



DATE: May 22, 2023
TO: Tracey LaBonte, General Manager, Home Gardens Sanitary District
FROM: Doug Dove, President
SUBJECT: BWA Update of Capacity Fee Calculation - 2023

MEMORANDUM

DRAFT MEMO - HGSD PROPOSED UPDATED CAPACITY FEE

INTRODUCTION/BACKGROUND

HGSD's 2023 Water Cost of Service Analysis (COSA) is projected to result in a 25% increase in Sewer Service Charge revenues. However, capital infrastructure projects are also funded by capacity fee revenue.

HGSD's capacity fee has previously been calculated based on a Buy-in methodology where new connections pay for their share of the existing system that has already been built to support them. BWA determined that this methodology was still appropriate for the District.

- The average flow per EDU is estimated at 250 gpd.
- HGSD owned 620,000 gpd of capacity at the WRCRWA treatment plant for 620,000 gpd and recently bought an additional 130,000 gpd in treatment capacity with WRCRWA for a total of 750,000 gpd.
- HGSD's latest 130,000 treatment capacity purchase cost \$1,436,842.
- HGSD's collection system is valued at \$1,773,000 currently.

The capacity fee calculation can be broken down into the following elements:

- A. Capacity Flow*
- B. Buy-in to Existing Collection System*
- C. Buy-in to New Wastewater Treatment Capacity Purchase Cost*
- D. Total Capacity Fee: Combined Unit Costs*

A. Capacity Flow

HGSD recently purchased an additional 130,000 gpd in capacity at the WRCRWA treatment plant, bringing total treatment capacity rights up to 750,000 gpd.

Table 1
Capacity Flow

Home Gardens Sanitary District

Sewer Rate Study

Current dry weather flow (gpd)	620,000
Average flow per EDU (gpd)	250
District's contracted capacity at WRCRWA (gpd)	620,000
Capacity purchase at WRCRWA (gpd)	130,000
Total District capacity at build-out (gpd)	750,000

B. Buy-in to Existing Collection System

The following table calculates a unit cost per gpd for Buy-in to the sewer collection system.

Table 2
Buy-in to Collection System
Home Gardens Sanitary District
Sewer Rate Study

Current Sewer Collection System Buy-in [1]	
Sewer disposal system	\$1,621,000
Donated sewer disposal system	\$152,000
Total Collection System Book Value	\$1,773,000
Collection System Capacity (gpd)	750,000
Unit Cost (Total Cost / Total Capacity)	
\$ per gpd	\$2.36

1 - Home Gardens Sanitary District, Financial Statements and Independent Auditors' Report, June 30, 2022, pg. 15

C. Buy-in to New Wastewater Treatment Capacity Purchase Cost

The District's new capacity purchase cost the District \$1,436,842. Unlike the collection system value above, the cost of this new capacity purchase is only borne by the new connections for whom it serves. As a result, this cost is spread over only the new connections expected to need the new 130,000 gpd in treatment capacity.

Table 3
New Wastewater Capacity Purchase Cost
Home Gardens Sanitary District
Sewer Rate Study

Sewer Treatment Plant Capacity Cost

Latest Wastewater Capacity Purchase Cost [2]	\$1,172,323
Treatment Plant Capacity Purchased (gpd)	130,000
Unit Cost (Purchase Cost / Purchased Capacity) \$ per gpd	\$9.02

2 - Source: Cost and capacity information provided by District

D. Total Capacity Fee: Combined Unit Costs

Finally, the unit costs calculated in Tables 2 and 3 are combined to determine the capacity fee for new connections to HGSD's sewer system.

Table 4
Total Capacity Fee
Home Gardens Sanitary District
Sewer Rate Study

Capacity Fee Combined Unit Cost (Total Cost / Total Capacity)	
Buy-in to collection system	\$2.36
<u>New Treatment plant capacity fee</u>	<u>\$9.02</u>
Total \$ per gpd	\$11.38
Single Family Residential (SFR) capacity fee	
Current Capacity Fee per EDU	\$2,730
Total Proposed 2023 SFR Fee per EDU	\$2,850
