



NOTICE OF GRANT AND AGREEMENT AWARD

1. Award Identifying Number NR229104XXXXC001	2. Amendment Number	3. Award /Project Period Date of final Signature - 03/30/2024	4. Type of award instrument: Cooperative Agreement
5. Agency (Name and Address) Natural Resources Conservation Service 430 G Street, Suite 4164 Davis, CA 95616		6. Recipient Organization (Name and Address) Lake County Watershed Protection 255 N Forbes St. Lakeport CA 95453-4759 UEI # DRCPBKBXJEB5	
7. NRCS Program Contact Korinn Woodard (707) 262-7091 korinn.woodard@usda.gov	8. NRCS Administrative Contact Daniel Curtis (503) 414-3286 daniel.curtis@usda.gov	9. Recipient Program Contact Angela De Palma-Dow (707) 263-2344 Angela.DePalma-Dow@lakecountyca.gov	10. Recipient Administrative Contact Jacqueline Storrs (707) 263-2344 Jacqueline.Storrs@lakecountyca.gov
11. CFDA 10.902	12. Authority 16 U.S.C. 2001-2009 16 U.S.C. 2004 16 U.S.C. 3801 et seq 16 U.S.C. 590a-590f, 590q 7 CFR 12 7 U.S.C. 1010a	13. Type of Action New Agreement	14. Program Director Marina Deligiannis (707) 263-2344 Marina.Deligiannis@lakecountyca.gov
15. Project Title/ Description: Identify priority areas and watersheds and assists with watershed assessments, complete watershed assessment during the "readiness" phase of NWQI, for Clear Lake and Cache Creek, Lake County.			
16. Entity Type: B = County Government			
17. Select Funding Type			
Select funding type:	<input checked="" type="checkbox"/> Federal		<input type="checkbox"/> Non-Federal
Original funds total	\$50,000.00		\$0.00
Additional funds total	\$0.00		\$0.00
Grand total	\$50,000.00		\$0.00
18. Approved Budget			

Personnel	\$0.00	Fringe Benefits	\$0.00
Travel	\$0.00	Equipment	\$0.00
Supplies	\$0.00	Contractual	\$0.00
Construction	\$0.00	Other	\$50,000.00
Total Direct Cost	\$50,000.00	Total Indirect Cost	\$0.00
		Total Non-Federal Funds	\$0.00
		Total Federal Funds Awarded	\$50,000.00
		Total Approved Budget	\$50,000.00

This agreement is subject to applicable USDA NRCS statutory provisions and Financial Assistance Regulations. In accepting this award or amendment and any payments made pursuant thereto, the undersigned represents that he or she is duly authorized to act on behalf of the awardee organization, agrees that the award is subject to the applicable provisions of this agreement (and all attachments), and agrees that acceptance of any payments constitutes an agreement by the payee that the amounts, if any, found by NRCS to have been overpaid, will be refunded or credited in full to NRCS.

Name and Title of Authorized Government Representative Carlos Suarez State Conservationist	Signature	Date
Name and Title of Authorized Recipient Representative Marina Deligiannis Deputy Director Water Resources	Signature	Date

NONDISCRIMINATION STATEMENT

The U.S. Department of Agriculture (USDA) prohibits discrimination in all its programs and activities on the basis of race, color, national origin, age, disability, and where applicable, sex, marital status, familial status, parental status, religion, sexual orientation, genetic information, political beliefs, reprisal, or because all or a part of an individual's income is derived from any public assistance program. (Not all prohibited bases apply to all programs.) Persons with disabilities who require alternative means for communication of program information (Braille, large print, audiotope, etc.) should contact USDA's TARGET Center at (202) 720-2600 (voice and TDD). To file a complaint of discrimination write to USDA, Director, Office of Civil Rights, 1400 Independence Avenue, SW., Washington, DC 20250-9410 or call (800) 795-3272 (voice) or (202) 720-6382 (TDD). USDA is an equal opportunity provider and employer.

PRIVACY ACT STATEMENT

The above statements are made in accordance with the Privacy Act of 1974 (5 U.S.C. Section 522a).

Statement of Work

Purpose

The purpose of this agreement, between the U.S. Department of Agriculture, Natural Resources Conservation Service (NRCS) and Lake Count Watershed Protection (Recipient).

USDA's premier water quality program is the National Water Quality Initiative (NWQI). The NWQI is a partnership between NRCS and other federal, state, and local partners focused on water quality improvement in targeted agricultural watersheds. This partnership-based initiative pools public and private resources to improve water quality and strengthens agricultural productivity. With targeted on-farm investments and watershed assessment resources, NWQI focuses resources on small watersheds that can deliver the greatest benefits for local, regional, and national water quality.

