

Crowe LLP Independent Member Crowe Global

575 Market Street, Suite 3300 San Francisco, California 94105-5829 Tel 415.576.1100 Fax 415.576.1110 www.crowe.com

San Francisco Public Utilities Commission 525 Golden Gate Avenue, 13th Floor San Francisco, CA 94102

September 16, 2024

- To: Steven Ritchie, Assistant General Manager, Water Enterprise Ellen Levin, Deputy Assistant General Manager, Water Angela Cheung, Water Supply & Treatment Manager Annette Devincenzi, Warehouse Manager
- Cc: Ronald P. Flynn, Deputy General Manager Nancy L. Hom, Assistant General Manager, Business Services and Chief Financial Officer Vivian Chen, Deputy Chief Financial Officer Laura Busch, Deputy Chief Financial Officer Irella Blackwood, Audit Director Jennifer Hopkins, Information Technology Services Director
- Subject: Fiscal Year End 2023-2024 Inventory Count – Water Enterprise, Millbrae Warehouse and Sunol Yard Fuel Station

Dear Mr. Ritchie, Ms. Levin, Ms. Cheung, and Ms. Devincenzi:

The San Francisco Public Utilities Commission (SFPUC) engaged Crowe LLP (Crowe) to perform full inventory count services for three enterprise funds including the Wastewater Enterprise, Water Enterprise, and Hetch Hetchy Enterprise.¹ This report represents results of Crowe's full count of the Water Enterprise's Millbrae warehouse and fuel inventory at the Millbrae and Sunol Yards.

A. Scope of Inventory Work

The SFPUC requested Crowe perform full inventory count services of these enterprise activities to test whether significant variances exist between the physical count and the records in the SFPUC's Maximo Inventory Tracking System (Maximo), to determine the cause of variances, and to determine amounts that need to be adjusted in Maximo. The SFPUC requested reporting of the analysis, findings, and recommendations consistent with the format requested by SFPUC's Financial Services Bureau.

B. Warehouse Locations

The locations for the Water Enterprise full inventory count were:

Millbrae Warehouse 1000 El Camino Real Millbrae, CA 94030

Sunol Yard 505 Paloma Way Sunol, CA 94586

¹ Note that some of the enterprises have multiple warehouse locations.



On June 18, 2024, Crowe visited the locations above and conducted the FY 2023-2024 full inventory count that is the subject of this report. The last full inventory count of the locations was performed by Crowe for FY 2022-2023 on June 27, 2023. In **Table 1** below, we provide key data^{2,3} from both full inventory counts.

Table 1

San Francisco Public Utilities Commission Water – Millbrae Warehouse and Sunol Yard Inventory Count Comparison with Prior Full Inventory Counts (As of June 18, 2024)

Description	FY 202	3-2	024	FY 2022-2023			
Description	Items		Value	Items	Value		
Total Inventory	1,241	\$	616,535	1,132	\$	642,514	
(per Maximo) Total Inventory Variance							
(per Crowe's Count)	21	\$	(3,741)	15	\$	(6,839)	
Total Inventory Variance (as a percentage of Total Inventory)	1.7%		(0.6%)	1.3%		(1.1%)	

Results

As indicated in Table 1, variances were identified between Crowe's full inventory count and the count reported in the Maximo system. The following finding explains the variances in counts. Crowe's recommendation related to this finding is also included.

Finding #1 – Physical Inventory Counts Differed from Maximo Report Counts

Condition:

Of the 1,241 items we counted, 21, or 1.7%, had a variance between their physical count and their count in Maximo.⁴ Based on the physical count, and using the average cost in Maximo, we determined that the total value of the combined variances in the Millbrae Warehouse and Sunol Yard inventories was (\$3,741), or (0.6%) of the total inventory value of \$616,535 in Maximo.⁵

We found 6 positive variances (where the physical count was greater than the Maximo inventory count) which totaled \$29. We found 15 negative variances (where the physical count was less than the Maximo inventory count) which totaled (\$3,769). In **Table 2** below we provide a summary of variances which shows that most of the variance dollar amount is fuel related.

² In this report, percentages are rounded to one decimal place. Monetary values are rounded to the nearest whole dollar unless doing so would obscure the data, in which case they are presented without rounding.

³ Crowe did not perform any procedures related to the assigned value in the Maximo system.

⁴ Of the 21 items which had a variance, 5 were issued on an emergency basis after the Maximo system report was generated. Warehouse staff provided documentation of this on the day of Crowe's inventory count. The total value of the variance associated with these 5 items was (\$98). If these items are excluded, total inventory variance as a percentage of total inventory falls from 1.7% to 1.3%.

⁵ The (\$3,741) variance is the difference between \$27,358, which is the total value of the 21 items with variances using Crowe's physical count for each item, and \$31,098, which is the total value of the 21 items with variances using the Maximo count for each item. The difference of (\$1) between the (\$3,741) variance in Table 1 and the (\$3,740) implied by the dollar amounts in this footnote (i.e., \$27,358 minus \$31,098 equals (\$3,740)) is due to intermediate rounding.



Table 2 San Francisco Public Utilities Commission Water – Millbrae Warehouse and Sunol Yard Inventory Count Summary of Variances

Description	Item Count	Amount
Fuel Variances		
Positive	-	\$-
Negative	4	(3,480)
Total Fuel Variance	4	(3,480)
Other Variances	-	
Positive	6	29
Negative	11	(289)
Total Other Variances	17	(260)
Rounding Adjustment		(1)
Total Variance	21	\$ (3,741)

As shown in **Table 3** below, based on the fuel dip procedures Crowe performed for this physical count, we found the actual quantities of fuel contained in the four tanks varied from those in the Maximo system. We believe that the quantities we observed during our physical count using a manual dip process and a conversion formula were reasonably accurate as they closely matched quantities registered by an electronic measurement system contained in the fuel tanks that the Water Enterprise generated that day (referred to as the System Status Report). **Table 4** provides the other non-fuel count variances.

Table 3 San Francisco Public Utilities Commission Water – Millbrae Warehouse and Sunol Yard Fuel Inventory Summary of Fuel Gallon and Cost Variances⁶

Item				Maximo	Crowe			
Number	Description	Item Code	Unit	6.17.24	6.18.24	Variance	Average Cost	Cost of Variance
1	GASOLINE, AUTO, UNLEADED, MILLBRAE	091-30-3255	GAL	2,618.6	2,134.5	(484.1)	\$ 3.2069	\$ (1,552)
2	GASOLINE, DIESEL FUEL, MILLBRAE	091-40-3146	GAL	1,675.0	1,607.5	(67.5)	4.4931	(303)
3	GASOLINE, AUTO, UNLEADED, SUNOL	091-30-3260	GAL	1,009.1	814.0	(195.1)	5.2714	(1,028)
4	GASOLINE, DIESEL, SUNOL	091-40-3147	GAL	1,006.6	870.0	(136.6)	4.3621	(596)
	Rounding Adjustment							(1)
							Total	\$ (3,480)

⁶ The Maximo count and valuation data used in this report is as of the end of the business day prior to Crowe's count. Due to the Maximo inventory system synchronizing with the EJ Ward fuel management system during the night, the fuel tank level data in Maximo is as of the end of the business day that was two business days prior to Crowe's count. Therefore, some of the fuel variance may be due to regular fuel transactions that occurred on the business day prior to Crowe's count.



Table 4 San Francisco Public Utilities Commission Water – Millbrae Warehouse and Sunol Yard Fuel Inventory Summary of Non-Fuel Count Variances⁷

Item Number	Description	Item Code	Unit	Maximo 6.17.24	Crowe 6.18.24	Variance	Average Cost	Cost of Variance
1	BOLT, HEX, STEEL, N.C., 5/8"X 4-1/2"	053-06-4467	EA	214	223	9	\$ 0.99	\$9
2	EAR PLUG, YELLOW, FOAM, UNCORDED, 200 PR/BX. (4T147)	042-40-0500	PR	180	200	20	0.31	6
3	REDUCER, PIPE, M.I., GALV, 1 X 1/2" (1MPN6)	047-33-5842	EA	28	29	1	5.23	5
4	GASKET MATERIAL, RUBBER	047-31-9031	SF	167	168	1	3.33	3
5	CHAIN, WELDED, PROOF COIL, 3/16"	040-10-1650	FT	75	77	2	1.63	3
6	BOLT, CARRIAGE, STEEL, H.T., 1/2" X 5"	053-06-1539	EA	90	92	2	0.99	2
7	NUT, HEX, STL, HVY, N.C. 3/4", ZINC PLTD	053-10-2087	EA	252	244	(8)	0.75	(6)
8	NUT, HEX, STL., HVY., 1" ZINC PLTD.	053-10-2099	EA	130	125	(5)	1.40	(7)
9	GLOVE, G-TEK, MEDIUM	084-15-6015	PR	60	59	(1)	7.88	(8)
10	BOLT, HEX, STEEL, NC, 5/8 X 2-1/2"	053-06-4460	EA	90	79	(11)	1.12	(12)
11	BOLT, HEX,STL, GR-5, NC, 3/8" X 1", PLAIN	053-00-3545	EA	100	54	(46)	0.31	(14)
12	BOLT, HEX,STL, GR-5, NC, 3/4" X 3-1/2", ZINC PLT	053-00-3918	EA	132	124	(8)	2.38	(19)
13	GASKET, RUBBER, FULL FACE, C.I., 1/8" THICK, 8" DIA, NSF-61	047-31-9014	EA	40	39	(1)	26.58	(27)
14	CEMENT, PORTLAND, #105, LOW TYPE I-II ALKALI	056-10-1400	SJ	16	13	(3)	10.85	(33)
15	ELBOW, PIPE, STEEL, WELDING, 6", 90 DEG, SHORT RADIUS	047-31-5025	EA	5	4	(1)	32.67	(33)
	CARTRIDGE, FILTER, RESPIRATOR - COMBINATION - NORTH 75SCP100	042-40-1560	EA	21	20	(1)	38.50	(39)
17	NUT, PLN, NC, THRD, 1/4"	053-10-2089	HUN	170	150	(20)	4.62	(92)
	Rounding Adjustment							1
							Total	\$ (261)

