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January 19, 2017

Mr. Kenneth Bruno, Program Manager
Gas Safety and Reliability Branch
Safety and Enforcement Division (SED)
California Public Utilities Commission
505 Van Ness Avenue
San Francisco, CA 94102

Regarding: General Order 112 Inspection of Central Valley Gas Storage Emergency Management Program (GI-2016-07-CVS39-04) Letter issued December 20, 2016

Dear Mr. Bruno:

Central Valley Gas Storage, LLC (CVGS) continues to place the safety of the public and its workforce as its top priority and endeavors to operate and maintain its gas pipeline facilities at standards that meet or exceed the requirements of California Public Utilities Commission General Order (GO) 112. Our management team at CVGS values the SED inspection process as an opportunity to improve our practices and records with the benefit of your findings and recommendations, and we appreciated being able to interact with your SED auditors during the July 2016 inspection of CVGS' Emergency Management procedures and records.

We have carefully reviewed the Summary of Inspection Findings and respond to each of the individual items as follows, including the described enhancements to CVGS documentation.

1. Verification of Training Effectiveness (Title 49 Code of Federal Regulations (CFR) §192.615)

Title 49 CFR §192.615 states:

"(a) Each operator shall establish written procedures to minimize the hazard resulting from a gas pipeline emergency. At a minimum, the procedures must provide for the following:

(2) Train the appropriate operating personnel to assure that they are knowledgeable of the emergency procedures and verify that the training is effective."

SED reviewed attendance records for the 2016 Emergency Response Plan "FORM OM100-20 – Training or Safety Meeting Attendance. SED recommends that CVGS document the content of trainings and verify that these trainings were effective. Records demonstrating effectiveness need to be provided at future audits. Please provide in response to this audit letter the tools that CVGS will use to verify training is effective. Verification of effectiveness shall occur no later than January 1 2017.

CVGS conducted its Emergency Response Plan training on July 12, 2016 and recorded attendance by CVGS operating staff members, but did not realize at the time that additional documentation was necessary to demonstrate training effectiveness. Upon reviewing this Area of Concern and Recommendation, CVGS developed and administered a written test to its operations staff trained on the Emergency Response Plan during 2016. The content of the written test is attached as Exhibit 1.

Training attendee scores (and the date each individual took the test) are as follows. All individuals that attended the training took the test to verify training effectiveness no later than the first business day of 2017.

Bill Wolf	100%	12/22/2016
Patrice Mbeukeu	100%	12/27/2016
Herb Lamphere	100%	12/27/2016
Daniel Perez	100%	12/27/2016
James Degroodt	87%	12/29/2016
(Missed question #2. CVGS Operations Manager discussed the definition of HCA with him, and he now understands the definition.)		
Dennis Chappell	100%	01/03/2017
Felecia Roe	100%	01/03/2017

CVGS will continue to utilize a written test to verify training effectiveness going forward and test results for future training sessions will be on file and available for review in future inspections.

2. Agency Notifications and Reporting Items (Title 49 CFR §192.605)

Title 49 CFR §192.605 states in part:

"(a) General. Each operator shall prepare and follow for each pipeline, a manual of written procedures for conducting operations and maintenance activities and for emergency response. For transmission lines, the manual must also include procedures for handling abnormal operations. This manual must be reviewed and updated by the operator at intervals not exceeding 15 months, but at least once each calendar year. This manual must be prepared before operations of a pipeline system commence. Appropriate parts of the manual must be kept at locations where operations and maintenance activities are conducted."

"CVGS Emergency Response Procedures Agency Notifications and Reporting" Procedure covers federal, state and local agency reporting requirements for the release of natural gas from a Department of Transportation jurisdictional pipeline. SED recommends adding the California Public Utilities Commission and the Division of Oil, Gas & Geothermal Resources to the list of agencies on the notifications list.

"CVGS Emergency Response Procedures Agency Notification and Reporting Form #EM-3" Procedure incorrectly lists the reporting criteria for the California Public Utilities Commission as "Discharge or threatened discharge of oil/condensate greater than one barrel into marine waters." Please update the reporting criteria field and the comment field to reflect the CPUC reporting requirements per GO 112-F.

CVGS has revised its Emergency Response Procedure "Agency Notifications and Reporting" to include the California Public Utilities Commission (CPUC) and the Department of Conservation - Division of Oil, Gas & Geothermal Resources (DOGGR) to the list of agencies on the notifications list. CVGS would propose to notify DOGGR when reporting an event concerning a well or formation issue which would fall under DOGGR jurisdiction.

CVGS also has updated Form #EM-3 as recommended with the current CPUC reporting requirements per General Order 112-F. Attached as Exhibit 2 are the revised Emergency Response Procedures Agency Notifications and Reporting Procedure and the revised Form #EM-3.

3. On-Duty Responsibilities

"CVGS Natural Gas Transmission Pipeline DOT Emergency Communications & Responsibilities" Procedure states:

"On-Duty Operator/Person Responsibilities

The On-Duty Person shall upon notification of a potential gas emergency, dispatch to the scene to identify the extent of the emergency and to take those steps immediately necessary to protect people and property. The On-Duty Person shall, when conditions warrant, notify the local police, fire, civil officials, and the company Supervisor."

CVGS explained that in case of emergency, an on-duty operator would not dispatch to the scene but would assume control room or compressor station responsibilities. The operator would contact other company employees who would dispatch to the scene. SED recommends that CVGS update the procedural language to reflect the dispatch process more accurately.

CVGS has revised its Emergency Communications & Responsibilities Procedure to clarify the actual dispatch process. The revised Procedure is attached as Exhibit 3.

4. Involvement of Outside Agencies in Emergency Exercises or Drills (Title 49 CFR §192.616)

Title 49 CFR §192.616 states in part:

"(b) The operator's program must follow the general program recommendations of API RP 1162 and assess the unique attributes and characteristics of the operator's pipeline and facilities."

API Recommended Practice 1162, First Edition, December 2003, Section 2.3.2 Emergency Responder Liaison Activities (49 CFR Parts 192.615 and 195.402) states:

"These regulations require that operators establish and maintain liaison with fire, police and other appropriate public officials and coordinate with them on emergency exercises or drills and actual responses during emergency."

In addition, the CVGS Emergency Response Manual states:

"Periodically, a simulated emergency shall be conducted to test the Emergency Plan, train personnel, and test their competency in implementing the plan. These drills shall be as realistic as possible without endangering any lives or property or reducing services to any party on the pipeline systems. These drills may be field exercises, table top drill, or class room training, or a combination of these methods. Note, actual emergencies may be used as a drill or training method if the actual emergency is reviewed and documented as required.

Appropriate emergency response groups and agencies may be invited to partake in the drill when appropriate. These groups may include local fire departments, county emergency response agencies, State Police or Highway Patrol, and local police departments. All aspects of the Emergency Plan shall be tested including inter-agency cooperation."

Documentation reviewed by SED did not indicate involvement of outside agencies on emergency exercises or drills. CVGS shall coordinate with fire, police and other appropriate public officials on emergency exercises or drills involving CVGS facilities annually. In response to this letter please provide a liaison plan to be implemented in 2017.

CVGS conducted an Emergency Response Tour, which was attended by a wide group of local first responders and regulatory agencies on December 7, 2016. Attendance at the session included representation from the Princeton Fire Department, the Colusa County Sheriff's Office, the California Highway Patrol (CHP), the Colusa County Department of Public Health, county and state Offices of Emergency Services, and state regulatory agencies including the CPUC and DOGGR. The sign-in sheet for the Emergency Response Tour is attached as Exhibit 4.

CVGS also has scheduled a table-top emergency exercise for May 10, 2017 and is requesting participation from local first responders. As now required by General Order 112-F, following the May emergency exercise, CVGS will produce a summary of public agencies to which it provided notice of liaison sessions and made them available for participation and will denote which agencies were able to have representation.

5. JISH Control Room Notification Procedures (Title 49 CFR §192.605)

Title 49 CFR §192.605 states in part:

"(a) General. Each operator shall prepare and follow for each pipeline, a manual of written procedures for conducting operations and maintenance activities and for emergency response. For transmission lines, the manual must also include procedures for handling abnormal operations. This manual must be reviewed and updated by the operator at intervals not exceeding 15 months, but at least once each calendar year. This manual must be prepared before operations of a pipeline system commence. Appropriate parts of the manual must be kept at locations where operations and maintenance activities are conducted."

The Jefferson Island Storage & Hub (JISH) Control Room is an off-site control room that can assume remote emergency responsibilities in case of emergency incidents. SED reviewed JISH Control Room

Notification Procedure (CVGS-JISH 02, 03, 05, 09 and 11) and observed the procedures contained the contact information of a former manager. SED asked if the procedure was reviewed in 2015 but no documentation was provided. Since the JISH Control Room has responsibility to call local staff in case of emergency, the JISH Control Room Notification Procedures must be included in the CVGS Emergency Plan and updated annually. In response to this letter please provide the updated CVGS Emergency Plan.

