

The Front Range Climbing Stewards

Scarface Approach Trail

Project Report - Nov 12th, 2018



Scarface Climbing Area, Indian Creek, UT

Overview of the Program:

During October of 2018, The Front Range Climbing Stewards (FRCS), in conjunction with High Mountain Institute's (HMI) Gap Program organized to complete a stewardship project at the Scarface climbing area in Indian Creek. Both groups worked in collaboration with The Access Fund and the Monticello BLM Field Office to coordinate the project. The objective of the project was to address the impacts of rock climbing on the area. Costs of this project were shared amongst The Boulder Climbing Community (BCC), HMI, Willet Foundation, The Access Fund, The American Alpine Club (AAC). This project was the primary focus of all organizations for 10-days days between Oct. 18th and 28th, 2018.

FRCS is a collaborative program of the Boulder Climbing Community and the Access Fund, both non-profits based in Boulder, CO. The mission of the program is to provide innovative solutions to land managers in order to help mitigate the impact of climbing on lands in the Rocky Mountain region. HMI's Gap Program is a semester-long college field course that utilizes the sport of climbing to creatively weave together environmental field studies with leadership and community-building curriculums in a wild land setting.

The two programs work together each year to complete an in-depth trail maintenance and restoration project at designated climbing areas. FRCS provides project design experience, technical mastery, skilled instruction, and necessary tools & equipment, while HMI provides a trainable labor force (**Figure 1**) of students who are actively engaged in the interface between recreation and stewardship of our public lands. HMI staff utilize this experience to promote a stewardship ethic within their curriculum and build future leaders within the climbing

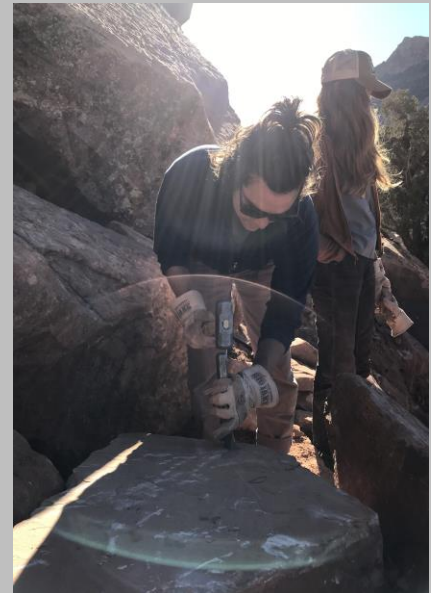
community. This cohesive approach engages the students in a hands-on curriculum and allows them to benefit from skills obtained in an intensive manner.

Overview of the Area and Impacts of Climbing:

Scarface wall is a popular climbing crag within the Indian Creek Recreation Area. Indian Creek is currently within the boundaries of the Bear's Ears National Monument. The nature of the climbing in Indian Creek is distinct along with its unique landscape. This draws visitors to the area from all over the nation and world. Climbers have visited Indian Creek for over 45 years, but climbing did not really take off until the late 1970s. The area is home to thousands of reported rock climbs of varying difficulty and accessibility. Since its inception in Indian Creek, nearly 40 years ago, climber visitation has increased exponentially and occurs throughout the year. Visitation is particularly high during the spring and fall when temperatures are more favorable to climbing and camping and has seen a recent upturn in use particularly in the last 10 years.

The continued increase of climber visits and camping has led to significant environmental impact. One of the greatest impacts related to climbing in this area is the erosion of the soils at the base areas and around the access trails to the crags. The base areas and approach trails are on loose and steep slopes, varying from 120 to 1500 feet up off the canyon floor. The desert soils on these slopes is very fragile and rely heavily on biological soil crusts, vegetation and errant rock to maintain their structure. The landscape can be forgiving and restore itself passively once disturbed, but continual and chronic disturbances cause elevated erosion issues that exacerbate quickly and cannot return to original conditions without a larger effort of active restoration.

Figure 1 – Student demonstrating stone work skills



Overview of the 2018 FRCS/HMI Scarface Trail Maintenance Project:

The goal of this project was to mitigate the erosive impacts of climbing on the Scarface Wall access trail. The Scarface Wall likely sees similar use levels and visitation to other popular climbing destinations in Indian Creek and contains one of the most photographed & climbed routes in the region. This popular climbing area is known for a constantly full parking area and roadside congestion signifying its popularity. Loose, sandy slopes that lack stable approach structures are seeing increasing effects of use and water runoff. Gullying, route braiding and vegetation loss are at an all time high and represent a critical need in restoration and stabilization efforts. Unfortunately, due to little or no maintenance being done, the access trail was in a state of serious disrepair (**figure 2**). The trail was only moderately functional with numerous gullied out sections and severe erosion.

FRCS and HMI leadership worked with the Access Fund and the Monticello BLM Field Office to identify this project from a priority list of areas in need, then developed a general strategy to address the issues. FRCS developed the project objectives, trained, supervised and managed the progress with the volunteer groups that worked on the project. HMI students took the charge and learned trail restoration design, techniques, and essential strategies to accomplish the project objectives. Additionally, the Montrose (CO) High School Outdoor Club, and a handful of volunteers dedicated labor to the project under the tutelage of the trained HMI students and FRCS supervision. Please see **Appendix A** for a listing of labor totals and sources.

