

TAHOE REGIONAL PLANNING AGENCY
RESEARCH AND ANALYSIS
REQUEST FOR PROPOSALS (RFP)
Integrated Nearshore Algal Monitoring
RFP#2200016

Announcement: September 27th, 2022

Project Description: The Tahoe Regional Planning Agency (TRPA) is requesting proposals for the design and implementation of a monitoring program to quantify the abundance and distribution of algae in Lake Tahoe's nearshore.

Evaluation: Proposals will be evaluated based on their ability to effectively and efficiently gather data to inform resource management decisions and address management questions.

Questions: All questions should be submitted in writing to the RFP Coordinator:

Dan Segan
Tahoe Regional Planning Agency
PO Box 5310
128 Market Street
Stateline, NV 89449
775-589-5233
dsegan@trpa.gov

1. Introduction and Agency Background

Introduction:

On behalf of the partners of the Tahoe Nearshore Agency Working Group (Lahontan Regional Water Quality Control Board, Nevada Division of Environmental Protection, United States Environmental Protection Agency), the Tahoe Regional Planning Agency (TRPA) is requesting proposals for monitoring and assessment of attached and free-floating algae in Lake Tahoe's nearshore. The goal of the monitoring and assessment program is to collect the information necessary to answer questions about changes in the distribution and abundance of algae in Lake Tahoe's nearshore. The primary management objectives are identified below:

1. Compare the abundance of nearshore algae between years
2. Compare the distribution of nearshore algae between years
3. Assess trends in the abundance and distribution through time

The nearshore of Lake Tahoe is the area of relatively shallow water (depth <21m) around the lake's perimeter that is the focus of recreational activities and appreciated for its aesthetic qualities. The nearshore is where the public interacts with the lake for the first time, and often what drives public perception of the lake's health (Heyvaert et al., 2013). It also provides vital habitat for native species.

Nearshore algal growth was among the first visible signs of the onset of cultural eutrophication in Lake Tahoe in the 1960s (Heyvaert, et al. 2013). Charles Goldman noted that when he first began studying the lake in 1958, the rocks along the shore showed only slight growth of attached algae. However, by the late 1960s, attached algae was found in the shallows and on boat hulls, and waves piled up mats of material along the shore. These observations coincided with the period of rapid growth and development within the basin during the 1960s and could be attributed to an increased nutrient loading from wastewater (wastewater treatment and pumping out of Lake Tahoe's watershed began in the early 1970s), surrounding watershed via urban and stream runoff, as well as groundwater discharge. Attached algal monitoring in Tahoe began in 1982, and since then nearly 30 years of data have been collected. While no lake-wide trends in abundance have been identified, public perception of increased algae in the nearshore led to a peer review of the existing monitoring program, and this call for alternative approaches to measuring nearshore algae.

TRPA Background Information:

TRPA was created when the governors and lawmakers in California and Nevada approved a bi-state compact that created a regional planning agency to oversee development at Lake Tahoe. In 1969, the United States Congress ratified the agreement and created the Tahoe Regional Planning Agency. The Agency is authorized under California law (California Government Code sections 66800 through 66801), Nevada law (NRS 277.190 through 227.200), and Federal law (PL 96-551).

TRPA is located on the border of the states of California and Nevada, between the Sierra Crest and the Carson Range. Approximately two-thirds of the region is in California, with one-third within the State of Nevada. The Tahoe Region contains an area of about 501 square miles, of which approximately 191 square miles comprise the surface waters of Lake Tahoe. Overlapping jurisdictions in California include

the City of South Lake Tahoe, El Dorado County and Placer County. Overlapping jurisdictions in Nevada include Washoe County, Douglas County and Carson City. Tourism is the economic heartbeat of the region and visitors to the area far outnumber the year-round resident population of just over 55,000 people.

The mission of the TRPA is to “lead the cooperative effort to preserve, restore, and enhance the unique, natural, and human environment of the Lake Tahoe Region.” The Agency is the leading partner for plans and actions to preserve the environment of the Tahoe region. The Agency establishes transportation and land use policy. It works with local, regional, state, and federal organizations and governments to facilitate a cooperative approach in implementing these plans and programs.

TRPA is governed by a 15-member Board. California and Nevada each have seven members comprised of elected officials and governmental appointees. In addition, a non-voting member is appointed by the President of the United States of America. Further information can be obtained at the Agency’s website at www.trpa.gov.

