

**Water Supply Reserve Fund
Water Activity Summary Sheet
May 16, 2019
Agenda Item 26(g)**

Applicant & Grantee: EagleVail Metropolitan District
Water Activity Name: Phase 1 – Stone Creek Master Plan
Water Activity Purpose: Multipurpose Implementation
County: Eagle
Drainage Basin: Colorado
Water Source: Stone Creek
Amount Requested: \$25,000 Colorado Basin Account
Matching Funds: Applicant Match (cash & in-kind) = \$132,500

- 528% of the Basin Account request (meets 25% min)
- 88% of the total project cost of \$150,000

Staff Recommendation:
Staff recommends approval of up to \$25,000 from the Colorado Basin Account to help fund the project titled: Phase 1 – Stone Creek Master Plan.

Water Activity Summary: WSRF grant funds, if approved, will help EagleVail Metropolitan District (EVMD) implement Phase 1 of the Stone Creek Master Plan. Phase 1 is a 270-foot section of Stone Creek that would address removing to man-made dams, create a terraced channel with a low flow and bankfull channel connected to the floodplain, improve water quality, install fish habitat and stream stabilization structures, provide fish passage, reduce sediment aggradation, decrease channel width and increase channel depth, and stabilize the creek banks. Costs include design fees, permitting, construction, and project management fees.

The goal of the Master Plan after implementation is to leave Stone Creek as a stabilized, self-sustaining, holistic ecosystem with requiring minimal maintenance, with a flourishing aquatic and terrestrial ecosystem. This project will also allow for numerous public engagement opportunities to allow the public understand how to be better stewards of Stone Creek. The Master Plan is divided into five phases for completion over several years. These phases are ranked in order of priority with Phase 1 as the most critical.

Discussion: As described in the Colorado basin roundtable chair's recommendation letter, this project was supported and recommended for approval by the roundtable on March 25, 2019. The 1.6-mile section of Stone Creek that flows through the EagleVail community is facing a significant chapter in its existence. Stone Creek has suffered the impacts of development in its watershed and its floodplain over the last several decades and the cumulative effect of the loss of riparian buffer, loss of floodplain connectivity, channelization, and the increase in impervious surfaces is visible in the aquatic ecosystem.

Over the past several years the EVMD has partnered with others to educate, communicate, and present a long-term solution to the diversities and deficiencies that face Stone Creek today. Partnerships include: Scott Schreiber of Wright Water Engineers as the EVMD's water engineer & consultant, the Matrix Design Group and Aqua Sierra for their in-depth studies and plans, the support of the Eagle River Water & Sanitation District, the Eagle River Watershed Council's support through signage and education, the EagleVail POA and their support and community education and outreach, the Town of Vail and there Watershed Education Coordinator, the Eagle County School District specifically Homestake Peak School of Expeditionary Learning through community service and educational opportunities, support through Trout Unlimited, and many EagleVail residents that are passionate about the creek restoration project.

With the assistance of these partnerships, the resources provided by the EVMD, and with the additional funding provided by the Water Supply Reserve Fund, the EVMD's goal would be to complete Phase 1 of the Master Plan in the fall of 2019.

Issues/Additional Needs: No additional needs have been identified.

Eligibility Requirements: The application meets requirements of all eligibility components.

Evaluation Criteria: Staff has determined this activity satisfies the Evaluation Criteria.

Funding Summary / Matching Funds:

<u>Funding Source</u>	<u>Cash</u>	<u>In-Kin\$0d</u>	<u>Total</u>
EagleVail Metropolitan District	\$125,000	\$0	\$125,000
Eagle County Watershed Council	\$0	\$1,000	\$1,000
EagleVail POA	\$0	\$500	\$500
Homestake Peak School	\$0	\$1,000	\$1,000
Scott Schreiber, Wright Water Engineers	\$0	\$5,000	\$5,000
Sub-total	\$125,000	\$7,500	\$132,000
CWCB WSRF Colorado Basin Account	\$25,000	n/a	\$25,000
Totals	\$150,000	\$7,500	\$157,000

CWCB Project Manager: Megan Holcomb

THE COLORADO BASIN ROUNDTABLE
C/O P.O. BOX 1120
GLENWOOD SPRINGS, COLORADO 81602

March 29, 2019

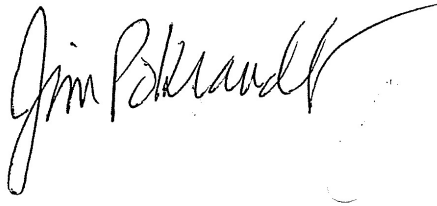
Megan Holcomb
Colorado Water Conservation Board
Water Supply Planning Section
1313 Sherman Street
Denver CO

Dear Megan:

The Colorado Basin Roundtable voted unanimously at its March 25, 2019 meeting to support the WSRF request of \$25,000 for the Eagle-Vail Metro District's plan to improve Stone Creek in Eagle County, work designed to undo some negative effects caused by development over the years.

Both Colorado's Water Plan and the Basin Implementation Plan address stream management planning and the need for healthy streams and riparian areas.

Sincerely yours,

A handwritten signature in black ink, reading "Jim Pokrandt". The signature is fluid and cursive, with a long horizontal stroke extending from the end of the name.

Jim Pokrandt
Chair, Colorado Basin Roundtable



Last Update: July 31, 2018

Colorado Water Conservation Board
Water Supply Reserve Fund Grant Application

Instructions

All WSRF grant applications shall conform to the current [2016 WSRF Criteria and Guidelines](#).

To receive funding from the WSRF, a proposed water activity must be approved by a Roundtable(s) **AND** the Colorado Water Conservation Board (CWCB). The process for Roundtable consideration and recommendation is outlined in the 2016 WSRF Criteria and Guidelines. The CWCB meets bimonthly according to the schedule on page 2 of this application.

If you have questions, please contact the current CWCB staff Roundtable liaison:

Arkansas

Ben Wade
ben.wade@state.co.us
303-866-3441 x3238

**Gunnison | North Platte |
South Platte | Yampa/White**

Craig Godbout
craig.godbout@state.co.us
303-866-3441 x3210

**Colorado | Metro | Rio Grande |
Southwest**

Megan Holcomb
megan.holcomb@state.co.us
303-866-3441 x3222

WSRF Submittal Checklist (Required)
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X	I acknowledge this request was recommended for CWCB approval by the sponsoring roundtable.
X	I acknowledge I have read and understand the 2016 WSRF Criteria and Guidelines .
X	I acknowledge the Grantee will be able to contract with CWCB using the Standard Contract . ⁽¹⁾
Application Documents	
X	Exhibit A: Statement of Work ⁽²⁾ (<i>Word – see Template</i>)
X	Exhibit B: Budget & Schedule ⁽²⁾ (<i>Excel Spreadsheet – see Template</i>)
	Letters of Matching and/or Pending 3 rd Party Commitments ⁽²⁾
X	Map ⁽²⁾
X	Photos/Drawings/Reports
X	Letters of Support
Contracting Documents ⁽³⁾	
X	Detailed/Itemized Budget ⁽³⁾ (<i>Excel Spreadsheet – see Template</i>)
	Certificate of Insurance ⁽⁴⁾ (<i>General, Auto, & Workers' Comp.</i>)
	Certificate of Good Standing ⁽⁴⁾
	W-9 Form ⁽⁴⁾
	Independent Contractor Form ⁽⁴⁾ (<i>If applicant is individual, not company/organization</i>)
	Electronic Funds Transfer (ETF) Form ⁽⁴⁾

(1) Click "Grant Agreements". For reference only/do not fill out or submit/required for contracting

(2) Required with application if applicable.

