

ATTACHMENT E – NOTICE OF INTENT

RENEWAL

**ORDER WQ 2014-0174-DWQ
GENERAL PERMIT NO. CAG990002**

CIWQS 782621

**STATEWIDE GENERAL NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM
(NPDES) PERMIT FOR DISCHARGES FROM UTILITY VAULTS AND UNDERGROUND
STRUCTURES TO WATERS OF THE UNITED STATES**

I. NOTICE OF INTENT STATUS (See Instructions)

MARK ONLY ONE ITEM	1. <input type="checkbox"/> New Discharger	2. <input type="checkbox"/> Existing Discharger
	3. <input type="checkbox"/> Change of Information: WDID # _____	
	4. <input type="checkbox"/> Change of ownership or responsibility: WDID# _____	

II. OWNER/OPERATOR (If additional owners/operators are involved, provide the information in a supplemental page.)

A. Name		Owner/Operator Type (Check One)		
		1. <input type="checkbox"/> City	2. <input type="checkbox"/> County	3. <input type="checkbox"/> State
		4. <input type="checkbox"/> Gov. Combo	5. <input type="checkbox"/> Private	
B. Mailing Address				
C. City	D. County	E. State	F. Zip Code	
G. Contact Person	H. Title	I. Phone		
J. Email Address				

Additional Owners _____

III. BILLING ADDRESS (Enter information only if different from II. above)

Send to: <input type="checkbox"/> Owner/Operator <input type="checkbox"/> Other	A. Name	B. Title		
	C. Mailing Address			
D. City	E. County	F. State	G. Zip Code	

IV. RECEIVING WATER INFORMATION

<p>A. Attach a project map(s) that shows (1) the service area within the a specific Regional Water Board boundary and maps of(2) the corresponding major surface water(s) bodies and watersheds to which utility vault or underground structure water may be discharged. Map features must also include ASBS boundaries, MS4 discharge points to the ASBS, and major roadways.</p>
<p>B. Regional Water Quality Control Board(s) where discharge sites are located List the Water Board Regions where discharge of wastewater is proposed, i.e. Region(s) 1, 2, 3, 4, 5, 6, 7, 8, or 9:</p>

V. LAND DISPOSAL/RECLAMATION

The State Water Resources Control Board's water rights authority encourages the disposal of wastewater on land or re-use of wastewater where practical. You must evaluate and rule out this alternative prior to any discharge to surface water under this Order.

Is land disposal/reclamation feasible for all sites? **Yes** **No**

Is land disposal/reclamation applicable to a portion of the total number of sites? **Yes** **No**

If **Yes** to one or both questions, you should contact the Regional Water Board. This Order does not apply if there is no discharge to surface waters. If **No** to either or both questions, explain:

Discharging to land for disposal/reclamation is not always feasible when dewatering utility vaults located on/near the tarmac of the airport. Suitable land area for discharge is not in the vicinity of the vault.

VI. VERIFICATION

Have you contacted the appropriate Regional Water Board or verified in accordance with the appropriate Basin Plan that the proposed discharge will not violate prohibitions or orders of that Regional Water Board? **Yes** **No**

VII. TYPE OF UTILITY VAULT OR UNDERGROUND STRUCTURE (Check All That Apply)

Electric **Natural Gas** **Telecommunications** **Other:** _____

VIII. POLLUTION PREVENTION PLAN CONTACT INFORMATION

Each Discharger is required to provide a copy of their PLAN with their completed NOI. The PLAN requirements are provided in Section VII.C.3 of the Order. In the space below, provide the contact information for the person responsible for the development of the PLAN.

A. Company Name		B. Contact Person	
C. Street Address Where PLAN is Located		D. Title of Contact Person	
E. City	F. County	G. State CA	H. Zip Code
I. Phone	J. Email Address		

IX. DESCRIPTION OF DISCHARGE(S)

Describe the discharge(s) proposed. List any potential pollutants in the discharge. Attach additional sheets if needed.

X. REMINDERS

A. Have you included service territory/watershed map(s) with this submittal? Yes No
Separate maps must be submitted for each Regional Water Board where a proposed discharge will occur.

B. Have you included payment of the filing fee (for first-time enrollees only) with this submittal? Yes No N/A

C. Have you included your PLAN? Yes No

XI. CERTIFICATION

“I certify under penalty of law that this document and all attachments were prepared under my direction and supervision in accordance with a system designed to ensure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system, or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine or imprisonment.”

A. Printed Name: _____

B. Signature: _____ C. Date: _____

D. Title: _____

PLEASE SUBMIT THE NOI, FIRST ANNUAL FEE, PLAN, AND MAP
TO THE FOLLOWING ADDRESS:

**UTILITY VAULTS NOI
NPDES UNIT
DIVISION OF WATER QUALITY
STATE WATER RESOURCES CONTROL BOARD
P.O. BOX 100
SACRAMENTO, CA 95812-0100**

STATE USE ONLY

WDID:	Regional Board Office	Date NOI Received:	Date NOI Processed:
Case Handler’s Initial:	Fee Amount Received: \$	Check #:	

**INSTRUCTIONS FOR COMPLETING A NOTICE OF INTENT
ORDER WQ 2014-0174-DWQ
GENERAL PERMIT NO. CAG990002**

**STATEWIDE GENERAL NATIONAL POLLUTANT DISCHARGE ELIMINATION SYSTEM
(NPDES) PERMIT FOR DISCHARGES FROM UTILITY VAULTS AND UNDERGROUND
STRUCTURES TO WATERS OF THE UNITED STATES**

These instructions are intended to help you, the Discharger, complete the NOI form for General Permit No. CAG990002. **Please print clearly or type when completing the NOI form and service territory/watershed map(s). Illegible applications will not be processed.** For any field, if more space is needed, submit a supplementary page or letter with the NOI.

Send the completed and signed form, filing fee, PLAN, supporting documentation, and map(s) to the State Water Resources Control Board (State Water Board). Submit one permit application to cover all discharges within the boundaries of a Regional Water Quality Control Board (Regional Water Board). If the proposed discharges occur in more than one Water Board Region, submit a permit application for each Regional Water Board where a discharge will occur. Only one annual fee is required.

If the requirements in this Order conflict with the requirements of the Homeland Security Act and any other federal law that pertains to security in the United States, the Homeland Security Act and any other federal law that pertains to security in the United States shall take precedence. However, the Discharger must provide justification, including appropriate statutory citations, to the Regional Water Board regarding redacted information within any submittal. Coverage under this General Permit may be unavailable if nonredacted information is insufficient to demonstrate eligibility and compliance.

Section I – Notice of Intent Status

Indicate whether this request is for first time coverage, re-enrollment, or a change of information for a utility already covered under this Order. For a change of information or ownership, please supply the eleven-digit Waste Discharge Identification (WDID) number for the utility.

Section II – Owner/Operator

- A. Name** – Enter the name of the owner/operator. Check the appropriate box for which type of agency best describes the owner/operator. "Gov. Combo." is an abbreviation for "Government Combination" for a joint powers agency created by two or more government agencies. Private businesses should check the "Private" box.
- B. Mailing Address** – Enter the street number and name where correspondence should be sent (P.O. Box is acceptable).
- C. City** – Enter the city that applies to the mailing address given.
- D. County** – Enter the county that applies to the mailing address given.
- E. State** – Enter the state that applies to the mailing address given.

- F. Zip Code** – Enter the zip code that applies to the mailing address given.
- G. Contact Person** – Enter the name (first and last) of the contact person.
- H. Title** – Enter the contact person’s title.
- I. Telephone** – Enter the daytime telephone number of the contact person.
- J. Email Address** – Enter the email address of the contact person.
- Additional Owners** - Please check this box if there is more than one owner/operator and provide the requested information.

Section III – Billing Address

Send To: - Check the appropriate box and enter the information **only** if it is different from section II. above.

Name – Enter the name (first and last) of the person who will be responsible for the billing.

A. Title – Enter the title of the person responsible for the billing.

B. Mailing Address – Enter the street number and name where the billing should be sent (P.O. Box is acceptable).

C. City – Enter the city that applies to the billing address.

D. County – Enter the county that applies to the billing address.

E. State – Enter the state that applies to the billing address.

F. Zip Code – Enter the zip code that applies to the billing address.

Section IV – Receiving Water Information

- A.** Attach a project map(s) that shows (1) the service area within the specific Regional Water Board boundary and maps of (2) the corresponding major surface water(s) bodies and watersheds to which utility vault or underground structure water may be discharged. Map features must also include ASBS boundaries, MS4 discharge points to the ASBS, and major roadways. Submit separate map(s) for each Regional Water Board where a discharge is proposed. If applying for coverage in the Central Valley Region, send two additional copies of the required map and if applying for coverage under Lahontan Region, send one additional copy of the required map.
- B.** List all Regional Water Board numbers where utility vault discharges are proposed. Regional Water Board boundaries are defined in section 13200 of the California Water Code. The boundaries can also be found on our website at http://www.waterboards.ca.gov/waterboards_map.shtml.

C. The numbers with corresponding Regional Water Board names are shown below:

Regional Water Board Number	Regional Water Board Name
1	North Coast
2	San Francisco Bay
3	Central Coast
4	Los Angeles
5	Central Valley (Includes Sacramento, Fresno, and Redding Offices)
6	Lahontan (Includes South Lake Tahoe and Victorville Offices)
7	Colorado River Basin
8	Santa Ana
9	San Diego

Section V – Land Disposal/Reclamation

Check “YES” if land disposal and/or reclamation is/are feasible. If you check “YES,” contact the appropriate Regional Water Board. Your discharge may not be covered under the NPDES Program. If you checked “NO,” explain in the space provided the reason why these alternatives are not feasible.

Section VI – Verification

Indicate by checking “YES” or “NO” whether verification has been done to determine if the discharge(s) are in compliance with prohibitions or orders of the Regional Water Board.

Section VII – Type

Check the appropriate box(s) to indicate the type of utility for which you are seeking coverage.

Section VIII – Pollution Prevention Plan (PLAN) Contact Information

Each Discharger is required to provide a copy of their PLAN with their completed NOI. The PLAN requirements are provided in section VII.C.3 of the Order. The following contact information must be provided for the person responsible for the development of the PLAN.

- A. Company Name** – Enter the legal name of the company applying for coverage.
- B. Contact Person** – List the company contact person responsible for preparation and implementation of the PLAN.
- C. Street Address Where the PLAN is Located** - Indicate the street number and name where you will keep the PLAN for reference and review by personnel.
- D. Title of Contact Person** – Enter the official company title of the contact person.
- E. City** – Enter the city where the PLAN will be kept.
- F. County** – Enter the county where the PLAN will be kept.

- G. State** – Enter the state where the PLAN will be kept.
- H. Zip Code** – Enter the city zip code where the PLAN will be kept.
- I. Telephone** – Enter the daytime telephone number of the contact person.
- J. Email Address** – Enter the email address of the contact person.

Section IX- Description of Discharge

Describe the types of operations that occur and potential pollutants that may be found in the discharge.

Section X – Reminders

- A.** If you have included service territory/watershed map(s) with your NOI submittal, check the “YES” box. If not included, check “NO.” **NOTE: Map(s) of the proposed service territory to be covered must be received before you can obtain coverage under this Order.** Submit separate service territory/watershed map(s) for each Regional Water Board where a discharge is proposed. If applying for coverage in the Central Valley Region, send two additional copies of the required map and if applying for coverage under Lahontan Region, send one additional copy of the required map.

The map showing the service area within a specific Regional Water Board boundary and, showing the corresponding major surface water bodies and watersheds to which vault water may be discharged. Map features must also include service territory boundaries, Regional Water Board boundary, ASBS boundaries, MS4 discharge points to the ASBS, and major roadways.

- B.** Check “YES” if you have included the annual fee with your submittal. Check “NO” if you have not included payment. **NOTE: Payment of this fee must be received before you can obtain coverage under this Order.** Existing dischargers will be invoiced on their existing schedule and do not need to submit a fee with the initial renewal application. You will be invoiced annually and payment is required to continue coverage.
- C.** Check “YES” if you have included the PLAN. Otherwise, check “NO.” **NOTE: You must submit the PLAN to the State Water Board and appropriate Regional Water Board(s) to obtain coverage under this Order.**

Section XI – Certification

All NOIs shall be signed and certified as follows:

For a corporation: By a responsible corporate officer. For the purpose of this section, a responsible corporate officer means: (i) A president, secretary, treasurer, or vice-president of the corporation in charge of a principal business function, or any other person who performs similar policy- or decision-making functions for the corporation, or (ii) the manager of one or more manufacturing, production, or operating facilities, provided the manager is authorized to make management decisions which govern the operation of the regulated

facility including having the explicit or implicit duty of making major capital investment recommendations, and initiating and directing other comprehensive measures to assure long term environmental compliance with environmental laws and regulations; the manager can ensure that the necessary systems are established or actions taken to gather complete and accurate information for permit application requirements; and where authority to sign documents has been assigned or delegated to the manager in accordance with corporate procedures.

For a partnership or sole proprietorship: By a general partner or the proprietor, respectively.

For a municipality, State, federal, or other public agency: By either a principal executive officer or ranking elected official. For purposes of this provision, a principal executive officer of a federal agency includes: (i) the chief executive officer of the agency, or (ii) a senior executive officer having responsibility for the overall operations of a principal geographic unit of the agency (e.g., Regional Administrators of U.S. EPA).

- A. Printed Name** – Print your name legibly. The person responsible (in accordance with the signatory requirements described above and in section V.B of the Standard Provisions (Attachment B)) must fill out this section.
- B. Signature** – Provide a signature of name printed above.
- C. Date** – Indicate the date signed.
- D. Title** – Include the professional title of the person signing the NOI.

CITY LIGHT & POWER, INC.

POLLUTION PREVENTION PLAN

for Utility Vault Water Discharges

Order No. 2014-0174-DWQ



November 18, 2015

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FIGURE 1. JURISDICTIONAL MAP 1

FIGURE 2. JURISDICTIONAL MAP 2

FIGURE 3. FACILITY SERVICE AREA- NEAREST ASBS

FIGURE 4. MAP OF SERVICE AREA- INCLUDING MS4'S AND VAULTS

FIGURE 5. DISCHARGE MAP

FIGURE 6. MAP OF VAULT LOCATIONS FOR ROUTINE SAMPLING

FIGURE 7. EXISTING DATA VAULT MAP

1.0 INTRODUCTION

City Light & Power, Inc. (CLP) has developed this Pollution Prevention Plan (PLAN) to comply with the State Water Resources Control Board Water Quality Order No. 2014-0174-DWQ, General NPDES No. CAG990002, which permits water discharges from electric utility vaults and other underground structures to surface waters when performed in accordance with the established terms and conditions. This PLAN outlines the appropriate best management practices to be administered by CLP to ensure vault discharges will not cause conditions in receiving waters that fail to meet water quality objectives. This PLAN is specific to electric utility vaults under normal operation and use.

