

VTrans Fall 2023 Transportation Alternatives (TAP) and

Municipal Highway and Stormwater Mitigation Program Grant (MHSMP) <u>Combined Application</u>

Thoroughly read the TAP and MHSMP application guidebooks before you begin your application. It includes important program information and step-by-step instructions. Pay particular attention to the application process requirements. **Applications are due by e-mail by December 8, 2023.** Please e-mail the completed application to: Ross.gouin@vermont.gov and Scott.robertson@vermont.gov.

West and East Basin	802 524 7589 ext:109
(Project Name/Title)	(Phone)
July Medina-Triana	j.medina-triana@stalbanstown.com
(Municipality contact person responsible	(e-mail address)
for the management of this project)	A coops
C :	\$ 60000
Saint Albans Town	Amount of <u>Federal Funds requested</u> (no more
(Town)	than 80% of the project cost estimate).
05478	\$15,000
(Zip Code)	Amount of Local Match. Example:
	Federal Award = \$600,000 (80% of total)
398 Georgia Shore Road	Local Match = \$150,000 (20% of total)
(Mailing Address)	Total Project Cost = \$750,000 (100% of the total)
County: Franklin Town/Village/City: Saint Albans Town	
Specific location, street, or road: St Albans State	e Hwy-SASH and route 104
Regional Planning Commission: Northwest Regi	onal Planning Commission
If a linear project, what is the length in feet? Cli	ick here to enter text.
	ntation that you have notified the VTrans District ent to apply for TA funding and have provided them
Project type being applied for: \Box	Scoping Design/Construction

The municipality understands that will take roughly three years (min. pointed out in the TAP and MHSM) in the Design and R	OW phases prior	-		_	
Does this project have a previously	y completed scoping	or feasibility stud	dy?		Yes ⊠	No □
Note: Attach a map(s) of the project area benefits from the proposed improdowntown, village or growth center boundary of the designated area.	vement. If the projecter, clearly indicate th	ct is within or ad e relationship of	acent to a	a design osed pro	<u>ated</u>	
Fiscal Information:						
Accounting System	Automated \square	Manual \square	Combi	nation∑		
SAM Unique Identifier # JNW	VNJMVKDZZ9					
Fiscal Year End Month JUNE						
Property Ownership:						
If the proposed project is on private purchase, easement, or eminent define "Uniform Act", then the munical acquire the rights to construct the	lomain (includes tem cipality is committed	porary construct to exercising its I	ion rights right of <i>en</i>) in acco	rdance w	vith o
	project ii necessury.		'		140 _	_
Funding: Does this project already have exist Click here to enter text.	sting funding? If so, p	olease describe.	,	∕es □	No ⊠	
Please note that existing projects of clearance and ROW clearance. Pleace Click here to enter text.			•	thout a	current N	NEPA
Will you accept an award less than	you applied for?		,	∕es ⊠	No □	
 If yes, please indicate whe scope will be reduced. If t (please be specific) you wo Click here to enter text. 	he project scope is to	be reduced, de	-		-	-
A support letter from the governi acknowledgement and source of t for construction projects is require support attached?	he local match and co	ommitment to fu	ture mair	ntenance	e respons	•
	-					

Regional Planning Commission Letter of Support:

In order to apply, the project must have a letter of support from the regional planning commission. Is a letter of support attached?

Yes \boxtimes No \square

<u>PLEASE NOTE</u>: If this application is for <u>salt or sand shed funding</u>, the applicant must read and understand the <u>Municipal Assistance Section Salt Shed Application Guide</u>. All of the following scoring questions below must thoroughly convey an understanding of the salt and sand guidance provided.

Application Scoring Criteria:

Please give a brief description of the project (be sure to indicate the primary facility type being applied for and be concise).
 (10 points max.)

Saint Albans Town and VTrans would like to begin implementing two projects in the Rugg Brook Flow Restoration Plan. These two projects would be for **design** only at this time;

The East Basin is in a privately owned open space, located between Rugg Brook, the northwest corner of Fairfax Road, and the SASH, which is a candidate site for implementation of a new stormwater detention basin (RuggBrook FRP, pag 29).

The Access Road (SASH) West Basin would be located along the northern (westbound) side of a section of the SASH. The BMP was designed as a median sand filter which would collect drainage from the roadway and the upslope field, before draining to a culvert under the SASH. The BMP could be designed to provide CPv storage as well as water quality treatment (RuggBrook FRP, pag 28).

2. What is the feasibility of this project? Feasibility (or Scoping) study applications will not be scored on this criterion. Also, please describe the extent of project development to date. (10 points max.)

For the East Basin, a stone bed and micro pool is proposed to improve water quality benefits of the project. The proposed basin would collect and store drainage from a segment of an existing mapped tributary, which takes drainage from an expired permit site (#1-1428), a segment of I-89, and a large area of the upper watershed east of I-89 (RuggBrook FRP, pag 29).

The West Basin would be located within the V-Trans ROW, but has potential for cost-sharing with the Town, as the BMP would treat drainage from privately owned land, and cropland within the Town. Additionally, a portion of the highway which currently drains to the Tanglewood subdivision basin, under expired permit #1-0908, would drain to the proposed BMP (RuggBrook FRP, pag 28).

Does this project address a need identified in a local or regional planning document? If so, please describe.
 (5 points max.)

The two projects are found in the document **Rugg Brook Flow Restoration Plan-MS4**, and was prepared to meet the compliance requirement for the National Pollutant Discharge Elimination System General Permit 3-9014 (Vermont Department of Environmental Conservation 2012) for stormwater discharges to impaired waters for Rugg Brook impervious surface owners: the City of St. Albans and the Town of St. Albans (**RuggBrook FRP, pag 5**).

- 4. Does this project:
 - A. Benefit a State Designated Center per the link below (i.e., downtowns, villages, or neighborhood growth centers recognized by the Vermont Department of Economic, Housing and Community Development?

