

MARCH, 2018



MOUNTAIN BIKE TRAIL SYSTEM DEVELOPMENT PLAN

Carrabassett Valley Trails Committee

INTRODUCTION AND CONTEXT

The Carrabassett Valley Trails Committee (CVTC) is comprised of representatives from four Carrabassett Region organizations: The Town of Carrabassett Valley, the Carrabassett Region Chapter of the New England Mountain Bike Association (CRNEMBA), Maine Huts & Trails, and Sugarloaf.

Each of the four organizations has an interest in the continued development of the extraordinary mountain bike trail system located here in Carrabassett Valley and the surrounding region. The CVTC is intended to provide the mechanism through which collective decisions concerning the trail system can be made and collaborative efforts to grow and improve the trail system conceived and implemented. The four organizations have executed a Memorandum of Understanding (MOU) which includes the following vision statement:

The town of Carrabassett Valley, CRNEMBA, Maine Huts & Trails, and Sugarloaf are committed to creating a world-class mountain bike destination in Carrabassett Valley and the surrounding area. We are working together to develop a mountain bike trail system of exceptional quality, sustainability, and diversity for the enjoyment of residents, property owners and riders that travel to our area. Our planning goals are to:

- *Continue construction of new trails and maintain the extraordinary trails we have in place in order to remain at the forefront of regional and national trail systems.*
- *Promote the trail system and the unique riding experience we offer in order to foster a vibrant community and economic activity aligned with the interests of each partner organization.*
- *Seek input from the community and ridership to guide us in the planning process.*
- *Recognize the importance of planning for the sustainability of our efforts.*

We recognize that the interests among the partner organizations may not always entirely align and pledge to work together openly and respectfully for the benefit of all.

In order to insure our vision is pursued in the most effective manner possible, this document has been developed with input from all CVTC partners and represents our collective plans for the trail network. We intend to update this plan annually as challenges and opportunities invariably arise.

SUMMARY

The mountain bike trail system developed to date by the CVTC partners has already been a significant success. The trail network receives accolades from riders near and far and provides some of the highest quality trails and most varied terrain in the Northeast. Add the other amenities the area has to offer, including the remarkable community that is Carrabassett Valley, and we have the ingredients for a true destination riding experience. The collaborative efforts of the CVTC partners have resulted in a network that offers something for the CV resident, second home-owner, and area guest alike.

Nonetheless, the network and riding experience need additional development to solidify our position as a regional leader. Therefore, the CVTC partners will continue to work together in the coming years to understand our current and potential future ridership, significantly expand the trail network, and foster a vibrant mountain bike community. Near-term plans will focus on significantly increasing trail mileage and on improving trail signage.

CVTC will not take a direct role in the development of supporting amenities. While it may promote and facilitate such amenities and events where possible, development shall be left to the individual partners and others in the private sector.

Significantly Increase Trail Mileage

Our goal is to double the size of the trail system in the next five to ten years. This implies sustaining a level of effort equal to or greater than that of the past several years. This will be no mean feat but we believe it is an achievable goal.

A trail system of such size will provide a true destination riding experience with enough terrain to satisfy riders during a week-long vacation. As we work to achieve this goal, we shall continue to:

- Construct purpose-built sustainable trail
- Improve connectivity
- Align trail ability level with our ridership and provide a progression of skill level

In addition, we plan to:

- Explore lower-cost trail construction techniques where appropriate
- Add existing backcountry options to our official network where possible

Improve Trail-Head Kiosks and Signage

In order to ride the trail, one must find the trail. Our mountain bike trail system overlaps the Nordic system at the Outdoor Center (OC) and the MH&T system. There are also numerous intersections with logging roads, walking trails, etc. Significant effort has been made by a relative few to address the challenge of signing our complicated system. Nonetheless it remains a confusing system to navigate in many areas. While perhaps not a significant obstacle to the dedicated local rider, for new riders or riders new to the area, it likely limits their experience. The CVTC, through its signage subcommittee shall plan and fund a consistent trail signage system for implementation by the 2019 riding season.

RIDERSHIP

Who is our trail system for? Each of the four partner organizations represents slightly different but significantly overlapping groups of existing and potential riders. Taken together, these constituent groups can be described as:

- Mountain bike riders of all abilities and ages.
- The full and part-time residents of Carrabassett Valley, many of whom are currently users of the trail system.
- Guests of Sugarloaf and Maine Huts & Trails, for whom the trail system can be a unique and positive part of their experience.

While perhaps not direct users of the trail system, local and regional businesses benefit indirectly from the increase in off-ski-season activity in the area.

