

Colorado Water **Conservation Board** Department of Natural Resources

Last Updated: July 2017

Colorado Water Conservation Board

Water Plan Grant Application

Instructions

To receive funding for a Water Plan Grant, applicant must demonstrate how the project, activity, or process (collectively referred to as "project") funded by the CWCB will help meet the measurable objectives and critical actions in the Water Plan. Grant guidelines are available on the CWCB website.

If you have questions, please contact CWCB at (303) 866-3441 or email the following staff to assist you with applications in the following areas:

Supply and Demand Gap Projects: Rebecca.Mitchell@state.co.us

Water Storage Projects: Anna.Mauss@state.co.us

Conservation, Land Use Planning: Kevin.Reidy@state.co.us

Education & Innovation Activities: Mara.MacKillop@state.co.us

Agricultural Projects: Gregory.Johnson@state.co.us

Environmental & Recreation Projects: Linda.Bassi@state.co.us

Applicants interested in submitting an 'Intent to Apply' in the future are encouraged to check here and fill in all sections with the best information available at the time. Exhibits excluded.

This "Intent to Apply" will help CWCB prioritize Projects that are not ready for fully completed Water Plan Grant Application due to the initial timeframe and deadlines required.

Water Project Summary					
Name of Applicant	American Whitewater (AW)				
Name of Water Project	Assessing Nonconsumptive Recreational Needs and Opportunities in the Rio Grande River Basin				
CWP Grant Request Amount		\$39,200			
Other Funding Sources Walton Family Foundation		\$ 39,200			
Other Funding Sources		\$			
Applicant Funding Contribution		\$11,760			
Total Project Cost		\$90,160			



Applicant & Grantee Information					
Name of Grantee(s)	American Whitewater				
Mailing Address	P.O. Box 1540 Cullowhee, NC 28723				
FEIN	Non-profit # 23-7083760				
Organization Contact	Nathan Fey				
Position/Title	Colorado River Stewardship Director				
Email	nathan@americanwhitewater.org				
Phone	(303) 859-8601				
Grant Management Contact	Nathan Fey				
Position/Title	Colorado River Stewardship Director				
Email	nathan@americanwhitewater.org				
Phone	(303) 859-8601				
Name of Applicant (if different than grantee)					
Mailing Address					
Position/Title					
Email					
Phone					



Description of Grantee/Applicant

Provide a brief description of the grantee's organization (100 words or less).

<u>American Whitewater(AW)</u> is a national non-profit with a mission "to conserve and restore America's whitewater resources and to enhance opportunities to enjoy them safely". American Whitewater's Colorado River Stewardship Program represents recreation interests in the development of programs, policies, and cooperative management strategies that protect and enhance river health and recreational needs while balancing the needs of cities and farms. AW has conducted recreational flow studies in Colorado that have informed State and Federal water planning efforts, including the Colorado River Basin Study, State Water Supply Initiative, Non-Consumptive Needs Assessments and several Wild & Scenic River Alternative Management efforts.



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Type of Eligible Entity (check one)

	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.								
	Public (Districts): Authorities, Title 32/special districts (conservancy, conservation, and irrigation districts), and water activity enterprises.								
	Private Incorporated: Mutual ditch companies, homeowners associations, corporations.								
	Private Individuals, Partnerships, and Sole Proprietors: Private parties may be eligible for funding.								
X	Non-governmental organizations (NGO): Organization that is not part of the government and is non-profit in nature.								
	Covered Entity: As defined in Section 37-60-126 Colorado Revised Statutes.								

Type of Water Project (check all that apply)				
Х	Study			
	Construction			
	Identified Process or Program			
	Other			

	Category of Water Project (check all that apply)
	Supply and Demand Gap Projects - Multi-beneficial projects and those projects identified in basin implementation plans to address the water supply and demand gap. (Applicable Exhibit A Task(s))
	Water Storage Projects - Projects that facilitate the development of additional storage, artificial recharge into aquifers, and dredging existing reservoirs to restore the reservoirs' full decreed storage capacity. (Applicable Exhibit A Task(s))
	Conservation and Land Use Planning Projects - Activities and projects that implement long-term strategies for conservation, land use, and drought planning. (Applicable Exhibit A Task(s))
	Engagement & Innovation Projects - Activities and projects that support water education, outreach, and innovation efforts. Please fill out the Supplemental Application available on the website. (Applicable Exhibit A Task(s))
	Agricultural Projects - Projects that provide technical assistance and improve agricultural efficiency. (Applicable Exhibit A Task(s))
X	Environmental & Recreation Projects – Projects that promote watershed health, environmental health, and recreation. (Applicable Exhibit A Task(s) 1;2;3;4;5;6)



