



# CMOM Annual Report 2021



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## **Capacity, Management, Operations and Maintenance (CMOM) Plan Overview**

In accordance with National Pollutant Discharge Elimination System (NPDES) Permit No. NM0022250 (Permit), the Albuquerque Bernalillo County Water Utility Authority (Water Authority) prepared this Capacity, Management, Operations and Maintenance (CMOM) Plan. The Permit was renewed in CY2019 with an effective date of December 1, 2019.

The CMOM Plan consists of the following documents:

1. FOG Policy
2. CMOM Annual Report
3. CMOM Program Self-Assessment

The CY2021 CMOM Annual Report follows previous FY2013-17 and CY2017-20 reports. The previous reports, as well as the most recent, can be accessed at <https://www.abcwua.org/sewer-system-overview/>.

Appendix 5 provides a summary of goals established in this CY2021 CMOM Report.

### **Report Purpose**

As indicated by its name, the CMOM Annual Report will be reissued to describe CMOM activities in the previous calendar year (January 1 to December 31). The CMOM Annual Report provides summary descriptions of CMOM activities (past and planned) and is intended to be a communication tool. The report is intended for Water Authority staff, regulatory authorities, customers, and the general public.

## Permit Requirements

The Water Authority discharges to the Rio Grande under authority of NPDES Permit No. NM0022250 (Permit). Under this Permit, the Water Authority operates the Southside Water Reclamation Plant (SWRP) and the Collection System.

The Permit was renewed effective December 1, 2019. The following are the Permit requirements that impact the collection system.

1. The Water Authority shall report all overflows with a (monthly) Discharge Monitoring Report (DMR). (Part I, Paragraph D).
2. Overflow reporting requirements were unchanged for EPA and NMED. (Part I, Paragraph D).
3. Overflow reporting requirements were modified for spills impacting the Pueblo of Isleta (POI) were modified in accordance with the “Pueblo of Isleta Reporting Requirement” which were a subsection of the renewed Permit. (Part I, Paragraph D and “Pueblo of Isleta Reporting Requirement”.)
4. The Water Authority shall continue to implement and update (if necessary) the CMOM plan. (Part II, Paragraph E.)

The full permit is available at

<https://cloud.env.nm.gov/water/pages/view.php?ref=6881&k=fd428af5b1>

## CMOM Program Self-Assessment

EPA states (see [https://mwrld.org/sites/default/files/documents/USEPA\\_3-cmomselfreview.pdf](https://mwrld.org/sites/default/files/documents/USEPA_3-cmomselfreview.pdf)): “An important component of a successful CMOM program is to periodically collect information on current systems and activities and develop a “snapshot-in-time” analysis. From this analysis, the utility establishes its performance goals and plans its CMOM program activities.” The Water Authority developed Self-Assessments as a part of the FY2013 and FY2014 reports. Because the data provided in the Self-Assessment does not significantly change year-to-year, the Water Authority has set a goal of updating the Self-Assessment every five years.

Therefore, the CMOM Program Self-Assessment CY2018 has been prepared and posted to <https://www.abcwua.org/sewer-system-overview/> along with the CMOM Reports. Rather than being an appendix to the CMOM Report, it is now a stand-alone document.

The next update will coincide with the CY2023 CMOM Report.

## FOG Policy

The Water Authority's FOG Policy is a separate document. The FOG Policy was developed as a requirement of the NPDES Permit effective on October 1, 2012 and subsequently approved by the United States Environmental Protection Agency (EPA). The policy was developed to work in conjunction with the Water Authority Sewer Use and Wastewater Control Ordinance (SUO) and Enforcement Response Plan (ERP) to reduce the rate of SSOs in the collection system and decrease FOG loading at the SWRP. The policy describes expectations for FOG dischargers such as Food Service Establishments (FSEs) and waste haulers, and the steps the Water Authority is taking to mitigate FOG.

The new NPDES Permit was effective December 01, 2019, allowing for an update to the Industrial Pretreatment Program. This update started with an amendment to the SUO, board approved on July 05, 2021. This amendment updated the FOG section to include solids and standardize the terminology to match plumbing code and industry standards and include Hydromechanical Grease Interceptor exclusions to the 25% rule. Fats, Oils, and Grease (FOG) is now Fats Oils, Grease and Solids (FOGS). Grease Removal Systems (GRS) are now referred to as Grease Interceptors (GI). HGIs being more efficient GIs are allowed to hold up to 50% grease and solids. The FOGS Policy and ERP are currently under revision to reflect SUO changes and bolster both documents.

The FOG Policy sets a Water Authority goal of inspecting every FSE at least once every three years. Details of what is expected of the FSE in terms of Grease Removal System (GRS) functionality, pumping schedule, maintenance, and recordkeeping are identified. The FOG policy explains the Water Authority use of the 25% solids and grease rule (25 Percent Rule) to determine if a GRS is filled to capacity. The policy also contains Best Management Practices (BMPs) such as scraping plates, using screens, and not using emulsifiers, etc.

Pumper requirements are also covered in the FOG Policy. Full evacuation of a GRS is required each time pumping occurs. The pumper must leave the FSE documentation in the form of manifests that contain pertinent information such as date, time, volume pumped, and the condition of the GRS. The FOG Policy lists the minimum service to be provided by the pumper.

Enforcement of FOG violations and hauled wastewater violations is described in the FOG Policy. The FOG Policy works in conjunction with the ERP to set administrative assessments for violations.

The FOG Policy also sets forth the process for identifying new sources of FOG. The Water Authority Pretreatment Program will update the FOG database on an annual basis. The FOG Policy sets a goal that the Water Authority will meet with the City of Albuquerque, Bernalillo County, the Village of Los Ranchos, the Village of Corrales, plumbers, and the New Mexico Restaurant Association on a periodic basis to discuss FOG issues.

In developing the FOG Policy, the Water Authority held a meeting with the hauled wastewater permit holders on July 22, 2013 and a public meeting on July 25, 2013 to discuss the proposed Policy. The final FOG Policy was submitted to the EPA on September 27, 2013 and updated in the Pretreatment Program modification documents sent to EPA on June 2, 2014. No comments from EPA were received regarding either submission, thus indicating approval. The [Sewer Use and Wastewater Control Ordinance](#) was updated and approved by the Board in July 2021. The Pretreatment Program documents including the FOGS and Enforcement Policies have been

revised to match the Ordinance updates and are expected to be submitted to EPA for approval once the legal review is complete, by December 2022.

### **FOG Enforcement**

In CY2021, the Water Authority Pretreatment Program had 1,718 compliant FSEs out of 2,135 FSE sites for a compliance rate of 80%. Three hundred-sixty-seven (367) FSE inspections were conducted with 222 passing, and 145 failing. Of the 145 failed inspections, 77 Notices of Violation were issued. Thirty-three (33) of the 77 violations were resolved and the remainder are outstanding.

In response to SSOs, twelve (12) FSE inspections were conducted with five (5) passing and seven (7) failing. Of the seven (7) failed inspections, zero (0) Notice of Violations were issued and all were corrected before issuance of violations.

In addition, Water Authority Pretreatment personnel distributed FOG brochures to FSEs, single-family residences and apartment complexes upstream of the SSOs.

Additionally, the Water Authority's Public Information Office advanced radio, print and television public outreach for the purpose of improving the Water Authority's FOG Policy.

## SSO Analyses

### Permit Requirements

The Permit requires a CMOM Plan. The Plan goal is to reduce SSOs. The FOG Policy states that the Pretreatment Program will investigate all SSOs related to large amounts of grease. The policy is to take enforcement actions for violations of FOG requirements with priority on FSEs causing repeat SSOs.

### SSO Study Team

To meet these requirements, the Water Authority created an SSO Study Team. The Team is comprised of:

1. Collection Section – Research Analyst (team lead), Gravity Superintendent, Assistant Superintendent and Closed Circuit Television (CCTV) Supervisor;
2. NPDES Pretreatment –Industrial Pretreatment Engineer and Pollution Prevention Specialist.

The Mission Statement for the Study Team is: *The SSO Study Team will work inter-divisionally to study, analyze and determine causes of previous SSOs to mitigate future SSOs in the Collection System.*

The Study Team procedure is:

1. Tabulate all 10-40s, 10-42s and 10-48s (see Table 1 for definitions).
2. Ensure all segments responsible for causing 10-42s and 10-48s are televised.
3. The Research Analyst will review and analyze all CCTV inspections to determine causes (if possible) and document findings.
4. To conduct meetings with the SSO Study Team to review and analyze CCTV that needs further investigation for resolution.
5. Recommend/implement and document mitigations (if possible) based on analysis.
6. Coordinate with NPDES Pretreatment concerning grease issues discovered during analysis.

**Table 1 Sewer Trouble Definitions**

<b>Sewer Trouble Definitions</b>		
10-40	Sewer Backup	A gravity line blockage that does not result in a spill, or in the vacuum system, a low vacuum (low vac) that causes a customer service disruption. Does not result in an SSO Reportable (10-42) or a Property Damage (10-48).
10-42	SSO Reportable	An overflow of sewage from the system that may impact surface waters. These are reported to the EPA and other locally impacted stakeholders.
10-48	Property Damage	An overflow of sewage from the system that results in damage to private property. These are not reportable under current definitions.

Appendix 1 identifies all 10-42s and 10-48s, and the overflows that resulted in both a 10-42 and a 10-48. When documenting the number of Sewer Troubles of different types, for example in Figure 1 and Figure 2, the 10-42 item includes all overflows that may impact surface waters, including those that also had property damage; the 10-48 item includes overflows that only resulted in property damage. This prevents double-counting the number of overflow occurrences.

All 10-40s, 42s and 48s were CCTV inspected, although only 10-42s are “reportable”, i.e., required to be reported to the EPA, et al. All 10-42s and 48s were then examined by the Study Team and a Cause and Mitigation were determined.

**Table 2 Types of Causes for SSOs**

<b>Cause(s) of SSO from DMR</b>		<b>Causes determined from CCTV</b>
<b>CO</b> - Construction	<b>DB</b> - Debris	<b>SC</b> - Surcharged
<b>CU</b> -Cause Unknown	<b>RK</b> -Rocks	<b>SL</b> - Sag in Line
<b>EQ</b> - Equipment Failure	<b>GR</b> - Grease	<b>IT</b> - Intruding Tap
<b>SGG</b> -Sand, grit or gravel	<b>RT</b> - Roots	<b>MH</b> - Manhole
<b>LF</b> - Line Failure	<b>RN</b> - Rainfall	<b>OJ</b> - Offset Joint
<b>V</b> - Vandalism	<b>RGS</b> -Rags	
<b>RGR</b> - Roots / Grease	<b>BP</b> -Burped	



## Causes & Mitigations

The Cause(s) were selected from Table 2 that identifies SSO causes from the DMR and CCTV. The monthly SSO DMR has a specific list of Causes that are based on system observations made by an Operator or Supervisor at the site of an SSO. The CCTV data provided to the Study Team often results in a different, more refined Cause or Causes. Table 3 provides the causes determined by the Study team for CY2021. (Note: Percentages may not add up to 100%, as they are rounded to the nearest percent.)

