

Elementary School Curriculum

1st Grade Insect Unit

- Plans: **Insect field trip to Southworth Park, September 10th, 2009**
In coordination with teachers and Rachael from Montshire Museum
Included preparation of handout materials and discussion of the CRT
Assisted but did not lead trip - lower priority
- QUES: additional Spring unit?

2nd Grade Plant & Weather Unit (Fall / Spring)

- Curriculum: **Seed field trip with SME 2nd grade, Friday October 16th to Bloodbrook section of CRT**
Included handout materials and field worksheets
follow-up materials available online (<http://crossrivendelltrail.org/education.htm>)
Spring - Combine plant, Native American, upcoming weather units with a Sugar Maple unit
Discuss sugar maple specifics, plants response to spring, influence of weather, seasons
- Plans: Role of weather, earth cycle, warming temps, sunlight, plant response
In-class presentation via projector showing change of seasons in northern hemisphere
Field trip to local sugarhouse and sugarbush to examine trees and sugaring operation on trail

3rd Grade Rivers & Erosion (Fall) / Amphibians (Spring)

- Curriculum: **Fall field trips scheduled for Friday Nov. 6th and 13th with both WES and SME**
In class demonstrations with sand tables (SME, 10/26) and online mapping (SME, 0/29)
Continuation of Rivers & Erosion unit
Spring - Amphibians
- Plans: Locations along the trail (Glen's Falls, Orford Ponds); nature's response to spring; amphibians
Environmental parameters, vegetation, amphibians (identification), environmental concerns
In-class time followed by field-trip to site(s) perhaps with cons. comm. or state biologist
GPS location of site(s), GIS investigations of site(s) as well as regional/state areas and work

4th Grade Geography / Settlement Unit (Spring)

- Curriculum: Combined 4th grade field trip to local Historical Society and walk along CRT
Email sent October suggesting fall trip to Fairlee/Orford
- Plans: Integration of CRT into mapping / geography and settlement materials
Use online mapping resources in-class, preparation of outdoor activity
Field trip along CRT to view and discuss settlement history (ex. Ely, West Fairlee Village, Orford)
Use the Encountering History site (<http://www.rivendelltrailshistory.org>)
- QUES: Possibilities for Fall as well as Spring field trip on trail with curriculum link?

5th Grade (TBD)

- Curriculum: Combined 5th grade at SME
- QUES: Changes in curriculum that have linkages to the trail as an outdoor resource?
- Plans: **Initial discussions with Dan Noseworthy for 5th grade class hike in winter**
Need to ask about interpretive signs for trail (see examples)

Middle School Curriculum

6th Grade Ecosystem / Trail Unit

- Curriculum: Ecosystem Studies on the ROCC section of the CRT
Invasive Plant studies and related curriculum linkages
- Plans: Curriculum unit for focusing on ecosystems and the trail
Transects and plot studies along ROCC section of trail to discuss biotic / abiotic interactions

Global Positioning Systems (GPS) location of site(s)
Geographic Information Systems (GIS) investigations, comparisons to regional / state areas
Middle School Elective including with field and GPS (Thursday, Nov 5th)
GIS Day activities week of November 16th

Other: Local History component using website

7th / 8th Grade Geographic Information Systems (GIS) & Global Positioning Systems(GPS) Instruction

Curriculum: Science and Math investigations using GIS & GPS applications
Plans: **Invasive Plant studies and related curriculum linkages / community connections**
Follow-up school hike with GIS Day activities (November) with 7th and 8th grade students
Class activities using online map applications (GIS) and GPS data for the CRT
Other: Coordination with other curriculum areas (ex. PE winter hike)

High School Curriculum

Plans: Recruit students who need community service hours for specific projects (ex. trail clearing, kiosk work, display materials, defined community / trail activity) using time during school if possible otherwise outside of school on specific days
Seek trail related projects in direct cooperation with HS teachers (ex. senior projects)
Accompanied Rich Stekler on field trip; no classroom link yet
MORE NEEDED TO FACILITATE TRAIL -AND- PROJECT BASED LEARNING AT HS
Other: Explore possible overlap with MS themes and activities
Ongoing discussion with local foresters RE Forest Management work on ROCC, best with HS students
Other Community related activities, best organized with HS students and community service hours

Other

All School Hikes

Plans: **Middle School Hikes, October 2nd**
Included improved curriculum and education linkages
6th grade – history & geocaching using GPS – leaving boxes for WES students to find on hike, 7th grade – history, 8th grade – natural environment and history; see online descriptions when available and related VN articles
Follow-up activities scheduled for GIS Day, week of Nov 16th
WES Hike, October 5th to Sunday Mountain included hidden box activity
See details online (Education page)

CRT / RTA Website Updates (Education / RISD)

Activities: Updated Fall 2009 with framework set for additional content and modifications
Content added under Education section (<http://crossrivendelltrail.org/education.htm>)
Plans: Use this section of the website to display / document curriculum activities with along the CRT
Improved links to RISD website
Use this site and materials as archive -and- for reference for grant applications (see below)

Coordination of RISD Trail Crew Grant Materials for Documentation and Report Generation

Activities: NH RTP Grant (RISD) trail work on Mount Cube section of CRT completed as of August 1, 2009
Student(s) currently working to design trailhead graphic for Mt Cube
Document project tasks/results to create & submit report to NH BOT (Winter 2009/2010)
Ongoing time to recap trail crew work with Val Stori
Plans: Kiosk panel design/creation using student input (with Niles Foundation grant, Fall/Winter 2009)
Document process in preparation for RTP Grants for FY'10 (Vermont?)

School Displays

Alternative: Trail Coordinator creating materials for displays at each school
Space set aside at each school; materials to be posted December
Activities with students are “presented” on the map as they occur during the year
Present using the website as “Where We Learn on the CRT”

Project / Grant Ideas

CRT Atlas: Online, digital atlas along the trail where educational activities and related community projects
Example: water resources, history, forest types → monitoring, documentation
Building of an online spatial database of information that displays information for the the variety of ecosystems and human interactions found along the CRT
ONGOING HIGH PRIORITY, information to connect community, school (21st Century Learning) DEMO of Atlas

Geocache: **Education geocaching along the trail; demo with 6th grade and WES for all school hikes**
Students build boxes containing information about the trail (*ex.* History, plants, etc) and hide them along the trail → post on website with coordinates (GPS) for people to search and find

GPS receivers: To obtain modern GPS receivers; **initial discussion with VCGI in Vermont**
Develop a program to maintain and institutionalize GPS use across RISD
Provide training materials and easy to use technological solutions for teachers

Community: **Fall meeting with West Fairlee Conservation Commission and WES staff**
Ongoing work with all towns including upcoming invasive plants meeting / workshops
Discussion already underway with Conservation Commissions in towns

Presentations: **October 21, 2009 At The Lake Morey Resort in Fairlee, "Unfolding the Map: Making Geospatial Information Accessible to the Public",**
Place-Based Education and the Community, Using GIS / GPS with the Cross Rivendell Trail - Andy Boyce, Rivendell Interstate School District

RISD / CRT Curriculum Integration

Notes: Continued review of RISD continuum files for math, science, social studies and technology
Assessment: Elementary → address 1st grade and 5th grade in coming year
Middle School → build on programs and new opportunities in FY'10
High School → how to foster connections with HS teachers / students (see above)

GOALS: “Coordinator’s primary responsibility is to collaborate with teachers to design curriculum units.”
Assist teachers developing / expanding curriculum using the trail and technical assistance