The basis for the plans described herein is built on our combined but imperfect understanding of our current and potential future ridership. This understanding is based on the 2015 public forum, various rider surveys and other data and experiences from each of the partner organizations.

In order to improve that understanding and react to changing preferences, we will undertake the following actions.

Actions & Priorities	
1	Continue with a periodic public forum for receiving feedback from our ridership.
2	Implement a periodic survey for soliciting feedback from ridership that may not participate in a public forum.
3	Assess methods for better understanding what would make our trail system desirable to riders who have yet to visit our trail system such as tapping regional and national data.

TRAIL PLANNING & CONSTRUCTION

On the one hand, we are blessed with large tracts of open space for potential trail development. On the other we are cursed by extremely rocky and rugged terrain, significant wet areas, active logging and in some cases limited landowner permission.

Trail development has, and will likely remain, a somewhat opportunistic endeavor, influenced by the intersection of permission and funding. Nonetheless, *luck favors the prepared*¹ so we must lay plans and contingencies to develop an integrated trail system with the connectivity, terrain, and difficulty level desired by our ridership.

Our planning and construction priorities will largely be within the existing system perimeter (roughly the CBCC race loop) with focus on:

- Areas surrounding the Maine Huts & Trails huts
- Options for improved connectivity both within our own network as well as with adjacent networks.
- Providing a progression of skill level with additional beginner and lower-intermediate trail options close to the center of the network and/or trailheads as well as intermediate and expert options to keep advancing riders satisfied.

However, plans shall also be developed for leveraging the more remote areas we have available for trail construction. While the costs and logistics of such development need to be considered, the beauty of surrounding forest, the Carrabassett River and its tributary streams, and mountain vistas provide a unique dimension to the riding experience we can offer. Plans call for 50% increase in mileage in the next five years as shown in the table below.

Ability Level	2017	2022
Green	13.85	20.85
Blue	50.85	78.25
Black	<u>9.20</u>	<u>11.70</u>
Total	73.90	110.80

Table 1. Trail Mileage by Ability Level

Any new trail progresses through several stages: concept, rough survey, permissions, corridor survey, corridor clearing, tread pin flagging and finally tread construction. This process can take several years in some cases. For planning purposes, we have designated three stages for trail projects. Projects for which there are no significant remaining obstacles to construction are designated as “A”. Projects which have been rough surveyed and are actively being pursued for construction are designated “B”. And finally, those which are still in a concept stage are designated “C”.

Note that stage of development does not necessarily translate to priority -i.e. a stage C trail may be vitally important to the network but lacking permission, funding, etc.

¹ A common variant on “Fortune favors a prepared mind” ~Louis Pasteur

Current trail projects are described on the following pages and are keyed to the map in Appendix C.

Status A Projects: Near Shovel Ready

The following trails have corridors identified, landowner permissions secured and are ready for construction. The projects are listed in the general order of priority and will be completed as resources allow and added to the trail map. Without doubt, there will be last minute reprioritization as challenges and opportunities arise during the construction season.

Actions & Priorities	
1	<u>Approach Trail:</u> Finalize permission for mountain bike use of Approach Trail. This trail has already been constructed by MH&T for hiking and snowshoeing. Its construction is appropriate for mountain bike use but final permission from the State is needed. Add this trail to the 2018 map.
2	<u>Stratton Brook Connector:</u> Complete this intermediate level trail in 2018. The trail will provide additional access to the Esker Trail and loop options in the vicinity of Stratton Brook Hut. Final trail design needs to be completed and funding approval finalized. Upgrades to one or two short sections of the Approach Trail, primarily for sustainability, may be considered during this work.
3	<u>Crommetts/Houston Brook Connector:</u> A short section of new corridor and minimal tread work can provide a beginner level connector from Houston Brook Road to Crommetts that offers attractive loop options. This trail will be complete in 2018.
4	<u>Trail 50/Hurricane Connector:</u> This short section of trail, the corridor for which was cut during construction of Hurricane Knoll trail, is currently quite rideable and provides an intermediate level option for accessing the Hurricane Knoll loop and its attractive scenic vistas. The trail will be cleaned up with hand tools to improve the rider experience and included in the 2018 map. It will be “finished” when a full crew is working in the area.
5	<u>Winter Fat-Biking Trail:</u> Interest in winter fat-biking increased significantly over the 2017/2018 winter season. Plans for additional winter-only trails have been developed for completion in 2018 on Sugarloaf property off the Narrow Gage opposite the Grassy Loops and Mike Mile 59. There is potential for five or more miles of trail in this area.
6	<u>Poplar Stream Single-track:</u> Complete this 1.25 mile intermediate level trail that improves connectivity to Poplar Stream Hut in 2019. Funding is in place and formal landowner permission from the Penobscot Indian Nation (PIN) has been requested by CVTC partner MH&T.