**Table 3 Summary of Causes from SSO Study**

<b>10-42,10-48 Causes</b>	<b>Total</b>	<b>% of Total</b>
Burp	2	11%
Construction	0	0%
Debris	0	0%
Grease	2	11%
Grease/Rags	2	11%
Grease/Sag in Line	0	0%
Line Failure	1	6%
Manhole	1	6%
Roots/Grease	1	6%
Roots	4	22%
Sag in Line	2	11%
Vandalism	1	6%
Equipment Failure	2	11%
<b>Grand Total</b>	<b>18</b>	<b>100%</b>

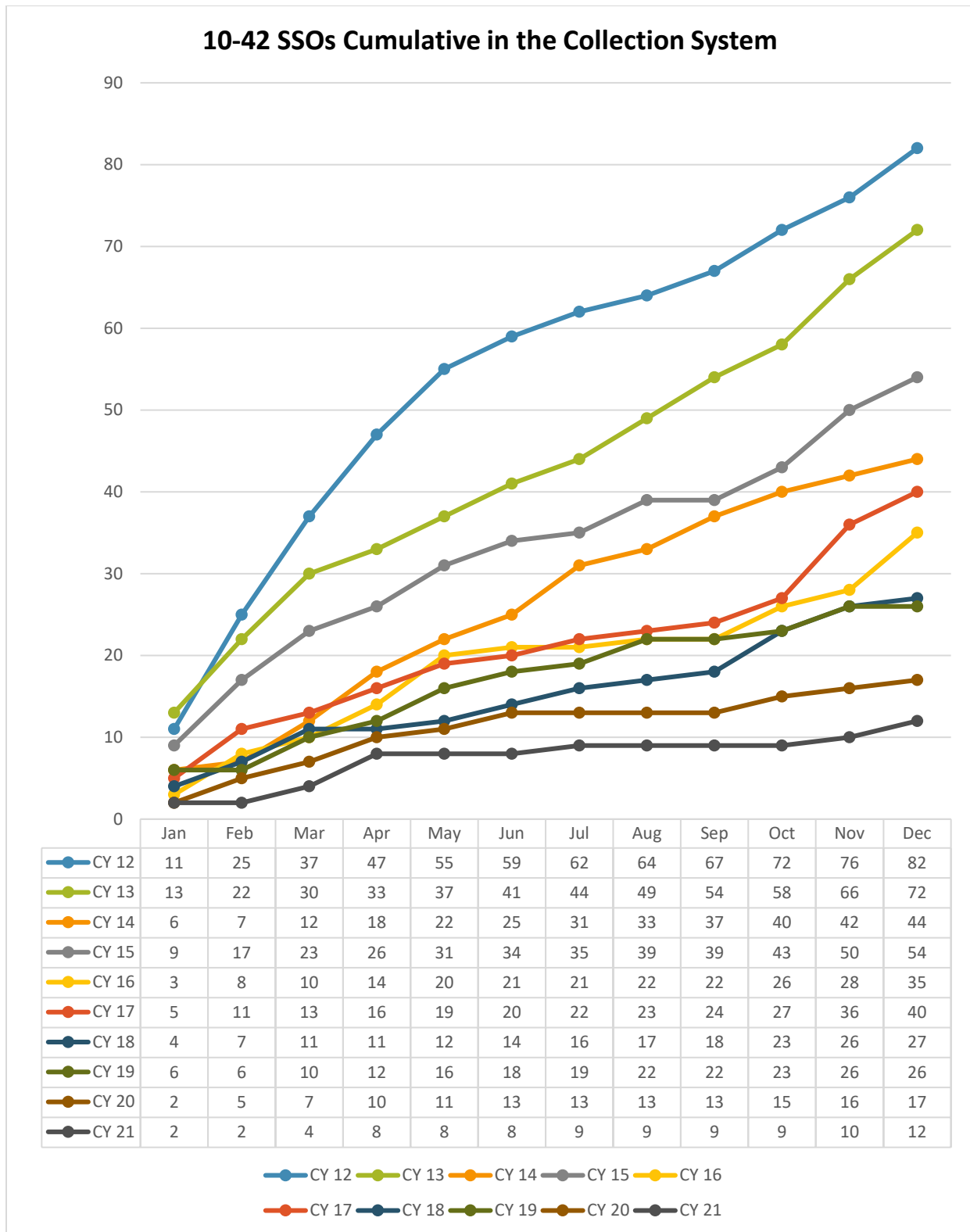
Mitigations are the steps that the Team identified to prevent a recurrence of an SSO, at least for the identified Cause. Specific Mitigations are very dependent on the conditions observed from the CCTV video and report. This indicates the condition of infrastructure where SSOs are occurring. Table 4 provides a summary of the various Mitigations. The Mitigations are tracked through completion or implementation. (Note: Percentages may not add up to 100%, as they are rounded to the nearest percent.)

**Table 4 Summary Mitigations from SSO Study**

<b>10-42, 10-48 Mitigations</b>	<b>Total</b>	<b>% of Total</b>
No Follow Up Needed	1	6%
Pretreatment Notified/Short Interval	1	6%
Rehab/Replace	4	22%
Short Interval	5	28%
Short Interval/Rehab/Replace	1	6%
Short Interval/Special Instructions	4	22%
Special Instructions	2	11%
<b>Grand Total</b>	<b>18</b>	<b>100%</b>

## SSO Tabulation & Analysis

Figure 1 shows the cumulative 10-42s by month for CY2012-21.



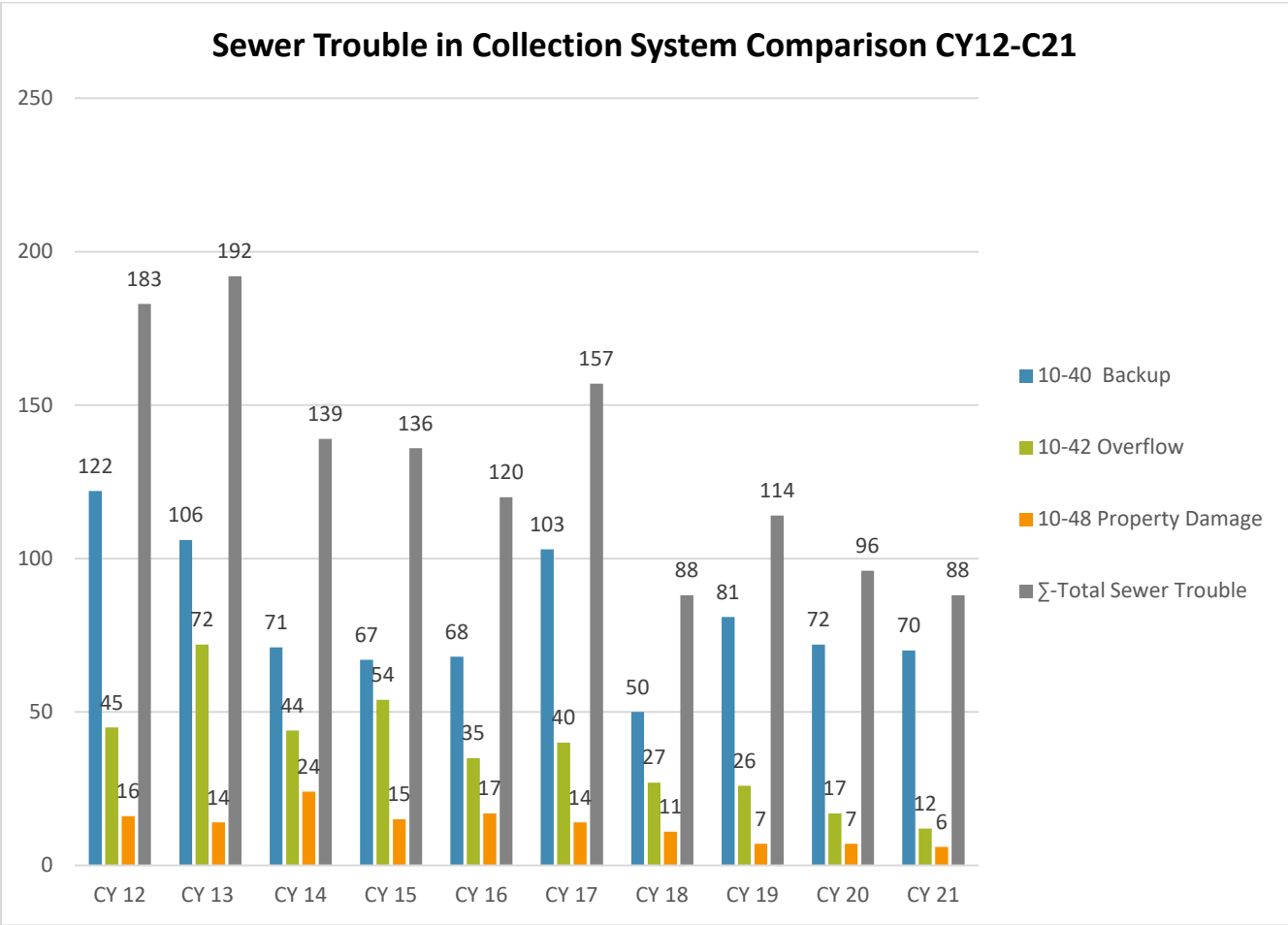
**Figure 1 Reportable SSOs**

Appendix 1 contains a list of every 10-42 and 10-48 event in CY2021. The table columns are grouped as follows:

1. The type, i.e., 10-42 or -48, is identified on the left. In one case a single event was both a 10-42 and a 10-48, as indicated.
2. Next to the right are the data included in the monthly SSO DMRs. It is noted that a “Reported Cause” is listed. This is typically based on the observations of the Operator that reported the SSO.
3. Next to the right is data determined by the Study Team:
  - a. Cause
  - b. Mitigation
  - c. If Pretreatment follow-up is necessary
4. To the far right are follow-ups by NPDES Pretreatment
  - a. FSEs visited
  - b. Notice of Violation issued

The SSO Rate is defined as 100 times the number of SSOs in a year divided by the miles of sewer in the system. The Water Authority system has a total of approximately 2,414 miles of line (p. 8 of the Self-Assessment). The SSO rate is therefore 3.4, 3.0, 1.8, 2.2, 1.4, 1.7, 1.1, 1.1, 0.7 and 0.5 for CY2012-21 respectively.

