



BOARD OF DIRECTORS

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Invitation to Bid #2303

Calcium Thiosulfate

Period of Performance July 1, 2022 through June 30, 2023

This Invitation to Bid dated April 29, 2022 is being issued by the Contra Costa Water District (District) for the delivery of water treatment chemicals for the period beginning on July 1, 2022 through June 30, 2023. Chemicals requested is Calcium Thiosulfate to be utilized at the Ralph Bollman Water Treatment Plant, Randall-Bold Water Treatment Plant, and the City of Brentwood Water Treatment Plant.

As part of the Invitation to Bid response package, vendors must supply a minimum of three trade references from potable water agencies or municipalities. All vendors must provide NSF Certification for the chemical works of origin for all treatment chemicals bid unless otherwise detailed in the General Specifications (Attachment A). Failure to provide NSF Certification as required will be construed as non-responsive. All quantities are estimated quantities and are given for informational purposes only. Nothing in these estimated annual quantities must be interpreted as obligating to purchase specific quantities, as these quantities may vary depending on actual operating conditions and demand.

The District specifically reserves the right to reject any or all proposals, to make any awards or any rejections in what it alone considers to be in the best interest of the District, and to waive any irregularities in the proposals. The District does not obligate itself to accept the lowest bid and specifically reserves the right to reject any or all bids or the District will accept any bid or combination of bids considered most favorable.

Bidders must provide with their hard copy bid (paper) an electronic version on a flash drive containing all required documentation in Word, Excel, or PDF format. No faxed or email bids will be accepted. Bids shall be received at the Contra Costa Water District, 1331 Concord Avenue, Concord, California, by 10:00 a.m. Friday, May 6, 2022. All received bids will be opened and read aloud onsite at 10:00 a.m., Friday, May 6, 2022. Bids received after the due date and time will be returned unopened and deemed unresponsive.

Business licenses will be verified with the issuing agencies and references will be checked. The District reserves the right to hire a primary and secondary contractor in the event the primary contractor cannot respond in a timely manner.

The District has included a Bid/ Proposal General Provisions (Attachment F) to help explain the District's bid and proposal process. Please read and consider these provisions carefully. All questions regarding the Invitation to Bid can be directed to the Purchasing Officer, Brian K. Jackson via email at bjackson@ccwater.com

Per District Administrative Procedure XII-4 entitled Equal Employment Opportunity; Prohibition of Discrimination, Harassment, Retaliation, and Abusive Conduct, the District is an equal employment opportunity employer. As such, the District employs, recruits, retains, promotes, evaluates, terminates, and otherwise treats all employees, contractors, and job applicants on the basis of merit, qualification, and competence, and without regard to any Protected Category under the Equal Employment Opportunity Commission or the State of California Department of Fair Employment and Housing. The District does not tolerate discrimination, harassment, retaliation, or abusive conduct by or against employment applicants, employees, those not employed by, but working on behalf of the District, and/or members of the public. Immediate and appropriate corrective action will be implemented as warranted for all such misconduct. Administrative Procedure XII-4 is applicable to all employees and agents of the District with whom an individual comes into contact in the workplace or a work-related situation. The District's policy can be found at the following web address: <https://www.ccwater.com/DocumentCenter/View/973/XII-4-Equal-Employment-Opportunity-PDF>

Pursuant to Section 1770, et seq., of the California Labor Code, the successful bidder shall pay not less than the prevailing rate of per diem wages as determined by the Director of the California Department of Industrial Relations. Copies of such prevailing rate of per diem wages are on file at the office of the Purchasing Officer, where copies will be made available during normal working hours to any interested party upon request, or Bidders may prefer to obtain the current prevailing rate of per diem wages directly from the website maintained by the California Department of Industrial Relations (<http://www.dir.ca.gov/dlsr/pwd/index.htm>).

Submission of a bid constitutes acceptance of the District's Purchase Order Terms and Conditions (Attachment E).

Firms interested in the work should submit:

WHAT:	One copy of your bid and one electronic (flash drive) version, prepared in accordance with the instructions in this Invitation To Bid.
WHEN:	10:00 A.M., Friday, May 6, 2022
WHERE:	Contra Costa Water District, 1331 Concord Ave., CA. 94520
Attention:	Brian K. Jackson, Purchasing Officer

Bids should be prepared considering the information in the following attachments:

Attachment A - General Specifications Water Treatment Chemicals

Attachment B - Calcium Thiosulfate Specifications

Attachment C - Pricing Sheet for Chemicals

Attachment D - Insurance Sample

Attachment E - Purchase Order Terms and Conditions

Attachment F - Bid /Proposal General Provisions

Attachment G - Bid Guarantee

Attachment H - Contractor Safe Practices Handbook

Sincerely,



Brian K. Jackson

Contra Costa Water District

Purchasing Officer

GENERAL SPECIFICATIONS
WATER TREATMENT CHEMICALS

Specifications listed below are general requirements for all chemicals – detailed requirements are stated in the individual chemical specifications attached. All treatment chemicals or products must be certified as meeting the current specifications of NSF International/American National Standard Institute (NSF/ANSI) 60-2005 (Drinking Water Treatment Chemicals – Health Effects), which is hereby incorporated by reference. Certification shall be from an American Water Works Association (AWWA) accredited product certification organization whose certification system includes, as a minimum, the following criteria for ensuring the chemical or product meets NSF/ANSI Standard 60.

- (a) Annual product testing
- (b) Annual facility inspections
- (c) Annual quality assurance and quality control review
- (d) Annual manufacturing practice reviews
- (e) Annual chemical stock inspections

All prospective vendors must submit proof of current NSF/ANSI 60 certification for chemical works of origin for all chemical bids. Bill of lading must clearly identify the product delivered to be NSF 60 certified by stamp or typed written statement – no handwritten notations accepted. Failure to provide clear identification of the NSF products will result in the rejection of the load at no cost to the Contra Costa Water District (CCWD).

General Chemical Standards:

1. Calcium Thiosulfate (30% solution) shall be 30% solution w/v, pH 6.5-7.15, and specific gravity of 10.34 pounds per gallon, and the solution should be clear.

General Delivery and Invoice Requirements

The quantities on the bid sheet are estimated annual requirements for the 2023 Fiscal Year (FY23) and shall be delivered as requested to either the Bollman Water Treatment Plant, 2015 Bates Avenue, Concord, CA; Randall-Bold Water Treatment Plant, 3760 Neroly Road, Oakley, CA; Brentwood Water Treatment Plant, 3760 Neroly Road, Oakley, CA. All prices to include delivery and offloading. All invoices must indicate total pounds billed and delivered.

1. Calcium Thiosulfate (30%): Delivered in truckload quantities by tank truck equipped to transfer to storage tanks. All invoices must indicate the total gallons delivered.

Required Documentation

By state law, all drinking water treatment chemicals must conform to the requirements of NSF/ANSI Standard 60 – Drinking Water Treatment Chemicals. Therefore, all prospective vendors must submit proof of NSF/ANSI Standard Certification for Chemical Works of Origin for all treatment chemical bids unless otherwise detailed in the District's Bid Specifications.

As part of the attached specification, potential suppliers are provided with the chemical-specific requirement of the Certificate of Analysis, product sample, site-specific off-load connections, and sample calculations for billing purposes as appropriate. Deliveries will not be accepted without the specified Certificate of Analysis (except where noted), and the most current Safety Data Sheet (SDS) for each load of chemical delivered. Furthermore, it is the responsibility of the supplier to provide any fittings or hardware necessary to adapt delivery truck hoses to the particular chemicals offloading station area fittings.

Delivery drivers are required to bring and wear the necessary personal protection equipment as specified on the SDS for that product. The truck driver/delivery technician must conform to the rules and regulations pertaining to safety established by the California Division of Industrial Safety. They must adhere to all State, Federal, and Occupational Safety and Health (OSHA) safety standards while on the premises. Prior to the offloading of the product, the driver shall provide to the Water Treatment Plant Operator the required documentation listed below. If required documentation is not received, the load may be refused. Load delay or load refusal will be at no cost to CCWD. Loss of certification shall constitute sufficient grounds for immediate termination of the contract.

Suppliers must include with their pricing for each chemical, cost associated with:

- Certified weight certificates
- Bill of Lading
- Weight Master's certificate of Weight and Measure (if not included on Bill of Lading)
- Certification of Analysis (if applicable)
- Safety Data Sheet
- ANSI/NSF Standard 60 Certification for chemical works of origin for all treatment chemicals bid unless otherwise detailed in CCWD's bid specification. Bill of lading must be clearly stamped or marked, indicating product delivered is ANSI/NSF standard. Non-compliance with clearly identified NSF products will result in refusal of delivery.
- Any taxes and fees must be included in the unit price.

The supplier must submit the following information with the bid:

- Business Manager
 - Telephone number(s)
 - Email Address
 - Sales/Account Representative
 - Telephone number(s)
 - Email Address
- Ordering Information
 - Contact Person(s)
 - Normal Business Hours
 - Telephone number(s)
 - During normal business hours
 - After hours
- Email address if available

- Chemical Emergency Assistance (24 hours/7 days a week)
 - Telephone number(s)
 - Contact Person(s)
- ANSI/NSF Standard 60 Certification for chemical works of origin for all treatment chemicals bid unless otherwise detailed in the Districts bid specification.
- SDS Sheets for each chemical

Rejection of Deliveries

CCWD reserves the right to reject any chemical delivery which does not conform to our bid specifications. Any contaminated chemical must be re-delivered by the Contractor within 48 hours of the unacceptable delivery. Any departure from bid specifications must have prior approval by CCWD in writing. Rejection includes reimbursement to CCWD by the supplier or product replacement free of charge.

Insurance Requirements

Indemnification

The contractor shall indemnify, hold harmless and defend CCWD. Each of its officers, directors, officials, employees, volunteers, and agents from any and all loss, claims, demands, liability, fines, penalties, forfeitures, costs, and damages (whether in contract, tort, or strict liability, including but not limited to personal injury, death at any time and property damage) incurred by CCWD, the contractor or any other person and from any and all claims, demands, and actions in law or equity (including reasonable attorney’s fees and litigation expense), arising or alleged to have arisen directly or indirectly out of the performance of the contract. The contractor’s obligations under the preceding sentence shall apply regardless of whether CCWD or any of its officers, directors, officials, employees, volunteers, or agents are actively or passively negligent but shall not apply to any loss, liability fines, penalties, forfeitures, cost or damages caused solely by the active negligence or by the willful misconduct of the CCWD. If the contractor should subcontract all or any portion of the work to be performed under this agreement, the contractor shall require each subcontractor to indemnify, hold harmless, and defend the CCWD, its officers, directors, officials, employees, volunteers, and agents in accordance with the terms of the preceding paragraph.

Insurance

CCWD’s insurance compliance program requires all companies providing products and services to CCWD to have in place insurance coverage prior to the issuance of any contract. These insurance levels are described on the individual chemical specifications. Once the low bid or most responsive response has been established, that vendor will have until June 16, 2022, to provide all required insurance documents per the sample provided.

The contractor shall provide proof of insurance, in amounts listed below unless specified in the individual chemical specifications:

Comprehensive General Liability - \$5,000,000 per occurrence for Bodily Injury and Property Damage, including Products Liability.

- Workers' Compensation – Statutory coverage including \$1,000,000 Employers' Liability
- Commercial Auto Liability - \$2,000,000 per accident for bodily injury and property damage, endorsed for “any” auto. Trucking insurance, including loading and unloading operations, must be covered.

Please note: in addition to the Certificate of Liability Insurance, an Additional Insured Endorsement must be provided listing Contra Costa Water District, its officers, agents, and employees as “Additional Insured” for all insurance policies except the Workers' Compensation insurance policy and to provide CCWD with thirty days written notice in the event of cancellation of the contractor's insurance. The Certificate of Liability shall specify all operations of the contractor.