2. RFP Schedule & Submission Process

PUBLIC RECORDS

The documents submitted in response to this RFP should be considered public information and subject to FOIA disclosure. Restrictions on any information submitted will render a bid non-responsive.

TRPA assumes no contractual obligation to enforce any exemption on behalf of a respondent to the RFP.

RFP COORDINATOR:

Upon release of this RFP, all communications concerning this proposal request should be directed to the RFP Coordinator listed below. All questions and requests for clarification must be received via email by the deadline on the RFP schedule listed below. Email shall have the subject stating: “**RFP INQUIRY – RFP # 2200016 Integrated Nearshore Algal Monitoring**”. Responses will be posted to the website <https://www.trpa.gov/contact/request-for-proposals/> in accordance with the RFP schedule listed below. The respondent should rely only on written statements issued by the RFP Coordinator.

Dan Segan
Tahoe Regional Planning Agency
PO Box 5310
128 Market Street
Stateline, NV 89449
775-589-5233
dsegan@trpa.gov

REQUEST FOR PROPOSAL SCHEDULE:

TRPA anticipates the following schedule, which is subject to change:

Date of Announcement:

9/27/22

Proposing Firms' Questions Due:	10/21/22
Questions and Answers posted to www.trpa.gov	11/1/22
Deadline for Proposal Submissions:	12/2/22
Sealed Proposals Opened:	12/5/22
Selection of Consultants for Interviews (if necessary):	12/8/22
Consultant Interviews (if necessary):	12/12/22
Anticipated Award of Contract:	12/20/22
Commencement of Work:	1/7/23

Late proposal submissions will not be considered and will be returned unopened to the sender.

PROPOSAL SUBMISSION:

Proposals must be submitted electronically to bids@trpa.gov. Electronic submittals and supporting documentation (Microsoft Word or PDF) must be emailed with the subject line **“DO NOT OPEN – RFP # 2200016 Integrated Nearshore Algal Monitoring”** to bids@trpa.gov

All opened proposals and accompanying documentation become the property of TRPA and will not be returned. Late proposals will not be reviewed.

TERMS AND CONDITIONS:

- TRPA reserves the right to amend the RFP schedule or issue amendments to the RFP at any time. TRPA also reserves the right to cancel or reissue the RFP, to reject any or all proposals, to waive any irregularities or informalities in the selection process, and to accept or reject any item or combination of items. TRPA reserves the right to request clarification of information from any bidder or to request supplemental material deemed necessary to assist in the evaluation of the proposal. TRPA reserves the right to accept any agreement deemed by the agency to be in its best interest. This RFP does not obligate the TRPA to accept or contract for any expressed or implied services.
- In the event that the bidder to whom any services are awarded does not execute a contract within thirty (30) calendar days after TRPA approval, TRPA may give notice to such bidder of intent to award the contract to the next most qualified bidder or to call for new proposals and may proceed to act accordingly.
- TRPA will not reimburse any bidder for any of the costs involved in the preparation and submission of responses to this RFP or in the preparation for and attendance at subsequent interviews.
- Selected consultant(s) will be expected to sign the TRPA Consultant Services Agreement listed on <https://www.trpa.gov/contact/request-for-proposals/>. Any desired edits to this agreement should be included in the Contractor’s proposal. Desired edits may not be accepted by TRPA.
- The Consultant or its employees may be subject to the provisions of Article III (a)(5) of the Tahoe Regional Planning Compact (P.L. 96-551, 94 Stat. 3233, Cal. Gov’t Code Section 66801, N.R.S. 277.200), which requires disclosure of any defined economic interest and prohibits such persons from attempting to influence Agency decisions affecting certain economic interests.

- Bidder shall thoroughly examine and be familiar with these terms and conditions of the TRPA Consultant Services Agreement. The failure or omission of any bidder to receive or examine this document shall in no way relieve any bidder of obligations with respect to this proposal or the subsequent contract.
- Bidder must certify to the best of its knowledge and belief that it and its principals are not presently debarred, suspended, proposed for debarment, declared ineligible, or voluntarily excluded from covered transactions by any federal department or agency. TRPA will verify bidders' status by checking the SAM system.
- All subcontractors, if any, used by the selected consultant will require prior written consent of TRPA and will be subject to all provisions stipulated in the TRPA Consultant Services Agreement.
- This contract will be funded by federal and state grant awards and is subject to federal and state grant award requirements including, but not limited to, cost principles and administrative regulations including but not limited to travel and per diem rates, mileage rates, and allowable cost requirements.