Jefferson Island Storage & Hub (JISH) has reviewed and updated its Control Room Notification Procedures (CVGS-JISH 02, 03, 05, 09 and 11) with the correct contact information. This has been added to the CVGS Emergency Response Plan (ERP) as recommended. Exhibit 5 shows this information now included in the CVGS ERP. Note that the Emergency Communications & Responsibilities Procedure in Exhibit 3 also references this information. The entire updated ERP, with the changes, is available for review on site at CVGS or can be submitted separately if you request to see the entire document at this time. (Note that the complete ERP will have to be submitted, along with all other CVGS safety-related documentation, in March per the new General Order 112-F requirement to resubmit the entire CVGS Safety Plan.)

6. ESD Alarms Generated at Off-Site Control Room

SED reviewed documentation for the 2016 compressor station emergency shutdown (ESD) test. CVGS explained that when testing the ESD system, it verifies that alarms are generated in the local control room but does not verify alarms are generated at the off-site control room (JISH). SED recommends CVGS also verify alarms generated at JISH during future ESD system tests.

CVGS has added a check to its ESD system test to verify that any ESD alarm generated in the local control room also is generated at the off-site control room. Exhibit 6 is the modified Form 10.01A, which will document evidence of the off-site control room alarm generation. CVGS will utilize this form during its next ESD system test.

7. Documentation of Liaison Meeting Discussion Content (Title 49 CFR §192.615)

Title 49 CFR §192.615 states in part:

"(c) Each operator shall establish and maintain liaison with appropriate fire, police, and other public officials to:

(1) Learn the responsibility and resources of each government organization that may respond to a gas pipeline emergency;
(2) Acquaint the officials with the operator's ability in responding to a gas pipeline emergency;
(3) Identify the types of gas pipeline emergencies of which the operator notifies the officials; and
(4) Plan how the operator and officials can engage in mutual assistance to minimize hazards to life or property."

CVGS explained it conducted liaison activities; however documentation did not indicate what was discussed during the meetings. CVGS shall document how it meets the requirements in c(1) through c(4) during liaison activities and document this revised language in the revised CVGS Emergency Plan for submission in response to this audit letter.

CVGS normally conducts its first responder liaison activities in accordance with its Public Awareness Plan (PAP), which is Procedure #3.03 of the CVGS Operations and Maintenance Plan, and there is no liaison activity section in the Emergency Response Plan. Going forward, CVGS will document each individual liaison discussion on Form #3.03A – Government Liaison Record Of Meeting, and has added a checklist on the second page of the Form to document that the four discussion points covered in §192.615 occurred, and capture information obtained. Attached as Exhibit 7 is a copy of the revised Form #3.03A.

Exhibit 8 contains the materials presented to participants in the CVGS Emergency Response Tour discussed in the response to item #4. In addition to this material, CVGS showed a video of its pipeline from the compressor station to the interconnection with PG&E and discussed where it shares right-of way locations with another storage facility pipeline (whose representatives also participated in the meeting.) The meeting also included a video presenting a pipeline incident in another state to offer perspective on a type of incident that could conceivably occur with a pipeline and which actions by first responders would or wouldn't likely be effective. CVGS believes that presentation of this material and discussion with local agencies was at least partially responsive to the intent of the four discussion points, even if they are not expressly documented as such. CVGS management will take care to make sure that the table-top emergency exercise scheduled for May 10, 2017 more expressly covers the four discussion points covered in §192.615.

8. Information Obtained During Initial Emergency Notification

The Emergency Response Plan, DOT Emergency Communications & Responsibilities section describes the initial notification process in case of an emergency as follows:

"Leaks, fires, explosions, or other emergencies may be reported by the public 24 hours per day, seven days per week, by calling (1-855-303-2847), which is the phone number listed on pipeline markers, and station markers. After hours, these calls are received by the 24 hour answering service and forwarded to the on-duty supervisor. A written record shall be maintained of all calls received and actions taken. The 24-hour answering service is responsible for maintaining the written log of all calls received and actions taken to ensure that no hazardous conditions exists. All personnel receiving leak complaints are trained in asking appropriate questions to determine the location and potential hazard of each leak. Reports received might contain much of the information needed. However, in most instances, this information may not be volunteered; therefore, emergency calls shall be received by, or referred to, a person knowledgeable in reacting to such situations. This person shall attempt to obtain and record the following information:

Communication & Information to Obtain during Initial Notification (see Form #Em-1)

1. The address where the emergency has occurred. If the address is given as a rural route, box number of general area, obtain additional information to further identify the location.
2. The name of the caller.
3. The telephone number of the caller and location of the telephone
4. Personal estimate of the information from the caller as to the severity of the situation.
5. What is happening?
- ***a. Gas odor inside structure***
- ***b. Gas odor outside structure***
- ***c. Line break***
- ***d. Gas blowing (hissing sound)***
- ***e. Explosion***
- ***f. Fire***
- ***g. Natural disaster***
- ***h. Civil disorder***

6. Types of structures or area involved; i.e. school buildings, public assembly areas, critical area locations, etc.
7. Action that has already been taken by persons at the emergency site.
8. An estimate of how long the problem has existed.
9. The traffic situation in the area involved.
10. Any other information that might be helpful.
11. Time of the call and the date."

SED reviewed the script the after-hours answering service follows when it receives an initial notification of emergency. The script asks the name of the caller, the callback number and the location where the caller smells gas. This information is relayed to the on-call CVGS representative. The CVGS representative then attempts to call back and obtain more detailed information (see items 1 through 11 above) contained in Form # Em-1.

SED recommends that CVGS evaluate whether obtaining more detailed information during the initial after hours notification call could contribute to a faster response time to an emergency.

CVGS reviewed the script used by the after-hours service and agrees that attempting to obtain more detailed information during the initial call could contribute to a faster response time. CVGS has developed a modified script that attempts to obtain more Form # Em-1 information. The software that generates the script doesn't communicate the script in print very effectively, but CVGS has attached a printout of the revised script as Exhibit 9. For various situations (Gas odor, Gas blowing, Safety or security concerns) the after-hours operator will ask questions according to drop-down menus driven by the caller's responses. The questions are designed to get quicker information on the types of structures that may be involved, how long the problem has existed, whether there are emergency responders present or people at the site that don't appear to belong, and whether there is any traffic concerns.

9. General Order 112 References

All standard procedures, training procedures, Emergency Response Plan, and Safety Plan, need to be revised to reference the current June 25, 2015 General Order 112-F instead of the superseded General Order 112-E.

CVGS is in the process of updating its entire Gas Safety Plan documentation (which is inclusive of the ERP) for submittal to the CPUC in March of 2017 in compliance with Section 123.2 (k) of General Order 112-F. CVGS intends to have the proper General Order 112 references documented for the March submittal.

CVGS appreciates the thorough review of its facilities and documentation by the SED audit team and looks forward to continuing our constructive relationship with SED in accomplishing the top priority of maintaining safe and reliable operations. We believe that the actions we have taken to address these audit findings demonstrate that CVGS continues to be responsive to safety concerns.

Sincerely,

Stephen L. Wassell
Vice President
Storage and Peaking Operations
Southern Company Gas

cc: John Boehme; Robert Cornell; Leticia Quezada; Mark Stephens
Alin Podoreanu – CPUC

Exhibits Attached

Exhibit 1 – Training Effectiveness Test

Written Exam

Emergency Response Plan 2016

Central Valley Gas Storage

1. The Central Valley Emergency Response Plan outlines the procedures utilized to comply with DOT regulations written in 49 CFR 192.615. The Emergency Response Plan shall be reviewed and updated: (circle any or all that may be correct)

    A) Once per month
    B) Once per calendar year, not to exceed 15 months
    C) Once every 5 years

2. How many High Consequence Areas (HCA's) located along CVGS 24" natural gas pipeline?

    A) One
    B) Three
    C) Zero

3. Natural Gas is colorless, tasteless, extremely flammable gas with added mercaptan for odor. That and other hazard information can be found in the ERP manual in:

    A) Section 12: Emergency Valves and Equipment
    B) Section 15: Natural Disaster
    C) Section 11: Natural Gas Hazard Information

4. You are first on scene at a pipeline emergency, your 1st priority is?
    A) Develop a proper course of action (evacuating, traffic control, prevention of accidental ignition, ect.)
    B) Protect the Public, responders and company personnel
    C) Identify the type, form, nature, quantity and hazards involved in the incident

5. According to California Public Utilities Code 956(c) natural gas transmission pipeline operators (Like Central Valley Gas Storage) must liaison with emergency responders once per year. What is the preferred method:

    A) Face to face
    B) By Mail
    C) Over the telephone

6. Since Aliso Canyon we have added a new section to the ERP manual this tab is:

    A) Gas inside a building
    B) Natural Disaster
    C) Well Control
    D) Civil Disturbance

7. Form # EM-3 is used to inform various Local, State and Federal agencies, to whom as first on scene whom would you call first:

    A) 911
    B) CPUC
    C) Cal OES

8. Form # EM-4 and # EM-5 are Company Notifications and Log of Miscellaneous Activities at what point in time should one start filling in after being notified of an emergency

    A) First thing the very next day
    B) When participating in the evaluation of Failures
    C) Immediately

9. Name_____ Signature_____ Date_____

Exhibit 2 – Emergency Response Procedures Agency Notifications and Reporting Procedure

