VT AOT

Chittenden County Circumferential Highway

File No.: 199101814

City and State: Colchester, VT

General Impacts:

1.7 acres emergent

19.7 acres scrub-shrub

5.4 acres forested

3.4 acres combination

Functions and Values Lost: (From EA/SOF)

Groundwater Discharge

Floodflow Alteration

Sediment/Toxicant Retention

Nutrient Removal

Sediment/Shoreline Stabilization

Wildlife Habitat

Recreation

Year(s) Mitigation Constructed: October 1996

Size and Type of Mitigation as Proposed: 80 acre parcel had its drainage ditches plugged to increase wetland hydrology; up to 50 acres may revert back to wetlands

Proposed Functions and Values of Mitigation: (From EA/SOF)

Floodflow Alteration Sediment Retention Shoreline Stabilization Nutrient Removal Wildlife Habitat Recreation

Mitigation Special Condition(s):

6. The mitigation site shall be subject to a conservation easement. Such conservation easement shall ensure that the mitigation sites are preserved in perpetuity. Documentary evidence, sufficient to establish the completed acquisition of the mitigation site and granting of the conservation easement shall be furnished to the Corps. The conservation easement shall be deeded to and managed by a responsible, qualified state (including the VT AOAT or VT Agency of Natural Resources) or federal agency or a non-profit conservation organization.

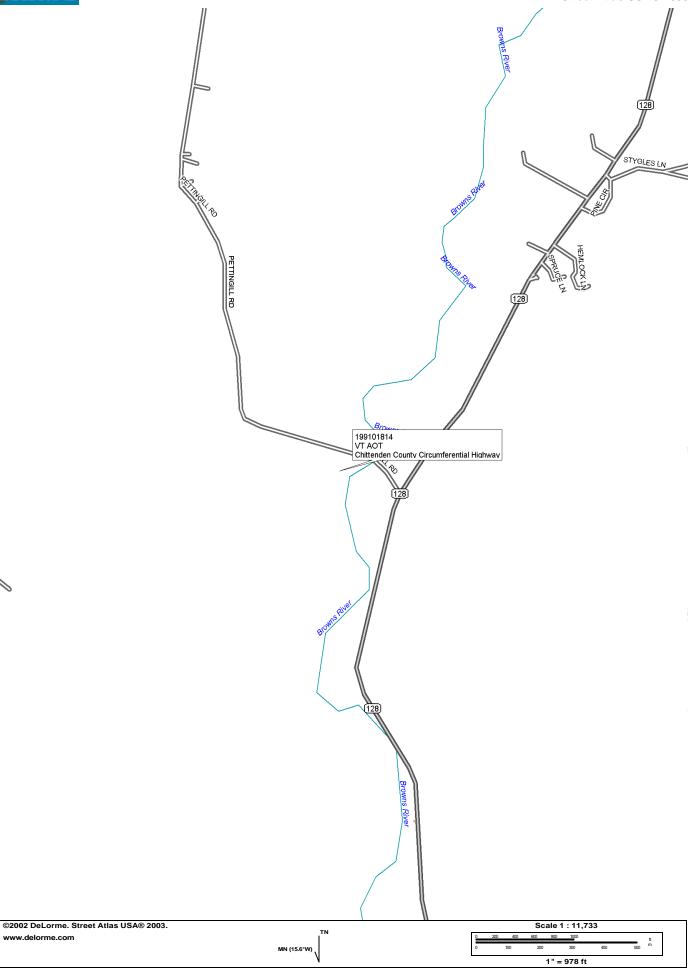
Remarks:

