



FY17 Vermont Better Roads Grant Application

Please complete this page ONCE and return with your Grant Category Application(s)

Town/Organization: Town of Sharon Contact Person(s): Tim Higgins, Road Foreman

Address: 69 VT132, Sharon, VT 05065

Email: roadcrew@sharonvt.net Phone: (802) 763 - 7194

DUNS #: 42916668 Fiscal Year End Month (MM): 6

Accounting System: Automated Manual Combination

Please use the suggested documentation checklist below to ensure that all of the relevant items regarding your application have been included.

- Grant application cover sheet (Only submit one)
- Grant application form (One per category/project)
- Itemized Cost estimate for labor, equipment, and materials (see enclosed Cost Estimate Worksheet). If applicable, please break down funding by source (i.e. different grant sources)
- Project Location Map (please show location of affected water)
- Sketch of proposed erosion control measures or other management practices, including distances in feet
 - Also show approximate location of town/other right-of-way and/or property lines
- Photo(s) of the project area
- Letters of Support (RPC, VTrans District Technical Staff, ANR Rivers and Streams Engineers, etc.)
- If Category C River/Road Conflict or Category D River/Stream Structure or Culvert, you must attach ANR/ACOE consultation



Vermont Better Roads Grant Program Application

Please complete one application per category and/or project you are applying for. You may make copies of the application for multiple applications per category and/or multiple categories.

Please check the Category you are applying for:

- B. Correction of a Road Related Erosion Problem and/or Stormwater Mitigation Retrofit for both gravel and paved roads
- C. Correction of a Stream Bank or Slope Related Problem
- D. Structure/culvert upgrades

Town/Organization: Town of Sharon

Project Name: Cross Road Culvert Replacements

Road Name: Cross Road TH #: 12 Structure # (if applicable): _____

Road Type: Unpaved Uncurbed

Class 3

Watershed: White Basin 9

Please provide a thorough description of the problem (ex. Roadway has steep slope with no ditch which is causing roadway erosion):

On Cross Road there are three culverts that need to be replaced. These culverts were subject to intense flooding and damage during Tropical Storm Irene in 2011 and are currently subject to smaller annual washouts from the Quation Brook.

Culvert #1: N43.820010 W -72.406461 24"x 40' corrugated steel

Culvert #3: N43.821647 W-72.406902 12"x 40' corrugated steel

Culvert #4: N43.822403 W-72.407756 15"x 40' corrugated plastic

Description of Project and how you plan to complete the work (ex. Stone line 500' of ditch by reshaping ditch and stone lining, working from the top of the project down to the bottom):

To prevent future washouts and erosion from undersized culverts, replace culvert #1 with a 36 inch by 40 foot corrugated plastic culvert. Replace culverts #3 and #4 with two 18 inch by 40 foot corrugated plastic culverts.

Expected Effects (+ & -) on water quality (ex. Erosion will be eliminated by placing the stone ditch):

The upgraded culverts will improve drainage and reduce road erosion.



Distance from end of project to nearest water (stream, lake, or stormwater system that outlets directly to water). 0-50'

Progress to Date:

The road crew continues to repair road wash outs as they occur.

Is there an emergency reason this project must be completed quickly? If yes, please explain:

No

Has this project been identified through a municipal road inventory, capital budget plan, tactical basin plan, culvert inventory, or other management plan? If yes, please list which.

Yes: 2014 culvert inventory and 2015 Town Hazard Mitigation Plan

No

Please list any professionals you may have contacted for assistance with this project (ANR River Management Engineer, Army Corps of Engineers, VTrans District Technical staff, Basin Planner etc.):
Todd Menees, ANR River Engineer

Is the project located in the town "Right of Way?" Yes, No, Both (if "Both" please explain further).

Yes

Will the town road crew complete this work? Yes, No, Some (if "some" please explain further).

Yes



Describe how the grant funds will be spent and/or attach a project budget:
Please see attached project budget.