CENTRAL VALLEY GAS STORAGE
Emergency Response Procedures
Agency Notifications and Reporting

Ref: 192.615 **Date Revised: Jan 2017**

Scope:

This procedure covers the release reporting requirements for a release of natural gas, or natural gas condensate from a DOT jurisdictional pipeline such as CVGS. Multiple federal, state, and local authorities may require notification depending on the location and severity of the event. Agencies that may require notification include:

Federal:

- **National Response Center per DOT [49 CFR 191.5]**
- **Office of Pipeline Safety [49 CFR 191.25]**
- **OSHA [29 CFR 1904.39]**
- **National Response Center per USCG [33 CFR 153.203 & 40 CFR 110.10]**

State:

- **OES [HSC 25507(a) & Water Code 13271(a)]**
- **California State Lands Commission [2 CCR 2142]**
- **CHP [Vehicle Code 23112.5(a)]**
- **Ca. Dept. of Fish & Game [Ca. Gov. Code 8670.25-27]**
- **California Public Utilities commission (CPUC)**
- **Division of Oil, Gas, and Geothermal Resources (DOGGR)**

Local:

- **911 for any emergency**
- **Administering agency for hazardous material releases [HSC 25507(a)]**

Reporting Procedures:

After the necessary emergency steps are taken to stop, contain, and control the release to protect public safety, environmental resources, and minimize damage:

1. **Determine whether there is a reporting requirement. Review the reporting criteria listed on the "Agency Notification and Reporting" form. (Form # EM-3)**
2. **Notify the appropriate agencies and document using the following "Agency Notification and Reporting" form. (Form # EM-3)**
3. **Conduct repairs and clean up measures as appropriate and document.**
4. **Submit follow up reports as appropriate.**

Ref: 192.615 **Date Revised: Jan 2017**

Record Keeping: **All reportable releases shall be documented using the "Agency Notification and Reporting" Form # EM-3. Completed forms shall be forwarded to the DOT Compliance Supervisor for filing into the DOT record keeping system.**

National Response Center 800-424-8802

Office of Pipeline Safety 202-366-4595

OSHA 800-321-6742

US Fish and Wildlife 530-458-2666

State:

OES 916-657-9494

California State Lands Commission 916-574-1810

CHP Willows 530-934-5424

CHP Williams 530-473-2821

Dept. of Fish and Game 916-358-2900

California Public Utilities Commission 800-235-1076

Division of Oil, Gas, and Geothermal Resources 916-322-1110

CENTRAL VALLEY GAS STORAGE
Emergency Response Procedures
Agency Notifications and Reporting
Form # EM-3

Ref: 192.615	**Date Revised: June 2011**

Name of company person making calls:
Title of company person making calls: _____

Local Emergency Service:	**911, 24 hours/day**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria: • **Any emergency**	**Comments:**
National Response Center:	**(800) 424-8802, 24 hours/day**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
NRC report #:	
Reporting Criteria: • **Pipeline incident per 49CFR §191.3 (death, hospitalization, $50,000 in damage, significant event)** • **Condensate spill to navigable waterway per 33 CFR 153.203 & 40 CFR 110.10**	**Comments:** ■ **(Report name of person reporting, location and time of incident, number of fatalities and personal injuries, and other significant facts re: cause or ex tent of damages)** ■ **(Report if spill is causing a film or sheen upon or Discoloration of the surface of the water or causing a sludge or emulsion to be deposited beneath the surface of the water.)**
USDOT - Office of Pipeline Safety (PHMSA):	**Western Region (720) 963-3160,** **Fax: (720) 963-3161**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
Reporting Criteria: • **Pipeline safety related condition per 49 CFR § 191.23 (imminent hazard, material defects, unintended movement, etc.)**	**Comments:**

Ref: 192.615	**Date Revised: June 2011**

Name of company person making calls: _____
Title of company person making calls: _____

Agency Notifications:

Cal/OSHA: (Sacramento Office)	**(916) 263-2800, Fax (916) 263-2798**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria: • **Within eight (8) hours after the death of any employee from a work-related incident or the in-patient hospitalization of three or more employees as a result of a work-related incident, orally report the fatality/multiple hospitalization by telephone or in person to the Area Office of the Occupational Safety and Health Administration (OSHA), U.S. Department of Labor, that is nearest to the site of the incident. [29 CFR § 1904.39]**	**Comments:**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
	Comments:
Calif. Department of Fish & Wildlife	**Office of Spill Prevention & Response (916) 445-9338**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
	Comments: **Office of Spill Prevention & Response** **1700 K st., Suite 250** **Sacramento, Ca. 95811**

CENTRAL VALLEY GAS STORAGE

Emergency Response Procedures

Agency Notifications and
Reporting Form # EM-3

Ref: 192.615	**Date Revised: June 2011**

Name of company person making calls: _____
Title of company person making calls: _____

Agency Notifications:

California Office of Emergency Services:	**(800) 852-7550, 24 hours/day (or (916) 845-8911 if outside CA)**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria: • **Actual or threatened release of any hazardous material that poses threat** to **public, Property or the environment.** **[HSC 25510]** • **Release of hazardous substance to state waters** **[Water Code 13271(a)]** • **Spills or leakage of oil or liquid pollutant on state lands or waters** **[2 CCR 2142]** **Release of hazardous material or waste upon any highway.** **[Vehicle Code 23112.5(a)]**	**Comments:** **(Report name/number of person reporting, location and time of incident, cause and type of incident, type and estimated quantity of released material, actions taken, current facility condition, injuries, potential health or environmental hazards outside of facility.)** **California Department of Fish & Wildlife should be notified.**
CPUC	**(800) 235-1076**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria: **See:** **EM-3 - SUBPART B - REPORTS**	**Comments:**

EM-3 - SUBPART B - REPORTS

122.2 Requirements for reporting to the CPUC.

(a) Each Operator shall report incidents to the CPUC that meet the following criteria:

1. Incidents which require DOT notification.

i. An event that involves a release of gas from a pipeline, or of liquefied natural gas, liquefied petroleum gas, refrigerant gas, or gas from an LNG facility, and that results in one or more of the following consequences:

- A death, or personal injury necessitating in-patient hospitalization; or
- Estimated property damage of $50,000 or more, including loss to the Operator and others, or both, but excluding cost of gas lost;
- Unintentional estimated gas loss of three million cubic feet or more;

ii. An event that results in an emergency shutdown of an LNG facility. Activation of an emergency shutdown system for reasons other than an actual emergency does not constitute an incident;

iii. An event that is significant in the judgment of the Operator, even though it did not meet the criteria of Sections 122.2(a)(1)(i) or (ii), above.

2. Incidents which have either attracted public attention or have been given significant news media coverage, that are suspected to involve natural gas and/or propane (LPG) gas, which occur in the vicinity of the Operator's facilities; regardless of whether or not the Operator's facilities are involved.

3. Incidents where the failure of a pressure relieving and limiting stations, or any other unplanned event, results in pipeline system pressure exceeding its established Maximum Allowable Operating Pressure (MAOP) plus the allowable build up set forth in 49 CFR § 192.201.

4. Incidents in which an under-pressure condition, caused by the failure of any pressure controlling device, or any other unplanned event other than excavation related damage, results in any part of the gas pipeline system losing service or being shut-down.

(b) In the event of an incident listed in 122.2(a) above, an Operator shall go to the Commission's website, select the link to the page for reporting emergencies and follow the instructions thereon. If internet access is unavailable, the Operator may report using the backup telephone system.

1. If the Operator is notified of the incident during its normal working hours, the report should be made as soon as practicable but no longer than 2 hours after the Operator is aware of the incident and its personnel are on the scene.
2. If the Operator is notified of the incident outside of its normal working hours, the report should be made as soon as practicable but no longer than 4 hours after the Operator is aware of the incident and its personnel are on the scene.
3. All reports required by this section shall be followed by the end of the next working day by an email or telefacsimile (fax) of the standard reporting form, "Report of Gas Leak or Interruption," CPUC File No. 420 (see attachment).

(c) Written Incident Reports.

1. The Operator shall submit to the CPUC on DOT Form PHMSA F7100.1 (http://obs.dot.govilibrary/forms/forms.htm#7100.1)for distribution systems and on DOT Form PHMSA F7100.2 (httb://ops.dot.govilibraryfformsiforms.htmf47100.2) for transmission and gathering systems a report describing any incident that required notice under Item 122.2(a)(1).
2. Together with the form required by (c)(1) above, the Operator shall furnish a letter of explanation giving a more detailed account of the incident unless such letter is deemed not necessary by the CPUC staff. The Operator may confirm the necessity of a letter of explanation by email. If, subsequent to the initial report or letter, the Operator discovers additional material, information related to the incident, the Operator shall furnish a supplemental report to the CPUC as soon as practicable, with a clear reference by date and subject to the original report. These letters, forms, and reports shall be held confidential under the provisions of Paragraph 2, Exclusions, of General Order 66-C and Public Utilities Code Section 315.