Through the NWQI initiative, NRCS California identified priority areas and watersheds and will assist in the development of watershed assessments. Once these assessments are complete, NRCS can provide targeted assistance to help farmers and ranchers improve water quality in high-priority streams and rivers across the priority areas and watersheds.

Once selected as a targeted watershed, NWQI includes two phases:

Readiness Phase: Prior to receiving targeted technical and financial assistance, the Readiness Phase provides funding for watersheds to develop a watershed assessment, expand on-farm planning and outreach, and increase support for local staff.

Implementation Phase: In the Implementation Phase, NRCS provides technical and financial assistance for producers to implement conservation practices that address resource concerns identified in the watershed assessment developed in the Readiness Phase. Each phase has separate objectives and requires support from both NRCS and other federal, state, and local partners.

In the Readiness and Implementation Phases, NRCS provides resources (see Objectives below) to local resource managers, partners, and landowners in selected NWQI watersheds.

Objectives

This agreement is associated with the Readiness Phase of implementation for the watershed(s) identified below:

Priority areas, comprised of, but not limited to, the following watersheds/areas:

1. Clear Lake, Lake County, CA
2. Cache Creek, Lake County, CA

Objective 1: Watershed-level assessment and planning resources (Readiness Phase) NRCS provides specialized funding to support staff time or partner agreements to develop a watershed assessment at the sub-watershed level. This assessment describes resource concerns, identifies goals, priority practices and locations and establishes metrics to track project progress.

Objective 2: Watershed Assessment and Outreach Strategies

Watersheds in the Readiness Phase focus on the development of a watershed assessment as well as outreach and education strategies in target watersheds. NRCS seeks partners to assist in the development of both watershed assessments and outreach plans.

Budget Narrative

The official budget described in this Budget Narrative will be considered the total budget as last approved by the Federal awarding agency for this award.

Amounts included in this budget narrative are estimates. Reimbursement or advance liquidations will be based on actual expenditures, not to exceed the amount obligated.

TOTAL BUDGET \$ 50,000

TOTAL FEDERAL FUNDS \$50,000

PERSONNEL \$3,572

FRINGE BENEFITS \$1,428
TRAVEL \$0
EQUIPMENT \$0
SUPPLIES \$0
CONTRACTUAL \$45,000
CONSTRUCTION (usually n/a) \$0
OTHER \$0
TOTAL DIRECT COSTS \$0
INDIRECT COSTS \$0

Recipient has elected to voluntarily waive indirect costs.

Personnel: \$3,572

Program Coordinator (County of Lake Watershed Protection District) – Program coordinator will provide contractor coordination, agreement coordination, project team communication coordination, subtask direction, data assessment and acquisition, and technical writing and review to ensure all milestones are met and the primary deliverable is achieved.

Program Coordinator is anticipated to incur 75 hours at \$40/hour for a cost of \$3000

Accountant (County of Lake Watershed Protection District) –Will track program invoices and billing, submit all reimbursement packages and paperwork. Accountant will assist program coordinator with NRCS correspondences, fiscal matters, and contract coordination support.

District Accountant is anticipated to incur 22 hours at \$26/hour for a cost of \$572

Fringe Benefits \$1,428* *rounded

Fringe Benefits County of Lake \$3572.00 x 40% = \$1428.80

The Lake County Watershed Protection District fringe benefit rate includes health benefits, paid time off, holiday pay, and retirement benefits. This value does not include overhead.

Contractual \$45,000

GIS Technician (CRWA) Compile GIS database layers and create base maps for source water assessment plan. Develop GIS-derived flow networks, document recharge areas and watershed boundaries, source water protection area boundaries, GIS modeling and vulnerability analyses. Mapping of land use, best management practices, and contaminant sources.

GIS Technician is anticipated to incur 114 hours at \$192.00/hour for a cost of \$21,888

Hydrogeologist (CRWA) Characterize hydrology, hydrogeology, and water quality of watershed protection area, document aquifer characteristics and chemistry, describe surface and groundwater interactions, runoff, and streamflow hydrology. Identify and describe potential contaminants of concern as well as physical and chemical properties that influence contaminant transport. Perform resource analysis and prepare summary and recommendations report, including NEPA concerns.

Hydrogeologist is anticipated to incur 36 hours at \$192.00/hour for a cost of \$6912.