Criteria:

Chapter 6 of the City and County of San Francisco Office of the Controller's Accounting Policies and Procedures identifies that Departments shall conduct a physical inventory at least annually and ensure that the inventory management system records accurately reflect inventory on hand. Additionally, Section 6.1 (Policy Guidelines) indicates that inventory system records must be promptly adjusted for any variances identified in the physical counts; Departments must periodically review the inventory records for reasonableness and appropriateness of any changes to inventory unit cost, inventory valuation, and unit of measure, and Departments must periodically review the inventory for obsolescence and reasonableness of inventory classification. The Policy Guidelines also indicate that Departments should investigate significant variances between the physical count, the inventory system records, and the accounting records; document the reasons for variance; and take corrective actions to reduce future variances.

Cause:

Millbrae and Sunol Warehouse staff identified the reasons for the differences in this physical count compared to the count in Maximo. The reasons included minor miscounts during periodic cycle counts, occasional system posting manual errors by the individual entering the quantity or unit of measure, and several items issued by warehouse staff after the Maximo system inventory report was generated.⁸

Regarding the fuel variances observed, we determined that the Water Enterprise uses the automated fuel tracking information system, E.J. Ward, to capture fuel usage and the SFPUC Information Technology Services Bureau has developed an interface designed to periodically upload the E.J. Ward fuel usage data to the Maximo system. However, based on problems with the system interface between the E.J. Ward system and the Maximo system, actual Water Enterprise fuel usage data was not consistently and accurately uploaded into Maximo causing the variances.

⁷ The total of (\$261) from Table 4 is the sum of two items from Table 2: Total Other Variances of (\$260) and Rounding Adjustment of (\$1).

⁸ This was the case for five items which warehouse staff issued on an emergency basis. The total dollar value of the variance due to these five items was (\$98).



Effect:

The combined Millbrae and Sunol inventory value in the Maximo system is overstated by \$3,741. Regarding the fuel usage variances, absent periodic monitoring of the fuel levels, the Millbrae Warehouse and Sunol Yard will have difficultly reconciling future inventories and identifying variances that are the result of missing fuel (e.g., theft), delivery errors, data entry errors, tank leaks, or shrinkage.

Recommendation:

The Millbrae Warehouse staff should update the asset inventory counts in Maximo after management approval. The SFPUC's Financial Services Bureau should adjust the General Ledger to reflect the actual cost of inventory on hand. If the E.J. Ward system cannot be made to work consistently it should be replaced or upgraded.

Management Response:

Millbrae Warehouse's asset inventory counts were updated in Maximo following the audit. All inventory items are updated on a regular basis.

The E. J. Ward fuel management system is managed by SFPUC Fleet. There is another cause for fuel variances between E. J. Ward and Maximo. Leased vehicles are included in the E.J. Ward system so the vehicles could obtain fuel from Millbrae and Sunol Yards. However, the short-term leased vehicles are not added to Maximo. If these vehicles are added to Maximo, the fuel variances should be lower between the two systems. The E. J. Ward system is in need of an upgrade. The current system is used by all SFPUC worksites and is at the end of its service life. Repairs had to be made to the system in Millbrae in the past year to make it functional again.

Other Matters

This full inventory count did not constitute an audit, examination, review, or compilation of the historical and prospective financial information conducted in accordance with generally accepted auditing standards or with other standards established by the American Institute of Certified Public Accountants (AICPA). Accordingly, Crowe is unable to express an opinion or any other form of assurance with respect to any of the historical or prospective financial information. Crowe did not perform any procedures to verify the Management Response and Crowe does not provide any assurance regarding the accuracy or completeness of the response. Any and all amounts referred to in this letter are preliminary and could change should additional procedures be performed. Additionally, issues that are not mentioned here could develop subsequent to the date of this letter that may have impacted Crowe's analysis or that Crowe may cite should additional procedures be performed.

The inventory services did not contemplate obtaining the understanding of internal controls or assessing control risk, tests of accounting records and responses to inquiries by obtaining corroborating evidential matter, and certain other procedures ordinarily performed during an audit or examination. Thus, this engagement did not provide assurance that we became aware of significant matters that would be disclosed in an audit or examination.

As part of this inventory, the SFPUC agreed to be responsible to: make all management decisions and perform all management functions; designate an individual who possesses suitable skill, knowledge, and/or experience, preferably within senior management to oversee our services; evaluate the adequacy and results of the services performed; accept responsibility for the results of the services; and establish and maintain internal controls, including monitoring ongoing activities. The SFPUC has ultimate authority for making changes to inventory reported in its Maximo system and on its financial statements.

Crowe's fees are not dependent upon the outcome of this report and Crowe is independent with respect to any other economic interests.



We appreciate the contribution of SFPUC management and your input and direction on this project. We also thank Millbrae Warehouse and Sunol Yard management and staff for providing access to the inventory and for timely responses to our requests.

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San Francisco Public Utilities Commission 525 Golden Gate Avenue, 13th Floor San Francisco, CA 94102

September 16, 2024

- To: Steve Ritchie, Assistant General Manager, Water Enterprise Margaret Hannaford, Division Manager, Hetch Hetchy Water/Moccasin Cheryl Sperry, Business Services Manager Alan Thoburn, Asset Management Services Manager Ray Emerald, Assistant Materials Coordinator
- Cc: Ronald P. Flynn, Deputy General Manager Nancy L. Hom, Assistant General Manager, Business Services and Chief Financial Officer Vivian Chen, Deputy Chief Financial Officer Laura Busch, Deputy Chief Financial Officer Irella Blackwood, Audit Director Jennifer Hopkins, Information Technology Services Director
- Subject: Fiscal Year End 2023-2024 Inventory Count – Hetch Hetchy Enterprise, Moccasin Warehouse

Dear Mr. Ritchie, Ms. Hannaford, Ms. Sperry, Mr. Thoburn, and Mr. Emerald:

The San Francisco Public Utilities Commission (SFPUC) engaged Crowe LLP (Crowe) to perform full inventory count services for three enterprise funds including the Wastewater Enterprise, Water Enterprise, and Hetch Hetchy Enterprise.¹ This report represents results of Crowe's full count of the Hetch Hetchy Enterprise – Moccasin Warehouse inventory.

A. Scope of Inventory Work

The SFPUC requested Crowe perform full inventory count services of these enterprise activities to test whether significant variances exist between the physical count and the records in the SFPUC's Maximo Inventory Tracking System (Maximo), to determine the cause of variances, and to determine amounts that need to be adjusted in Maximo. The SFPUC requested reporting of the analysis, findings, and recommendations consistent with the format requested by SFPUC's Financial Services Bureau.

B. Warehouse Location

The location for the Hetch Hetchy Enterprise full inventory count was:

Moccasin Warehouse 10390 Moccasin Switchback Road Moccasin, CA 95347

On June 20, 2024, Crowe visited the location above and conducted the FY 2023-2024 full inventory count that is the subject of this report. The last full inventory count of the location above was performed by

¹ Note that some of the enterprises have multiple warehouse locations.



Table 1San Francisco Public Utilities CommissionHetch Hetchy Moccasin Warehouse Inventory CountComparison with Prior Full Inventory Counts(As of June 20, 2024)

Description	FY 202	3-2	024	FY 2022-2023			
Description	Items	Value		Items		Value	
Total Inventory (per Maximo)	2,349	\$	465,934	2,339	\$	470,945	
Total Inventory Variance (per Crowe's Count)	36	\$	(977)	34	\$	(220)	
Total Inventory Variance (as a percentage of Total Inventory)	1.5%		(0.2%)	1.5%		(0.05%)	

Results

As indicated in Table 1, variances were identified between Crowe's full inventory count and the count reported in the Maximo system. The following finding explains the variances in counts. Crowe's recommendation related to this finding is also included.

Finding #1 – Physical Inventory Counts Differed from Maximo Report Counts

Condition:

Of the 2,349 items we counted, 36 items, or 1.5%, had a variance between their physical count and their count in Maximo. Based on the physical count, and using the average cost in Maximo, we determined that the total value of the variances in the Moccasin Warehouse inventory was (\$977), or (0.2%) of the total inventory value of \$465,934 in Maximo.⁴

We found 17 positive variances (where the physical count was greater than the Maximo inventory count) which totaled \$3,392.⁵ We found 19 negative variances (where the physical count was less than the Maximo inventory count) which totaled (\$4,369). In **Table 2** below we provide a summary of variances.

² In this report, percentages are rounded to one decimal place unless they would round to 0.0%, in which case they are rounded to two decimal places. Monetary values are rounded to the nearest whole dollar unless doing so would obscure the data, in which case they are presented without rounding.

³ Crowe did not perform any procedures related to the assigned value in the Maximo system.