3. The Operator of a distribution system serving less than 100,000 customers need not submit the DOT forms required by paragraph (1) above; however, such Operator must submit the letter of explanation required by (2) above, subsequent to any initial report to the CPUC, unless such letter is deemed unnecessary by the CPUC staff.

4. CPUC to be notified if DOT is notified under 49 CFR § 191.23

CENTRAL VALLEY GAS STORAGE
Emergency Response Procedures
Agency Notifications and Reporting
Form # EM-3

Ref: 192.615	**Date Revised: June 2011**

Name of company person making calls: _____
Title of company person making calls: _____

Agency Notifications:

Division Oil, Gas and Geothermal Resources	**(916) 322-1110**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria:	**Comments:**
California State Fire Marshal Pipeline Safety	**(916) 445-8477**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
	Comments:
California Northern Railway	**(800) 800-3490**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
	Comments: Contact Person **Rob Myer (530) 601-6403**

CENTRAL VALLEY GAS STORAGE
Emergency Response Procedures
Agency Notifications and Reporting
Form # EM-3

Ref: 192.615	**Date Revised: June 2011**

Name of company person making calls: _____
Title of company person making calls: _____

Agency Notifications:

Colusa Health and Human Services	**(530) 458-0285**
Person Contacted:	
Person Title:	
Date and Time:	
Report #:	
Reporting Criteria:	**Comments:** **CUPA (530) 458-0320**
Colusa County Risk Management	**(530) 458-0401**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
Reporting Criteria:	**Comments:**
Colusa County Public Works	**(530) 458-0466**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
Reporting Criteria:	**Comments:**
Colusa County Planning & Building	**(530) 458-0480**
Agency Person Contacted:	
Agency Person Title:	
Date and Time:	
Report #:	
Reporting Criteria:	**Comments:**

Exhibit 3 – Emergency Communications & Responsibilities Procedure

CENTRAL VALLEY GAS STORAGE
Natural Gas Transmission Pipeline
DOT Emergency Communications & Responsibilities

Ref: 192.615	Date Revised: Jan 2017

Emergency Communications

General Information & Procedures

Effective internal and external communications with the emergency responders, regulatory agencies, public, and media is essential to ensure the effective management of an emergency event.

Although the types of emergencies that might occur in a gas system are widely varied, there are certain common actions, **which can be taken regardless of the type of emergency. Regardless of the type of emergency, the company will** make safe any actual or potential hazard to life or property. **[192.615(a)(7)]**

Each supervisor who may have duties and responsibilities in emergency situations shall be furnished a copy of this Plan. **[192.615(b)(1)] Employees shall be trained in their areas of responsibility, and familiar with the total Plan. Employees shall attend annual review sessions, emergency drills, table top drills, or classroom training as noted in the pre-emergency planning section.**

Emergency Communications [192.615(a)(2) & (a)(8)]

The Supervisor or designee shall designate one person at the emergency scene as "Supervisor in Charge", or "Incident Commander" **(IC). The IC will coordinate all of the field activities. The IC shall communicate with the Fire Department and other public officials to keep them informed about all work planned. Refer to the Incident Command section of this Plan for more details.**

When possible, a supervisor shall be designated, as Public Information Officer (PIO) to receive and transmit needed information to the On-Duty Person and key personnel not on the scene. All contacts with persons on the scene shall be made through the PIO. In the absence of a person designated PIO, the **IC will act** as **the public relations representative. The PIO shall make reports of activities at the emergency.**

The IC shall ensure that communications are maintained until the emergency is past. All company personnel will avoid unnecessary radio traffic during an emergency condition. In the event radio communications are not available cellular telephones shall be used.

Supervisor Responsibilities

The Supervisor is responsible for the training and equipping of personnel in the investigation of leak and incident complaint reports and responding to pipeline emergencies. The Supervisor has the primary responsibility for identifying each of the potential emergency situations, and when necessary, declaring a gas emergency. The Supervisor also has the responsibility to ensure availability of personnel, instruments, tools, and material required at the scene of an emergency. [192.615(a)(4)] When an emergency condition arises that could seriously affect the normal, safe operation of a gas system, it is essential that a predetermined course of action be implemented to ensure protection to the public, Company employees, and protection of public and Company property. In an emergency, protection of people first 1192.615(a1(5)1 **and property second must receive paramount consideration.**

The ability to adequately respond to potential emergency situations will be determined by the familiarity of the employees with emergency plans and the extent of preplanning. The Supervisor is responsible to see that all employees in the Company are able to recognize what constitutes a gas emergency, how to classify incidents, and what information shall be obtained.

The Supervisor will ensure the failure/accident investigation is conducted as soon as is reasonable possible. [192.615(a)(10)] The company will follow the failure investigation procedures in the DOT pipeline O&M manual.

On-Duty Operator/Person Responsibilities

In case of emergency the on duty operator will not dispatch to the scene but would assume control of control room and compressor station, in order to *protect life, property, and environment.* The operator will contact other company employees who will dispatch to the scene. (Also Responsibility of JISH when JISH serves as the on-duty Operator- See JISH contact information section)

The dispatched employee will do everything possible to *protect life, property, and environment*. He will advise the public on safety measures to take, depending upon the nature of the emergency. He will locate the source of the leak. He will work with agency emergency personnel until order is restored. He will advise the Supervisor and control room of conditions as they progress.

CENTRAL VALLEY GAS STORAGE
Natural Gas Transmission Pipeline
DOT Emergency Communications & Responsibilities

Ref: 192.615	Date Revised: Jan 2017

Communication & Receiving Information General

Leaks, fires, explosions, or other emergencies may be reported by the public 24 hours per day, seven days per week, by calling (1-855-303-2847), which is the phone number listed on pipeline markers, and station markers. After hours, these calls are received by the 24 hour answering service and forwarded to the on-duty supervisor. A written record shall be maintained of all calls received and actions taken. The 24-hour answering service is responsible for maintaining the written log of all calls received and actions taken to ensure that no hazardous conditions exists.

All personnel receiving leak complaints are trained in asking appropriate questions to determine the location and potential hazard of each leak. Reports received might contain much of the information needed. However, in most instances, this information may not be volunteered; therefore, emergency calls shall be received by, or referred to, a person knowledgeable in reacting to such situations. This person shall attempt to obtain and record the following information:

Communication & Information to Obtain during Initial Notification (see Form #Em-1)

1. **The address where the emergency has occurred. If the address is given as a rural route, box number of general area, obtain additional information to further identify the location.**
2. **The name of the caller.**
3. **The telephone number of the caller and location of the telephone**
4. **Personal estimate of the information from the caller as to the severity of the situation.**
5. **What is happening?**

a. Gas odor inside structure	e. Explosion
b. Gas odor outside structure	f. Fire
c. Line break	g. Natural disaster
d. Gas blowing (hissing sound)	h. Civil disorder

6. **Types of structures or area involved; i.e. school buildings, public assembly areas, critical area locations, etc.**
7. **Action that has already been taken by persons at the emergency site.**
8. **An estimate of how long the problem has existed.**
9. **The traffic situation in the area involved.**
10. **Any other information that might be helpful.**
11. **Time of the call and the date.**

Communication and Advice to Caller

For a leak inside building and strong gas odor

- **Evacuate building**
- **Warn against operating light switches**
- **Warn against lighting matches**
- **Warn against using telephone**
- **Warn against re-entering building**

For blowing gas leak keep people away from the immediate vicinity.

Communication and Notification of Local Emergency Units

Depending on the nature of the emergency, assistance may be requested of the Fire Department and/or Emergency Rescue, the Police/Sheriff Department, State Police, an Ambulance Unit, or Civil Defense; all of these can be reached by dialing 911. The type of emergency involved will dictate the type of assistance to be requested. We have informed these organizations of our abilities in responding to emergencies, identified the type of emergencies of which we will notify these organizations, and discussed how these organizations can assist us in minimizing hazards to life or property. These organizations have been informed of our planned responses and actual responses during an emergency. See agency notification section for details.

Notification of Other Company Pipeline Personnel and Utility Company Personnel

In the event that additional information is needed on company facilities, the On-Duty person will furnish system information. Facilities outside the system may require further assistance from other natural gas companies and utilities to operate facilities that are not under the control of their office. Refer to the telephone numbers listed in this Plan. See "Emergency Phone Numbers" tab for more detail.

Log of Events (see Form #Em-5)

Depending on the scope of the emergency, a log of events shall be maintained as designated by the IC. Use Form #EM-5, Emergency Log of Miscellaneous Activities.

Ref: 192.615 **Date Revised: Jan 2017**

The IC shall be responsible for making certain that the Commission and Department of Transportation are properly notified of reportable accidents, leaks or incidents. See the DOT O&M Manual for specific procedures. The IC shall be responsible for reporting in writing, a summary of each accident or incident to the Supervisor. The report shall be submitted as soon as practicable, but not more than 30 days after the incident. On-Duty Supervisor and other employees as directed will complete a report.

Media and Public Communications

One person shall be designated as the company spokesperson. This will usually be the Supervisor, Incident Commander, or Public Information Officer. The following are dos and don'ts for the designated spokesperson when talking with reporters.