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Location of Water Project						
Please provide the general county and coordinates of the proposed project below in decimal degrees . The Applicant shall also provide, in Exhibit C, a site map if applicable.						
County/Counties Conejos; Hinsdale; Mineral; Rio Grande						
Rivers	Conejos River, Rio Grande River, Treasure Creek					
Latitude	N/A					
Longitude	N/A					

Water Project Overview

Please provide a summary of the proposed water project (200 words or less). Include a description of the project and what the CWP Grant funding will be used for specifically (e.g., studies, permitting process, construction). Provide a description of the water supply source to be utilized or the water body affected by the project, where applicable. 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, and area of habitat improvements, where applicable. 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, Other Funding Sources/Amounts and Schedule.

American Whitewater will coordinate directly with the Rio Grande BRT (RGBRT) to implement existing programs identified in the Nonconsumptive Toolbox that address data gaps related to streamflow needs for recreation. The RGBRT is planning a Boatable Days Study as part of a basinwide stream management planning effort, and the BRT has invited AW to assist with the Study. This Study will provide an objective, science-based measure of how whitewater recreation opportunities might change (+/-) under future conditions and supply scenarios. AW has completed similar studies in the Colorado, Yampa, and Southwest Basins, and AW is proposing to extend our research efforts to assist the Rio Grande Basin in defining a baseline of recreational non-consumptive flow needs, from which the BRT can model the effects of future Projects and processes. CWP and matching funds will be used to support coordination with the BRT and local stakeholders, conduct recreational flow preference studies¹ on priority river reaches in the Rio Grande Basin, and complete the Boatable Days Study. This Project will establish a quantitative baseline of current resource conditions supporting recreational opportunities, and aid the RGBRT in determining what, if any, change in recreation opportunities are attributable to IPPs and future hydrological changes.

1. Stafford, E., Fey, N., and Vaske, J. J. (2016) Quantifying Whitewater Recreation Opportunities in Cataract Canyon of the Colorado River, Utah: Aggregating Acceptable Flows and Hydrologic Data to Identify Boatable Days. River Res. Applic., doi: 10.1002/rra.3049.



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Measurable Results						
To catalog measurable results achieved with the CWP Grant funds, please provide any of the following values as applicable:						
	New Storage Created (acre-feet)					
	New Annual Water Supplies Developed or Conserved (acre-feet), Consumptive or Nonconsumptive					
	Existing Storage Preserved or Enhanced (acre-feet)					
	Length of Stream Restored or Protected (linear feet)					
	Efficiency Savings (indicate acre-feet/year OR dollars/year)					
	Area of Restored or Preserved Habitat (acres)					
	Quantity of Water Shared through Alternative Transfer Mechanisms					
	Number of Coloradans Impacted by Incorporating Water-Saving Actions into Land Use Planning					
3	Other Explain: Number of rivers assessed for recreational boating and opportunities.					



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Water Project Justification

Provide a description of how this water project supports the goals of <u>Colorado's Water Plan</u>, the most recent <u>Statewide Water Supply Initiative</u>, and the applicable Roundtable <u>Basin Implementation Plan</u> and <u>Education Action Plan</u>. 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).

The proposed water project shall be evaluated based upon how well the proposal conforms to Colorado's Water Plan Framework for State of Colorado Support for a Water Project (CWP, Section 9.4, pp. 9-43 to 9-44;)

American Whitewater's proposed project in the Rio Grande Basin will help achieve goals outlined in Colorado's Water Plan (CWP), the state's Non-Consumptive Needs Assessment (NCNA) Toolbox, and the Rio Grande Basin Implementation Plan (BIP). Quantifying recreational streamflow needs and opportunities is imperative to 5 of the 11 necessary steps for developing a stream management plan, including steps 3, 4, 5, 7, and 9 (CWP, 6-168). Additionally, this project helps meet Long-Term Goal #2 for Environmental and Recreation Projects, since existing whitewater boating opportunities must be inventoried before they can be protected or enhanced (CWP, 6-157). Using the Boatable Days Tool to assess the impact of future water supply projects on whitewater boating opportunities will help design beneficial multi-purpose projects, as outlined in Long-Term Goal #3 (CWP, 6-157). In addition to informing individual projects, using common methodologies for assessing recreational boating needs and opportunities in each basin is critical to improve inter-basin and intra-basin agreements and statewide goals. The state's NCNA Toolbox recommends that American Whitewater's Flow Surveys be used to assess recreational boating needs (NCNA Toolbox, App. C, 6). Furthermore, maintaining a certain percentage of Boatable Days is listed as an example of a non-consumptive measurable outcome (NCNA Toolbox, 7). American Whitewater is interested in working with the Rio Grande Basin to make Boatable Days a common metric throughout the state, while meeting objectives identified in the CWP and in current planning efforts within the Basin.