How do you plan to meet the required 20% match on this grant?:

The Town will pay for 20% of the expenses, likely through paying the unpaid portion of force labor and equipment.

Requested Grant Amount (\$20,000 max Category B, \$40,000 max Categories C & D): \$ 6,191.00

Estimated Total Project Cost (including 20% local match): \$ 7,738.76

Estimated Completion Date: 12/31/2016

REQUIRED ATTACHMENTS:

- Itemized Cost Estimate (labor, equipment, materials)
(For assistance, call Better Backroads at 802-828-4585)
- Project Location Map
(Please show location of affected water; 1:12,000 USGS map, if possible)
- Sketch of proposed erosion control measures, including:
 - Distances (ft.)
 - Estimate of waste & borrow quantities
 - Approx. location of town/other right-of-way and/or property lines
- Photo(s) of the project area.
- Agreement for Entry and/or Deed of Easement (if project is outside Town ROW).
- If project involves stream or river/road conflict, include documentation of consultation with a River Management Engineer.
- Other appropriate supporting documents.

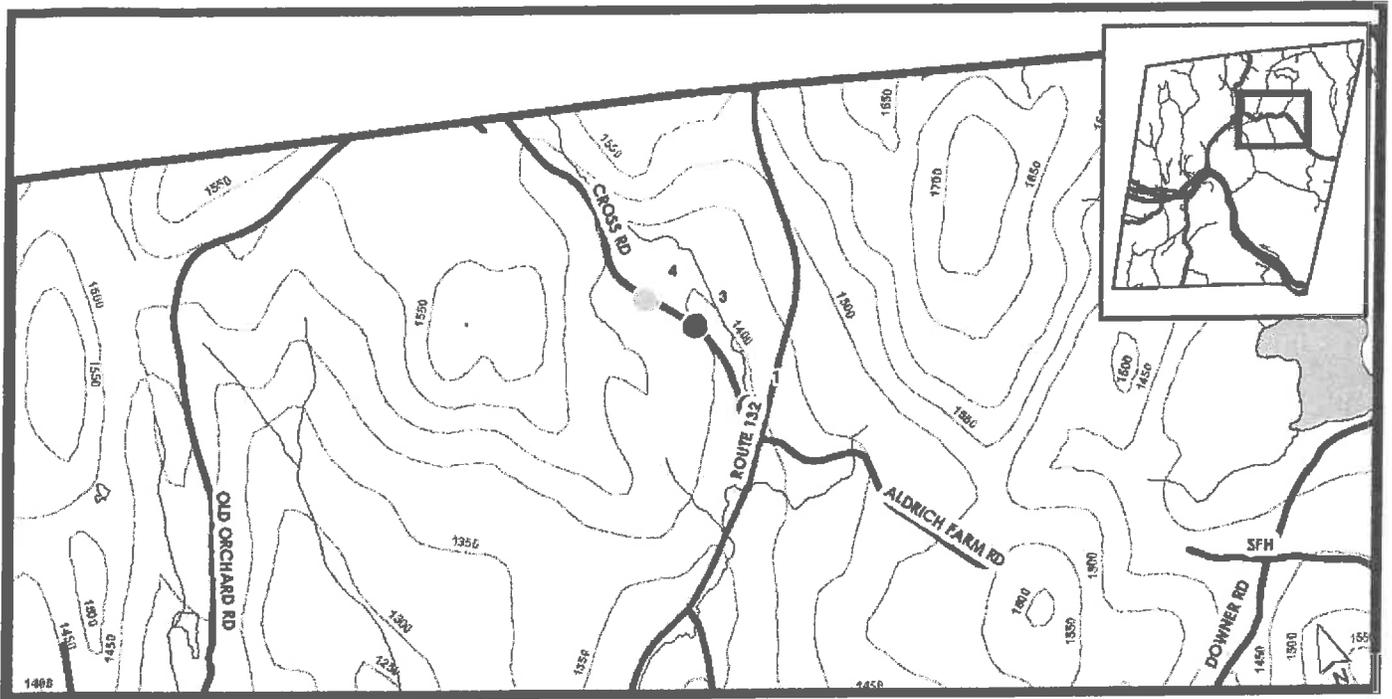
By signing this application I certify that all the information provided is accurate to the best of my knowledge. We will comply with all the requirements of the grant including making our books available for audit if required.