2.0 WATER DISCHARGES FROM ELECTRIC UTILITY VAULTS

Electric utility vaults include any enclosed underground structures that contain electrical equipment – transformers, switches, cable splices, conductors and other equipment. There are hundreds of underground structures in CLP's service area on Travis Air Force Base (TAFB). The sizes of the vaults and underground structures vary in size. Some are shallow 3' x 2' boxes, and some are the size of a large room. Most of the small underground enclosures have unlined bottoms, or open, gravel bottoms that typically allow water to drain into the underlying soil. However, CLP's larger vaults have concrete floors that accumulate water. Storm water is the main source of water that accumulates in underground utility vaults. Other sources include irrigation and ground water seepage. The water in a utility vault is generally pollutant free, and would pose little threat to receiving water conditions when discharged. However, on occasion, a vault may contain pollutants, such as sediment, or other contaminant originating from equipment in the vault, or from the surroundings.

CLP's vault sizes vary throughout Travis Air Force Base (TAFB). The volume of water and the duration of discharge are dependent on the utility vault's size, the amount of water accumulated within the vault, and the capacity of the pump. The largest vault on TAFB that CLP would be expected to pump out could contain as much as 18,670 gallons of water, which could be pumped down in approximately 4.5 hours with a 73 gpm capacity pump.

CLP's vaults are typically located along roads, sidewalks, or within upland grassland vegetation near roads and structures. CLP diverts much of their vault discharge to vegetated surfaces, however, occasionally that type of discharge is unavailable and discharge to a TAFB municipal separate storm sewer system (MS4) is necessary. Utility Vault discharges to MS4's on TAFB will not be directly discharged into any Areas of Special Biological Significance (ASBS), therefore a characterization study of the utility vaults discharging to the MS4's will not be required. This PLAN ensures that the water in a vault is first inspected, then managed appropriately based on water quality observations. Only water that passes the water quality inspection parameters shall be discharged from a vault to the receiving area or MS4. Note that all discharges per this PLAN will be on TAFB property. The storm drainage system on TAFB consists of underground storm drains and open ditches that support several drainage areas. TAFB has permitted, and defined Outfalls I through VI and B1 through B7. Union Creek receives the vast majority of the storm water, and ephemeral streams which may flow into Luco and Nurse Slough, and then into Suisun Slough during a significant storm event, accept much of the remaining storm water. On rare occasions, minimal amounts of stormwater reach Denverton Creek, which flows into Denverton

Slough, Nurse Slough, and into Montezuma Slough. CLP will ensure vault water discharges do not cause an exceedance in the narrative or numerical receiving water limitations that have been established for the Union Creek, Luco Slough, Nurse Slough, Denverton Creek, Denverton Slough, Montezuma Slough, and Suisun Slough. Per the permit requirements, this PLAN establishes policies and procedures to control and monitor the vault water to ensure that a discharge will not cause any of the following conditions in the receiving water:

1. Concentrations of dissolved oxygen (DO) in the receiving waters to fall below the DO objective in a Regional Water Board Basin Plan, or 5.0 milligram/Liter (mg/L), whichever is more stringent. When the receiving water DO is already below the applicable basin plan objective, the discharge shall not cause any further depression of the DO concentration.
2. Oils, greases, waxes, floating material (liquids, solids, foams, and scum), or suspended material to create a nuisance or adversely affect beneficial uses.
3. Alteration of the apparent color, taste, or odor beyond present natural background levels.
4. Biostimulatory substances to be present in concentrations that promote aquatic growths to the extent that such growths cause nuisance or adversely affect beneficial uses.
5. Turbidity in amounts that adversely affect beneficial uses in the receiving waters. In no case shall turbidity increase more than 20 percent over background waters.
6. The ambient pH to fall below 6.5 or exceed 9.0.
7. Deposition of material that causes a nuisance or adversely affects beneficial uses.
8. Significant erosion or alteration of the watercourse.
9. The ambient receiving water temperature to be altered more than 5 degrees Fahrenheit.
10. Total residual chlorine to be present at concentrations that are detectable using approved methods as specified in 40 CFR Section 136.
11. Taste or odor-producing substances that impart undesirable tastes or odors to fish flesh or other edible products of aquatic origin or cause nuisance or adversely affect beneficial uses.
12. Radionuclides to be present in concentrations that exceed maximum contaminant levels specified in title 22, California Code of Regulations, that harm human, plant, or aquatic life, or that result in the accumulation of radionuclides in the food web to an extent that presents a hazard to human, plant, animal, or aquatic life.
13. Toxic pollutants to be present in the water column, sediments, or biota in concentrations that adversely affect beneficial uses, that produce a detrimental response in human, plant, animal, or aquatic life, or that bioaccumulate in aquatic resources at levels harmful to human health.
14. Violation of any applicable water quality objective for receiving waters adopted by the State or applicable Regional Water Board or applicable water quality criterion adopted by U.S. EPA pursuant to section 303 of the CWA.

To confirm that vault water discharges do not cause pollution, or violation of any of the aforementioned conditions, a monitoring program that includes sampling of representative discharges will be performed, and the sample results will be reported annually. Water samples will be collected and tested for constituents of concern using procedures specified in 40 CFR Part 136. Depending on the results of the monitoring program, this PLAN may be amended to ensure protection of receiving water quality, as well as permit compliance.

3.0 POLLUTION PREVENTION PLAN ADMINISTRATION

3.1 POLLUTION PREVENTION TEAM

The Pollution Prevention Team is responsible for the development of this PLAN, implementing the steps outlined, evaluating its effectiveness, and revising it as may be necessary. CLP's Pollution Prevention Team consists of the corporate Environmental Specialist, the Installation Manager, and the Electric Crew Supervisor. The Environmental Specialist will provide training for the staff, coordinate monitoring activities, and work with the laboratories to obtain the appropriate water sample analyses. The Electric Crew Supervisor shall identify vaults that are prone to water accumulation, ensure employees are properly trained and equipped to comply with pollution prevention practices, and shall enforce the provisions of the PLAN. The Installation Manager will ensure that staffing and any other resources are provided to field crews to meet the PLAN objectives.

CLP's regulatory agency liaison is listed below, and can be contacted regarding any PLAN or permit matters:

Barbara Ely, CLP Installation Manager at TAFB (707)639-4067 or bge@clpinc.com

Lucas Drayer, CLP Environmental Specialist/Coordinator (410)306-6238 or lsd@clpinc.com

Copies of this PLAN are available at the CLP Office at TAFB, the corporate storage drive, with the CLP Environmental Specialist, and upon request.

3.2 EMPLOYEE TRAINING

CLP shall implement a training program to ensure that employees who encounter water in vaults or underground structures are familiar with the aspects of this PLAN. These employees shall be knowledgeable of procedures to identify and evaluate potential pollutants that may be present in the water found in an electric utility vault. These employees shall be appropriately trained regarding how and when to use the BMPs identified in this PLAN, which minimize the potential for the release of pollutants to the storm drain system or subsequent receiving water. The training shall address topics such as good housekeeping, preventative maintenance, spill response, material management, and pollution control methods. Employees who dewater underground structures and utility vaults shall be trained to evaluate the quality of the water prior to a planned discharge from the structure, methods to remove pollutants from a water discharge, and procedures to collect water samples from the discharge. The training will be provided by the Environmental Specialist or other qualified individual. Training will be provided prior to performing a planned discharge during the term of the permit. Refresher training shall be provided to employees at intervals as needed to ensure there is an adequate understanding of the goals, objectives, and requirements of the Permit Order, and to ensure the procedures outlined in this PLAN are followed.

4.0 SOURCES OF POTENTIAL POLLUTANTS (POLLUTION ASSESSMENT)

Electrical Equipment: Some electrical equipment may contain oil. In electrical equipment such as transformers and switches, this is not lubricating oil, but rather a dielectric fluid. A common dielectric fluid is mineral oil, which is a petroleum product. Depending on conditions, oil-filled equipment may develop a leak that could pollute water within a vault structure. Water with any sign of oil or other petroleum product shall not be discharged unless steps are taken to prevent the discharge of the pollutants.

Surface Spills: A vault could contain contaminants resulting from a fuel or chemical release, or illegal dumping activity in the vicinity. Such as a spill from one of TAFB's aboveground storage tanks (ASTs).

Urban Storm Water Run-Off: Potential urban run-off pollutants are numerous and include many chemical compounds and toxic constituents. However, the most likely pollutants are oil and grease from roadways, parking lots, aircraft maintenance areas, runways and tarmacs areas, and military refueling operations. Low concentrations of fertilizers, pesticides, heavy metals, and other toxics may be present in urban storm water run-off. Fertilizers in run-off may promote aquatic growth (i.e., excessive algae) in receiving waters, which can disrupt the normal aquatic environment and cause other nuisance issues. Urban run-off could also contain materials from the various TAFB recycling, hazardous materials, and waste storage areas.

Mud, Silt, & Sediment: Silt and suspended solids cause turbidity in water, which causes problems for aquatic species. Therefore it's important to control sediment in water discharges that might originate in a vault. Additionally, water shall not be discharged in a manner that might cause soil erosion that could result in mud, silt, or sediment entering the storm drain system or waterway.

Industrial Pollutants: Industrial activities that are exposed to weather can cause polluted run-off. To control pollutants at their sites, TAFB has developed and implemented their own Storm Water Pollution Prevention Plan (SWP3). TAFB is in compliance with their California General Industrial Activities Storm Water Permit (CAS000001), reducing potential pollutants that might have migrated through stormwater run-off. Any pollutants that aren't captured by TAFB's SWP3 protocols may find a way into the run-off and possibly into underground vaults or structures.

5.0 DRAINAGE MAP

Attached are maps (Figures 1, 2 & 4) showing CLP's service area on TAFB, within the boundary of the San Francisco Bay Regional Water Board's jurisdiction (Region 2). As depicted on the U.S. Environmental Protection Agency's (U.S. EPA's) "MyWATERS" Mapper, surface water from TAFB discharges to the south, flowing into several swamps, marshy areas, and troughs before discharging into Hill Slough and Luco Slough. The U.S. EPA has grouped these waterways into the Suisun Marsh Wetlands Impairment (Figure 5). The State of California has evaluated several of these waterways and found them impaired from mercury, nutrients, low dissolved oxygen and total dissolved solids/chlorides. Further studies may be conducted by the State to determine if total maximum daily loads (TMDL) will be implemented. Currently, no TMDLs are associated with the Base or these watersheds.

The Areas of Special Biological Significance (ASBS) as defined in the California Ocean Plan are not applicable to discharges to enclosed bays and estuaries, inland waters, or the control of dredged material and therefore are not applicable to CLP operations on TAFB or included on the drainage map. However, a separate map indicating the nearest ASBS has been included for reference (Figure 3).

6.0 PROCEDURES FOR DISCHARGES FROM UTILITY VAULTS AND UNDERGROUND STRUCTURES

Any discharge from a utility vault or underground structure that would cause or contribute to an exceedance of an applicable water quality objective in the receiving water is not allowed. Where CLP personnel determine that a discharge from a utility vault or underground structure may have a reasonable potential to cause or contribute to an exceedance of water quality objectives for the receiving water, and where BMPs and procedures implemented in accordance with this PLAN will be insufficient to adequately control pollutants in the discharge, CLP shall arrange for offsite disposal of the vault contents by contracted environmental service personnel and licensed hazardous waste/wastewater treatment facilities.

To determine the quality of the water prior to a planned (non-emergency or non-critical) discharge from a utility vault or underground structure, CLP has developed a checklist of procedures outlined in Attachment A. The procedures include a visual and other sensory type evaluations of the water and vault contents to determine whether pollutants may be present. The completed checklist provides a record of each vault discharge event, which shall be forwarded to the CLP Office and Environmental Specialist for record-keeping and reporting purposes. The vault water management decision process flow chart is provided in Attachment B. The checklist and flow chart are tools that guide CLP's employees to determine the quality of water in a vault, and to help one determine whether the vault water may be discharged according to permitted guidelines, or whether other pollution control measures must be used based on sited conditions.

7.0 POLLUTION CONTROL MEASURES

Control Measures for Petroleum Products in Vault Water

- 1) In cases where a visible, thick, layer of oil, grease, or other petroleum product is found in a vault, the petroleum pollutants shall be removed for offsite disposal. For small volumes overall, it may be appropriate to pump the contaminated vault water into drums or other containers for transport to a treatment facility. For larger volumes, it might require a vacuum truck to pump and transport the load to an offsite treatment facility. Wash water resulting from cleaning a contaminated vault shall also be removed for offsite disposal in a similar manner.
- 2) For a light, yet visible sheen of oil, grease, or other petroleum product on the water surface, the pollutants may be controlled by pumping the water through a hydrocarbon absorbing filter sock that is attached to the end of the discharging hose. In certain cases (i.e. light oil film, or thin layer) it may be possible to first apply oil absorbing pads to the water surface to remove, or

reduce the hydrocarbon layer to a light sheen, and then pump the vault through an oil absorbing filter. Most VMS (Vault Management System) Filter Socks can handle up to 150 gpm (gallons per minute) pump rates, however, a max pump pressure of 10 psi (pounds per square inch) using a centrifugal pump is recommended.

Control Measures for Surface (chemical) Spills or Illegal Dumping

In situations that suggest the vault has been impacted by a chemical spill or related hazmat incident, the pollutants shall be removed for offsite disposal. This can be accomplished by pumping into drums or other suitable containers for small volumes, or it might require a vacuum truck for larger volumes. Wash water resulting from vault cleaning shall also be removed for offsite disposal. These circumstances will require the services of one of CLP's qualified hazmat cleanup contractors.

Control Measures for Debris, Trash and Litter

Where litter or trash has accumulated in the gutter or other discharge flow path, the trash encountered must be swept up, removed from the flow path, and properly contained prior to discharging water. If trash or other debris, or any floating material is found inside a vault, the trash or material shall be removed for proper disposal.

Control Measures for Urban Run-Off and Industrial Pollutants

In circumstances where pollutants in vault water are suspected from nearby industrial facilities or activities, the pollutants shall be removed for offsite disposal in a manner similar to that identified for chemical spills, etc. Signs of pollutants might include that of a strange odor, or unusual color, or other unusual characteristic or appearance, or other field test that might suggest the presence of pollutants (i.e. high or low pH).

Control Measures for Mud, Silt, Sediment

To a limited extent, water with suspended solids (silt & sediment- TSS) can be pumped through a filter sock and discharged. Sediment will be trapped in the filter and clean water will flow through. Situations may arise where mud or larger volumes of sediment are encountered, or where sediment impacts the filter and the water can no longer be pumped through a filter sock. In these situations the options include changing out filters where needed, or calling for a suitable vacuum truck to pump the vault contents and transport to an authorized disposal location.