Figure 2 shows the total sewer troubles, i.e. 10-40s, -42s, and -48s by year for CY2012-21. This graph does not include 10-48s due to “burps” which are not due to a blockage or other failure resulting in the overflow of sewage. Instead, air displaced during the Vactor jetting cleaning can under certain circumstances force out the water in the home fixture P-traps, e.g. toilets and sinks. These sometimes result in claims and are therefore included in the Property Damage totals for completeness and consistency. There were only two burps during CY 2021. These burps are identified in Appendix 1.



**Figure 2 Sewer Trouble Comparison**

**Volume Spilled and Recovered**

Via the OERP, the Water Authority has implemented a policy of capturing spills and documenting actions. Appendix 1 provides the Ultimate Discharge Location for each reported SSO. Appendix 2 provides estimated spill volumes and volumes recovered for 12 reported SSOs for CY2021. Of the spill volume estimated not to be recovered, none were identified as directly reaching the Rio Grande. No spills reached a facility operated by the MRGCD. It was estimated that approximately 83% of the estimated spill volume was recovered in CY2021 as shown in Appendix 2.

## Actions Implemented and On-Going Programs

### General

Below are gaps that were identified in the CY2020 CMOM Report and were closed in CY2021, or are on-going programs, or both. In addition to the commitments made in the CMOM Report, in CY2021, the following additional actions were taken to expand the Water Authority's ability to operate and maintain the system.

1. Interceptor manhole inspection was performed on 260 additional manholes for a total of 360 manholes inspected from CY2020 and CY2021. The data is being used for an Interceptor Manhole Asset Management Plan to determine which manholes should be prioritized for rehabilitation or replacement.
2. The Water Authority updated the public website (<https://www.abcwua.org/sewer-collection-section/>) to provide more information about the Collection Section and make the website more user friendly. The "Keeping Elephants Out of Sewer Game," created by Stephanie Ramsey, Ph. D., was added to the website as a tool to teach the public how to prevent SSOs.
3. The Water Authority's Public Affairs section continued to support SSO prevention efforts and the FOG Policy in CY2021. Appendix 3 identifies media specifics for water bill inserts, social media, and advertising in television, radio, newspaper, outdoor boards, and digital.
4. On April 7, 2021, Collection Section staff met virtually with the North and South Divisions of LA Sanitation and Environment - Clean Water Conveyance. During the meeting, operating and management staff discussed cleaning methods and working in traffic conditions.

## **FOG Policy Implementation**

The FOG Policy is an on-going program and FOG Enforcement efforts are a part of this program. Both the FOG Policy and the FOG Enforcement efforts are described above. On-going efforts are described in the FOG Enforcement section and not reiterated here.

The Water Authority has long had an FSE flier in English. An FSE flier in Spanish was developed and implemented in CY2019 and a goal was set to develop an FSE flier in Chinese. However, it was determined that a Vietnamese flier was more prudent and this was developed in CY2020. The Water Authority has a three-year plan to distribute these fliers to all FSEs and residential units during SSO investigations to continually improve education to the rate payers on the negative impacts of FOG. In CY2022, improve FOG inspections by using advance inspection tools.

## **Overflow Emergency Response Plan (OERP)**

This is an on-going program to update the OERP as required. In CY2020 and CY2021, no modifications were made were made to the OERP.

The Collection Section is the “owner” of the OERP. The Collection Section creates the components of the OERP, routes for internal review (specifically including the Compliance Division), and the completed portions are approved for posting to SharePoint by the Collection Section Manager. Appendix 4 provides the OERP which was in effect at the end of CY2019. The most current version of the OERP is posted to [http://www.abcwua.org/Sewer\\_System.aspx](http://www.abcwua.org/Sewer_System.aspx)

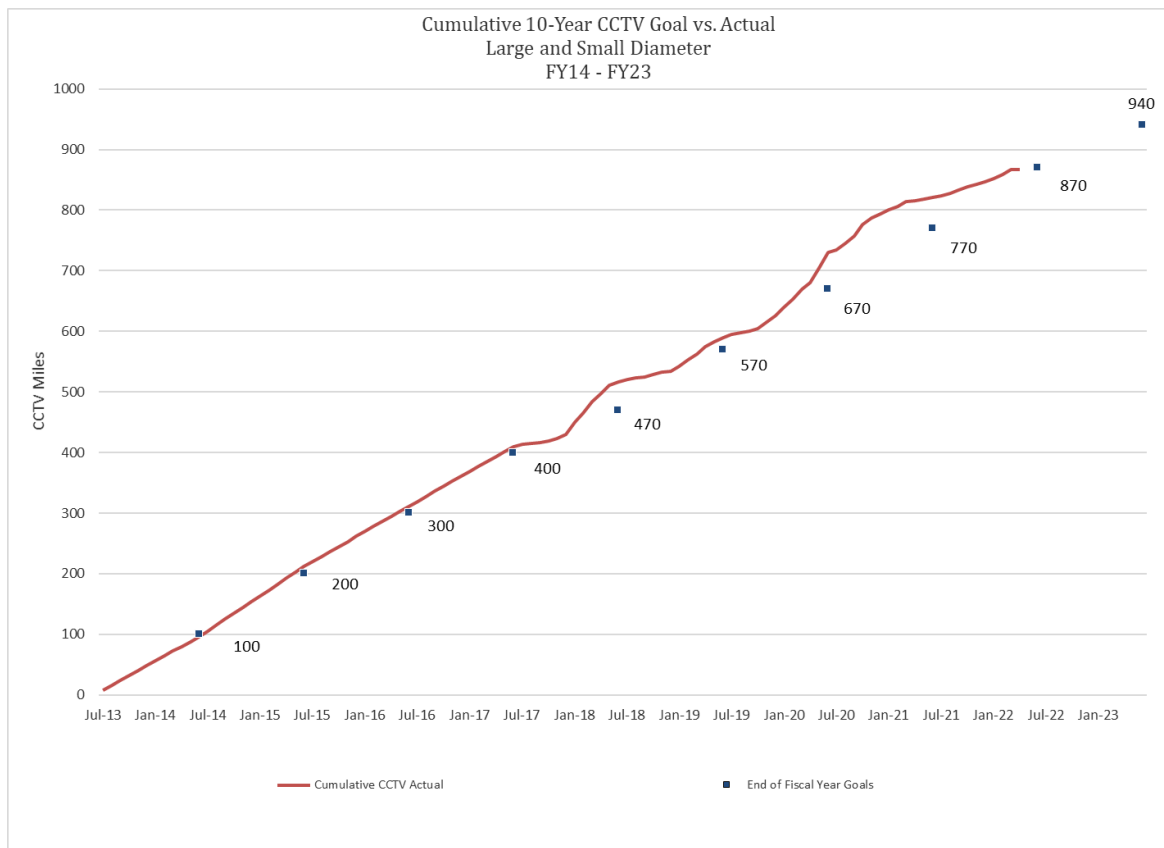
The Albuquerque Metropolitan Arroyo Flood Control Authority (AMAFCA) and the Water Authority continued coordination in 2021. On April 4, 2021, both organizations participated in a virtual brainstorming meeting. Discussion included improvements in capturing and removing spills prior to reaching the Rio Grande.

## Closed Circuit Television (CCTV)

This is an on-going program. The following recommendation is made in the FY2013 CMOM Report: “CCTV inspections of the collection system as follows: 1) Small diameter main lines less than 15”: In four of five years, televise approximately 5% per year of the small diameter system. Televise high risk lines based on current Asset Management Plan and subsequent in-house analysis. 2) Large diameter lines 15” and larger: Every fifth year, televise as much as possible acknowledging access limitations of the unlined concrete lines 15” and larger. Anticipated schedule: 3) FY2014-17: 5% of the small diameter each year. 2) FY18: Large diameter unlined concrete pipe.”

CMOM Report figures for cleaning and CCTV will continue showing fiscal year (FY) goals in accordance with funding and contracting cycles and actual metrics will reflect work through the end of the calendar year (CY). Figure 3 provides the CCTV goal for a ten-year basis and the actual CCTV inspection through CY2021. The CY2021 portion of this recommendation is complete. The CCTV program will continue. Anticipated schedule:

1. FY21: 5% of the small diameter.
2. FY22: 5% of the small diameter.
3. FY23: Large diameter unlined concrete pipe.
4. FY24: 5% of the small diameter.
5. FY25: 5% of the small diameter.
6. FY26: 5% of the small diameter.



**Figure 3 Small Diameter Sewer CCTVed vs. Ten-Year Goal**

## Cleaning Program Goal

This is an on-going program. The following recommendation is made in the FY2013 CMOM Report: “The Water Authority will establish and monitor a goal of cleaning all gravity small diameter lines every ten years. (This will be accomplished through the existing Sub-Basin program.) The Water Authority will continue the program of high-frequency maintenance of known problem locations within the system. (This will be accomplished through the existing Short Interval program.) The frequency of Short Interval cleaning will vary in accordance with system performance and risk factors, maintenance history, and the latest maintenance findings.”

CMOM Report figures for cleaning and CCTV will continue showing fiscal year (FY) goals in accordance with funding and contracting cycles and actual metrics will reflect work through the end of the calendar year (CY). As shown Figure 4, the Water Authority is ahead of its goal to clean then entire system once in ten years through the Sub-Basin program.

The Water Authority has performed detailed analyses of SSO rates in the Water Authority collection system. These analyses show that:

1. The Short Interval lines consistently experience a higher SSO rate than the Sub-Basin lines. This indicates that even more cleaning of Short Interval lines, with a commensurate decrease in Sub-Basin cleaning, will result in a net reduction of total SSOs in the system. This is because the additional cleaning would be applied to lines more likely to spill, and to be taken from lines less likely to spill.
2. The upstream portion of the Sub-Basin lines are less likely to spill than the downstream portion.

These findings provide the opportunity to clean the sewers more effectively and efficiently with the goal of SSO reduction, therefore, in CY2022:

1. The Water Authority will establish and monitor a temporary goal of cleaning all gravity small diameter lines every fifteen years. (This will be accomplished through the existing Sub-Basin program.) The Water Authority will continue the program of high-frequency maintenance of known problem locations within the system. (This will be accomplished through the existing Short Interval program.) The frequency of Short Interval cleaning will vary in accordance with system performance and risk factors, maintenance history, and the latest maintenance findings. This will maintain the Sub-Basin program as currently configured while targeting the Short Interval lines which are more likely to spill.
2. The Water Authority will continue studies with the intent is to validate prior study indicating a significant SSO Rate variation for top versus bottom, and therefore the opportunity to optimize sub-basin cleaning. A possible outcome will be modification of the Sub-Basin program to remove lines shown to be significantly less likely to spill.