(3) Additional documentation providing a Detailed/Itemized Budget maybe required for contracting. Applicants are encouraged to coordinate with the CWCB Project Manager to determine specifics.

(4) Required for contracting. While optional at the time of this application, submission can expedite contracting upon CWCB Board approval.



Last Update: July 31, 2018

Schedule		
CWCB Meeting	Application Submittal Dates	Type of Request
January	December 1	Basin Account; BIP
March	February 1	Basin/Statewide Account; BIP
May	April 1	Basin Account; BIP
July	June 1	Basin Account; BIP
September	August 1	Basin/Statewide Account; BIP
November	October 1	Basin Account/BIP

Desired Timeline	
Desired CWCB Hearing Month:	March 2019
Desired Notice to Proceed Date:	

Water Activity Summary		
Name of Applicant	EagleVail Metropolitan District	
Name of Water Activity	Phase 1 – Stone Creek Master Plan	
Approving Roundtable(s)		Basin Account Request(s) ⁽¹⁾
Colorado Basin		Water Supply Reserve Fund \$25,000
Basin Account Request Subtotal		\$25,000
Statewide Account Request ⁽¹⁾		\$
Total WSRF Funds Requested (Basin & Statewide)		\$
Total Project Costs		\$150,000

(1) Please indicate the amount recommended for approval by the Roundtable(s)



Last Update: July 31, 2018

Grantee and Applicant Information	
Name of Grantee(s)	EagleVail Metropolitan District
Mailing Address	PO Box 5660
FEIN	840685829
Grantee's Organization Contact ⁽¹⁾	Steven H. Barber
Position/Title	District Manager
Email	sbarber@eaglevail.org
Phone	970-790-1219
Grant Management Contact ⁽²⁾	Brent Barnum
Position/Title	Superintendent of Golf Courses & Parks
Email	bbarnum@eaglevail.org
Phone	970-949-5686
Name of Applicant (if different than grantee)	
Mailing Address	
Position/Title	
Email	
Phone	

(1) Person with signatory authority

(2) Person responsible for creating reimbursement invoices (Invoice for Services) and corresponding with CWCB staff.

Description of Grantee
Provide a brief description of the grantee's organization (100 words or less).
EagleVail is located in Eagle County, Colorado. EagleVail is a PUD community located within unincorporated Eagle County and was created back in 1972. The EagleVail Metropolitan District is a quasi-municipal government and unincorporated town, governed by a Board comprised of five members elected by the residents of EagleVail. EagleVail's population has grown to 4000 people with approximately 1500 residences. The EVMD operates numerous amenities including managing their water resources. Such amenities and resources include, 3 creeks, 4 holding ponds, a diversion in the Eagle River, 3 pumping stations, 2 irrigation delivery systems, and over 100 acres of irrigated recreational turf.



Last Update: July 31, 2018

Type of Eligible Entity (check one)	
<input checked="" type="checkbox"/>	Public (Government): municipalities, enterprises, counties, and State of Colorado agencies. Federal agencies are encouraged to work with local entities. Federal agencies are eligible, but only if they can make a compelling case for why a local partner cannot be the grant recipient.
<input type="checkbox"/>	Public (Districts): authorities, Title 32/special districts (conservancy, conservation, and irrigation districts), and water activity enterprises
<input checked="" type="checkbox"/>	Private Incorporated: mutual ditch companies, homeowners' associations, corporations
<input type="checkbox"/>	Private Individuals, Partnerships, and Sole Proprietors: are eligible for funding from the Basin Accounts but not for funding from the Statewide Account.
<input type="checkbox"/>	Non-governmental organizations: broadly, any organization that is not part of the government
<input type="checkbox"/>	Covered Entity: as defined in Section 37-60-126 Colorado Revised Statutes

Type of Water Activity (check one)	
<input type="checkbox"/>	Study
<input checked="" type="checkbox"/>	Implementation

Category of Water Activity (check all that apply)		
<input checked="" type="checkbox"/>	Nonconsumptive (Environmental)	
<input checked="" type="checkbox"/>	Nonconsumptive (Recreational)	
<input type="checkbox"/>	Agricultural	
<input checked="" type="checkbox"/>	Municipal/Industrial	
<input type="checkbox"/>	Needs Assessment	
<input checked="" type="checkbox"/>	Education & Outreach	
<input type="checkbox"/>	Other	Explain:

Location of Water Activity	
Please provide the general county and coordinates of the proposed activity below in decimal degrees . The Applicant shall also provide, in Exhibit C, a site map if applicable.	
County/Countries	Eagle County, Colorado USA
Latitude	39 degrees 37'10.07"N
Longitude	106 degrees 29:23.26W



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Water Activity Overview

Please provide a summary of the proposed water activity (200 words or less). Include a description of the activity and what the WSRF funding will be used for specifically (e.g. studies, permitting, construction). Provide a description of the water supply source to be utilized or the water body affected by the activity. Include details such as acres under irrigation, types of crops irrigated, number of residential and commercial taps, length of ditch improvements, length of pipe installed, area of habitat improvements. If this project addresses multiple purposes or spans multiple basins, please explain. The Applicant shall also provide, in Exhibit A, a detailed Statement of Work, Budget, and Schedule.

The EVMD owns and manages a 1.6-mile section of Stone Creek that flows through the EagleVail community. Over the years this section has become unsustainable and difficult to manage. Contributing to its decline has been due to over widened stream sections, man-made alterations and structures, eroded banks, sediment aggradation, and existence of fish barriers. The EVMD has recognized these issues and has undertaken a thoughtful and deliberate process to study and invest in a Master Plan to restore Stone Creek. The goal of the Master Plan after implementation is to leave Stone Creek as a stabilized, self-sustaining, holistic ecosystem with requiring minimal maintenance, with a flourishing aquatic and terrestrial ecosystem. This project will also allow for numerous public engagement opportunities to allow the public understand the resources in its back yard and how to be better stewards of Stone Creek. The Master Plan is divided into five phases that could be completed over several years. These phases are ranked in order of priority with Phase 1 as the most critical. Phase 1 is a 270 foot section of Stone Creek that would address removing to man-made dams, create a terraced channel with a low flow and bankfull channel connected to the floodplain, improve water quality, install fish habitat and stream stabilization structures, provide fish passage, reduce sediment aggradation, decrease channel width and increase channel depth, and stabilize the creek banks. The WSRF would assist the EVMD in the overall costs for Phase 1. Costs include design fees, permitting, construction, and project management fees.