8.0 EMERGENCY DEWATERING AND AUTOMATED DISCHARGE

In some cases it is necessary to protect electrical equipment within a vault from contact with water to the extent possible. This is to prevent injury, damage to the equipment, and to maintain a reliable supply of electric power to vital systems. In these cases, timely water discharges are critical – and necessary to ensure public safety, and to maintain essential Base services, or to minimize the frequency and duration of power outages.

In emergency situations – where human health is endangered, or where public safety is at risk, or when there’s an urgent need to reestablish essential Base services (e.g. military mission support), there may be a need to dewater a utility vault as soon as possible – prior to completing a thorough evaluation of water quality. Upon mitigation of the emergency situation, CLP shall evaluate the water quality as outlined in this PLAN, and implement the prescribed best management practices to minimize any release of pollutants. In the event this occurs, the Installation Manager and Environmental Specialist shall be notified, so that the discharge incident will be documented, and any necessary information will be reported to the Regional Board in a timely manner.

CLP does not operate any automated discharge systems on TAFB, therefore this item can be struck from further discussion.

9.0 BEST MANAGEMENT PRACTICES (BMPs)

Several Best Management Practices (BMPs) have been identified to control the discharge of pollutants from utility vaults. CLP may utilize the following BMPs as appropriate:

9.1 GOOD HOUSEKEEPING

To control the discharge of pollutants it is important to keep work sites tidy and to contain all sources of pollutants. CLP shall employ good housekeeping by:

- 1) Maintaining areas surrounding utility vaults so that they are kept clean and orderly prior to dewatering.
- 2) Adhering to CLP’s Inspection Program which includes the thorough and frequent inspections of all electrical equipment on TAFB. This program includes inspection of equipment within vaults and underground structures for potential leaks and structural integrity. Records of these inspections are maintained within the CLP Office on TAFB.
- 3) Storing chemicals and related products in such a manner that if the container is ruptured, the contents will be controlled to avoid accidental release. No spilled products are to be washed into the storm drain system, or left to cause pollution.
- 4) Maintaining the cleanliness and orderliness of all areas that may be impacted by a vault discharge. This is usually accomplished by TAFB Department of Public Works (DPW) maintenance programs efforts to maintain cleanliness and aesthetic quality. Prior to dewatering a utility vault or underground structure, and when feasible and safe to do so, the discharge flow path (e.g., gutter, street, roadway, storm drain inlet) shall be inspected and cleared of any trash, debris, and sediment to the extent feasible.

9.2 OIL ABSORBENT PADS

Oil absorbent pads (e.g., polypropylene based, “oil-only” pads) can be used to absorb oil or other petroleum product from the surface of water. These are quite effective at removing a hydrocarbon puddle or layer, as they absorb petroleum products, but they don’t absorb water. There are practical limitations to removing all traces of oil, as typically an oily sheen is left on the surface of the water after use.

9.3 FILTER SOCK

The filter sock for vault maintenance is a fabric filter that is about 6” in diameter and about four feet in length. It is attached to the end of an appropriately sized discharge hose to filter the water while pumping is performed. The filter sock is composed of a special “sandwich” of filter media that can trap fine sediment particles and also absorb hydrocarbons. The filter sock can remove greater than 99% of total suspended solids (TSS) from water, and also remove oil, grease, and other hydrocarbons to non-detectable amounts. This filter sock is useful for sites where fine particles are suspended in the vault water, or where an oily sheen is observed on the water. One limitation with using the filter sock is that it can become saturated with hydrocarbons, and lose its hydrocarbon removal effectiveness. Another limitation is that it can become impacted with oil or sediment. While using the filter sock, the water effluent must be monitored, and if a sheen of oil is or other pollutant is observed in the effluent, the pumping must be halted and the filter changed out. Another limitation is that the filter can quickly become impacted with sediment. Evidence of an impacted filter is a slow discharge rate and a buildup of back pressure on the pump motor. Therefore the filter sock is not recommended where there is a significant amount of oil or sediment.



9.4 FIBER ROLLS

Fiber rolls, sometimes called “straw wattles,” can be used to control soil erosion on earthen slopes. Fiber rolls may be needed when vault water is discharged to unpaved areas. These are used to create evenly spaced check-dams on slopes to slow the water flow. Straw wattles must be anchored securely to achieve satisfactory erosion control.

9.5 GRAVEL BAGS

Gravel-filled bags are used to slow the flow of water and to hold back sediment. Gravel bags (and sand bags) can be used to slow or stop water flow, and can be used effectively on paved surfaces. Gravel-

filled bags may also be placed around storm drain inlets as a last line of defense when there is a threat of sediment or other pollutant intrusion.

10.0 MONITORING AND REPORTING PROGRAM (MRP)

In addition to a systematic program of visually inspecting discharges to verify the effectiveness of the enlisted BMPs, and to ensure that no pollutants are released to surface waters, monitoring that consists of water sampling and lab testing, will be conducted. Sampling and testing will be according to U.S. EPA test procedures approved under 40 CFR Part 136, or other test procedures specified by the Permit Order, the State Water Board, or Regional Water Board.

Certain CLP staff shall be trained to collect representative water samples from the point of discharge during vault water pumping. CLP also uses trained & certified vendors, such as Black Gold Industries, to perform sample collections. As specified in the Permit Order, CLP shall identify and monitor at least five representative utility vaults or underground structures in the TAFB service area each year. The five vault locations selected for representative water discharge sampling during the first year of the Permit term are provided in Table 1.

Vault ID	Location	Vault Equipment (System ID #)	Vault Type	Vault Dimension
16G	First & Waldron		Manhole	8 x 12
15T-2	Hickam & FamCamp		Manhole	8 x 10
N39	Ragsdale N/977		Manhole	6 x 8
13H	Bldg. 1351		Vault	6 x 8
4JJ	Bldg. 437		Manhole	8 x 10

The vaults above were chosen to be representative of various potential pollutants that may infiltrate the vault and be discharged during dewatering activities. The locations of these vaults (Figure 6) were chosen to signify a diverse area representing typical discharges, from routinely inundated vaults, in CLP's service area. The aforementioned vaults are prone to contain varying pollutants from the pollutant source log previously outlined. They also provide a comprehensive case study of discharges seen across CLP's service area on TAFB due to the geographic array.

Sampling in subsequent years may be performed at these vaults, or if these locations cannot be sampled during the year (i.e. a vault is dry), alternative sampling locations may be used. Should there be a change to a pre-determined sample location the Regional Water Board shall be notified by means of CLP's annual report covering monitoring activities. If there are less than five occasions to sample a vault discharge during a given year, then only the number of vaults with actual discharges must be sampled that year.

Samples will be taken to represent the volume and nature of the water discharge, and will be collected directly from the discharge, at a point following any treatment device or filter if used, or at a point before the water discharge comingles with another water source. The sample will be collected at a

location where no other waste stream, body of water, or other substance might contaminate or dilute the water sample.

Should CLP monitor vault discharges for pollutants more often, or for additional chemical analysis than are required by the permit, or as outlined in this PLAN, the results of the additional monitoring and/or analyses shall be included in the annual report.

As sampling is performed, a chain of custody document for the sample(s) will be completed. The chain of custody document will provide a record of the sampling, with the date, sample identification (vault ID), the address, sample collection point description, time of sampling, as well as the individual(s) who performed the sampling. In addition, the chain of custody form is used to instruct the laboratory of the requested analytical testing to be performed. All lab testing shall be performed by a laboratory certified to perform such analyses by the SWRCB. CLP uses TestAmerica's DoD ELAP certified labs.

Monitoring instruments and sampling devices used to fulfill the monitoring program shall be properly maintained and calibrated to ensure accuracy. If applicable, all flow measurement devices shall be calibrated at least once per year to ensure accuracy of the devices. Discharge volume may be estimated based on the pump manufacturer's flow rate specifications multiplied by the duration of pumping (i.e. discharge volume = pump flow rate (gallons per minute) x minutes per pump).

Discharge Characterization Study 1

Per Order WQ 2014-0174-DWQ NPDES NO. CAG990002 CLP proposes the aforementioned Monitoring Plan and completion of the Discharge Characterization Study 1 as outlined below:

Discharge Characterization Study 1	
Task	Compliance Date
I. Submit Monitoring Plan and Time Schedule for Discharge Characterization Study	Upon approval of this PLAN. MRP and Discharge Characterization Study Schedule contained within this PLAN
II. Begin Phase I of Discharge Characterization Study 1	By no later than the first rainy season following the final approval of the Monitoring Plan (within this PLAN), conduct Phase I monitoring
III. Continue Phase II Monitoring of Discharge Characterization Study 1	By no later than the third rainy season following the final approval of the Monitoring Plan, conduct Phase II of Discharge Characterization Study 1
IV. Complete Discharge Characterization Study 1	After completing Phases I and II of Discharge Characterization Study 1 or if collecting all samples (five samples per WDID in Phase I and five samples per WDID in Phase II) proves infeasible (i.e., no water present in utility vaults or underground structures due to lack of precipitation and/or groundwater infiltration), no later than four years following the effective date of this Order
V. Submit Final Report for Discharge Characterization Study 1	No later than four years and six months following the effective date of this Order

Discharge Characterization Study 2

CLP does will not discharge to MS4s draining into any ASBSs. Therefore, Discharge Characterization Study 2 does not apply, and a study/report will not be performed.

10.1 ANNUAL ROUTINE EFFLUENT MONITORING REQUIREMENTS

For each vault water sample collected during the year, the following constituent concentrations and characteristics will be determined by the laboratory:

Parameter	Sample Type	Units	Test Methods (per 40 CFR Part 136)
TPH – gasoline	Grab	µg/L	624/8260 (M8015)
TPH – diesel fuel	Grab	µg/L	625/8270 (M8015D)
Oil & Grease	Grab	mg/L	1664
pH	Grab	pH units	SM-4500-H-B
Total Suspended Solids (TSS)	Grab	mg/L	340.2

Laboratory results shall include quality assurance and quality control (QA/QC) data specific to the sample testing performed.

10.2 ANNUAL REPORTING

Each year a Site Monitoring Report (SMR) or “annual” report shall be prepared. The annual report shall summarize CLP’s activities pertaining to compliance with the Permit conditions. The annual report shall be signed and certified as required by the Permit Standard Provisions. See the following section for signatory and certification requirements.

The annual report shall include a cover letter. The cover letter shall clearly identify violations of the Permit Order and any exceedances of the numeric action levels (NALs). The cover letter will also include information pertaining to any violation to a permit requirement, and discuss corrective actions taken or to be taken, and provide a schedule for implementation.

The annual report will include the results of the chemical analyses performed on the water samples collected from vault discharges during the year and other required information as outlined as follows:

1. An executive summary that includes a discussion of compliance with and/or violation(s) of the Permit Order and an evaluation of the PLAN’s implementation and effectiveness.
2. A summary of monitoring data generated.

3. A summary of relevant field observations. This shall include the dates, places, and times of site inspections, field sampling performed, visual observations, and/or measurements, indicating the individuals who performed the field observations.
4. A map showing the location of each monitored discharge location, with the location of ASBS potentially influenced by the discharges, if any.
5. A list of all monitored discharge locations (i.e. street address), the date when each monitored discharge occurred, the size and/or volume of vault, and the estimated flow rate, duration, and volume of utility vault water discharged.
6. A description of the sample collection methods, sample analysis (i.e. test methods), and quality control procedures, and the name and contact information for the laboratory, utility staff, or others who performed the analyses.
7. An estimate of annual volume discharged, or the estimated volume of each discharge from a utility vault or underground structure (gallons) with a description of the method(s) and assumption(s) used to derive the estimate.
8. Tabulated sampling results indicating the discharge location, collection date, name of constituent/parameter, results of the sample analyses, concentrations detected, minimum detection levels, method detection limits for each constituent, and a comparison with NALs as identified in the table below, and as described in the Permit limitations and discharge requirements. Data provided in the annual report shall be arranged in a tabular format so that the information is readily discernible. The data shall be summarized to clearly illustrate whether BMPs are protective of water quality, as demonstrated by compliance with the NALs:

Table 3. Numeric Action Levels (NALs) for Pollutants of Concern			
Parameter	Units	Numeric Action Levels	
		Minimum Daily	Maximum Daily
Oil and Grease	mg/L	---	25
pH	Std. Units	6.0	9.0
Total Petroleum Hydrocarbons-Diesel Range Organics	mg/L	---	2
Total Petroleum Hydrocarbons-Gasoline Range Organics	µg/L	---	5
Total Suspended Solids (TSS)	mg/L	---	400

Note: Other NALs may be added based on the results of the Discharge Characterization Studies.

Sample results greater than or equal to the reporting limit (RL) shall be reported as measured by the laboratory. Sample results less than the laboratory’s method detection limit (MDL) shall be reported as “<” (less than) followed by the MDL. Sample results found less than the RL, but greater than or equal to the laboratory’s MDL, shall be reported as “Detected but Not Quantified” or “DNQ”, or “J-flag” and the estimated concentration of the sample shall be reported. For the purposes of data collection, the laboratory shall write the estimated chemical concentration next to the abbreviation, “DNQ” or prefaced by the letter “J”. The laboratory may include numerical estimates of the data quality for the reported result, expressed as a percent accuracy (plus or minus a percentage of the reported value), numerical range (low to high), or any other appropriate means. CLP shall require the laboratory to

establish RLS according to the lowest concentration calibration standard. The laboratory shall not present analytical data derived from extrapolation beyond the limits of an applicable calibration curve.

The annual report will be submitted to the Executive Officer of the San Francisco Regional Water Quality Control Board by June 1st of each year following the annual reporting period, which extends from May 1, to April 30 of each year. The requirement to electronically submit annual reports and related data to the California Integrated Water Quality System (CIWQS) is expected during the permit term. The State Water Board will inform all dischargers when electronic submittal to CIWQS is required. Should CIWQS not allow for tabular data entry within the system, the report shall be submitted electronically in tabular format as an attachment.

CLP will notify the Regional Board staff within reasonable time of becoming aware of any vault discharge activity or incident that poses a risk to public health or the environment. Information regarding the incident will be provided initially by telephone to (510)622-2300 or by email. A written submission that contains a description of the discharge, the apparent cause, and the dates and time periods of any non-compliant condition, and steps taken to prevent recurrence of the non-compliant discharge will be provided.

10.3 SIGNATORY AND CERTIFICATION

As specified in the permit conditions for a corporation, the annual report must be signed by a responsible corporate officer. For CLP, this responsible corporate officer is the Installation Manager, who oversees all utility operations at the TAFB facility specified under this Permit. Additional signatory and certification authorized personnel within CLP are one of the corporate Vice Presidents and/or Presidents of the company. Should it be necessary to authorize a different individual or position as signatory, the new authorization must be submitted to the Regional Water Board prior to, or together with, any reports, information, or applications that are signed by the so authorized representative.