**Figure 4 Small Diameter Sewer Cleaned vs. Ten-Year Goal**

### Force Main Inspection Program

This is an on-going program in which the alignment is annually inspected for all force mains and valves found in field are compared to those in the GIS mapping and this information is stored in Maximo.

Lift Station 20 pumps westside flow to the Southside Water Reclamation Plant (SWRP) via twin 30” ductile iron force mains. In CY2021, the Water Authority performed a test using the smart ball and installed replacement ARVs on both force mains.

### Odor Complaints

Odor complaints are tabulated and reported monthly. The Water Authority odor control program is described in the CMOM Self-Assessment Report in the Hydrogen Sulfide Monitoring and Control (HSMC) section in the current CMOM Program Self-Assessment.

## **Identified Gaps in the Water Authority Processes with Recommendation to Close**

In the process of continuous improvement, the Water Authority is committed to identifying and closing gaps. As discussed above, most of these recommendations are now considered On-Going programs.

### **Prohibited Discharges, i.e., SSOs**

The Water Authority acknowledges that prohibited discharges have occurred and that all discharges from the sanitary sewer system are prohibited.

Recommendation: The Water Authority will annually examine sewer system performance, set specific steps for decreasing SSOs and mitigating their impacts, and has a program of continuous improvement.

# Appendices



Type		DMR													SSO Team Study		Enforcement				
10-42	10-48	10-42 & 10-48	Maximo WO #	Diameter	Repeat	Repeat within 1 year	Date of SSO	Time of SSO	Duration (HH:MM)	Location	Estimated Volume (gallons)	Reported Cause of Overflow	Observed Environment Impacts	Action Taken	Ultimate Discharge Location	Volume Recovered (gallons)	Cause	Mitigation	Pretreatment Follow Up Requested	FSEs Visited	Notice of Violation
X			1411937	8	Y	N	1/5/2021	8:00 AM	4:5	7809 BELLAMAH AVE NE	NA	BP	NA	CC/IN	NA	NA	BP	SP			
X			1426602	8	N	N	1/22/2021	8:55 AM	3:5	1228 DEL MASTRO DR SW	700	GR/RGS	NEAH	CC/HTH/WD	PST	600	MH	RH			
X			1428140	NA	N	N	1/23/2021	5:27 PM	2:18	COORS BLVD SW & PALARITO RD SW	100	CONTROLLER	NEAH	CNTRLR/SSS/CV/ET /PO/RPL/CHTH	PST	0	EQ	RPLC			
	X		1483611	8	N	N	3/8/2021	11:41 AM	0:49	1843 CAGUA PL NE	NA	RGS	NA	CC	NA	NA	RT	SI			
X			1479870	8	N	N	3/5/2021	9:57 AM	0:18	3528 CAMPBELL FARM LN NW	55	GR/RGS	NEAH	CC/HTH/WD/RP	O	55	GR/RGS	RH/SI			
X			1491553	8	N	N	3/17/2021	12:25 PM	0:55	4001 PRINCE ST SE	275	RGS	NEAH	CC/HTH/CW/W/WD	PST	275	EQ	RH			
X			1507479	8	N	N	4/3/2021	7:07 PM	3:53	13004 GLENWOOD HILLS CT NE	50	RGR	NEAH	CC/HTH/RS/WD	AD	0	RGR	SI			
X			1516878	12	N	N	4/10/2021	8:25 AM	1:52	6200 INDIAN SCHOOL RD NE	5600	DB/V	NEAH	CC/HTH/PO/CW/W/R S/WD	AC	5600	V	NF			
X			1523300	8	Y	N	4/17/2021	2:59 PM	0:44	DON LUIS RD SW	220	GR/RGS	NEAH	CC/HTH/CW/W/RP/WD	STD	110	LF	RH			
X			1525858	8	N	N	4/20/2021	6:55 PM	0:20	4401 4TH ST NW	100	GR	NEAH	CC/WD	PST	0	GR	PT/SI	x	3	2
X			1633951	12	N	N	7/31/2021	1:09 PM	2:41	7228 VALLE JARDIN LA NW	800	GR/RGS	NEAH	CC/HTH	SD	800	GR/RGS	SI			
	X		1635825	8	N	N	8/2/2021	1:25 PM	:40	6108 BANCROFT CT NE	NA	RGS/RT	NA	CC/HTH	NA	NA	RT	SI/SP			
	X		1760532	8	N	N	11/16/2021	7:00 PM	0:30	2900 EL CORTO DR SW	NA	BP	NA	CC	NA	NA	BP	SP			
X			1760997	8	N	N	11/18/2021	8:21 AM	1:00	MARLA DR NE & MONTGOMERY BLVD NE	1500	RGS	NEAH	CC/HTH/RS/WD	SD	500	RT	SI/SP			
	X		1783146	8	Y	Y	12/6/2021	12:23 AM	0:17	1600 GONZALES RD SW	NA	GR	NA	CC	NA	NA	SL	SI			
X			1799077	8	N	N	12/18/2021	11:00 AM	0:50	7900 SAN PEDRO DR NE	3100	GR/RGS	NEAH	CC/HTH/PO/RP/W/WD/ET	AC	2500	GR	SI/SP	x		
	X		1801711	8	N	N	12/20/2021	8:00 AM	0:30	620 13TH ST NW	NA	GR	NA	CC	NA	NA	SL	SI			
X			1814119	8	N	N	12/25/2021	1:55 PM	0:20	13125 ALICE AVE NE	100	GR	NEAH	CC/HTH/WD	PST	35	RT	SI/SP			



**CY2021 10-42 SPILL VOLUME AND VOLUME RECOVERED**

<b>Maximo WO #</b>	<b>Date of SSO</b>	<b>Location</b>	<b>Estimated Volume (gallons)</b>	<b>Volume Recovered (gallons)</b>	<b>Volume Not Recovered</b>	<b>% Recovered</b>
1426602	1/22/2021	1228 DEL MASTRO DR SW	700	600	100	86%
1428140	1/23/2021	COORS BLVD SW & PAJARITO RD SW	100	0	100	0%
1479870	3/5/2021	3528 CAMPBELL FARM LN NW	55	55	-	100%
1491553	3/17/2021	4001 PRINCE ST SE	275	275	-	100%
1507479	4/3/2021	13004 GLENWOOD HILLS CT NE	50	0	50	0%
1516878	4/10/2021	6200 INDIAN SCHOOL RD NE	5600	5600	-	100%
1523300	4/17/2021	DON LUIS RD SW	220	110	110	50%
1525858	4/20/2021	4401 4TH ST NW	100	0	100	0%
1633951	7/31/2021	7228 VALLE JARDIN LA NW	800	800	-	100%
1760997	11/18/2021	MARLA DR NE & MONTGOMERY BLVD NE	1500	500	1,000	33%
1799077	12/18/2021	7900 SAN PEDRO DR NE	3100	2500	600	81%
1814119	12/25/2021	13125 ALICE AVE NE	100	35	65	35%
<b>Grand Total</b>			<b>12,600</b>	<b>10,475</b>	<b>460</b>	<b>83%</b>

## Appendix 3      FOG Advertising Campaign

Our CY2021 FOG advertising campaign/public outreach was supported by the following activities:

### Bill Inserts (210,000 printed and distributed every month)

December 2021

November 2021

### Outdoor Advertising

4 Outdoor boards running for one week from Nov. 22-28, 2021 and Dec. 20-27, 2021 reaching an estimated 1,505,201 residents (with duplication)

### Newspaper Advertising

2 banners ads running in the *Albuquerque Journal* on 11/24/21 and 12/22/21 reaching an estimated 193,650 people.

2 one-quarter page ads running in The Paper on 11/24/21 and 12/22/25 reaching an estimated 20,000 people.

### Television advertising

2 week schedules in November and December on KOB TV, KRQE TV and KOAT TV and selected Comcast stations reading an estimated 998,542 people.

### Digital advertising

Digital place on AdWallet in November and December targeting women 27-65 in Bernalillo County zip codes. Estimated number of people reached: 5,000










### Radio advertising

Two week scheduled in November (11/15/21-11/28/21) and December (12/20/21-12/26/21) on the top 5 local stations reaching women 25-64. Estimated number of people reached: 212,872

Total number of estimated people reached (with duplications): 3,541,965



## Social Media Posts – Facebook/Instagram/Nextdoor

	Title	Date published
<input type="checkbox"/>	 REMEMBER...fats, oils and grease should NEVER go down the drai... waterauthorityeducation	Boost post ... Dec 22, 2021
<input type="checkbox"/>	 REMEMBER...fats, oils and grease should NEVER go down the drai... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Dec 22, 2021
<input type="checkbox"/>	 It's finally here—Thanksgiving week! If you're preparing a large m... waterauthorityeducation	Boost post ... Nov 23, 2021
<input type="checkbox"/>	<b>Ad completed</b>  It's finally here—Thanksgiving week! If you're preparing a large m... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Nov 23, 2021
<input type="checkbox"/>	 REMEMBER...fats, oils and grease should NEVER go down the drai... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Nov 22, 2021
<input type="checkbox"/>	 REMEMBER...fats, oils and grease should NEVER go down the drai... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Oct 22, 2021
<input type="checkbox"/>	 Labor Day Weekend is just around the corner! If you're planning t... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Aug 28, 2021
<input type="checkbox"/>	 Our water resources are directly impacted by the choices made by... Albuquerque Bernalillo County Water Utility Authority	Boost post ... May 15, 2021
<input type="checkbox"/>	 We need your help to prevent backups in our sewer systems! Nev... Albuquerque Bernalillo County Water Utility Authority	Boost post ... Jan 29, 2021

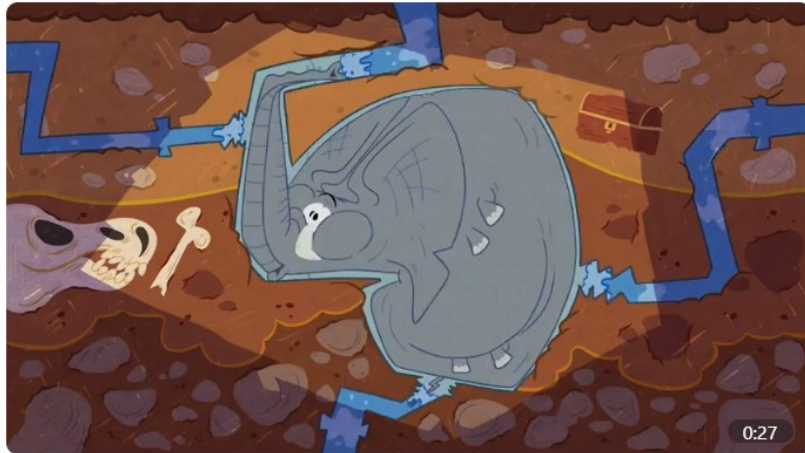
Data - Social Media Posts					
DATE PUBLISHED	PEOPLE REACHED	ENGAGEMENTS	LIKES AND REACTIONS	COMMENTS	SHARES
22-Dec-21	37	---	2 LIKES	0	0
22-Dec-21	214	11	8 REACTIONS	0	2
23-Nov-21	66	---	4 LIKES	0	0
23-Nov-21	1.3 K	30	8 REACTIONS	0	1
22-Nov-21	248	8	4 REACTIONS	0	2
22-Oct-21	239	6	3 REACTIONS	0	2
28-Aug-21	187	17	9 REACTIONS	1	1
15-May-21	412	23	17 REACTIONS	0	4
29-Jan-21	134	3	3 REACTIONS	0	0



Albuquerque Bernalillo County Water Utility Authority ✓



Public Affairs Manager David Morris • 24 Nov



Cool it. Can it. Chuck it! It's finally here—Thanksgiving week! If you're preparing a large meal, don't forget to properly dispose of fats, oils and grease.