Measurable Results

To catalog measurable results achieved with WSRF funds please provide any of the following values.

	New Storage Created (acre-feet)	
	New Annual Water Supplies Developed or Conserved (acre-feet), Consumptive or Nonconsumptive	
	Existing Storage Preserved or Enhanced (acre-feet)	
270	Length of Stream Restored or Protected (linear feet)	
	Efficiency Savings (indicate acre-feet/year OR dollars/year)	
.25	Area of Restored or Preserved Habitat (acres)	
	Length of Pipe/Canal Built or Improved	
X	Other	Explain: Removal of two Fish Barriers



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Water Activity Justification

Provide a description of how this water activity supports the goals of [Colorado's Water Plan](#), the most recent [Statewide Water Supply Initiative](#), and the respective [Roundtable Basin Implementation Plan and Education Action Plan](#) ⁽¹⁾. The Applicant is required to reference specific needs, goals, themes, or Identified Projects and Processes (IPPs), including citations (e.g. document, chapters, sections, or page numbers).

For applications that include a request for funds from the Statewide Account, the proposed water activity shall be evaluated based upon how well the proposal conforms to Colorado's Water Plan criteria for state support (CWP, Section 9.4, pp. 9-43 to 9-44;) (Also listed pp. 4-5 in [2016 WSRF Criteria and Guidelines](#)).

The 1.6-mile section of Stone Creek that flows through the EagleVail community is facing a significant chapter in its existence. It is in need of great attention in order to secure its future for many decades to come. Stone Creek has suffered the impacts of development in its watershed and its floodplain over the last several decades. The cumulative effect of the loss of riparian buffer, loss of floodplain connectivity, channelization, and the increase in impervious surfaces is visible in the aquatic ecosystem.

Like many other mountain streams in Colorado, a thriving community has sprung up along Stone Creek. The EVMD has recognized their responsibility for the health of the watershed. While the golf course is Audubon Certified and the efforts have been made to protect fish and other aquatic life, the time has come for a more targeted and comprehensive approach.

The EVMD has undertaken a thoughtful and deliberate process to study and invest in the Master Plan to restore Stone Creek. In 2014, the EVMD took its first step by having Aqua Sierra out of Golden, Colorado do a "Stream Feasibility Study" of Stone Creek. The information gathered from the feasibility study then led to a more comprehensive study conducted by The Matrix Design Group out of Denver, Colorado. From this study the Stone Creek Master Plan was developed. The Master Plan is a comprehensive plan that is designed to be used in the restoration of Stone Creek. The EVMD's goal is to use the Master Plan as its guide to restore Stone Creek in a five-phase process to return Stone Creek to a thriving, self-sustaining creek. The Stone Creek Master Plan is designed with the intent to improve several key categories in water management:

1. Water Supply – not only locally in EagleVail but for the greater Colorado River Basin
2. Water Efficiency – what EagleVail uses and returns back to the streams & river systems
3. Water Quality – proper channel design and bank stabilization
4. Drought management – narrower/deeper channel; flood-plain connectivity, and slope
5. Aquatic & Wildlife – fish passage throughout creek system, spawning grounds

Over the past several years the EVMD has partnered with others to educate, communicate, and present a long-term solution to the diversities and deficiencies that face Stone Creek today. Such partnerships include: Scott Schreiber of Wright Water Engineers as the EVMD's water engineer & consultant, the Matrix Design Group and Aqua Sierra for their in-depth studies and plans, the support of the Eagle River Water & Sanitation District, the Eagle River Watershed Council's support through signage and education, the EagleVail POA and their support and community education and outreach, the Town of Vail and there Watershed Education Coordinator, the Eagle County School District specifically Homestake Peak School of Expeditionary Learning through community service and educational opportunities, support through Trout Unlimited, and many EagleVail residents that are passionate about the creek restoration project.

With the assistance of these partnerships, the resources provided by the EVMD, and with the additional funding provided by the Water Supply Reserve Fund, the EVMD's goal would be to complete Phase 1 of the Master Plan in the Fall of 2019. The EVMD's goal is that with accomplishing this first and crucial phase, the momentum would-be set-in motion to contribute and complete the Master Plan in its entirety in the years to come. Once the Master Plan is completed Stone Creek would be a healthier self-sustaining creek that would contribute greatly to the overall Eagle River watershed and the greater Colorado River Basin.

(1) Access Basin Implementation Plans or Education Action Plans from Basin drop down menu.



Last Update: July 31, 2018

Matching Requirements: Basin Account Requests

Basin (only) Account grant requests require a 25% match (cash and/or in-kind) from the Applicant or 3rd party and shall be accompanied by a **letter of commitment** as described in the 2016 WSRF Criteria and Guidelines (submitted on the contributing entity's letterhead). Attach additional sheet if necessary.

Contributing Entity	Amount and Form of Match (note cash or in-kind)
EagleVail Metropolitan District	\$125,000 cash
Eagle County Watershed Council	\$1000 (In-kind services)
EagleVail POA	\$500 (In-kind services)
Homestake Peak School	\$1000 (In-kind services)
Scott Schreiber, Wright Water Engineers	\$5000 (In-kind services)
Total Match	\$132,500
If you requested a Waiver to the Basin Account matching requirements, indicate the percentage you wish waived.	

Matching Requirements: Statewide Account Requests

Statewide Account grant requests require a 50% match as described in the 2016 WSRF Criteria and Guidelines. A minimum of 10% match shall be from Basin Account funds (cash only). A minimum of 10% match shall be provided by the applicant or 3rd party (cash, in-kind, or combination). The remaining 30% of the required match may be provided from any other source (Basin, applicant, or 3rd party) and shall be accompanied by a **letter of commitment**. Attach additional sheet if necessary.

Contributing Entity	Amount and Form of Match (note cash or in-kind):
Total Match	\$
If you requested a Waiver to the Statewide Account matching, indicate % you wish waived. (Max 50% reduction of requirement).	



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Related Studies

Please provide a list of any related studies, including if the water activity is complimentary to or assists in the implementation of other CWCB programs.

EVMD conducts water sampling and analysis three times per year.
Aqua Sierra Inc. – 2014 Feasibility Study and Report
Matrix Design Group – 2016 Stone Creek Master Plan
EVMD – daily monitoring and management

Previous CWCB Grants

List all previous or current CWCB grants (including WSRF) awarded to both the Applicant and Grantee. Include: 1) Applicant name; 2) Water activity name; 3) Approving RT(s); 4) CWCB board meeting date; 5) Contract number or purchase order

Tax Payer Bill of Rights

The Tax Payer Bill of Rights (TABOR) may limit the amount of grant money an entity can receive. Please describe any relevant TABOR issues that may affect the applicant.