Dos	Don'ts
Be Calm	Don't speculate on cause of crisis or accident
Be Truthful	Don't estimate damages
Identify yourself as the designated company spokesperson	Don't discuss identities or medical conditions of injured or missing
Speak only for the company, not contractors or clients	Don't guess about number of victims
Give a brief list of facts	Don't allow reporters or "sightseers" to wander around the scene
End interviews promptly after giving brief facts	Don't say anything you don't consider media material
Advise other employees to refer all inquiries to you	Remember that nothing is off the record
Set up a safe secure area where reporters can be briefed	

Ref: 192.615	Date Revised: Jan 2017

The company is committed to communicating in a clear, concise and timely manner by providing accurate and detailed information.

The news media can provide valuable assistance to the company and play an important public service role during an incident, conveying important information to the public through radio, television, the Internet, and print.

It is important to understand that the media operates independently; each news organization competes with other news organizations. Their p[primary concern is to get the story, not resolve the issue. The easier it is for them to get the story, the more favorable their coverage is likely to be. It is also important to note that news is about change and conflict, drama and emotion. Those elements make better stories. That is why the media will focus on the negative and the sensational. It is the communicator's job to deliver a succinct message of order and calm.

It is important to develop and maintain a good working relationship with the news media from the outset of any emergency. The manner in which both field and corporate personnel interface with reporters will affect the public perception of both the effectiveness of the response and the company. Always insist the media talk with the incident commander or assigned public information officer (PIC).

PREMLIMINARY MEDIA STATEMENT

Date: _____
Time:

My name is _____ (The company Job Title). At _____(time) on _____ (date) a_____ (nature of incident) occurred at (The company's) _____ (plant, well site, pipeline) located approximately ____ kilometers (east, west, sough, north) of_____ (nearest town or city).

The _____(plant, pipeline) has been shut down and isolated. The company has activated its emergency response plan to protect the public, our employees and the environment.

The cause of the _____ (nature of accident) is not yet known and we do not have an estimate of damage. A subsequent investigation will determine those facts.

I will release further information as it becomes available _____ at (field office).

Exhibit 4 – Emergency Response Tour Attendance

Central Valley Gas Storage

Southern Company Gas

Revised on: 12/7/16

Created on: 6/30/09

FORM OM100-20 – TRAINING OR SAFETY MEETING ATTENDANCE

Date(s): 12/7/16 **Trainer / Leader:** Mark Stephens

Title: Emergency Response Tour

Training Session

Course Title: Emergency Response Tour

Course ID: Emergency Response Tour

	Employee Name/Number (Print)		Phone Number	Code*	Signature
1	Mark Stephens	55470		P	Mark Stephens
2	Bill Wolf	44003		P	
3	Dennis Chappell	48536	530-777-8611	P	Dennis C. Chappell
4	James DeGroodt	43823		P	
5	Herb Lamphere - Dos Rios	48780		P	
6	Felecia Roe	44274	530.777.8165	P	Felecia Roe
7	Robert Cornell	37963		P	
8	Patrice Mbeukeu	54057		V	
9	Daniel Perez	43984		P	
10	DAN CRISTENSEN		530 228 2924		
11	SHANE ROACH		530-228-9232	CHP	
12	Moises Rodriguez		530-701-2469	Princeton Fire	
13	Rafael F Velazquez		530-624-4406	P. Fire	
14	Greg Hansen		755-5655	P Fire	
15	Jim Zoller		632-4992	P Fire	
17	JACK TRUSCHEL		916.323-1100	Dogger	
18	MATT COCHRANE		916.214-2033	Dogger	
19	MATHIEU FOURNIER		403-513-8600	Wild Goose	
20	GARY THIBERGE		403-863-8586	Wild Goose	

*Codes: P = Present; V = Vacation; S = Sick; W = Working; I = Off work due to injury/illness

Central Valley Gas Storage

Southern Company Gas

Revised on: 12/7/16

Created on: 6/30/09

FORM OM100-20 – TRAINING OR SAFETY MEETING ATTENDANCE

Date(s): 12/7/16 **Trainer / Leader:** Mark Stephens

Title: Emergency Response Tour

Training Session

Course Title: Emergency Response Tour

Course ID: Emergency Response Tour

	Employee Name/Number (Print)	Phone Number	Code*	Signature
1	Brent Hall 5000026	530-748-5500	Wild Goose	
2	Neil Pearson CCSO	530-458-0238		
3	MARK CONTRERAS CCSO	(530) 458-0200		
4	MATHEW PURCELL CCSO	(530) 458-0200		
5	KRIS COOPER CCSO	(530) 458 0200		
6	Cheri Erdelt CCSO	530-458-0233		
7	OGE ENMINWA	#15355564	CPUC	
8	Teresa Fung	916-324-9017	Dagger	
9	Donald Vitamura	(530) 458-0586	CC Air	
10	Kristen Simmons	(530) 4580733	Probation	
11	DAVE SALM	530-458-0545	Colusa DA	
12	Janice Bell	530-458-0218	County OES	
13	Kyle Noderer	916-709-5492	State OES	
14	Jeff Kenneth	530-682-2941	Public Health	
15	Connie Rios	530-458-0748	Public Health	
17	Ted Mamoulelis	530-458-0380	Public Health	
18	Ted Mamoulelis			
19	Denise Carter		Boarding Supe	
20	Mina Batros		CPUC	

*Codes: P = Present; V = Vacation; S = Sick; W = Working; I = Off work due to injury/illness

Rich Boyd Dagger

Exhibit 5 – Updated Control Room Notification Procedures (CVGS-JISH 02, 03, 05, 09 and 11)

Central Valley Gas Storage™
An AGL Resources Company

FORM OM2000-01 – SITE SPECIFIC PROCEDURE

Procedure Name: JISH Notification Procedure For Any Fire Dection Alarm while Monitoring CVGS

Procedure Number: CVGS-JISH 02 Page: 1 of 2

Date Initially Written: 2-13-14 Revision Date: 8/3/16

Reviewed By: Date:

Approved By: Date:

Purpose: Intended For JISH to Safely Notify Proper Personnel While Monitoring CVGS During a Fire Dection Alarm

Safety, Health and Environmental Considerations:

Tools Required:

#	ACTION	RESPONSE/REMARKS
1	While monitoring CVGS if Operator at JISH gets an Active Fire Detection alarm	They Shall Call Manager Mark Stephens (530)-491-8827 If Mark is unavailable Call on call operator
2	Statoion will ESD and Blow down plant to shut down Station	
2	If Fire is visable From cameras in facility	JISH Operator Shall Call Local Fire department Jim Zoller 530-632-4992
3	When Notified	CVGS personnel will take appropreat action to remedy the situation. Refer to CVGS SSP 049

Central Valley Gas Storage
An AGL Resources Company

FORM OM2000-01 – SITE SPECIFIC PROCEDURE

Procedure Name: JISH Notification Procedure For Any Gas Detection Alarm while Monitoring CVGS

Procedure Number: CVGS-JISH 03 Page: 1 of 1

Date Initially Written: 2-13-14 Revision Date: 8-3-16

Reviewed By: Date:

Approved By: Date:

Purpose: Intended For JISH to Safely Notify Proper Personnel While Monitoring CVGS During a Gas Detection Alarm

Safety, Health and Environmental Considerations:

Tools Required:

#	ACTION	RESPONSE/REMARKS
1	While monitoring CVGS if Operator at JISH gets an Active Gas Dection alarm	They Shall Call Manager Mark Stephens (530) 491-8827 If Mark is unavailable Call on call Operator
2	When on Site	CVGS personnel will take appropriate action to remedy the situation. Refer to CVGS SSP 049
3	Once CVGS facility is Back to Normal Operations	CVGS personnel and JISH personal will establish and disscus proper Hand off of facility
4		The Emergency Response plan can be found in JISH Operator Control Room

Central Valley Gas Storage™
An AGL Resources Company

FORM OM2000-01 – SITE SPECIFIC PROCEDURE

Procedure Name: JISH Notification Procedure For Line Break Logic while Monitoring CVGS

Procedure Number: CVGS-JISH 05 Page: 1 of 1

Date Initially Written: 2-13-14 Revision Date: 8-3-16

Reviewed By: Date:

Approved By: Date:

Purpose: Intended for JISH to Safely React to Line Break Logic while Monitoring CVGS

Safety, Health and Environmental Considerations:

Tools Required:

#	ACTION	RESPONSE/REMARKS
1	While monitoring CVGS if Operator at JISH gets a 401 Line break alarm	Call Mark Stephens (530) 491-8827 If no answer Call on Call Operator
2	Plant will PSD and shut down station	
3	CVGS personnel will take appropriate action to midigate the situation and refer to Emergency Response Plan	Once notified
4	CVGS personnel will Call JISH operator once its safe to do so	CVGS personnel and JISH personal will establish and discuss proper Hand off of facility

Central Valley Gas Storage™
An AGL Resources Company

FORM OM2000-01 – SITE SPECIFIC PROCEDURE

Procedure Name: JISH Notification Procedure For a Security Breach while Monitoring CVGS

Procedure Number: CVGS-JISH 09 Page: 1 of 1

Date Initially Written: 2-15-14 Revision Date: 8-3-16

Reviewed By: Date:

Approved By: Date:

Purpose: Intended for JISH to Safely React to a Security Breach while Monitoring CVGS

Safety, Health and Environmental Considerations:

Tools Required:

#	ACTION	RESPONSE/REMARKS
1	While monitoring CVGS if Operator at JISH incounters a security Breach	Call Colusa County Sheirff Department (530) 458-0200
2	Call Mark Stephens	(530) 491-8827
3	Operator at JISH shall try to collect as much information as they can with Video Cameras	
4	CVGS Personnel once on site will remedy the situation.	