⁴ The (\$977) variance is the difference between \$36,785, which is the total value of the 36 items with variances using Crowe's physical count for each item, and \$37,762, which is the total value of the 36 items with variances using the Maximo count for each item.

⁵ While it appears that the total positive variance in Table 2 is \$3,393, this is because the \$3,300 of positive variance and the \$93 of positive fuel variance in Table 2 are intermediate rounded figures. If the unrounded amounts are added and then rounded to the nearest dollar, the total is \$3,392.



Table 2San Francisco Public Utilities CommissionHetch Hetchy Moccasin Warehouse Inventory CountSummary of Variances

Description	Item Count	Amount
Fuel Variances	-	
Positive	2	\$ 93
Negative	7	(4,342)
Total Fuel Variance	9	(4,249)
Other Variances		
Positive	15	3,300
Negative	12	(27)
Total Other Variances	27	3,273
Rounding Adjustment		(1)
Total Variance	36	\$ (977)

As shown in **Table 3** below, based on the fuel dip procedures Crowe performed for this physical count, we found the actual quantities of fuel contained in the nine tanks varied slightly, or by (\$4,249), from those in the Maximo system. **Table 4** provides the other \$3,273 in non-fuel count variances.

Table 3

San Francisco Public Utilities Commission Hetch Hetchy Moccasin Warehouse Inventory Count Summary of Fuel Count Variances⁶

Item				Maximo	Crowe			
Number	Description	Item Code	Unit		6.20.24	Variance	Average Cost	Cost of Variance
1	GASOLINE, UNLEADED, CHERRY VLY., #11.	091-30-3185	GAL	324.0	314.0	(10.0)	\$ 4.87	\$ (49)
2	GASOLINE, unlead, EARLY INTAKE, #05	091-30-3212	GAL	2,813.0	2,835.0	22.0	4.20	93
	FUEL, RENEWABLE DIESEL, EARLY INTAKE							
3	(CHANGED FROM #2 DIESEL 4/12/16)	091-40-3149	GAL	1,182.0	775.0	(407.0)	4.67	(1,899)
	FUEL, RENEWABLE DIESEL, LOCATION:							
4	MOCC,#03	091-40-3148	GAL	1,225.0	1,247.0	22.0	-	-
5	GASOLINE, MOCCASIN , # 4-5 tanks	091-30-3271	GAL	3,020.0	2,922.0	(98.0)	-	-
6		091-30-3240	GAL	154.4	86.2	(68.2)	3.12	(213)
	FUEL, RENEWABLE DIESEL, SOUTH							
7	FORK,#10 (CHANGED FROM #2 DIESEL	091-40-3150	GAL	159.7	157.9	(1.8)	4.47	(8)
8	GASOLINE, UNLEADED, OAKDALE,#7.	091-30-3195	GAL	1,784.0	1,330.0	(454.0)	4.73	(2,147)
	FUEL, RENEWABLE DIESEL OAKDALE							
9	(renamed from BIO DIESEL 3/3/16)	091-40-3170	GAL	876.5	870.4	(6.1)	4.37	(27)
	Rounding Adjustment							1
							Total	\$ (4,249)

⁶ The Maximo count and valuation data used in this report is as of the end of the business day prior to Crowe's count. Due to the Maximo inventory system synchronizing with the EJ Ward fuel management system during the night, the fuel tank level data in Maximo is as of the end of the business day that was two business days prior to Crowe's count. Therefore, some of the fuel variance may be due to regular fuel transactions that occurred on the business day prior to Crowe's count.



Table 4 San Francisco Public Utilities Commission Hetch Hetchy Moccasin Warehouse Inventory Count Summary of Non-Fuel Count Variances

Item				Maximo	Crowe		Average	Cost of
Number	Description	Item Code	Unit	6.18.24	6.20.24	Variance	Cost	Variance
1	PIPE, 2" STAINLESS STEEL, ROLLED GROOVE, S-10, 20' LENGTH	047-10-SS20	EA	10	17	7	\$ 425.14	\$ 2,976
2	TONER CARTRIDGE, CF413X, MAGENTA, HP	010-10-CF413A	EA	1	2	1	217.22	217
3	WIRE NUT CONNECTOR, GREY, IDEAL#30-342 (6YH57)	059-40-4971	EA	150	250	100	0.28	28
4	NAPA# 3536 FUEL FILTER, EQUIP. 712	023-81-3536	EA	0	1	1	25.99	26
5	BOWERS# 4SW SPL 4" METAL BOX	059-77-6800	EA	4	19	15	1.24	19
6	4" NO HUB CLAMP	048-32-0400	EA	2	4	2	5.91	12
7	BOLT, GALV.,SQ. HD., 5/8" X 10", KORTICK ,25/BX.	053-01-5810M	EA	48	50	2	3.67	7
8	NIPPLE, GALV. STEEL, 3/4 X 6,(6P814)	047-32-4685	EA	6	8	2	3.06	6
9	TBD SPLICE, SPLIT BOLT, 12 Str-10 Str, CONDUCTOR	059-40-5009	EA	51	56	5	0.81	4
10	1/2" 1 HOLE GRC STRAP	059-76-1521	EA	88	90	2	1.13	2
11	T&B #C33 NON INS RING TERM 12-10	059-40-6548	EA	500	512	12	0.11	1
12	T&B, #A18-10F, NON INS FORK TERM, 22-16, 100/PKG.	059-40-6602	EA	250	252	2	0.36	1
13	ROMEX STAPLE, #125P5, (500 bx.)	059-40-1251	EA	500	512	12	0.03	-
14	10-32 X 2", RND. HD. MACH SCREW	053-01-1020	EA	385	386	1	0.09	-
15	GLOVES, NITRILE, DISPOSABLE, SMALL	084-15-6364B	BX	0	3	3	-	-
16	REDUCING WASHER, 1" X 1/2"	059-75-0112	EA	54	50	(4)	-	-
17	REDUCING WASHER, 1" X 3/4'	059-75-0134	EA	59	50	(9)	-	-
18	REDUCING WASHER, 3/4" X 1/2"	059-75-3412	EA	110	99	(11)	-	-
19	10-32 X 1", RND. HD. MACH SCREW, 100/PKG. (2EE25)	053-01-1010	EA	318	316	(2)	0.06	-
20	3/4" EMT 2 HOLE STRAP	059-76-1602	EA	103	101	(2)	0.08	-
21	WIRENUT, TAN, IDEAL# 30-341 100/BX.	059-40-4970	EA	100	97	(3)	0.22	(1
22	COUPLING, 1-1/2" PVC PIPE, SCH 40, S X S	047-30-9033	EA	24	22	(2)	0.63	(1
23	BOLT, CAP, HEX, NC, 1/2-13 x 4, 5/PKG. (23KZ79)	053-01-2127	EA	15	13	(2)	0.90	(2
24	T&B #C10-8F NON INS FORK TERM 12-10	059-40-6801	EA	150	144	(6)	0.51	(3
25	T&B #B14-6F NON INS FORK TERM 18-14	059-40-6700	EA	200	180	(20)	0.32	(6
26	REPAIR NIPPLE, 1/2" SLIP	048-22-12RN	EA	13	11	(2)	3.25	(6
27	REDUCING WASHER, 1 1/2-1	059-75-0151	EA	56	50	(6)	1.15	(7
							Total	\$ 3,273

Criteria:

Chapter 6 of the City and County of San Francisco Office of the Controller's Accounting Policies and Procedures identifies that Departments shall conduct a physical inventory at least annually and ensure that the inventory management system records accurately reflect inventory on hand. Additionally, Section 6.1 (Policy Guidelines) indicates that inventory system records must be promptly adjusted for any variances identified in the physical counts; Departments must periodically review the inventory valuation, and unit of measure, and Departments must periodically review the inventory for obsolescence and reasonableness of inventory classification. The Policy Guidelines also indicate that Departments should investigate significant variances between the physical count, the inventory system records, and the accounting records; document the reasons for variance; and take corrective actions to reduce future variances.

Cause:

Moccasin Warehouse staff identified the reasons for the differences in this physical count compared to the count in Maximo. The reasons included miscounting, data entry errors, and small variances due to weighing nuts and bolts with a scale instead of individually counting them. Regarding the fuel variances observed, we determined that the Moccasin Warehouse uses the automated fuel tracking information system, E.J. Ward, to capture fuel usage and the SFPUC Information Technology Services Bureau has developed an interface designed to periodically upload the E.J. Ward fuel usage data to the Maximo system. There may be delays in updating data because of poor network communication systems. The small variances from the quantities we observed during our physical count and those current in Maximo were caused by rounding errors as a result of using a manual dip process and a conversion formula to determine fuel quantities.



Effect:

The Moccasin Warehouse inventory value in the Maximo system is overstated by \$977.

Recommendation:

The Moccasin warehouse staff should update the asset inventory counts in Maximo after management approval. The SFPUC Financial Services Bureau should adjust the General Ledger to reflect the actual cost of inventory on hand. If the E.J. Ward system cannot be made to work consistently it should be replaced or upgraded.

Management Response:

Hetch Hetchy Water concurs with the recommendations and has made the corresponding adjustments in Maximo. Improvement in Hetch Hetchy Water's fuel inventory management is a critical need. The EJ Ward fuel system continues to be an ongoing challenge with connectivity (telemetry issues) that negatively impacts inventory accuracy, reordering, and preventative maintenance scheduling for vehicles. This has led to manually tracking fuel inventory to mitigate system shortfalls. Correcting E.J. Ward fuel system problems will require network connectivity and communication system upgrades, as well as fuel system hardware and software upgrades. Hetch Hetchy Water is investigating options for next steps.