Last Update: January 9, 2018

Colorado Water Conservation Board	
Water Supply Reserve Fund	
<u>Exhibit A - Statement of Work</u>	
Date:	December 12, 2018
Water Activity Name:	Stone Creek Master Plan – Phase 1
Grant Recipient:	EagleVail Metropolitan District
Funding Source:	Basin Account
Water Activity Overview: (Please provide brief description of the proposed water activity (no more than 200 words). Include a description of the overall water activity and specifically what the WSRF funding will be used for.	
<p>Stone Creek is a headwater tributary of the Eagle River. It originates in the White River National Forest where it is pristine and healthy in its natural state. As it leaves the National Forest it enters EagleVail, where it was re-aligned and drastically changed during the development area.</p> <p>Over the years this section has become unsustainable and difficult to manage. Contributing to its decline has been due to over widened stream sections, man-made alterations and structures, eroded banks, sediment aggradation, and existence of fish barriers. The EVMD has recognized these issues and has actively pursued a solution in creating a Stone Creek Master Plan. The Master Plan identified numerous areas along the creek that need improvement, including Phase 1 which was given the highest priority.</p> <p>The project goal for Phase 1 is to construct a long-term solution that will help us better utilize the water in Stone Creek for multiple benefits. The primary focus is the protection and enhancement of our aquatic resources. The funding provided by the CWCB would assist the EVMD in the completion of Phase 1 in the Fall of 2019. Phase 1 would address over widened stream channel, bank stabilization, sediment aggradation, water quality, and fish passage through this section of Stone Creek. Our emphasis is to create a balanced self-sustaining aquatic eco-system with beautiful/resilient ponds and streams. This project would also allow for public engagement, education, and contribute greatly to the entire Eagle River Watershed.</p>	
Objectives: (List the objectives of the project)	
<p>The Stone Creek Master Plan was designed with the goal of creating a self-sustaining creek that could endure high and low flows through proper channel cross section and flood plain connectivity, improved water quality, reduced erosion & sediment aggradation, and create fish passage throughout the creek. The Master Plan was designed to be implemented in five phases. These phases have been categorized by importance, with Phase 1 being of the highest importance.</p> <p>Phase 1 List of objectives:</p> <ul style="list-style-type: none">- Remove two man-made dams that are causing sediment aggradation, bank erosion, poor water quality, and that are fish barriers.- Implement a series of smaller drops to improve hydraulics, fish passage, provide habitat, and spawning beds.- Create a low flow channel within a bankfull channel to alleviate aggradation and floodplain connectivity spring runoff, high flow events, and riparian inundation.- By accomplishing Phase 1, our hope would be to create the momentum needed to complete the remaining phases and the Stone Creek Master Plan in its entirety in the years to come.	



Last Update: January 9, 2018

The Stone Creek Master Plan was designed with the goal of creating a self-sustaining creek that could endure high and low flows through proper channel cross section and flood plain connectivity, improved water quality, reduced erosion & sediment aggradation, and create fish passage throughout the creek. The Master Plan was designed to be implemented in five phases. These phases have been categorized by importance, with Phase 1 being of the highest importance.

Phase 1 List of objectives:

- Remove two man-made dams that are causing sediment aggradation, bank erosion, poor water quality, and that are fish barriers.
- Implement a series of smaller drops to improve hydraulics, fish passage, provide habitat, and spawning beds.
- Create a low flow channel within a bankfull channel to alleviate aggradation and floodplain connectivity spring runoff, high flow events, and riparian inundation.
- By accomplishing Phase 1, our hope would be to create the momentum needed to complete the remaining phases and the Stone Creek Master Plan in its entirety in the years to come.
-

Tasks
Provide a detailed description of each task using the following format:
<u>Task 1 - (Phase 1 of The Stone Creek Master Plan)</u>
Description of Task: Phase 1 is a 270 ft section of Stone Creek that has been identified with the following deficiencies. Deficiencies such as; inadequate channeling, hydraulic influences, water quality, man-made alterations & structures, eroded banks, and poor fish passage. The overly wide channel in this section (Phase 1) is producing aggradation of sediment in the creek and ponds. Also, in this section the creek is not connected to the floodplain therefore producing erosive velocities that are causing erosion and failing stream banks. There are also two man-made dams that are too great for fish passage and that affect the overall slope of the channel and the sediment carrying capacity of the creek in this section. These two oversized dams were constructed to create ponds. In doing so, these structures have created large shallow pools that collect sediment and reduce depth for habitat throughout the pools. With the low gradient and the excess width, this has allowed for suspended materials to settle and accumulate in slow moving water thus creating "sediment" islands. Also, in high water flow events such as runoff, the flow is pushed outward causing erosion and unstable banks. These dams not only create shallow depths, collect sediment, and influence bank erosion they also make fish passage nearly impossible.
Method/Procedure:



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Tasks

Phase 1 would include developing a defined channel through this section. This would allow for adequate stream flow during all seasons whether high runoff or low flow. The channel would provide consistent water movement, regardless of flow and eliminate excess sediment build up. This channel would also improve water quality and provide access for fish to move freely up and down stream.

Phase 1 would also consist of eliminating the two man-made dams. By removing the dams, it would create a more desirable slope through this section and a series of drops composed of boulder cross vanes would be implemented. Each drop would be 1 to 2 feet in height with a recommended slope of 1% between each drop. Not only would these boulder cross vanes improve the slope through this section, but they would aid a great deal in erosion control, bank stabilization, fish passage, fish habitat, and better water quality.

Another facet to Phase 1 would be the process of bank stabilization and to lay back the slope for the floodplain connectivity. This would allow relief when waters are high not compromising the integrity of the creek banks. Throughout the process public engagement and education would also take place so that the residents of EagleVail can learn to become good stewards of Stone Creek.

Grantee Deliverable: (Describe the deliverable the grantee expects from this task)

Once Phase 1 is complete and this section of Stone Creek is restored, it will greatly improve water quality, water flow, erosion control, bank stabilization, and fish passage. This section would become self-sustainable and require zero to no maintenance. A goal of the project would be that the EVMD and the Stone Creek Master Plan be an example to follow for other stream restoration projects in the Vail Valley and surrounding mountain region.

CWCB Deliverable: (Describe the deliverable the grantee will provide CWCB documenting the completion of this task)

The EVMD would provide documentation and updates to the CWCB throughout the process, from the beginning to its completion. Once completed, the EVMD would communicate to the CWCB the affects it has had on Stone Creek and any further developments in implementing the remaining Phases of the Master Plan.

Our goal is that with the completion of Phase 1, that the EVMD along with other partners could set the foundation and create the momentum needed in completing the Stone Creek Master Plan in its entirety. Once the Master Plan is implemented, Stone Creek would be a healthy self-sustaining creek that would contribute greatly to the entire Eagle County Watershed and Colorado River Basin. The Stone Creek Restoration and the EVMD could set the standard in Stream Restoration and be an example for other communities to follow.

Budget and Schedule

Exhibit B - Budget and Schedule: This Statement of Work shall be accompanied by a combined [Budget and Schedule](#) that reflects the Tasks identified in the Statement of Work and shall be submitted to CWCB in excel format. A separate excel formatted Budget is required for engineering costs to include rate and unit costs.

Reporting Requirements

Progress Reports: The grantee shall provide the CWCB a progress report every 6 months, beginning from the date of issuance of a purchase order, or the execution of a contract. The progress report shall describe the status of the tasks identified in the statement of work, including a description of any major issues that have occurred and any corrective action taken to address these issues. The CWCB may withhold reimbursement until satisfactory progress reports have been submitted.