In 2015, Trout Unlimited and Dinatale Water Consultants completed a Boatable Days Study on four reaches of the Rio Grande main stem (RGBIP, 114). Now, the RGBRT is interested in completing a more robust Boatable Days Study as part of a proposed Stream Management Plan project. A new Boatable Days Study has the potential to look at different craft types (e.g., rafts, kayaks, etc.) and additional river reaches, and to assess the impact of new IPPs and hydrological scenarios on existing whitewater boating resources. The outcome of American Whitewater's partnership with the RGBRT will directly address basin-wide goal #14 to "maintain and enhance water-dependent recreational activities". American Whitewater is excited that the RGBRT has been so proactive with the use of the Boatable Days Tool in the basin and we look forward to working with the BRT on this project.



Related Studies

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

Stafford, E., Fey, N., and Vaske, J. J. (2016) Quantifying Whitewater Recreation Opportunities in Cataract Canyon of the Colorado River, Utah: Aggregating Acceptable Flows and Hydrologic Data to Identify Boatable Days. River Res. Applic., doi: 10.1002/rra.3049.

Colorado River Basin Supply and Demand Study: Appendix D2. US Bureau of Reclamation (2012) <u>https://www.usbr.gov/lc/region/programs/crbstudy/finalreport/Technical%20Report%20D%20-</u>%20System%20Reliability%20Metrics/TR-D_Appendix2_FINAL.pdf

Defining Streamflow Needs on the Lower Dolores River: Integrating Specific and Overall Flow Evaluations of Recreation Quality. Dolores River Dialogue (2011) http://ocs.fortlewis.edu/drd/pdf/Appendix-B_%20Stream-Flow-Evaluation_AW.pdf

Yampa-White Basin Watershed Flow Evaluation Tool Final Report Sanderson, J., B. Bledsoe, L. Poff, T. Wilding and N. Fey. 2012. Yampa-White Basin Roundtable Watershed Flow Evaluation Tool study. Prepared by CDM Smith for The Nature Conservancy

Colorado Basin Roundtable Watershed Flow Evaluation Tool Study Sanderson, J., B. Bledsoe, L. Poff, T. Wilding, B. Miller and N. Fey. 2012. Colorado Basin Roundtable Watershed Flow Evaluation Tool study. Prepared by CDM Smith for the Northwest Colorado Council of Governments.

Previous CWCB Grants, Loans or Other Funding

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; 6) Percentage of other CWCB funding for your overall project.

American Whitewater has not previously received funding from CWCB resources.

Taxpayer Bill of Rights

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

There are no relevant TABOR issues that may affect American Whitewater's application.



Submittal Checklist					
X	I acknowledge the Grantee will be able to contract with CWCB using the <u>Standard Contract</u> .				
Exhibit A					
X	Statement of Work ⁽¹⁾				
X	Budget & Schedule ⁽¹⁾ (Spreadsheet)				
Pending	Letters of Matching and/or Pending 3 rd Party Commitments ⁽¹⁾				
Exhibit C					
X	Map ⁽¹⁾				
N/A	N/A Photos/Drawings/Reports				
Pending Letters of Support (Support letter from Basin Roundtable encouraged)					
Certificate of Insurance (General, Auto, & Workers' Comp.)					
X	Certificate of Good Standing with Colorado Secretary of State ⁽²⁾				
	W-9 ⁽²⁾				
	Independent Contractor Form ⁽²⁾ (If applicant is individual, not company/organization)				
Engagem	ent & Innovation Grant Applicants ONLY				
Х	X Engagement & Innovation Supplemental Application ⁽¹⁾				

(1) Required with application.