<u>Not applicable for Environmental Mitigation Categories</u> (5 points max.) http://maps.vermont.gov/ACCD/PlanningAtlas/index.html?viewer=PlanningAtlas

The two projects will benefit all the neighborhood area around the SASH. The goal of these two projects is to make a significant contribution to the flow target in the watershed. The two basins could be designed to provide CPv storage as well as water quality treatment. Additionally, a portion of the highway which currently drains to the Tanglewood subdivision basin, under expired permit #1-0908, would drain to the proposed East and West Basins(RuggBrook FRP, pag 29).

- B. Benefit mobility for disadvantaged populations to include elderly, disabled, minorities, and low-income residents. Please describe this impact (if applicable) in detail. Supporting documentation, including recent data must be included.
 Not applicable for Environmental Mitigation Categories (10 points max.)
 Click here to enter text.
- Provide a project cost estimate below (project costs below include both federal dollars and local dollars). Projects will be scored based on whether the cost appears realistic for the size and scope of the project. For scoping studies, use PE and Local Project Management lines only.

Note: If you are applying for additional funds for an existing project, show the amount being requested for this grant in the PE, ROW, Construction, Construction Engineering, and Municipal Project Management rows below. Also, be clear regarding total project cost and other funding amounts and sources in the additional funding comments box below. (10 points max.)

Preliminary Engineering (PE)	
(Engineering, Surveying, Permitting)	\$ <mark>75000</mark>
211. 6 / 12. 12. (22.11)	
Right-of-way / Acquisition (ROW)	
(appraisals, land acquisition and legal fees)	\$ Click here to enter value

Construction (construction costs with reasonable contingency)	\$ Click here to enter value
Construction Engineering (cost to provide inspection during construction)	\$ Click here to enter value
Municipal Project Management Costs (minimum of 10% of total PE, ROW and Construction Phases).	\$ Click here to enter value

Total Project Cost \$75,000.00

Addition Funding Comments: (ex. Total and additional funding for existing projects)

This application is for design only. Once we have a revised design and cost estimate, a determination of how to fund the construction of the project can be completed.

- 6. Select the eligibility category below (A, B, C or D) that best fits your project and answer the corresponding questions for that category (choose only one category). 10 bonus points will be awarded to projects that are primarily Bicycle or Pedestrian facilities.
 - ☐ A. Bicycle and Pedestrian Facilities (includes Safe Routes for Non-Drivers and Conversion of abandoned railroad corridors.
 - (i) Will the project contribute to a system of pedestrian and/or bicycle facilities? (10 points max.)

Click here to enter text.

- (ii) Will the project provide access to likely generators of pedestrian and/or bicyclist activity? (10 points max.)Click here to enter text.
- (iii) Will the project address a known, documented safety concern? (10 points max.) Click here to enter text.

 B. Community Improvement Activiti 	ement Activities:] в. с	Community	Improvement	Activities
---	-------------------	--	--------	-----------	-------------	------------

i. Explain how the project improves the economic wellbeing of the community and/or provide a benefit to state tourism? (10 points max.)

Click here to enter text.

ii. Describe the anticipated impact to the public; degree of visibility, public exposure and/or public use. (10 points max.)

Click here to enter text.

- iii. Answer only one of the following based on the type of project:
- a) Construction of turnouts, overlooks, and viewing areas as related to scenic or historic sites. *To what extent will the project provide a view of a highly unique and scenic area?*
- b) (10 points max.)

Click here to enter text.

c) Preservation or rehabilitation of historic transportation facilities. *Describe the historic significance of the historic transportation facility and the importance of the facility to the state.* **(10 points max.)**

Click here to enter text.

d) Archeological planning and research related to impacts from a transportation project.
 Describe the associated transportation project and benefit of the proposed activities.
 (10 points max.)

Click here to enter text.

e) Vegetation management in transportation rights of way to improve roadway safety, prevent invasive species, and provide erosion control. *Describe the extent of the current problem and the impact on the site and surrounding area.* (10 points max.)

Click here to enter text.

☑ C. Environmental Mitigation Activity Related to Stormwater and Highways (Including Salt and Sand Sheds)

i. Please describe how this application provides environmental mitigation relating to stormwater and highways. (10 points max.)

The East and West Basin Projects of the FRP are located in the upper reaches of the watershed, and must be completed prior to the necessary downstream projects, such as the Gricebrook, SATEC, and Tanglewood Projects. These two projects will benefit the watershed and residential areas, as the Town, City and VTrans implement stormwater best management practices (BMPs) throughout the watershed in an effort to return Rugg Brook to an unimpaired condition.

ii. What information or data is provided to substantiate the current stormwater problem and associated environmental impacts? (10 points max.)

V-Trans constructed the St. Albans State Highway (SASH) in the sixties and incorporated ditches, catch basins, and culverts. Over time, residences, schools, and communities developed around the SASH, causing additional challenges for the area's stormwater drainage. Floods have occurred in Tanglewood, Grice Brook, and the middle school, as a result of water flowing from the I-89 into the SASH. Meetings have been held by the Town of Saint Albans, the City of Saint Albans, and V-Trans, to identify the major issues facing the area and begin developing solutions. One of the options was sketched out in the Rugg Brook FRP-MS4; the two basins are going to help with upcoming construction projects in this area by collecting runoff from I-89 and the SASH, prior to the stormwater discharging to other areas down gradient.

iii. What substantiating data or information is provided to show that the proposed application is an effective and maintainable solution to the problem? (10 points max.)

Click here to enter text.

The proposed basins would collect and store drainage from a segment of an existing mapped tributary which takes drainage from an expired permit site (#1-1428), a segment of I-89, and a large area of the upper watershed east of I-89. Additionally, a portion of the highway which currently drains to the Tanglewood subdivision basin, under expired permit #1-0908, would drain to the proposed basins (East and West) (RuggBrook FRP, pag 29).

☐ D. Environmental Mitigation Activity Related to Wildlife

 Please describe how this application will reduce vehicle-caused wildlife mortality or will restore and maintain connectivity among terrestrial or aquatic habitats. (10 points max.) Click here to enter text.