Central Valley Gas Storage
An AGL Resources Company

FORM OM2000-01 – SITE SPECIFIC PROCEDURE

Procedure Name: JISH Notification Procedure For an ESD or PSD while Monitoring CVGS

Procedure Number: CVGS-JISH 11 Page: 1 of 1

Date Initially Written: 2-16-14 Revision Date: 8-3-16

Reviewed By: Date:

Approved By: Date:

Purpose: Intended for JISH to Safely React to an ESD or PSD while Monitoring CVGS

Safety, Health and Environmental Considerations:

Tools Required:

#	ACTION	RESPONSE/REMARKS
1	While monitoring CVGS if Operator at JISH gets an ESD or PSD	Call On call Operator
2	ON call Operator will Call Mark Stephens	(530) 491-8827
3	Once on site Operator will Take any Action to return Station back to normal operations	
4	Once back to normal operations	CVGS and JISH operator will discuss Shift hand off

Exhibit 6 – ESD Alarm Documentation

REMOTE CONTROL SHUT DOWN DEVICE TEST FORM

FORM 10.01A

DATE: _____
MO/DAY/YR

FREQUENCY OF SURVEY: _____

SYSTEM: _____

SIGNATURES:

COMPLETED BY: _____

SUPERVISOR: _____

DEVICE ID#:

UPON DEVICE ACTUATION: ❑ SYSTEM PHYSICALLY SHUTDOWN ❑ CIRCUIT CONTINUITY VERIFIED

SYSTEM FAILED, ACTION TAKEN: ❑ ALARM CONFIRMED WITH JISH

DEVICE ID#:

UPON DEVICE ACTUATION: ❑ SYSTEM PHYSICALLY SHUTDOWN ❑ CIRCUIT CONTINUITY VERIFIED

SYSTEM FAILED, ACTION TAKEN: ❑ ALARM CONFIRMED WITH JISH

DEVICE ID#:

UPON DEVICE ACTUATION: ❑ SYSTEM PHYSICALLY SHUTDOWN ❑ CIRCUIT CONTINUITY VERIFIED

SYSTEM FAILED, ACTION TAKEN: _____ ❑ ALARM CONFIRMED WITH JISH

DEVICE ID#:

UPON DEVICE ACTUATION: ❑ SYSTEM PHYSICALLY SHUTDOWN ❑ CIRCUIT CONTINUITY VERIFIED

SYSTEM FAILED, ACTION TAKEN: ❑ ALARM CONFIRMED WITH JISH

DEVICE ID#:

UPON DEVICE ACTUATION: ❑ SYSTEM PHYSICALLY SHUTDOWN ❑ CIRCUIT CONTINUITY VERIFIED

SYSTEM FAILED, ACTION TAKEN: ❑ ALARM CONFIRMED WITH JISH

Exhibit 7 – Updated Government Liaison Meeting Record

DOT Pipeline
Government Liaison Record of Meeting

Form #3.03A

Ref: 192.615, 195.402(e)(7) **Date Revised: Jan 2017**

This record is to document that the company has established and maintained liaison with the appropriate fire, police, and other public officials for the purpose of the following:

- **Learning the responsibility and resources of each government organization that may respond to a pipeline emergency**
- **Acquaint the officials with the company's ability in responding to a pipeline emergency;**
- **ID the types of pipeline emergencies of which the company notifies the officials; and**
- **Plan how the company and officials can engage in mutual assistance to minimize hazards to life or property.**

The Company will use the Incident Command System as a method for organization and interaction with the agencies during an actual emergency. The preferred method of review with public officials is face to face. [OPS interpretation letter, Feb. 4, 1993 and PHMSA advisory bulletin ADB-10-08]

Agency:

_____
(agency name)

_____
(street address)

_____
(city, state, zip)

_____
(phone #1)

Method of Delivery:

- ❑ Face to Face (preferred method)
- ❑ Left copy of Company DOT Emergency Plan and/or summary version covering objectives above
- ❑ **Copy mailed.**
- ❑ **Other (explain)**

Agency Contact:

_____
(print name)

_____
(title)

_____ _____
(signature) **(date)**

Company Representative:

_____
(print name)

_____
(title)

_____ _____
(signature) **(date)**

DOT Pipeline
Government Liaison Record of Meeting

Form #3.03A

Ref: 192.615, 195.402(e)(7)	Date Revised: Jan 2017

Liaison Record Meeting Check List	Checklist
Learning the responsibility and resources of each government organization that may respond to a pipeline emergency	☐
Acquaint the officials with the company's ability in responding to a pipeline emergency	☐
ID the types of pipeline emergencies of which the company notifies the officials	☐
Plan how the company and officials can engage in mutual assistance to minimize hazards to life or property	☐

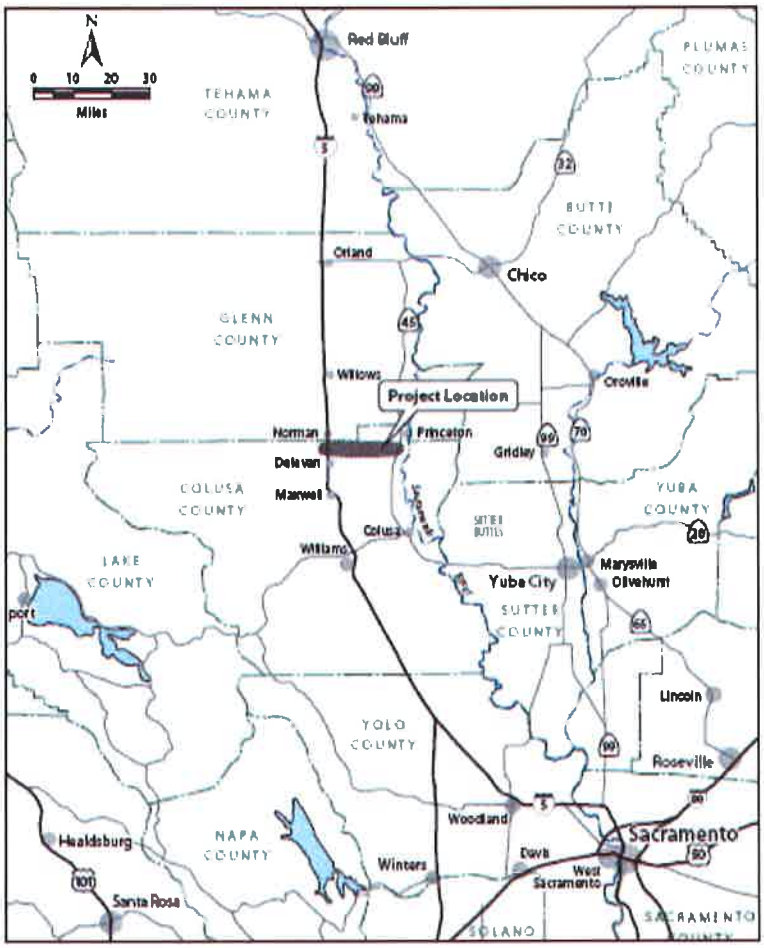
Specifics discussed and information obtained:

Exhibit 8 – Emergency Response Tour Presentation

Central Valley Gas Storage Overview

Central Valley Gas Storage, LLC (CVGS) obtained CPUC certification to convert the depleted Princeton Gas Field into a high-deliverability, multi-cycle storage field. The Princeton Field produced approximately 9.8 Bcf of gas between 1954 and 1992. Central Valley developed the field to provide up to 11 Bcf of working gas capacity. The field has a maximum withdrawal and injection capability of up to 300 million standard cubic feet per day (MMscfd).

CVGS is located near the unincorporated town of Princeton in Colusa County, California. The facility is located in a rural agricultural area, with historic and ongoing gas storage and delivery operations. The facility location is approximately 60 miles north and west of the City of Sacramento.



The CVGS facility consists of the following primary components.

- A 10,650 HP compressor station and associated facilities located on a 10-acre site.
- Eight injection/withdrawal wells at a single wellpad site.
- A 14.9-mile-long, 24-inch-diameter gas pipeline that connects the compressor station to PG&E Line 400/401 near Delevan CA
- Conversion of up to three existing wells and re-entry of one plugged gas well to convert to an observation well along with plans to drill one additional observation well.
- A salt water disposal well – will be surrendered and converted into an observation well in 2016
- A metering station located near PG&E Line 400/401.