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



Colorado Water Conservation Board

Water Plan Grant - Exhibit A

Statement Of Work				
Date:	July 31, 2017			
Name of Applicant:	American Whitewater (AW)			
Name of Water Project:Assessing Nonconsumptive Recreational Needs and Opportunit the Rio Grande River Basin				
Funding Source:	Colorado's Water Plan Grant Fund			
	ease provide a summary of the proposed water project (200 words or less). ed from Page 5 of the CWP Grant Application.			
programs identified in the No for recreation. The RGBRT is management planning effort, provide an objective, science- (+/-) under future conditions a Yampa, and Southwest Basin defining a baseline of recreati effects of Projects and process coordination with the BRT an priority river reaches in the R establish a quantitative baseling	ordinate directly with the Rio Grande BRT (RGBRT) to implement existing nconsumptive Toolbox that address data gaps related to streamflow needs s planning a Boatable Days Study as part of a basin-wide stream and the BRT has invited AW to assist with the Study. This Study will based measure of how whitewater recreation opportunities might change and supply scenarios. AW has completed similar studies in the Colorado, s, and AW is proposing to extend our research efforts to assist the Basin in onal non-consumptive flow needs, from which the BRT can model the ses affecting the basin. CWP and matching funds will be used to support ad local stakeholders, conduct recreational flow preference studies ¹ on io Grande Basin, and complete the Boatable Days Study. This Study will ne of current resource conditions supporting recreational opportunities, and g what, if any, change in recreation opportunities are attributable to IPPs ges.			

1. Stafford, E., Fey, N., and Vaske, J. J. (2016) Quantifying Whitewater Recreation Opportunities in Cataract Canyon of the Colorado River, Utah: Aggregating Acceptable Flows and Hydrologic Data to Identify Boatable Days. River Res. Applic., doi: 10.1002/rra.3049.



Objectives: List the objectives of the project.

- 1) American Whitewater representatives will work directly with the RGBRT and local stakeholders to implement a Boatable Days Study as part of the Basin's Stream Management Planning effort.
- Coordinate with the RGBRT and local stakeholders to review river reaches identified in the Basin Non-Consumptive Needs assessment as priorities for assessing whitewater boating needs and opportunities.
- 3) Determine optimal and acceptable flow range criteria on prioritized river reaches using American Whitewater's Flow Survey approach.
- 4) Conduct a Boatable Days Analysis on priority river reaches to determine existing boating opportunities under four hydrologic year-types.
- 5) Coordinate with the RGBRT and its committees to model impacts (+/-) to recreational opportunities (boatable days) attributable to future water supply projects and hydrological changes being contemplated in the basin.
- 6) Identify and pursue opportunities to report and distribute the results of the study with the RGBRT, local stakeholders, and the general public.

Tasks

Provide a detailed description of each project task using the following format:

Task 1 – Coordinate with the Rio Grande Basin Roundtable

Description of Task:

American Whitewater representatives will work directly with the RGBRT and local stakeholders to implement the project. AW will respond to requests for information from the Roundtable and participate in BRT and committee meetings as requested. AW will assist with the Basin's Boatable Days Study effort as needed, helping with the coordination and implementation of each necessary project phase.

Method/Procedure:

- Finalize a work plan outlining project objectives that are coordinated with Basin Roundtable activities and work with BRT to establish a tentative study timeline, meeting schedule, and communications plan.
- At the end of the project period, report on the success of each objective and the results of the study project.



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

American Whitewater will maintain good communications with the RGBRT and local stakeholders within the basin and provide expertise, as needed, on Nonconsumptive recreational needs to inform Basin Projects and Methods.

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

American Whitewater will include a written summary of coordinated efforts with the Roundtable in regular reports to the CWCB.

Tasks

Provide a detailed description of each task using the following format:

Task 2 – Partner with the Rio Grande Basin Roundtable to Conduct a Recreational Flow Evaluation Study to Establish Optimal and Acceptable Flow Criteria in the Basin.

Description of Task:

American Whitewater will work with the Rio Grande BRT and its sub-committees and contractors to review priority river reaches identified in the Rio Grande BIP and Non-Consumptive Needs Assessment, to identify target river reaches for additional analysis. American Whitewater will then work with the RGBRT and its contractors to develop and conduct Flow Evaluation Studies on targeted river reaches in the basin, using peer-reviewed techniques to collect and organize overall and specific flow evaluations to define optimal and acceptable flow ranges for whitewater boating. Resulting flow criteria will define resource conditions needed as input into the Boatable Days Analysis.

