	\$353,092	Received this subsidy amount to date for planning and design
Waitsfield Municipal ARPA Funding (grant)	\$28,326	Waitsfield has allocated this amount of municipal ARPA funding.
Congressional Discretionary Spending (grant)	\$3,000,000	This funding is proposed and an application has been submitted.
Village Wastewater ARPA / Pollution Control Grant	\$6,000,000	This funding is proposed and an application has been submitted.
USDA Rural Development Grant	3,923,470	This funding is proposed and an application has been submitted.
USDA Rural Development Loan	\$1,700,630	This funding is proposed and an application has been submitted.
	\$15,005,518	

Bond Vote: June 11th, 2024

ARTICLE 1

Shall general obligation bonds or notes of the Town of Waitsfield in an amount not to exceed Fifteen Million Five Thousand Five Hundred Eighteen and 00/100 Dollars (\$15,005,518.00), subject to reduction by State and federal funds, including but not limited to, grants-in-aid be issued for the purpose of financing the cost of community wastewater disposal collection, transmission and treatment improvements, at an estimated cost of Fifteen Million Five Thousand Five Hundred Eighteen and 00/100 Dollars (\$15,005,518.00)?

If in favor of this Article, make a cross (X) in this square .

If opposed to this Article, make a cross (X) in this square .

Why Now?

- Environmental, health and housing needs are urgent
- Unique funding window available NOW
- Water, zoning, and planning already in place
- Wastewater is last piece of the infrastructure puzzle
- Sustain the health of our environment and our economy



photo credit: takeadaytrip.com

Waitsfield Community Wastewater Project

BOND VOTE!

WHEN?

JUNE 11, 2024

WHERE?

***VILLAGE MEETING
HOUSE, 4355 MAIN
ST., WAITSFIELD VT***

WHY?

***ALLOWS THE TOWN
TO PURSUE PROJECT
FUNDING!***

Questions?

Contact

wastewateradmin@gmavt.net

with questions you might have
after this meeting