SIGNATURE OF APPLICANT: (Must be Town Administrator/Manager or Select Board Chair)

Name: *Kevin Blakeman*

Title: *Chair Select Board*

Site 1: Cross Road | Sharon

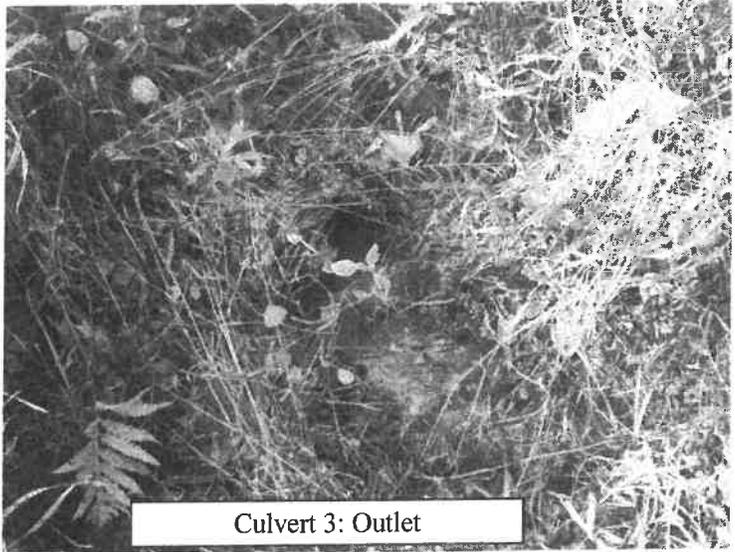


Culvert 1: Inlet



Culvert 1: Outlet

Site 1: Cross Road | Sharon



Site Description

On Cross Road there are three culverts that need to be replaced. These culverts were subject to intense flooding and damage during Tropical Storm Irene in 2011 and are currently subject to smaller annual washouts from the Quation Brook.

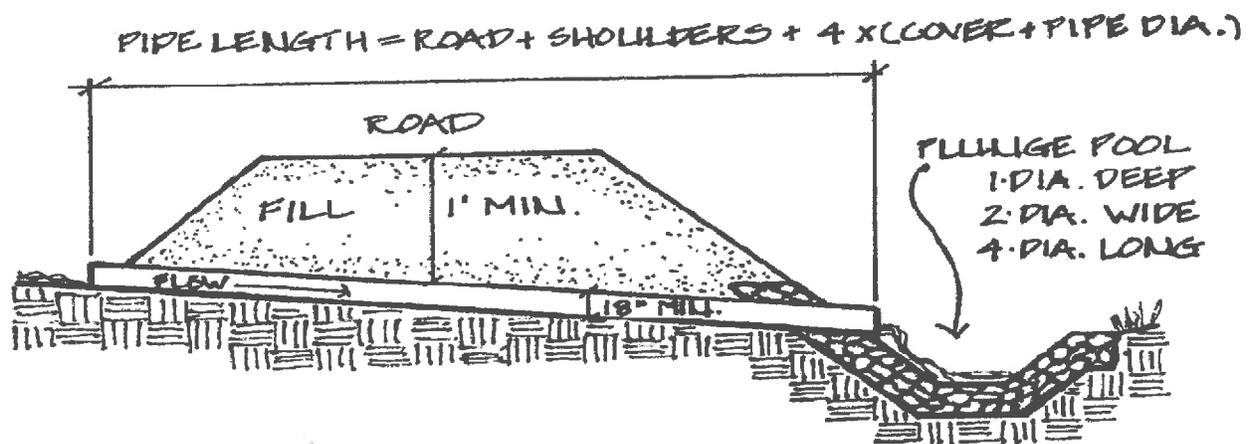
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Culvert #4: N43.822403 W-72.407756 15"x 40' corrugated plastic

Recommended Treatment

To prevent future washouts and erosion from undersized culverts, replace culvert #1 with a 36 inch by 40 foot corrugated plastic culvert. Replace culverts #3 and #4 with two 18 inch by 40 foot corrugated plastic culverts.



