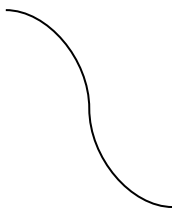


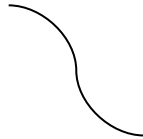
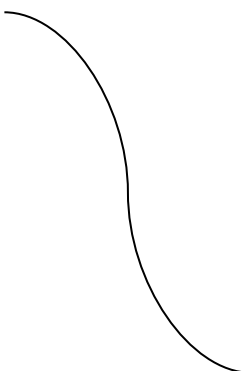
Sewage Collection System Inspection Report

This checklist is provided as a tool for permit holders and ADEQ staff to have a consistent understanding of the major compliance expectations under this permit. This checklist is designed to be easy to read and follow. It is intended only to address the permit requirements that ADEQ feels are the most important to protect human health and the environment. This list does not include every permit condition and permit holders should ensure they understand the full requirements of their permit. This list does not supplant or supersede any legal requirement and is not binding on the permit holder or ADEQ staff.

Facility Name: Pecan Water Reclamation Facility Place ID: 150685	Inspection No: 299274 Inspection Date: 03/28/2017	
Engineer File #: 2008375 Current LTF#: N/A	Inspector(s): Isa Valdez, Josh Litt, and Galileo Gutierrez	
Facility Address: 38359 N Gantzel Rd City, State, Zip: Queen Creek, AZ County: Pinal	Inspector Phone: 602-771-2302 Inspector Email: valdez.isa@azdeq.gov	
Permittee/Responsible Party (RP): Johnson Utilities, LLC Contact: Jed Lant, Wastewater Manager Mailing Address: 5230 E Shea Blvd, Ste. 200 City, State, Zip: Scottsdale, AZ 85254 Phone: 480-798-0413 Email: jed@johnsonutilities.com	Population Served by Collection System: 29,000 Collection System Grade: 4	
Collection Operator/ID: Jed Lant / OP031799 Phone: 480-798-0413 Email: jed@johnsonutilities.com Op. Cert. Grade/Expiration: 4C / 30-Oct-2018	Compliance Summary: Certified Operator <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No Physical Facilities <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No	
Results of Inspection: <input checked="" type="checkbox"/> No deficiencies were noted during the course of the inspection. No ADEQ action will result from this inspection. <input type="checkbox"/> Potential deficiencies were noted during the course of the inspection. Additional correspondence regarding this inspection may be forthcoming.		
Inspection Report Issued: Via email from ADEQ office	Facility Initial:	ADEQ Initial:
Potential Deficiencies: This inspection is a Follow-Up of the Sewage Spill Overflow (SSO) occurred on Tuesday, March 27, 2018 at 12:00 AM, approximately. During the course of the inspection, Jed Lant – WWTP Manager stated the cause was identified as an electrical failure in the Lift Station – pump controls and alert system. This problem was related to a manufacturer failure. At the time of inspection, no potential deficiencies were found, as corrective actions and preventive actions to avoid reoccurrence were taken.		
PHOTOGRAPHS TAKEN DURING INSPECTIONS ARE AVAILABLE ON REQUEST		

REQUIREMENTS / RECOMMENDATIONS	REQUIREMENT MET?	COMMENTS
Maintains Adequate Flow Capacity (A.A.C.R18-9-E301.B.1)?	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	Not addressed over this inspection
<p>Does the RP utilize any of the following to maintain adequate flow capacity for the planned service area?</p> <p><input type="checkbox"/> A list of existing sewer commitments</p> <p><input type="checkbox"/> A method to determine available sewer capacity, including:</p> <ul style="list-style-type: none"> <input type="checkbox"/> A list of commitments <input type="checkbox"/> Basin Studies <input type="checkbox"/> Metering <input type="checkbox"/> Computer modeling <input type="checkbox"/> Other (Describe) <p><input type="checkbox"/> Other Methods used to maintain adequate flow (Describe)</p>		
Minimizes Sewer Blockage and Erosion (A.A.C. R18-9-E301.B.2)?	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	Not addressed over this inspection
<p>Has the RP implemented any of the following items to minimize sedimentation, blockages and erosion?</p> <p><input type="checkbox"/> A procedure to Identify problem reaches of the sewer system where roots, grease, etc. cause blockages?</p> <p><input type="checkbox"/> A work order system to track maintenance work completed on the sewer system.</p> <p><input type="checkbox"/> A complaint receipt and processing system?</p> <p><input type="checkbox"/> Other methods (describe)</p>		
Prevents Sanitary Sewer Overflows (SSOs) (A.A.C. R19-9-E301.B.3)?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A	
<p>Any SSO greater than 100 gallons experienced in the past year?</p> <p><input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A</p> <p>If yes, describe facility response and clean up procedures.</p>		
<p>Has the RP implemented any of the following items to prevent SSOs and respond to the release of sewage?</p> <p><input checked="" type="checkbox"/> Procedures to track SSOs (date, location, cause, volume)</p> <p><input checked="" type="checkbox"/> An SSO response plan</p> <p><input type="checkbox"/> Distribution of educational materials to customers on the proper disposal methods for grease and oil.</p> <p><input type="checkbox"/> Procedures to identify problem areas of the sewer system (high maintenance or multiple SSOs)</p> <p><input type="checkbox"/> Other methods (describe)</p>		<ol style="list-style-type: none"> 1. SSO of approximate 65,000 gallons of raw sewage released into the surface and flowed an extension of approx. 400-500 ft. into Queen Creek Wash. 2. Johnson Utilities has a local system to monitor pumps in the Pecan Lift Station <ol style="list-style-type: none"> a. At the time if inspection ADEQ met with Jed Lant, WWTP Operator and the electrician in charge of the local monitor pump station. b. The problem happened because the sensor failed to recognize high levels of sewage in the wet well. The reporting system that updated the operator did not alarm him or other people that usually get reports via text. c. During a troubleshooting reading, it was detected that the control had a button stuck and this reset the conditions of the sensors.