Any person signing and submitting a report or other document under the Permit Standard Provisions shall make the following certification: "I certify under penalty of law that this document and all attachments were prepared under my direction or supervision in accordance with a system designed to assure that qualified personnel properly gather and evaluate the information submitted. Based on my inquiry of the person or persons who manage the system or those persons directly responsible for gathering the information, the information submitted is, to the best of my knowledge and belief, true, accurate, and complete. I am aware that there are significant penalties for submitting false information, including the possibility of fine and imprisonment for knowing violations."

CLP shall retain records of all annual routine monitoring (i.e. annual sampling) information including all calibration and maintenance records, copies of all reports required by the Permit Order, and records of all data used to complete the application for the Permit Order for a period of at least five years from the date of the sampling, measurement, report, or application. This retention period may be extended by request of the State or Regional Water Board.

11.0 ANNUAL PROGRAM EVALUATION AND PLAN REVISION

CLP shall evaluate the effectiveness of this MRP to control the discharge of pollutants during a vault discharge event at least annually. The PLAN shall be updated, revised or replaced as necessary to address procedures and BMPs found to not be effective in minimizing the discharge of pollutants. The PLAN evaluation shall include the following:

- Determination of whether measures to reduce pollutant loadings are accurate.
- Determination of whether source control measures, sediment and erosion control measures, and other structural BMPs are properly implemented in accordance with the terms of the Permit Order.
- Determination of whether additional control measures are needed.
- Determination of whether BMPs identified in this PLAN are being utilized as described, and operating and functioning satisfactorily.
- Determination of whether equipment needed to implement this PLAN is operating and functioning correctly.

If the results of the monitoring and reporting program indicate an exceedance of one or more of the NALs, then CLP shall evaluate the potential cause(s) of the NAL exceedance(s). This evaluation shall include an assessment of the potential source(s) of the pollutant and whether the procedures and BMPs contained within the PLAN need to be revised to address the identified source(s) in future discharges.

CLP will provide the results of the annual PLAN evaluation and any revisions to the PLAN as part of the Annual Report required by the MRP. CLP will retain records summarizing the scope of the annual PLAN evaluation, personnel making the evaluation, the date(s) of the evaluation(s), significant observations relating to the implementation of the PLAN, and actions taken to revise the PLAN, for a period of no less than five years.

12.0 EXISTING DATA

CLP does have existing utility vault lab analysis data available for interpretation, from the previous 2006-0008-DWQ NPDES Permit CAG990002 (Utility Vaults General Permit) coverage requirements. This data can be found in Attachments D & E, as well as Figure 7 . Review of lab analysis reveals that potential pre-treatment concerns for Total Suspended Solids (TSS) and Diesel Range Organics (DRO) in all three utility vaults (labeled- 16U, 15-GG, & 16P). It also appears Oil & Grease (HEM) has potential to be an issue with vaults 15-GG and 16P. No pH concerns are exhibited among any previously sampled vaults. This conveys potential discharge concerns particularly for the aforementioned utility vaults, as well as other vaults in the vicinity. It is expected through the use of the BMPs that these concerns will become negligible and not produce exceedances of water quality objectives during CLP's characterization study and monitoring plan.

13.0 VAULTS & VECTOR PROBLEMS

At this time, CLP is not aware of any vector-borne disease issues within their service area, nor is there suspicion that CLP utility vaults could contribute to a vector problem in the area. However, if suspected, CLP will immediately contact vector control agencies at TAFB and all appropriate local, state, and federal authorities. Furthermore, CLP will coordinate with all appropriate agencies to remedy the situation as directed, and agreed upon.

SOURCES

Anaheim Public Utilities. "Pollution Prevention Plan- for Utility Vault Water Discharges Order No. 2014-0174-DWQ." California State Water Resources Control Board. Sacramento, California, 2015.

DISCHARGE OF WATER FROM UTILITY VAULTS

Please complete form prior to pumping any vault or underground structure

Date: _____

Time: _____

CLP Employee: _____

Signature: _____

Vault ID #: _____

Location: _____

Vault Dimensions: _____

Depth of Water (ft): _____

Estimated Volume of Vault Water to Discharge (using chart below): _____

Gallons of Liquid in Manholes										
Structure Size (LxW)	Depth of Water in Structure (ft.)									
	1	2	3	4	5	6	7	8	9	10
3x3	67.32	134.64	201.96	269.28	336.60	403.92	471.24	538.56	605.88	673.20
4x6	179.52	359.04	538.56	718.08	897.60	1,077.12	1,256.64	1,436.16	1,615.68	1,795.20
6x6	269.28	538.56	807.84	1,077.12	1,346.40	1,615.68	1,884.96	2,154.24	2,423.52	2,692.80
6x8	359.04	718.08	1,077.12	1,436.16	1,795.20	2,154.24	2,513.28	2,872.32	3,231.36	3,590.40
6x10	448.80	897.60	1,346.40	1,795.20	2,244.00	2,692.80	3,141.60	3,590.40	4,039.20	4,488.00
8x10	598.40	1,196.80	1,795.20	2,393.60	2,992.00	3,590.40	4,188.80	4,787.20	5,385.60	5,984.00
6x29	1,301.52	2,603.04	3,904.56	5,206.08	6,507.60	7,809.12	9,110.64	10,412.16	11,713.68	13,015.20
8x52	3,111.68	6,223.36	9,335.04	12,446.72	15,558.40	18,670.08	21,781.76	24,893.44	28,005.12	31,116.80
8x53	3,171.52	6,343.04	9,514.56	12,686.08	15,857.60	19,029.12	22,200.64	25,372.16	28,543.68	31,715.20
8x54	3,231.36	6,462.72	9,694.08	12,925.44	16,156.80	19,388.16	22,619.52	25,850.88	29,082.24	32,313.60

To calculate weight in pounds, multiply gallons by 8.3453

Water Characteristics and Checklist (please check-off)

_____ Unusual odor or appearance? Describe: _____

_____ Collect a sample of water using bailer/container. Describe water clarity or pollutants present (e.g. oil), and select appropriate course of action below: _____

_____ Water sample has odor of sewage, or fuel, or solvents, or other chemical. Notify CLP Office. **Do not pump contaminated water to storm drain.** Arrange for offsite treatment and disposal.

_____ Water shows an oil layer. Notify CLP Office, check PCB database for nearby units. **If PCBs are present in the oil, arrange for pumping by environmental contractor.** If no PCBs, use oil absorbent pads to remove oil layer. If oil is a light sheen, attach oil absorbing "filter sock" to discharge hose. Inspect and remove trash **or debris from water flow path leading to drain inlet or surface water prior to pumping.**

_____ Water shows suspended sediment (cloudiness). Allow water sample to sit to determine if cloudiness settles -- like dirt, sand, clay, or silt. If sediment appears to settle out, attach "filter sock" to discharge hose. Inspect and remove trash or debris from water flow path prior to pumping. If cloudiness persists, arrange for offsite treatment and disposal.

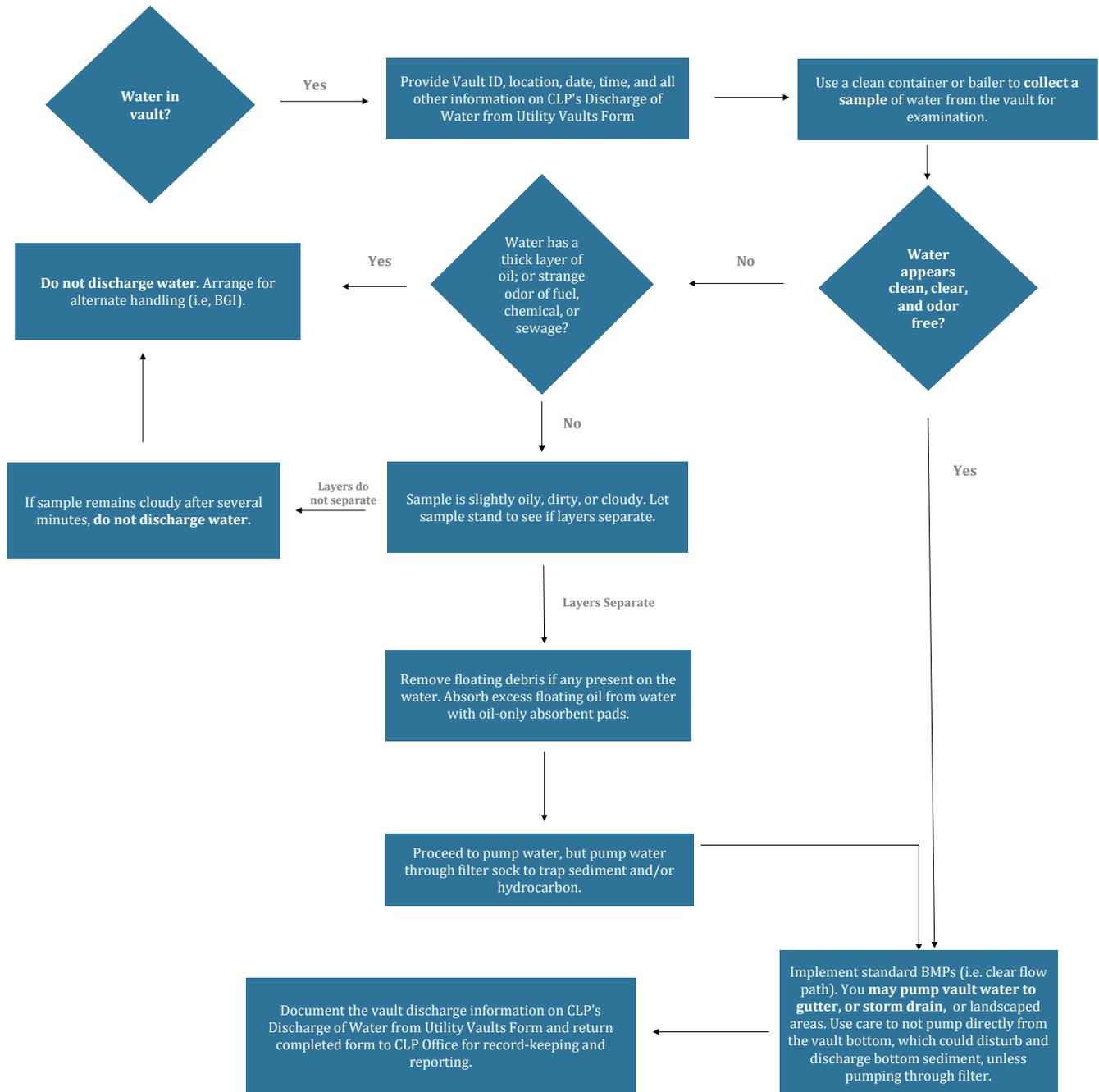
_____ Water sample is clear. Water is safe to pump to storm drain. Inspect and remove trash or debris from water flow path. Do not pump vault bottom sediment. If necessary, pump water through the appropriate filter sock to trap sediment.

*Any vaults or equipment affected with oil, grease, or other pollutants should be cleaned of residual material. Any soiled cleaning materials and wash water must be collected and returned to the yard for proper waste management.

Supervisor Name: _____ Phone #: _____

Supervisor Signature: _____ Date: _____

Utility Vault Water Discharge Decision Flowchart



PROCEDURES FOR ROUTINE VAULT WATER INSPECTION AND SAMPLING

Supplies required for inspection and sampling include:

- Sample bailer with cord
- Clear container
- Amber-colored glass bottles (supplied by lab)
- Cooler (supplied by lab)
- Ice packs
- Labels (supplied by lab)
- Sharpie pen
- Chain of custody form (supplied by lab)
- Checklist (Attachment A)
- Gloves
- Traffic control devices
- Tools to open vault

1. After opening the vault and discovering water, begin to complete checklist- Discharge of Water from Utility Vaults (Attachment A). Lower clean bailer or suitable container into water surface, and withdraw a water sample by an attached cord
2. Pour contents of bailer into clear container. Examine for presence of oil, etc. and evaluate water conditions. Indicate observations on checklist (Attachment A).
3. Confirm that vault water is suitable to pump to surface water, and that any necessary BMPs (i.e. clear water flow path of litter, attach filter sock) are in use. For laboratory testing, it is necessary to collect the water sample at a point after it has been discharged from the vault (i.e. from the end of the discharge hose after filtration or other BMPs).
4. Fill two (2), 1-liter amber glass bottles with water having been pumped from the vault but prior to vault water mingling with other material or flow. It is appropriate to fill sample bottles with water after BMPs have been used to remove any pollutant. This best represents the quality of water that might eventually reach surface water.
5. Label the sample bottles with the date, vault number, time of sampling, and name of the person collecting the sample. Use sharpie pen or similar marker.
6. Place water samples in cooler with ice packs.
7. Complete the chain of custody form. Note the vault ID, the date, time, vault location, and the type of equipment in the vault or other underground structure on the chain of custody.
8. Sign the chain of custody form as sampler where indicated.
9. Bring samples (in cooler) and chain of custody form to the CLP Office on TAFB. Alert management that samples have been left for return shipment to the lab.
10. CLP Management shall arrange for sample analysis and delivery of the water samples to the lab. Analyses will include the pollutants of concern identified in Table 3. CLP Management will ensure that samples are delivered to the laboratory in a timely manner so as not to exceed any specific holding times. CLP may add preservatives to the samples as directed by the laboratory personnel.



FURTHER INSTRUCTIONS....

- If vault water is clear and clean in appearance and does not contain evidence of oil or other pollutants, the water may be discharged. If the water evaluation indicates that contaminants or pollutants may be present in the vault water, **the water shall not be discharged to the storm drain system or surface water.** If pollutants can be removed from the vault water by filtering or by implementing other appropriate BMPs, the water may be pumped to the storm drain system. The vault water must be clear and clean in appearance and without evidence of oil or other pollutant when discharging to the storm drain or surface water.
- If pollutants found in vault appear to be non-hazardous (residual oil, grease, sediment, or sewage), CLP crews may contact CLP Management to request a vacuum truck from an Environmental Service subcontractor to pump the liquid out. Only non-hazardous waste shall be pumped in this manner. Smaller volumes of contaminated water may be pumped into drums and transported via flatbed truck to a CLP operations yard for temporary storage until an environmental service subcontractor can properly transport and dispose of the waste. The CLP Environmental Specialist and CLP Management must be notified of incidents such as oil spills, chemical spills or sewage spills, and at any time waste items or waste water is returned to the CLP operations yard. Any spills will be handled in accordance with CLP's Spill Contingency Plan (SCP).
- If oil-filled electrical equipment appears to be the source of oil contamination, CLP's SCP detailing response measures for oil spills shall be implemented. For oil-filled electrical equipment, it is necessary to determine whether the oil may contain PCBs. Records of PCB test data can be accessed through the CLP Office, or TAFB Environmental. If PCBs are suspected, an environmental subcontractor will likely be called to remove contaminated materials for appropriate disposal and to decontaminate the vault. For non-PCB incidents, CLP staff may remove oil and oil-affected material for transport to the yard.
- The vault and equipment affected with oil, grease, or other pollutants should be cleaned of residual material. Any soiled cleaning materials and wash water must be collected and returned to the yard for proper waste management.
- The completed checklist (Attachment A) documenting the discharge shall be provided to CLP's Office and CLP Management.



TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Sacramento
880 Riverside Parkway
West Sacramento, CA 95605
Tel: (916)373-5600

TestAmerica Job ID: 320-11664-1
Client Project/Site: Travis AFB

For:
Black Gold Industries
527 N. Rice Avenue
Oxnard, California 93030

Attn: Mr. Ken Kendzior



Authorized for release by:
3/10/2015 4:03:00 PM

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This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

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Definitions/Glossary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
α	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Case Narrative

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Job ID: 320-11664-1

Laboratory: TestAmerica Sacramento

Narrative

Receipt

The samples were received on 2/13/2015 2:20 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 11.6° C.

GC Semi VOA

No analytical or quality issues were noted, other than those described in the Definitions/Glossary page.

General Chemistry

Method(s) SM 2540D: The duplicate sample didn't calculate because the parent sample is non-detect.
(320-11692-5 DU)

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

Organic Prep

Method(s) 3510C: Insufficient sample volume was available to perform a matrix spike/matrix spike duplicate (MS/MSD) associated with batch 65911 for method 8015-aqueous.

Method(s) 3510C: The following samples formed emulsions/contained particulate matter during the extraction procedure for method 8015: 15-66 (320-11664-3), 16-P (320-11664-2). The emulsions and matter were filtered out at concentration using glass wool and sodium sulfate. This should not affect analyte recoveries.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.



Detection Summary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Client Sample ID: 16-U

Lab Sample ID: 320-11664-1

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Diesel Range Organics (C10-C24)	180		47	15	ug/L	1		8015B	Total/NA
pH adj. to 25 deg C	7.45		0.100	0.100	SU	1		9040B	Total/NA
Total Suspended Solids	91		5.0	5.0	mg/L	1		SM 2540D	Total/NA

Client Sample ID: 16-P

Lab Sample ID: 320-11664-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Diesel Range Organics (C10-C24)	500		47	15	ug/L	1		8015B	Total/NA
pH adj. to 25 deg C	7.53		0.100	0.100	SU	1		9040B	Total/NA
Total Suspended Solids	390		5.0	5.0	mg/L	1		SM 2540D	Total/NA

Client Sample ID: 15-66

Lab Sample ID: 320-11664-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
Diesel Range Organics (C10-C24)	210		47	15	ug/L	1		8015B	Total/NA
pH adj. to 25 deg C	7.22		0.100	0.100	SU	1		9040B	Total/NA
Total Suspended Solids	1200		5.0	5.0	mg/L	1		SM 2540D	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Sacramento

Client Sample Results

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Client Sample ID: 16-U
Date Collected: 02/13/15 10:30
Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-1
Matrix: Water

Method: 8015B - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (C10-C24)	180		47	15	ug/L		02/18/15 11:12	03/06/15 11:12	1
Surrogate	%Recovery	Qualifier	Limits						
<i>o</i> -Terphenyl (Surr)	102		56 - 145						
							Prepared	Analyzed	Dil Fac
							02/18/15 11:12	03/06/15 11:12	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
pH adj. to 25 deg C	7.45		0.100	0.100	SU			02/13/15 15:30	1
Total Suspended Solids	91		5.0	5.0	mg/L			02/20/15 08:37	1

Client Sample ID: 16-P
Date Collected: 02/13/15 11:30
Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-2
Matrix: Water

Method: 8015B - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (C10-C24)	500		47	15	ug/L		02/18/15 11:12	03/06/15 11:40	1
Surrogate	%Recovery	Qualifier	Limits						
<i>o</i> -Terphenyl (Surr)	91		56 - 145						
							Prepared	Analyzed	Dil Fac
							02/18/15 11:12	03/06/15 11:40	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
pH adj. to 25 deg C	7.53		0.100	0.100	SU			02/13/15 15:30	1
Total Suspended Solids	390		5.0	5.0	mg/L			02/20/15 08:37	1

Client Sample ID: 15-66
Date Collected: 02/13/15 11:00
Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-3
Matrix: Water

Method: 8015B - Diesel Range Organics (DRO) (GC)

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (C10-C24)	210		47	15	ug/L		02/18/15 11:12	03/06/15 12:09	1
Surrogate	%Recovery	Qualifier	Limits						
<i>o</i> -Terphenyl (Surr)	73		56 - 145						
							Prepared	Analyzed	Dil Fac
							02/18/15 11:12	03/06/15 12:09	1

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
pH adj. to 25 deg C	7.22		0.100	0.100	SU			02/13/15 15:30	1
Total Suspended Solids	1200		5.0	5.0	mg/L			02/20/15 08:37	1

Surrogate Summary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Method: 8015B - Diesel Range Organics (DRO) (GC)

Matrix: Water

Prep Type: Total/NA

Percent Surrogate Recovery (Acceptance Limits)

Lab Sample ID	Client Sample ID	OTPH1 (56-145)
320-11664-1	16-U	102
320-11664-2	16-P	91
320-11664-3	15-66	73
LCS 320-65911/2-A	Lab Control Sample	101
MB 320-65911/1-A	Method Blank	97

Surrogate Legend

OTPH = o-Terphenyl (Surr)

- 1
- 2
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QC Sample Results

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Method: 8015B - Diesel Range Organics (DRO) (GC)

Lab Sample ID: MB 320-65911/1-A
Matrix: Water
Analysis Batch: 66401

Client Sample ID: Method Blank
Prep Type: Total/NA
Prep Batch: 65911

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Diesel Range Organics (C10-C24)	ND		50	16	ug/L		02/18/15 11:12	02/23/15 15:33	1
Surrogate	MB %Recovery	MB Qualifier	Limits				Prepared	Analyzed	Dil Fac
<i>o</i> -Terphenyl (Surr)	97		56 - 145				02/18/15 11:12	02/23/15 15:33	1

Lab Sample ID: LCS 320-65911/2-A
Matrix: Water
Analysis Batch: 66401

Client Sample ID: Lab Control Sample
Prep Type: Total/NA
Prep Batch: 65911

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Diesel Range Organics (C10-C24)	300	269		ug/L		90	53 - 123
Surrogate	LCS %Recovery	LCS Qualifier	Limits				
<i>o</i> -Terphenyl (Surr)	101		56 - 145				

Method: 9040B - pH

Lab Sample ID: LCS 320-65702/2
Matrix: Water
Analysis Batch: 65702

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
pH adj. to 25 deg C	8.00	7.991		SU		100	98 - 102

Lab Sample ID: 320-11664-1 DU
Matrix: Water
Analysis Batch: 65702

Client Sample ID: 16-U
Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
pH adj. to 25 deg C	7.45		7.400		SU		0.7	10

Method: SM 2540D - Solids, Total Suspended (TSS)

Lab Sample ID: MB 320-65997/1
Matrix: Water
Analysis Batch: 65997

Client Sample ID: Method Blank
Prep Type: Total/NA

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
Total Suspended Solids	ND		5.0	5.0	mg/L			02/20/15 08:37	1

Lab Sample ID: LCS 320-65997/2
Matrix: Water
Analysis Batch: 65997

Client Sample ID: Lab Control Sample
Prep Type: Total/NA

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
Total Suspended Solids	79.6	74.0		mg/L		93	85 - 115

TestAmerica Sacramento

QC Sample Results

Client: Black Gold Industries
 Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Method: SM 2540D - Solids, Total Suspended (TSS) (Continued)

Lab Sample ID: 320-11692-B-5 DU
 Matrix: Water
 Analysis Batch: 65997

Client Sample ID: Duplicate
 Prep Type: Total/NA

Analyte	Sample Result	Sample Qualifier	DU Result	DU Qualifier	Unit	D	RPD	RPD Limit
Total Suspended Solids	ND		5.00		mg/L		NC	20

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- 2
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QC Association Summary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

GC Semi VOA

Prep Batch: 65911

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11664-1	16-U	Total/NA	Water	3510C	
320-11664-2	16-P	Total/NA	Water	3510C	
320-11664-3	15-66	Total/NA	Water	3510C	
LCS 320-65911/2-A	Lab Control Sample	Total/NA	Water	3510C	
MB 320-65911/1-A	Method Blank	Total/NA	Water	3510C	

Analysis Batch: 66401

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
LCS 320-65911/2-A	Lab Control Sample	Total/NA	Water	8015B	65911
MB 320-65911/1-A	Method Blank	Total/NA	Water	8015B	65911

Analysis Batch: 67398

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11664-1	16-U	Total/NA	Water	8015B	65911
320-11664-2	16-P	Total/NA	Water	8015B	65911
320-11664-3	15-66	Total/NA	Water	8015B	65911

General Chemistry

Analysis Batch: 65702

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11664-1	16-U	Total/NA	Water	9040B	
320-11664-1 DU	16-U	Total/NA	Water	9040B	
320-11664-2	16-P	Total/NA	Water	9040B	
320-11664-3	15-66	Total/NA	Water	9040B	
LCS 320-65702/2	Lab Control Sample	Total/NA	Water	9040B	

Analysis Batch: 65997

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11664-1	16-U	Total/NA	Water	SM 2540D	
320-11664-2	16-P	Total/NA	Water	SM 2540D	
320-11664-3	15-66	Total/NA	Water	SM 2540D	
320-11692-B-5 DU	Duplicate	Total/NA	Water	SM 2540D	
LCS 320-65997/2	Lab Control Sample	Total/NA	Water	SM 2540D	
MB 320-65997/1	Method Blank	Total/NA	Water	SM 2540D	

Lab Chronicle

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Client Sample ID: 16-U

Date Collected: 02/13/15 10:30

Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-1

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			1054.5 mL	3 mL	65911	02/18/15 11:12	NGK	TAL SAC
Total/NA	Analysis	8015B		1	1054.5 mL	3 mL	67398	03/06/15 11:12	VMN	TAL SAC
Total/NA	Analysis	9040B		1			65702	02/13/15 15:30	LW1	TAL SAC
Total/NA	Analysis	SM 2540D		1	100 mL	100 mL	65997	02/20/15 08:37	NKN	TAL SAC

Client Sample ID: 16-P

Date Collected: 02/13/15 11:30

Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-2

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			1054.2 mL	3 mL	65911	02/18/15 11:12	NGK	TAL SAC
Total/NA	Analysis	8015B		1	1054.2 mL	3 mL	67398	03/06/15 11:40	VMN	TAL SAC
Total/NA	Analysis	9040B		1			65702	02/13/15 15:30	LW1	TAL SAC
Total/NA	Analysis	SM 2540D		1	100 mL	100 mL	65997	02/20/15 08:37	NKN	TAL SAC

Client Sample ID: 15-66

Date Collected: 02/13/15 11:00

Date Received: 02/13/15 14:20

Lab Sample ID: 320-11664-3

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	3510C			1052.9 mL	3 mL	65911	02/18/15 11:12	NGK	TAL SAC
Total/NA	Analysis	8015B		1	1052.9 mL	3 mL	67398	03/06/15 12:09	VMN	TAL SAC
Total/NA	Analysis	9040B		1			65702	02/13/15 15:30	LW1	TAL SAC
Total/NA	Analysis	SM 2540D		1	100 mL	100 mL	65997	02/20/15 08:37	NKN	TAL SAC

Laboratory References:

TAL SAC = TestAmerica Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600

Certification Summary

Client: Black Gold Industries
 Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Laboratory: TestAmerica Sacramento

All certifications held by this laboratory are listed. Not all certifications are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
A2LA	DoD ELAP		2928-01	01-31-16
Alaska (UST)	State Program	10	UST-055	12-18-15
Arizona	State Program	9	AZ0708	08-11-15
Arkansas DEQ	State Program	6	88-0691	06-17-15
California	State Program	9	2897	01-31-16
Colorado	State Program	8	N/A	08-31-15
Connecticut	State Program	1	PH-0691	06-30-15
Florida	NELAP	4	E87570	06-30-15
Hawaii	State Program	9	N/A	01-29-16
Illinois	NELAP	5	200060	03-17-16
Kansas	NELAP	7	E-10375	10-31-15
Louisiana	NELAP	6	30612	06-30-15
Michigan	State Program	5	9947	01-31-16
Nevada	State Program	9	CA44	07-31-15
New Jersey	NELAP	2	CA005	06-30-15
New York	NELAP	2	11666	04-01-15
Oregon	NELAP	10	CA200005	01-29-16
Oregon	NELAP Secondary AB	10	E87570	06-30-15
Pennsylvania	NELAP	3	9947	03-31-15
Texas	NELAP	6	T104704399-08-TX	05-31-15
US Fish & Wildlife	Federal		LE148388-0	02-28-16
USDA	Federal		P330-11-00436	12-30-17
USEPA UCMR	Federal	1	CA00044	11-06-16
Utah	NELAP	8	QUAN1	02-28-16
Washington	State Program	10	C581	05-05-15
West Virginia (DW)	State Program	3	9930C	12-31-15
Wyoming	State Program	8	8TMS-Q	01-29-16

Method Summary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Method	Method Description	Protocol	Laboratory
8015B	Diesel Range Organics (DRO) (GC)	SW846	TAL SAC
9040B	pH	SW846	TAL SAC
SM 2540D	Solids, Total Suspended (TSS)	SM	TAL SAC

Protocol References:

SM = "Standard Methods For The Examination Of Water And Wastewater",

SW846 = "Test Methods For Evaluating Solid Waste, Physical/Chemical Methods", Third Edition, November 1986 And Its Updates.