Permit Requirements - A VT DEC Stream Alteration Permit will be required for this project. Contact Todd Menees at (802) 345-3510.

Construction Notes:

- Construction Specifications - See specifications in Vermont Better Backroads Manual, 2009
- Buried Cable/Utilities - Buried cable/utilities may be on site. Call Dig Safe 1-888-DIG-SAFE to locate buried utilities prior to construction
- Crown roads $\frac{1}{2}$ to $\frac{3}{4}$ inch per linear foot after project installation and maintain there after (p. 5)
- Stabilize all disturbed soils with seed and mulch (p.33)

Site 1: Cross Road Sharon

Possible Funding Sources

- Better Backroads Grant
- VTrans Structures Grant
- Hazard Mitigation Grant Program

Cost Estimates for Treatment

	Quantity	Cost per Unit	Totals
18 inch plastic culvert (2)	40 linear feet	\$12.95/ft	\$1,036.00
36 inch plastic culvert	40 linear feet	\$40.40/ft	\$1,616.00
Rip Rap	6 yards	\$11.50/yd	\$ 69.00
Gravel	50 yards	\$11.60/yd	\$ 580.00
Backhoe	24 hours each	\$43.75/hr	\$1050.00
12yd Truck	16 hours total	\$71.50/hr	\$1144.00
3			
Town Labor (Benefitted Wage Rate)			
Supervisor	24 Hours	\$37.23/hr	\$ 893.52
Road Crew #1	24 Hours	\$28.00/hr	\$ 672.00
Road Crew #1	24 Hours	\$28.26/hr	\$ 678.24
TOTAL ESTIMATED PROJECT COST			\$ 7738.76

April 4, 2016

Mr. Tim Higgins
Town of Sharon
69 VT Route 132
Sharon, VT 05065

Dear Tim,

I am pleased to provide a letter of support for the Town of Sharon's application submission for a Category D Better Back Roads grant for the culvert replacements on Cross Road. I recall reviewing your culvert priorities and Cross Road culvert replacements were your top priority. These culvert replacements will reduce the erosion impacts on the roadway.

Please contact me if you have any questions.

Sincerely,



Rita Seto, AICP
Senior Planner

128 King Farm Rd.
Woodstock, VT 05091
802-457-3188
trorc.org

William B. Emmons, III, Chair
Peter G. Gregory, AICP, Executive Director

Sharon Selectboard

From: Sharon Selectboard [selectboard@sharonvt.net]
Sent: Tuesday, April 12, 2016 3:24 PM
To: roadcrew@sharonvt.net
Cc: 'Todd Menees (todd.menees@vermont.gov)'
Subject: FW: RESCHEDULE Todd Menees Inspection_Culverts on Cross Road_BBR Grant

He called back and asked to **reschedule for WEDNESDAY the 20th at 9:00AM** for the site visits. Todd will still come to the Town offices first.

4/20/16

Margy

From: Sharon Selectboard [mailto:selectboard@sharonvt.net]
Sent: Tuesday, April 12, 2016 3:20 PM
To: roadcrew@sharonvt.net
Cc: 'Rita Seto'
Subject: Todd Menees Inspection_Culverts on Cross Road_BBR Grant

April 12, 2016

Hi Tim:

Just received a call from Todd Menees. **He will be at Sharon Town Offices next Thursday, April 21 at 9:00AM** to meet you and then inspect culverts to be replaced on Cross Road. After inspections he will know whether or not a stream alteration permit will be needed.