- ii. What information or data is provided to substantiate the current problem and associated environmental impacts? (10 points max.)
 Click here to enter text.
- iii. What substantiating data or information is provided to show that the proposed application is an effective and manageable solution to the problem? (10 points max.)

 Click here to enter text.

SELECTBOARD

Bryan DesLauriers, Chair Jack Brigham, Vice Chair Jonathan Giroux Brendan Deso Jeff Sanders

Anna Bourdon, Town Clerk Sean Adkins, Town Manager



P.O. Box 37 St. Albans Bay Vermont 05481

Phone 802-524-7589 Fax

802-524-5816 Website www.stalbanstown.com

December 4th, 2023

Scott Robertson, P.E. VTrans Municipal Assistance Bureau 219 North Main St. Barre, VT 05641

RE: VTrans Fall 2023 Transportation Alternatives (TAP) and Municipal Highway and Stormwater Mitigation Program Grant (MHSMP) – St. Albans State Highway (SASH) East Basin and West Basin

Mr. Robertson,

I am writing on behalf of the Town of St. Albans Selectboard. The Selectboard supports the application for the VTrans Fall 2023 Transportation Alternatives (TAP) and Municipal Highway and Stormwater Mitigation Program Grant (MHSMP). This grant will enable the Town of St. Albans to begin implementing the Flow Restoration Plan (FRP) at two locations near the SASH access in the Town of St. Albans.

The SASH East Basin is in a privately owned open space, located between Rugg Brook, the northwest corner of Fairfax Road, and the SASH, which is a candidate site for implementation of a new stormwater detention basin. The SASH West Basin would be located along the northern (westbound) side of a section of the SASH.

The Selectboard is committed to supporting 20% of the project cost with the other 80% coming from the VTrans Municipal Highways and Stormwater Mitigation Program. The Town of St. Albans is commitment to future maintenance responsibility for future construction projects.

Sincerely,

Sean Adkins, Town Manager

Town of St. Albans



November 28, 2023

Scott Robertson, P.E.

Municipal Assistance Bureau – Local Projects Group
Vermont Agency of Transportation
One National Life Drive
Montpelier, VT 05633-5001

Re: Letter of Support for St. Albans Town's Transportation Alternatives application (RCP Project)

Dear Mr. Robertson:

The Northwest Regional Planning Commission (NRPC) is pleased to support St. Albans Town's application to the Vermont Transportation Alternatives Program for a scoping study of two basins, RCP West and RCP East, located at the St Albans State Highway. This project perfectly encapsulates the objectives outlined in our regional plan concerning sustainable infrastructure development and environmental stewardship. This study is a critical step towards understanding and implementing effective stormwater management solutions. By focusing on innovative solutions for stormwater detention and quality treatment, this initiative not only promotes environmental sustainability but also enhances our transportation infrastructure's resilience.

Language in the regional plan includes the following:

Iliena

"Support efforts to bring in additional public and private resources to expand and upgrade infrastructure."

"Ensure the transportation network enhances residents' overall quality of life, supports regional land-use goals, and expands economic opportunities."

"Promote economic diversity in tourism, transportation, recreation, and agriculture to protect against negative economic impacts of climate change."

"Support the development of a telecommunications infrastructure that enhances employment and business opportunities."

"Ensure that new transportation facilities are designed with consideration for the people using the facilities and incorporate context-sensitive design feature

Thank you for considering our comments. Please feel free to call me if you have any questions or need additional information.

Sincerely,

Dean Pierce Senior Planner

RE: SASH-East and West Basin projects

Shepard, Daniel E < Daniel.E.Shepard@vermont.gov>

Fri 12/8/2023 11:17 AM

To:Hanson, Tyler <Tyler.Hanson@vermont.gov>;Quilliam, Jordan <Jordan.Quilliam@vermont.gov>
Cc:David Allerton <d.allerton@stalbanstown.com>;July Medina-Triana <j.medina-triana@stalbanstown.com>;Callahan, Jennifer <Jennifer.Callahan@vermont.gov>

I support the request.

Daniel Shepard
Transportation General Manager
District 5 Colchester, VT
802-343-1699

<u>Daniel.e.Shepard@vermont.gov</u>

http://vtrans.vermont.gov

Help raise money for Vermonters impacted by flood damage and show your Vermont pride with Vermont Strong and Tough Too license plates and socks. Click here to purchase your Vermont Strong gear or visit DMV.Vermont.gov/VermontStrong23.

Impacted Vermonters can find resources and referrals by visiting Vermont.Gov/Flood.

From: Hanson, Tyler <Tyler.Hanson@vermont.gov>

Sent: Friday, December 8, 2023 10:57 AM

To: Quilliam, Jordan < Jordan.Quilliam@vermont.gov>; Shepard, Daniel E < Daniel.E.Shepard@vermont.gov> **Cc:** David Allerton < d.allerton@stalbanstown.com>; j.medina-triana < j.medina-triana@stalbanstown.com>;

Callahan, Jennifer < Jennifer. Callahan@vermont.gov> **Subject:** RE: SASH-East and West Basin projects

Hey Dan,

The town of St. Albans is seeking funding for a project withing the VTrans ROW. The funding is for design only at this point. My group plans to coordinate on a project in this area anyway but this will allow for further assessment of the site for better suiting the needs of the surrounding area. I am happy to help answer any questions about the project. Do you support this work for further scoping and assessment of the area for stormwater considerations?

Thank you

Tyler Hanson | Stormwater Technician
Pollution Prevention & Compliance Section | Water Quality Unit
Maintenance Bureau | Technical Services
District Maintenance & Fleet Division
Vermont Agency of Transportation
1-802-461-6440 | tyler.hanson@vermont.gov
https://vtrans.vermont.gov/



From: Hanson, Tyler

Sent: Thursday, December 7, 2023 11:04 AM

To: Quilliam, Jordan < Jordan.Quilliam@vermont.gov>

Cc: David Allerton < d.allerton@stalbanstown.com >; July Medina-Triana < j.medina-triana@stalbanstown.com >;

Callahan, Jennifer < Jennifer < Jennifer.Callahan@vermont.gov > Subject: RE: SASH-East and West Basin projects

Hey Jordan,

Below is an email chain between myself and the town of St. Albans. They are planning to submit for funding to do a design study for drainage improvements adjacent to the SASH and partially in the state ROW. This project will help us meet our flow restoration plan target and potentially our phosphorus control plan target.

