



City of Stevenson

Leana Kinley, City Administrator

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To: Stevenson City Council
From: Karl Russell, Public Works Director and Leana Kinley, City Administrator
RE: Sewer Plant Update
Meeting Date: June 17th, 2021

Executive Summary:

This is an overview of items staff has been working on over the past month in line with the direction council gave to staff.

Overview of Items:

Plant Operations: The plant continues to see marked improvement with the side streaming efforts of Backwoods Brewing, Walking Man and LDB, Inc. The City of Hood River has increased their receiving of biosolids from .12 cents per dry pound to .34 cents. I am currently working on receiving quotes from other sources for competitive pricing.

The average monthly Influent BOD load has been:

2018

- January 675 lbs/day – No Effluent Violations
- February 1,793 lbs/day – No Effluent Violations
- March 1,099 lbs/day – BOD and TSS Effluent Violations
- April 991 lbs/day – BOD and TSS Effluent Violations
- May 1,265 lbs/day – BOD and TSS Effluent Violations
- June 1,124 lbs/day – No Effluent Violations
- July 920 lbs/day – Low pH Violation (one day)
- August 1,113 lbs/day – No Effluent Violations
- September 1,439 lbs/day – Low pH Violation (one day)
- October 1,072 lbs/day – No Effluent Violations
- November 1,032 lbs/day – No Effluent Violations
- December 807 lbs/day – No Effluent Violations

2019

- January 776 lbs/day – Solids washout from clarifiers on 29th and 30th, TSS and BOD Effluent Violations
- February 749 lbs/day – Solids washout from clarifiers on the 18th.
- March 803 lbs/day – Solids washout from clarifiers on March 13th, TSS Effluent Violation
- April 589 lbs/day – Solids washout from clarifiers on April 1st
- May 1,067 lbs/day – No Effluent Violations
- June 897 lbs/day – No Effluent Violations
- July 785 lbs/day – No Effluent Violations
- August 833 lbs/day – No Effluent Violations
- September 720 lbs/day – No Effluent Violations

- October 810 lbs/day – No Effluent Violations
- November 620 lbs/day – No Effluent Violations
- December 588 lbs/day- No Effluent Violations

2020

- January 417 lbs/day- No Effluent Violations
- February 270 lbs/day- No Influent/Effluent Violations, Inf Flow Total 7.532 Mil/Gal.
- March 324 Lbs/day No Influent/Effluent Violations, Inf Flow Total 4.223 Mil/Gal.
- April 389 lbs/day No Influent/Effluent Violations, Inf Flow Total 3.852 Mil/Gal.
- May 295 lbs/day No Influent/Effluent Violations, Inf Flow Total 3.315 Mil/Gal.
- June 502 lbs/day No Influent/Effluent Violations, Inf Flow Total 4.788 Mil/Gal.
- July 427 lbs/day No Influent/Effluent Violations, Inf Flow Total 4.048 Mil/Gal.
- August 458 lbs/day No Influent/Effluent Violations, Inf Flow Total 3.941 Mil/Gal.
- September 427 lbs/day No Influent/Effluent Violations, Inf Flow Total 3.786 Mil/Gal.
- October 353 lbs/day No Influent/Effluent Violations, Inf Flow Total 4.786 Mil/Gal.
- November 417 lbs/day No Influent/Effluent Violations, Inf Flow Total 8.018 Mil/Gal.
- December 363 lbs/day No Influent/Effluent Violations, Inf Flow Total 9.252 Mil/Gal.

2021

- January 834 lbs/day Influent Violation, no effluent violations, Inf Flow Total 8.988 Mil/Gal.
- February 459 lbs/day No Influent/Effluent Violations, Inf Flow Total 8.618 Mil/Gal.
- March 415 lbs/day No Influent/Effluent Violations Inf Flow Total 4.68 Mil/Gal.
- April 444 lbs/day No Influent/Effluent Violations Inf Flow Total 3.977 Mil/Gal.
- May 533 lbs/day No Influent/Effluent Violations Inf Flow Total 5.139 Mil/Gal.