This full inventory count did not constitute an audit, examination, review, or compilation of the historical and prospective financial information conducted in accordance with generally accepted auditing standards or with other standards established by the American Institute of Certified Public Accountants (AICPA). Accordingly, Crowe is unable to express an opinion or any other form of assurance with respect to any of the historical or prospective financial information. Crowe did not perform any procedures to verify the Management Response and Crowe does not provide any assurance regarding the accuracy or completeness of the response. Any and all amounts referred to in this letter are preliminary and could change should additional procedures be performed. Additionally, issues that are not mentioned here could develop subsequent to the date of this letter that may have impacted Crowe's analysis or that Crowe may cite should additional procedures be performed.

The inventory services did not contemplate obtaining the understanding of internal controls or assessing control risk, tests of accounting records and responses to inquiries by obtaining corroborating evidential matter, and certain other procedures ordinarily performed during an audit or examination. Thus, this engagement did not provide assurance that we became aware of significant matters that would be disclosed in an audit or examination.

As part of this inventory, the SFPUC agreed to be responsible to make all management decisions and perform all management functions; designate an individual who possesses suitable skill, knowledge, and/or experience, preferably within senior management to oversee our services; evaluate the adequacy and results of the services performed; accept responsibility for the results of the services; and establish and maintain internal controls, including monitoring ongoing activities. The SFPUC has ultimate authority for making changes to inventory reported in its Maximo system and on its financial statements.

Crowe's fees are not dependent upon the outcome of this report and Crowe is independent with respect to any other economic interests.

We appreciate the contribution of SFPUC management and your input and direction on this project. We also thank Moccasin Warehouse management and staff for providing access to the inventory and for timely responses to our requests.

Crowe IIP

Crowe LLP



Crowe LLP Independent Member Crowe Global

575 Market Street, Suite 3300 San Francisco, California 94105-5829 Tel 415.576.1100 Fax 415.576.1110 www.crowe.com

San Francisco Public Utilities Commission 525 Golden Gate Avenue, 13th Floor San Francisco, CA 94102

September 16, 2024

- To: Barbara Hale, Assistant General Manager, Power Richard Stephens, Utility Services Manager David Carter, Materials Coordinator Bart Murphy, Materials Coordinator
- Cc: Ronald P. Flynn, Deputy General Manager Nancy L. Hom, Assistant General Manager, Business Services and Chief Financial Officer Vivian Chen, Deputy Chief Financial Officer Laura Busch, Deputy Chief Financial Officer Irella Blackwood, Audit Director Jennifer Hopkins, Information Technology Services Director
- Subject: Fiscal Year End 2023-2024 Inventory Count – Hetch Hetchy Enterprise, Hetchy Power In-City Warehouse

Dear Ms. Hale, Mr. Stephens, Mr. Carter, and Mr. Murphy:

The San Francisco Public Utilities Commission (SFPUC) engaged Crowe LLP (Crowe) to perform full inventory count services for three enterprise funds including the Wastewater Enterprise, Water Enterprise, and Hetch Hetchy Enterprise.¹ This report represents results of Crowe's full count of the Hetch Hetchy Enterprise – Hetchy Power In-City Warehouse inventory.

A. Scope of Inventory Work

The SFPUC requested Crowe perform full inventory count services of these enterprise activities to test whether significant variances exist between the physical count and the records in the SFPUC's Maximo Inventory Tracking System (Maximo), to determine the cause of variances, and to determine amounts that need to be adjusted in Maximo. The SFPUC requested reporting of the analysis, findings, and recommendations consistent with the format requested by SFPUC's Financial Services Bureau.

B. Warehouse Locations

The locations for the Hetchy Power In-City full inventory count were:

Hetchy Power In-City Warehouse Pier 23 San Francisco, California 94111

Treasure Island Lot 69 (End of Avenue M) San Francisco, California 94130

On June 26, 2024, Crowe visited the locations above and conducted the FY 2023-2024 full inventory count that is the subject of this report. The last full inventory count of the locations above was performed

¹ Note that some of the enterprises have multiple warehouse locations.



by Crowe for FY 2022-2023 on June 21, 2023. In **Table 1** below, we provide key data^{2,3} from both full inventory counts.

Table 1 San Francisco Public Utilities Commission Hetchy Power In-City Warehouse Inventory Count Comparison with Prior Full Inventory Counts (As of June 26, 2024)

Description	FY 202	3-2	024	FY 2022-2023			
Description	Items	Value		Items		Value	
Total Inventory	970	\$	1,455,929	1,318	\$ 1	,372,997	
(per Maximo)		<u>'</u>	,,	/	·	/- /	
Total Inventory Variance	183	¢	(32,523)	475	¢	(75,192)	
(per Crowe's Count)	105	Ψ	(32,323)	Ч7 5	Ψ	(75,152)	
Total Inventory Variance	18.9%		(2.2%)	36.0%		(5.5%)	
(as a percentage of Total Inventory)	2010 / 0		(=== / 0)			(3.570)	

Results

As indicated in Table 1, variances were identified between Crowe's full inventory count and the count reported in the Maximo system. The following finding explains the variances in counts. Crowe's recommendations related to this finding are also included.

Finding #1 – Physical Inventory Counts Differed from Maximo Report Counts

Condition:

Of the 970 items we counted, 183 items, or 18.9%, had a variance between their physical count and their count in Maximo. This is a repeat finding. Based on the physical count, and using the average cost in Maximo, we determined that the total value of the variances in the Hetchy Power In-City inventory was (\$32,523), or (2.2%) of the total inventory value of \$1,455,929 in Maximo.⁴

We found 72 positive variances (where the physical count was greater than the Maximo inventory count) which totaled \$11,085. We found 111 negative variances (where the physical count was less than the Maximo inventory count) which totaled (\$43,609). In **Table 2** below we list items with variances that are either above \$500 or below (\$500).⁵ The sum of the absolute values of the variances is \$54,694, or 3.8% of the total inventory value of \$1,455,929 in Maximo.

² In this report, percentages are rounded to one decimal place. Monetary values are rounded to the nearest whole dollar unless doing so would obscure the data, in which case they are presented without rounding.

³ Crowe did not perform any procedures related to the assigned value in the Maximo system.

⁴ The (\$32,540) variance is the difference between \$273,462, which is the total value of the 183 items with variances using Crowe's physical count for each item, and \$306,003, which is the total value of the 183 items with variances using the Maximo count for each item.

⁵ Of the 183 items with a difference between the physical count and the count in Maximo, 26 are items from the Streetlight1 and Streetlight2 storerooms which warehouse staff should have removed from Maximo as they can no longer be used due to a Board of Supervisors mandate that older City lighting, e.g., halogen and mercury vapor light bulbs, be replaced with LED light bulbs. Of these items, 4 have positive variances totaling \$1,282 and 22 have negative variances totaling (\$17,505), for a combined variance of (\$16,223). If the total variance in the number of items counted is adjusted to exclude these Streetlight items, it falls from 18.9% (183 items divided by 970 items) to 16.6% (157 items divided by 944 items). If the total dollar variance is adjusted to exclude these Streetlight items, it changes from (2.2%) ((\$32,523) divided by \$1,455,929) to (1.1%) ((\$16,300) divided by \$1,455,929).



San Francisco Public Utilities Commission Hetchy Power In-City Warehouse Inventory Count Summary of Items with Variances (As of June 26, 2024)⁶