Part of the funding application requires that they let the district DTA know about the application and get support. The application is due **tomorrow** so you're approval would be appreciated. This funding would be for design only at this point. I am happy to help answer any questions about the project.

Thank you

Tyler Hanson | Stormwater Technician
Pollution Prevention & Compliance Section | Water Quality Unit
Maintenance Bureau | Technical Services
District Maintenance & Fleet Division
Vermont Agency of Transportation
1-802-461-6440 | tyler.hanson@vermont.gov
https://vtrans.vermont.gov/



From: July Medina-Triana < j.medina-triana@stalbanstown.com>

Sent: Thursday, December 7, 2023 10:56 AM

To: Hanson, Tyler < Tyler. Hanson@vermont.gov >; Callahan, Jennifer < Jennifer. Callahan@vermont.gov >

Cc: David Allerton < <u>d.allerton@stalbanstown.com</u>> **Subject:** Re: SASH-East and West Basin projects

Some people who received this message don't often get email from <u>j.medina-triana@stalbanstown.com</u>. <u>Learn why this is important</u>

EXTERNAL SENDER: Do not open attachments or click on links unless you recognize and trust the sender. HI Tyler,

Before send the application, we need this from Vtrans, can you please help me with this.. the Deadline is tomorrow so I may this ASAP...I apologies for the inconvenience..

Required Notification to VTrans District Transportation Administrator – Projects located in or adjacent to a State maintained Right-of-way must submit a description of the project and/or plans to the District Transportation Administrator (DTA) in your region. The DTA oversees maintenance of the state highway system in their district. A copy of your correspondence to the DTA should be attached to your application. See appendix for a list and contact information for the DTA in your region.

thanks

Stormwater Coordinator

Town of St. Albans Vt.

Office 802-524-7589 ext. 109

j.medina-triana@stalbanstown.com



From: July Medina-Triana < j.medina-triana@stalbanstown.com >

Sent: Wednesday, December 6, 2023 11:40 AM

To: Hanson, Tyler < Tyler. Hanson@vermont.gov >; Callahan, Jennifer < Jennifer. Callahan@vermont.gov >

Cc: David Allerton < <u>d.allerton@stalbanstown.com</u>> **Subject:** Re: SASH-East and West Basin projects

hi Tyler,

Thanks for the input. It is for design; I just specified that part on the application form now... There is something else that should aware or change?

thank you,

July Medina T,

Stormwater Coordinator

Town of St. Albans Vt.

Office 802-524-7589 ext. 109

j.medina-triana@stalbanstown.com



From: Hanson, Tyler < Tyler. Hanson@vermont.gov > Sent: Wednesday, December 6, 2023 10:16 AM

To: July Medina-Triana < j.medina-triana@stalbanstown.com >; Callahan, Jennifer

<Jennifer.Callahan@vermont.gov>

Cc: David Allerton < <u>d.allerton@stalbanstown.com</u>> **Subject:** RE: SASH-East and West Basin projects

Hey July,

Thank you for putting this together. Just so understand. Is this for an assessment of the site or is it for construction of the site? The application makes it seem like it is for construction.

Thanks

Tyler Hanson | Stormwater Technician

Pollution Prevention & Compliance Section | Water Quality Unit

Maintenance Bureau | Technical Services

District Maintenance & Fleet Division

Vermont Agency of Transportation

1-802-461-6440 | tyler.hanson@vermont.gov

https://vtrans.vermont.gov/



From: July Medina-Triana < j.medina-triana@stalbanstown.com >

Sent: Monday, December 4, 2023 4:01 PM

To: Callahan, Jennifer < <u>Jennifer.Callahan@vermont.gov</u>>; Hanson, Tyler < <u>Tyler.Hanson@vermont.gov</u>>

Cc: David Allerton < <u>d.allerton@stalbanstown.com</u>> **Subject:** Re: SASH-East and West Basin projects

EXTERNAL SENDER: Do not open attachments or click on links unless you recognize and trust the sender.

Hi Jen and Tyler,

This is a draft of the application we want to apply, can you please review and let me know if you have any questions, add something or suggest anything. The Due is on December 8. Let me know as soon as possible..

have good day,

July

July Medina T,

Stormwater Coordinator

Town of St. Albans Vt.

Office 802-524-7589 ext. 109

j.medina-triana@stalbanstown.com



From: Callahan, Jennifer < <u>Jennifer.Callahan@vermont.gov</u>>

Sent: Monday, December 4, 2023 11:00 AM

To: July Medina-Triana < <u>i.medina-triana@stalbanstown.com</u>>; Hanson, Tyler

<<u>Tyler.Hanson@vermont.gov</u>>

Cc: David Allerton < <u>d.allerton@stalbanstown.com</u>> **Subject:** RE: SASH-East and West Basin projects

Hi July, I believe the project is planned for 2026/27. We'd be happy to coordinate with you on a scoping study. I've added Tyler Hanson to this email, he should be your primary contact for this project. Let us know if you need anything from us.

From: July Medina-Triana < j.medina-triana@stalbanstown.com >

Sent: Thursday, November 30, 2023 11:02 AM

To: Callahan, Jennifer < <u>Jennifer.Callahan@vermont.gov</u>> **Cc:** David Allerton < <u>d.allerton@stalbanstown.com</u>>

Subject: SASH-East and West Basin projects

EXTERNAL SENDER: Do not open attachments or click on links unless you recognize and trust the sender.

