

**RMCS D FIELD OPERATIONS TECHNOLOGY PROJECTS**

10/6/2021

	<b>Initiative</b>	<b>Status</b>	<b>Short Description</b>	<b>Start Date</b>	<b>Completion Date</b>	<b>Comments</b>
Existing						
1.	Maintenance Management and Work Order System	Researching	A maintenance management and work order system lets an agency manage work orders and maintenance activities by tracking staff, materials and equipment related to activities. The District maintains an outdated rudimentary software system that could be improved.	July 2019	TBA	We have brought in a vendor says they are capable of providing a system that would meet the goals of these items. Due to costs we need to solicit other vendors in and that process. I have yet to meet with the vendor mentioned. My comments thus far would be that I have had good experience with Asset Management based systems that are tied directly with GIS mapping/data base layers as a one-stop shop. I would like to make the suggestion that we integrate our work order/asset management system into our fledgling GIS system. Perhaps the current GIS vendor has that capability or we can find a vendor that can interface to our GIS system. When I left my District we had a combination GIS/asset management system where field ops had tablets to interface with GIS and record repairs/maintenance in the field. I will request that that my previous vendor pay us a visit and discuss what it would take to provide the MMS system and how that could integrate with our GIS.

2.	Customer Management System	Researching	Although a work order system tracks customer maintenance requests, the District is in need of a way to better track customer issues/complaints that may not be related to maintenance activities. We are researching tools for this. It is possible a Land Management System could function in this manner as complaints issues would be tied to a parcel or address and have reporting capabilities to remind staff of outstanding complaints/matters.	Fall 2019	TBA	We have brought in a vendor who is capable of providing a system that would meet the goals of these items. Due to costs we need to solicit other vendors in a bidding process. I would like to take a look at being able to track not only complaints/issues but also repairs (costs) via GIS, I believe we could tie those in to the GIS system and
Proposed:						
1.	Network District facilities	Proposing	The goal of this would be to connect all of the district's sewer lift stations, Rio Oso tank & potable water pump station, MainLift South & FAA stormwater pump stations, and Granlees raw water pumping stations to the main network.	TBD	TBA	Having a hard-lined system would add to internal network security for facilities. I will have to get a better understanding of what we have now for facility comms. I do agree that we will absolutely need reliable and redundant communications between our infrastructure. I am inviting Cascade Integration (SCADA integrator) to meet with us regarding our SCADA system reliability
2.	Wastewater plant and warehouse	Research in process	I'm having staff research the viability of a conduit that would run from the wastewater plant gate back to the wastewater control building that could be utilized for installation of a fiber optic line. Additional network and cable would have to be treched and installed back to the warehouse.	On Hold		As long as wireless continues as a stable form of communication, the conduit and wire pull may not be needed..
3.	Sewer Lift Station PLCs	Research in process	Would start with getting connectivity - possibly through Greenfield fiberoptic system or ATT phone lines.	Winter 2019-2020		Considering wireless systems for connectivity of liftstation. Also followed up with Greenfield Communications and waiting on reply.
4.	Pump Stations	Research in process	Would start with getting connectivity - possibly through Greenfield fiberoptic system or ATT phone lines.	Winter 2019-2020		Same as above
5.	Centralized SCADA system	Proposing	The goal of this project would be to utilize the wastewater plant SCADA system as a centralized for the remaining district facilities. Due to security concerns the water plant would remain on its own system.	TBD	TBA	In process: West DAF electrical panel project is complete and integrated. Additional Reclamation plant chemical feed systems being tied-in as part of chlorine gas to bleach conversion project.

6.	WWRP Automation	Proposing	This would require the installation of automated valve systems that could be controlled through SCADA, as well as flow metering systems with feedback loops to regulate and control flows.	TBD	TBA	This would create efficiencies for staff to be able to respond and control systems remotely. I will need to get a good justification from staff on the size and scope of the desired changes. Also will fold in recommendations from Cascade Integration, if any
7.	Lake Level Monitoring system	Approved but on Hold	This project was proposed and approved by the board as it was assumed it was a legal requirement by the department of water resources. We found out we did not meet the threshold to have to comply with this at this time.	TBD	TBA	if not needed by legal requirement, we should be able to track by hand read staff gauge as reservoirs do not gain or drop in level fast enough to warrant? To discuss with staff
8.	And sewer lift station upgrades		Control systems at several of the sewer line stations are coming due for replacement. We need to upgrade two systems that allow networking and control of the facilities remotely.	TBD	TBA	6B sewer lift station panel updated. Others like 3B, 6A would be updated with development.