3. Project Description

Overview of Project

TRPA is requesting proposals for the design and implementation of a monitoring program to assess algae in Lake Tahoe's nearshore. The project includes the design of the monitoring program, and two years of implementation of that monitoring program.

1. Objectives.

The proposed monitoring program should quantify the extent and distribution of attached and suspended algal communities in Tahoe's nearshore (lake area with a depth <21m) to provide the information necessary to assess the status and trends in nearshore algal conditions. The proposed monitoring program should be designed and implemented to provide information necessary to address one or more of the following aims:

1. Identify changes in the abundance and distribution of algae through time (annual and seasonal)
2. Identify changes in algal taxonomic composition
3. Identify changes in the abundance and distribution of algae that may be conspicuous to the casual observer or recreator.

The agency recognizes it may not be possible to assess all of the above aims with the resources available. Proposals should clearly articulate which of the above aims it expects to answer and which are less likely to be answered. The proposal should describe how the monitoring methods and locations relate to previously conducted algae assessment work, and the ability to compare data collected under the proposed framework to data collected in prior years.

2. Background.

The U.C. Davis Tahoe Environmental Research Center (TERC) began monitoring attached algae in 1982 and has collected data spanning 30 years (1982-85, 1989-93, 2000-2003, and 2005-2021). Recent periphyton monitoring consists of regular sampling at nine "routine" sampling sites (the number of locations has varied historically from six to ten). At each routine site, algal biomass (as chlorophyll a) is

sampled five times annually from natural rock surfaces at a depth of 0.5 meters below the water level at the time of sampling. A second type of sampling, referred to a “synoptic” monitoring, occurs once a year at 40 additional sites. The timing of synoptic monitoring varies annually and is intended to capture biomass at its spring peak. The synoptic monitoring includes collection of chlorophyll a at a subset of the sites, as well as a rapid assessment method that quantifies a periphyton biomass index.

Two recent TERC-led analyses of periphyton biomass data collected since 1982 have identified no significant lake-wide change in periphyton biomass between 1982 and 2015 (Hackley et al., 2016) and 1989 and 2019 (Atkins et al., 2021). At the site level, the analyses identified an increase at one site, Incline West, and decreases at three sites: Zephyr Point, Dollar Point, and Sugar Pine Point (Atkins et. al, 2021). The analysis of 14-19 years of data from the 40 synoptic sites also suggested little to no change in nearshore periphyton had occurred. These findings are inconsistent with the perception of Tahoe residents, visitors, and managers that the distribution and abundance of algae in Lake Tahoe’s nearshore environment has increased over the last several decades. Acknowledging that scientific findings do not align with the perception that algal growth is increasing suggests a new monitoring design to assess algal abundance and distribution in the nearshore.

To address this issue, TERC proposed revisions to the monitoring program protocols. In January 2020, the Nearshore Agency Working Group (NAWG) asked the Tahoe Science Advisory Council (Science Council) to conduct a peer review of the monitoring program and propose changes to identify potential reasons why the existing program may not have captured stakeholder perceptions of increased nearshore algal growth (Brothers et al., 2020). Reviewers found several possible factors:

- Public perception of increased algae may be due to floating algae (metaphyton) not captured by the existing monitoring program.
- Biomass measurements are influenced by factors that may complicate trend analysis (e.g., lake level, wave action).
- The existing program focus on measuring “peak” algal abundance in the spring is inconsistent with the timing of greatest human/nearshore interaction in the summer.
- Misalignment between monitoring locations and locus of recreational activities

In the summer of 2020, TERC completed a feasibility study of several remote sensing platforms to characterize metaphyton populations. The study concluded that monitoring metaphyton was feasible at a nominal additional cost to the periphyton monitoring program (UCD, 2020).

Additional detail and the full peer review report is provided in Attachment B - *Lake Tahoe Periphyton Monitoring Program Engaged Review* (TSAC 2020).

3. Scope.

The scope includes the design of a monitoring program and two years of implementation of the monitoring. The monitoring plan should consider the location and number of sites necessary to quantify lake-wide algal abundance and distribution and assess change through time.

4. Budget.

Total project costs cannot exceed \$330,000. Costs should include documentation of the proposed approach in a monitoring plan, and two years of plan implementation. It should also include a separate option budget for an annual monitoring program after the completion of the initial two-year term. The expected annual cost of implementing the monitoring program should not exceed \$150,000.

Term of Engagement

It is the intent of the Agency to contract for services presented herein for a term of two years to implement the pilot algae monitoring. After the two-year pilot, it is the intent of the agency to revise as necessary and continue the monitoring program going forward.