Thanks,

Margy Becker

Administrative Assistant to Selectboard
Town of Sharon
P.O. Box 250
Sharon, VT 05065
802-763-8268

*Emails showing contact with
Todd Menees
and scheduled visit to site*

Sharon Selectboard

From: Sharon Selectboard [selectboard@sharonvt.net]
Sent: Wednesday, April 06, 2016 3:04 PM
To: 'Todd Menees (todd.menees@vermont.gov)'
Cc: 'financemgr@sharonvt.net'; roadcrew@sharonvt.net
Subject: FW: Better Back Road application_YOUR APPROVAL NEEDED Sharon VT
Attachments: Cross Road Sharon.pdf; CrossRoad.pdf; Sharon 2017 BBR CAT BCD FORM.pdf; Sharon 2017 BBR COST ESTIMATE FORM.pdf; Sharon 2017 BBR COVER FORM.pdf

Wednesday, April 06, 2016

Hi Todd:

Greetings again! Our Regional Planning Commission suggested the Town apply for a Better Back Roads Grant in order to **upsized 3 culverts which were comprised during Irene. Our TRORC contact is Rita Seto.**

The culverts are located on Cross Road (TH 12) along the Strafford Town Line WEST of Rte. 132. Rita Seto has given you the coordinates and vital information as attached.

I presume you need to issue Stream Alteration Permits? Can you give an indication NOW as to whether you can approve the **proposed upsizing**?

IF you need to call me during NOON hour or so – I will be here in the office tomorrow, April 7. Office closed Fridays. Back in Monday, April 11.

Thanks, Margy

*Initial contact with
Todd Menees by
Selectboard Admin Assistant
Margy Becker*

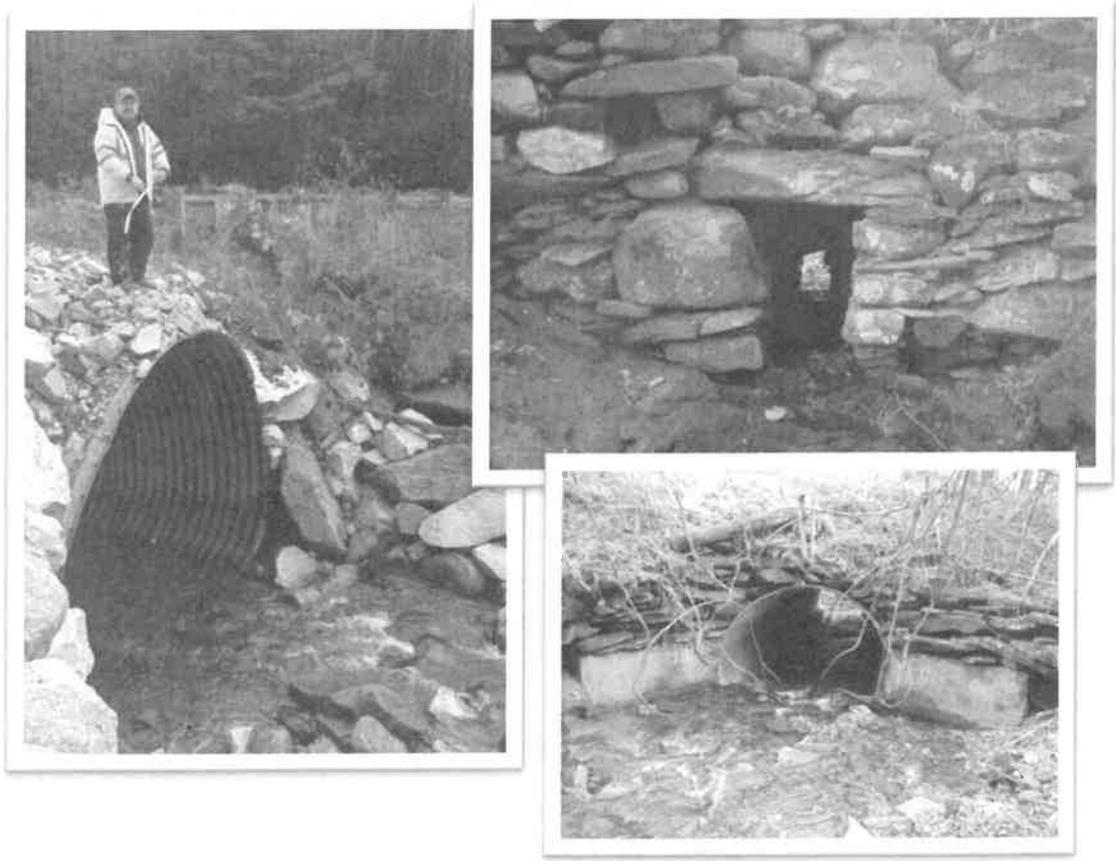
From: Deb Jones [mailto:financemgr@sharonvt.net]
Sent: Wednesday, March 23, 2016 10:09 AM
To: selectboard@sharonvt.net
Subject: FW: Better Back Road application