Item	Description	Shop	Item Code	Unit	Maximo 6.25.24	Crowe 6.26.24	Variance	Average Cost	Cost of ariance
1	Automatic Deadend Clevis Bail 6 SOL CU PG&E 184097	PE-MAIN	PE-10-0848	EA	24	92	68	\$ 17.3743	\$ 1,181
2	WIRE,#10 THW BLACK COPPER WIRE,(SOLID) .045 JACKET (500 FOOT SPOOL)	PE-MAIN	PE-10-0339	FT	500	2,500	2,000	0.4422	884
	ABB PT/CT TXF 500A	PE-MAIN	950-7525G05	EA	12	16	4	207.4500	 830
	Ground Rod Clamp - 3/4 rod for 4/0-250	PE-MAIN	PE-10-1026	EA	130	178	48	16.9141	 812
	N36 STREET LIGHTING CHRISTY BOX LID NEW	PE-MAIN	PE-10-0354	EA	130	25	11	65.5564	721
	2" RIGID 90 DEGREE ELBOW	PE-MAIN	PE-10-0266	EA	15	36	21	29.5042	 620
	Ashphalt, black top cold patch, QUIKRETE #1701	PE-MAIN	PE-10-1614	EA	193	255	62	9.5444	592
	4M /66R BULB, PHILIPS, PS40 LAMP	PE-STREETLIGHT2	PE-10-1876	EA	(46)		46	12.0000	 552
	LED,Luminaire Cobra Head, 145W, ROAD FOCUSLuminaire RFL- 145W64LED3K-G2-R3M-UNV-DMG-[API-226]-API2011-RCD7-GY3,	PE-MAIN	PE-10-1554	EA	38	39	1	526.9066	527
	Subtotal: Variances Above \$500 (9 Items)								\$ 6,719
	Subtotal: Variances Between \$0 and \$500 (63 Items)								\$ 4,366
	Category Subtotal: All Positive Variances (72 Items)								\$ 11,085
	WIRE, UNDERGROUND, TRI-PLEX 4/0 SERVICE WIRE, 600 VOLT			_					
10	XLP INSULATED CABLE, 3 CONDUCTOR	PE-MAIN	PE-10-1657	FT	9,173	4,673	(4,500)	\$ 1.9860	\$ (8,937
	MVR 175/V/BU/PA LAMP	PE-STREETLIGHT2	PE-10-0639	EA	99	68	(31)	250.0000	(7,750
	Bayonet Fuse 100A High Amp CPS 4038-361-C04		E-5920-33000		30	15	(15)		(2,279
	200W INSTANT RESTRIKE LAMP	PE-STREETLIGHT2		EA	58	-	(58)		(2,272
	HANDHOLE COVER STEEL, GALVANIZED, AMERON P/N 43338G	PE-MAIN	PE-10-1650	EA	57	-	(57)		(2,071
	1" ALL THREAD	PE-STREETLIGHT1	PE-10-0311	EA	21	-	(21)		(1,470
16	Echo Lighting Retrofit Kit 100W Mission Bay LED	PE-MAIN	·6210-100W19	LOT	24	23	(1)		(1,374
	LU100SBY XL ECO 100W LAMP	PE-MAIN	PE-10-0621	EA	25	-	(25)		(1,199
	MVR400/U LAMP E37	PE-STREETLIGHT2	PE-10-0607	EA	6	-	(6)		(1,17)
	ABB PT/CT TXF 1000A	PE-MAIN	950-7525G231	EA	10	6	(4)		(860
	ABB PT/CT TXF 800A	PE-MAIN	950-7525G098	EA	6	2	(4)		(860
21	ABB PT/CT TXF 400A	PE-MAIN	950-7525G034	EA	10	6	(4)		(830
22	250W INSTANT RESTRIKE LAMP	PE-STREETLIGHT2	PE-10-0625	EA	26	-	(26)		(728
23	MVR250/VBU/PA LAMP	PE-STREETLIGHT2	PE-10-0638	EA	30	-	(30)	23.0489	(69)
24	LU100/ECD LUMALUX LAMP	PE-STREETLIGHT2	PE-10-0596	EA	32	-	(32)	20.0000	(640
25	4M /66R BULB, PHILIPS, PS40 LAMP	PE-STREETLIGHT2	PE-10-1876	EA	46	-	(46)	12.0000	(552
26	1 1/2" RIGID THREADED GROUNDING BUSHING	PE-MAIN	PE-10-0229	EA	426	371	(55)	10.0266	(55
27	CONCRETE MIX, FAST-SETTING NON-SHRINK GROUT	PE-MAIN	PE-10-0320	EA	72	51	(21)	25.9694	(545
28	LU100SBY XL ECO 100W LAMP	PE-STREETLIGHT2	PE-10-0621	EA	11	-	(11)	52.8228	(581
29	N36 HIGH VOLTAGE CHRISTY BOX LID OLD	PE-MAIN	PE-10-0355	EA	29	17	(12)	41.7500	(50)
	Subtotal: Variances Below (\$500) (20 Items)						. ,		\$ (35,868
	Subtotal: Variances Between \$0 and (\$500) (91 Items)								\$ (7,741
	Category Subtotal: All Negative Variances (111 Items)								\$ (43,609
	Rounding Adjustment								\$ 1
								Total	\$ (32,523

Criteria:

Chapter 6 of the City and County of San Francisco Office of the Controller's Accounting Policies and Procedures identifies that Departments shall conduct a physical inventory at least annually and ensure that the inventory management system records accurately reflect inventory on hand. Additionally, Section 6.1 (Policy Guidelines) indicates that inventory system records must be promptly adjusted for any variances identified in the physical counts; Departments must periodically review the inventory valuation, and unit of measure, and Departments must periodically review the inventory for obsolescence and reasonableness of inventory classification. The Policy Guidelines also indicate that Departments should investigate significant variances between the physical count, the inventory system records, and the accounting records; document the reasons for variances; and take corrective actions to reduce future variances.

⁶ The Maximo count and valuation data used in this report is as of the end of the business day prior to Crowe's count.



Page 4

Cause:

Hetchy Power In-City Warehouse staff identified the following reasons for the differences in this physical count compared to the count in Maximo:

- Some items have a current balance in Maximo when they should either have a balance of zero or be removed from the system entirely (e.g., halogen and mercury vapor light bulbs; see footnote 6).
- Some items were miscounted during periodic cycle counts.
- Some items were used on projects but not issued in Maximo.

Effect:

The Hetchy Power In-City inventory value in the Maximo system is overstated by \$32,523.

Recommendation:

Hetchy Power In-City warehouse staff should update the asset inventory counts in Maximo after management approval. The SFPUC Financial Services Bureau should adjust the General Ledger to reflect the actual cost of inventory on hand. Hetchy Power In-City should investigate the significant variances between the physical counts noted in Tables 1 and 2, the Maximo system records, and the accounting records; document the reasons for variances; and implement corrective actions to reduce future variances. Warehouse staff should periodically review the inventory records to remove duplicate and obsolete items and to ensure the reasonableness and appropriateness of inventory unit cost, unit of measure, and bin location. Finally, warehouse staff should continue to conduct regular physical inventory cycle counts and compare results with those in Maximo to ensure Maximo data is up-to-date and accurate.

Management Response:

Hetchy Power In-City Management staff and Warehouse staff agree with the assessment. We also note the improvement over year-to-year measurements; this last count is half the dollar variance we had the previous year.

Warehouse action plan for fiscal year 2024-2025 will focus on:

- 1. All Stock inventory will be removed from Storerooms Streetlight 1 and Streetlight 2 by moving existing stock to PE-MAIN with Bin Locations.
- 2. The number of Cycle counts has been increased from previous years.
- 3. Consideration of Backflushing: record remaining inventory at end of period instead of recording inventory at issuance. For high-volume items (e.g., Elbows, Bushings, Wire, and Connectors), they are recorded daily to increase accuracy of Maximo.
- 4. Closer monitoring of Field crews and contractor usage to ensure proper procedures are followed.
- 5. Tighten pre-audit procedures with field crews and conduct more counts before the audit.



This full inventory count did not constitute an audit, examination, review, or compilation of the historical and prospective financial information conducted in accordance with generally accepted auditing standards or with other standards established by the American Institute of Certified Public Accountants (AICPA). Accordingly, Crowe is unable to express an opinion or any other form of assurance with respect to any of the historical or prospective financial information. Crowe did not perform any procedures to verify the Management Response and Crowe does not provide any assurance regarding the accuracy or completeness of the response. Any and all amounts referred to in this letter are preliminary and could change should additional procedures be performed. Additionally, issues that are not mentioned here could develop subsequent to the date of this letter that may have impacted Crowe's analysis or that Crowe may cite should additional procedures be performed.

The inventory services did not contemplate obtaining the understanding of internal controls or assessing control risk, tests of accounting records and responses to inquiries by obtaining corroborating evidential matter, and certain other procedures ordinarily performed during an audit or examination. Thus, this engagement did not provide assurance that we became aware of significant matters that would be disclosed in an audit or examination.

As part of this inventory, the SFPUC agreed to be responsible to make all management decisions and perform all management functions; designate an individual who possesses suitable skill, knowledge, and/or experience, preferably within senior management to oversee our services; evaluate the adequacy and results of the services performed; accept responsibility for the results of the services; and establish and maintain internal controls, including monitoring ongoing activities. The SFPUC has ultimate authority for making changes to inventory reported in its Maximo system and on its financial statements.

Crowe's fees are not dependent upon the outcome of this report and Crowe is independent with respect to any other economic interests.

We appreciate the contribution of SFPUC management and your input and direction on this project. We also thank Hetchy Power In-City management and staff for providing access to the inventory and for timely responses to our requests.

Crowe IIP

Crowe LLP



Crowe LLP Independent Member Crowe Global

575 Market Street, Suite 3300 San Francisco, California 94105-5829 Tel 415.576.1100 Fax 415.576.1110 www.crowe.com

San Francisco Public Utilities Commission 525 Golden Gate Ave, 13th Floor San Francisco, CA 94102

September 16, 2024

- To: Joel Prather, Assistant General Manager, Wastewater Enterprise Mike Maraviglia, Acting Maintenance Manager Christian Losno, Materials Coordinator Jorge Gonzalez, Assistant Supervisor of Stores & Equipment
- Cc: Ronald P. Flynn, Deputy General Manager Nancy L. Hom, Assistant General Manager, Business Services/Chief Financial Officer Vivian Chen, Deputy Chief Financial Officer Laura Busch, Deputy Chief Financial Officer Irella Blackwood, Audit Director Jennifer Hopkins, Information Technology Services Director
- Subject: Fiscal Year End 2023-2024 Inventory Count – Wastewater Enterprise Warehouse

Dear Mr. Prather, Jones, Losno, and Gonzalez:

The San Francisco Public Utilities Commission (SFPUC) engaged Crowe LLP (Crowe) to perform full inventory count services for three enterprise funds including the Wastewater Enterprise, Water Enterprise, and Hetch Hetchy Enterprise.¹ This report represents results of Crowe's full count of the Wastewater Enterprise inventory.

A. Scope of Inventory Work

The SFPUC requested Crowe perform full inventory count services of these enterprise activities to test whether significant variances exist between the physical count and the records in the SFPUC's Maximo Inventory Tracking System (Maximo), to determine the cause of variances, and to determine amounts that need to be adjusted in Maximo. The SFPUC requested reporting of the analysis, findings, and recommendations consistent with the format requested by SFPUC's Financial Services Bureau.