Posted to **Subscribers of Albuquerque Bernalillo County Water Utility Authority**



18 · 8,213 Impressions



Like



Comment



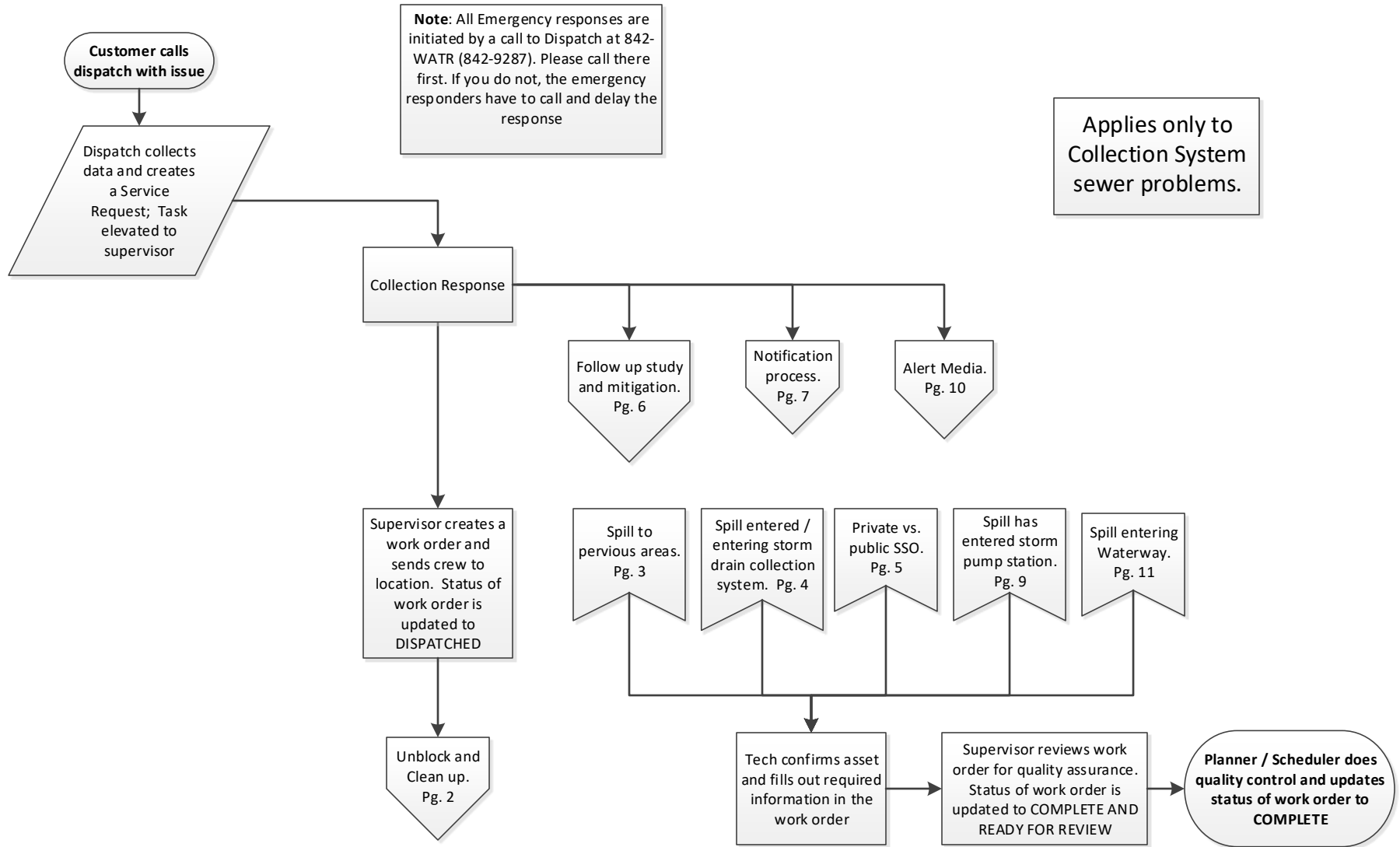
Share

**Appendix 4      Overflow Emergency Response Plan (OERP)**

# Overflow Emergency Response Plan

12-1-2019

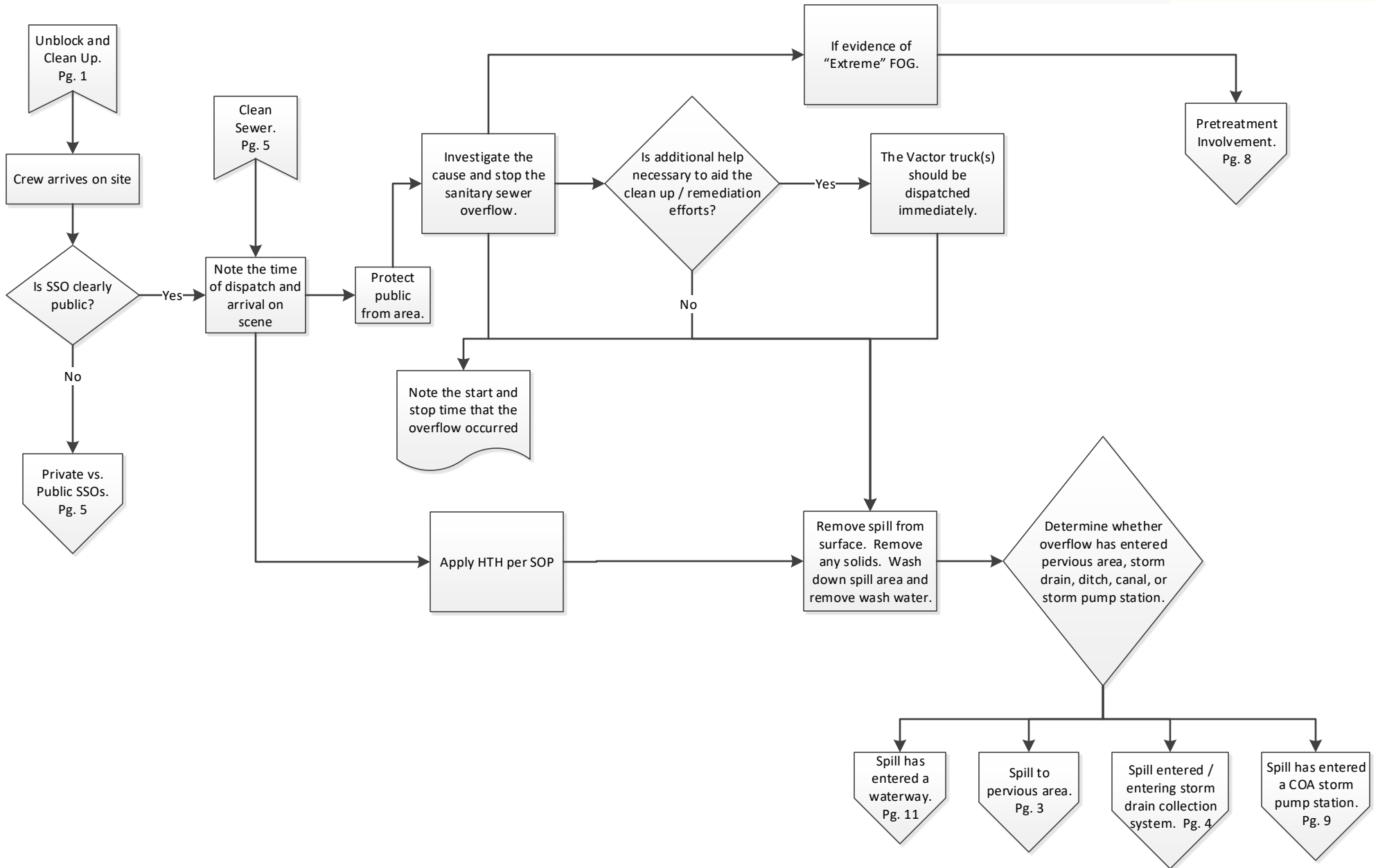
Albuquerque Bernalillo County Water Utility Authority

