Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Rehabilitation Recommendation	Quantity	Unit Price	Total
Rehab 1001: Raise Manhole to Grade $1000 ea. (Unpaved)	1	$ 1,000	$ 1,000
Rehab 1002: Raise Manhole to Grade - Paved $1350	11	$ 1,350	$ 14,850
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea	0	$ 500	$ -
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea	0	$ -	$ -
Rehab.1010: Install Inflow Protector Insert $225 ea.	68	$ 225	$ 15,300
Rehab 1012: Install Missing Mainline Cleanout Cap $75 ea.	13	$ 75	$ 975
Rehab 1015: Seal Chimney $1500 ea.	2	$ 1,500	$ 3,000
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.	34	$ 650	$ 22,100
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.	4	$ 950	$ 3,800
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.	1	$ 1,000	$ 1,000
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea	1	$ 1,220	$ 1,220
Rehab 1024: Replace Manhole Lid $500 ea.	5	$ 500	$ 2,500
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.	0	$ 250	$ -
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.	1	$ 500	$ 500
Rehab 1040: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 3) Sq.Ft.	2305.17	$ 40	$ 92,207
Rehab 1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 2) Sq.Ft.	678.1	$ 30	$ 20,343
Rehab 1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 3) Sq.Ft.	5592.93	$ 40	$ 223,717
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)	0	$ 500	$ -
Rehab 1047: Seal Manhole Pipe Connection $900 ea.	3	$ 900	$ 2,700
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.	0	$ 300	$ -
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.	11	$ 700	$ 7,700
Rehab 1205: Repair Chimney and Seal $1500 ea.	28	$ 1,500	$ 42,000
Rehab 1215: Reconstruct Chimney/Cone $1000 ea	2	$ 1,000	$ 2,000
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.	0	$ 3,500	$ -
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf	1	$585/vf	$ 7,312
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.	0	$ 2,500	$ -
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf	0	$450/vf	$ -
Construction Estimate			$ 464,224
Engineering and Contingency (20%)			$ 92,845
Total Estimated Project Cost			$ 557,069

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Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
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Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
1	8	B	B	Manhole	SSMHT0000366	113 N. NW LOOP 323	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	16.56	215.06		$ -	$ -	Monitor in CMOM
2	8	X	X	Manhole	SSMHT0000409	800 BLK. N. PARKDALE DR.					Trees/Woods	Unpaved								$ -	$ -	Pending CCTV Inspection
3	8	C	C	Manhole	SSMHT0000727	1000 BELLAIRE DR.	Solid		No	None	Yard	Unpaved	Above Grade	18	Std 48 Round	Brick	9.22	122.57		$ -	$ -	Monitor in CMOM
4	8	C	C	Manhole	SSMHT0000898	1718 BELVEDERE BLVD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.45	62.47		$ -	$ -	Monitor in CMOM
5	8	C	C	Manhole	SSMHT0000899	1815 BELVEDEREE BLVD	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.94	56.04		$ -	$ -	Monitor in CMOM
6	8	B	B	Manhole	SSMHT0000900	1900 BLK BELVEDERE ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.00	82.00		$ -	$ -	Monitor in CMOM
7	8	D	C	Manhole	SSMHT0000941	1700 W CLAUDE ST	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	3	Std 34 Round	Brick	4.57	63.98	3	$ 3,209	$ 3,209	Realign and Seal Manhole Ring/Coat Manhole