B. Warehouse Location

The location for the Wastewater Enterprise full inventory count was:

2725 Oakdale Avenue San Francisco, California 94124

On June 5, 2024, Crowe visited the location above and conducted the FY 2023-2024 full inventory count that is the subject of this report. The last full inventory count of the location above was performed by

¹ Note that some of the enterprises have multiple warehouse locations.



Crowe for FY 2022-2023 on June 28 and June 29, 2023. In **Table 1** below, we provide key data^{2,3} from both full inventory counts.

Table 1 San Francisco Public Utilities Commission Wastewater Warehouse Inventory Count Comparison with Prior Full Inventory Counts (As of June 5, 2024)

Description	FY 2023	3-20)24	FY 2022-2023			
Description	Items	Value		Items	Value		
Total Inventory	3,760	÷	3,712,176	2 757	\$ 3,356,658		
(per Maximo)	5,700		5,/12,1/0	3,757	\$ 3,330,030		
Total Inventory Variance	7	\$	(1,711)	13	\$ (2,048)		
(per Crowe's Count)	/		(1,/11)	15	р (2,0 1 0)		
Total Inventory Variance							
(as a percentage of Total Inventory)	0.2%		(0.05%)	0.3%	(0.1%)		

Results

As indicated in Table 1, variances were identified between Crowe's full inventory count and the count reported in the Maximo system. The following finding explains the variances in counts. Crowe's recommendation related to this finding is also included.

Finding #1 – Physical Inventory Counts Differed from Maximo Report Counts

Condition:

Of the 3,760 items we counted, 7 items, or 0.2%, had a variance between their physical count and their count in Maximo. Based on the physical count, and using the average cost in Maximo, we determined that the total value of the variances in the Wastewater Enterprise inventory was (\$1,711), or (0.05%) of the total inventory value of \$3,712,176 in Maximo.⁴

We found 3 positive variances (where the physical count was greater than the Maximo inventory count) which totaled \$363. We found 4 negative variances (where the physical count was less than the Maximo inventory count) which totaled (\$2,074).⁵ In **Table 2** below we list the 7 items with variances from the Maximo count.

² Crowe did not perform any procedures related to the assigned value in the Maximo system.

³ In this report, percentages are rounded to one decimal place unless they would round to 0.0%, in which case they are rounded to two decimal places. Monetary values are rounded to the nearest whole dollar unless doing so would obscure the data, in which case they are presented without rounding.

⁴ The (\$1,711) variance is the difference between \$6,557, which is the total value of the 7 items with variances using Crowe's physical count for each item, and \$8,268, which is the total value of the 7 items with variances using the Maximo count for each item.

⁵ Most of the negative variance is caused by a single item, GBRNG-0026. Warehouse staff were unable to locate this item and suggested that it should not have been included in the inventory count based on Maximo data indicating that it has not been issued since 2012.



Table 2San Francisco Public Utilities CommissionWastewater Inventory CountList of All Items with Variances⁶

Item				Maximo	Crowe			
Number	Description	Item Code	Unit	6.4.24	6.5.24	Variance	Average Cost	Cost of Variance
1	BEARING, LINK BELT, 23091-150-113	GBRNG-0026	EA	4	0	(4)	\$ 488.59	\$ (1,954)
2	WIPES, HIGH GLOSS, UNITED LABS, 640	GYHGW-0640	EA	20	19	(1)	62.41	(62)
	GASKET, ROPE, KEWANEE, 7L-284-X, 1-032-							
3	9-031-24-01, 1/8 IN X 3/8 IN X 3/4 IN	GGSKT-0367	FT	60	58	(2)	26.78	(54)
4	PIN, SHEAR	GPINS-0112	EA	385	383	(2)	2.00	(4)
	GASKET, ROPE, KEWANEE, 7L-284-X, 0-032-							
5	9-011-48-02, 3/4 IN X 3/4 IN	GGSKT-0366	FT	12	13	1	0.40	-
	Grunge Grippers Heavy Duty Degreasing							
6	Wipes, UNITED LABS, 629V	GYHDW-0629	EA	19	20	1	62.25	62
7	CHAIN, ROLLER	ARCHN-0201	BOX	5	6	1	300.27	300
	Rounding Adjustment							1
								\$ (1,711)

Criteria:

Chapter 6 of the City and County of San Francisco Office of the Controller's Accounting Policies and Procedures identifies that Departments shall conduct a physical inventory at least annually and ensure that the inventory management system records accurately reflect inventory on hand. Additionally, Section 6.1 (Policy Guidelines) indicates that inventory system records must be promptly adjusted for any variances identified in the physical counts; Departments must periodically review the inventory records for reasonableness and appropriateness of any changes to inventory unit cost, inventory valuation, and unit of measure, and Departments must periodically review the inventory for obsolescence and reasonableness of inventory classification. The Policy Guidelines also indicate that Departments should investigate significant variances between the physical count, the inventory system records, and the accounting records; document the reasons for variance; and take corrective actions to reduce future variances.

Cause:

Wastewater Warehouse staff identified the reasons for the differences in this physical count compared to the count in Maximo. The reasons included minor miscounts during periodic cycle counts and one item which may have been misclassified as an inventory item in Maximo.

Effect:

The Wastewater Enterprise inventory value in the Maximo system is overstated by \$1,711.

Recommendation:

The Wastewater warehouse staff should update the asset inventory counts in Maximo system after management approval. The SFPUC Financial Services Bureau should adjust the General Ledger to reflect the actual cost of inventory on hand. The Wastewater Enterprise should investigate the variances between the physical counts noted in Tables 1 and 2, the Maximo system records, and the accounting records; document the reasons for variances; and implement corrective actions to reduce future variances.

⁶ The Maximo count and valuation data used in this report is as of the end of the business day prior to Crowe's count.



Management Response:

WWE concurs with the findings presented in this report and is pleased to see a marked improvement from last year. We will continue to improve our cycle count process, to include investigation of variances between the reports and physical counts. We feel that we succeeded here and look forward to continuing our improvements across all WWE warehouse functions.

Other Matters

This full inventory count did not constitute an audit, examination, review, or compilation of the historical and prospective financial information conducted in accordance with generally accepted auditing standards or with other standards established by the American Institute of Certified Public Accountants (AICPA). Accordingly, Crowe is unable to express an opinion or any other form of assurance with respect to any of the historical or prospective financial information. Crowe did not perform any procedures to verify the Management Response and Crowe does not provide any assurance regarding the accuracy or completeness of the response. Any and all amounts referred to in this letter are preliminary and could change should additional procedures be performed. Additionally, issues that are not mentioned here could develop subsequent to the date of this letter that may have impacted Crowe's analysis or that Crowe may cite should additional procedures be performed.

The inventory services did not contemplate obtaining the understanding of internal controls or assessing control risk, tests of accounting records and responses to inquiries by obtaining corroborating evidential matter, and certain other procedures ordinarily performed during an audit or examination. Thus, this engagement did not provide assurance that we became aware of significant matters that would be disclosed in an audit or examination.

As part of this inventory, the SFPUC agreed to be responsible to: make all management decisions and perform all management functions; designate an individual who possesses suitable skill, knowledge, and/or experience, preferably within senior management to oversee our services; evaluate the adequacy and results of the services performed; accept responsibility for the results of the services; and establish and maintain internal controls, including monitoring ongoing activities. The SFPUC has ultimate authority for making changes to inventory reported in its Maximo system and on its financial statements.

Crowe's fees are not dependent upon the outcome of this report and Crowe is independent with respect to any other economic interests.

We appreciate the contribution of SFPUC management and your input and direction on this project. We also thank Wastewater Enterprise management and staff for providing access to the inventory and for timely responses to our requests.

Crowe IIP

Crowe LLP



Crowe LLP Independent Member Crowe Global

575 Market Street, Suite 3300 San Francisco, California 94105-5829 Tel 415.576.1100 Fax 415.576.1110 www.crowe.com

San Francisco Public Utilities Commission 525 Golden Gate Avenue, 13th Floor San Francisco, CA 94102

September 16, 2024

- To: Steve Ritchie, Assistant General Manager, Water Enterprise Ellen Levin, Deputy Assistant General Manager, Water Enterprise William Teahan, CDD Division Manager William Toman, CDD Materials Coordinator Andy O'Brien, CDD Materials Coordinator
- Cc: Ronald P. Flynn, Deputy General Manager Nancy L. Hom, Assistant General Manager, Business Services and Chief Financial Officer Vivian Chen, Deputy Chief Financial Officer Laura Busch, Deputy Chief Financial Officer Irella Blackwood, Audit Director Jennifer Hopkins, Information Technology Services Director
- Subject: Fiscal Year End 2023-2024 Inventory Count – Water Enterprise, CDD Main Warehouse, AWSS Warehouse, and 6 Satellite Warehouses (Auto, Carpentry, Electrical, Ground, LMPS, and Machine Shops)

Dear Mr. Ritchie, Ms. Levin, Mr. Teahan, Mr. Toman and Mr. O'Brien:

The San Francisco Public Utilities Commission (SFPUC) engaged Crowe LLP (Crowe) to perform full inventory count services for three enterprise funds including the Wastewater Enterprise, Water Enterprise, and Hetch Hetchy Enterprise.¹ This report represents results of Crowe's full count of the Water Enterprise inventory at the CDD Main and AWSS Warehouses and 6 Satellite Warehouses but excluding the Millbrae Warehouse and Sunol Yard, which are addressed in a separate report.