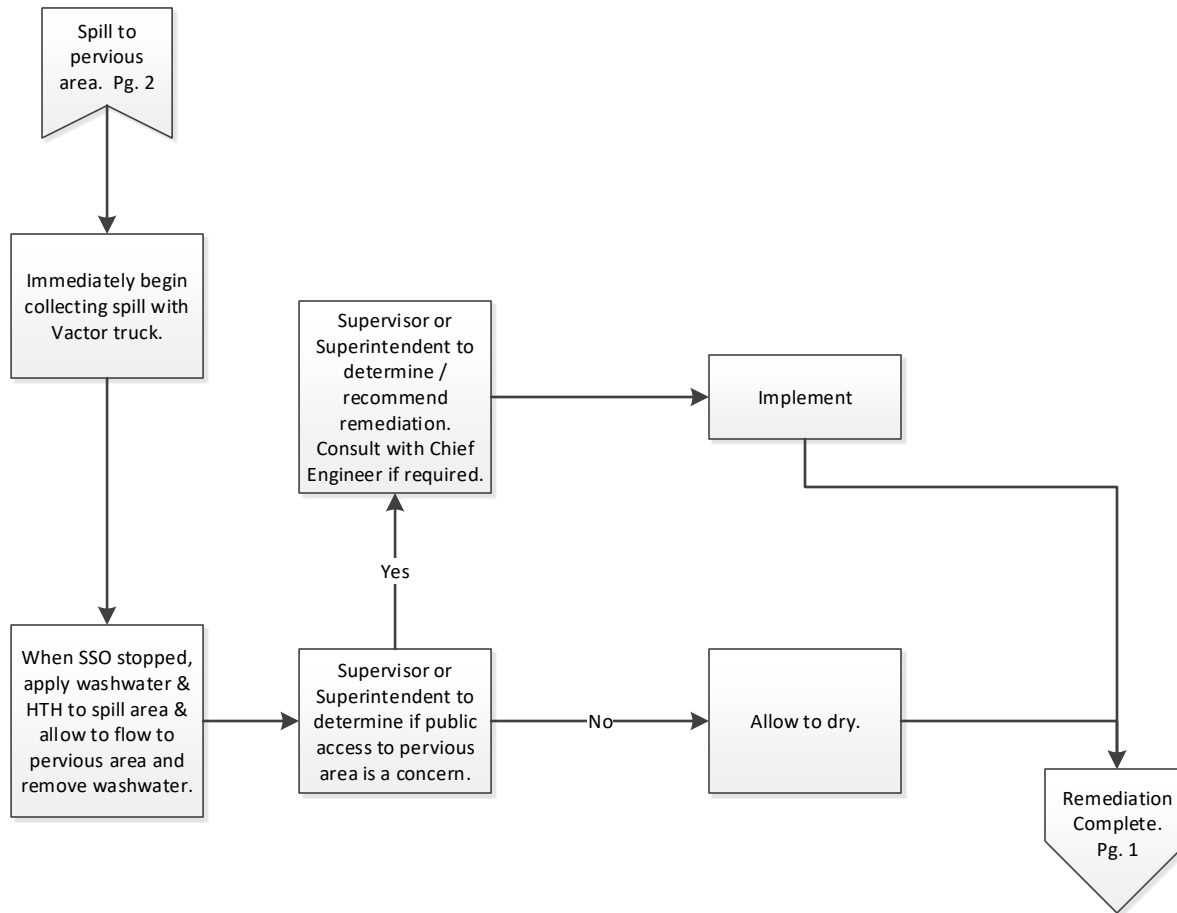


# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority





# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority

Spill entered / entering storm drain collection system. Pg. 2

If possible, position 2<sup>nd</sup> Vactor to remove spill prior to reaching inlet.

Determine how far downstream the spill has reached.

SSO Reaches	Contact			
	Name	Position	Office	Cell
AMAFCA Facility	Jerry Lovato*	Executive Engineer	884-2215	362-0020
Bernalillo County Facility	Patrick E. Chavez <sup>#</sup>	Storm Drainage Maintenance Manager	848-1505	934-2704
NMDOT Facility	Thomas Kratochvil	District 3: Assistant District Engineer-Maintenance	N/A	228-8169
COA Facility	Kathy Verhage **	Senior Engineer	768-2778	803-8058

Add wash water & remove at downstream manhole. Remove immediately if rain is imminent. If not, remove next normal work day.

Wash water to street and inlet.

SSO Reaches COA storm drain.

Assist in clean up as requested.

Remediation Complete. Pg. 1

Note: Process shown is for typical spills. Spills that are not appropriate for Vactor removal may require a joint response with the impacted MS4 Permittee in which the spill is captured, treated, and determined appropriate for release.

\*If Jerry Lovato is not immediately available, call:  
 Nolan Bennett: Field Engineer (505) 301-6941  
 Sal Hernandez: Superintendent (505) 366-8209

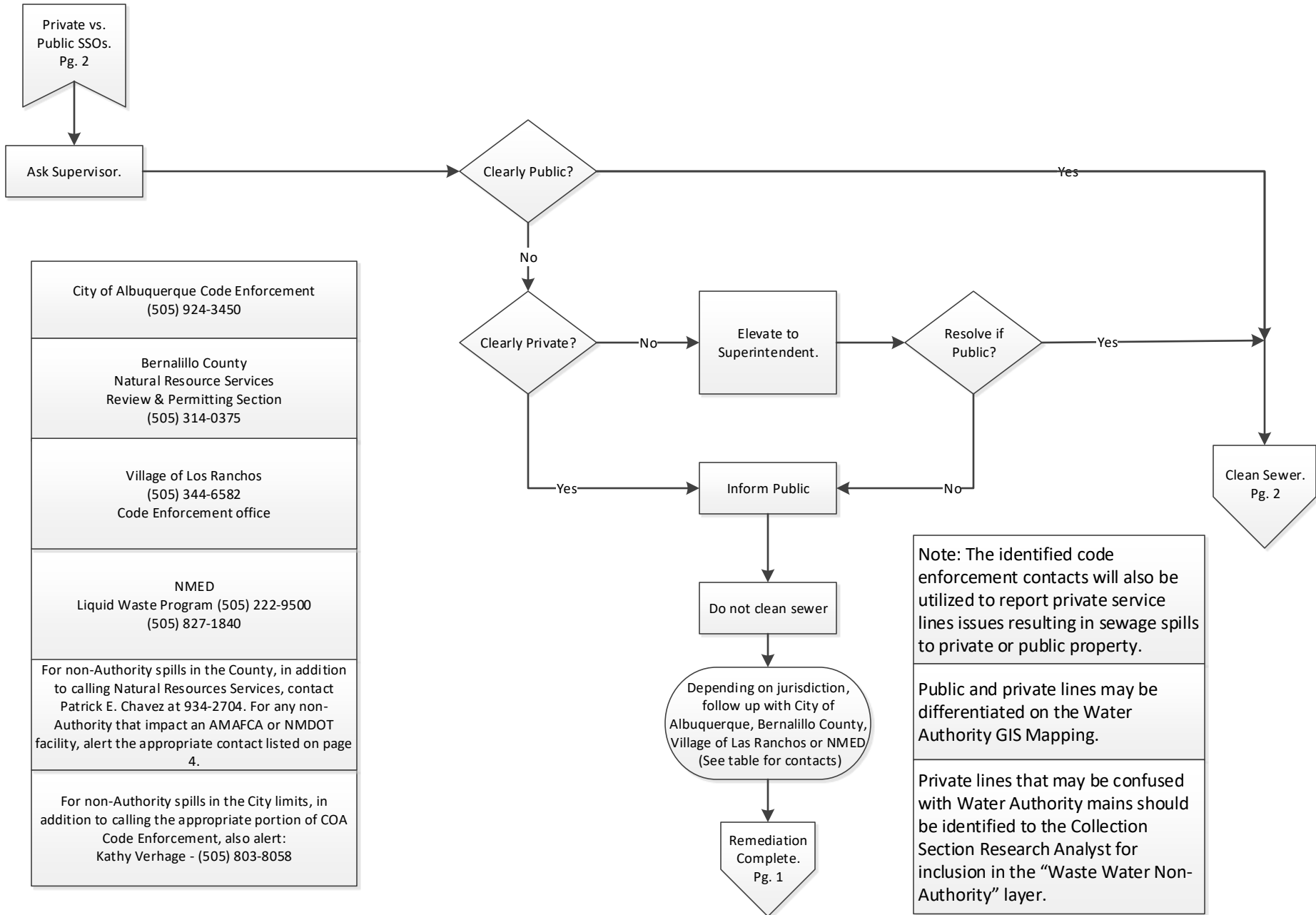
\*\*If Kathy Verhage is not immediately available, call:  
 David Harrison: Engr. Div. Manager (505) 238-4158  
 Carl Rinkenberger: O&M Manager (505) 250-4334  
 Daniel Tapia: O&M Supt (505) 228-6874

<sup>#</sup>If Patrick E. Chavez is not immediately available, call:  
 Kali Bronson: Stormwater Program Compliance Manager (505) 401-1779

# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority



City of Albuquerque Code Enforcement (505) 924-3450
Bernalillo County Natural Resource Services Review & Permitting Section (505) 314-0375
Village of Los Ranchos (505) 344-6582 Code Enforcement office
NMED Liquid Waste Program (505) 222-9500 (505) 827-1840
For non-Authority spills in the County, in addition to calling Natural Resources Services, contact Patrick E. Chavez at 934-2704. For any non-Authority that impact an AMAFCA or NMDOT facility, alert the appropriate contact listed on page 4.
For non-Authority spills in the City limits, in addition to calling the appropriate portion of COA Code Enforcement, also alert: Kathy Verhage - (505) 803-8058

Note: The identified code enforcement contacts will also be utilized to report private service lines issues resulting in sewage spills to private or public property.

Public and private lines may be differentiated on the Water Authority GIS Mapping.