Project Tasks and Deliverables

Task 1 Project Administration

Provide all technical and administrative services needed for contract completion; monitor, supervise, and review all work performed; coordinate budgeting and scheduling to assure that the contract is completed within budget, on schedule, and in accordance with approved procedures, applicable laws, and regulations; submit brief (1-2 page) quarterly progress reports outlining activities undertaken in the last quarter, issues encountered, and any recommended modifications. Quarterly progress reports to be submitted with quarterly invoices.

Provide regular interaction/communication with the TRPA Project Manager who will coordinate with Nearshore Agency Work Group (NAWG) and Tahoe Science Advisory Council (TSAC) to ensure the project goals and objectives are met.

Deliverable 1: Regular project reports and invoicing.

Major Milestones: Quarterly reports and invoices.

Task 2 Sampling and Analysis Plan

Deliverable 2: Develop a sampling and analysis plan (SAP), that identifies sampling locations, frequency, and methods. The SAP is expected to be a refinement of the proposal. The SAP should include standard operating procedures, quality assurance, and laboratory analytical procedures. A draft of the plan will be circulated to the TRPA Project Manager, who will coordinate review by the NAWG and/or TSAC. Final SAP shall address review comments. No sampling may occur prior to approval by the TRPA Project Manager.

Major Milestones:

- **January 2023**- Draft sampling plan submitted for review.
- **March 2023**- Revised sampling plan submitted and approved for implementation.

Task 3 Monitoring plan implementation –

Deliverable 3: Implementation of the approved SAP (Task 2) for two years. Implementation includes both data collection, data processing, qa/qc, and the transmission of data to the agency.

Major Milestones:

- **September 2023** – Completion of year one data collection.
- **December 2024** – Submission of all data collected in year one.
- **September 2024** – Completion of year two data collection.
- **December 2025** – Submission of all data collected in year two.

Task 4 Reporting

Deliverable 4: Midterm project report – Report detailing findings/observations from the first year of implementation of the SAP, and any recommended adjustments for the second year. Adjustment recommendations may not be implemented prior to approval by the TRPA Project Manager.

Major Milestones:

- **December 2023** – Midterm project report.

Deliverable 5: Final project report - Final project report including a summary and discussion of all data collected during the project, data analysis and interpretation, and recommendations. At a minimum the program should include (a) a comparison of data collected in the two years of implementation, (b) proposed methods to analyze change through time, (c) to the extent feasible a discussion of potential factors that may be driving observed year to year differences, and (d) recommendations for program modification.

At the time the final report is submitted for review, all data collected, must be uploaded into a publicly accessible data platform (LTINFO or other platform as agreed to by the project team). A draft report will be circulated to TRPA Project Manager and NAWG members for review and the final document will address review comments.

Major Milestones:

-
- **December 2024** – Draft final project report
- **February 2025** – Final report.

Optional Task 5– Annual Monitoring Plan

Upon completion of Tasks 1-4 above, TRPA may extend the term of this award up to three additional years for additional monitoring. TRPA reserves the right not to exercise this option with the awardee and to do a new RFP for this additional annual work. However, in the event TRPA wishes to exercise this option, TRPA seeks the following deliverables:

- **Optional Deliverable #5: Annual monitoring plan:**

4. Minimum Required Proposal Contents

MINIMUM REQUIRED PROPOSAL CONTENTS:

All proposal responses should address the following matters:

1. Definition of the Project: Indicate your understanding of the project purpose, objectives, and desired outcomes. Max page limit: 2.
2. Project approach: Describe how the project will be managed, implemented, and evaluated to accomplish the objectives and requirements outlined in this request. The proposal should identify the proposed methods and provide a discussion of the rationale for selection of the methods, and the benefits of using the suggested methods relative to other possible methods. Max page limit: 4.

3. Team Organization: Describe how the project team will be organized to facilitate effective management, implementation, and evaluation. Max page limit: 1
4. Qualifications and Experience: Provide a summary of company and project team qualifications related to the work. Section should highlight specific projects with a brief (one paragraph) description of the work performed and a link to additional information. Max page limit: 3.
5. Schedule and Cost: The initial term of this contract shall be for 2 years, with an option to extend for three additional years to implementation Optional Task #5. Provide an itemized cost estimate based on the Tasks described in Scope of Work section Tasks 1-4. Please provide a separate cost estimate for Optional Task 5 above for three additional years. Cost estimates should be task based, and include a "Not to Exceed" cap and a bid guarantee. Max page limit: 1
6. References: Provide up to three (3) client references of similar sized and/or governmental accounts which the bidder has served in a similar capacity over the past two years and/or is currently serving. Provide a description of work performed, contact person, telephone number, and email address for each reference customer. References should be submitted as an attachment to this response. Max page limit: 3.