Hi Jenn,

We would like to know about V-Trans schedule related to the two projects we were talking about last meeting, with the problem with the SASH and all the areas in Tanglewood (East and West Basin). We want to apply for the Grant "Transportation Alternative Program" for the scoping study for those two sites. However, because this is on the V-Trans ROW and the Town, we want to know if we can coordinate with you, so those two projects can move forward next year.

best,

July Medina T,

Stormwater Coordinator

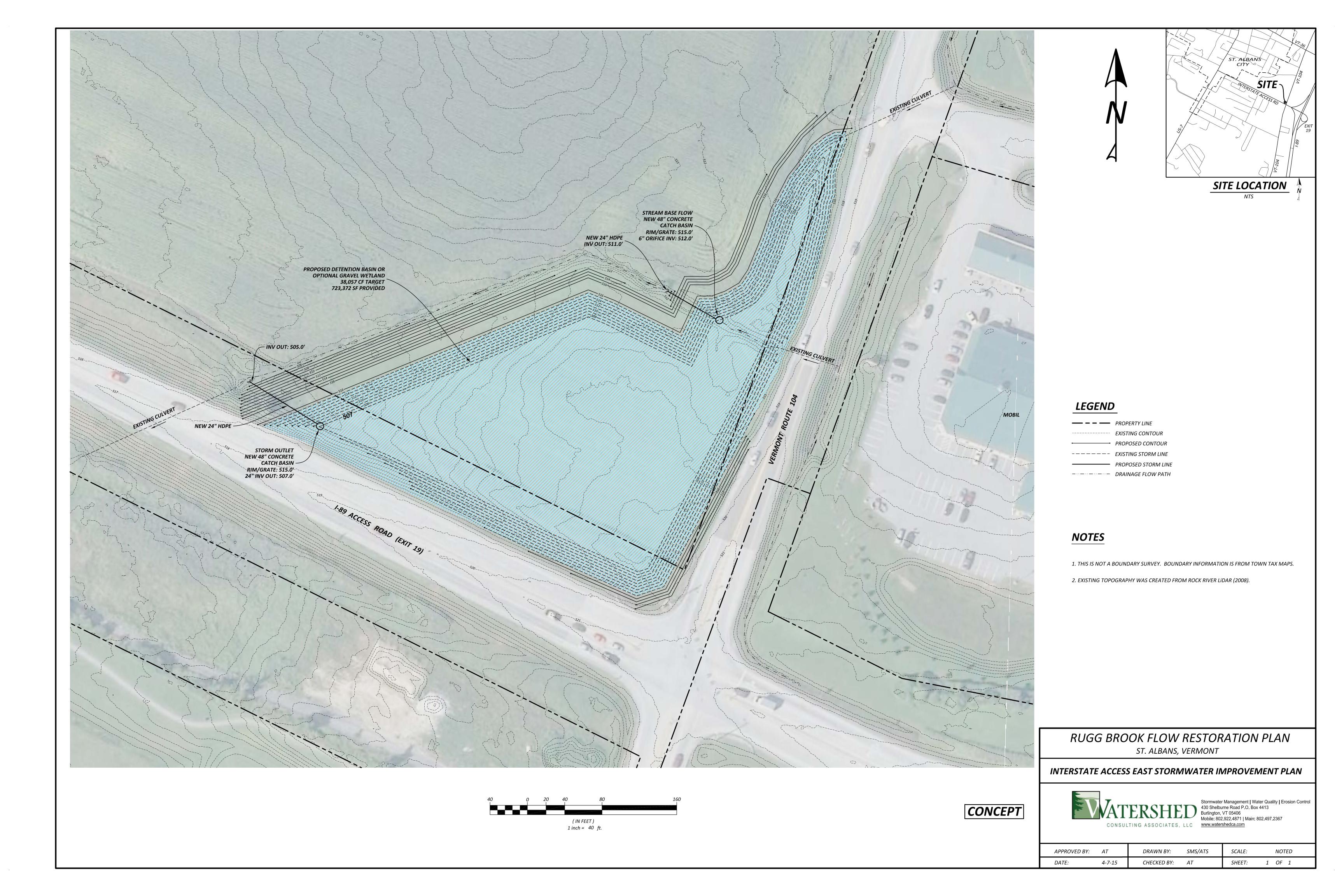
Town of St. Albans Vt.