From: Sharon Road Crew [mailto:roadcrew@sharonvt.net]
Sent: Wednesday, March 23, 2016 7:09 AM
To: Deb Jones
Subject: FW: Better Back Road application

From: Rita Seto [mailto:rseto@trorc.org]
Sent: Tuesday, March 22, 2016 2:19 PM
To: Tim Higgins
Subject: Better Back Road application

Hi Tim,

TRORC Culvert Inventory Project 2015



Prepared by Rita Seto, AICP, Senior Planner



Funded by the Vermont Community Development Block Grant (CDBG) Disaster Recovery Planning Grant for the Two Rivers-Ottauquechee Region.

Introduction

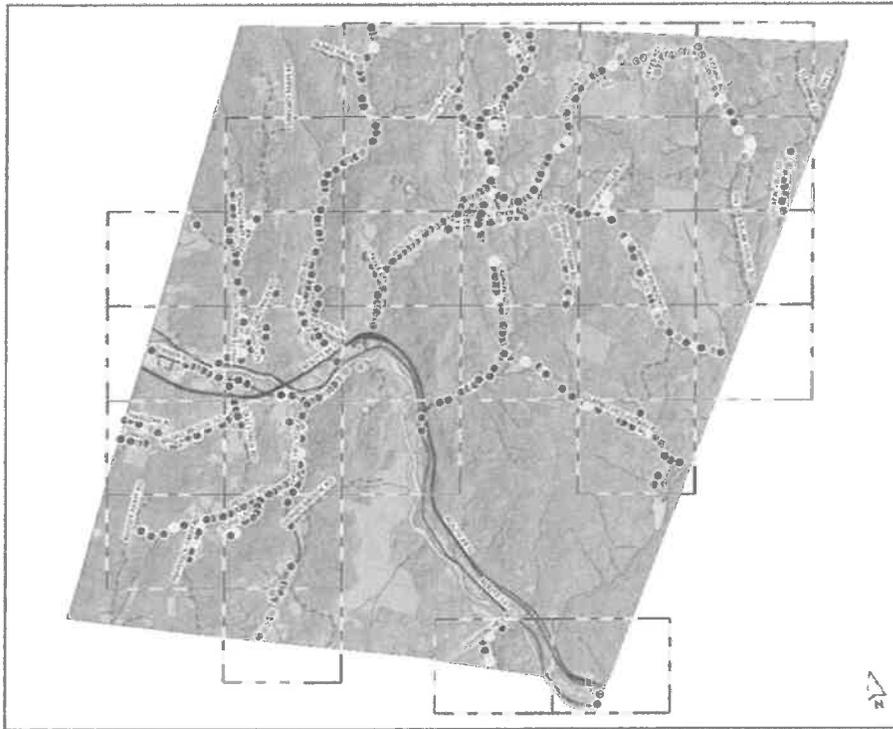
In 2011, Tropical Storm Irene damaged a significant portion of town infrastructure across the Two Rivers-Ottauquechee region. During the storm, countless undersized culverts were severely damaged or destroyed leading to many roads being washed out. Many towns require culvert inventories to be current in order to be eligible for state grants as well as playing an important role in highway budgeting. At the time, many TRORC's town culvert inventories were considered out of date according to the statewide Vermont Online Bridge and Culvert Inventory database (www.VTCulverts.org) in Figure 1.