Laboratory References:

TAL SAC = TestAmerica Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600



Sample Summary

Client: Black Gold Industries
Project/Site: Travis AFB

TestAmerica Job ID: 320-11664-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
320-11664-1	16-U	Water	02/13/15 10:30	02/13/15 14:20
320-11664-2	16-P	Water	02/13/15 11:30	02/13/15 14:20
320-11664-3	15-66	Water	02/13/15 11:00	02/13/15 14:20

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TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

Temperature on Receipt Yes No

Drinking Water? Yes No

Chain of Custody Record

TAL-4124 (1/007)

Client: **BLACK GOLD INDUSTRIES** Address: **527 N. RICE AVE., OXNARD, CA 93030**

Project Manager: **REN KENDRICK** Telephone Number (Area Code)/Fax Number: **570-773-0938**

Date: **2-13-2015** Chain of Custody Number: **266240**

Lab Number: _____ Page _____ of _____

Site Contact: **Jill** Lab Contact: _____

Carrier/Waybill Number: _____

Project Name and Location (State): **CITY - LOS ANGELES + POWER TRAINS AFB, CA.**

Contract/Purchase Order/Quote No.: _____

Sample I.D. No. and Description (Containers for each sample may be combined on one line)	Date	Time	Matrix						Containers & Preservatives						Special Instructions/ Conditions of Receipt					
			Air	Soils	Sed	Water	Sludge	Other	Unpres	H2SO4	HNO3	HCl	NaOH	ZnAc		NaOH				
#6 16-U	2-13-15	10:30	X																	
16-P	2-13-15	11:30	X																	
15-66	2-13-15	11:00	X																	



320-11664 Chain of Custody

Possible Hazard Identification: Non-Hazard Flammable Skin Irritant Poison B Unknown

Return To Client: Disposal By Lab: Archive For: _____ Months

(A fee may be assessed if samples are retained longer than 1 month)

QC Requirements (Specify): _____

Sample Disposal: Return To Client Other: _____

Turn Around Time Required: 24 Hours 48 Hours 7 Days 14 Days 21 Days Other: _____

1. Relinquished By: *[Signature]* Date: **2-13-15** Time: **02:20**

2. Relinquished By: *[Signature]* Date: **2-13-15** Time: **14:20**

3. Relinquished By: _____ Date: _____ Time: _____

Comments: _____

DISTRIBUTION: WHITE - Returned to Client with Report; CANARY - Stays with the Sample; PINK - Field Copy



Login Sample Receipt Checklist

Client: Black Gold Industries

Job Number: 320-11664-1

Login Number: 11664

List Source: TestAmerica Sacramento

List Number: 1

Creator: Hytrek, Cheryl

Question	Answer	Comment
Radioactivity wasn't checked or is </= background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	Received same day of collection; chilling process has begun.
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



TestAmerica

THE LEADER IN ENVIRONMENTAL TESTING

ANALYTICAL REPORT

TestAmerica Laboratories, Inc.
TestAmerica Sacramento
880 Riverside Parkway
West Sacramento, CA 95605
Tel: (916)373-5600

TestAmerica Job ID: 320-11700-1
Client Project/Site: Water Analysis

For:
Black Gold Industries
240 West E Street
Dixon, California 95620

Attn: Mr. Ken Kendzior



Authorized for release by:
2/27/2015 5:46:31 PM
Laura Turpen, Project Manager I
laura.turpen@testamericainc.com

Designee for
Jill Kellmann, Manager of Project Management
(916)374-4402
jill.kellmann@testamericainc.com

LINKS

Review your project
results through
TotalAccess

Have a Question?



Visit us at:
www.testamericainc.com

The test results in this report meet all 2003 NELAC and 2009 TNI requirements for accredited parameters, exceptions are noted in this report. This report may not be reproduced except in full, and with written approval from the laboratory. For questions please contact the Project Manager at the e-mail address or telephone number listed on this page.

This report has been electronically signed and authorized by the signatory. Electronic signature is intended to be the legally binding equivalent of a traditionally handwritten signature.

Results relate only to the items tested and the sample(s) as received by the laboratory.

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Definitions/Glossary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Qualifiers

General Chemistry

Qualifier	Qualifier Description
J	Result is less than the RL but greater than or equal to the MDL and the concentration is an approximate value.

Glossary

Abbreviation	These commonly used abbreviations may or may not be present in this report.
□	Listed under the "D" column to designate that the result is reported on a dry weight basis
%R	Percent Recovery
CFL	Contains Free Liquid
CNF	Contains no Free Liquid
DER	Duplicate error ratio (normalized absolute difference)
Dil Fac	Dilution Factor
DL, RA, RE, IN	Indicates a Dilution, Re-analysis, Re-extraction, or additional Initial metals/anion analysis of the sample
DLC	Decision level concentration
MDA	Minimum detectable activity
EDL	Estimated Detection Limit
MDC	Minimum detectable concentration
MDL	Method Detection Limit
ML	Minimum Level (Dioxin)
NC	Not Calculated
ND	Not detected at the reporting limit (or MDL or EDL if shown)
PQL	Practical Quantitation Limit
QC	Quality Control
RER	Relative error ratio
RL	Reporting Limit or Requested Limit (Radiochemistry)
RPD	Relative Percent Difference, a measure of the relative difference between two points
TEF	Toxicity Equivalent Factor (Dioxin)
TEQ	Toxicity Equivalent Quotient (Dioxin)

Case Narrative

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Job ID: 320-11700-1

Laboratory: TestAmerica Sacramento

Narrative

Receipt

The samples were received on 2/18/2015 1:15 PM; the samples arrived in good condition, properly preserved and, where required, on ice. The temperature of the cooler at receipt was 13.6° C.

Organic Prep

Method(s) 1664A: Insufficient sample volume was available to perform a matrix spike/matrix spike duplicate (MS/MSD) associated with batch 66354 for method 1664-aqueous.

No additional analytical or quality issues were noted, other than those described above or in the Definitions/Glossary page.

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Detection Summary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Client Sample ID: 16-U

Lab Sample ID: 320-11700-1

No Detections.

Client Sample ID: 15-G6

Lab Sample ID: 320-11700-2

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
HEM (Oil & Grease)	4.2	J	4.7	1.1	mg/L	1		1664A	Total/NA

Client Sample ID: 16-P

Lab Sample ID: 320-11700-3

Analyte	Result	Qualifier	RL	MDL	Unit	Dil Fac	D	Method	Prep Type
HEM (Oil & Grease)	2.7	J	4.7	1.1	mg/L	1		1664A	Total/NA

This Detection Summary does not include radiochemical test results.

TestAmerica Sacramento

Client Sample Results

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Client Sample ID: 16-U
Date Collected: 02/18/15 10:00
Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-1
Matrix: Water

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
HEM (Oil & Grease)	ND		4.7	1.1	mg/L		02/23/15 11:29	02/26/15 12:47	1

Client Sample ID: 15-G6
Date Collected: 02/18/15 10:15
Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-2
Matrix: Water

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
HEM (Oil & Grease)	4.2	J	4.7	1.1	mg/L		02/23/15 11:29	02/26/15 12:47	1

Client Sample ID: 16-P
Date Collected: 02/18/15 10:50
Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-3
Matrix: Water

General Chemistry

Analyte	Result	Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
HEM (Oil & Grease)	2.7	J	4.7	1.1	mg/L		02/23/15 11:29	02/26/15 12:47	1

QC Sample Results

Client: Black Gold Industries
 Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Method: 1664A - HEM and SGT-HEM

Lab Sample ID: MB 320-66354/1-A
 Matrix: Water
 Analysis Batch: 66793

Client Sample ID: Method Blank
 Prep Type: Total/NA
 Prep Batch: 66354

Analyte	MB Result	MB Qualifier	RL	MDL	Unit	D	Prepared	Analyzed	Dil Fac
HEM (Oil & Grease)	ND		5.0	1.2	mg/L		02/23/15 11:29	02/26/15 12:47	1

Lab Sample ID: LCS 320-66354/2-A
 Matrix: Water
 Analysis Batch: 66793

Client Sample ID: Lab Control Sample
 Prep Type: Total/NA
 Prep Batch: 66354

Analyte	Spike Added	LCS Result	LCS Qualifier	Unit	D	%Rec	%Rec. Limits
HEM (Oil & Grease)	40.0	34.2		mg/L		85	78 - 114

QC Association Summary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

General Chemistry

Prep Batch: 66354

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11700-1	16-U	Total/NA	Water	1664A	
320-11700-2	15-G6	Total/NA	Water	1664A	
320-11700-3	16-P	Total/NA	Water	1664A	
LCS 320-66354/2-A	Lab Control Sample	Total/NA	Water	1664A	
MB 320-66354/1-A	Method Blank	Total/NA	Water	1664A	

Analysis Batch: 66793

Lab Sample ID	Client Sample ID	Prep Type	Matrix	Method	Prep Batch
320-11700-1	16-U	Total/NA	Water	1664A	66354
320-11700-2	15-G6	Total/NA	Water	1664A	66354
320-11700-3	16-P	Total/NA	Water	1664A	66354
LCS 320-66354/2-A	Lab Control Sample	Total/NA	Water	1664A	66354
MB 320-66354/1-A	Method Blank	Total/NA	Water	1664A	66354

Lab Chronicle

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Client Sample ID: 16-U

Date Collected: 02/18/15 10:00

Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-1

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	1664A			1057 mL	1000 mL	66354	02/23/15 11:29	AVM	TAL SAC
Total/NA	Analysis	1664A		1	1057 mL	1000 mL	66793	02/26/15 12:47	AVM	TAL SAC

Client Sample ID: 15-G6

Date Collected: 02/18/15 10:15

Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-2

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	1664A			1058 mL	1000 mL	66354	02/23/15 11:29	AVM	TAL SAC
Total/NA	Analysis	1664A		1	1058 mL	1000 mL	66793	02/26/15 12:47	AVM	TAL SAC

Client Sample ID: 16-P

Date Collected: 02/18/15 10:50

Date Received: 02/18/15 13:15

Lab Sample ID: 320-11700-3

Matrix: Water

Prep Type	Batch Type	Batch Method	Run	Dil Factor	Initial Amount	Final Amount	Batch Number	Prepared or Analyzed	Analyst	Lab
Total/NA	Prep	1664A			1060 mL	1000 mL	66354	02/23/15 11:29	AVM	TAL SAC
Total/NA	Analysis	1664A		1	1060 mL	1000 mL	66793	02/26/15 12:47	AVM	TAL SAC

Laboratory References:

TAL SAC = TestAmerica Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600

Certification Summary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Laboratory: TestAmerica Sacramento

The certifications listed below are applicable to this report.

Authority	Program	EPA Region	Certification ID	Expiration Date
California	State Program	9	2897	01-31-16

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Method Summary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Method	Method Description	Protocol	Laboratory
1664A	HEM and SGT-HEM	1664A	TAL SAC

Protocol References:

1664A = EPA-821-98-002

Laboratory References:

TAL SAC = TestAmerica Sacramento, 880 Riverside Parkway, West Sacramento, CA 95605, TEL (916)373-5600

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Sample Summary

Client: Black Gold Industries
Project/Site: Water Analysis

TestAmerica Job ID: 320-11700-1

Lab Sample ID	Client Sample ID	Matrix	Collected	Received
320-11700-1	16-U	Water	02/18/15 10:00	02/18/15 13:15
320-11700-2	15-G6	Water	02/18/15 10:15	02/18/15 13:15
320-11700-3	16-P	Water	02/18/15 10:50	02/18/15 13:15

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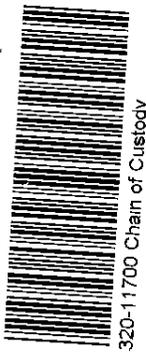
Chain of Custody Record

Temperature on Receipt 13.6 **TestAmerica**
 THE LEADER IN ENVIRONMENTAL TESTING
 Drinking Water? Yes No

TAL-4124 (1007)
 Client: **BLACK GOLD INDUSTRIES**
 Address: **527 N. Rice Ave**
 City: **OXNARD** State: **CA** Zip Code: **93030**
 Project Name and Location (State): **CITY LIGHT + POWER / TRAVIS AFB**
 Contract/Purchase Order/Quote No.:

Project Manager: **KEN KENDRICK** Date: **2-18-15** Chain of Custody Number: **266251**
 Telephone Number (Area Code)/Fax Number: **805-981-4616** Lab Number:
 Site Contact: **SITE-KEN K.** Lab Contact:
 Carrier/Waybill Number:

Sample I.D. No. and Description (Containers for each sample may be combined on one line)	Date	Time	Matrix						Containers & Preservatives						Special Instructions/ Conditions of Receipt	
			Air	Aqueous	Sed	Soil	Unpres	H2SO4	HNO3	HCl	NaOH	ZnAc/NaOH				
16-U	2-18-15	10:00 AM		X												
15-G6	2-18-15	10:15 AM		X												
16-P	2-18-15	10:50 AM		X												



Possible Hazard Identification:
 Non-Hazard Flammable Skin Irritant Poison B Unknown Return To Client Disposal By Lab Archive For _____ Months (A fee may be assessed if samples are retained longer than 1 month)

Turn Around Time Required:
 24 Hours 48 Hours 7 Days 14 Days 21 Days Other _____

Relinquished By: **[Signature]** Date: **2-18-15** Time: **13:15**
 Relinquished By: _____ Date: _____ Time: _____
 Relinquished By: _____ Date: _____ Time: _____

GC Requirements (Specify):
 1. Received By: **[Signature]** Date: **2-18-15** Time: **13:15**
 2. Received By: _____ Date: _____ Time: _____
 3. Received By: _____ Date: _____ Time: _____

Comments:

Login Sample Receipt Checklist

Client: Black Gold Industries

Job Number: 320-11700-1

Login Number: 11700

List Source: TestAmerica Sacramento

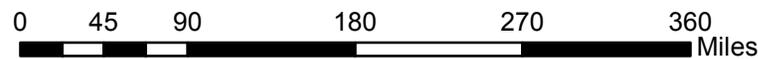
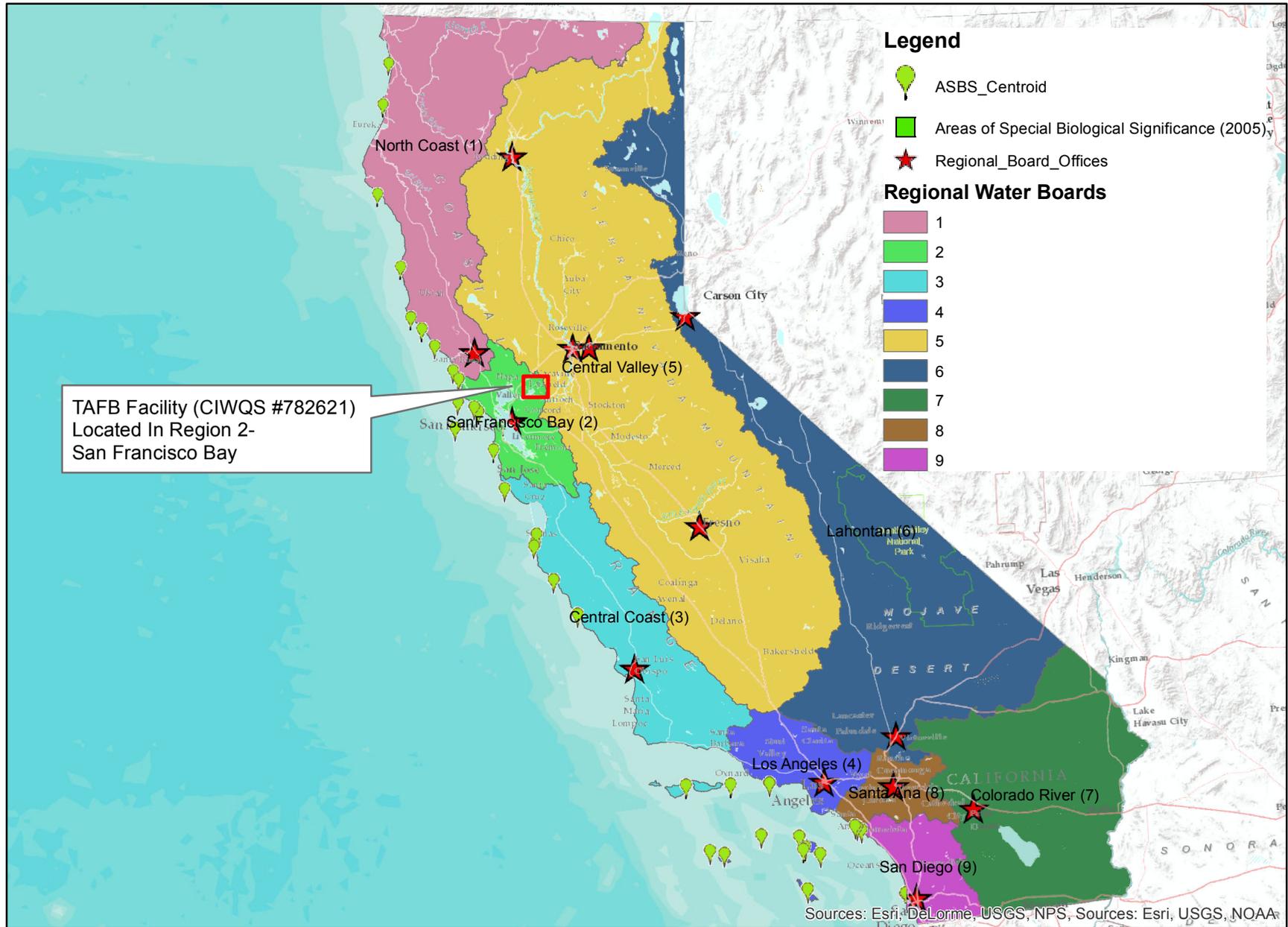
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Creator: Sadler, Jeremy