Differences between CVGS and Aliso Canyon Leaking Well

	Aliso Canyon	CVGS
Discovery Date	1938	1953
First Storage	1973	2011
Depth in feet	7,170 - 10,692	1,980 - 2,600
Area	1,700 acres	580 acres
Maximum Pressure	3,045 psig	1,399 psig
Well Completion	Minimal Casing Cement	Cement to surface
Gas VolumeTotals	167.5 Bcf	12.3 Bcf
Working Gas Capacity	86 Bcf	11 Bcf
Maximum Rate	1.86 Bcf/d	300 MMcf/d
Wells		
Injection/Withdrawal	97	8
Observation	7	4

Additional Notes

Location

- Colusa County covers over 1100 square miles with an estimated 2014 population of just over 21,000. The county is agriculture based and sparsely populated.
- The closest residence to our facility is about 3/8 of a mile away and the nearest school is 1.81 miles away
- While gas was first discovered in Colusa County in 1953, CVGS's wells were not drilled and the facility was not put into operation until 2011. Unlike Aliso Canyon, the facility is not located in an active seismic zone
- In terms of footprint Aliso Canyon is almost 3 times the size of CVGS and stores a little over 13 times the amount of natural gas as CVGS.
- All of CVGS's Injection and Withdrawal wells are on the same well pad and are monitored with cameras and emergency shut down system

Geology

Because of the shallow nature of CVGS's depleted reservoir and the difference in overall size of CVGS's depleted reservoir, CVGS does not store as much gas and has significantly lower maximum operating pressures than Aliso Canyon.

Casing Cement

CVGS cemented the surface and production strings from the end of the string to the surface on all 8 of the injection/withdrawal wells drilled. The cement placement was confirmed by data logging after the cement was cured. The 4 wells converted from production to observation wells required some intervention work to meet CVGS's current integrity standards. In each observation well CVGS confirmed the quality of the casing and the placement of the original cement. From there, CVGS cemented new pipe in place (bottom to surface) in 3 of the wells and updated the tubing configuration in the fourth well.

Emissions

CVGS reports its GHG emissions annually to CPUC. If CVGS emits over 10,000 metric tons of CO_2e, then CVGS has to purchase offsets for those emissions. During the first two full years of operation (2013, 2014), CVGS emitted roughly 5,000 metric tons CO_2e each year; well below CVGS's threshold. In 2015 CVGS's emissions were just under 3,000 metric tons CO_2e.

Southern Company Gas

Central Valley Gas Storage
Princeton, CA

Storage Orientation and Tour
October 27, 2016

Southern Company Gas Overview

~5,000 Employees

1.2 Million Retail Customers

79,000 Miles of Pipe

Largest Natural Gas Utility by Customer Count
7 Local Distribution Utilities in 7 states
4.5 million Utility Customers

Seven Natural Gas Utilities

4.5 million customers in seven states

- Atlanta Gas Light (1.55 million)
- Chattanooga Gas (62,000)
- Elizabethtown Gas (273,000)
- Elkton Gas (6,000)
- Florida City Gas (106,000)
- Nicor Gas (2.2 million)
- Virginia Natural Gas (273,000)

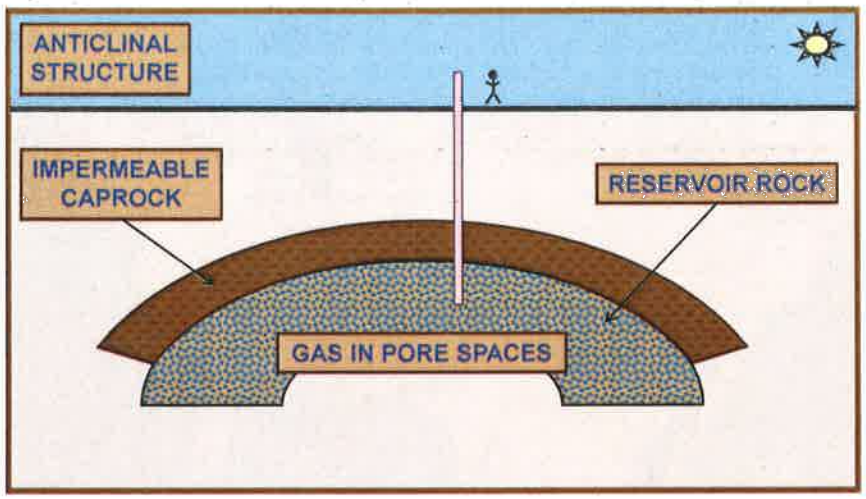
3

Gas Storage Basics

- Functions of Underground Gas Storage (UGS)
  - Transmission Load Stabilization
  - Peak Load Protection
  - Price Arbitrage
- How long has UGS been around?
  - First US Storage in 1916 – Zoar Field
  - Now over 350 fields in US and Canada
- Basic Requirements for an UGS Facility
  - Porous & Permeable Layer of Rock
  - Impermeable Cover or Confining Layer of Rock
  - Structural or Stratigraphic Confinement to Trap Gas
  - Wells to Communicate with the Storage Zone

4

Gas Storage Basics



5

Gas Storage Basics

- Types of UGS Fields
  - Depleted Oil & Gas Fields
  - Developed Aquifers
  - Solution Mined Salt Caverns
    - Domal
    - Inter-Bedded
  - Mined Caverns
- Where are UGS Fields Located
  - Depleted Fields – throughout production areas across country
  - Aquifers – mostly mid-continent
  - Salt – mostly along the Gulf Coast, some mid-continent & northeast

6

SCG's Gas Storage Facilities

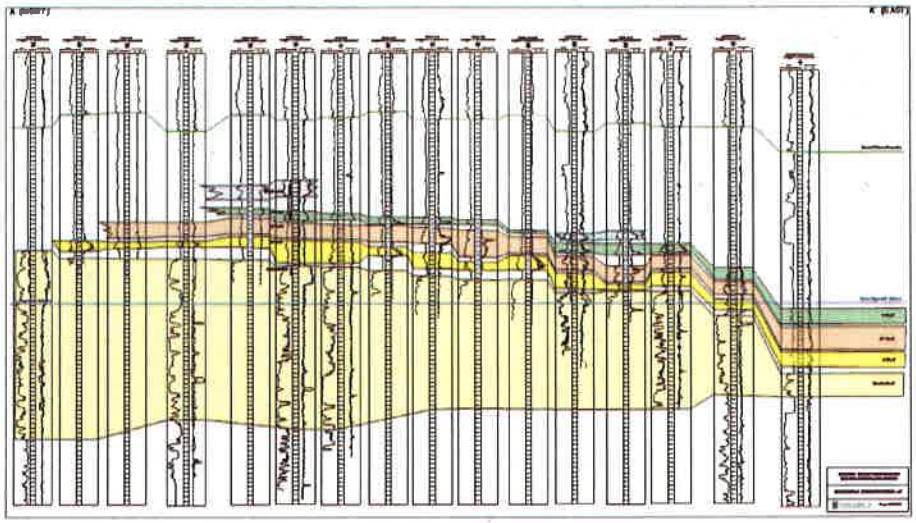
7

SCG's Gas Storage Facilities

- Pivotal Midstream – Depleted Reservoir Storage
  - Central Valley Gas Storage near Princeton, CA – 10 Bcf working gas capacity developed in 2011
    - 8 working storage wells / 5 observation wells / Storage zone depths from 1,980' to 2,600' ft
    - Formerly a producing gas field between 1953 and 1980's.
    - About 80 miles north of Sacramento
- Nicor Gas (Gas Distribution Business) – Aquifer Storage
  - Eight distinct reservoirs in Central Illinois w/ 140 Bcf working storage capacity
  - All reservoirs are water aquifers – naturally occurring rock formations originally filled with water
  - Fields were developed between 1957 and 1977.
  - Currently have 376 working storage wells
  - All wells were drilled and completed with gas storage in mind (not converted from other uses)
- Pivotal Midstream – Salt Cavern Storage
  - Golden Triangle Storage in Beaumont, TX – Two caverns / 13 Bcf working gas capacity in total
    - Each cavern has a single well
  - Jefferson Island Gas Storage, Delcambre, LA – Two caverns / 6 Bcf working capacity in total
    - Each cavern has a single well