Billing Information

The Supplier shall include on all invoices the shipping date, bill of lading number, quantity, unit price, and extension. Applicable taxes or fees can be separated from the total invoice. However, tax and/or fees plus the billed unit price must be equal to the quoted bid price. Payments for all products will be made according to CCWD's terms and conditions after receipt of a complete and accurate invoice.

CALCIUM THIOSULFATE (30%) SPECIFICATIONS

Requirements

Under this schedule, the Contractor must furnish Calcium Thiosulfate F.O.B. destination in accordance with the American Water Works Association Standard, except as modified or supplemental herein. NSF 60 certification for the chemical works of origin for the product is required at the submission of the bid. Bill of lading must clearly identify product delivered to be NSF 60 certified by stamp or typewritten statement. No handwritten notations will be accepted. Failure to provide clear identification of NSF products will result in rejection of the load at no cost to CCWD.

Delivery Requirements

Placement of Orders

Deliveries must be made within (7) seven business days after receipt of order. Conditions may arise which require emergency deliveries, including holidays, weekends, and night hours within twenty-four (24) hours after notification. With the exception of emergency deliveries, all deliveries shall be made weekdays between 7:00 am to 2:00 pm. The Water Treatment Supervisor or a designated representative must approve any exception to this requirement prior to the delivery.

Spillage

The Contractor or its subcontractors shall be responsible for any spills resulting from the failure of the delivery equipment or from the failure of attendant delivery personnel in the proper performance of their duties. Proper performance shall require attendant delivery personnel's constant inspection and observation of unloading operations and knowledgeable response to problems or emergencies that would most commonly be expected to occur. CCWD reserves the right to refuse any and all deliveries made with equipment that is poorly maintained.

The Contractor shall observe the entire filling operation at each water treatment plant and shall immediately report any spills caused during the filling operations to the on-duty Water Treatment Plant Operator. The Contractor will be responsible at no charge to CCWD for immediate clean-up, containment, disposal, and the restoration of the affected area back to its original condition prior to the incident. These activities will be conducted in accordance with all applicable laws and regulations. If the spill is not cleaned up, CCWD will hire a certified hazardous material handling company to clean up the spill and properly dispose of the material. The cost for such service and any fines or penalties which may be imposed by regulating agencies will be charged to the Contractor and deducted from monies due.

If the spill is not cleaned up, CCWD will hire a certified hazardous material handling company to clean up the spill and properly dispose of the material. The cost for such service and any fines or penalties which may be imposed by regulating agencies will be charged to the Contractor.

Condition of Cargo Containers and Equipment

The tanks or trailers shall be clean and free of residue from previous loads which might contaminate the product. It is the Contractor's responsibility to verify the cleanliness of the transporting equipment before loading. All appurtenant valves, pumps, and discharge hoses used for the delivery of Calcium Thiosulfate shall be clean and free from contaminating material. CCWD will reject a load if the equipment is not clean. The Contractor shall furnish a CCWD approved, leak-free connection device between the pumper and CCWD's intake receptacle.

CCWD requires the Contractor to provide all off-load connectors. The off-load connectors are 2" (two-inch) camlocks at the water treatment plants listed below. The contractor must provide and use wheel chocks during the unloading of the product.

Delivery Locations

- One (1) 6,400-gallon tank, Bollman Water Treatment Plant, 2015 Bates Avenue, Concord, CA
- One (1) 6,100-gallon tank, Randall-Bold Water Treatment Plant, 3760 Neroly Road, Oakley, CA
- One (1) 2,200-gallon tank, Brentwood Water Treatment Plant, 3760 Neroly Road, Oakley, CA

Split Loads

CCWD may require split loads between any two water treatment plants. A split load shall be defined as a full truckload that is divided in any combination of pounds/gallons between two water treatment plants. Split loads between Bollman (Concord) and Randall-Bold or Brentwood (Oakley) require a certified weighmaster certificate between each water treatment plant delivery. The load must be reweighed between the Oakley and Concord facilities. Costs associated with the second weigh slip are the responsibility of the vendor and not CCWD. A split load between the two Oakley Water Treatment Plants (Randall-Bold and Brentwood) does not require a weigh slip. Split loads also require that each plant be invoiced separately. Any additional costs incurred for these loads must be identified and submitted at the time of the bid proposal.

Specifications of Material

Calcium Thiosulfate supplied under this contract shall be tested and certified as meeting these specifications and those of the American National Standards Institute/National Sanitation Foundation Standard 60 (ANSI/NSF Standard 60), Drinking Water Treatment Chemicals. NSF certification for the chemical works of origin for the product must be provided with the submission of the bid. NSF 60 certification for the chemical works of origin for the product must be provided for the product that is purchased from any other source other than originally submitted. Bill of lading must clearly identify that product delivered is NSF 60 certified. If the delivered product is not clearly identified as NSF 60 certified, delivery will be refused at no cost to CCWD. It is the responsibility of the supplier to inform

CCWD that NSF certification has been revoked or lapsed within 24 hours of the time the supplier receives verbal or written notification.

Loss of certification shall constitute sufficient grounds for immediate termination of the contract.

Calcium Thiosulfate shall be 30% w/v, pH 6.5-7.5, specific gravity 1.240 per gallon, and 10.34 pounds/gallon, and the solution should be clear in color.

Weighmasters Certificates

The Supplier will provide weighmaster certificates for all loads. Weighmaster certificates must be obtained from a certified weighmaster. Any costs for certified weigh certificates are the responsibility of the vendor and must be included in the bid price.

Security

There shall be no charges to CCWD for any delays in offloading of chemical or refusal of shipment for security reasons.

Please note: in addition to the Certificate of Liability Insurance, an Additional Insured Endorsement(s) must be provided listing Contra Costa Water District, its officers, agents, and employees as “Additional Insured” for all insurance policies except the Workers’ Compensation insurance policy and to provide CCWD with thirty days written notice in the event of cancellation of the contractor’s insurance. The Certificate of Liability shall specify all operations of the contractor.

Billing Information

The Supplier shall include on all invoices the shipping date, bill of lading number, quantity, unit price, and extension. Applicable taxes or fees can be separated from the total invoice. However, tax and/or fees plus the billed unit price must be equal to the quoted bid price. Payments for all products will be made according to CCWD’s terms and conditions after receipt of a complete and accurate invoice.

Sales Tax

Sales tax may not be applicable if the product is used in the production and purification of potable water for resale. All other chemical pricing should include applicable sales tax.

Safety Requirements

CCWD requires that the Contractor’s lead person on the job complete the OSCA safety training course at the facility below before the contract period begins. Below is the contact information for the facility:

- Name of training: Contra Costa Water District Contractor Orientation Course Code – 19CCWDSO

- Location of training: OSCA facility at 1805 Arnold Drive Martinez, CA 94553
- Duration of training: about an hour
- OSCA hours: 6 am to 5 pm
- OSCA phone number: (925) 335-5026
- Costs of training: \$25/person

The truck driver/delivery technician is required to provide and wear the necessary personal protection equipment as specified on the Safety Data Sheets (SDS) for the product being delivered. Truck driver or delivery technician must provide and use wheel chocks while off-loading product. The contractor, their employees, subcontractors, and /or agents must conform to the rules and regulations pertaining to safety established by the California Division of Industrial Safety. They must adhere to all State, Federal, and OSHA safety standards while on the premises. Furnished equipment, materials, and/or services must comply with all OSHA standards and regulations and all applicable government laws and orders. CCWD reserves the right to refuse any shipment which cannot be unloaded using safe and proper techniques. Any such refusal will result in the return of the product at the contractor's sole expense.

PRICING SHEET FOR CHEMICALS

Quantities and items shown below are estimated annual requirements, and CCWD requests pricing for one (1) twelve-month period for FY2022-23. Chemicals to be utilized at the Ralph Bollman Water Treatment Plant Concord, CA; Randall-Bold Water Treatment Plant, Oakley, CA; Brentwood Water Treatment Plant, Oakley, CA; Concord Yard, Concord, CA; Antioch Service Center, Antioch, CA; Los Vaqueros Watershed Brentwood, CA.

Calcium Thiosulfate (30%)			
Location	Annual Estimated Quantity	Annual Unit Price	Annual Extended Price
Ralph Bollman Water Treatment Plant	13,500 gallons		
Randall-Bold Water Treatment Plant	9,000 gallons		
Brentwood Water Treatment Plant	5,000 gallons		

Bidders Name: _____

Bidders Company: _____

Address: _____

Terms: _____

CONTRACTUAL INSURANCE REQUIREMENTS

The information contained herein is to describe the contractual requirements that Contra Costa Water District has indicated to myCOI. These contractual requirements should NOT be used to provide inaccurate information regarding current insurance policies. Questions regarding interpretation of this document can be directed to our support team at 317-759-9426.

INSURED	CARRIER REQUIREMENTS A- or higher, VIII
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POLICY LINE		POLICY LIMITS			
GENERAL LIABILITY		EACH OCCURRENCE	\$ 2,000,000		
	<input type="checkbox"/>	CLAIMS MADE	DAMAGE TO RENTED PREMISES (Ea occurrence)	\$	
	<input checked="" type="checkbox"/>	OCCUR	MED EXP (Any one person)	\$	
			PERSONAL & ADV INJURY	\$	
			GENERAL AGGREGATE	\$ 2,000,000	
		GEN'L AGGREGATE LIMIT APPLIES PER	PRODUCTS - COMP/OP AGG	\$	
	<input type="checkbox"/> POLICY <input type="checkbox"/> PROJECT <input type="checkbox"/> LOCATION		\$		
AUTO LIABILITY	<input checked="" type="checkbox"/>	ANY AUTO	COMBINED SINGLE LIMIT (Ea accident)	\$ 1,000,000	
	<input type="checkbox"/>	ALL OWNED AUTOS	BODILY INJURY (Per person)	\$	
	<input type="checkbox"/>	SCHEDULED AUTOS	BODILY INJURY (Per accident)	\$	
	<input type="checkbox"/>	HIRED AUTOS	PROPERTY DAMAGE (Per accident)	\$	
	<input type="checkbox"/>	NON-OWNED AUTOS			
UMBRELLA /EXCESS LIABILITY	<input type="checkbox"/>	OCCUR	EACH OCCURRENCE	\$	
	<input type="checkbox"/>	Claims Made	AGGREGATE	\$	
WORKERS COMP /EMPLOYEE LIABILITY	<input checked="" type="checkbox"/>		WC STATUTORY LIMITS		
	<input type="checkbox"/>		OTHER		
			E.L. EACH ACCIDENT	\$ 1,000,000	
			E.L. DISEASE - EA EMPLOYEE	\$ 1,000,000	
		E.L. DISEASE - POLICY LIMIT	\$ 1,000,000		
Property	<input type="checkbox"/>	Property Causes of Loss	Deductibles	Building	\$
	<input type="checkbox"/>	Basic	Building	Personal Property	\$
	<input type="checkbox"/>	Broad	Contents	Business Income	\$
	<input type="checkbox"/>	Special		Extra Expense	\$
	<input type="checkbox"/>	Earthquake		Rental Value	\$
	<input type="checkbox"/>	Wind		Blanket Building	\$
	<input type="checkbox"/>	Flood		Blanket Pers Prop	\$
				Blanket BLDG & PP	\$
					\$
					\$
Boiler and Machine	<input type="checkbox"/>	Boiler & Machinery /Equipment Break Down			\$
	<input type="checkbox"/>				\$

Certification Holder

Contra Costa Water District C/O: myCOI 1075 Broad Ripple Ave, Suite 313 Indianapolis, IN 46220

ADDITIONAL REQUIREMENTS

Division Name: All Vendors.

"30 Days Notice of Cancellation Required.