		<p>d. Extra – measurements were conducted to assure the pumps will activate when water is detected with sewage at alert levels.</p> <p>e. Jed Lant commented, at the time of inspection there is no risk for further SSO, as measurements have been taken to avoid further failing in the system.</p> <p>3. Pecan WRP staff became aware of the SSO around 12:30 AM and started cleaning activities.</p> <p>4. Actions included to :</p> <p>a. Communicate the spill to ADEQ via voicemail</p> <p>b. Pump all standing sewage out of the impacted areas, including the sewage that was released to Queen Creek Wash.</p> <p>c. Then water diluted with disinfectant was used to pressure wash the area and then the water residual was pumped as well and returned to the treatment plant.</p> <p>d. Disinfection product was applied to the impacted area after this process.</p> <p>e. At the time of the inspection sewage was not observed in the impacted area and cleaning activities were finished.</p>
Has wastewater from an SSO reached a surface water?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A	
If wastewater has reached a surface water, was it - <input checked="" type="checkbox"/> Waters of the United States? <input type="checkbox"/> Waters of the State of Arizona? <input type="checkbox"/> Discharged to an MS4? <input type="checkbox"/> Other?		The release of the SSO occurred in 03/27/2018 reached to Queen Creek Wash and overflowed with an extension of approximate 400 – 500 feet (See Photo log for reference).
Minimize Exfiltration Losses (A.A.C. R18-9-E301.B.4.)?	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	Not addressed over the inspection
Does the RP have any of the following items to minimize exfiltration? <input type="checkbox"/> A list of projects to rehabilitate or replace deteriorated sewers or replace deteriorated manholes <input type="checkbox"/> Procedures to determine if exfiltration is occurring <input type="checkbox"/> Other methods (describe)		
Conducts Inspection, Maintenance and Testing (A.A.C. R18-9-E301.B.5)?	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No <input type="checkbox"/> N/A	
Does the RP use any of the following to provide for adequate inspection, maintenance, and testing of the collection system? <input type="checkbox"/> Uses a construction inspection procedure for new sewer system construction. <input checked="" type="checkbox"/> Documents results of inspection and testing <input checked="" type="checkbox"/> Other methods (describe)		

Maintains Collection System Structural Integrity (A.A.C. R18-9-E301.B.6)?	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	Not addressed over the inspection
Does the RP use any of the following methods to maintain structural integrity? <input type="checkbox"/> Uses design standards, specifications and details for new sewer construction as required in A.A.C. R19-9-E301 (D). <input type="checkbox"/> Documents all manhole and sewer repairs/replacements <input type="checkbox"/> Has implemented procedures to minimize corrosion in the sewer system? <input type="checkbox"/> Other Methods (describe)		
Minimizes Septic Conditions (A.A.C. R18-9-E301.B.7)?	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No <input type="checkbox"/> N/A	
Does the RP use any of the following methods to minimize septic conditions in the sewage collection system? <input checked="" type="checkbox"/> Takes steps to eliminate hydrogen sulfide from the collection system. <input type="checkbox"/> Educates the public on proper waste disposal to avoid sewer problems. <input type="checkbox"/> Removes sags in the sewer system where practicable <input checked="" type="checkbox"/> Other methods (describe)		A visual inspection of the lift station at Pecan WRP was conducted at the time of ADEQ inspection, the following observations were documented: <ol style="list-style-type: none"> 1. When the wet well was closed (usual conditions) sewage odor was slightly detected. 2. ADEQ was in that location for approximately 15 minutes and in three occasions detected strong sewage odor. 3. When the lift station cover was opened for visual inspection, an offensive sewage odor was detected from the influent sewage entering the wet well for the duration of approximately 5 minutes. This time was equivalent to the total time the cover was open. 4. Jed Lant explained that the activated carbon odor unit is effective after the headworks components.
Do the pump stations or downstream manholes show signs of significant corrosion (1/4" or greater exposure of aggregate, holes or 1/32" profile in steel support structures)?	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	
Operation & Maintenance Requirements (A.A.C. R18-9-E301.E.3 & R18-9-E301.F)	<input type="checkbox"/> Yes <input type="checkbox"/> No <input checked="" type="checkbox"/> N/A	Not addressed over the inspection
Does the RP have all of the following: <input type="checkbox"/> An operation and maintenance manual OR <input type="checkbox"/> CMOM plan for the sewage collection system? AND <input type="checkbox"/> An operator in direct responsible charge of the sewage collection system who is certified by the State of Arizona for the class of the facility and at or above the grade of the facility? Is the RP also doing the following: <input type="checkbox"/> Operating the sewage collection system in accordance with the RP's operation and maintenance manual or their CMOM plan?		

RECOMMENDATIONS AND POTENTIAL DEFICIENCIES:

1. Matt Churchill from Scotts Electric is the person in charge of the local monitoring system controls for the wet well pumps. During the inspection, he mentioned the failing component of the system was returned to the manufacturer to obtain a report. The report will address the causes for failure, including the deactivation the alarm system and texts.
 - a. Jed Lant – WWTP operator agreed to send the Manufacture’s report when they send it to Johnson Utilities and to Scotts Electric.
 - b. ADEQ will follow up with Jed Lant to know when the Manufacture’s report will be submitted to ADEQ – Compliance Officer.