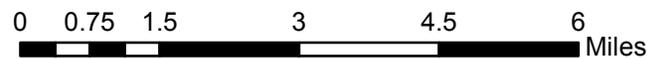
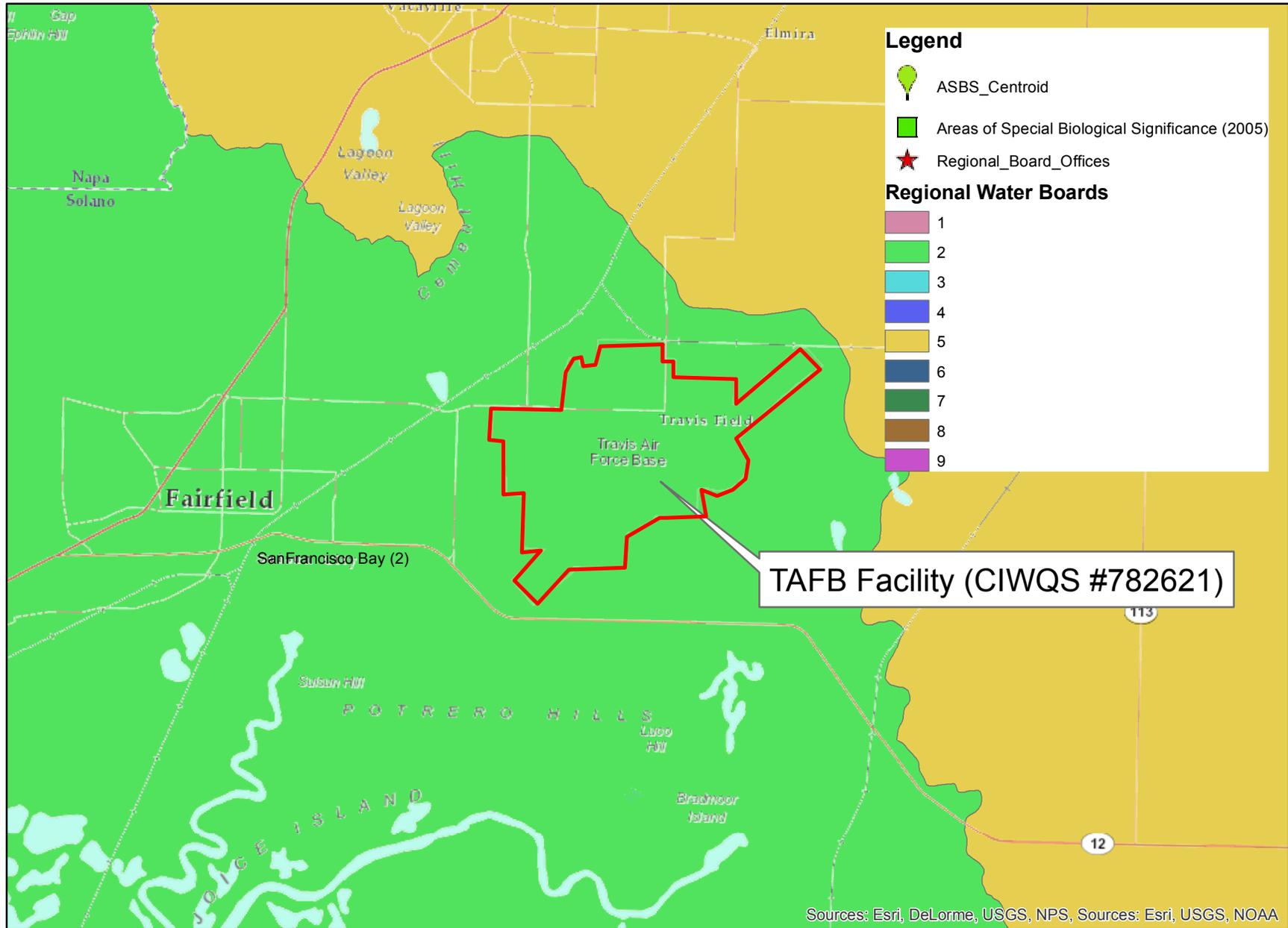
Question	Answer	Comment
Radioactivity wasn't checked or is <=/ background as measured by a survey meter.	True	
The cooler's custody seal, if present, is intact.	N/A	
Sample custody seals, if present, are intact.	N/A	
The cooler or samples do not appear to have been compromised or tampered with.	True	
Samples were received on ice.	True	
Cooler Temperature is acceptable.	True	
Cooler Temperature is recorded.	True	
COC is present.	True	
COC is filled out in ink and legible.	True	
COC is filled out with all pertinent information.	True	
Is the Field Sampler's name present on COC?	N/A	
There are no discrepancies between the containers received and the COC.	True	
Samples are received within Holding Time.	True	
Sample containers have legible labels.	True	
Containers are not broken or leaking.	True	
Sample collection date/times are provided.	True	
Appropriate sample containers are used.	True	
Sample bottles are completely filled.	True	
Sample Preservation Verified.	N/A	
There is sufficient vol. for all requested analyses, incl. any requested MS/MSDs	True	
Containers requiring zero headspace have no headspace or bubble is <6mm (1/4").	True	
Multiphasic samples are not present.	True	
Samples do not require splitting or compositing.	True	
Residual Chlorine Checked.	N/A	



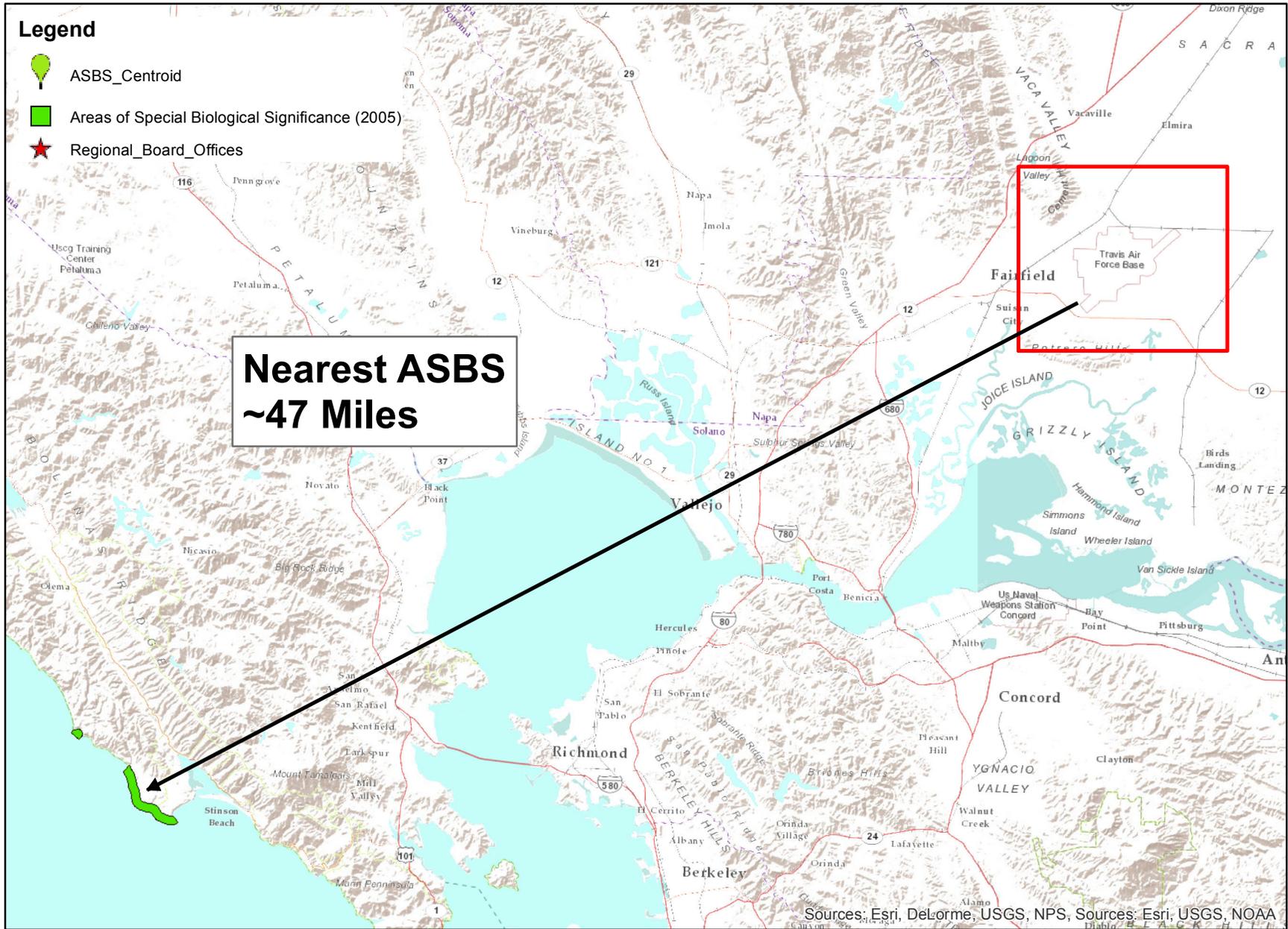
Facility Service Area- Regional Water Board #2



Facility Service Area- Regional Water Board #2



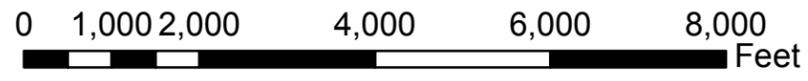
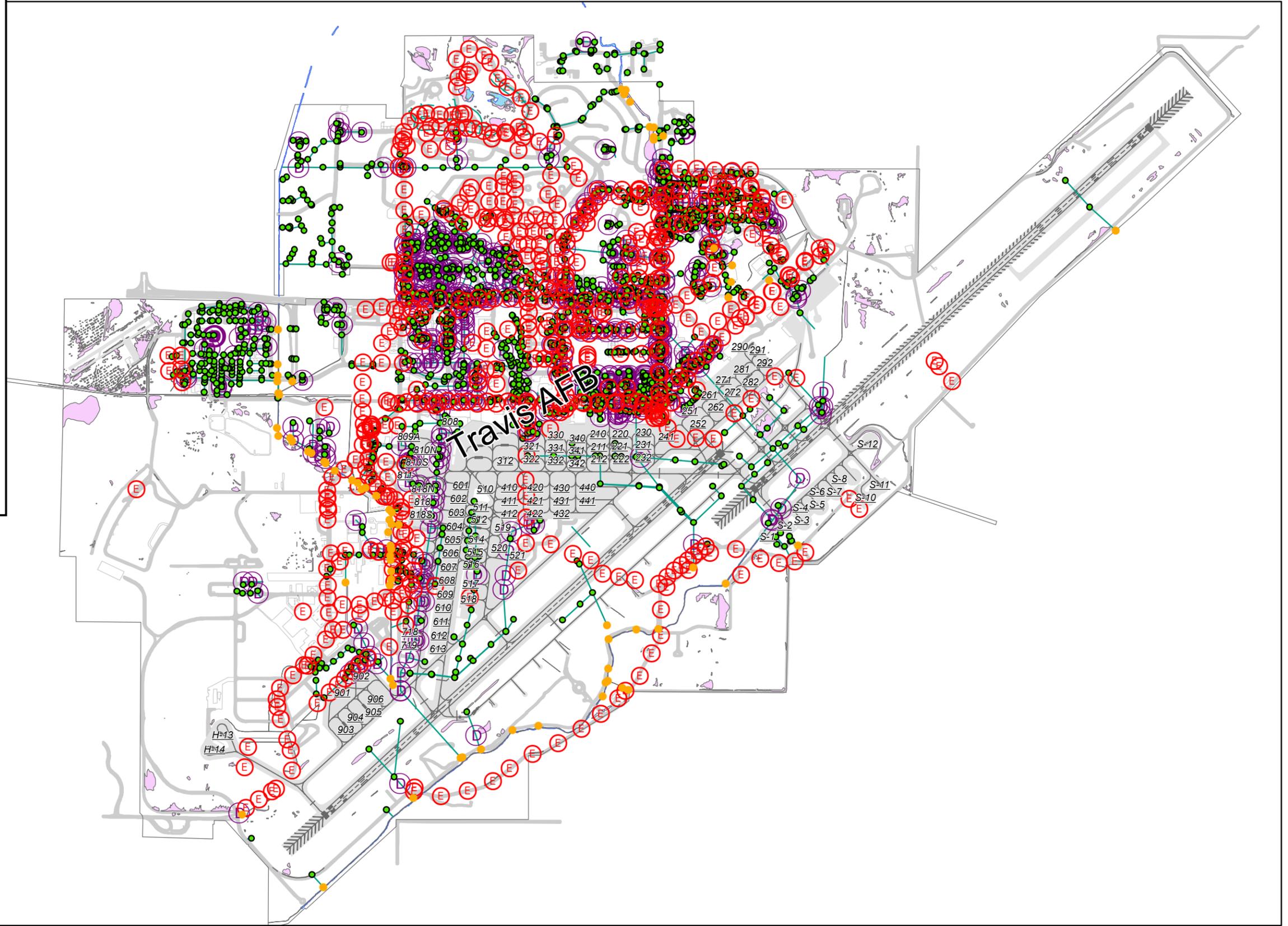
Facility Service Area- Regional Water Board #2