Final Report: At completion of the project, the grantee shall provide the CWCB a Final Report on the grantee's letterhead that:

- Summarizes the project and how the project was completed.
- Describes any obstacles encountered, and how these obstacles were overcome.
- Confirms that all matching commitments have been fulfilled.
- Includes photographs, summaries of meetings and engineering reports/designs.



Last Update: January 9, 2018

Reporting Requirements

Payments

Payment will be made based on actual expenditures, must include invoices for all work completed and must be on grantee's letterhead. The request for payment must include a description of the work accomplished by task, an estimate of the percent completion for individual tasks and the entire Project in relation to the percentage of budget spent, identification of any major issues, and proposed or implemented corrective actions.

The CWCB will pay the last 10% of the entire water activity budget when the Final Report is completed to the satisfaction of CWCB staff. Once the Final Report has been accepted, and final payment has been issued, the water activity and purchase order or contract will be closed without any further payment. Any entity that fails to complete a satisfactory Final Report and submit to CWCB within 90 days of the expiration of a purchase order or contract may be denied consideration for future funding of any type from CWCB.

Performance Requirements

Performance measures for this contract shall include the following:

(a) Performance standards and evaluation: Grantee will produce detailed deliverables for each task as specified. Grantee shall maintain receipts for all project expenses and documentation of the minimum in-kind contributions (if applicable) per the budget in Exhibit B. Per Grant Guidelines, the CWCB will pay out the last 10% of the budget when the final deliverable is completed to the satisfaction of CWCB staff. Once the final deliverable has been accepted, and final payment has been issued, the purchase order or grant will be closed without any further payment.

(b) Accountability: Per the Grant Guidelines full documentation of project progress must be submitted with each invoice for reimbursement. Grantee must confirm that all grant conditions have been complied with on each invoice. In addition, per the Grant Guidelines, Progress Reports must be submitted at least once every 6 months. A Final Report must be submitted and approved before final project payment.

(c) Monitoring Requirements: Grantee is responsible for ongoing monitoring of project progress per Exhibit A. Progress shall be detailed in each invoice and in each Progress Report, as detailed above. Additional inspections or field consultations will be arranged as may be necessary.

(d) Noncompliance Resolution: Payment will be withheld if grantee is not current on all grant conditions. Flagrant disregard for grant conditions will result in a stop work order and cancellation of the Grant Agreement.

**COLORADO**Colorado Water
Conservation Board

Department of Natural Resources

Colorado Water Conservation Board**Water Supply Reserve Fund****EXHIBIT B - BUDGET AND SCHEDULE - Direct & Indirect (Administrative) Costs****Date:** December 12th, 2018**Water Activity Name:** Phase 1 - Stone Creek Master Plan**Grantee Name:** EagleVail Metropolitan District

<u>Task No.</u> ⁽¹⁾	<u>Description</u>	<u>Start Date</u> ⁽²⁾	<u>End Date</u>	<u>Matching Funds</u> (cash & in-kind) ⁽³⁾	<u>WSRF Funds</u> (Basin & Statewide combined) ⁽³⁾	<u>Total</u>
Task No.(1)	Phase 1 - Stone Creek Master Plan	October 1st, 2019	October 1st, 2020	\$125,000	\$25,000	\$150,000
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
						\$0
Total				\$125,000	\$25,000	\$150,000

(1) The single task that include costs for Grant Administration must provide a labor breakdown (see Indirect Costs tab below) where the total WSRF Grant contribution towards that task does not exceed 15% of the total WSRF Grant amount.

(2) Start Date for funding under \$100K - 45 Days from Board Approval; Start Date for funding over \$100K - 90 Days from Board Approval.

(3) Round values up to the nearest hundred dollars.

- Additional documentation providing a Detailed/Itemized Budget may be required for contracting. Applicants are encouraged to coordinate with the CWCB Project Manager to determine specifics.

- Reimbursement eligibility commences upon the grantee's receipt of a Notice to Proceed (NTP)

- NTP will not be accepted as a start date. Project activities may commence as soon as the grantee enters contract and receives formal signed State Agreement.

The CWCB will pay the last 10% of the entire water activity budget when the Final Report is completed to the satisfaction of the CWCB staff project manager. Once the Final Report has been accepted, the final payment has been issued, the water activity and purchase order (PO) or contract will be closed without any further payment. Any entity that fails to complete a satisfactory Final Report and submit to the CWCB with 90 days of the expiration of the PO or contract may be denied consideration for future funding of any type from the CWCB.

- Additionally, the applicant shall provide a progress report every 6 months, beginning from the date of contract execution

- Standard contracting procedures dictate that the Expiration Date of the contract shall be 5 years from the Effective Date.

Phase 1 - Stone Creek Master Plan

[illegible]