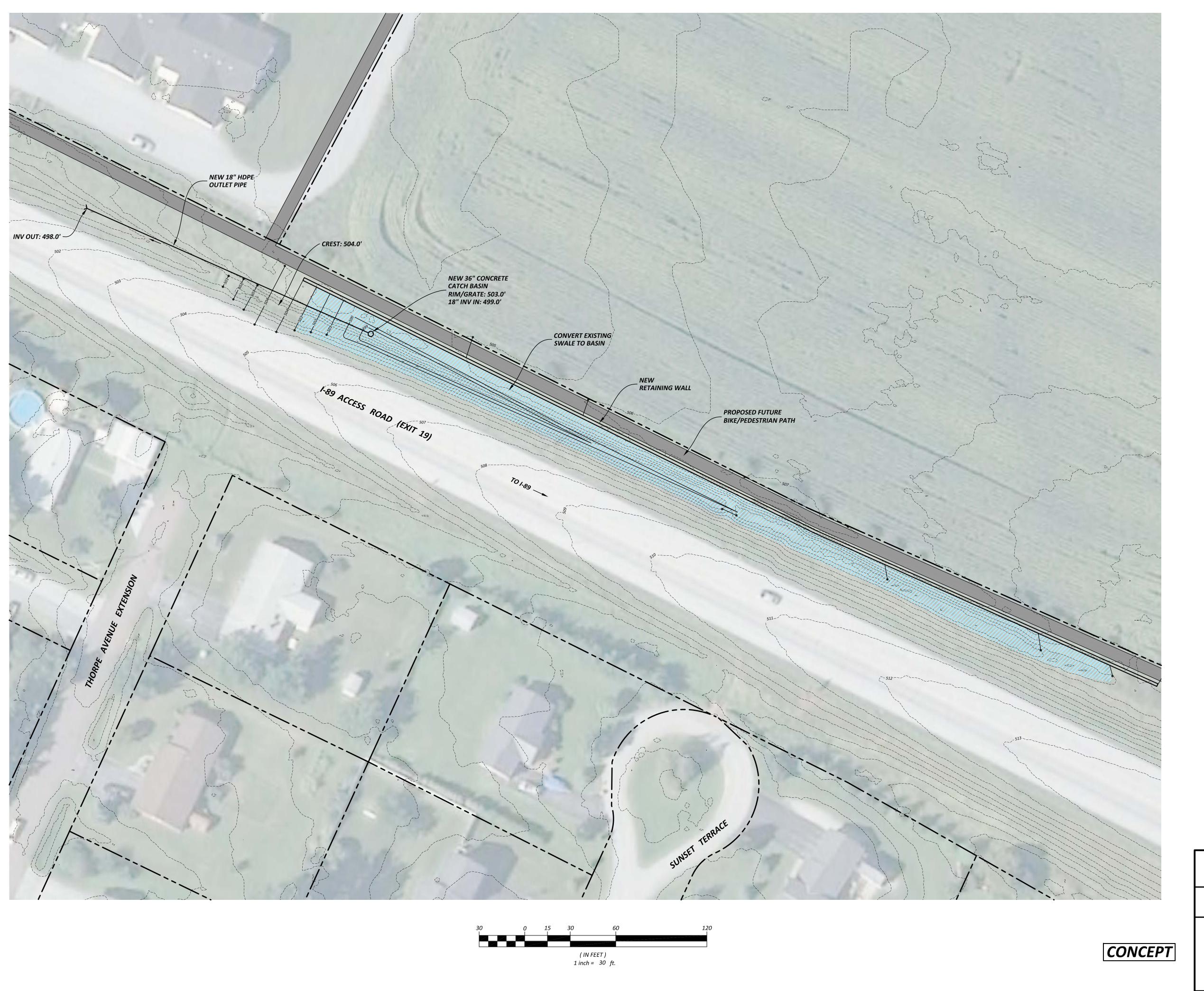
Office 802-524-7589 ext. 109

j.medina-triana@stalbanstown.com

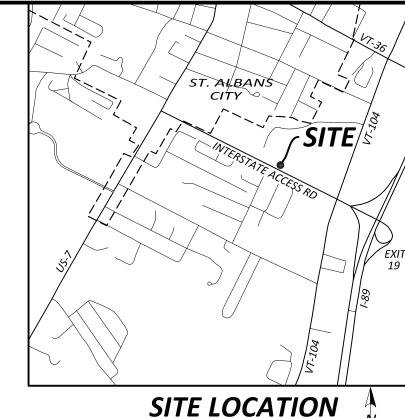












SITE LOCATION

NTS

LEGEND

— — — PROPERTY LINE ----- EXISTING CONTOUR PROPOSED CONTOUR

NOTES

- 1. THIS IS NOT A BOUNDARY SURVEY. BOUNDARY INFORMATION IS FROM TOWN TAX MAPS.
- 2. EXISTING TOPOGRAPHY WAS CREATED FROM CHITTENDEN COUNTY LIDAR (2004).

RUGG BROOK FLOW RESTORATION PLAN

ST. ALBANS, VERMONT

INTERSTATE ACCESS WEST STORMWATER IMPROVEMENT PLAN



APPROVED BY:	AT	DRAWN BY:	SMS/ATS	SCALE:	NOTED
DATE:	3-25-15	CHECKED BY:	AT	SHEET:	1 OF 1

Land Owner: VIRANS/Town-Private Contributing IMIS4: VIRANS. Town



۸	ccess	DY	Fact
н	CCESS	Ru.	EdSL

Percent Cost Allocation

Potential Cost Share

Project Cost Estimate:	\$ 394,594.44	
	VTRANS	Town
Runoff Volume 1-Yr (acft)	0.94	1.86
Percent Flow	34%	66%
Impervious Acres	6.38	3.44
Percent Impervious	65%	35%

Use

49%

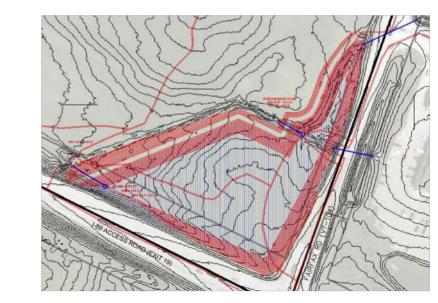
50%

197,297.22 \$

51%

50%

197,297.22

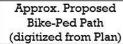




Access Rd. West

Land Owner: VIRANS Contributing MS4: VIRANS, Town







Access Rd. West		
Project Cost Estimate:	\$ 79,634.10	
	VTRANS	Town
Runoff Volume 1-Yr (acft)	0.09	0.77
Percent Flow	11%	89%
Impervious Acres	0.58	0
Percent Impervious	100%	*
Percent Cost Allocation	55%	45%
Use	50%	50%
Cost Share	\$ 39,817.05	\$ 39,817.05

*While 100% of the impervious is owned by VTRANS, the ag field will likely contribute Phosphorus therefore the Town was allocated a cost share based on the flow



Access East Opinion of Probable Construction Cost (30% Design) As of April 15, 2015