A. Scope of Inventory Work

The SFPUC requested Crowe perform full inventory count services of these enterprise activities to test whether significant variances exist between the physical count and the records in the SFPUC's Maximo Inventory Tracking System (Maximo), to determine the cause of variances, and to determine amounts that need to be adjusted in Maximo. The SFPUC requested reporting of the analysis, findings, and recommendations consistent with the format requested by SFPUC's Financial Services Bureau.

B. Warehouse Locations

The locations for the Water Enterprise full inventory count were:

CDD Main (and 5 Satellites) 1990 Newcomb Ave San Francisco, California 94124

¹ Note that some of the enterprises have multiple warehouse locations.



AWSS 1980 Oakdale Ave Twin Peaks Reservoir San Francisco, California 94124

LPMS Satellite 991 Lake Merced Blvd. San Francisco, California 94132

From June 10 through June 12, 2024, Crowe visited the locations above and conducted the FY 2023-2024 full inventory count that is the subject of this report. The last full inventory count of the locations above was performed by Crowe for FY 2022-2023 from June 12 through June 14, 2023. In **Table 1** below, we provide key data^{2,3} from both full inventory counts.

Table 1San Francisco Public Utilities CommissionWater CDD (MAIN, AWSS, and 6 Satellite Shops) Warehouse Inventory CountComparison with Prior Full Inventory Counts(As of June 12, 2024)

Description	FY 2023	3-20)24	FY 2022-2023			
Description	Items	Value		Items	Value		
Total Inventory (per Maximo)	1,735	\$	6,781,049	1,648	\$ 7,271,844		
Total Inventory Variance (per Crowe's Count)	79	\$	2,387	253	\$ (153,390)		
Total Inventory Variance (as a percentage of Total Inventory)	4.6%		0.04%	15.4%	(2.1%)		

Results

As indicated in Table 1, variances were identified between Crowe's full inventory count and the count reported in the Maximo system. The following finding explains the variances in counts. Crowe's recommendation related to this finding is also included.

Finding #1 – Physical Inventory Counts Differed from Maximo Report Counts

Condition:

Of the 1,735 items we counted, 79 items, or 4.6%, had a variance between their physical count and their count in Maximo. This is a repeat finding. Based on the physical count, and using the average cost in Maximo, we determined that the total value of the variances in the Water Enterprise inventory locations specified above was \$2,387, or 0.04% of the total inventory value of \$6,781,049 in Maximo.⁴

We found 38 positive variances (where the physical count was greater than the Maximo inventory count) which totaled \$36,172. We found 41 negative variances (where the physical count was less than the Maximo inventory count) which totaled (\$33,785). In **Table 2** below we list 18 items with variances that are either above \$1,000 or below (\$1,000) and provide a summary of all variances, both fuel and non-fuel. The

² In this report, percentages are rounded to one decimal place, unless they would round to 0.0%, in which case they are rounded to two decimal places. Monetary values are rounded to the nearest whole dollar unless doing so would obscure the data, in which case they are presented without rounding.

³ Crowe did not perform any procedures related to the assigned value in the Maximo system.

⁴ The \$2,387 variance is the difference between \$579,808, which is the total value of the 79 items with variances using Crowe's physical count for each item, and \$577,421, which is the total value of the 79 items with variances using the Maximo count for each item.



Table 2

San Francisco Public Utilities Commission Water (CDD and AWSS and 6 Satellite Shops) Warehouse Inventory Count Summary of Items with Variances (As of June 12, 2024)⁵

tem	Description	Shop	Item Code	Unit	Maximo 6.7.24	Crowe 6.12.24	Variance	Average Cost	Cost of ariance
1	GASOLINE, AUTO, UNLEADED, C.D.D.	MAIN	091-30-3250	GAL	3,535.9	5,760.0	2,224.1	\$ 4.5057	\$ 10,021
	PIPE, D.I., CLASS 54, BELL & SPIGOT, TYPE 2, 12" PUSH ON, ZINC COATING	MAIN	047-10-4569	FT	534.5	594.0	59.5	75.1873	4,474
	PIPE, D.I., CLASS 54, BELL & SPIGOT, TYPE 2, 4" PUSH ON, ZINC COATING	MAIN	047-10-4565	FT	602.0	694.0	92.0	41.5162	3,819
4	DIESEL, RENEWABLE (99%)	MAIN	091-40-3151	GAL	-	662.0	662.0	4.5947	3,042
5 DIESEL, RENEWABLE (99%)			091-40-3151	GAL	2,443.8	2,970.0	526.2	4.5947	2,418
6 COLLAR, STOP, 18"		AWSS	047-33-9018	EA	10.0	12.0	2.0	904.0000	1,808
7 VALVE, CHECK, SWING, BRONZE, 3"		MAIN	048-22-1906	EA	10.0	12.0	2.0	897.5144	1,795
8	TIRE, 295/75/22.5	AUTO	026-10-5510	EA	10.0	13.0	3.0	520.2144	1,561
9	TRANSMITTER, PRESSURE, STAINLESS	ELECT	062-40-4400	EA	5.0	7.0	2.0	549.7810	1,100
	Rounding Adjustment								(1
	Subtotal: Variances Above \$1,000 (9 Items)								\$ 30,037
	Subtotal: Variances Between \$0 and \$1,000 (29 Items)								\$ 6,135
	Category Subtotal: All Positive Variances (38 Items)								\$ 36,172
	DUSTPAN, 12"-20"		048-21-1020		52.0	48.0	(4.0)		(1,040
	DUSTPAN, COVER, 10"	AWSS	048-21-1110		5.0	3.0	(2.0)		(1,480
	PLYWOOD, DOUGLAS FIR, 4' X 8' X 1 1/8", CDX	CARP	055-30-4046	SH	88.0	60.0	(28.0)	60.5529	(1,695
	VALVE, CHECK, SWING, BRONZE, 3"	MAIN	048-22-1906	EA	14.0	12.0	(2.0)	897.5144	(1,795
	PIPE, D.I., CLASS 54, BELL & SPIGOT, TYPE 2, 8" PUSH ON, ZINC COATING	MAIN	047-10-4567	FT	983.0	938.0	(45.0)	47.6321	(2,143
15	COLLAR, BELL, 8"	AWSS	047-33-9108	EA	132.0	121.0	(11.0)	263.0000	(2,893
16	COLLAR, STOP, 20"	AWSS	047-33-9020	EA	42.0	38.0	(4.0)	1,032.0000	(4,128
17	PIPE, 20", NS, KUBOTA	AWSS	047-10-4320	EA	12.0	11.0	(1.0)	4,955.0000	(4,955
18	LAMP, F32T8, GE27621	ELECT	062-40-3200	EA	40.0	-	(40.0)	182.1800	(7,287
	Rounding Adjustment								(1
	Subtotal: Variances Below (\$1,000) (9 Items)								\$ (27,417
	Subtotal: Variances Between \$0 and (\$1,000) (32 Items)								\$ (6,368
	Category Subtotal: All Negative Variances (41 Items)								\$ (33,785
								Total	\$ 2,387

As shown in **Table 3** below, based on the fuel dip procedures Crowe performed for this physical count, we found the actual quantities of fuel contained in the two tanks varied from those in the Maximo system. We believe that the quantities we observed during our physical count using a manual dip process and a conversion formula were reasonably accurate as they closely matched quantities registered by an electronic measurement system contained in the fuel tanks that the Water Enterprise generated that day (referred to as the System Status Report).

⁵ The Maximo count and valuation data used in this report is as of the end of the business day prior to Crowe's count. Due to the Maximo inventory system synchronizing with the EJ Ward fuel management system during the night, the fuel tank level data in Maximo is as of the end of the business day that was two business days prior to Crowe's count. Therefore, some of the fuel variance may be due to regular fuel transactions that occurred on the business day prior to Crowe's count.



Table 3San Francisco Public Utilities CommissionWater (CDD and AWSS and 6 Satellite Shops) Warehouse Inventory CountSummary of Fuel Gallon and Cost Variances⁶(As of June 12, 2024)

	Tank					Maximo	Crowe		Average	Cost of
Item	Numbers	Fuel Type per Maximo	Fuel Type per CDD Staff	Item Code	Unit	6.7.24	6.12.24	Variance	Cost	Variance
1	2	Gasoline, auto, unleaded, c.d.d.	Unleaded gas for vehicles and equipment	091-30-3250	GAL	3,535.9	5,760.0	2,224.1	\$ 4.5057	\$ 10,021.13
2	6	DIESEL, RENEWABLE (99%)	Red-dyed diesel for a generator located in the boiler room	091-40-3151	GAL	-	662.0	662.0	4.5947	3,041.69
3	1&3	DIESEL, RENEWABLE (99%)	Renewable diesel for vehicles and equipment	091-40-3151	GAL	2,443.8	2,970.0	526.2	4.5947	2,417.73
							Total	\$ 15,480.55		

Criteria:

Chapter 6 of the City and County of San Francisco Office of the Controller's Accounting Policies and Procedures identifies that Departments shall conduct a physical inventory at least annually and ensure that the inventory management system records accurately reflect inventory on hand. Additionally, Section 6.1 (Policy Guidelines) indicates that inventory system records must be promptly adjusted for any variances identified in the physical counts, Departments must periodically review the inventory records for reasonableness and appropriateness of any changes to inventory unit cost, inventory valuation, and unit of measure, and Departments must periodically review the inventory for obsolescence and reasonableness of inventory classification. The Policy Guidelines also indicate that Departments should investigate significant variances between the physical count, the inventory system records, and the accounting records; document the reasons for variance; and take corrective actions to reduce future variances.