STONE CREEK MASTER PLAN

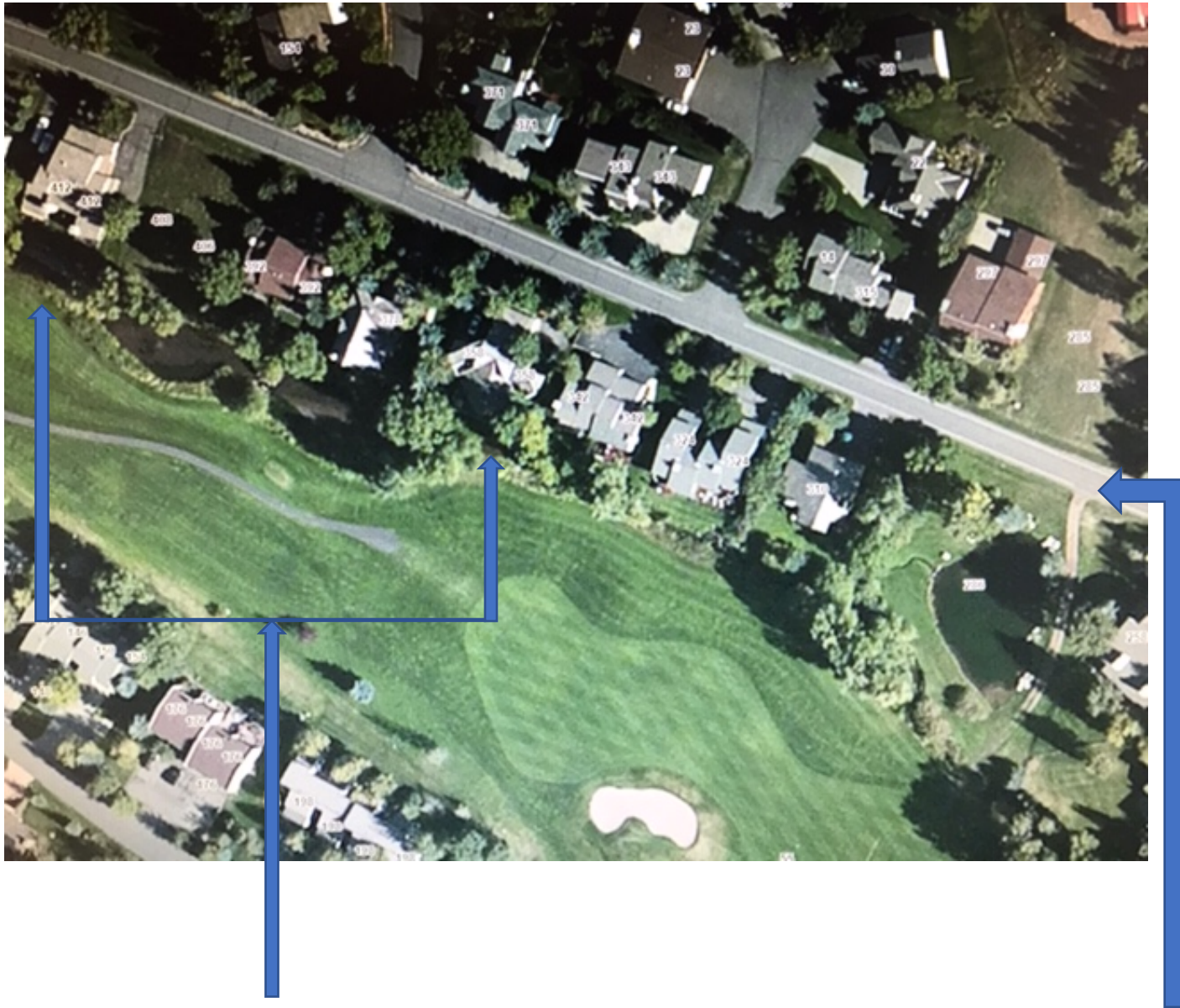
Phase 1 – Location Map



The Community of EagleVail is located at:
Lat 39 degrees 37'13.42 N & Long 106 degrees 29'32.71" W
State: Colorado Elevation: 7600 feet

Phase 1 Location
in EagleVail

Phase 1 – Location Map (Close up)

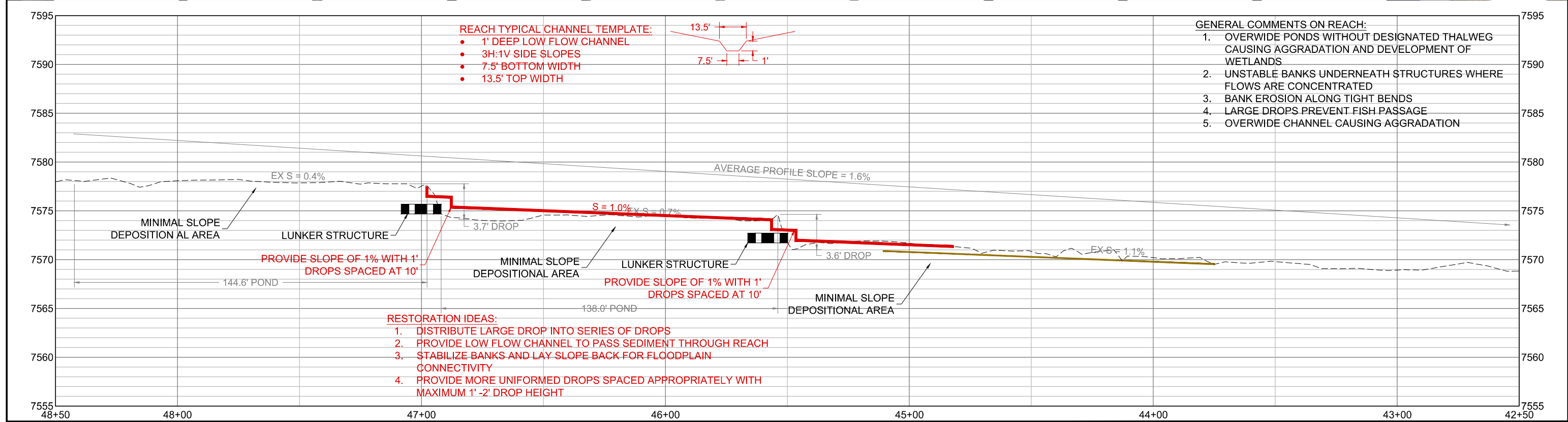


Phase 1 – 270 ft section located on Hole 14, EagleVail Golf Course

Stone Creek Blvd & Holland Pond
Access point to Phase 1 construction

Phase 1 - Stone Creek Master Plan

SHEET No. 8



REFERENCE DRAWINGS
X-MDG22x34

COMPUTER FILE MANAGEMENT
FILE NAME: R:\15.503.004 (Stone Creek Golf Course)\Dwg\Conceptual Plan\CONCEPTUAL_Mapbook.dwg
CTB FILE: ---
PLOT DATE: 6/8/2016 6:55 AM
THIS DRAWING IS CURRENT AS OF PLOT DATE AND MAY BE SUBJECT TO CHANGE.

SHEET KEY

LEGEND

DROP STRUCTURE		FILL CHANNEL	
J-HOOK		FISH PASSAGE	
BANK STABILIZATION		PRIORITY PROJECTS	
LAY SLOPES BACK		NEW ALIGNMENT	

PREPARED BY:

Matrix
DESIGN GROUP

PREPARED FOR:

EAGLE-VAIL GOLF CLUB

STONE CREEK MASTER PLAN

EAGLE-VAIL GOLF CLUB
EAGLE-VAIL METRO DISTRICT

PLAN & PROFILE
STA: 48+50 TO STA: 42+50

DESIGNED BY: SDS	SCALE	DATE ISSUED:	05/02/16	DRAWING No.
DRAWN BY: SDS	HORIZ 1"=20'			
CHECKED BY: RDK	VERT 1"=4'	SHEET	8 OF 16	8



Dear Grant Committee Members,

As a representative of a neighboring community committed to being a good steward for its watershed, I would like to express strong support for the project for which Eagle-Vail metro district is requesting funding. Stone Creek has suffered the impacts of development in its watershed and its floodplain over the last several decades. The cumulative effect of the loss of riparian buffer, loss of floodplain connectivity, channelization of the stream and increase in impervious surfaces is visible in the aquatic ecosystem.

Eagle-Vail has undertaken a thoughtful and deliberative process to study and address those sources of contamination and degradation. Like many other mountain streams in Colorado, a thriving community has sprung up along Stone Creek. The residents of Eagle-Vail and managers of the Eagle-Vail Golf Course have begun to recognize their responsibility for the health of the watershed. While the golf course is Audubon Certified and some efforts have been made to protect fish and other aquatic life, the time has come for a more targeted and comprehensive approach.

In Vail, where I work, we have an impaired creek (Gore Creek) and have identified many of the same causes of degradation that Eagle-Vail has identified in its study of Stone Creek. Their proposed approach to restoring Stone Creek resembles our own in many ways, and ours has begun to result in improved aquatic invertebrate numbers after only two years.