	1			Estimated	1]					Total Cost (EN	_ T	otal Cost (ENR
n #		RS Means Item	Description	Quantity	Unit	Material	Labor	Ec	quipment	Unit Cost	9900) ⁽¹⁾		10000) ⁽²⁾
ONSTRUCT						•							
1	203.15		Excavation	22,640			\$ 5.0		7.00	\$ 12.00			274,424
2	204.25		Structure Excavation		CY	\$ -	\$ 5.0		15.00	\$ 20.00			1,21
3	204.30		Granular Backfill for Structures	40		\$ 22.00	\$ 5.0		7.00	\$ 34.00			1,373
4	601.092		CPEP (24")	160		\$ 22.00	\$ 16.0		14.00	\$ 52.00			8,404
5			3/4" Crushed Stone under Pipe		CY	\$ 18.00	\$ 5.0		7.00	\$ 30.00			1,818
6	604.20		4' Dia. Precast Reinforced Concrete Catch Basin with Cast Iron Cover		VF	\$ 400.00	\$ 40.0	0 \$	75.00	\$ 515.00			6,242
7	620.12		Chain-Link Fence, 6 Feet	2,500		4 =		_		\$ 18.37			46,38
8	635.11		Mobilization/Demobilization		LS	\$ 5,000.00		_		\$ 5,000.00 \$ 3,500.00			5,050
40	641.10		Traffic Control		LS	\$ 3,500.00	ć 2.	^		,		_	3,53
10	649.51		Geotextile for Silt Fence	140		\$ 2.50	\$ 2.5	_		\$ 5.00 \$ 10.00			70
11	651.15		Seed	130		\$ 5.00 \$ 5.00	\$ 5.0 \$ 5.0		2.00	\$ 10.00 \$ 12.00			1,31
	651.28		Hydraulic Mulch		Gal				2.00	•			60
13	651.35		Topsoil	850		7	\$ 10.0	0 \$	5.00	7			34,343
14 15	652.10 652.20		Erosion Prevention Sediment Control Plan		LS HR	\$ 1,500.00	ć (0./	_		\$ 1,500.00 \$ 60.00			1,51
	652.20		Monitoring Erosion Prevention Sediment Control Plan			ć 500.00	\$ 60.0	U					50
16			Maintenance of EPSCP		LS	\$ 500.00	ć 5.	0 6	7.00				
17 18	653.35		Vehicle Tracking Pad	150		\$ 30.00	\$ 5.0		7.00	\$ 42.00 \$ 2.00	,		6,36
19	653.55		Project Demarcation Fence Bonds (2.0%)	2,500	LF	\$ 1.00	\$ 1.0	U		\$ 2.00 \$ 7,909.30			5,05 7,98
CONSTRUCT	TION CONTINGEN	CY	Construction Contingency (15%)	1						\$ 61,500.00		\$	61,50
	TION CONTINGEN	СУ	Construction Contingency (15%)	1					SUBT	\$ 61,500.00	•		61,500 61,500
1	TION CONTINGEN		Construction Contingency (15%)	1					SUBT		•		
1			Construction Contingency (15%) Final Design and Permitting (excluding geotechnical)	1				T	SUBT		ION CONTINGENC		61,50
1				1 1 0					SUBT	OTAL CONSTRUCT	ION CONTINGENC		-
1 FINAL DESIG			Final Design and Permitting (excluding geotechnical)	1 1						* 30,240.00	ION CONTINGENC	r: \$	61,50
FINAL DESIG		3)	Final Design and Permitting (excluding geotechnical) Geotechnical	1 0						\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE:	ION CONTINGENC	f: \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	30,24
FINAL DESIG	IGN ENGINEERING ⁽	3)	Final Design and Permitting (excluding geotechnical)	1 1						\$ 30,240.00 \$ 4,100.00	ION CONTINGENC	r: \$	61,50 30,24 30,24
FINAL DESIC	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical	1 0					SI	\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE:	ION CONTINGENC	f: \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	30,24 30,24 55,44
FINAL DESIGNATION OF THE PROPERTY OF THE PROPE	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering	1 0					SI	\$ 30,240.00 \$ 4,100.00 BHOTAL FINAL DE: \$ 55,440.00	ION CONTINGENC	f: \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	61,50 30,24 30,24 55,44 55,44
FINAL DESIGNATION OF THE COST TO THE COST	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative	1 1					SI	\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE: \$ 55,440.00 CONSTRUCTION PH	ION CONTINGENC	f: \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	61,50 30,24 30,24 55,44 55,44
FINAL DESIGNATION OF THE COST	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE: \$ 55,440.00 CONSTRUCTION PH	ION CONTINGENC	f: \$ \$ \$ \$ \$ \$ \$ \$ \$ \$	55,44 55,44 2,05 6,15
FINAL DESIGNATION OF THE COST	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance Land Acquisition	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE: \$ 55,440.00 CONSTRUCTION PH \$ 2,050.00 \$ 6,150.00 \$ 120,000.00	ION CONTINGENCE GIGN ENGINEERIN HASE ENGINEERIN	\$ \$ \$ \$ \$ \$ \$ \$ \$ \$	55,44 55,44 56,15 6,15 240,00
FINAL DESIGNATION OF THE CONSTRUCT TO THE COST TO THE	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance Land Acquisition Legal	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 JBTOTAL FINAL DE: \$ 55,440.00 CONSTRUCTION PH \$ 2,050.00 \$ 6,150.00 \$ 120,000.00 \$ 6,150.00	ION CONTINGENC	S S S S S S S S S S	55,44 55,44 2,05 6,15
TI CONSTRUCT TI CO	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance Land Acquisition Legal Bond Vote Assistance	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 BHOTAL FINAL DE: \$ 55,440.00 CONSTRUCTION PH \$ 2,050.00 \$ 6,150.00 \$ 6,150.00 \$ 6,150.00 \$ 2,050.000	ION CONTINGENC	S S S S S S S S S S	55,44 55,44 56,15 240,00
FINAL DESIGNATION OF THE COST	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance Land Acquisition Legal	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 \$ 4,100.00 BETOTAL FINAL DES \$ 55,440.00 CONSTRUCTION PH \$ 2,050.00 \$ 6,150.00 \$ 120,000.00 \$ 1,50.00 \$ 2,050.000 \$ 10,250.000	ION CONTINGENCE GIGN ENGINEERIN HASE ENGINEERIN	S S S S S S S S S S	55,44 55,44 2,05 6,15 240,000 6,15
FINAL DESIGNATION OF THE COST	IGN ENGINEERING	3)	Final Design and Permitting (excluding geotechnical) Geotechnical Construction Phase Engineering Administrative Easement Assistance Land Acquisition Legal Bond Vote Assistance	1 1 1 1 1					SI	\$ 30,240.00 \$ 4,100.00 \$ 4,100.00 BETOTAL FINAL DES \$ 55,440.00 CONSTRUCTION PH \$ 2,050.00 \$ 6,150.00 \$ 120,000.00 \$ 1,50.00 \$ 2,050.000 \$ 10,250.000	ION CONTINGENC	S S S S S S S S S S	55,44 55,44 56,15 240,00