Method/Procedure:

- In coordination with RGBRT and local stakeholders, identify target river reaches within the Rio Grande Basin for Flow Preference Study and subsequent Boatable Days Analysis.
- Identify stream gauges on (or correlated to) each study reach and determine a range of plausible flows to include in Flow Preference survey.
- Design the survey to assess flow preferences for overall acceptable, low acceptable, optimal, and high acceptable levels by boating craft (e.g., rafts, kayaks, etc.) on each priority river reach.
- Distribute the survey to the boating community using American Whitewater's website and social media venues, at community river festivals, and through the RGBRT's network.
- Implement the Flow Acceptability Agreement Index to analyze survey results and determine optimal and acceptable flow criteria for each targeted river reach.
- The results of the Flow Preference Study will help to define whitewater boating conditions in the Rio Grande Basin and will be a key component of the Boatable Days Analysis.



Tasks

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

American Whitewater will work with the RGBRT's Boatable Days Study effort to establish flow preference criteria on priority river reaches in the Rio Grande Basin, which is necessary to complete the remaining Tasks of the proposed project and will help inform the RGBRT and local stakeholders of whitewater boating needs within the basin.

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

American Whitewater will provide the CWCB with a final report of the Flow Preference Study, including the designed survey and survey responses.

Tasks

Provide a detailed description of each task using the following format:

Task 3 – Assist the Rio Grande Basin Roundtable with completing a Boatable Days Analysis to Define Existing Whitewater Boating Opportunities in the Basin

Description of Task:

In response to the BRT's request that AW assist with the Basin's Boatable Days Study, AW will help implement the Boatable Days Tool to define existing whitewater boating opportunities on previously targeted study reaches within the Rio Grande Basin. This tool was developed with the goal of providing an easy-to-use tool to analyze a given river reach in the context of the "boatable days" metric developed by American Whitewater. The boatable days metric describes the number of days a river reach can be used for recreational boating based on a range of acceptable and optimal flow criteria (determined through Task 2 above). Given the uncertainty of future hydrological scenarios, the tool allows a simple sensitivity analysis using historic flow data. This can be done using a monthly percent reduction/increase determined by the Basin Roundtable, or by reductions to the historic flows. The purpose of this analysis is to help identify when a reach will see a noticeable change in boatable days as well as the general magnitude of flow variation that causes a decrease or increase of boatable days.

The outputs from the Boatable Days Analysis can inform key trade-off discussions within the Rio Grande Basin and between other basins.



Tasks

Method/Procedure:

- Compile results from the Flow Preference Study completed in Task 2 of the proposed project.
- Compile historical flow data from gauges (e.g., USGS, CODWR) on (or correlated to) each river reach.
- Define hydrologic year types (wet, wet-typical, dry-typical, and dry) by ranking the total annual flow (in acre-ft) at a given stream gage over a given time period and then dividing the total annual flows into quartiles.
- Compare the daily average streamflow with established flow criteria, and if the streamflow on a particular day falls within the established flow criteria, that day is counted as a Boatable Day.
- Complete the same analysis for every day of the study period in all year types and for each flow range (overall acceptable, low acceptable, optimal, and high acceptable levels).
- The Boatable Days in each flow class are then summed by month for comparison with other months throughout the year. The mean (average) number of Boatable Days by month for each year type is determined in order to compare the various recreation experiences that occur across different year types.
- The results of the Boatable Days Analysis will quantify existing whitewater boating opportunities in the Rio Grande River Basin.

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

American Whitewater will define existing whitewater boating opportunities and resource conditions in the Rio Grande Basin, to inform ongoing watershed assessment efforts and provide a baseline for the RGBRT to consider in future IPPs and hydrological changes within the basin.

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

American Whitewater will provide the CWCB with a final report on the Boatable Days Analysis in the Rio Grande Basin.



Tasks

Provide a detailed description of each task using the following format:

Task 4 – Assist the Rio Grande Basin Roundtable with Completing a Final Report Defining Existing Whitewater Boating Opportunities in the Rio Grande Basin

Description of Task:

American Whitewater will work collaboratively with the RGBRT and its sub-contractors to produce a final report defining existing whitewater boating opportunities on priority river reaches in the Rio Grande Basin. The report will be made readily available to the RGBRT, local stakeholders, and the general public.

Method/Procedure:

- Write a final report on the Boatable Days Analysis completed in Task 3.
- Make the report readily available to the RGBRT, and coordinate with the RGBRT to share the report with local stakeholders and the general public.