General Liability

"A physical copy of the additional insured endorsement is required.

"Additional Insured applies to General Liability.

"Additional Insured Names: Contra Costa Water District, its directors, officers, and employees,

Automobile Liability

"Any Auto OR all Owned, Hired, & Non-owned will be accepted.

PURCHASE ORDER TERMS AND CONDITIONS

Compensation: By accepting this Purchase Order (P.O.), the Contractor/Vendor (Vendor) agrees to receive and accept the prices shown as full compensation for furnishing all materials and for doing all the work contemplated and embraced in the order; also for all loss or damage arising out of the nature of the work aforesaid, or from the action of all elements, or from any unforeseen difficulties or obstructions which may arise or be encountered in the prosecution of work until its acceptance by Contra Costa Water District (CCWD) and for all risks of every description connected with the work; also for all expenses incurred by or in consequence of the suspension or discontinuance of work and for well and faithfully completing the work and the whole thereof, in the manner according to the requirements of CCWD's inspection.

Vendor shall state its discount terms on invoices. Delay caused by correction of errors and omissions shall extend the discount period and shall be just cause for withholding settlement without loss of cash discount by CCWD. This order or any payment due thereunder is not assignable by Vendor without written approval of CCWD. Full payment shall be made for acceptance materials within 45 days after receipt of invoice.

F.O.B: Unless otherwise specified, all shipments are Free-On-Board delivered to the location shown on the Purchase Order. A copy of the receipted freight bill MUST accompany the invoice when freight is authorized to be prepaid and added to invoice.

Substitutions: Substitutions, changes, and prices other than specified above must be authorized in writing by CCWD.

Contract: The P.O., and any referenced attachments, including but not limited to the Addendum to these Terms and Conditions, when accepted by Vendor, either in writing or shipment of all or any portion of the material, or the commencement of performance of any portion of the services covered hereunder, constitutes the entire contract between Vendor and CCWD concerning its subject matter; and neither any contrary or additional conditions specified by Vendor nor any subsequent amendment or supplement shall have any effect without CCWD's written approval.

Indemnification: Vendor shall indemnify, hold harmless and defend the Contra Costa Water District (CCWD), and each of its officers, Directors, officials, employees, volunteers and agents from any and all loss, claims, demands, liability, fines penalties, forfeitures, costs and damages (whether in contract, tort or strict liability, including but not limited to personal injury, death at any time and property damage) incurred by CCWD, the Vendor or any other person and from any and all claims, demands and actions in law or equity (including reasonable attorney's fees and litigation expense), arising or alleged to have arisen directly or indirectly out of performance of the contract. The Vendor's obligations under the preceding sentence shall apply regardless of whether CCWD or any of its officers, directors, officials, employees, volunteers, or agents are actively or passively negligent, but shall not apply to any loss, liability fines, penalties, forfeitures, cost, or damages caused by the active negligence or by the willful misconduct of the CCWD. If Vendor should subcontract all or any portion of the work to be performed under this agreement, Vendor shall require each subcontractor to indemnify, hold harmless, and defend the CCWD, its officers, Directors, officials, employees, volunteers, and agents in accordance with the terms of the preceding paragraph.

Contractor's Licensing Laws: All contractors shall be licensed in accordance with the laws of the State of California.

Permits or Licenses: The Vendor shall procure all permits and licenses, pay all charges and fees and give all notices necessary and incidental to the due and lawful prosecution of the work.

Taxes: Unless otherwise provided herein or required by law, Vendor assumes exclusive liability for, and shall pay before delinquency, all sales, use, excise and other taxes, or charges of any kind now or hereinafter imposed on or with respect to, or measured by the articles sold or material or work furnished hereunder on the wages, salaries or other remuneration paid to persons employed in connection with the performance of the P.O.

Prohibition of Discrimination, Harassment, Retaliation, and Abusive Conduct: Per District Administrative Procedure XII-4 entitled *Equal Employment Opportunity; Prohibition of Discrimination, Harassment, Retaliation, and Abusive Conduct*, the District is an equal employment opportunity employer. As such, the District employs, recruits, retains, promotes, evaluates, terminates, and otherwise treats all employees, contractors, and job applicants on the basis of merit, qualification, and competence, and without regard to any Protected Category under the Equal Employment Opportunity Commission or the State of California Department of Fair Employment and Housing. The District does not tolerate discrimination, harassment, retaliation, or abusive conduct by or against employment applicants, employees, those not employed by, but working on behalf of the District, and/or members of the public. Immediate and appropriate corrective action will be implemented as warranted for any and all such misconduct. Administrative Procedure XII-4 is applicable to all employees and agents of the District with whom an individual comes into contact in the workplace or a work-related situation.

Safety: All equipment, materials, and services shall comply with all Federal, State, and local safety rules and regulations including those imposed by the Occupational Safety and Health Administration (OSHA), and all work performed on CCWD premises shall comply with the CCWD Contractor Safe Practices Handbook.

Independent Contractor: Vendor is an independent Contractor/Supplier retained by CCWD to provide goods and/or perform the work described herein. All personnel employed by the Vendor, including subcontractors and personnel of said subcontractors approved by CCWD, are not and shall not be deemed to be employees of CCWD. The Vendor and approved subcontractors shall comply with all State and Federal laws pertaining to employment and compensation of their employees or agents, including the provision of Worker's Compensation. CCWD shall not under any circumstances be liable to Vendor for any person or persons acting for Vendor for any death, injury, property destruction, or damage received or claimed relating to or resulting from the activities undertaken pursuant to this P.O.

Warranty: Vendor warrants that the goods specified in this P.O. shall be free from defects in design, material, and workmanship. The goods specified in this P.O. shall not be deemed accepted until after inspection within a reasonable time after arrival at the delivery location specified on the P.O. Vendor warrants that the goods specified in this P.O. will be fit for the purposes for which they were sold to CCWD.

Attorney's Fees: If a lawsuit is filed to enforce the terms hereof, the prevailing party will be entitled to an award of attorney's fees.

Prevailing Wages: Pursuant to Section 1773.2 of the Labor Code, a copy of which is on file with CCWD, Vendors performing public work shall pay prevailing per diem wages.

Insurance: Vendors performing work for CCWD shall provide proof of insurance, in amounts not less than those specified, for the following: Comprehensive General Liability \$2,000,000 per occurrence; Worker's Compensation: statutory coverage required; Commercial Auto Liability: \$2,000,000 per accident for bodily injury and property damage, endorsed for "any" auto. Please note that in addition to the certificate of insurance, an endorsement must be provided to name the *Contra Costa Water District, its officers, agents, and employees as "Additional Insured"*. The certificate of insurance can be a master certificate, to cover all work done during the year, or a single purpose certification to cover one specific project/job.

BID/PROPOSAL GENERAL PROVISIONS

1.1 Bid/Proposal Form

Bids/proposals must be submitted only upon the forms provided in the bid/proposal package, including but not limited to pricing sheets, addenda and bid/proposal guarantees, with all items properly filled out in non-erasable permanent ink. All bid/proposal documents must be signed and dated. The bid/proposal form may be rejected if it shows any omissions, alterations of form, a conditional bid/proposal or irregularities of any kind.

All sealed bids and proposals to be considered for acceptance must be received by the District on or before the specified date and time for submittal. Bids/Proposals received after said date and time will be returned to the sender unopened and will not be considered under any circumstances. Bids/Proposals postmarked but received after the bid opening will not be accepted. Bids/Proposals submitted electronically or by facsimile will not be accepted.

All bids will be publicly opened and read aloud to all in attendance at the District's headquarters at 1331 Concord Ave, Concord CA 94520 at the time and date specified. Bidders are invited, but not required, to attend the bid opening. Proposals will be evaluated based on stated evaluation criteria and results posted on the District's web site.

The Contra Costa Water District reserves the right to reject any and all bids/proposals and to waive informalities, irregularities or technical defect in the bids/proposals received. The District reserves the right to award a contract to other than the lowest responsible Bidder, if it is determined to be in the best interest of the District.

1.2 Estimated Quantity

Unless otherwise stated, the quantities and/or dollar estimates indicated are estimates of anticipated usage for the contract period and are given for informational purposes only. Nothing in these estimated contract period or annual quantities shall be construed as obligating the District to purchase specific quantities, as these quantities may vary depending on actual operating conditions and demands during the contract term. The District reserves the right to purchase any volume of products or services listed, at the contract price, regardless of stated estimates of quantities or dollar estimates. No price adjustments will be allowed as a result of an increase or a decrease in the quantity purchased.

1.3 Delivery Locations

The District's service area covers the eastern portion of Contra Costa County and has delivery locations in Concord, Oakley and Brentwood California. The Bidder/Proposer must take into consideration deliveries to any or all of these locations.

1.4 Bid/Proposal Pricing

All bids/proposals submitted must include a stated unit price for the products or services listed. Units of measure can vary but will be described in the bid/proposal documents. The stated unit price must include all costs associated with providing and delivering the products or services including materials, labor, equipment, transportation, insurance, overhead, and profit. State sales tax, as well as any Federal, State, or Local excise taxes in effect at the time of delivery should **not** be included in the bid/proposal price unless specifically requested on the pricing sheet, but applicable taxes must be included on all invoices that correspond to deliveries of products or services.

Bids/Proposals qualified by additional or conditional charges such as Consumer Price Index calculators, fuel surcharges, or transportation charges between the supplier and the final delivery points will not be allowed unless otherwise stated. Bids/Proposals that do not include the unit prices will be considered irregular and, at the option of the District, may be eliminated from further consideration.

1.5 Bidder Qualifications

A qualified Bidder is one determined by the District to meet standards of business competence, reputation, financial ability, and product quality. A responsive Bidder is a firm/person who has submitted a bid that conforms in all material respects to the terms and conditions, the specifications of the product, and any other requirement of the bid instructions. A responsible Bidder is a firm/person who has the capability in all aspects to perform full contract requirements, and who has the integrity and reliability that will assure good faith and specific performance. Before submitting a bid, the Bidder must carefully examine and read all parts of the Bid Contract Documents and be fully informed as to all existing conditions and limitations. It should be noted that the entire contents of the Bid Contract Documents will be part of the agreement upon selection and approval of the successful Bidder/Proposer.

1.6 Authorized Signatory of Bid/Proposal Contract Documents

The person signing the submitted bid/proposal must be fully authorized to represent and legally bind the bidding/proposing company regardless of their position within that firm.

1.7 References

Where specifically requested, the Bidder/Proposer must submit with the bid a list of a minimum of three references that have purchased similar products and/or services from the Bidder/Proposer. The Bidder/Proposer must provide the company or agency name, contact name, and telephone number for each reference.

1.8 Bid/Proposal Submittal

All bid/proposal submittals must be enclosed in a sealed envelope and clearly marked with a description of the products or services to be provided by the date and time specified. The original and

any additional copies specified of the bid and all attachments must be submitted. **Bids/proposals submitted electronically or by facsimile will not be accepted.** It is the Bidder's/Proposer's responsibility to ensure that any bid/proposal that is submitted is received in the proper format, time, and place. The Bidder/Proposer is responsible for allowing adequate time for delivery of their bid/proposal by hand delivery, express delivery, US Mail, or by other means. Bids/Proposals received after the date and time specified will not be accepted and will be returned to the Bidder/Proposer unopened.

1.9 Modification, Addenda, and Interpretations

Any explanation desired by the Bidders/Proposers regarding the meaning or interpretation of the bid/proposal documents must be requested in writing, either by facsimile or mail, at least **7 days** prior to the time set for the bid opening/proposal due date. Any and all such interpretations or modifications must be in the form of written request to the District and mailed to:

Brian K. Jackson
Purchasing Officer
Contra Costa Water District
1331 Concord Ave.
Concord, CA 94520

Any changes made to the bid/proposal documents initiated by the District will be through written addenda and furnished to all bidders/proposers via US Mail, email or fax. Any written addendum issued before the date and time of the bid opening or proposal due date will become a part of the Bid/Proposal Contract Documents and must be signed and attached to the Bid/Proposal Form that each bidder/proposer submits. Failure to submit any and all the addendum(s) with a bid/proposal will be cause for rejection of the bid/proposal.