8	8	C	C	Manhole	SSMHT0001017	121 N. NW LOOP 323	Solid		No	None	Road Shoulder	Unpaved	Above Grade	22	Std 48 Round	Concrete	6.26	85.28		$ -	$ -	Monitor in CMOM
9	8	B	B	Manhole	SSMHT0001018	2101 N FOREST AVE	Vented	2	No	Moderate	Trees/Woods	Unpaved	Above Grade	34	Std 48 Round	Brick	6.45	87.67		$ -	$ -	Monitor in CMOM
10	8	B	B	Manhole	SSMHT0001028	3223 GAEDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	9.20	122.32		$ -	$ -	Monitor in CMOM
11	8	B	B	Manhole	SSMHT0001029	3217 W TULSA ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Concrete	6.89	93.21		$ -	$ -	Monitor in CMOM
12	8	B	B	Manhole	SSMHT0001030	2800 ROSEMONT ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.60	76.96		$ -	$ -	Monitor in CMOM
13	8	B	B	Manhole	SSMHT0001031	2809 ROSEMONT ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.12	108.71		$ -	$ -	Monitor in CMOM
14	8	B	B	Manhole	SSMHT0001032	1300 BRADLEY AVE	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	6.30	85.78		$ -	$ -	Monitor in CMOM
15	8	B	B	Manhole	SSMHT0001033	3220 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	10.08	133.41		$ -	$ -	Monitor in CMOM
16	8	D	C	Manhole	SSMHT0001034	3200 GARDEN VALLEY RD.	Solid		No	None	Trees/Woods	Unpaved	At Grade		Std 48 Round	Brick	5.70	78.22	3	$ 3,129	$ 3,129	Coat Manhole
17	8	Group 1	Group 1	Manhole	SSMHT0001035	1500 BLK N NW LOOP 323	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	43	Std 48 Round	Sealed Brick	10.96	144.50		Group 1	Group 1	Included in Group 1 Remedial Measures
18	8	Group 1	Group 1	Manhole	SSMHT0001036	NO NUMBER N NW LOOP 323	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	27	Std 48 Round	Sealed Brick	11.67	153.44		Group 1	Group 1	Included in Group 1 Remedial Measures
19	8	Group 1	Group 1	Manhole	SSMHT0001037	2926 GARDEN VALLEY RD	Vented	2	No	Moderate	Trees/Woods	Unpaved	Above Grade	7	Std 48 Round	Brick	11.14	146.76		Group 1	Group 1	Included in Group 1 Remedial Measures
20	8	Group 1	Group 1	Manhole	SSMHT0001038	2804 GARDEN VALLEY RD.	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	20	Std 48 Round	Brick	10.84	142.98		Group 1	Group 1	Included in Group 1 Remedial Measures
21	8	Group 1	Group 1	Manhole	SSMHT0001039	1200 BLK. SHAWNEE BLVD.	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	11	Std 48 Round	Sealed Concrete				Group 1	Group 1	Included in Group 1 Remedial Measures
22	8	Group 1	Group 1	Manhole	SSMHT0001040	2805 GARDEN VALLEY RD.	Solid		No	Severe	Drainage Ditch	Unpaved	Above Grade	45	Std 48 Round	Brick	9.82	130.13		Group 1	Group 1	Included in Group 1 Remedial Measures
23	8	Group 1	Group 1	Manhole	SSMHT0001041	2804 GARDEN VALLEY RD.	Solid		No	None	Field	Unpaved	Above Grade	15	Std 48 Round	Concrete	5.94	81.24		Group 1	Group 1	Included in Group 1 Remedial Measures
24	8	Group 1	Group 1	Manhole	SSMHT0001042	2804 GARDEN VALLEY RD.	Solid		No	None	Trees/Woods	Unpaved	Above Grade	20	Std 48 Round	Concrete				Group 1	Group 1	Included in Group 1 Remedial Measures
25	8	B	B	Manhole	SSMHT0001043	2728 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.58	101.91		$ -	$ -	Monitor in CMOM
26	8	C	C	Manhole	SSMHT0001069	3400 BLK VAN HWY	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	4	Std 48 Round	Concrete	8.18	109.47		$ -	$ -	Monitor in CMOM
27	8	B	B	Manhole	SSMHT0001070	3415 VAN HWY	Bolted	2	No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Concrete	7.40	99.64		$ -	$ -	Monitor in CMOM