Chief Hydrogeologist (CRWA) Provide oversight of milestones and project completion. Characterize hydrology, hydrogeology, and water quality of watershed protection area, document aquifer characteristics and chemistry, describe surface and groundwater interactions, runoff, and streamflow hydrology. Identify and describe potential contaminants of concern as well as physical and chemical properties that influence contaminant transport. Perform resource analysis and prepare summary and recommendations report, including NEPA concerns.

Chief Hydrogeologist is anticipated to incur 55 hours at \$208.00/hour for a cost of \$11,650

(CRWA) Administrative Assistant – CRWA administrative support staff will track subcontractor hours, invoices and billing, and submit invoices and sub-contractor financials to District for grant reporting.

CRWA support staff is anticipated to incur 86 hours at \$52.81/hour for a cost of \$4,550

No Indirect Costs are request for this project.

Responsibilities of the Parties:

If inconsistencies arise between the language in this Statement of Work (SOW) and the General Terms and Conditions attached to the agreement, the language in this SOW takes precedence.

NRCS responsibilities

Provide oversight and management approval (referred to as “NRCS engagement”) by designated staff from the State Resource Conservationist’s office.

Recipient responsibilities

- a. Perform the work and produce the deliverables as outlined in this Statement of Work.
- b. Comply with the applicable version of the General Terms and Conditions.
- c. provide qualified staff to meet the deliverables and milestones set forth in this agreement
- d. direction and oversight of their employees’ and/or subcontractor’s (as applicable) efforts in meeting deadlines when necessary
- e. Provide office space, computer workstation, transportation, equipment, training and access to necessary systems to accomplish the work.
- f. Periodically review progress of staff assignments
- g. Periodically conduct progress meetings that address the status of deadlines and deliverables to ensure targets are met.
- h. Work collaboratively with NRCS on outreach events planned under this agreement.
- i. Submit reports and payment requests to the ezFedGrants system or the Farm Production and Conservation (FPAC) Grants and Agreements Division via email to FPAC.BC.GAD@usda.gov as outlined in the applicable version of the General Terms and Conditions. Limit advance payment requests to immediate cash needs (generally 30-60 days). Reporting frequency is as follows:

Performance reports: semi-annual

SF425 Financial Reports: semi-annual

Expected Accomplishments and Deliverables

The primary product of this agreement is a watershed assessment report.

The assessment will provide guidance concerning practices needing to be implemented to meet water quality goals. The assessment will designate areas critical to implement best management practices; and enhance implementation of water quality improvement projects by providing a watershed-wide, stakeholder-driven guidance document delineating effective irrigation, nutrient, and land-use management measures. Most importantly, the assessment will provide for priority geographic areas to help to guide which practices will best benefit the watershed and the location of this financial assistance.

The assessment will where possible use existing documents to maximize efficiency. The following documents have been identified:

1. TMDLs and Implementation Plans in the (Watershed Name) Watershed, including:
 - a. Clear Lake Integrated Watershed Management Plan - 2010
 - b. Scotts Creek Watershed Assessment -2010
 - c. Middle Creek Watershed Assessment -2010
 - d. Kelsey Creek Watershed Assessment -2010
 - e. TMDL BMP Inventory and TMDL Sediment Phosphorus Reduction Work Plan
 - f. Big Valley Groundwater Sustainability Plan -2022
 - g. Lake County Groundwater Management Plan - 2006
 - h. Lake County Water Inventory and Analysis w/ Appendices - 2006
 - i. Middle Creek Flood Damage Reduction and Ecosystem Restoration Project Plan -2012
 - j. Final Report – Clear Lake Watershed TMDL Monitoring Program 2009
 - k. (Urban) Stormwater Management Plan -2003
 - l. Phase II Lake County Program Effectiveness Assessment and Improvement Plan – 2021
 - m. Lake County Clean Water Program Trash Track II Implementation Plan - 2019

2. (Partner or Third-Party Reports) reports:

- a. 2019 Clear Lake Nutrient TMDL Agriculture Technical Report (Lake County Irrigated Agriculture)
- b. Clear Lake Nutrient TMDL Technical Memorandum 2018 (CRWQCB)
- c. Total Maximum Daily Load for Nutrients in Clear Lake, Lake County, California 2004 (Tetra Tech)
- d. Kennard, R. (2021). Safe and Affordable Drinking Water for Sources Impaired by Harmful Algal Blooms: Clear Lake, California. Master Thesis. University of California Davis
- e. Blue Ribbon Committee for the Rehabilitation of Clear Lake Annual Reports to the Governor 2019, 2020, 2021
- f. 2012 Clear Lake Watershed Sanitary Survey
- g. 2017 Clear Lake Watershed Sanitary Survey