1.10 Modification of Bids/Proposals

A Bidder/Proposer may modify their bid/proposal by written communication provided such communication is received by the District prior to the date and time of the bid opening or proposal due date. The written communication should not reveal the bid price and should state the addition or subtraction or other modification so that the final prices or terms will not be known by the District until the sealed bids/proposals are opened.

1.11 Withdrawal of Bids/Proposals

Any bid/proposal may be withdrawn any time prior to the stated bid opening or proposal due date and time (opening time) only by a written request that is filed with the District requesting withdrawal of the bid/proposal. The withdrawal request must be executed by the bidder/proposer or a duly authorized representative. The withdrawal of the bid/proposal does not prejudice the right of the bidder/proposer

to file a new bid/proposal prior to the bid/proposal closing time. No bids/proposals may be withdrawn after the opening date and time without the permission of the District.

1.12 Proposed Deviations from the Specifications by the Bidder/Proposer

Any deviation from the specifications described herein or in a written addendum that is proposed by a bidder/proposer must be noted in detail on the bid/proposal form, and a copy of the proposed specification must be attached to the bid/proposal form at the time of submission. The absence of a proposed change in the specifications will hold the bidder/proposer strictly accountable to the specifications as described herein. If proposed deviations from the specifications are submitted, the bidder's/proposer's name should be clearly shown on each document. The District will be responsible for accepting or rejecting any proposed deviations/substitutions from the described specifications.

1.13 Competency of Bidders/Proposer

Before any contract is awarded the bidder/proposer may be required to furnish a complete statement of financial ability and experience in performing the proposed services. In accordance with the provisions of the California Business and Professions Code and other regulations, the bidder/proposer must have and maintain current any and all necessary licenses or certificates.

1.14 Rejection of Bids/Proposals

The District reserves the right to reject any and all bids/proposals and reserves the right to waive and/or reject a bid/proposal for any of the following reasons: informalities, nonconforming, non-responsive or conditional bids/proposals, bids/proposals showing any alterations of form or erasures or irregularities of any kind, additions not called for, incomplete bids/proposals, or bids/proposals not conforming with the written instructions in any way. The District does not obligate itself to accept the lowest cost bid or proposal or any particular bid or proposal and specifically reserves the right to reject any or all bids or proposals, to make any rejections in what it alone considers to be in the best interest of the District.

1.15 Opening Bids

After the closing time deadline, all **bids** received will be publicly opened and read, as set forth in the Invitation to Bid documents. Bidders or their representative and other interested persons may be present at the opening and reading of the bids. Following the bid opening, a bid tabulation will be circulated to all of the responsive bidders, even if their representative was not present at the bid opening.

Proposals will be evaluated based on stated evaluation criteria and scored. Highest ranking proposal will be selected for award. The District reserves the right to interview highest ranking firms for final selection.

1.16 Method of Award

Bids may be awarded by the District to the lowest, responsive, and responsible bidder meeting the specifications. The District has the right to delete terms or options from the Bid Contract Documents and reserves the right to reject any and all bids and to waive irregularities in said bids. The following is a non-inclusive list of criteria that must be used in Award of the Bid.

- a. Unit cost of the product
- b. Product specifications
- c. Guaranteed warranties or standards of quality
- d. Capabilities to deliver product within District schedule or throughout the contract term
- e. Bidder's reputation, competency, and previous customer service record
- f. Fully executed non-collusion affidavit

1.17 Disqualification of Duplicate or Collusive Bidders/Proposers

More than one bid/proposal from an individual, a firm or partnership, a corporation or an association under the same or different names will not be considered. Reasonable grounds for believing that any Bidder/Proposer with financial interest in more than one bid/proposal for the bid/proposal contemplated will cause rejection of all bids/proposals in which such bidder/proposer is interested. If there is reason for believing that collusion exists among the bidders/proposers, any and all bids/proposals may be rejected.

1.18 Identical Bids

In the case of tied or identical bids corresponding to the proposed unit costs, the District reserves the right to award the bid based on the factors outlined in paragraph 1.16, Method of Award.

1.19 Bid/Proposal Summary

Bid/Proposals will be summarized and reviewed following the bid opening or proposal due date. Bid/Proposal summaries or tabulations will also be provided to the responsive bidders/proposers within ten (10) business days following the bid opening or proposal due date on the District's web site, www.ccwater.com.

1.20 Material Safety Data Sheet (MSDS)

Where appropriate, bidders/proposers must submit an MSDS sheet for all applicable products offered with the bid/proposal. The successful bidder/proposer must also provide an MSDS sheet for those products with each delivery.

1.21 Legislative Impacts

In the event that the District Board of Directors fails to appropriate funds for the purchase of these products or services, the District may terminate such contract without penalty and thereupon be released of further obligation.

1.22 Subcontracting

No portion of the bid/proposal award may be subcontracted to another vendor or supplier without the prior written approval of the District. All proposed subcontractors must be listed and identified on any provided Proposed Subcontractors Sheet.

1.23 Insurance

Insurance to be provided at levels as stated on the District contract documents provided. **Prior to commencement of any performance under this contract, the successful Bidder/Proposer must provide** an original Certificate of Insurance, and copies of information or declaration pages for the insurance required with respect to evidence of commercial general liability and automobile liability insurance coverage endorsements. All policies and/or certificates of insurance must be endorsed to name the District, its elected officials, officers, employees, agents, and volunteers as additional insured parties.

The successful bidder/proposer hereby agrees to waive subrogation which any insurer of Contractor may acquire from vendor by virtue of the payment of any loss. Contractor agrees to obtain and provide to the District any endorsement that may be necessary to affect this waiver of subrogation. The Workers' Compensation policy shall be endorsed with a waiver of subrogation in favor of the District for all work performed by the Contractor, its employees, agents and subcontractors.

The successful bidder/proposer must maintain the required insurance at all times while this contract is in effect, and must replace any certificate, policy or endorsement which will expire prior to that date. All policies must be endorsed to provide that the required insurance must not be suspended, voided, reduced, canceled, or allowed to expire except on thirty (30) days prior written notice to the District. The Certificate of Insurance must have a cancellation statement worded as follows: *"Should any of the above-described policies be cancelled before the expiration date thereof, the issuing company will mail 30 days written notice to the Certificate holder named to the left."*

1.24 Indemnification

As stated on District contract forms provided.

1.25 Equal Opportunity

The successful bidder/proposer must agree not to refuse the hire, discharge, promote, or to otherwise discriminate in the matters of compensation against any person otherwise qualified solely because of race, creed, sex, national origin, ancestry, physical handicap or sexual orientation. It must be a condition that any company firm or corporation supplying goods or services, must be in compliance with the appropriate areas of the Americans with Disabilities (ADA) Act of 1990. A certificate stating compliance with the ADA may be required, upon request.

1.26 Common Language

Unless otherwise specified in this document, all words must have a common language unless the context in which they are used clearly requires a different meaning. Words in the singular number include the plural, and in the plural include the singular.

1.27 Proprietary Information

All information included in any bid/proposal that is of a propriety nature must be **clearly** marked as such. The District must be held harmless from any claims arising from the release of proprietary information not clearly designated as such by the proposing firm.

1.28 Patent Guarantee

The bidder/proposer must, with respect to any bidder/proposer’s standard manufacture, indemnify and hold harmless the District, its employees and agents, from costs and damages as finally determined by any court of competent jurisdiction for infringement of any United States Letters & Patent by reason of the sale or normal use of such product, provided that the Bidder/Proposer is promptly notified of all such actual or potential infringement suits, and is given an opportunity to participate in the defense thereof by the District.

1.29 Term of Contract

The typical term of District maintenance, repair and service contracts will be twelve (12) months, normally commencing on July 1st, and expiring on June 30th, unless otherwise stated.

1.30 Termination for Cause

In the event of a breach of any term or provision of this contract by the bidder/proposer, the District may terminate this contract by providing the bidder/proposer with written notice of such termination, and specifying the effective date thereof, at least ten (10) days before the effective date.

1.31 Other Cities/Agencies

Other Cities and/or Public Agencies may be interested in purchasing goods and services under the same arrangement as an existing contract, also called “piggy-backing”, subject to the same price, terms and conditions offered to the District. Other parties utilizing the contract will place orders with and make payments directly to the successful Bidder. Agreement with “piggy-backing” or declining to participate in “piggy-back” contracts with other Cities and/or public agencies will not be used by the District to determine an award for the bid/proposal invitation, unless more than one bidder were to submit identical bid prices and terms. Please state if your company would agree to extend the same price, terms and conditions to other Cities and/or Public Agencies.

Yes ____ We would agree to extend the same price, terms and conditions.

No ____ We would not agree to extend the same price, terms and conditions.

BIDDER/PROPOSER INFORMATION

1. Legal Name of Bidder:

2. Bidder's Street Address:

3. Mailing Address:

4. Business Telephone: _____ Fax Number: _____

5. Type of Supplier:

Sole Proprietor Partnership Corporation

If Corporation, indicate State where incorporated: _____

6. Business License Number issued by the City where the Supplier's principal place of business is located.

Number: _____ Issuing City: _____

7. Supplier Federal Tax Identification Number: _____

8. Emergency Contact: Name: _____

Phone Number: _____

9. Order Contact: Name: _____

Address: _____

Phone Number: _____ Fax Number: _____

Email: _____

10. References:

<u>Company/Agency Name</u>	<u>Contact Name</u>	<u>Phone Number</u>
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1) _____	_____	_____
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2) _____	_____	_____
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3) _____	_____	_____
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Proposal Guarantee

To The Contra Costa Water District, Concord, California:

Pursuant to the foregoing notice to proposers, the undersigned proposer here with submits a proposal on the proposal sheet or sheets attached hereto and made a part hereof and binds himself/herself on award by the Contra Costa Water District (District) under this proposal, to execute in accordance with such award a contract, of which this proposal and the said notice to proposers and the specifications attached to the notice to proposers shall be a part.

The proposer further agrees that should the proposer withdraw this proposal in a manner other than provided for in the specifications, or his/her default in executing the contract, {providing the necessary insurance and bonds}, or timely provision of {materials} {equipment} {services} under said contract in a manner satisfactory to District, the bidder/proposer shall pay any and all additional cost incurred by District in obtaining the {materials} {equipment} {services} from another firm.)

Signature: _____

Address: _____

(Corporate Seal)

Nature of firm (corporation, partnership, etc.) and names of individual members of the firm, or names and titles of officers of the corporation.

Corporation organized under the laws of the state of:

CONTRA COSTA WATER DISTRICT

**CONTRACTOR/CONSULTANT
SAFE PRACTICES HANDBOOK**

Fiscal Year 2023



CONTRACTOR/CONSULTANT SAFE PRACTICES HANDBOOK

Contra Costa Water District's (District) goal is to provide everyone with the benefits of a safe and healthy work environment. The District is committed to maintaining a workplace free from work-related injuries and illnesses, and to complying with applicable laws and regulations governing workplace safety.

To help achieve these goals, the District has developed a Contractor/Consultant Safe Practices Handbook. These safe practices outlined in this handbook are intended to foster a safe and healthful work environment.

It is the responsibility of everyone to work together to identify and eliminate conditions and practices that create an unsafe or unhealthy work environment.