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

American Whitewater will work directly with the RGBRT to write a final report on the Flow Preference Study completed in Task 1 and the Boatable Days Analysis completed in Task 2, providing the Basin with a baseline for whitewater boating opportunities.

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

American Whitewater will provide the CWCB with the final report.



Tasks

Provide a detailed description of each task using the following format:

Task 5 - Coordinate with the Rio Grande Basin Roundtable to Assess the Impact of Future IPPs and Hydrological Changes on Existing Whitewater Boating Opportunities in the Rio Grande River Basin Description of Task:

In Task 5, the Boatable Days Tool will be used to evaluate the impact that future IPPs and/or hydrological scenarios have on existing whitewater boating opportunities in the Rio Grande River Basin. Once a baseline for existing recreational opportunities is established (Task 3), percent reduction or monthly change analysis may be performed to determine the impacts of future IPPs and hydrological changes, such as dams, diversions, shifting water uses, and changing climates. American Whitewater will work closely with the RGBRT and local project proponents to determine which analysis is appropriate and most beneficial to the RGBRT.

Sensitivity Analysis: AW will perform a percent reduction sensitivity analysis that reduces the historic flow data by a given percentage and recalculates the boatable days metric for each reduction. The percentages currently implemented into the Tool are 2.5, 5, 10, 15, 20, and 25% reductions, however these can be amended based on the needs of the BRT. Results will be calculated for dry, dry-typical, wet-typical, and wet hydrological year types classified as the <25th, 25-50th, 50-75th, and >75th percentiles, respectively.

Monthly Analysis: AW can perform a monthly change analysis which allows the BRT or Project Proponent to specify a monthly percentage reduction or increase in flow at the target node. This allows the AW and our Roundtable partners to look at "what-if" scenarios on a monthly time-step.

The work plan for Task 5 will largely depend on which IPPs and hydrological changes are contemplated within the Rio Grande River Basin. American Whitewater will continue to assist the RGBRT with the Boatable Days Tool for the duration of the project period and as needed in the future.

Method/Procedure:

- Work directly with the RGBRT to determine which hydrologic changes are being contemplated in _ the basin, and coordinate modelling efforts.
- Complete sensitivity or monthly change analyses using the Boatable Days Tool to determine the changes to existing whitewater boating opportunities, as defined in Task 3, from future modeled conditions.
- To assess other hydrological changes, such those related to climate change, work with the RGBRT and its contractors to identify climate change models to assess impacts to existing whitewater boating opportunities and nonconsumptive needs.
- Assess new projects and hydrological changes as they are proposed or determined.
- Present the outputs of the sensitivity analyses to the RGBRT, project proponents, and the general public as appropriate – in coordination with the BRT and its outreach plan.

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

American Whitewater will work with the BRT to evaluate the impact of IPPs and hydrological changes contemplated within the Rio Grande Basin Implementation Plan on existing whitewater boating opportunities, and the findings will help inform the RGBRT and project proponents and likely reduce burden of environmental reviews during project permitting and mitigation.



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

American Whitewater will provide the CWCB with a final report of all the IPPs and hydrological changes that were assessed during the project period.

Tasks

Provide a detailed description of each task using the following format:

Task 6 – Meet CWCB Reporting Requirements

Description of Task:

American Whitewater will work to meet the CWCB's reporting requirements, including providing the CWCB with deliverables for each task, progress reports, and a final report.

Method/Procedure:

- Complete CWCB deliverables outlined in each Task.
- Complete progress reports to the CWCB every 6 months.
- Complete a final report on the project.

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

American Whitewater expects that this task will help American Whitewater reflect on the successes and obstacles of the project, while informing the CWCB of our efforts.

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

American Whitewater will provide the CWCB with Task deliverables, progress reports, and a final report, as outlined in the reporting guidelines.



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.

Reporting Requirements

Progress Reports: The applicant 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 applicant shall provide the CWCB a Final Report on the applicant'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.

The CWCB will withhold disbursement the last 10% of the budget until 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 purchase order or grant will be closed without any further payment.