Stone Creek and Gore Creek are two among dozens of creeks in Eagle County that have suffered the unintended consequences of rapid development over the last 50 years. It is heartening to see communities like Eagle-Vail recognize their responsibility for the health of our rivers and streams. Our local watershed organization, Eagle River Watershed Council, has done an outstanding job of supporting and advising communities like Vail and Eagle-Vail as they begin to take action to protect their waterways. I am beginning to see increased awareness of river and creek health issues in our community and a movement to act has begun to gain traction. In funding this project, you have an opportunity to help catalyze this effort and add momentum to a movement that seeks to protect the entire Eagle River Watershed, one small stream at a time.

Sincerely,

Peter Wadden M.A.

Town of Vail Watershed Education Coordinator



Ted Vickerman

970-376-1456 tedvic@comcast.net 23 Coyote Circle -Eagle-Vail- Avon, Co

August 27, 2018

Grant Application

To Grant Committee-

My name is Ted Vickerman and my family and I have lived in the Eagle Vail subdivision for 20 years on the banks of Stone Creek. Stone creek is not only a significant tributary to the Eagle and Colorado Rivers but also a vital part of our community. I feel that water quality and wildlife habitat are 2 vital components to the health and well being of our area.

The Eagle Vail Metro District has shown the ability to meet the challenging needs of our small valley. I feel that Eagle Vail can become leaders in the Golf Course communities throughout the valley and make a big impact on water quality with stream restoration projects. Stream Restoration on Stone Creek will have an amazing result on the Eagle Valley Watershed. Please help us make Stone Creek be the start of positive change in Eagle County.

Sincerely yours,

Ted Vickerman and Family

Eric Phannenstiel

PO Box 2222 • Avon, CO 81620 • Phone: 970.376-1027 •
E-Mail: ephannenstiel@gmail.com



Date: 8/27/2018

Mr. Steve Barber
District Manager
EagleVail Metro District

Dear Mr. Barber:

I would like to voice my support for the funding of the Stone Creek Restoration project that you are currently proposing. Having lived in EagleVail for over twenty years, Stone Creek has a very special place in my heart. I fish and ride my mountain bike along it in the summer months, and cross country ski along it in the winter months and walk my dog along it's banks all year long. It is an integral part of our community and is certainly a resource that is worth restoring and preserving. I understand that there is funding available to help restore this essential resource and I fully support funding it wholly.

I am a Nordic ski coach in the winter months and I often times lead large groups of middle schoolers along the Stone Creek drainage and we often times pause to admire the trickle in the winter and the torrent in the spring. I am also a Boy Scout leader and we have had multiple outings along this drainage between EagleVail and Beaver Creek Resort. It serves as a great outdoor classroom by which to teach our scouts the importance of preserving our natural resources. In the summer, I am a fly-fishing guide and I have witnessed spawning brown trout in the autumn and rainbow trout (to a lesser extent) in the spring. As a tributary to the Eagle River, this is an important resource that the wild trout rely on for their survival, and preserving and restoring it is of paramount importance.

Please let me know if there is anything that I can personally do or help communicate in the effort to secure funding for the restoration of Stone Creek.

Sincerely,

Eric Phannenstiel
Boy Scout Leader, Fly Fishing Guide, Nordic Ski Coach, Concerned Citizen of Eagle Vail

August 22, 2018

BRYAN CAVE LEIGHTON PAISNER LLP
One Kansas City Place
1200 Main Street Suite 3800
Kansas City MO 64105 2122
T: +1 816 374 3200
F: +1 816 374 3300

www.bclplaw.com

VIA E-MAIL

Steven H. Barber
District General Manager
Eagle Vail Metropolitan District
P.O. Box 5660
Avon, CO 81620

Re: Stone Creek Golf Course

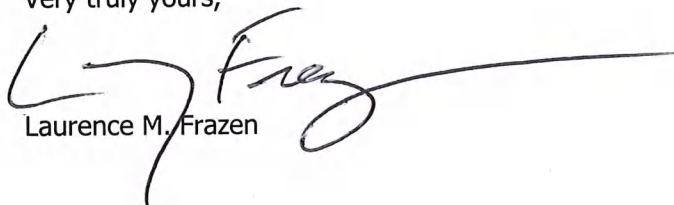
Dear Steve:

Steve, I am writing as a continuation of our ongoing discussion about the condition of that portion of Stone Creek that is adjacent to the women's tee box on the 14th hole. When my late wife Lisa and I bought our home (which sits right at the women's tee box) Stone Creek formed a picturesque pond. Over the course of the next few years, the buildup of sediment and debris created an island of mud and weeds. My neighbors and I want a long term solution to the issues in this portion of Stone Creek. It is impossible to look at this area and not think it is one of the most unsightly areas of the Creek on the golf course. I look at the beauty of the Creek as it runs along holes 6, 11 and 12 for example, and get very depressed at the condition of the Creek outside our homes.

In addition to improving the aesthetics restoration of this portion of the Creek is needed to (i) reduce maintenance (as you know crews are constantly trying to stay ahead of the debris and weed growth), (ii) improve sediment transportation, (iii) stabilize the eroding banks, (iv) improve water quality, and (v) create a habitat for the trout which were at one time plentiful in this section of the Creek.

While my neighbors and I are uniformly frustrated, we would welcome the opportunity to work with you and the rest of the EV Community to solve this lingering problem. We all share the common goal of restoring the Creek to its historic beauty – something we can be proud of and something that will enhance the beauty of our Community.

Very truly yours,


Laurence M. Frazen



Wright Water Engineers, Inc.

818 Colorado Avenue, Suite 307, P.O. Box 219
Glenwood Springs, Colorado 81602
(970) 945-7755 TEL
(970) 945-9210 FAX

www.wrightwater.com
e-mail: sschreiber@wrightwater.com

January 2, 2019

Colorado Water Conservation Board
Colorado Basin Roundtable

Re: CWCB Water Supply Reserve Funds – Stone Creek Restoration in EagleVail

Dear GOCO Grant Selection Committee:

Wright Water Engineers, Inc. (WWE) is pleased to write this letter of support for the Water Supply Reserve Fund grant application being submitted by the EagleVail Metropolitan District for the Stone Creek stream restoration Phase 1 project beginning in 2019. This is necessary to provide a resilient, holistic ecosystem that can be used as an example project the state can be proud of.

I was the lead engineer on the Stream Restoration Master Plan developed for Stone Creek in 2017. I am a homeowner in EagleVail. I am also the President of Denver Trout Unlimited and reside on a number of other non-profit boards and technical advisory groups throughout the state. I have been able to enjoy the Stone Creek corridor both professional and personally and understand the great intrinsic value a creek like Stone Creek can provide to its communities as well as the ecological benefits enjoyed by all users up and downstream of this watershed. As part of the Stone Creek Master Plan I donated a significant amount of time and have continued to support these endeavors on a philanthropic basis due to my great interest and believe in this creek.


As lead engineer on the Stone Creek Master Plan I understand the current deficiencies that exist throughout Stone Creek, but also the potential that exists to develop Stone Creek into an exemplary water course with a vibrant and resilient ecosystem. There are a number of areas that are in dire need of restoration, none more than the section of stream located along the 14th hole. The creek itself has a great 'backbone' but needs help in developing restoration practices to fully leverage this beautiful watershed. What these means is that substantial work is not necessary to get the stream back on a healthy trajectory.