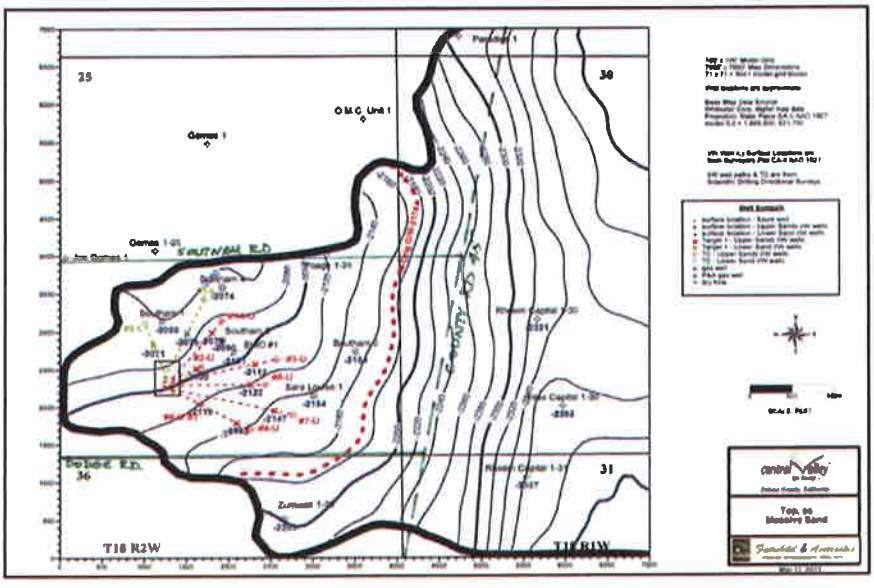
8

CVGS – Structural Cross-section



9

CVGS – Massive top of Structure



0

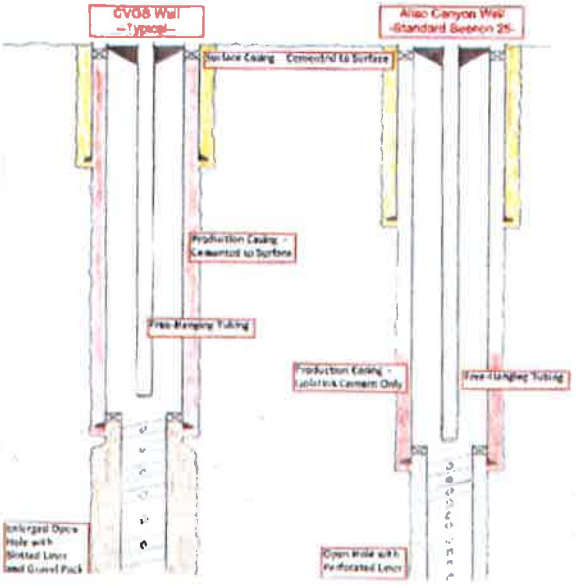
Aliso Canyon vs. CVGS

- How are we different?
  - Casing exteriors above storage zones are completely cemented / no gaps
  - Not in an active seismic zone
  - All operating wells are new (drilled 2011)
  - Much smaller reservoir – 9 Bcf vs. 86 Bcf
  - Much shallower depths (1,900 to ~2,600 ft)
  - Lower operating pressure (1,490 psi vs. 3,000 psi)
  - Much more rural than Aliso Canyon
  - We log every well annually to confirm no downhole leaks
  - Assets are **not** part of a traditional utility rate base
- How are we the same?
  - Depleted production field means there are old production wells within our footprint
    - 4 old production wells converted to observation wells
      - Wells were logged and recompleted to re-establish integrity
    - 4 plugged and abandoned wells within reservoir footprint
  - Wells do not have downhole safety valves
  - Gas stored at CVGS **is** odorized

Typical Central Valley Gas Storage well

11

CVGS – Typical Wellbore



12

CVGS – Current Priorities

- Review public records for plugged / abandoned wells within the CVGS footprint
  - How were the abandoned wells reconfigured to assure safe retirement?
  - Based on abandonment records, were they plugged in a manner that minimizes the potential of an Aliso Canyon-type event (uncontrollable)?
    - Yes, with one exception and that well appears to be just beyond our reservoir footprint, though close enough that this bears further review.
- Find old well locations and conduct on-site leak assessment
  - Flooded rice fields – visual via bubbling
  - Drained rice fields and orchards – check for evidence of leaks via gas detectors
  - Requires cooperation from local farmers
  - Compile plan for how we would access them to repair, if need be
    - Planned / preventative event as well as unplanned / emergency event
- Create internal team to coordinate our strategy with respect to tracking emerging regulations

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CVGS – Community Outreach Activities

- Annually meet with the Princeton and Maxwell fire Departments to review station facilities and response needs
- Annually meet with the Princeton school district administration to discuss issues and concerns. Advising them on establishing response and evacuation protocols
- Internal response protocols include notifications to local Emergency Management Agencies, Sheriff, CPUC, DOGGR, Fire Departments
- Post public service pipeline safety announcements annually in Colusa
- Sponsor "Concert in the Park" annually in Colusa
- Registered on the USA One Call system and participate in local public safety educational opportunities

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Central Valley Gas Storage

Questions?

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Exhibit 9 – Updated After-hours Answering Service Script

8668488692

Dashboard

Messages

Contacts

Call Flow

Script

Profile

Agent View

Billing

Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0

TOTAL MINUTES

0

TOTAL CALLS

This field is disabled

Note : Data as of 15th January

Call Types

Gas Odor

I'd be happy to assist you with that.

Is the odor inside or outside of a structure?

Odor location

Select...

How severe in your estimation is this situation

Issue Severity

Are there any structures effected?

Structures Effected?

Select...

Can you please describe the location where you smell gas ?

Location

Does there appear to be any emergency personnel on site?

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Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0
TOTAL CALLS

0
TOTAL MINUTES

Emergency Personnel onsite?

Select...

Note : Data as of 15th January

Does there appear to be people there that do not belong?

Calls — Minutes

Are there people that do not belong?

Do you have an estimate of how long the problem has existed?

0.8
How long has problem existed?

Is there a traffic situation in the area involved?

0.6
Is there a traffic situation?

No calls for the m

Thanks! I'll pass on the information. One of our representatives will call you back.

What is your location pleasc?

0.7
Location

How can our operations staff contact you if they have any follow-up questions?

0
Additional inforamation.

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Dashboard

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Call Flow

Script

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Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

What is your location please?

Note : Dallas of 15th January

Location *

Calls — Minutes

How can our operations staff contact you if they have any follow-up questions?

Additional inforamation.

Is there any other information that might be helpful?

TYFC. Have a great day!

Disconnect the call

No calls for the m

Dial and Relay the Message to Bill Wolf @ 530-722-7806

If not available leave a detailed VM with the below script.

This is _____ with your answering service. We've received a call about Gas Odor. Please check your email for details regarding the c

Was the message LIVE relayed?

- If Yes
- If No

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Dashboard

Messages

Contacts

Call Flow

Script

Profile

Agent View

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Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0

TOTAL MINUTES

Name 0

This field is disabled

Note : Dates as of 15th January

Call Types

Gas Blowing (Hissing Sound)

Was there an explosion?

0.8

Was there an explosion?

Select...

Is there a fire?

Select...

What is your location please?

Location of caller

Have you called 811 for excavators - USA North"?

Is there a fire?

Caller called USA North?

Select...

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Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0

0

How severe in your estimation is this situation?

Note : Issue Severity

Are there any structures effected?

1

Effected Structures?

Are there any structures effected?

Drop Down

Select...

0.6

Emergency Personnel on site?

Select...

No calls for the m

Does there appear to be people there that do not belong?

0.4

Are there people that do not belong?

Do you have an estimate of how long the problem has existed?

How long has the problem existed?

Is there a traffic situation in the area involved?

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Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0
TOTAL CALLS

0
TOTAL MINUTES

Is there a traffic situation?

Note : Data as of 15th January

Is there any other information that might be helpful?

Calls — Minutes

Additional information

"I will contact our operations staff and they will contact you, but in the meantime please call USA North.

Does there appear to be any emergency personnel on site?

Thanks! I'll pass on the information. TYFC. Have a great day!

Disconnect the call

No calls for the m

0.4 **Dial and Relay the Message to Dennis Chappel @ 530-777-8611**

If not available leave a detailed VM with the below script

This is _____ with your answering service. We've received a call about Pipeline locations. Please check your email for details regard

Was the message LIVE relayed?

If Yes

If No

0

1

8668488692

Dashboard

Messages

Contacts

Call Flow

Script

Profile

Agent View

Billing

Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0	0
TOTAL CALLS	TOTAL MINUTES

May I have your Name and Callback number just in case we get disconnected.

Note : Data as of 15th January

Name

This field is disabled

Phone

This field is disabled

Call Types

Safety or Security Concerns

I'd be happy to assist you with that.

Can you tell me what you are seeing ?

No calls for the m

Description Of Issue

What is your location please?

Location of caller

Does this appear to be an immediate safety risk or concern ?

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Dashboard

Messages

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Call Flow

Script

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Agent View

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Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

Does this appear to be an immediate safety risk or concern ?

0

TOTAL CALLS

0

TOTAL MINUTES

Is it immediate safety risk or concern?

Select...

Note : January

If Yes, Have you contacted the authorities ?

Select... Minutes

Are there any structures effected?

Structure effected?

Select...

0.8

Does there appear to be any emergency personnel on site?

Emergency Personnel Onsite?

0.

Select...

Does there appear to be people there that do not belong?

Are there persons that do not belong?

0.4

Do you have an estimate of how long the problem has existed?

0.2

How long has the problem existed?

Is there a traffic situation in the area involved?

Is there a traffic situation?

1

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Reports [beta]

Settings

Call script (866) 848-8692

Month: Jan-2017

Welcome Greeting: TYFC Central Valley G

0

TOTAL MINUTES

Is there a traffic situation in the area involved?

Is there a traffic situation?

Is there any other information that might be helpful?

Additional information

How can we contact you?

How to contact

Select...

No calls for the m

Thanks !I'll contact our operations representative and pass on the information.

TYFC. Have a Great day !

Disconnect the call

Dial and Relay the Message to Bill Wolf @ 530-722-7806

If not available leave a detailed VM with the below script