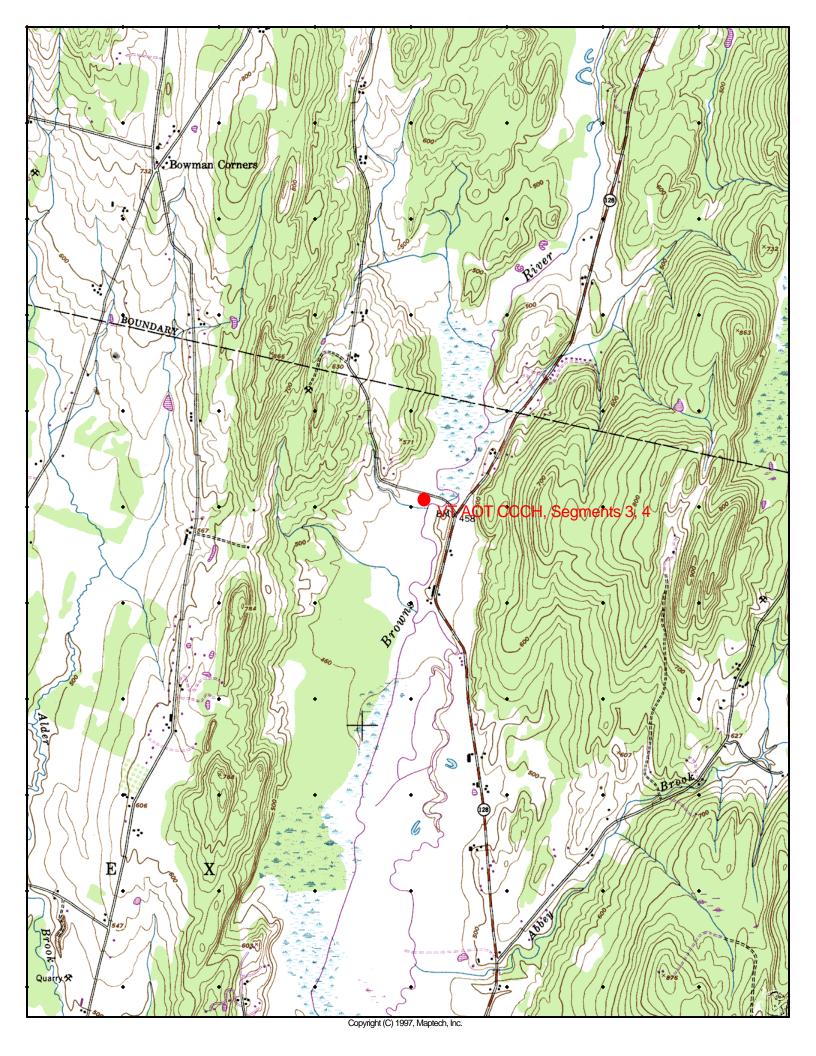
None

Directions:

Take 128/95 north. Take exit 37B, I-93 north, toward Concord, NH. Take I-89 north. Take exit 11, US-2, toward VT-117/Richmond/Williston. Take a slight right onto US-2/Theodore Roosevelt Highway. Take a slight right onto VT-117/River Road. Continue on VT-117. Turn right onto Sand Hill Road. Take a slight left onto VT-15/Jericho Road/Grand Army of the Republic Highway. Turn right onto VT-128/Browns River Road. Turn left onto Pettingill Road. It is just past the river on the left side.







MITIGATION SITE FIELD DATA FORM

 Site Name:
 VTAOT - CCCH 3 & 4 - Colchester
 File No. 199101814

City/Town: Colchester State: VT Waterbody: Browns River

Monitor(s): Keith Wright, Paul Minkin, Beth Alafat (EPA), Mike Adams Date: 8-20-02

Was site constructed? yes

Is site wetland? yes

Size of proposed wetland: TBD

Actual size of wetland: TBD

Landscape position: TBD

Lat/Long Points: 44.55532N 73.05864W

Saved GPS Waypoint name: CCCH

GPS Tracking Log Name: N/A

Perimeter: TBD

Surrounding land use:

River, hayfield, upland forest

Is wetland function compromised by surrounding land use?

Snowmobile access may diminish wildlife function and contribute pollutants

Plant health:

Overall healthy, but some of the alders that had been planted were dead.

Invasive species:

Phalaris arundinacea

Wildlife use:

Great blue heron, deer tracks, dragonflies, frogs, minnows, kingfisher, goldfinch, beaver, hummingbird, snails

Plants:

Oxbow:

Alisma sp.

Carex sp.

Conium maculatum

Equisetum sp.

Larix laricina

Phalaris arundinacea

Polygonum sp.