The area around hole 14 is known for its aggradational issues as well as its fish barriers. The sediment that is accumulating throughout this section is causing an over widened stream that is very shallow with reduced water quality. In turn the ecosystem throughout suffers. The section of creek is in a transitional geomorphological scenario where it is trying to repair itself and through this grant we will be able to increase the maturation process to provide benefits now opposed to 50 to 100 years down the road. The fish barriers that exist are limiting the viability of the species to move further up into the headwaters to ultimate rearing areas. Many fish can be seen stacking up at the downstream end of these barriers, just looking for a way to move upstream.

WWE is in full support of this grant and applaud the Metropolitan district for leading this charge. This will be a project that not only provides restoration but can be used as a teaching tool with multiple educational opportunities for the community.

Very truly yours,

WRIGHT WATER ENGINEERS, INC.

By 
Scott Schreiber, P.E.
Senior Water Resources Engineer



330 Broadway, Unit D
PO Box 5740
Eagle, Colorado 81631

970-827-5406
info@erwc.org
www.erwc.org
Tax ID#: 20-4448864



Advocates for our rivers

August 21, 2018

To Whom It May Concern:

I submit this letter on behalf of Eagle River Watershed Council (ERWC) to give our support of EagleVail's Stone Creek Restoration Project scheduled to begin in 2019. ERWC, as a potential project partner, is enthusiastic about the benefits of the project to the watershed and its clear connection to our mission to advocate for the health and conservation of the Upper Colorado and Eagle River basins through research, education and projects.

We strive to protect and enhance the high-quality natural, scenic and economic values that our rivers and tributaries provide to the citizens, visitors and wildlife of Eagle County's watersheds. The Stone Creek Restoration Project will help with those protections and enhancements through bank stabilization and improved sediment transport, water quality, and fish passage, as well as a narrowed channel.

ERWC has been working on river restoration and enhancement projects along the Eagle River in EagleVail through a commercial area upstream of this project site for over a year and has been approached by the Town of Avon to do similar work downstream. These projects all work to address impacts from human development along the streams of our narrow valley. By dealing with concerns on Stone Creek, which also has significant development, these improvements will be seen through a contiguous stretch of river, including a significant tributary, greatly increasing the immediate and downstream water quality.

I respectfully encourage you to give the Stone Creek Restoration Project application the highest consideration.

Sincerely,

A handwritten signature in black ink, appearing to read "Holly Loff".

Holly Loff
Executive Director

Homestake Peak School of Expeditionary Learning

Principal Stephanie Gallegos



To Whom It May Concern:

I am pleased to write this letter in support of the Stone Creek restoration project. Every spring our 8th graders at Homestake Peak volunteer time as part of a community service day to help clean up Stone Creek. Stone Creek is a vital part of the Eagle Vail community and provides water for many recreational amenities. This is a day that the students and teachers look forward to all year long and students and teacher work side by side to help where needed. Some of the teachers have shared that they have seen students who have been hard to motivate in a traditional setting come to life and they see a completely different side to them.

As an Expeditionary Learning school we have several principles that guide our work with our students. Two of those principles are what we call "The Natural World" which is a belief that a direct and respectful relationship with the natural world refreshes the human spirit and teaches the recurring cycles and cause and effect. We want our students to learn to become stewards of the earth for future generations. The work with the Stone Creek restoration project helps to make this belief live.

We also believe that students and teachers are strengthened by consequential service to others and one of our school's functions is to prepare students with the attitude and skills to learn from and be of service.

We hope to be part of this project for years to come.

Stephanie Gallegos
HPS Principal

Project Photo Gallery

Phase 1 – Stone Creek Master Plan

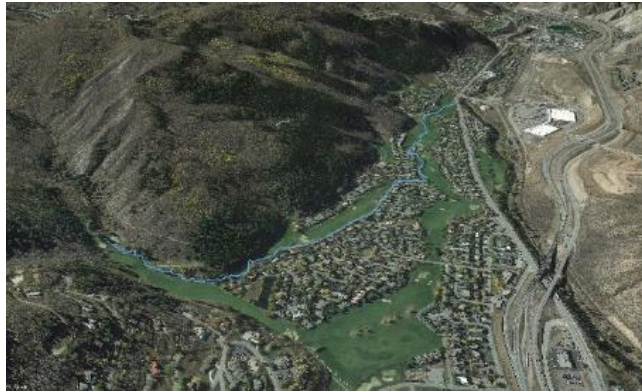


Figure 1A – Aerial Photo of Stone Creek through the EagleVail



Figure 1B – Sediment Laden Pond at Hole 14



Figure 1C – Eroded Banks at Hole 14

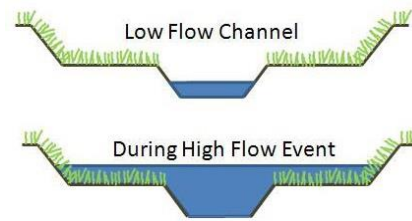


Figure 1D – Low flow channels provide fish habitat in all conditions

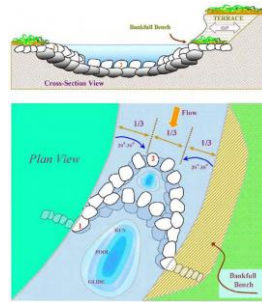


Figure 1E – Boulder Cross Vane and Constructed Bankfill Bench



Figure 1F – Fish spawning in Stone Creek

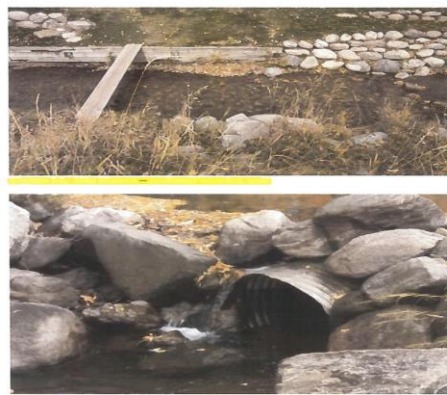


Figure 2A – Man-made retaining walls, structures, and weirs.



Figure 2B – Large oversized pond created by oversized weir and extensive bank erosion

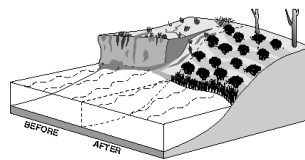


Figure 2C – Bank Stabilization



Figure 6A – Ted Vickerman and son surveying Stone Creek

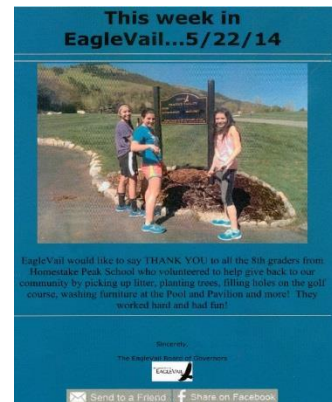


Figure 6B – 8th graders on Service Day