The current permit limit for Influent is 612 lbs/day and the current upgrades in the adopted General Sewer Plan call for a design max monthly BOD loading of 1,611 lbs/day.

WWTP Design:

Final design of the WWTP has been completed. Bids for WWTP equipment are scheduled to go out in August 2021 and the project bid is scheduled for December 2021. Crestline Construction is the apparent low bidder for the Rock Creek Lift Station and Storm Outfall Project. Project approval is on the agenda for this council meeting.

Funding:

Staff submitted an application for \$9.9M in construction funding through the Department of Ecology for the wastewater treatment plant and extension of the sewer line. The initial offer is for a \$931,946 grant, \$9,004,054 loan at 1.5% interest for 30 years (approx. \$375k annual payment). Staff requests input on what council priorities are with a financing package. Attached are examples of the different financing options for council discussion.

Compliance:

The draft amendment to the Administrative Order is still in process. When it is finalized, it will require additional testing.

Action Needed:

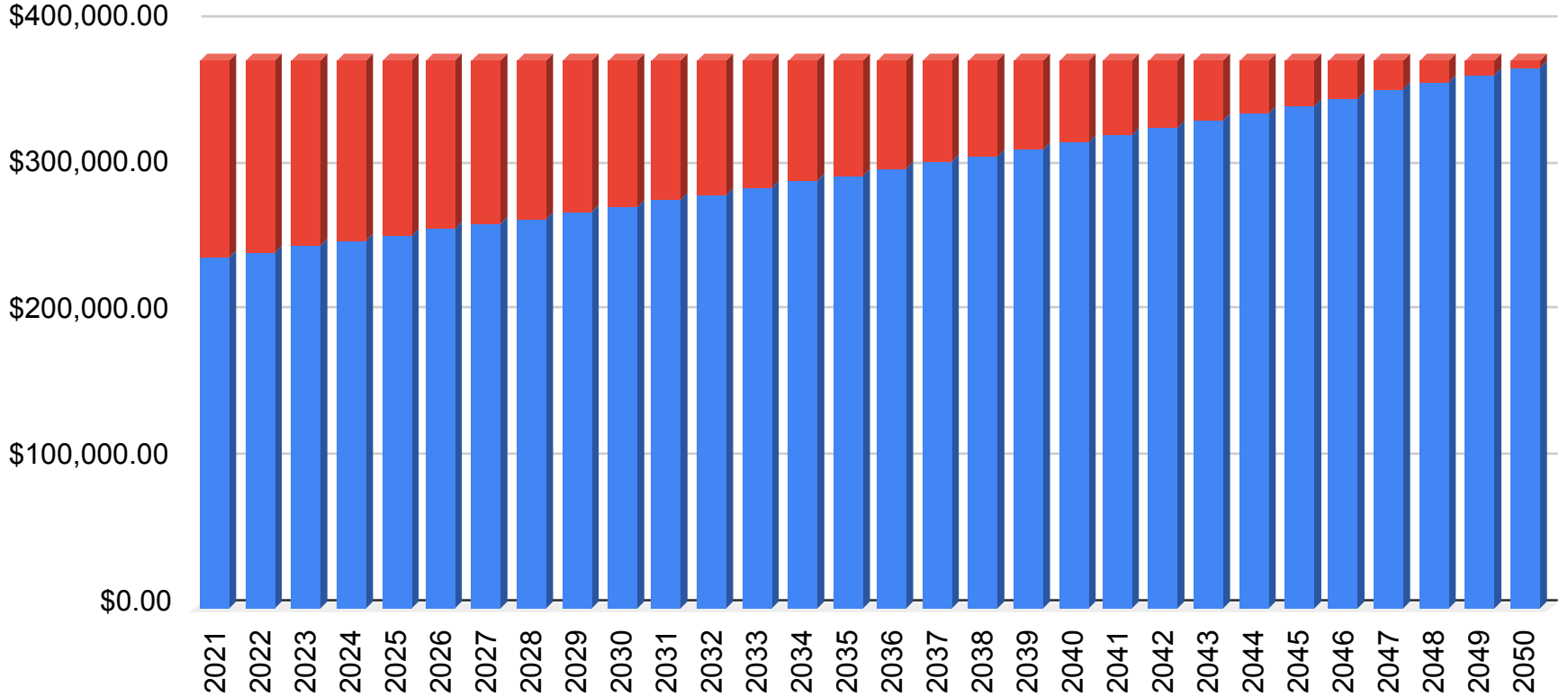
Determine way forward on financing methods.