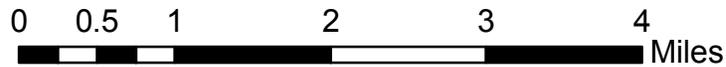
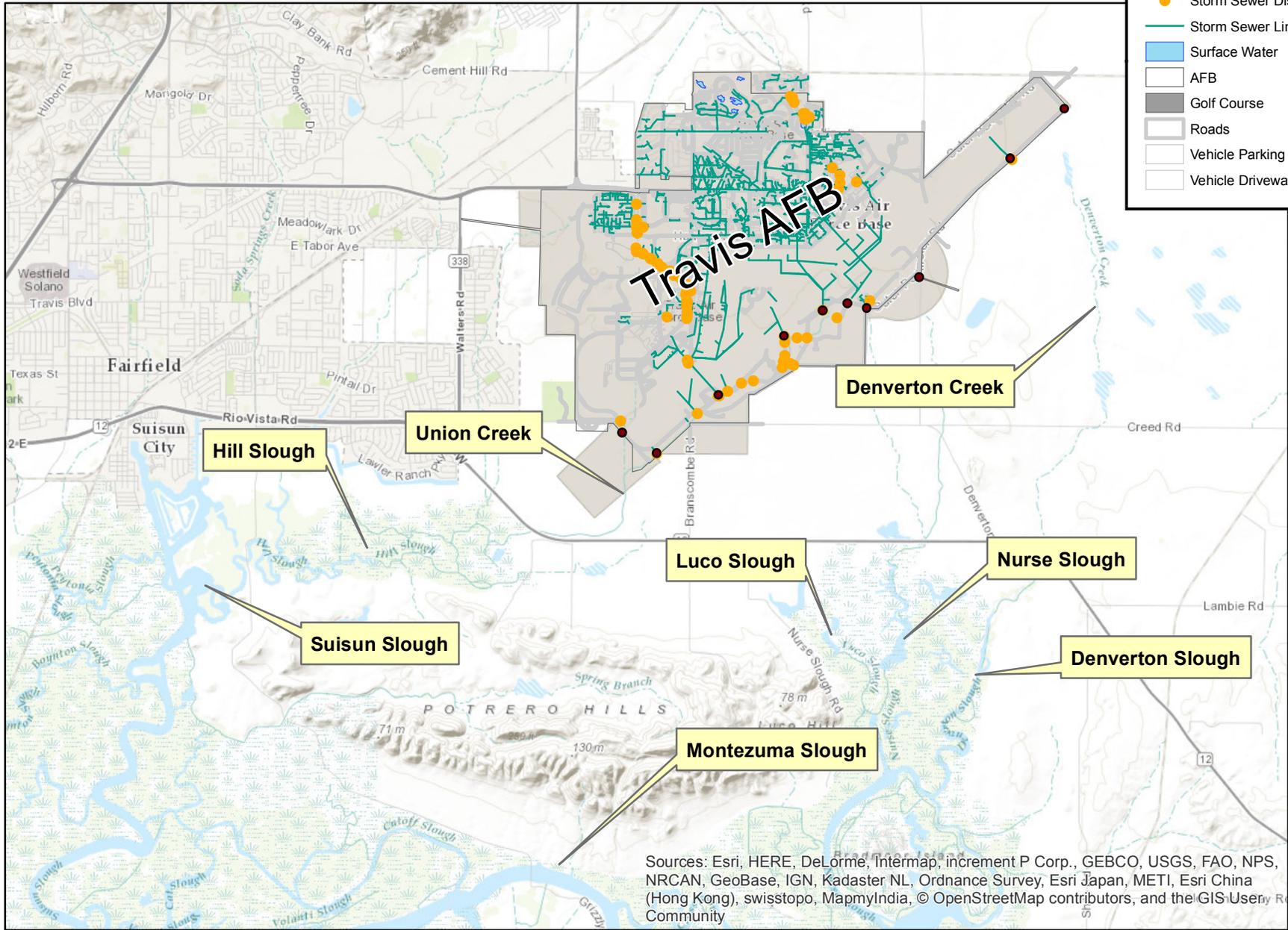
MS4 & Utility Vault Map

Legend

- Storm Sewer Discharge Point
- E Electric Handhole
- E Electric Manhole
- Storm Sewer Inlet Point
- D Storm Sewer Junction Point
- Storm Sewer Line
- Airfield Surface
- Wetlands
- Surface Water Course
- Surface Water
- AFB
- Golf Course
- Roads
- Vehicle Parking
- Vehicle Driveway



CLP Drainage Map

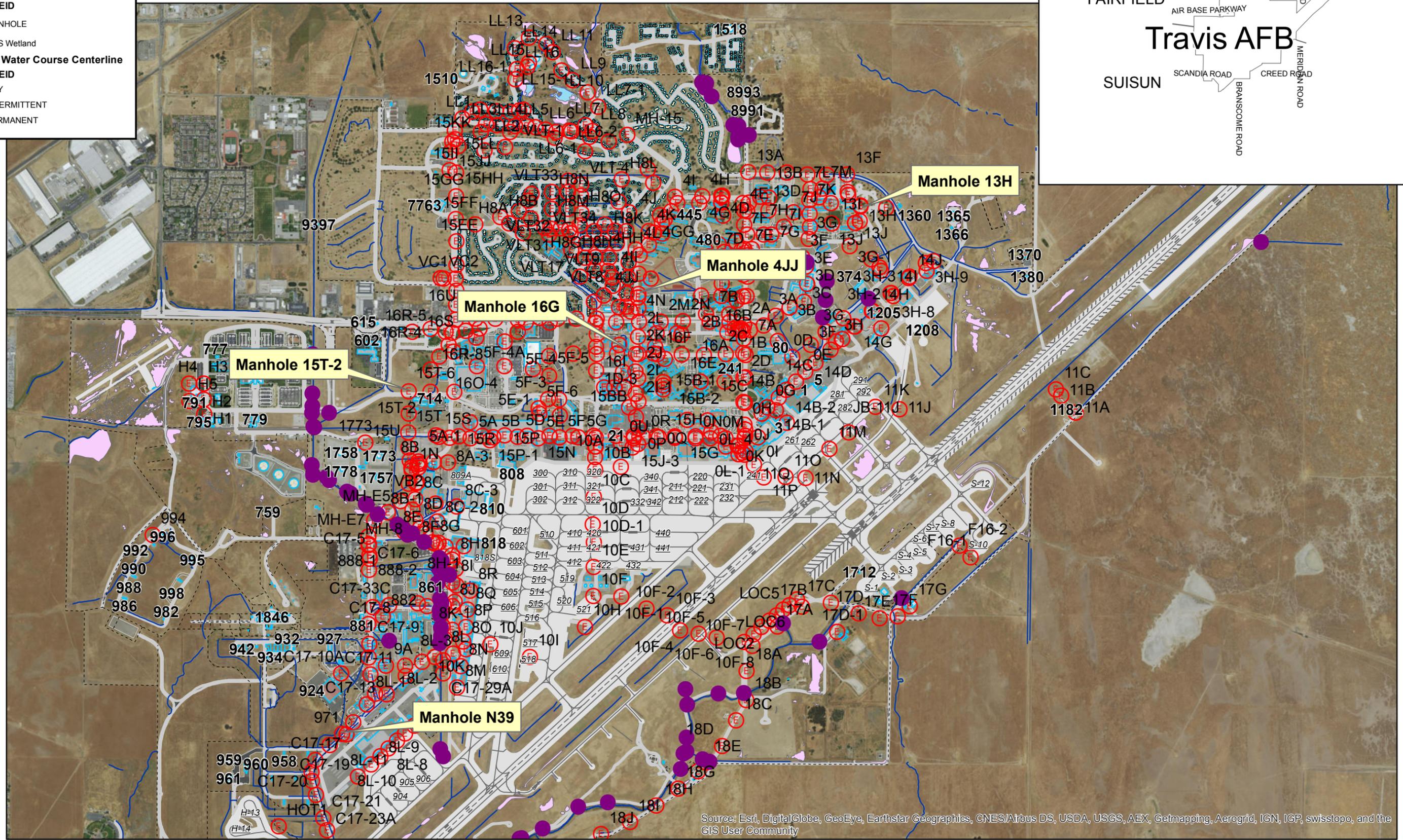


Manhole Locations

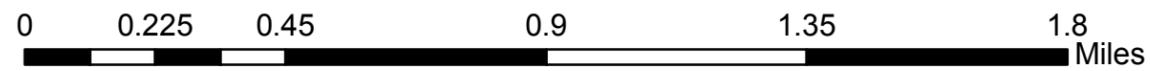
Legend

- Storm Sewer Outfall
- Utility Vault
- SUBTYPEID**
- MANHOLE
- URS Wetland
- Surface Water Course Centerline**
- SUBTYPEID**
- DRY
- INTERMITTENT
- PERMANENT

FAIRFIELD
SUISUN
Travis AFB



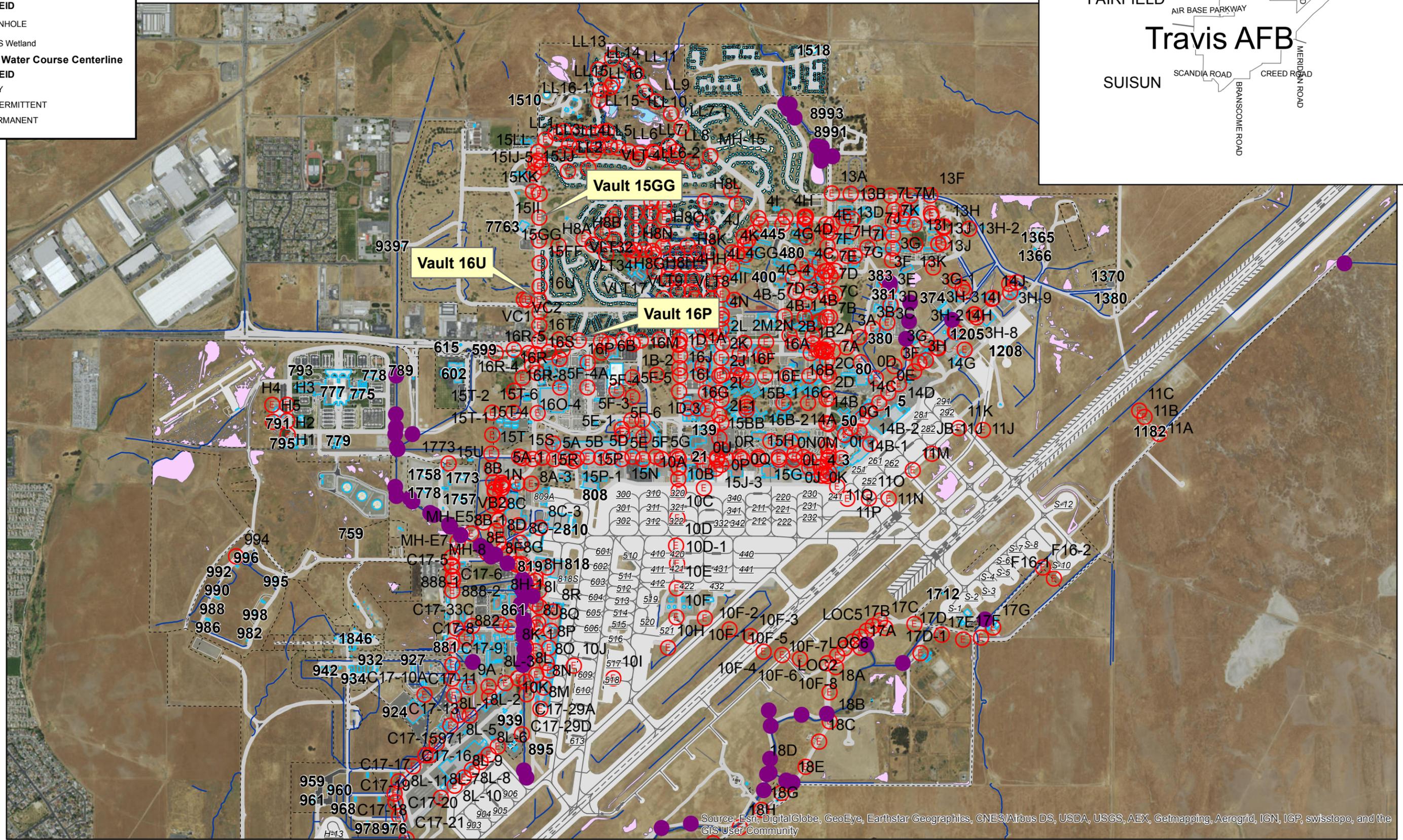
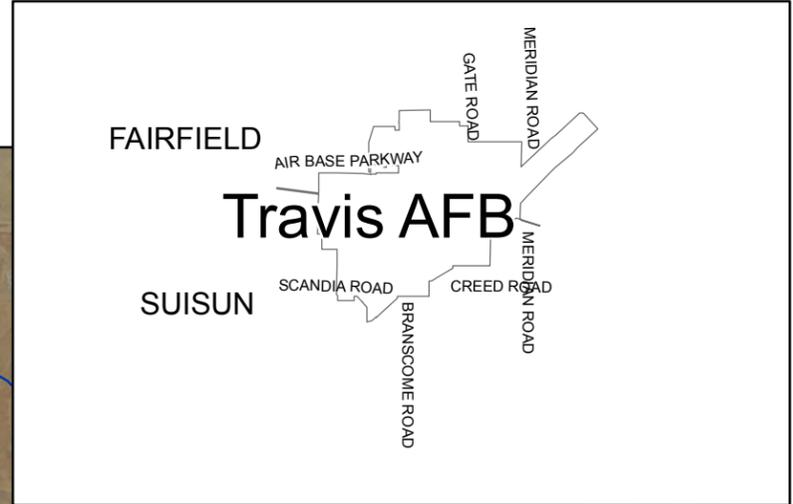
Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community



Existing Data- Manhole Locations

Legend

- Storm Sewer Outfall
- Utility Vault
- SUBTYPEID
- MANHOLE
- URS Wetland
- Surface Water Course Centerline
- SUBTYPEID
- DRY
- INTERMITTENT
- PERMANENT



Source: Esri, DigitalGlobe, GeoEye, Earthstar Geographics, CNES/Airbus DS, USDA, USGS, AEX, Getmapping, Aerogrid, IGN, IGP, swisstopo, and the GIS User Community