This handbook is to augment the requirements in the safety section of the bid documents in the General Conditions, if applicable, and is to be used by each contractor, consultant, subcontractor, sub-consultant and their employees (herein called Contractor) as the minimum requirements of their safety program. While this handbook provides many of the safe practices the District requires of its contractors, it is not intended to include all required safe practices. The Contractor and its employees are expected to follow all applicable rules and regulations in the performance of their work. District staff may exercise Stop Work Authority if contractors are observed violating District safe work practices while working on District infrastructure, and may shut down a job until the condition or situation creating the hazard has been corrected and District safety procedures are adhered to.

The District's Health and Safety Program's objectives are to:

- Maximize the safety of employees, contractors, and the general public
- Maintain a safe and healthy work environment as free as possible from threat of injury or illness due to unsafe practices or conditions
- Establish safety as a priority in conjunction with efficiency and productivity
- Comply with all federal, state, city, and District safety requirements and guidelines and, where necessary, to implement additional policies to ensure safety

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The following are safe practices that shall be followed. These safe practices coincide with and/or augment other applicable federal, state and local safety, health and environmental regulations and codes that also shall be followed. The Contractor shall follow the more stringent requirement of this handbook or other federal, state or local regulations.

GENERAL SAFETY PRACTICES

1. Review the requirements set out in this handbook with all employees and subcontractor employees.
2. Obtain appropriate equipment before the start of work to conduct work safely. For example: ladders, lighting, extension cords, direct-read gas monitors, confined space retrieval devices, ventilation fans, lockout/tagout kits, warning signs, as well as personal protective equipment such as respiratory protection, fall protection harnesses, lanyards, hard hats, and safety glasses.
3. Delineate the work zone requiring hard hats using signs, cones, barricades, caution tape, or equivalent warning devices.
4. Use stairs, ladders or ramps to climb up or down work surfaces 4 feet or more in height and/or depth.
5. Ensure there is adequate lighting to perform the job safely.
6. Do not enter confined spaces (vaults, tanks, buried reservoirs, and pipes) unless you are trained, have monitored the atmosphere, and have eliminated or controlled all serious hazards. Notify the District 24 hours before a confined space entry. See Confined Spaces section for other requirements.
7. Keep your work area clean and orderly at all times to prevent slips, trips or falls. Place barriers or warning signs at locations with wet floors.
8. Attend pre-job safety briefings. Conduct tailgate safety meetings at least once every ten days for work involving construction, maintenance or repair work, or any work near water (reservoirs and canals) or in confined spaces.
9. The District water treatment plants and Los Vaqueros Watershed have additional visitor safety rules. Comply with the pertinent visitor safety rules when visiting one of these District locations.
10. Written pre-task plans are required to be completed prior to High Hazard Job Tasks. See High Hazard Job Tasks section for further information. High Hazard Job Tasks are defined as:
 - a. Permit-required confined space entry
 - b. Maintenance tasks requiring lockout/tagout
 - c. Line breaking tasks – Opening of equipment that may carry flammable, corrosive, or toxic material, or an inert gas or any fluid, including water, at a volume, pressure, or temperature capable of causing serious injury
 - d. Neutralizing large amounts of spilled corrosive substances at plant process areas
 - e. Work requiring the use of cartridge respirators or self-contained breathing apparatus

- f. Use of mobile cranes with persons (other than the crane operator) on foot and in the immediate area of operation
 - g. High-voltage electrical work above 480 Volts or work on exposed live parts of low voltage (50 - 480V)
 - h. Work using a personal fall arrest system
 - i. Excavating with heavy equipment or working in an excavation deeper than 4 feet
 - j. Work in public roadways with the speed limits of 30 MPH or more and when traffic control measures are needed for a time period of more than 15 minutes
 - k. Scaffold erection
 - l. Hot work (welding, cutting, or grinding outside of maintenance shops)
 - m. Chainsaw operations to remove a branch or tree greater than 8 inches in diameter
 - n. Work over water at night
 - o. Any other job task determined as highly hazardous by the lead person or the supervisor in charge.
11. The pre-task plan must cover hazards expected throughout the job task, measures to protect against those hazards, and emergency response planning. Use available safety checklists for the job task (e.g., confined space entry permit), and complete during the tailgate meeting. All employees involved in the High Hazard Job Task must attend the meeting. The pre-task plan and meeting information must be documented. Prior to High Hazard Job Tasks performed at treatment plants or Los Vaqueros Watershed, pre-task plans must be communicated to the District Contract Administrator or Construction Inspector by phone, e-mail or text.
12. Written Procedures: Submit all pertinent written safety plans, programs, and information (written programs on Injury Illness Prevention Plan [IIPP], confined space entry, hot work, diving safety, fall protection, hazardous chemical line breaking, and/or respiratory protection) to the District Contract Administrator before the start of work at the Pre-Construction or Kick-Off meeting. Also submit a written plan for a “critical lift” before performing that lift. A critical lift is a crane lift of more than 75% of crane lift capacity.
13. Training: Submit all current safety certifications and licenses for asbestos work and mobile crane operations to the District Contract Administrator. Before starting work involving asbestos cement pipe, mobile crane and rigging operations, confined space entry, hazardous electrical systems (of 50 or more volts), plant machinery (lockout/tagout), hazardous chemicals, excavations, underwater diving, scaffold erection or the use of fall arrest systems, submit pertinent training records and written descriptions of qualifications to the District Contract Administrator for all staff expected to perform work. All employees and subcontractor employees working at or on District facilities must have received all safety training required by Cal-OSHA regulations. All safety training records must be available to the Contract Administrator upon request.
- a. Project managers, superintendents, foremen or other lead employees that conduct or supervise High Hazard Job Tasks, as defined above, at District project work sites must successfully complete CCWD Contractor Safety Orientation training, and provide proof of

completion to the District prior to commencement of any project activities. This training shall be fulfilled at the OSCA Training Center in Martinez, (1805 Arnold Dr., Martinez, CA 94553; phone (866) 699-2727).

14. Ensure availability of adequate shade and water for employees working outdoors at temperatures 80°F and above. At temperatures 95°F and above (i.e., high heat), observe all employees for alertness and signs of heat illness, and remind employees to drink water throughout the work shift.
 - a. High-heat and emergency response procedures must be documented in the employers Injury Illness Prevention Plan or maintained as a separate document. The Contract Administrator may request to review these procedures prior to or during work.
15. Construction debris shall be kept reasonably cleared from work areas, passageways, and stairs in and around buildings or other structures. Debris shall not be stored or piled in the path of egress. Debris waste must be stored in a waste container before removal. All waste shall be disposed of at intervals determined by the rate of accumulation and capacity of the job site container.
16. Ensure employees working outdoors have protection from wildfire smoke when the Air Quality Index (AQI) for PM2.5 is 151 or greater, and when it is anticipated that employees will be exposed to wildfire smoke.
 - a. Refer to AirNow.gov for local PM2.5 and wildfire smoke conditions.
 - b. Protective measures against exposure to wildfire smoke can include: relocating work to an indoor area with filtered air or an area with less smoke, reducing the time and intensity of work, and providing voluntary access to N95 masks.

SITE SAFETY AND SECURITY

1. Close gates and entry doors that will be unattended to prevent unauthorized entries.
2. If a rattlesnake is found to obstruct your ability to safely perform your work, contact Contra Costa County Animal Services at 925-335-8300, Antioch Animal Services at 925-779-6989, or Los Vaqueros Watershed staff (when available) to have the snake safely removed from the worksite.
3. Follow posted speed limits. The speed limit at maintenance yards, plant roads, and parking lots is 10 MPH. At Los Vaqueros Watershed, the speed limit is 15 MPH for unpaved roads and 30 MPH for paved roads.
4. Contact Watershed supervisors at 925-240-2360 before driving on unpaved Watershed roads. Watershed supervisors determine when it is safe to drive and what vehicle types may be used during, or shortly after periods of rain.
5. When unaccompanied by District staff, contact District Operations Control at 925-688-8397 when entering and exiting remote District facilities (e.g., reservoirs and pump stations).

CONSTRUCTION AND MAINTENANCE WORK

1. Follow Government Code 4216 (USA North's California Excavation Manual) to prevent potentially catastrophic accidents and damage to underground utilities.
2. Use hand tools to locate the exact location of underground utilities (hand dig or probe). While excavating laterally within 24" of the exterior surface of marked utilities or when all known utilities are not marked, probing or hand digging shall be required prior to mechanical excavation. In areas where buried power lines are suspected or within 24" of electric utility marks, use a non-conducting (fiberglass handle and shaft) probing tool to probe soil. Using a probe with a steel shaft and electrically-rated insulated handle to probe soil further away than 24" from electric utility marks or identified electric utility is permissible. Probes within 24" of these marks shall be constructed of a dielectric material.
3. Install adequate shoring, or bench or slope excavations that have either poor soil conditions or depths in excess of 5 feet prior to entry in the excavations.
4. Keep spoils or heavy equipment at least 2 feet from the edge of excavations to prevent them from falling or rolling into excavations.
5. Use grounded electric-powered tools and ground-fault circuit interrupters (GFCIs) during all construction and maintenance activities.
6. Set barricades, fencing or guard rails around open excavations deeper than 6 feet to prevent falls. Place fencing around or sturdy covers (e.g., road plates or 1 1/8" plywood) over unattended excavations.
7. For excavation work, arrange to have the atmospheric levels checked with an appropriate gas monitor, when there is a strong odor present, or other sign of a nearby release of sewage, fuel, natural gas or other hazardous chemical line.
8. Use a portable exhaust fan when welding, torch cutting, operating equipment with combustion engines, or using chemicals in enclosed spaces.
9. Evaluate the working clearance to overhead high voltage (greater than 600 V) power lines and adjust work practices to provide for adequate (greater than 10 foot) clearances.
10. Place rebar caps that provide impalement protection on all sharp vertical metal projections. Non-metal vertical projections (e.g. PVC pipe) should be evaluated for impalement risk and protected appropriately.
11. Where cranes are used to lift loads, the area beneath the load must be delineated using signs, cones, barricades, caution tape, or equivalent warning devices to keep people, vehicles and other equipment out of the area beneath the load's path of travel. Loads placed on sloped roofs must be secured to ensure there is no potential of the load falling off.

Asbestos Cement Pipe Work

12. Only employees trained to work with asbestos cement (AC) pipe shall disturb, cut, or perform work AC pipe.
13. Only use manual-cutting tools (snap cutter, hammer or knife blade) to cut AC pipe. Use of other cutting tools must be first approved by the District. The use of powered tools to cut AC pipe is prohibited. Continuously wet the area of the pipe being cut with water and surfactant through the use of a sprayer to prevent asbestos fibers from becoming airborne. Wear appropriate respiratory protection as required. Smoking is prohibited when handling asbestos materials.
14. Before AC pipe work begins, place an asbestos danger sign at the excavation as required by CCR, Title 8, Sec. 1529.
15. AC pipe shall be either abandoned in place in the excavation or properly disposed of asbestos-containing materials according to Cal-EPA regulations. Before AC pipe is disposed, double-wrap the pipe in 6-mil polyethylene sheeting and seal with duct tape. Store waste pipe at a secure location. Attach an asbestos warning label to waste pipe as required by CCR, Title 8, Sec. 1529.

Silica Safety

16. A silica exposure control plan must be established for work that could expose Contractor or District employees to respirable crystalline silica at greater than 25 micrograms per cubic meter of air (25 $\mu\text{g}/\text{m}^3$) as an 8-hour time-weighted average (TWA) under any foreseeable conditions. Copies of this plan may be requested by the Contract Administrator.
17. In addition to the exposure control plan, control methods for minimizing silica exposure must be developed and utilized at all times during the course of potential silica-exposing work. Copies of this control plan and verification of their effectiveness may be requested by the Contract Administrator.

Grounds Maintenance

18. When feasible, keep at least 50 feet away from other workers operating push mowers or weed eaters to prevent being struck by flying objects.
19. Do not trim tree branches that are within 10 feet of live high voltage power lines.
20. Use a fall protection system when climbing trees.