FRCS and volunteers used a variety of sustainable techniques to achieve both trail maintenance and passive restoration. First, the designation of a single and durable trail lessens the impact on the surrounding fragile ecosystem while promoting proper user habits. To complement this, efforts to visibly close off social trails promote passive restoration of these areas as users are no longer able to impact the area. Rock structures and visual cues (**Figure 3**) were carefully constructed to ensure use of the main path and allow passive restoration in impacted areas. These structures were built with locally sourced rock, quarried and transported to the worksites.

Once this season's objectives were completed at Scarface Wall, the group utilized their new found skills at The Theater and The Cinema approach trails in Moab as part of the AAC's Moab Craggin' Classic stewardship event. The HMI students were able to lead groups of volunteers and demonstrate how to properly build structures into a new tread alignment.

Equally as important as the trail work, this project taught students from several organizations technical skills and stewardship values, which they will carry to their home communities and through their climbing careers. Finally, the presence of volunteers in the area raised awareness among climbers of the need for community involvement and good user habits.

Figure 2 – Climbing turn in steep loose soil



Before – Steep and heavily eroded trail.



After – Stone structure constructed to provide a durable walking surface.

Figure 3 – Base Area



Before – eroded slope and gullied out trail



After – Retained slope with hardened surface trail

Project Educational and Professional Strategy:

This is the fourth year that HMI and FRCS have collaborated on sizable stewardship projects. This caliber of project is not standard fare for volunteer projects. The objectives are generally large in nature and require specific technical design, organization and building skills. This collaboration revolves around FRCS's ability to train and supervise the HMI Gap student's direct involvement in building the technical objectives. The FRCS crew's experience in design, stone work and innovative quarrying are leveraged with the HMI group's dedication and labor.

Such a strategy is uncommon from typical volunteer stewardship projects where volunteer labor is primarily utilized for low-skill tasks such as material transportation or acting as an assistant during technical building. Instead, the HMI students are trained in the technical skills to complete the objectives of the project with the support and guidance of the FRCS crew. The result is that the HMI students hold greater ownership over a professional quality project and participate in a rich education experience that directly correlates with the Gap Program's curriculum, as well as serve as outreach to young climbers on the importance of stewardship (**Figure 4**). Beyond the practical applications of the project the students participate in bigger-picture instruction and discussions about the project at hand and stewardship in general.

Figure 4 – HMI student building a retaining wall.



Project Objectives, Outcomes and Observations for Future:

The scope of the project involved continuing to build a durable path that climbers can easily identify and follow approaching the Scarface Wall. This included continuing to build on structures that were begun during a three-week period in Spring of 2018. While the approach trail was generally functional for the majority of its length and users could follow a track without major braiding, the trail was loose, channeling water and deteriorating more each passing season. The project identified three worksites on the approach trail to perform concentrated maintenance and build-in-place structures along the existing trail. This goal was accomplished by building retaining structures and stone staircases (Figure 5) and establishing a hardened tread that is easily identifiable to the user and dissuading travel on easily eroded terrain. Please see appendix B for a list project metrics for all three sites. Unfortunately, this project was unable to address all of the maintenance required to update this trail in entirety. FRCS prioritized the work objectives and took on the highest priority or largest work objectives during this project in hopes of setting up for wrapping up the remaining work objectives in the coming season. Smaller and medium to low priority work objectives remain to be completed, as well as the need for continued maintenance of the whole trail in the future. Work is planned for the Spring of 2019 to address the remaining issues on the trail.

Figure 5 – Construction of tread with a durable surface



Area before tread development



Area after tread development

Summary:

The successes of this project are significant and measurable. Not only did good sustainable work get accomplished on the trail but a strong message of the value of stewardship of our public lands was communicated to a new generation within the climbing community. This is a great example of how a handful of organizations can collaborate to improve our climbing resources. FRCS and HMI would like to thank all parties involved in this project. The Monticello BLM field office's willingness to coordinate needed environmental assessments before taking on projects is pivotal to addressing these impacts. The Access Fund's dedication to being the nexus of the stewardship effort in the area is extremely valuable and a project of this magnitude would not be possible without the contribution of the American Alpine Club. Furthermore the project would simply not have been possible without the generous funders of BCC and HMI or the dedication of the Gap Program students and FRCS crew members. Together we can address the impacts of the sport and lifestyle that we love.

Appendix A: Project Labor totals

Labor Type	Hrs.
FRCS Labor, Planning & Development	213
HMI Volunteer	720
Montrose HS	154
Other Volunteer	48
Total Hours	1,135
Total Paid Hours	213
Total Volunteer Hours	922

Appendix B: Project Metrics

Outcome	Amount	Unit
Trail Improved	186	L FT
Rock Step	113	#
Retaining Wall/Structure	328	SQ FT
Rubble Wall/Structure	83	SQ FT
Crush material	262	CU FT
Restoration-- Fill, Rock 50%	710	SQ FT
Rocks moved by Hand	319	#
Rock Quarrying	337	CU FT
Rock Delineation	5	CU FT

Additional Before & After photos

Before



After



Before



After



Before



After



Before



After