The assessment will provide a literature review combined with research to fill the gaps of missing watershed information. In addition to a literature review, there are several data gaps that must filled in the course of this assessment. These data gaps include:

- a. an understanding of the drainage system (especially sub-surface) to support source identification for pollutants detected;
- b. better detail of what BMPS are needed in specific locations;
- c. information to address barriers to implementation such as: the effect of high land and crop values on the willingness to take land out of production for implementation practices and how that intersects with NRCS payment rates for implementation practices,
- d. how to implement practices (e.g., filter strips and grass waterways) which may conflict with food safety requirements; and the EQIP application process (how to enhance additional grower applications).

The Watershed Readiness Assessment is to be broken up into several stages or sections that capitalize on the consecutive or concurrent timing of the work to be done during the assessment. The list below provides the section, purpose, activities and milestones for each section. Each section is an individual deliverable.

Section 1 – Introduction

- a. Watershed Overview – Activity—Literature Review – Watershed Plans
- b. Water quality/Constituent Concern – Activity--Technical Literature/TMDL review
- c. Opportunities and Goals to improve water quality – Activity -- Water District Stakeholder engagement
- d. Assessment of NRCS' role – Activity--NRCS engagement

Section 2 – Watershed Characterization

- a. Location, landscape characteristics – Activity--Literature review – Watershed Plans
- b. Climate, topography, geology, drainage network – Activity--Literature review Watershed Plans
- c. Land use, landcover (data gap identified) – Activity--Farm Bureau/Ag Commission engagement
- d. Socio-economic conditions (data gap identified) – Stakeholder engagement

Section 3 – Hydrologic and Water Quality Characterization

- a. Available data and resources – Activity – Water District stakeholder engagement
- b. Runoff and streamflow hydrology, groundwater flow and aquifers, irrigation – Activity – Literature review
- c. Water quality conditions in the watershed – Activity – Technical Literature/FMDL review/Monitoring Reports

Section 4 – Resource Analysis/Source Assessment

- a. Problem identification – Activity – technical Literature/Total Maximum Daily Load (TMDL) or review
- b. Potential Tools – Activity – Water District stakeholder engagement, management plans, GSP/Technical review
- c. Data Analysis and critical source areas – Activity – Water District stakeholder engagement, management plans, GSP/Technical review
- d. Analysis of treatment and opportunities – Activity – Technical literature review, stakeholder engagement

Section 5 – Summary and Recommendations

- a. Impairments and goals – Activity – Technical Literature/TMDL reviews
- b. Critical source areas, Interim metrics – Activity – Technical review, monitoring reports/plans, draft metrics
- c. Description of planned alternatives and costs – Activity – Technical Review, stakeholder engagement, UCCE Economic Analysis
- d. Documentation of NEPA Concerns – Activity - NRCS Engagement

Section 6 – Outreach Plan

- a. Develop strategies to engage producers – Activity – Producer engagement plan
- b. Identify landowners within critical areas and target for outreach – Activity – Producer identification

Section 7 – Final Review

- a. Final Plan Review – Activity – Distribute to stakeholders

b. Final Plan Submitted – Activity – Consider comments, incorporate and complete final assessment report.

Resources Required

N/A

Milestones

Pre-task Deliverable – Contract Agreement with Partner Agency (Water Protection District) and Contractors (Cal Rural Water Association)

Milestone = 1 month after award

Section 1 – Introduction – Draft Section Complete (component of final report)

Milestone = 3 months after award

Section 2 – Watershed Characterization - Draft Section Complete (component of final report)

Milestone = 4 months after award

Section 3 – Hydrologic and Water Quality Characterization - Draft Section Complete (component of final report)

Milestone = 5 months after award

Section 4 – Resource Analysis/Source Assessment - Draft Section Complete (component of final report)

Milestone = 6 months after award

Section 5 – Summary and Recommendations - Draft Section Complete (component of final report)

Milestone = 9 months after award

Section 6 – Outreach Plan - Draft Section Complete (component of final report)

Milestone = 10 months after award

Section 7 – Final Review – All sections complete

Milestone = 12 months after award

GENERAL TERMS AND CONDITIONS

Please reference the below link(s) for the General Terms and Conditions pertaining to this award:
<https://www.fpacbc.usda.gov/about/grants-and-agreements/award-terms-and-conditions/index.html>