Treatment Plant and Pumping Plant Areas

21. Unless necessary for troubleshooting, avoid being in the immediate location of industrial equipment when the equipment is remotely started.
22. When opening hazardous material piping or tanks follow the CCWD Operations & Maintenance Standard Operating Procedure (O&M SOP) “Line Breaking Involving Dangerous Materials.” Wear self-contained breathing apparatus (SCBAs) when opening systems containing chlorine gas, ozone, or ammonia.
23. Always check atmospheric levels before entering a potentially hazardous atmosphere. Wear appropriate respiratory protection before entering a hazardous atmosphere. Continuously monitor the atmosphere.
24. Wear supplied air respiratory protection when applying urethane or other coatings inside confined spaces that may create a hazardous atmosphere.
25. Check Safety Data Sheets for hazardous chemical permissible exposure limits, especially when using the chemicals inside enclosed spaces.

Oxygen and Ozone Systems Maintenance

26. Wear 100% cotton clothing to minimize the risk of sparks generated by static discharge from clothing.
27. Use spark-resistant tools when working on oxygen and ozone systems.
28. Confirm oxygen levels are in the safe range of 20.9% and 23.5% using a direct-read gas monitor before conducting hot work. Stop work and exit the work area if the direct-read gas monitor indicates oxygen levels outside of the safe range in the work area.
29. Use only intrinsically-safe ventilation equipment (exhaust and blower) prior to and during ozone line breaking activities. Wear self-contained breathing apparatus until ozone levels in the work area are confirmed to be below 0.1 ppm.

BOATING SAFETY

1. All boat operators must have a California Boater Card, issued by the California Department of Boating and Waterways prior to operating a boat.
2. Do not operate a boat in inclement weather except when needed to conduct a rescue. Boating at Los Vaqueros Reservoir is prohibited when sustained wind speed is above 16 miles per hour.
3. Each boat occupant must wear a US Coast Guard-approved personal flotation device (PFD). Each occupant must carry a whistle or horn to alert others in case of emergency.
4. Each boat must have the maximum carry capacity marked. Do not exceed the maximum occupancy or carrying capacity.
5. Each boat must have a means of communication (e.g., push-to-talk device or cell phone).
6. Each boat must carry a fire extinguisher and a US Coast Guard-approved throwable rescue device.
7. If the boat operator expects the boating activity to take longer than four hours, a written float plan must be prepared. The float plan must include the following information: names of personnel on board, activity to be performed, expected time of departure, route, time of return and means of communication.
8. A minimum of two trained persons launch or retrieve a boat from a boat ramp.
9. Ensure there is enough fuel and drinking water for the boating activity.
10. Stay seated while the boat is traveling.
11. Work over water at night requires a written pre-task plan.

CONFINED SPACES

1. Before entering confined spaces:
 - a. Remove standing water to less than 3 inches in depth when possible;
 - b. Monitor the atmosphere with a calibrated gas monitor device with oxygen, carbon monoxide, hydrogen sulfide, and explosive atmosphere sensors. Where the potential for hazardous atmospheres of ammonia, chlorine, ozone, or volatile organic compounds exists, monitor the atmosphere with sensors that can detect those hazards, or use appropriate respiratory protection equipment during entry;
 - c. Use an appropriate ladder;
 - d. Where welding and cutting and/or spray coating activities occur or where other serious hazards exist as defined by the California Code of Regulations (CCR), Title 8, Sec. 5157, "Confined Spaces," a "permit" entry procedure is used. A permit procedure includes use of a Confined Space Permit checklist, use of a retrieval and fall protection system (unless the system poses a greater hazard), and attendant(s) or rescue personnel available on-site that are prepared to carry out a confined space rescue plan;
 - e. Use mechanical ventilation as needed; use exhaust ventilation to remove welding fumes during welding/cutting activities;
 - f. Eliminate chemical or drowning hazards using positive isolation methods as defined by CCR, Title 8, Sec. 5157 and Sec. 1953. If positive isolation to eliminate drowning hazards is not feasible, entry using a single point of isolation may be made only if a written failure analysis using engineering data indicates that risk of engulfment is adequately controlled by the use of the single isolation point;
 - g. Ensure that self-contained breathing apparatus (SCBAs) are available for rescue personnel where a potential for a hazardous atmosphere may exist; and
 - h. Where access to and from the space is horizontal, fall protection may not be required. However, entrants shall wear harnesses to help assist rescue personnel in retrieval.
2. All confined space entrants, attendants and entry supervisors must be trained on the hazards of confined spaces and safe entry procedures, as well as lockout/tagout procedures when used. Confined space rescue personnel must have participated in a confined space rescue drill within the last 12 months, and be certified in cardiopulmonary resuscitation and first aid.

DIVING OPERATIONS

Follow these safety procedures during all underwater diving operations:

1. Before diving operations commence, submit a written diving safety manual and dive plan to the Contract Administrator.
2. The diving safety manual shall describe safety, equipment and other operating procedures as well as emergency procedures covering evacuation and medical treatment.
3. The dive plan shall include information for the specific task including identified hazards, team assignments, emergency procedures, a list of nearby medical facilities including recompression chambers, breathing gas supply equipment, and thermal protection and other equipment planned for use.
4. When a diver is submerged without being line-tended from the surface, a stand-by diver or a second diver shall be available to assist in an emergency. Effective communication with the submerged diver such as radio communication shall be in place at all times.

DRIVING SAFETY

1. When driving on District property, a valid driver's license for the type of vehicle being driven, vehicle registration form, and proof of vehicle insurance is required.
2. Ensure that driver and passengers have safety belts fastened while driving at all times. Obey all laws and rules of the road, including speed limits, traffic signals and signs.
3. Park all vehicles in compliance with the California Vehicle Code and local ordinances. Follow the [California Manual on Uniform Traffic Control Devices](#) whenever work is performed in and adjacent to vehicle traffic.
4. Determine loading restrictions on reservoir roofs prior to driving vehicles or placing other loads on the roof. Do not overload roofs.
5. Before driving heavy equipment or trucks on steeply sloped unpaved paths, inspect the paths with either a light vehicle or on foot. Determine and mark soft areas, sharp turns, slopes and other hazards.
6. When departing vehicles, set all brakes. Turn off the engine (unless required to power auxiliary equipment). At sloped areas, place a wheel chock on the downhill side of one of the drive wheels or curb wheels. Where possible, park the vehicle's wheels perpendicular to the slope's direction.

ELECTRICAL SAFETY

1. Only qualified electricians shall work on electrical conductors, equipment or systems of 480 V or more. Qualified electricians have a minimum of two years of training and experience with high voltage circuits and equipment and have demonstrated by performance familiarity with the work to be performed and the hazards involved.
 - a. **Documentation of electrician experience must be submitted to the District Contract Administrator prior to the start of work.**

Under the supervision or instruction of a qualified electrician, trained persons familiar with the electrical operation to be performed and the electrical hazards involved are permitted to work on electrical equipment or systems of less than 480 V (including throwing switches and using voltage testers to verify proper lockout). No electrical work shall be performed by untrained persons that do not have the demonstrated skills or knowledge in the construction and operation of electric equipment and installations and the hazards involved.
2. Check equipment, cords and attachments before each use to ensure they are safe to use and operate. Remove damaged electrical equipment from service.
3. Use energy control procedures to ensure that power is completely off during maintenance and repairs of hard-wired equipment. Physically lock all isolation devices with a lockout device. Confirm de-energization before handling non-insulated wiring. The exception to this rule is electrical troubleshooting.
4. Stay clear of energized parts whenever possible. If you must work with or near energized parts with voltages exceeding 50 Volts (i.e., electrical troubleshooting):
 - a. Use personal protective equipment such as rated flame retardant clothing, rubber insulating gloves, sleeves, hard hats, blankets, mats and nonconducting tools.
 - b. Avoid wearing metallic jewelry including watches.
 - c. Follow arc flash label requirements to keep safe distances from electrical equipment. Wear appropriate PPE if closer than the safe distance from live electrical parts. Where arc flash labels do not exist, stay at least 10 feet away from where live low voltage (480 V and less) electrical work is being conducted unless you are wearing the appropriate personal protective equipment. Stay outside of the motor control center area (building or room) where live high voltage (more than 480 V) electrical work is being conducted unless you are wearing the appropriate personal protective equipment. Use barricade tape or signs to warn unprotected persons to keep away from the live electrical work area.
 - d. Do not use two hands when handling energized parts.
5. Do not work on energized electrical equipment when wet, including heating tape on equipment.
6. Re-install equipment guards that protect electrical equipment after work is completed.

7. Keep electrical panel doors on and closed. Keep access to electrical panels clear with at least a 36” clearance. Do not use motor control center rooms as storage areas.
8. Use equipment designed for use in damp environments when exposed to such environments. All electrical equipment in these areas must be grounded.
9. Use ground fault circuit interrupters (GFCIs) when using electrically powered tools and equipment during construction and maintenance activities.
10. Only persons who are trained shall access electrical panels and equipment. Before accessing electrical panels, take safe and appropriate actions to check the panel enclosure for hazardous voltage prior to opening.

FALL PROTECTION

1. Install temporary standard 42” guard rails or fencing whenever feasible to provide protection from falls over 6 feet.

Set barricades, fencing, or guard rails around open excavations with depths in excess of 6 feet to prevent falls into the excavation.
2. Wear proper fall protection equipment (harness with a fall arrest or fall restraint device tied to an anchor point) when working within 6 feet of the leading edge of unprotected work surfaces more than 6 feet in elevation or unprotected sloped work surfaces greater than 40 degrees and more than 6 feet in elevation.
3. For work on sloped roofs greater than 30 degrees (7:12 slope) and more than 6 feet in elevation, use fall protection equipment secured to a suitable anchor point. Install anchor points as needed.
4. For work on flat roofs or roofs less than 30 degrees in slope and more than 6 feet in elevation:
 - a. When possible, keep 6 feet from leading edges;
 - b. When working within 6 feet of a leading edge and work is expected to be of long duration (more than a week), install temporary guard rails; when work is of short duration (less than a week) wear proper fall protection equipment to work within 6 feet of the edge.
5. Do not use fall protection equipment unless properly trained. Inspect fall protection equipment before use.
6. Anchor points must be capable of supporting 5000 lbs. per attached worker. Do not attach fall protection equipment to guard rails. When practical, secure the anchor end of the fall arrest device at a level not lower than your waist.
7. A fall arrest device can be a shock-absorbing lanyard or a self-retracting lifeline. Lifelines shall be protected against damage.
8. When the use of guard rails or other conventional fall protection is impractical or creates a greater hazard, submit a written fall protection plan that complies with CCR, Title 8, Section 1671.1 to the District Contract Administrator before the start of work.
9. Scaffolds are erected and inspected only by trained competent persons. Inspect the scaffold before use. Stay clear of electrical lines and other equipment. Scaffolds must be level and be set up on firm and solid foundations. Scaffolding over 6 feet must have guard rails and toe-boards on open sides and ends. Scaffolds must not exceed its load capacity. Do not climb on scaffold cross bracing. Do not carry materials when climbing. Riding on rolling scaffolds is prohibited. All wheels’ safety locks and pins must be in place when a person is on the scaffold. Place barricades or cones around the area beneath the scaffold to warn passersby of possible falling objects.