Status B Projects: Active Trail Plans

There are several trail concepts for which initial survey work has been completed and that have been identified as beneficial additions to our network. These potential trail projects will require additional work to prepare for construction.

Actions & Priorities	
1	<u>Additional beginner trail near CV Outdoor Center:</u> This 3.5 miles of trail will provide additional options for beginner riders near the bike shop and convenient parking. A corridor survey and design shall be completed in 2018. It is expected that the tread-within-tread portion on the ski trails could be completed in 2018 with the forest portions planned for 2019.
2	<u>ODC Warming Hut Trail:</u> This trail could add up to a mile or more of lower intermediate single track close the OC and warming hut. Construction plans for the 2019 build season will be developed.
3	<u>Intermediate/Advanced Loops at CV Outdoor Center:</u> Pursue preliminary permissions for trails on Town upper lot at CV Outdoor Center (“Spruce Reserve”). If outlook is positive, complete corridor survey in 2018. There is potential for a significant length of trail in this area that could take advantage of exception views and the beauty of older-growth forest. This could evolve into a significant 2019& 2020 project which could add 5 miles of intermediate and advanced terrain.
4	<u>Esker Trail Reroutes:</u> Complete corridor surveys and refine our understanding of permissions for single-track reroutes on the Esker Trail. This project could add a mile of intermediate and advanced trail.
5	<u>ODC to Resort Base Connector:</u> Riders currently travel between the resort base and Outdoor Center using a variety of routes that include named mountain bike trails, Nordic trails, roads, and alpine ski trails under the Snubber lift. None of these options provides a riding experience that is consistent with the balance of the network; each includes areas that are perennially wet, have uninteresting riding surfaces, and require sustained “straight line” climbing, Despite the challenges that have been identified with this area, developing a reasonably attractive beginner to lower-intermediate option remains a priority. Options shall be reassessed during 2018.

Status C Projects: Future Trail Concepts

There are a number of potential trail concepts in various stages of development. Each will require additional work to determine their value and viability.

Actions & Priorities	
1	<u>Lower Poplar Stream Single Track:</u> This trail concept lies outside the current MH&T corridor on Penobscot Indian Nation land. As opportunity allows, the potential for permission or this trail should be explored.
2	<u>Caribou Pond Loop:</u> Review permissions, make minor repairs as resources allow, and add Caribou Pond Loop to the 2019 map. This “backcountry” trail provides for a long ride into remote terrain for a unique experience and can take pressure of the trails near the center of the network.
3	<u>Caribou Valley Connector:</u> While a separate trail head would almost certainly be developed to support trails that might be constructed in the Caribou Valley area, a direct connection might be possible and should be explored. This would invariably cross Sugarloaf property somewhere between the golf course and Riverside development.
4	<u>Wyman Pod:</u> While somewhat remote from the balance of the trail system, this is an attractive tract of land for which we have permission for construction.
5	<u>Caribou Valley Pod:</u> Complete initial surveys of Caribou Valley in order to understand the potential and the challenges.
6	<u>Village on the Green Connector:</u> Currently the Village on the Green community is not well connected to the network. Options for improved connectivity shall be investigated in 2018.

MAINTENANCE

As expected, there is a growing need for maintenance within the system now that many trails have been in service for several years. All CVTC partners recognize and agree that diligent maintenance is vitally important to insure the best possible riding experience.

The CVTC Maintenance Subcommittee is focused on maintenance planning which will rely on paid and volunteer crews to implement. Specific maintenance plans will be generated annually. Guidelines developed by the subcommittee for such planning activities are presented in Appendix A.

SUPPORTING AMENITIES AND COMMUNITY DEVELOPMENT

Supporting amenities such as a camping option, full-service bike shop, social hub(s), lift serve biking, etc. can play a key role in differentiating a network. Events such as festivals, races, group rides, etc. can build community and add an important dimension to the riding experience. However, there is consensus among the partners that the CVTC may not be the most effective mechanism for developing these amenities.

Therefore, CVTC shall promote and facilitate such amenities and events where possible but shall not take a direct role in their development as a partnership. Rather, we shall leave this to the individual partners and others in the private sector.