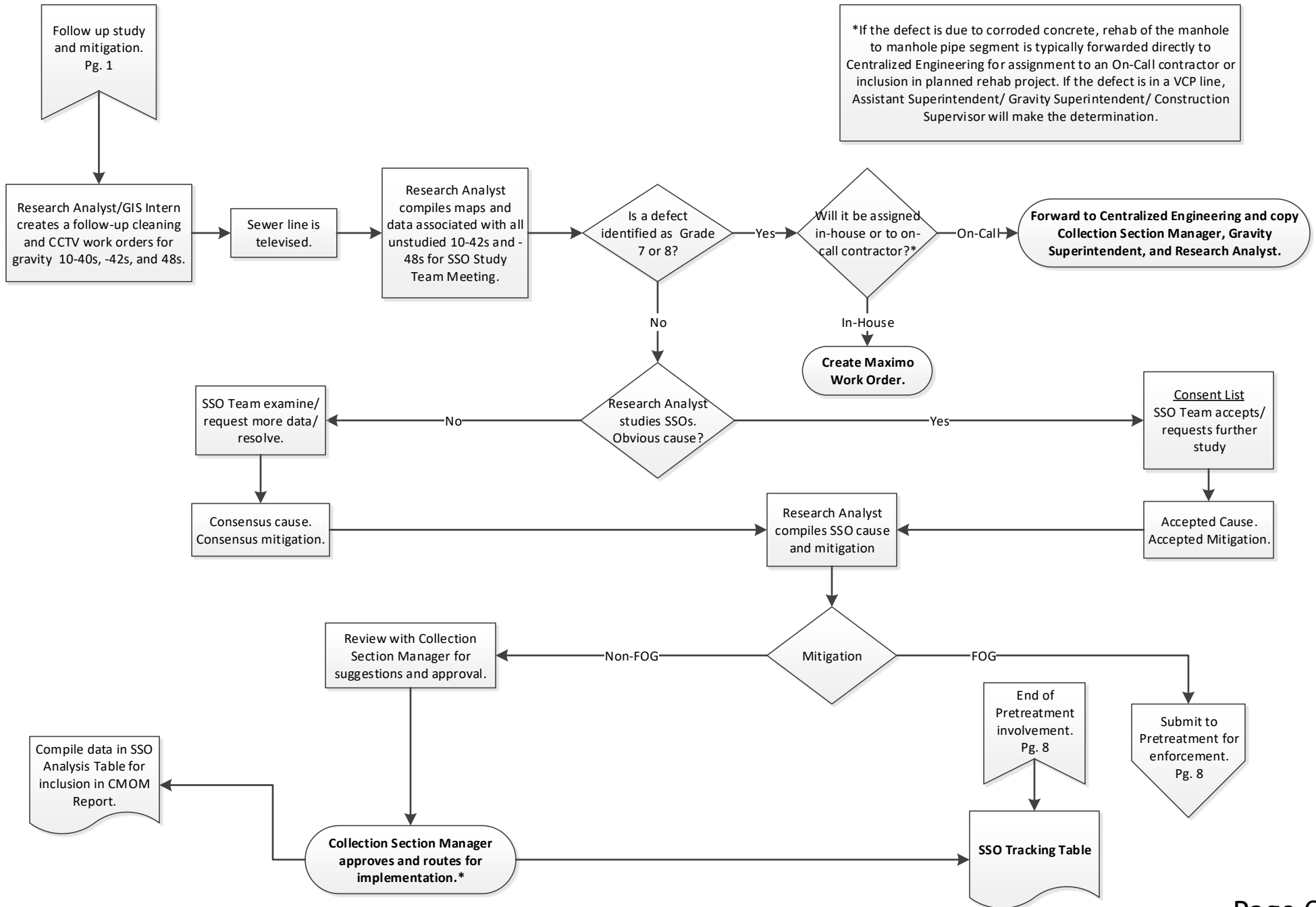
Private lines that may be confused with Water Authority mains should be identified to the Collection Section Research Analyst for inclusion in the "Waste Water Non-Authority" layer.



# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority

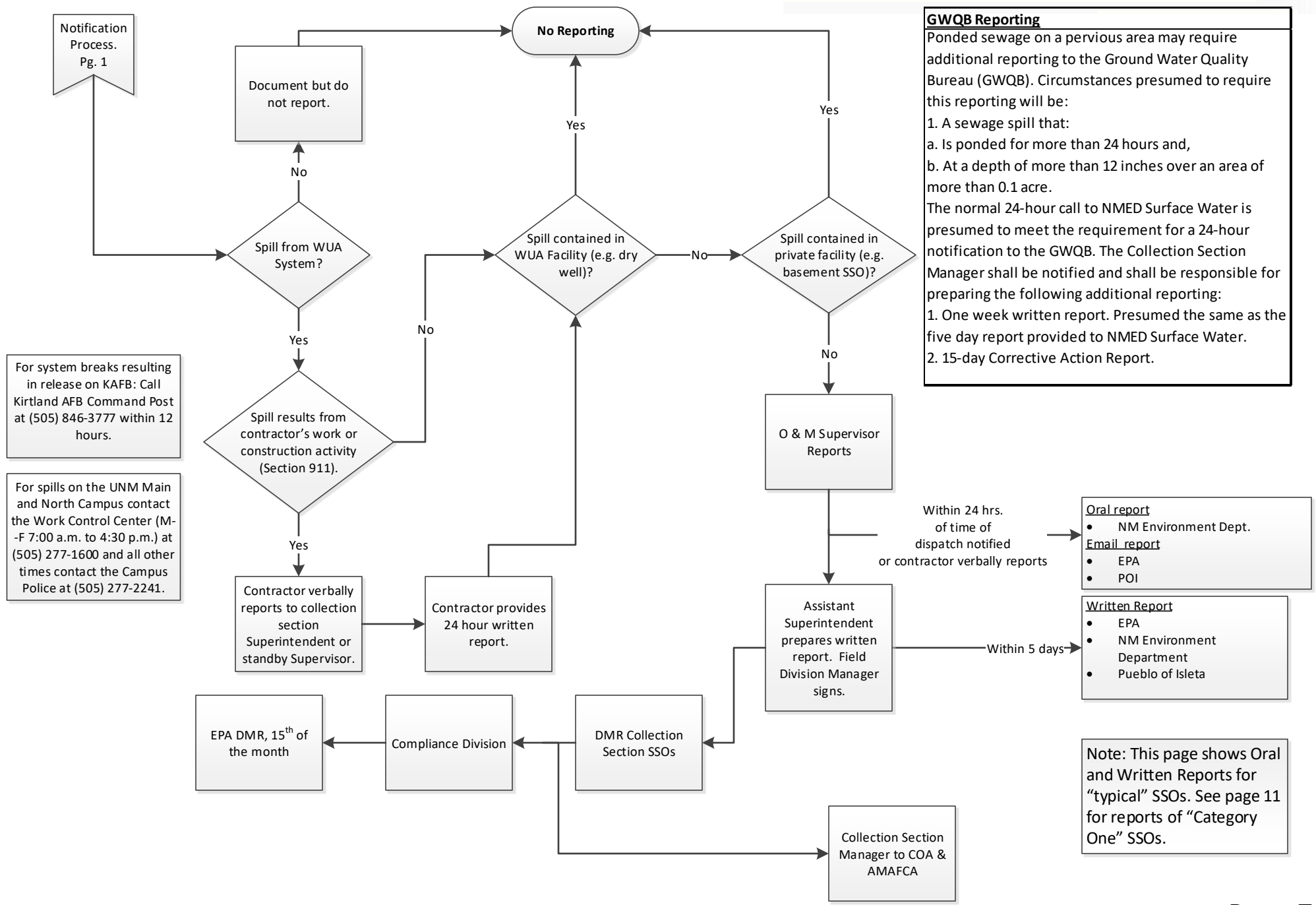


# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority

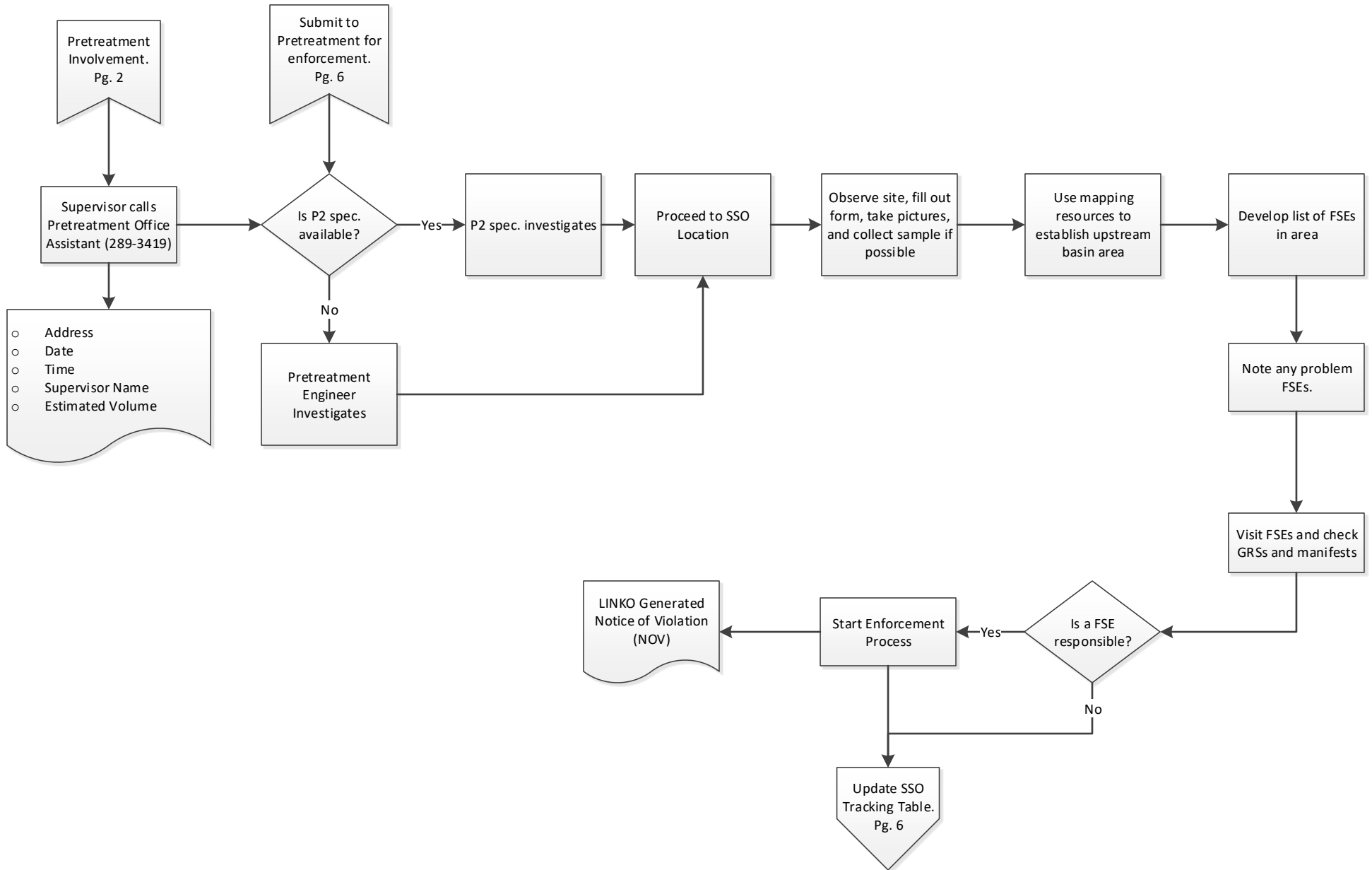
**GWQB Reporting**  
 Pondered sewage on a pervious area may require additional reporting to the Ground Water Quality Bureau (GWQB). Circumstances presumed to require this reporting will be:  
 1. A sewage spill that:  
 a. Is ponded for more than 24 hours and,  
 b. At a depth of more than 12 inches over an area of more than 0.1 acre.  
 The normal 24-hour call to NMED Surface Water is presumed to meet the requirement for a 24-hour notification to the GWQB. The Collection Section Manager shall be notified and shall be responsible for preparing the following additional reporting:  
 1. One week written report. Presumed the same as the five day report provided to NMED Surface Water.  
 2. 15-day Corrective Action Report.