FIRE SAFETY

1. Ensure good housekeeping is maintained, keeping work areas clean and free of debris.
2. Store flammable materials in approved safety cans and/or cabinets. Keep large amounts (more than 10 gallons of flammable liquid) in a flammable liquids cabinet.
 - a. Keep smoking, flames/sparks, and other ignition sources at least 35 feet away from areas where flammable fuel is dispensed.
 - b. To prevent the buildup of static electricity and prevent sparks from causing a fire, bond dispensing and receiving containers together before dispensing flammable liquid. Additionally, ensure the dispensing container is grounded.
 - c. Report all fires.
3. Operate and maintain all electrical circuits so they do not become overloaded.
4. Keep fire exits and escape routes clear.
5. Know the evacuation routes from your work area.
6. Know where alarm boxes are located.
7. Maintain a fire watch when open flames, sparks, or smoke are present. Keep a fire extinguisher available when welding/cutting/brazing, grinding or conducting other hot work.

Wildfire Prevention: Maintain a fire watch for at least 30 minutes after hot work or weed abatement activities are completed at areas with a high wildfire risk. A fire pump-equipped pickup truck or water truck must be in operation for fire watch duty. At wildfire-prone areas, and when temperatures exceed 80 degrees Fahrenheit, relative humidity is below 30% and sustained winds exceed 10 miles per hour, contact CAL FIRE in Morgan Hill (408) 779-2121 for permission to conduct hot work. Hot work at the Los Vaqueros Watershed must be approved by the District's Watershed management.

Structural Fire Prevention: Obtain a hot work permit from the District Contract Administrator before performing hot work at CCWD facilities. At CCWD facilities (office buildings/areas, pump stations/plants, and treatment plants), maintain a fire watch for 30 minutes after hot work is completed under a permit.

Employees performing welding activities and fire watch duties shall wear 100% cotton clothing or flame-resistant clothing, and have completed fire suppression training within the last 12 months.

(See also Welding, Cutting and Other Hot Work section for related requirements).

HEAT ILLNESS PREVENTION

1. Water must be located as close as practicable to the areas where employees are working at all times.
2. Employees are encouraged to take a preventative cool-down rest in the shade when they feel the need to do so to protect themselves from overheating or experiencing heat illness.
3. Shade shall be present when the temperature exceeds 80 degrees Fahrenheit. Shade should be less than a 5-minute walk from the work area.
4. Employees shall be closely monitored during a heat wave (any day in which the predicted high temperature for the day will be at least 80 degrees Fahrenheit and at least ten degrees higher than the average high daily temperature in the preceding five days), especially if they have been away from the heat for a week or more or are newly assigned to a high-heat area. Newly assigned employees shall be monitored for 14 days.
5. High heat procedures shall be implemented when the temperature equals or exceeds 95 degrees Fahrenheit. This includes:
 - a. Daily heat alerts to employees
 - b. Ensuring effective communication between employees and supervisors
 - c. Observing/checking with employees for alertness and signs/symptoms of heat illness.
 - d. When forecasted temperatures exceed 105 degrees Fahrenheit, supervisors must schedule strenuous work activities during cooler times of the day, except for emergency job tasks that are necessary to be completed to avoid major service disruptions or impacts to public safety.

HIGH HAZARD JOB TASKS

Pre-task plans and tailgate meetings are required to be conducted just prior to all high hazard job tasks, in accordance with O&M SOP High Hazard Work. Completed High Hazard Work Plans shall be submitted to the Manager of Health & Safety. High Hazard job tasks include:

High Hazard Task	Work Planning Form Required
Permit-required confined space entry	Confined space permit
Maintenance tasks requiring lockout/tagout	Energy Control Procedure (ECP)
Line breaking tasks – Opening of equipment that may carry flammable, corrosive, or toxic material, or an inert gas or any fluid, including water, at a volume, pressure, or temperature capable of causing serious injury	High hazard work plan
Neutralizing large amounts of spilled corrosive substances at plant process areas	High hazard work plan
Work requiring the use of cartridge respirators or self-contained breathing apparatus	High hazard work plan or SCBA form
Use of mobile cranes with persons (other than the crane operator) on foot and in the immediate area of operation	High hazard work plan
High-voltage electrical work above 480 Volts or work on exposed live parts of low voltage (50 - 480)	High hazard work plan, or energized electrical permit
Work using a personal fall arrest system	High hazard work plan
Excavating with heavy equipment or working in an excavation deeper than 4 feet	Excavation pre-task plan
Work in public roadways with the speed limits of 30 MPH or more and when traffic control measures are needed for a time period of more than 15 minutes	Excavation pre-task plan, or high hazard work plan
Scaffold erection	High hazard work plan
Hot work (welding, cutting, or grinding outside of maintenance shops)	Hot work permit
Chainsaw operations to remove a branch or tree greater than 8 inches in diameter	High hazard work plan, or tree removal form
Work over water at night	High hazard work plan
Any other job task determined as highly hazardous by the lead person or the supervisor in charge	High hazard work plan

1. The tailgate meeting must cover hazards expected throughout the job task, measures to protect against those hazards, and emergency response planning.
2. Use available safety checklists for the job task (e.g., confined space entry permit), and complete during the meeting.
3. All employees involved in the high hazard job task must attend the meeting. Meeting information must be documented. See the table above for the appropriate form for documentation.
4. Before working on high hazard activities that are non-routine and not covered under an existing SOP, complete a High Hazard Work Plan as per the O&M SOP. The High Hazard Work Plan must be approved by a supervisor and the Manager of Health & Safety.
5. Staff shall delineate the work zone using cones, barricades, caution tape, or equivalent warning devices.

LADDER SAFETY

1. Select the right ladder for the job.
 - a. The ladder shall be tall enough so that you can safely reach the required objects and must be on solid footing on the ground or a solid foundation. Do not put the ladder on some other object to reach the required height.
 - b. The ladder shall be made of a material that is appropriate for the work to be performed. Do not use metal (electrically conductive) ladders when working around or with electrical equipment.
2. Use ladders for only their intended purpose, i.e., climbing up and down.
3. Always face the ladder when ascending or descending, holding on with both hands.
4. Step Ladders
 - a. Make sure the spreaders are locked open before climbing.
 - b. Do not climb above second rung from the top.
5. Straight/Extension Ladders
 - a. Ensure that the ladder extends at least 3 feet above the elevated surface to which you are climbing.
 - b. Secure the ladder at the top to hold it in place. Have a second person hold the ladder in place when ascending or descending until the ladder is secured. The person climbing the ladder and the person holding the ladder shall wear hard hats when an overhead hazard is present.
 - c. Keep at or below the third rung from the top on a straight ladder.
6. Fixed Ladders - Use a ladder climbing safety device (LAD-SAF®) when climbing fixed tank ladders that have the device installed.

LOCKOUT, BLOCKOUT AND TAGOUT

Follow the District's Energy Control Procedures, which include using lockout, blockout and tagout procedures during all confined space entries and all construction and maintenance activities on machinery or equipment where a hazardous release of energy is possible including electrical, mechanical, chemical, hydraulic, pneumatic and potential.

1. Notify all affected personnel (including operators of machinery, equipment and facilities) during a hazard analysis tailgate meeting before the activity.
2. Follow the District's Energy Control Procedures (ECP) for the specific District equipment/systems. Coordinate with District staff to identify all hazardous energy sources, their energy isolation devices (e.g., circuit breakers, valves, etc.), control circuit-type devices (e.g., push buttons, selector switches, etc.), block-out points, drain/bleed points and energy indicator devices (e.g., gauges, panel lights).
 - a. Review and suggest changes to ECPs where needed to ensure proper lockout, blockout and tagout prior to work.
3. Shut down. All operating controls shall be turned off or returned to the neutral position (depress stop button, open switch, close valve, etc.). Deactivate the energy isolation device so that the machine or equipment is isolated from the energy source. Disable motor-operated valves.
4. Lock out. A locking device shall be placed on each energy-isolating device or project lock box to isolate each energy source.
 - a. Each employee who could be potentially injured by unexpected energy release shall place their own uniquely keyed lock and tag at each isolation point, or at the lock box. Locks are to be provided by the contractor.
5. Tag out. Do not use tags alone on energy isolation points unless the isolation point is not lockable. The tag must be attached using a zip tie (or equivalent) and have the following information: name, "Danger – Do Not Operate" (or equivalent wording), date, and contact information.
 - a. Machines or equipment not equipped with lockable controls shall be disconnected from their sources of power to prevent inadvertent movement or release of hazardous energy. Tag equipment controls. Implement additional safety measures such as the removal of an isolating circuit element, blocking of a controlling switch, opening of an extra disconnecting device, or the removal of a valve handle to reduce the risk of inadvertent energization.
6. Drain, bleed, and purge any stored energy. Coordinate with District staff to ensure stored or residual energy (such as capacitors, springs, elevated machine members, rotating flywheels, hydraulic systems, pressurized air, gas or water systems, chemicals, etc.) are dissipated by methods like grounding, bleeding down, flushing, etc. If necessary, moveable parts shall be mechanically blocked to prevent inadvertent movement.

- a. Prior to opening a chemical system, depressurize and drain as completely as possible, thoroughly wash, flush, purge and vent (if safe). Some toxic gases may not be safely vented. For more specific guidance, follow the District's O&M Line Breaking Procedure, which requires use of SCBAs when opening aqueous ammonia, ozone or chlorine systems.
7. Verify lockout. First, check that no personnel are exposed, then test and verify isolation of equipment by operating the push buttons, switches or other normal operating controls to make certain the equipment is not energized (voltage tester). Visually inspect to ensure the equipment will not otherwise operate. Return operating controls to neutral or "off" position after verification.
8. Exceptions to the lockout and tagout procedures must be approved by the District and may include the following: electrical troubleshooting performed by qualified electricians and hot tapping of water pipelines.

WORK AT LOS VAQUEROS WATERSHED

1. All contractors, consultants, and CCWD employees must sign-in and sign-out when entering and leaving the Los Vaqueros Watershed or its associated Conservation Properties for safety and security. Sign-in and sign-out will be done at the Watershed Office (100 Walnut Boulevard, Brentwood), or by phone (925-240-2360).
2. Keys for gate access and vehicle tags must be picked up at and returned to the Watershed Office. Vehicle tags must be displayed for identification. Travel only on routes approved by Watershed Resources Staff. Return gates and locks to the configuration they were found.
3. All work outside of normal business hours must be coordinated with Watershed Resources Staff.
4. All work conducted at the Los Vaqueros Watershed and its associated Conservation Properties must be done in accordance with the Los Vaqueros Watershed Programmatic Biological Opinion and its associated permits, unless otherwise noted.
5. All contractors, consultants, and CCWD employees must receive a Sensitive Species Training prior to conducting work at the Los Vaqueros Watershed and its associated Conservation Properties. Depending on the type of work to be conducted, a biological construction monitor may be required.
6. Be advised, rain events stop most types of work and travel throughout the Los Vaqueros Watershed and its associated Conservation Properties from occurring. If a rain event occurs or is predicted to occur, consult with Watershed Resources Staff.
7. Wildfire safety: All contractors, consultants, and CCWD employees are required to follow the Cal Fire Operational Guide for Use of Equipment in Grass, Brush or Forest Covered Areas:
 - a. Do not drive, park, or idle over dry grass or brush.
 - b. All equipment must be inspected for defects and include a spark arrestor.
 - c. Each piece of equipment will carry the following tools: 1 (one) round point shovel not less than 46 inches long, and 1 (one) 5-gallon water-type fire extinguisher.
 - d. Mowing operations should be completed by 10 AM.
 - e. No operations shall occur within 24 hours of a predicted Red Flag event as determined by the National Weather Service.
 - f. Prior to commencement of any operations, a weather sampling will be conducted at the site. Additional weather sampling will be conducted every 2 hours thereafter until completion of the operation. If the ambient temperature reaches 80 degrees Fahrenheit at any time during the operation, weather samplings must be taken hourly. In the event the following readings are noted, OPERATIONS WILL CEASE IMMEDIATELY: The relative humidity is at or below 30%, or sustained wind speeds reach 10 MPH or higher.