- Notes: 1. ENR 9900 = November 2014
- 2. ENR 10,000 = June 2015
- 3. Engineering costs for Final Design and Construction are based on the VT DEC Facilities Engineering Fee Curve Allowance

Access West Opinion of Probable Construction Cost (30% Design) As of April 22, 2015

П			I		Estimated	1	I	1					Total Cost (ENR	То	tal Cost (ENR
Item#	,	Vtrans Item	RS Means Item	Description	Quantity	Unit	Material	Labo	.	Equipment	Unit (Cost	9900)(1)		10000)(2)
	TRUCTION				.,,					-4			,		,
1		203.15		Excavation	1,480	CY		\$ 5.	00	\$ 7.00	\$	12.00	\$ 17,760.00	\$	17,939.39
2		204.25		Structure Excavation	30	CY	\$ -		_	\$ 15.00	\$	20.00	\$ 600.00	\$	606.06
3		204.30		Granular Backfill for Structures	20	CY	\$ 22.00	\$ 5.	00	\$ 7.00	\$	34.00	\$ 680.00	\$	686.87
4		601.092		CPEP (18")	205	LF	\$ 20.00	\$ 16.	00	\$ 14.00	\$	50.00	\$ 10,250.00	\$	10,353.54
5				3/4" Crushed Stone under Pipe	55	CY	\$ 18.00		00	\$ 7.00	\$	30.00	\$ 1,650.00	\$	1,666.67
6		604.20		4' Dia. Precast Reinforced Concrete Catch Basin with Cast Iron Cover	4	VF	\$ 400.00	\$ 40.	00	\$ 75.00	\$	515.00	\$ 2,060.00	\$	2,080.81
7		635.11		Mobilization/Demobilization	1	LS	\$ 5,000.00				\$	5,000.00	\$ 5,000.00	\$	5,050.51
8		641.10		Traffic Control	1	LS	\$ 3,500.00				\$	3,500.00	\$ 3,500.00	\$	3,535.35
9		649.51		Geotextile for Silt Fence	160		\$ 2.50		50		\$	5.00	\$ 800.00	\$	808.08
10		651.15		Seed	20		\$ 5.00		00	4 222	\$	10.00	\$ 200.00	\$	202.02
11 12		651.28 651.35		Hydraulic Mulch Topsoil	50 130	Gal	\$ 5.00 \$ 25.00		00	\$ 2.00 \$ 5.00	\$	12.00 40.00	\$ 600.00 \$ 5,200.00	\$	606.06 5,252.53
13		652.10		Erosion Prevention Sediment Control Plan	130	LS	\$ 25.00	\$ 10.	UU	\$ 5.00	Ś	1,500.00	\$ 5,200.00 \$ 1,500.00	è	1,515.15
14	-	652.20		Monitoring Erosion Prevention Sediment Control Plan		HR	\$ 1,500.00	\$ 60.	00		\$	60.00	\$ 1,300.00	ċ	606.06
15		652.30		Maintenance of EPSCP	10	LS	\$ 500.00	.00 ر	UU		Ś	500.00	\$ 500.00	Ş Š	505.05
16		653.35		Vehicle Tracking Pad	150	CY	\$ 30.00	\$ 5	00	\$ 7.00	\$	42.00	\$ 6,300.00	Ś	6,363.64
17	- t	653.55		Project Demarcation Fence	1,380	LF	\$ 1.00		00	y 7.00	\$	2.00	\$ 2,760.00	Ś	2,787.88
18		900.675		5' High Concrete Block Retaining Wall	350	SY	ÿ 1.00	y 1.	-		\$	300.00	\$ 105,000.00	Ś	106,060.61
19				Bonds (2.0%)		LS			1		Ś	1,199.20	\$ 1,199.20	Ś	1,211.31
II. CON	STRUCTION	CONTINGEN	ry									3081012	L CONSTRUCTION: USE:		167,837.58 170,000.00
1	JINOCHON	CONTINUEN	Ĭ	Construction Contingency (15%)	1		1	1			Ś	25,500.00		Ś	25,500.00
III. FINA	L DESIGN EI	NGINEERING ⁽	(3)							SUBT	TOTAL	L CONSTRUCTIO	ON CONTINGENCY:	\$	25,500.00
1				Final Design and Permitting (excluding geotechnical)	1						\$	13,680.00		\$	13,680.00
2				Geotechnical	C						\$	1,700.00		\$	-
IV CON	ISTRUCTION	N PHASE ENG	INFERING ⁽³⁾							SU	UBTO	TAL FINAL DESI	IGN ENGINEERING:	\$	13,680.00
1	31KOCHO!	TT TIASE ENG	INCERNING	Construction Phase Engineering	1 1	1	l	1	- 1		Ś	25,080.00	l	Ś	25,080.00
	,				1					SUBTOTAL	CONS		ASE ENGINEERING:	\$	25,080.00
v. othi	ER COSTS		1	Territoria.	1		1						1	I A	
1				Administrative	1	 		ļ			\$	850.00		\$	850.00
2				Easement Assistance	1 1	.		ļ			\$	2,550.00		\$	2,550.00
3				Land Acquisition	1	Acre		<u> </u>	+		\$	120,000.00 2,550.00		\$	2,550.00
4			1	Legal Bond Vote Assistance	+ 1	1		1	+		\$	850.000		\$	2,550.00
5			1	Short Term Interest	1	 		 	-+		\$	4,250.000		\$.
J	1			prote reminieres.	I			l	!		Ý	·	TAL OTHER COSTS:		5,950.00
		_						_				тот	AL PROJECT COST: USE:		240,210.00 250,000.00

- Notes: 1. ENR 9900 = November 2014
- 2. ENR 10,000 = June 2015
- 3. Engineering costs for Final Design and Construction are based on the VT DEC Facilities Engineering Fee Curve Allowance