Potamogeton sp.

Salix nigra

Scirpus atrovirens

Scirpus cyperinus

Sparganium sp.

Utricularia sp.

Viburnum dentatum

Field:

Carex sp. (giant)

Eupatorium maculatum

Eupatorium perfoliatum

Impatiens capensis

Onoclea sensibilis

Phalaris arundinacea (dominant)

Polygonum sagittatum

Solidago sp.

Verbena hastata

Soils Data:

Soils data not collected at this site.

Sketch approximate mitigation site, noting areas and types of wetlands, waters, other features, landscape position, landmarks, etc., and data and photo point(s)

See file.

Overall Description of site:

The site consists of a large riverside field. It was formerly drained farmland. Its ditches are now plugged. The vegetation is dominated by a 100% cover of *Phalaris arundinacea*. The major functions of this site are water quality protection and floodflow retention.

Comments, problems, recommendations:

Nearly the entire site is covered by invasive species. Additionally, a snowmobile trail crosses directly over one of the channel blocks.



ning	BIRI.	LBois		WINE CE	ITPIC
LEMIRE NORTH WETLAND MITIGATION SITE	VERMONT ROUTE 289 WILLISTON—COLCHESTER PB 033-1(1)	CIRCUMFERENTIAL HIGHWAY	DESCRIPTION OF STATE		ITPICAL DRAINAGE OF CHILLIAN SECTION
energy.	PROJ. ENG. DRAM. NO.	CHECKED BY	Srd AB NAY20	DESIGN	E
SHEET 1 OF 1	DRAM, NO.	CHECKED BY PROJ NO.	JAN. 1992	30% DESIGN FEB 7 1992	

development

Wetland Function-Value Evaluation Form

						Wetland I.D. Segments 3, 4 199101814	
Total area of wetland ~50 ac Human made?	Is	wetla	and part of a wildlife corrido	or? yes	or a "habitat island"? no	Latitude N44.55532 Longitude W37.05864	
Adjacent land use agriculture	Distance to nearest roadway or other development_100 feet					Prepared by: Minkin Date 8/20/02	
Dominant wetland systems present PEM	Contiguous undeveloped buffer zone present_no					Wetland Impact: TypeArea	
Is the wetland a separate hydraulic system? no		_ If n	ot, where does the wetland	lie in the dra	ainage basin?_low	Evaluation based on:	
How many tributaries contribute to the wetland?_		9	Wildlife & vegetation diver	rsity/abunda	ance (see attached list)	Office Field	
usepisakar) protest ₹80 sis territorio i in totat transportation (notice) protesti transportation (notice) e e Protesti transportation (notice) e en transportation (notice) e en transportation (notice) e en transportation	7975717	-1900-000				Corps manual wetland delineation completed? Y NX	
Function/Value		Suitability Rationale Principal Function(s)/Value(s)				Comments	
▼ Groundwater Recharge/Discharge		X					
Floodflow Alteration			1,5,6,8,9		large emergent wetland surrounded by agriculture		
Fish and Shellfish Habitat		X			some minnows in small open water areas		
Sediment/Toxicant Retention	X		1,2,3,10,14	X	agricultural fields, snowmobile tra	il adjacent, river	
Nutrient Removal	X		1,3,4,8,9	X	agricultural fields		
→ Production Export	X		1,2,4,7				
Sediment/Shoreline Stabilization		X					
wildlife Habitat			4,6,7,8,13,19,21		some adjacent upland forest; great blue heron, deer, frogs, beaver, kingfisher, goldfinch, dragon flies, humming bird, snails		
A Recreation		X			snowmobile trail present but not w	vetland related	
Educational/Scientific Value		X					
* Uniqueness/Heritage		X					
Visual Quality/Aesthetics		X					
ES Endangered Species Habitat		X					

Notes:

Other

VT AOT CCCH -

^{*} Refer to backup list of numbered considerations.

199101814 VTAOT – Chittenden County Circumferential Highway – Segments 3,4 Colchester, VT 8/20/02



Browns River on side of site



View of field dominated by *Phalaris arundinaceae* with a few *Populus deltoides* trees.



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