PERSONAL PROTECTIVE EQUIPMENT

Head

1. Hard hats or equivalent head protection are to be worn at all times when any of the following conditions are present:
 - a. At work sites where construction and maintenance activities are conducted.
 - b. When working on a public street, or walking on paths for construction vehicle traffic.
 - c. Vertically entering/exiting confined spaces.
 - d. When cranes or other overhead equipment are being operated in the vicinity
 - e. When overhead equipment may automatically stop or start without warning
 - f. Or, when working in a location where there is a risk of receiving a head injury from flying or falling objects.
2. Delineate the work zone requiring hard hats using signs, cones, barricades, caution tape, or equivalent warning devices.
3. Hard hats do not need be worn in office environments with no overhead hazards.

Eye/Face

1. Wear the appropriate eye and face protection when you are engaged in metalworking activities, welding and cutting, using powered tools or otherwise exposed to flying particles/objects, injurious light rays, liquid chemicals, or hazardous gases.
2. Eye/face protection is required to be worn at treatment plants (except offices), pump stations/plants, laboratories, maintenance shops, where there are unshielded pressurized hazardous chemical lines or when hazardous chemicals are being used.
3. Full-face splash shields with safety glasses worn underneath, chemical splash goggles, or full-face respirators are required to be worn in the immediate areas (within 6 feet or inside secondary containment areas) where corrosive chemicals are off-loaded, handled, or leaking from process lines, or where corrosive chemical line breaking activities are conducted.
4. Eye/face protection is required in the immediate areas were construction and maintenance activities are being performed.

Hand and Arm

Wear appropriate protective gloves when you may be exposed to abrasions, hazardous substances, burns, cuts, punctures, live electricity, or other hazards. When welding, wear protective leather gauntlet gloves

or leather gloves and sleeves. Appropriate chemical resistant nitrile, latex or rubber gloves, and chemical resistant coveralls must be worn when approaching connected bulk chemical delivery hoses.

Foot

Wear safety shoes/boots that comply with ASTM F2413-05 M I/75 C/75 Standard when exposed to the risk of foot injuries from hot material, corrosive substances, falling objects, and crushing or penetrating activities.

Body and Leg

1. Wear chemical-resistant suits, coveralls or aprons, when working with bulk chemicals or performing line-breaking operations where chemical exposure to the torso is possible.
2. Wear approved personal floatation devices (PFDs) to control drowning hazards when inside the canal liner fence, near or over areas where water depths may exceed 4 feet, or in areas where indicated by posted signs.

PFDs do not need to be worn when other protective measures are in place, such as:

- a. Keeping a horizontal distance of more than 6 feet from the drowning hazard.
 - b. Using fall prevention equipment system (anchor point, harness and connection device) that effectively prevents a fall into the water.
 - c. Working behind a proper guardrail or equivalent barrier that is at least 42 inches high.
3. When exposed to traffic, all employees must wear high visibility shirt or vest rated at least Class 2 by ANSI/ISEA 107-2015. During hours of darkness and/or on roads with a speed limit of 45 MPH or above, wear shirts or jackets with rated Class 3 by ANSI/ISEA 107-2015. Wear flame-resistant (FR) high visibility apparel for hot work activities on roads.
 4. Wear long pants on all construction project sites. Synthetic fabrics shall not be worn during hot work (welding, cutting) and fire watch activities.
 5. Wear leg protection (chaps) when operating chainsaws (excluding pole saws or when climbing trees).
 6. Wear leg protection (snake chaps) when working in snake-prone areas.

Hearing

Wear hearing protection when near the operation of the following equipment: pneumatic tools, concrete saws, mowers, weed eaters, leaf blowers, chainsaws, pavement router, cement grinders, welding/cutting equipment, as well as other equipment where one must shout to be heard.

POWERED TOOLS AND EQUIPMENT

All employees shall follow these power tool/equipment safety rules:

1. Use manufacturer-recommended safety devices, guards, and shields on powered equipment.
2. Do not disengage safety devices and guards unless equipment is disabled so that it cannot unexpectedly energize. Exception: A chainsaw's bar nose guard may be removed for certain situations as allowed by the manufacturer's instruction manual.
3. For non-cord and plug-type equipment: isolate, lock and tag out hazardous energy sources (electrical disconnects and valves) before performing service and maintenance. (See Lock and Tag section).
4. Effectively ground all cord-connected, electrically powered tools and equipment, or use double-insulated type tools.
5. Use grounded electric-powered tools and ground-fault circuit interrupters (GFCIs) during all construction and maintenance activities.
6. Use a fall arrest system (lanyard and harness) when using an aerial boom lift.
7. Secure all compressed gas cylinders during transport, use, or storage to prevent them from toppling over. Place valve protection devices on all stored cylinders.
8. Grinders:
 - a. Inspect grinding wheels for cracks or damage before use. Ensure guards are in place. For bench/floor grinders, ensure that the tongue guard is within 1/4" of the wheel, and the tool rest is within 1/8" of the wheel.
 - b. Before using a new grinding wheel, make sure the manufacturer's recommended speed, as posted on the wheel, is compatible with your grinder. Perform a "ring" test to ensure the integrity of the wheel.
 - c. Don't stand directly in front of a grinding wheel whenever a grinder is started.
 - d. Don't grind material for which the wheel is not designed.
 - e. Don't force grinding so that motor slows noticeably.
9. Use water other appropriate controls to prevent silica dust from becoming airborne when generating dust from concert, stone, or other silica-containing material. This includes sawing, demoing, crushing, etc.

SOLITARY WORK

Contractors shall not work alone under the following work conditions:

1. Chemicals / Hazardous Materials:
 - a. Line breaking activities at treatment plants involving toxic or corrosive substances
 - b. Work with open batteries (splash hazard)
2. Confined Space: Permit-required confined space entries
3. Electrical: High-voltage (> 480 Volts) electrical work
4. Equipment and Tools:
 - a. Operation of lattice or boom truck crane
 - b. Chainsaw operation used for tree work
5. Excavation / Street Work:
 - a. Work in excavations more than 4 feet deep
 - b. Excavation work when flagging is required (minimum of 4 persons)
 - c. Work in public roadways with speed limits of 30 MPH or more and when traffic control measures are needed for an anticipated time period of more than 15 minutes
6. Fall Protection:
 - a. Use of personal fall arrest system (not including ladder climbing devices, e.g. Lad-Saf)
 - b. Work using an extension ladder when the ladder is not secured
7. Respiratory Protection: Potentially hazardous atmospheres where self-contained breathing apparatus is required (a minimum of four persons required)
8. Water / Drowning:
 - a. Repair of the canal liner fence, or other work occurring on the inside of the liner fence
 - b. Work during hours of darkness near or over water (when personal floatation devices are required)
 - c. When launching or retrieving a boat from a boat ramp
9. Welding: Hot work occurring outside of a maintenance shop (fire watch needed when welding, cutting, or grinding outside of maintenance shop)
10. Workplace Violence: Threat received regarding customer turn-off or any other threat
11. Work at the following facilities and locations, regardless of the type of work:
 - a. Mallard Pump Station (PS) – Hourly safety checks shall be conducted by Control
 - b. Los Medanos Wasteway
 - c. Canal laterals
12. Other work tasks or work locations may also be determined to require two people by the supervisor, superintendent, manager, or Manager of Health & Safety on a case-by-case basis.

WELDING, CUTTING AND OTHER HOT WORK

1. Maintain a fire watch when open flames, sparks, or smoke are present. Keep a fire extinguisher available when welding/cutting, grinding or conducting other hot work.
2. High Wildfire Risk Areas: If grinding or welding near dry (cured) vegetation, always wet down the vegetation at least 35 feet around and 75 feet downwind of the work site. Do not mow, weed-eat, or grind or weld near dry vegetation within 24 hours of a red flag day, or when temperatures exceed 80 degrees Fahrenheit, sustained wind speeds exceed 10 MPH and humidity is less than 30%. Check the National Weather Service on-line, evaluate weather with a “Kestrel” or contact a supervisor prior to hot work. Hot work at Los Vaqueros Watershed must be approved by the Watershed Superintendent. An employee on fire watch should have on hand: a shovel, and at least 5 gallons of water to spray as extinguishing agent.
3. Obtain a hot work permit before performing hot work outside of maintenance shops at District facilities (office buildings/areas, pump stations/plants, and treatment plants).
4. Maintain a fire watch for 30 minutes after hot work is completed under a permit.
5. Employees performing welding activities and fire watch duties shall wear 100% cotton clothing or flame-resistant clothing and have received fire extinguisher or fire suppression training within the last 12 months.
6. Before attaching a regulator to a cylinder, “crack” the cylinder valve (open the valve for an instant to blow dust or dirt out). Do not stand in front of valves when opening them.

Stand to one side of the regulator and very slowly open the cylinder valve on the oxygen all the way. Open the acetylene valve no more than $\frac{3}{4}$ of a turn. Take the T-wrench out of the cylinder and keep it close at hand. Tops of cylinders must be unobstructed at all times so valves may be quickly closed.
7. Use exhaust ventilation when welding or cutting in enclosed spaces. Use a gas monitor to confirm safe atmospheres. Do not place cylinders into confined spaces.
8. To prevent fires from flames, sparks and molten metal, remove combustible materials at least 35 feet around the work area. Cylinders shall be kept far enough away from hot work so that sparks, slag or flame will not reach them. Use fire-resistant shields (plywood) as needed.
9. Close all valves on cylinders when storing and/or transporting in vehicles. For long-term storage in buildings, close all valves, remove regulators and secure valve caps. Before a regulator is removed, close the cylinder valve and release the gas from the regulator.
10. Cylinders shall be used, stored or transported in an upright and secured so they cannot fall over and/or fall out of the truck. Valves of empty cylinders shall be closed, and cylinders marked “Empty” and properly stored.
11. Cylinders shall never be transported by a forklift unless in a secured in an approved transportation apparatus.
12. Separate acetylene and oxygen cylinders stored in buildings by 20 feet or a 2-hour fire wall.
13. Shield welding work from others to prevent eye damage.

COVID-19 / CORONAVIRUS

As a new virus, Coronavirus, also known as COVID-19, response and precautions have been rapidly changing. Below are some general guidelines that were true when this handbook was published in Spring of 2022. Please look to your District contact for up to date information as some of this below may have changed.

1. Follow all applicable federal, state, local and CCWD guidelines regarding COVID-19.
2. Implement a written COVID-19 Prevention Program per CCR, Title 8, Sec. 3205, and follow all corresponding Cal/OSHA regulations.
3. Complete a daily self-assessment of potential COVID-19 symptoms and exposure prior to arriving at a District facility or jobsite when planning to be onsite for 15 minutes or longer. Confirmation of the self-assessment will be sent daily to the visitor's District contact.
4. Stay home if you are sick.
5. Practice good hand hygiene. Wash your hands frequently for at least 20 seconds each time (or use hand sanitizer).
6. Avoid touching shared surfaces. If touching is necessary, clean surfaces before and after use.
7. Cough or sneeze into a tissue or your sleeve (not into your hands).
8. Limit access to facilities, job site and/or work trailers to only those necessary for the work.
9. Upon discovery, immediately disclose to the District any contractor/subcontractor personnel who have tested positive for COVID-19 that have visited a District construction site or facility.
10. If requested, immediately provide any information that could inform the District's contact tracing.

**CONTRA COSTA WATER DISTRICT
CONTRACTOR/CONSULTANT
SAFE PRACTICES HANDBOOK**

Fiscal Year 2023

Sign and return this page to the Contract Administrator

I have read and understood the Contractor/Consultant Safe Practices Handbook and I understand it is my responsibility to ensure that every employee from my company and each employee of subcontractors and sub-consultants working at or on Contra Costa Water District facilities has been briefed on the requirements contained in this handbook and has received a copy of the handbook.

Print Name

Company Name

Position

Signature

Date

Updated April 8, 2022