5. Notification and Selection Process

Review of Proposals

After the deadline date the Agency shall review and evaluate all proposals for responsiveness to the RFP in order to determine whether the Proposer possesses the professional qualifications necessary for the satisfactory performance of the services requested. The Agency shall also investigate qualifications of all Proposers to whom the award is contemplated, and the Agency may request clarifications of proposals directly from one or more Proposers. In reviewing the proposals, the Agency may consider the following:

1. The experience and past performance of the Proposer and its agents, employees, and sub-consultants in completing projects of a similar type, size, and complexity.
2. The Agency may consider Proposer's timely and accurate completion of similar projects within budget.
3. The recent experience of the Proposer and its agents, employees, and sub-consultants.
4. The feasibility of the proposal based upon the performance and cost schedules, and the methodology to be used by the Proposer.
5. Proposer's understanding of the work to be completed based upon the clarity of the proposal and responsiveness to this RFP.
6. Proposer's proposed language for the Professional Services Agreement.

7. TRPA makes a good faith effort to contract with small, minority, and women- owned business enterprises. Accordingly, the TRPA strongly encourages small, minority, and women- owned businesses to reply to this RFP.

Section	Evaluation Criteria
1. Definition of the Project	<ul style="list-style-type: none"> • Demonstrates exceptional knowledge of the overall goals and objectives
2. Project Approach	<ul style="list-style-type: none"> • Overall project approach including philosophy, and project process used by the Proposer. Overall strategy and deliverables. • Ability of the proposed program to accurately quantify changes in distribution and abundance of algae in Lake Tahoe’s nearshore. • Ability of the proposed program to quantify and detect changes in algal community composition in Lake Tahoe’s nearshore. • Ability of the proposed program to identify drivers of change in algae of Lake Tahoe’s nearshore. • Alignment with beneficial uses – alignment between proposed program and sites with high utilization. • Continuity with current periphyton monitoring program – and/or ability to compare results to historically collected data and draw inference about potential changes relative to the conditions between 1980-2021.
3. Team Organization	<ul style="list-style-type: none"> • Project team and leadership. Planning activities, support tools, and reporting methodology.
4. Qualifications and Experience	<ul style="list-style-type: none"> • Depth of relevant experience, ability to meet Agency expectations. • Excellence of references provided.
5. Schedule & Cost	<ul style="list-style-type: none"> • Ability and likelihood of the proposed program to meet the specified timelines and budget.

Award of Agreement

Upon completion of the review period, the Agency shall notify those respondents whose proposals will be considered for further evaluation and negotiation. All notified respondents may be required to make presentations and negotiate in good faith in accordance with direction from the Agency. Any delay caused by respondent’s failure to respond to direction from the Agency may lead to a rejection of the proposal.

If the Agency determines, after further evaluation and negotiation, to award the Agreement, the Standard TRPA Two-Party Contract Agreement shall be sent to the successful respondent for the respondent’s signature. No proposal shall be binding upon the Agency until after the Agreement is signed by duly authorized representatives of both the Auditor and the Agency.

TRPA agrees to make a good faith effort to contract with small, minority, and women owned business enterprises. Accordingly, the TRPA strongly encourages small, minority, and women owned businesses to reply to this RFP and submit DBEWE Certification as an attachment to this RFP.

Should the selected applicant and TRPA be unable to agree to the terms of a contract within thirty (30) calendar days after TRPA approval, TRPA will reserve the right to disqualify the consultant and select another qualified applicant. Should this process not result in the hiring of a consultant, the RFP may be reissued.

The Agency reserves the right to reject any or all proposals, and to waive any irregularity. The award of the Agreement, if made by the Agency, will be based upon a total review and analysis of each proposal and projected costs.

TRPA will contract with the party that will best accomplish the project objectives for the best value and in the best interests of the Agency.

Attachment A: Evaluation of Trends in Nearshore Attached Algae: 2015 TRPA Threshold Evaluation Report (Hackley et al. 2016).

Attachment B: Lake Tahoe Periphyton Monitoring Program Engaged Review (TSAC 2020).

Attachment C: Monitoring Summer Metaphyton Growth along the South and Southeast Shore of Lake Tahoe (Hackley et al. 2018).