RESOURCES

All four CVTC partners have generously contributed financial and other resources to the trail system. Funding for mountain bike specific trail construction has thus far come primarily from the Town of Carrabassett Valley and CRNEMBA. MH&T has also made meaningful funding contributions and of course invests significantly in their own adjoining complimentary trail network. Sugarloaf has provided generous access to their land as well as having made substantial monetary donations within the constraints of their business model. Regardless, significant resource will be required to implement this plan. Funding will undoubtedly be an ongoing challenge but there are near term actions that can be taken.

	Actions & Priorities
1	<u>Develop a Comprehensive Funding Plan:</u> The CVTC will develop a plan that includes a projection of the funding capacity of each of the partners.
2	<u>Consider Professional Fundraising Help:</u> The CVTC will investigate the cost and benefits of contracting with a professional in order to assess future funding options.
3	<u>Consider Forming a Funding Subcommittee:</u> A committee made up of CVTC and non-CVTC members should be formed to focus on funding.

APPENDIX A: MAINTENANCE PLANNING GUIDELINES

Reprint of CVTrails Maintenance Subcommittee

April 14, 2017

Carrabassett Valley Trails Committee

Maintenance Sub Committee: Savannah Steele, Sam Punderson, Peter Cole, Andy Gillespie, Spencer Lee, Ed Gervais, Dave Cota, Joshua Tauses (Chair)

Seasonal Opening/Closing Recommendations

Trails will be 'Open', 'Closed', or 'Caution'

Spring Season:

- Trails open when snowpack and seasonal runoff are melted, drainages are active
- Frost is out of ground, 'trouble' spots relatively dry
- Surface of tread is able to handle its anticipated level of user traffic
- Generally lower elevation trails open sooner than higher elevation
- Generally some trails open by May 15.

Mid Season:

- Rain amounts in excess of 3 inches over 24 hour period puts trails in 'caution' status
- Capacity of the tread and drainages assessed for managing water flow
- Potential for higher traffic trails to be damaged results in 'caution' or 'closed' status
- Unsafe conditions identified may result in 'caution' or 'closed' status

Fall Season:

- November 1 hunting season close riding at Outdoor Center
- Start of freeze and thaw cycles can result in 'caution' or 'closed' status
 - Generally accounting for tread surface damage, anticipated level of user traffic
 - As well as trail location and elevation
- Early snow/Late fall heavy rains can result in 'closed' status at higher elevations
 - Relative to snow/rain fall totals 3 inches may be tipping point
- Cold, Frozen ground trails 'open' following freeze thaw period, without snowpack
 - Possible for trails to be frozen, non-snow covered and 'open' later in the season

Group of local 'Monitor' riders, Town Trails crews, and sub-committee members update Savannah, Sam, and Josh as conditions change, as well as communicating needs for capital improvements. Sam is lead contact from this group to CVTC full committee, as well as lead communicator to media outlets.

April 14, 2017

Carrabassett Valley Trails Committee

Maintenance Sub Committee: Savannah Steele, Sam Punderson, Peter Cole, Andy Gillespie, Spencer Lee, Ed Gervais, Dave Cota, Joshua Tauses

General Maintenance Recommendations:

Shared Responsibilities between volunteers and professionals managed by Town and MHT crew leaders

Yearly:

- Corridors managed to allow safe travel including height, width, blowdowns
- Drainages maintained on xc ski and single-track trails (including growing # of culverts)
- Mowing/Brushing where needed approx. mid to late season
- Fall assessment of capital maintenance projects, producing following year plans

1st year following construction:

- Assessment of completion of construction including: tread, corridor, drainages
- Assessment of hardening tread in non-anticipated hydrologic ‘trouble’ spots (armoring)

3rd year following construction:

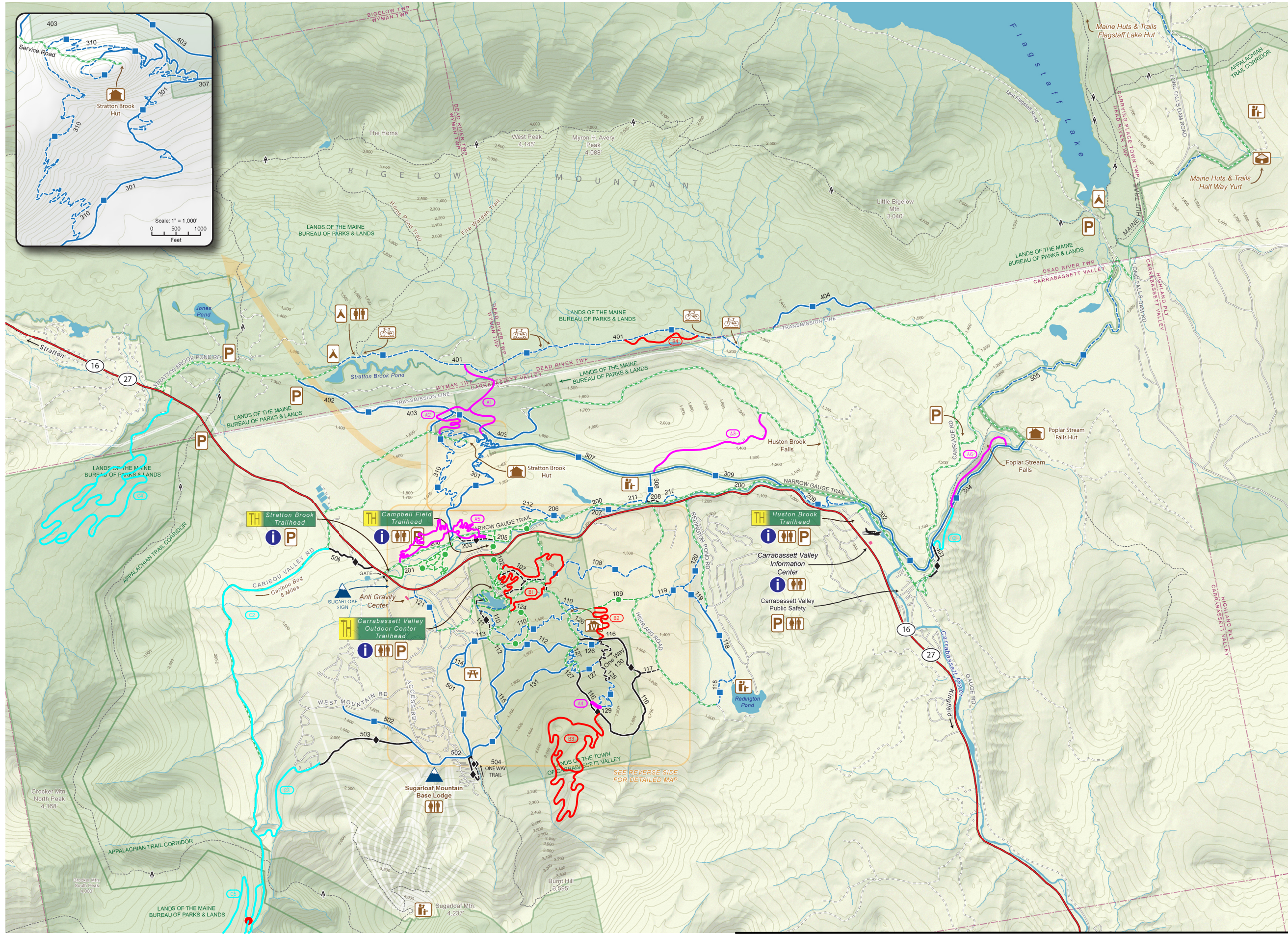
- Assessment of naturalization – is the landscape returning following construction
- Tread, and ‘line’ maintaining original integrity
- Wood Structures Assessed for degradation of hard wear, transition w/ natural tread surface

5th year following construction

- Assessment of completion of naturalization
- Assessment of condition of tread degradation
- Wood Structures Assessed for degradation of material, est. time of replacement

APPENDIX B: 2017 TRAIL INVENTORY

Difficulty & Character	Trail Mileage
Green	13.85
Double Track	6.8
Improved	6.8
Single Track	7.05
New School	6.8
Old School	0.25
Blue	50.85
Double Track	23.7
Improved	11.9
Unimproved	11.8
Single Track	27.15
New School	12.4
Old School	14.75
Black	9.2
Double Track	3.75
Improved	2.25
Unimproved	1.5
Single Track	5.45
New School	1.9
Old School	3.55
Grand Total	73.9



	Carrabassett Valley Trails				PRELIM			
	TITLE APPENDIX C: CVTC PLANNING MAP				CURRENT REVISION LEVEL			
					ECO NO.	BY	DATE	DWG
CONCEPTS AND INFORMATION CONTAINED ON THIS DRAWING ARE PROPRIETARY TO CRNEIBA AND MAY NOT BE REPRODUCED WITHOUT WRITTEN PERMISSION FROM THE CARRABASSETT VALLEY TRAILS COMMITTEE.								
DRAWN: EHG III DATE: 25-MAR-2018								