COLORADO

Colorado Water Conservation Board

Department of Natural Resources

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Water Plan Grant - Exhibit A

Budget and Schedule

Date:July 31, 2017

Name of Applicant: American Whitewater

Name of Water Project: Assessing Nonconsumptive Recreational Needs and Opportunities in the Rio Grande River Basin

Task No.	Task Description	Start Date ⁽¹⁾	End Date	Water Project Funding Category	Gr	ant Funding Request	Match Funding		Total	
1	Coordinate with the Rio Grande Basin Roundtable	1/15/2018	1/15/2021	Environmental/Rec	\$	18,000.00	\$	18,000.00	\$36,000	
2	Partner with the Rio Grande Basin Roundtable to conduct a Recreational Flow Evaluation Study to establish optimal and acceptable flow criteria in the Basin	4/1/2018	9/1/2018	Environmental/Rec	\$	6,000.00	\$	6,000.00	\$12,000	
ა	Assist the Rio Grande Basin Roundtable with completing a Boatable Days Analysis to define existing whitewater boating opportunities in the Rio Grande Basin	9/1/2018	11/1/2018	Environmental/Rec	\$	4,000.00	\$	4,000.00	\$8,000	
4	Assist the Rio Grande Basin Roundtable with completing a Final Report defining existing whitewater boating opportunities in the Rio Grande Basin	11/1/2018	12/15/2018	Environmental/Rec	\$	1,100.00	\$	1,100.00	\$2,200	
	Coordinate with the Rio Grande Basin Roundtable to assess the impact of future IPPs and hydrological changes on existing whitewatee boating opportunities in the Basin	11/1/2018	1/15/2021	Environmental/Rec	\$	9.000.00	\$	9,000.00	\$18,000	
6	Meet CWCB reporting requirements	6/15/2018	1/15/2021	Environmental/Rec	\$	1,100.00	\$	1,100.00	\$2,200	
N/A	Administraive Overhead	1/15/2018	1/15/2021	Environmental/Rec			\$	11,760.00	\$11,760	
				Total		\$39,200		\$50,960	\$90,160	

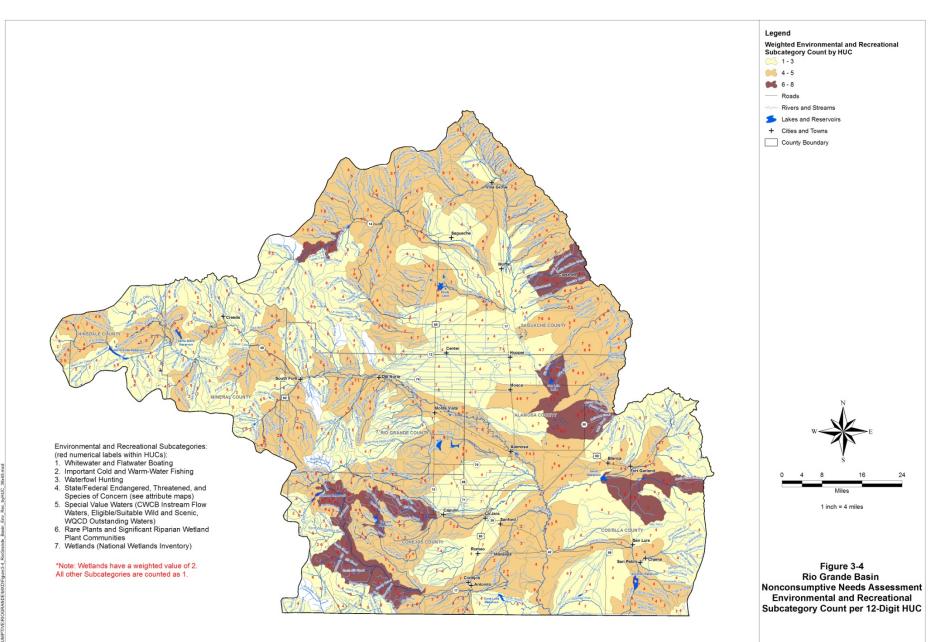
(1) Start Date for funding under \$100K, minimum 45 Days from Board Approval; Start Date for funding over \$100K, minimum 90 Days from Board Approval. •Round values up to the nearest hundred dollars.

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 grantee enters contract and receives formal NTP if prior to the listed "Start Date".

•The applicant shall provide a progress repost every 6 months, beginning from the date of contract execution.

•CWCB will withhold disbursement of the last 10% of the total grant amount until a Final Report is completed to the satisfaction of CWCB staff (2017 CWP Grant Guidelines).







Refer to Appendix B of the NCNA Mapping Report for a complete list of data sources and Appendix D of the Mapping Report for other basin-specific mapping information.

DRAFT