DOE at 1.5% over 30 Years

Annual Payment = \$373,818.70

Total Interest = \$2,210,507.08

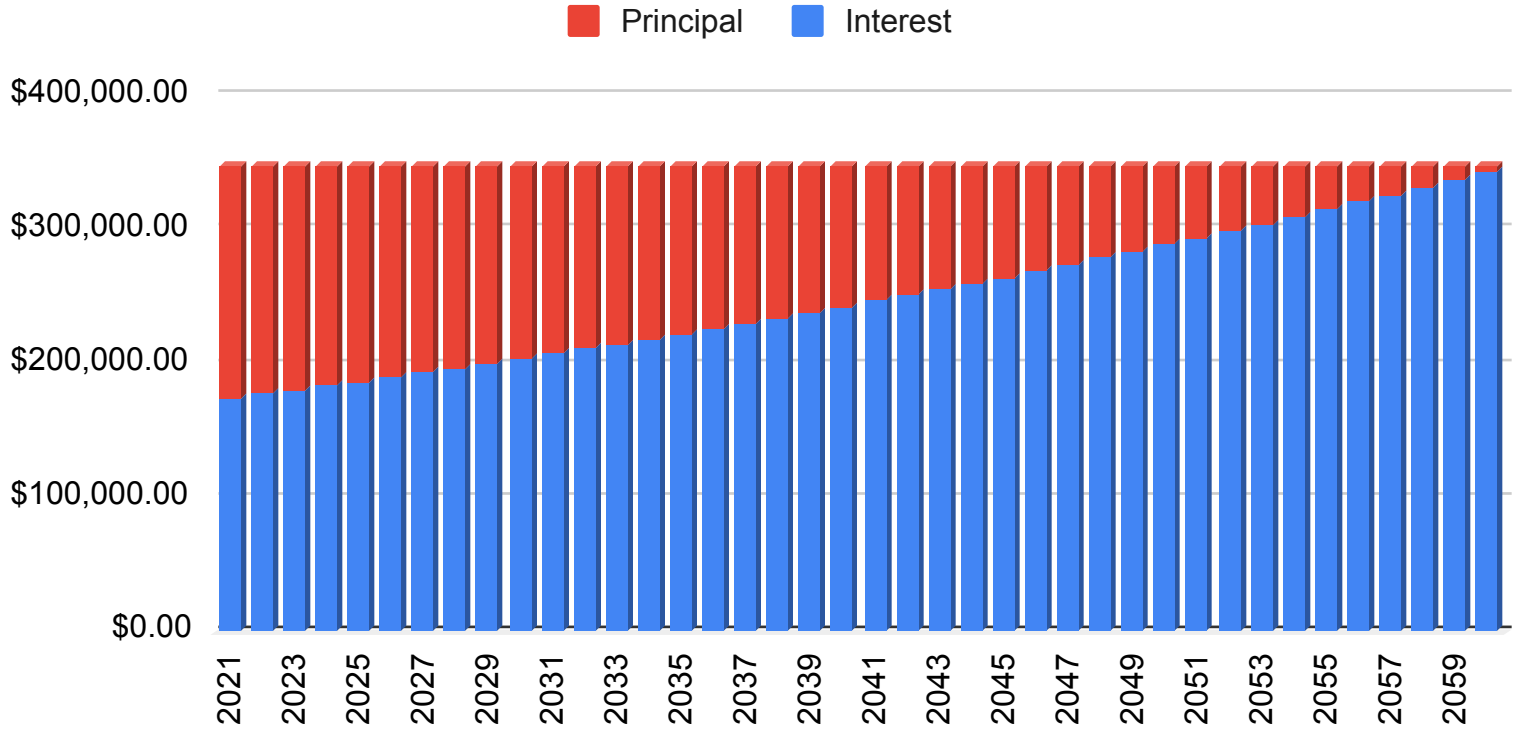
Principal Interest



USDA \$10 Million at 1.75% over 40 Years

Annual Payment = \$348,674.75

