

#### AGENDA CITY OF CEDAR FALLS, IOWA CITY COUNCIL WORK SESSION MONDAY, MAY 06, 2019 5:00 PM AT CITY HALL-DUKE YOUNG ROOM

- 1. Call to Order by the Mayor.
- 2. Wastewater Regionalization.
- 3. Adjournment.

## Waste Water Regionalization

Areawide Comprehensive Sanitary Sewer Study Update for the Metropolitan Area of Black Hawk County, IA *February 2019* 

## Areawide Sanitary Sewer Update

- 1973 Study reviewed & updated
- Regional system can be done
- Waterloo Wastewater Treatment Facility has capacity
- Recommendations:
  - Additional/detailed analysis of costs
  - Condition assessment of Intercity Interceptor
  - Structure for management of regional system

## Areawide Sanitary Sewer Update Cost Estimates

Community	Individual Cost	Regionalization Cost		
Waterloo	\$101,160,000	\$65,754,000		
Cedar Falls	\$76,500,000	\$50,000,000		
Hudson	?	\$8,212,000	+ \$35,406,000	
Evansdale, Elk Run, Raymond	?	\$21,130,000	1 400,400,000	

## **Cedar Falls Options**

		Options	Estimated Cost <sup>1</sup>	
1.	Со	nnect to Regional system	\$50,006,975	
2.	Remain independent			
	a.	Invest/upgrade our current plant	\$76,500,000	
	b.	Relocate our plant	\$300M - \$500M	

<sup>1</sup> Preliminary information, costs may change as additional studies provide further analysis & cost detail.

## Cedar Falls Plant Today

- Original plant: 1939
- Major upgrades/expansions: 1952, 1962, 1985
- 2014: UV Disinfection
- Asset value is difficult to determine

## Cedar Falls Future Needs:

### Plant

	Priority	Date Planned	Estimated Cost
Third Stage Trickling Filter	High	FY19	\$150,000
Digester Rehabilitation	Med.	FY20-21	\$10,000,000
Nutrient Removal	Low	FY24?	\$66,000,000
Intermediate Clarifier Rehabilitation	Low	FY30+/-	\$2,500,000
Odor Control	Low	-	\$750,000
Wetland	Low	-	\$3,000,000

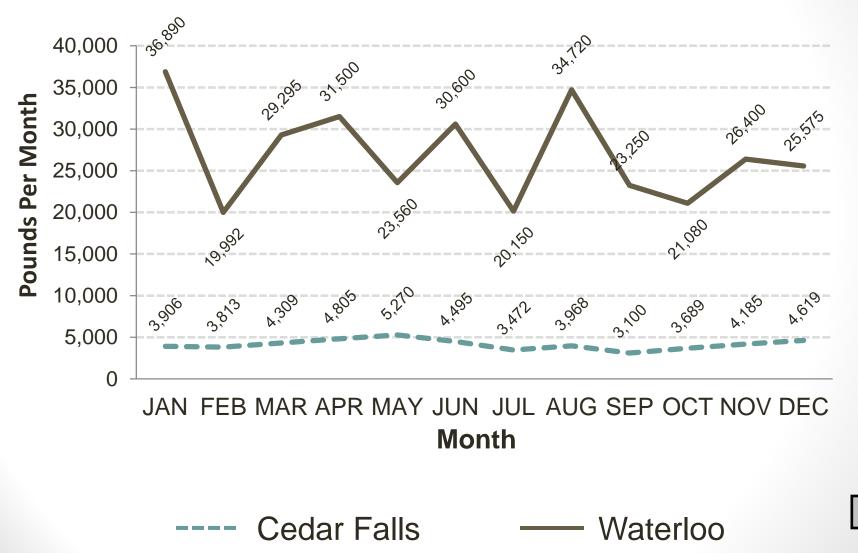
## Cedar Falls Future Needs: Collection System

	Priority	Date Planned	Estimated Cost
Sliplining (I&I reduction)	High	On-going	\$200,000/yr
Flow testing (I&I red.)	High	On-going	\$25,000/yr
Spot repairs	High	On-going	\$30,000/yr
Expansion studies	High	5-6 yrs	\$200,000/yr
Expansion construction	Med	On-going	?

## **Our Regionalization Questions**

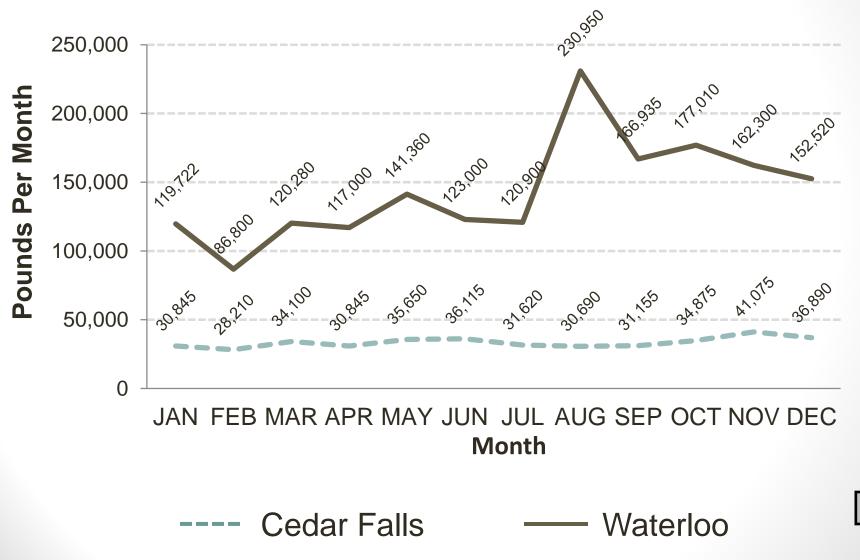
- Condition of the Inter-City Interceptor
- Dependence on a single line to regional plant
- Combined sewers in other communities
- Surcharging
- Regional plant ownership & governance
- Nutrient removal
- Provisions for expansion

# 2018 Nutrient Loadings: Phosphorus



10

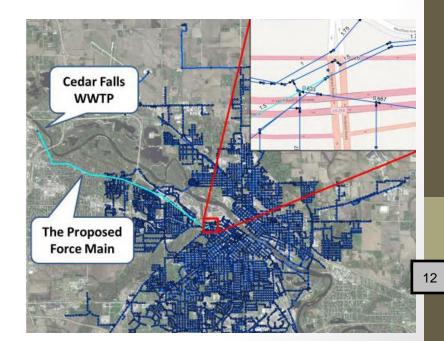
## 2018 Nutrient Loadings: Nitrogen



11

## **Our Regionalization Costs**

- Study: \$50M of cost to Cedar Falls
- Additional costs yet to be identified:
  - Asset "buy out" of the Waterloo plant  $\rightarrow$  regional plant
  - Future improvements of the plant
  - Operation & maintenance costs of the plant
- Collection system split



## **Discussion & Questions**