Cause:

The Water Enterprise Warehouse staff identified the following reasons for the differences in this physical count compared to the count in Maximo:

- Occasional manual system posting errors by the individual entering the quantity or unit of measure.
- Miscounted items from periodic cycle counts, including use of different counting methods and items not being fully separated to make accurate counts.
- For Satellite shop counts (i.e., Carpentry, Electrical, Meter, Machine, Auto, and LMPS), the inventory users had not submitted issue tags to warehouse management when items were used.

Examples of errors identified in our assessment of a sample of recent E.J. Ward fuel transaction data include the following:

- Transactions where a vehicle had the same odometer reading as the previous transaction for the same vehicle and fuel card.
- Duplicate vehicles identified within the system.
- Multiple vehicles with the same make and model sometimes resulted in fuel transactions assigned to the wrong vehicle.
- Vehicles without a specific year, make, or model identified in the system. After comparing system generated E.J. Ward reports showing all CDD vehicles as of June 20, 2023, and June 13, 2024, Crowe determined that no changes had been made to the year, make, or model of any existing CDD vehicles since last year's inventory count.⁷

⁶ For clarity, item 3 in Table 3 above is the sum of the balances for diesel tank 1 (1,339 gallons) and diesel tank 3 (1,631 gallons).

⁷ The only changes since last year's inventory count were the addition of 14 new vehicles and, for some existing vehicles, updated odometer readings, hourly use totals, and dates of most recent fuel transactions.



- Vehicles with an increase in their odometer reading but not their total hourly use, or vice versa, suggesting that these items are not being recorded accurately.
- Vehicle-specific fuel cards which were used without the associated vehicle showing any increase in
 odometer reading or total hourly use.

The Water Enterprise uses the automated fuel tracking information system, E.J. Ward, to capture fuel usage and the SFPUC Information Technology Services Bureau has developed an interface designed to periodically upload the E.J. Ward fuel usage data to the Maximo system. However, based on problems with the interface between the E.J. Ward system and the Maximo system, actual Water Enterprise fuel usage data is not consistently and accurately uploaded into Maximo. In addition, between Crowe's FY 2022-23 and FY 2023-24 inventory counts, warehouse staff only conducted one fuel dip (measurement) of unleaded gasoline and two fuel dips of diesel fuel.⁸ Finally, the variance in item 2 from **Table 3** above is due to warehouse management manually entering a balance of zero gallons in Maximo despite fuel system status reports and a prior physical count showing the tank was more than half full.⁹

Effect:

The Water Enterprise inventory value in the Maximo system is understated by \$2,387. Regarding the fuel usage variances, absent periodic monitoring of the fuel levels, the Water Enterprise will have difficulty reconciling future inventories and identifying variances that are the result of missing fuel (e.g., theft), delivery errors, data entry errors, unrecorded transactions, tank leaks, or shrinkage.

Recommendation:

The Water warehouse staff should update the asset inventory counts in Maximo after management approval. The SFPUC Financial Services Bureau should adjust the General Ledger to reflect the actual cost of inventory on hand. The Water Enterprise should investigate the significant variances between the physical counts noted in Tables 1 and 2, the Maximo system records, and the accounting records; document the reasons for variances; and implement corrective actions to reduce future variances.

If the E.J. Ward system cannot be made to work consistently it should be replaced or upgraded. SFPUC staff also should frequently review the vehicle data in the Fuel View / E.J. Ward software to remove duplicate entries and ensure the make, model, and year fields are populated for all vehicles. In addition, SFPUC should investigate the increased use of the manual override process, or site card S-51, as it can lead to data entry errors and fuel transactions associated with incorrect vehicles.¹⁰

Finally, until the system matters are resolved, warehouse staff should begin tracking fuel tank levels and fuel usage for gasoline and diesel using a weekly process similar to the following:

• Process all outstanding fuel invoices in Maximo and determine the week-over-week fuel level change for both fuel types (i.e., fuel level increase from deliveries/inflows).

⁸ According to Maximo records, between Crowe's FY 2022-23 and FY 2023-24 inventory counts, warehouse staff made eight fuel balance adjustments in Maximo: three for unleaded gasoline (item 091-30-3250) and five for diesel (item 091-40-3151). However, only one of the adjustments for unleaded gasoline was for a regular cycle count, and only two of the adjustments for diesel fuel were for regular cycle counts. The other adjustments were either prompted by fuel deliveries (both authorized and unauthorized) or were simply adjustments made based on the tank readout (fuel system status report) without a physical fuel dip to verify the reading.

⁹ While on site at CDD, Crowe observed warehouse staff performing fuel dips for three of the four fuel tanks listed on the fuel system status report. When Crowe inquired about the fourth fuel tank (tank 6, or item 2 in Table 3 above), which had a balance of zero gallons in Maximo but was more than half full according to a system-generated fuel system status report, warehouse management responded that they did not know why the fuel system status report showed that there was fuel in the tank, nor did they have any information about the purpose or location of the fourth fuel tank. After further inquiry, Crowe subsequently determined that the reading of 662 gallons on the fuel system status report was correct.

¹⁰ Since the prior inventory count, the number of fuel transactions utilizing site card S-51 has increased from 12% to 15% of total transactions. For the prior inventory count, Crowe reviewed CDD fuel transaction data from June 1, 2022, to June 20, 2023, and found that 1,160, or 12.3%, of the 9,457 total transactions were authorized using site card S-51. For the current inventory count, Crowe reviewed CDD fuel transaction data from June 1, 2023, through June 13, 2024, and found that 1,321, or 14.5%, of the 9,098 total transactions were authorized using site card S-51.



- Perform a weekly fuel dip for each tank and determine the week-over-week fuel level change for both fuel types (i.e., net change in fuel level). Measurements should be made to the nearest half-inch and CDD staff should not be permitted to refill vehicles or equipment while the fuel dip is taking place.¹¹
- Determine the total amount of fuel dispensed per E.J. Ward system data and paper logs, including cross-referencing the two to remove any duplicate transactions.¹²
- Compare the fuel level change based on fuel dips with the net fuel level change per Maximo, E.J. Ward, and paper logs, calculated as Maximo balance change (inflows) minus total fuel dispensed per E.J. Ward and paper logs (outflows).
- Attempt to determine the cause of any variances greater than the margin of error associated with the fuel dip conversion formula.

Management Response:

CDD inventory management team has requested and received the raw data supporting Crowe's findings. Supervisors, managers and subject matter experts are in the process of reviewing the data and will attempt to determine the causes for the variances reported. CDD's Inventory Management Team will offer feedback regarding Crowe's comments, along with a process improvement plan, before the end of this 2024 calendar year (mid-fiscal year).

¹¹ The fuel dip conversion charts that CDD staff have are accurate to the nearest half-inch, however, CDD staff only measured to the nearest inch during the fuel dip that Crowe observed for this inventory count. In addition, on the first day of the inventory count, Crowe staff observed trucks and heavy equipment refueling, which effectively altered the fuel variance that was measured against the Maximo fuel balance from the prior business day.

¹² Crowe cross-referenced E.J. Ward fuel transaction data against 100 recent CDD fuel transactions manually recorded on paper fuel logs from May 9, 2024 to June 13, 2024 and found that 10, or 10%, were also captured in the E.J. Ward fuel system, as they had the same date, odometer reading, and vehicle number as an E.J. Ward entry, in addition to having a dispensed fuel volume that was either identical to the E.J. Ward entry or differed by only 0.1 gallons.



Other Matters

This full inventory count did not constitute an audit, examination, review, or compilation of the historical and prospective financial information conducted in accordance with generally accepted auditing standards or with other standards established by the American Institute of Certified Public Accountants (AICPA). Accordingly, Crowe is unable to express an opinion or any other form of assurance with respect to any of the historical or prospective financial information. Crowe did not perform any procedures to verify the Management Response and Crowe does not provide any assurance regarding the accuracy or completeness of the response. Any and all amounts referred to in this letter are preliminary and could change should additional procedures be performed. Additionally, issues that are not mentioned here could develop subsequent to the date of this letter that may have impacted Crowe's analysis or that Crowe may cite should additional procedures be performed.

The inventory services did not contemplate obtaining the understanding of internal controls or assessing control risk, tests of accounting records and responses to inquiries by obtaining corroborating evidential matter, and certain other procedures ordinarily performed during an audit or examination. Thus, this engagement did not provide assurance that we became aware of significant matters that would be disclosed in an audit or examination.

As part of this inventory, the SFPUC agreed to be responsible to make all management decisions and perform all management functions; designate an individual who possesses suitable skill, knowledge, and/or experience, preferably within senior management to oversee our services; evaluate the adequacy and results of the services performed; accept responsibility for the results of the services; and establish and maintain internal controls, including monitoring ongoing activities. The SFPUC has ultimate authority for making changes to inventory reported in its Maximo system and on its financial statements.

Crowe's fees are not dependent upon the outcome of this report and Crowe is independent with respect to any other economic interests.

We appreciate the contribution of SFPUC management and your input and direction on this project. We also thank Water Enterprise management and staff for providing access to the inventory and for timely responses to our requests.

Crowe IIP

Crowe LLP