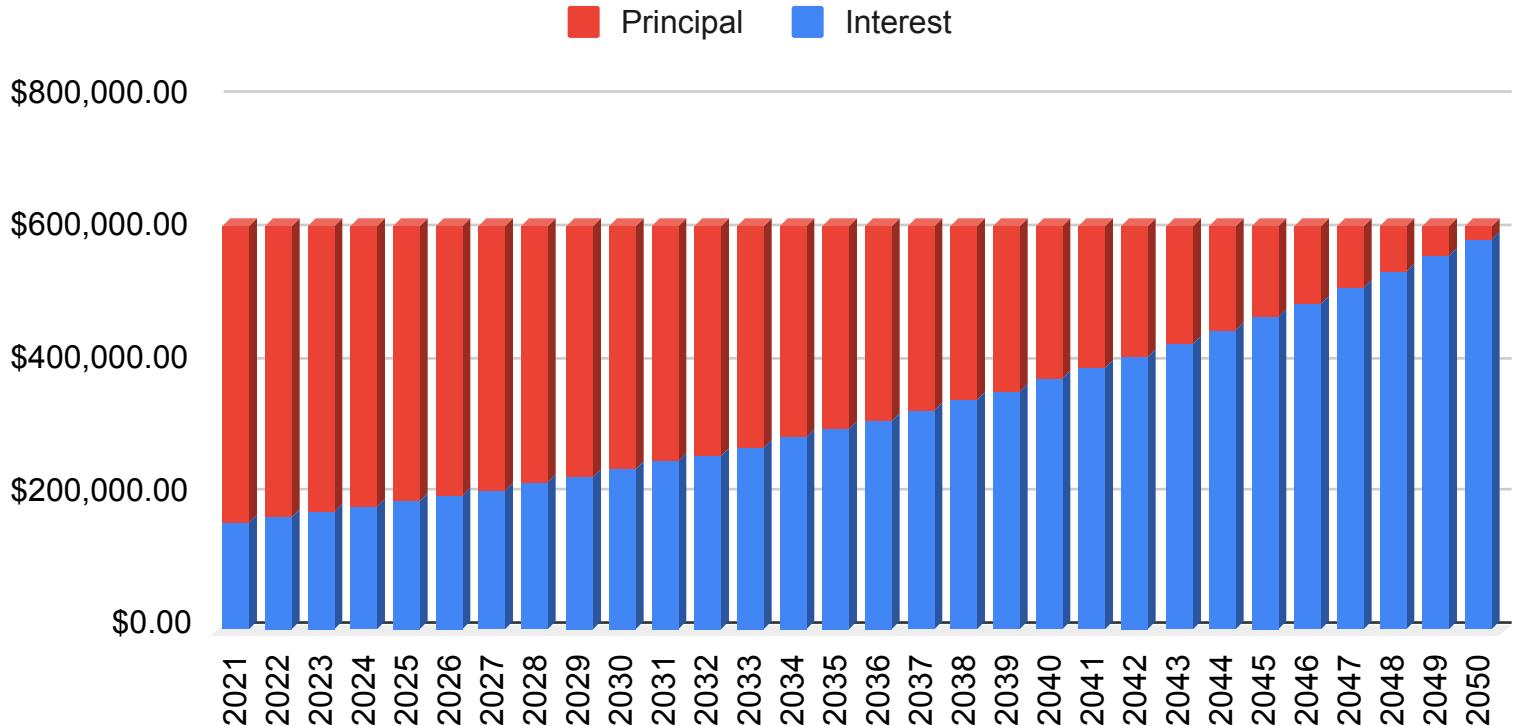
Total Interest = \$3,880,490.42



Holman Capital \$10 Mil @ 4.5% over 30 Years

Annual Payment = \$610,706.55

Total Interest = \$8,321,196.49

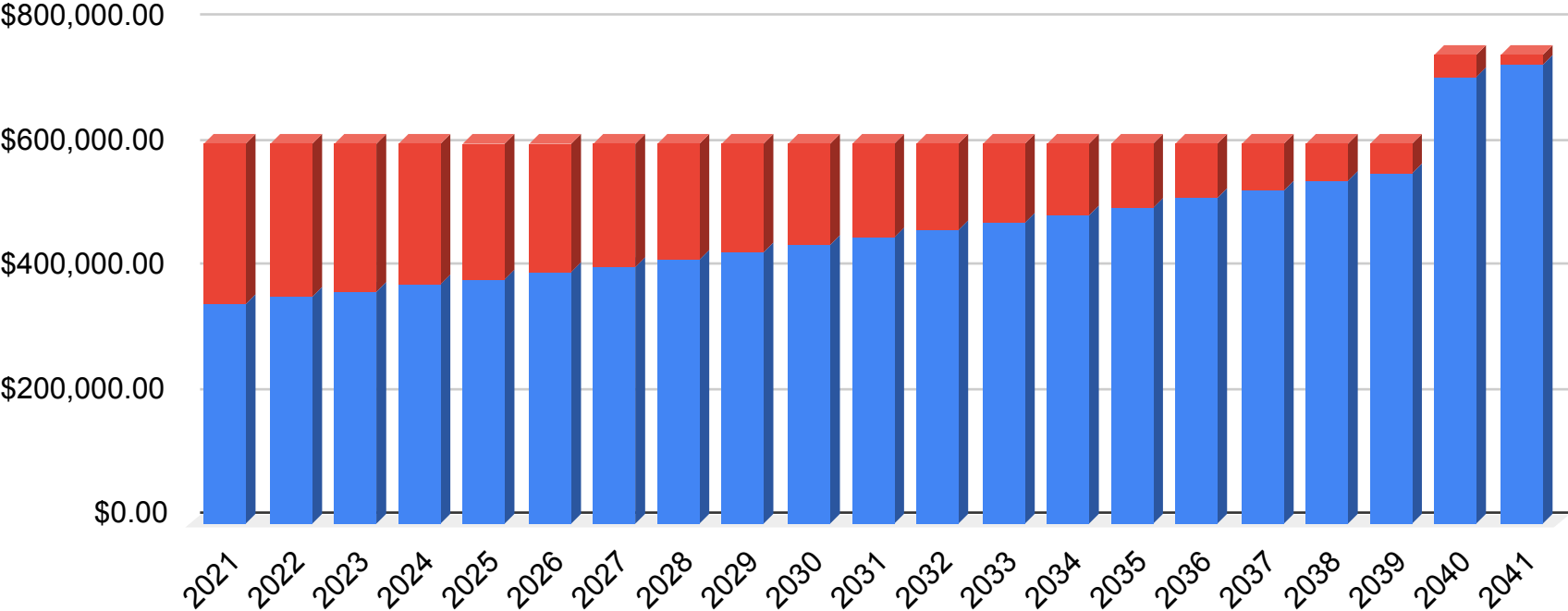


Holman Capital \$10 Mil @ 2.6% for 10 on 4.5%/30 Amortization Sch.

Annual Payment = \$610,706.55

Total Interest = \$3,103,829.48

Principal Interest



USDA \$16 Million at 1.75% over 40 Years

Annual Payment = \$557,879.60

Total Interest = \$6,208,784.68