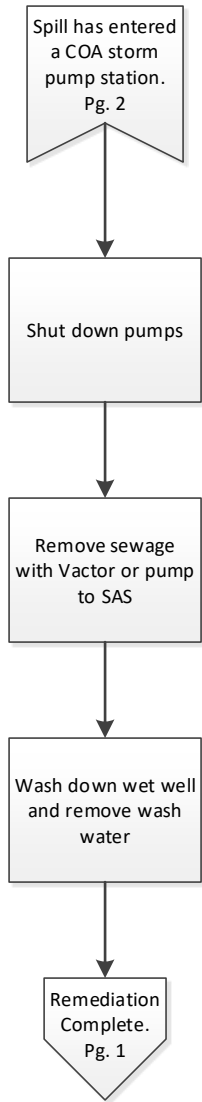


# Overflow Emergency Response Plan

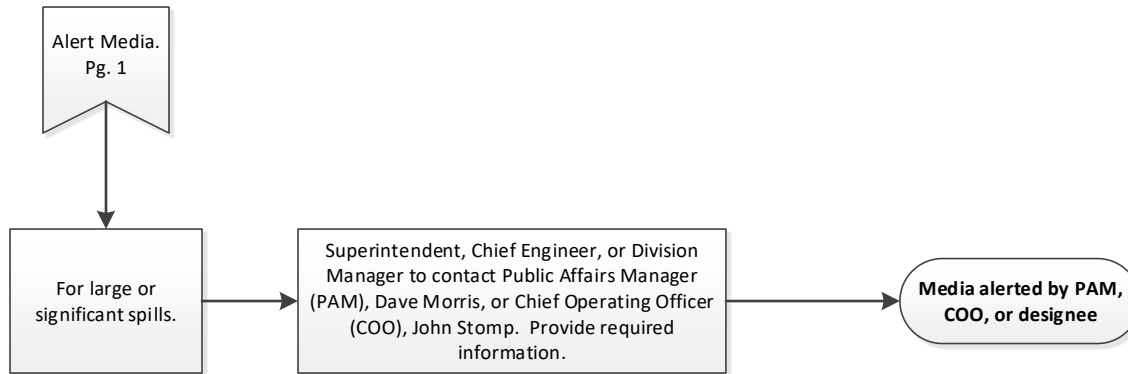
12-1-2019

Albuquerque Bernalillo County Water Utility Authority





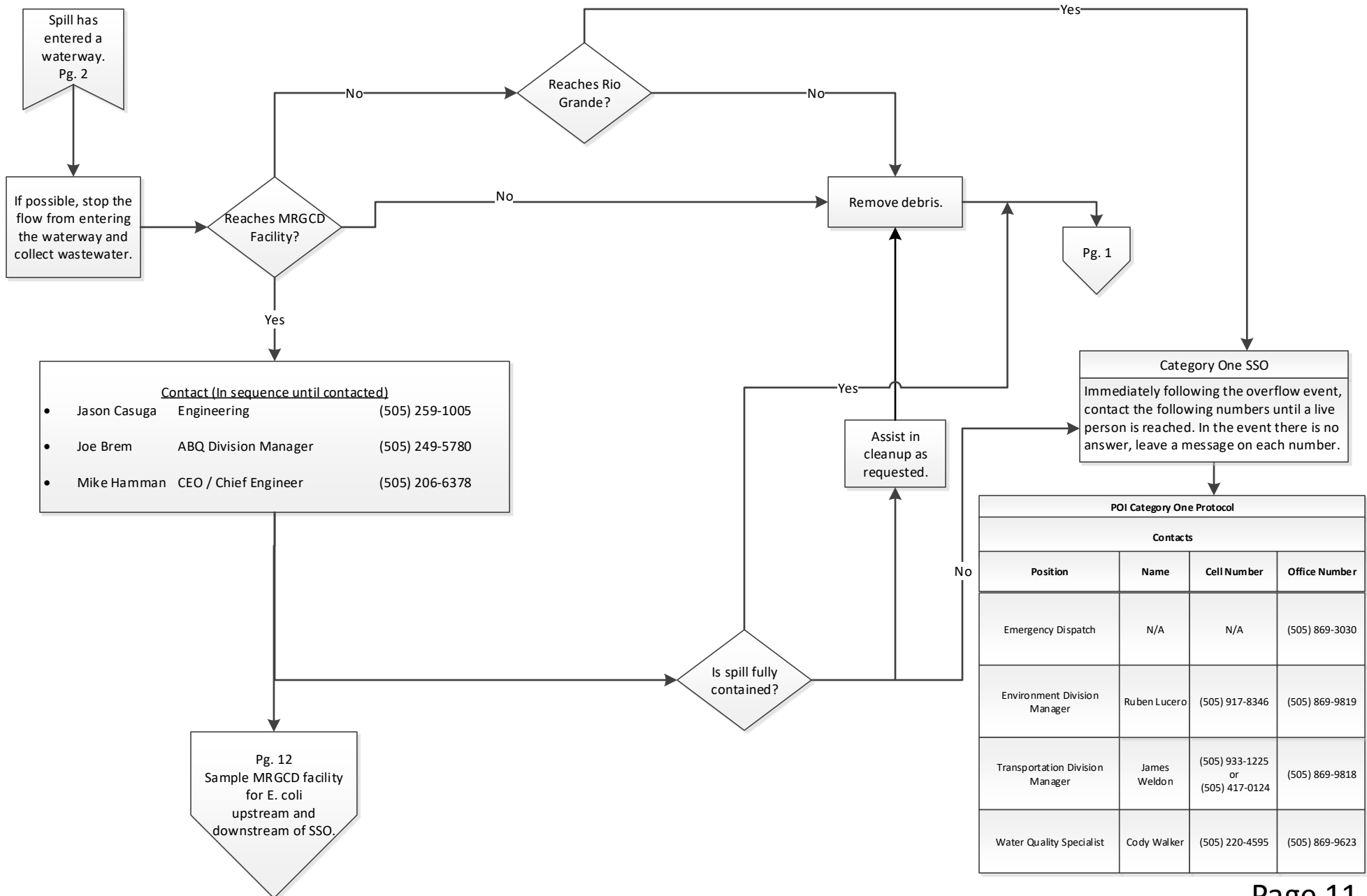
Note: Process shown is for typical spills. Some spills may require a joint response with the City of Albuquerque in which the spill is captured, treated, and determined appropriate for release.

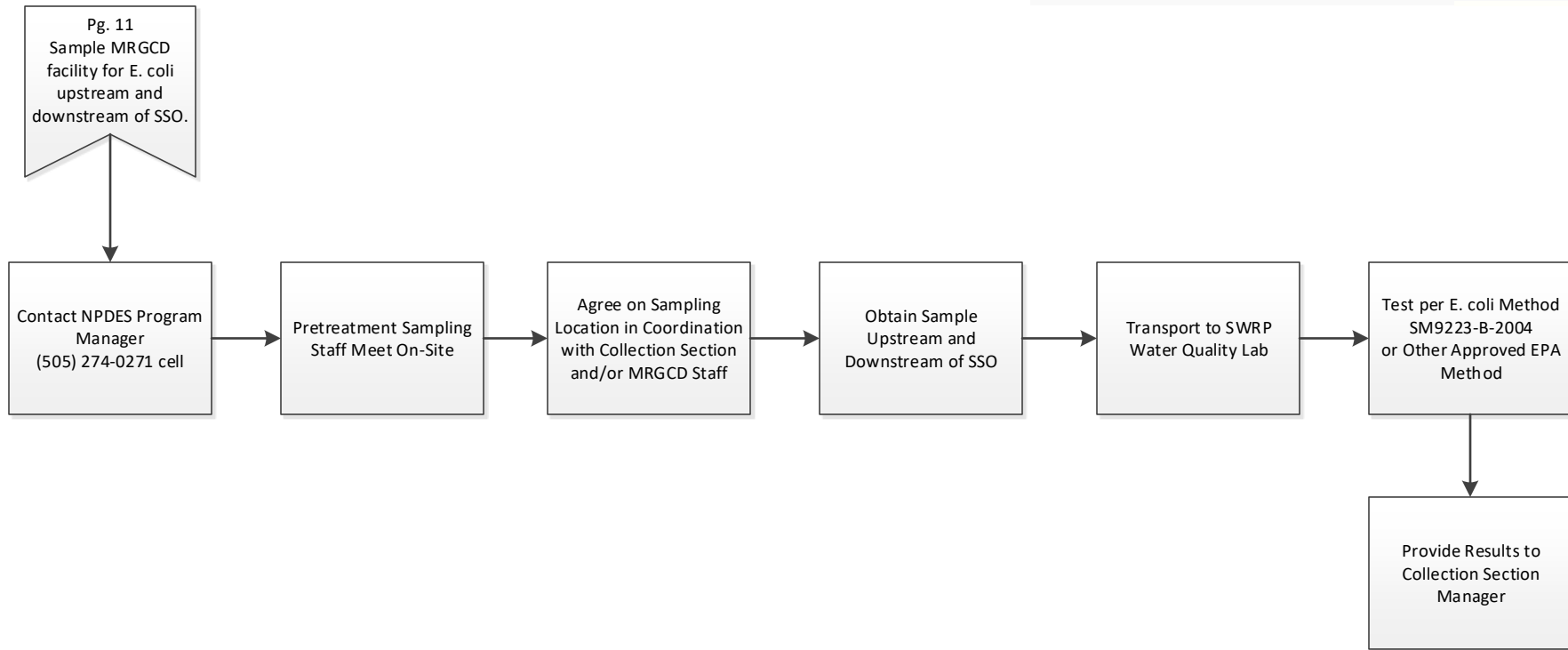


# Overflow Emergency Response Plan

12-1-2019

Albuquerque Bernalillo County Water Utility Authority









<b>Goal Summary - CY2021 CMOM Report</b>		
<b>Goal</b>	<b>Timing</b>	<b>Page # for Discussion</b>
Submit FOGS and Enforcement Policies to EPA for approval once the legal review is complete	TBD	4
CCTV all gravity pipes suffering a blockage. For all SSOs, determine a cause and mitigation and report in the next CMOM report	Annually	6
Public advertising	On-Going	12
Distribute FSE fliers in English, Vietnamese and Spanish, and improve FOG inspections by using advance inspection tools	CY2023	12
Update OERP	As required	13
CCTV a portion of system	Ten Year goal. Report	14
Clean a portion of the system	Ten Year goal. Report	15
Establish and monitor a temporary goal of cleaning all gravity small diameter lines every fifteen years	CY2022	15
Update frequency of Short Interval cleaning in accordance with system performance and risk factors, maintenance history, and the latest maintenance findings	CY2022	15
Force main inspection program	Annually	16
SSOs: Take steps to decrease and mitigate	On-Going	17