TRORC identified this unmet need of addressing out of date town culvert inventories that have not been updated since Tropical Storm Irene. TRORC sought funds and was awarded a Community Development Block Grant (CDBG) Disaster Recovery Planning Grant to assist twelve towns impacted by Tropical Storm Irene with updating of culvert inventories over a two year period. These towns are clustered along the White River and Ottauquechee River watersheds. The twelve towns included (Figure 2):

- Town of Barnard
- Town of Bethel
- Town of Braintree
- Town of Granville
- Town of Hartford
- Town of Hartland
- Town of Pittsfield
- Town of Rochester
- Town of Sharon
- Town of Stockbridge
- Town of Tunbridge
- Town of Woodstock

The scope of work included updating GPS locations of culverts, updating culvert attributes (size, condition and material based on Vermont Agency of Transportation standards), and creating new maps. Culverts were assessed and prioritized based on condition and vulnerability to failure. These inventories will play an important role for towns applying to future grants in transportation, hazard mitigation, water quality and eligibility for FEMA reimbursements. TRORC is working with communities to update their Hazard Mitigation Plans, working with town highway departments to be compliant with 2013 Town Road and Bridge Standards (which includes the desired culvert inventory to flag poorly performing culverts and integrate into a capital improvement plan), and identify high risk road erosion areas for future projects. This grant opportunity will cover a

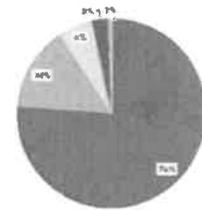
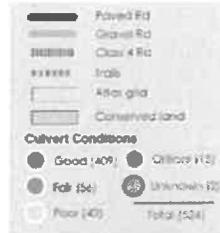
Town of Sharon



Culvert Inventory Sharon, Vermont

146,765 July 2015

1 inch = 3,897 feet



TRORC
Two Rivers Ottauquechee
Regional Council



Culvert Inventory Sharon, Vermont

146,035

1 inch = 3,836 feet

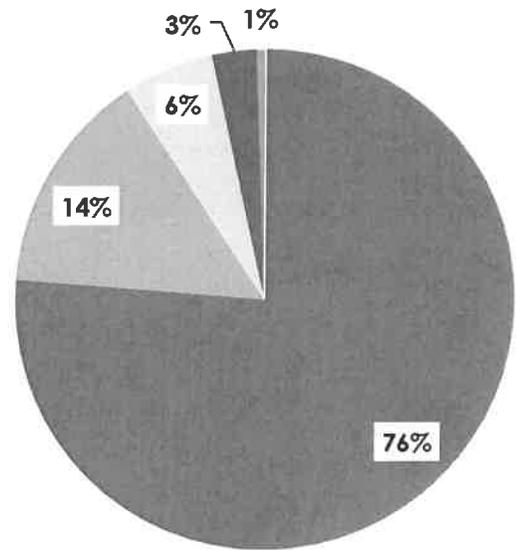


TRORC
Two Rivers Ottauquechee
Regional Council



An eroded outlet on Carpenter Road
 Photo by Rita Seto, TRORC

Overall Culvert Condition in Sharon



Sharon Priority Projects

Site	Location	Description	Cost
1	Cross Road	Replace 3 culverts	\$5,074
2	Beaver Meadow Road	Replace 9 culverts	\$11,664
3	Carpenter Road	Replace 3 culverts	\$4,014
4	White Brook Road	Replace 4 culverts	\$6,210
5	Downer Road	Replace 4 culverts	\$5,383
Total Project Costs			\$32,345