28	8	B	B	Manhole	SSMHT0001071	3309 VAN HWY	Solid		Yes	Light	Road Shoulder	Unpaved	Above Grade	3	Std 48 Round	Sealed Concrete	8.26	110.48		$ -	$ -	Monitor in CMOM
29	8	B	B	Manhole	SSMHT0001072	3218 VAN HWY	Vented	2	Yes	None	Road Shoulder	Unpaved	Above Grade	2	Std 48 Round	Concrete	7.36	99.14		$ -	$ -	Monitor in CMOM
30	8	D	C	Manhole	SSMHT0001073	3129 VAN HWY	Vented	2	Yes	None	Road Shoulder	Unpaved	At Grade		Std 48 Round	Concrete	7.58	101.91		$ 1,350	$ 1,350	Realign and Seal Manhole Ring/Reconstruct Bench
31	8	Group 1	Group 1	Manhole	SSMHT0001076	1500 BLK N NW LOOP 323	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	41	Std 48 Round	Brick	10.29	136.05		Group 1	Group 1	Included in Group 1 Remedial Measures
32	8	D	C	Manhole	SSMHT0001079	3515 W ELM	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	14.99	195.27	3	$ 8,036	$ 8,036	Coat Manhole/Dish
33	8	C	C	Manhole	SSMHT0001080	133 DONNA DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.02	120.05		$ -	$ -	Monitor in CMOM
34	8	X	X	Manhole	SSMHT0001081	NONE MELINDA LN					Trees/Woods	Unpaved								$ -	$ -	Pending CCTV Inspection
35	8	X	X	Manhole	SSMHT0001082	105 TOURNAMENT					Trees/Woods	Unpaved								$ -	$ -	Pending CCTV Inspection
36	8	D	C	Manhole	SSMHT0001083	105 TOURNAMENT RD	Solid		No	None	Yard	Unpaved	Above Grade	7	Std 48 Round	Sealed Brick	9.58	127.11		$ 650	$ 650	Realign and Seal Manhole Ring
37	8	Group 1	Group 1	Manhole	SSMHT0001084	3400 BLK W ERWIN ST	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	22	Std 48 Round	Concrete	14.21	185.45		Group 1	Group 1	Included in Group 1 Remedial Measures
38	8	X	X	Manhole	SSMHT0001085	3205 W ERWIN ST					Yard	Unpaved								$ -	$ -	Pending CCTV Inspection
39	8	B	B	Manhole	SSMHT0001086	3523 W ERWIN ST	Solid		No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Concrete	18.26	236.48		$ -	$ -	Monitor in CMOM
40	8	C	C	Manhole	SSMHT0001087	1730 N NW LOOP 323	Solid		No	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	8.00	107.20		$ -	$ -	Monitor in CMOM
41	8	B	B	Manhole	SSMHT0001088	3523 W ERWIN ST	Solid		No	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.82	104.93		$ -	$ -	Monitor in CMOM
42	8	C	C	Manhole	SSMHT0001089	110 S SW LOOP 323	Solid		No	None	Yard	Unpaved	At Grade		Std 48 Round	Brick	8.70	116.02		$ -	$ -	Monitor in CMOM
43	8	D	C	Manhole	SSMHT0001092	3616 DONNA DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.21	72.05	3	$ 3,107	$ 3,107	Coat Manhole/Dish
44	8	B	B	Manhole	SSMHT0001099	1320 N. NW LOOP 323	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	5	Std 48 Round	Concrete	5.52	75.95		$ -	$ -	Monitor in CMOM
45	8	D	C	Manhole	SSMHT0001100	1100 BLK. N. NW LOOP 323	Vented	2	No	None	Road Shoulder	Unpaved	At Grade		Std 48 Round	Concrete	8.20	109.72	2	$ 3,517	$ 3,517	Coat Manhole/Dish
46	8	C	C	Manhole	SSMHT0001126	113 N NW LOOP 323	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.72	103.67		$ -	$ -	Monitor in CMOM
47	8	C	C	Manhole	SSMHT0001127	105 N. NW LOOP 323	Solid		No	None	Road Shoulder	Unpaved	Above Grade	4	Std 48 Round	Sealed Brick	9.87	130.76		$ -	$ -	Monitor in CMOM
48	8	D	C	Manhole	SSMHT0001128	105 N. NW LOOP 323	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Sealed Brick	6.99	94.47	2	$ 3,534	$ 3,534	Coat Manhole/Reconstruct Bench
49	8	B	B	Manhole	SSMHT0001129	121 N. NW LOOP 323	Solid		No	None	Road Shoulder	Unpaved	Above Grade	8	Std 48 Round	Concrete	4.20	59.32		$ -	$ -	Monitor in CMOM
50	8	X	X	Manhole	SSMHT0001130	3205 W ERWIN ST					Yard	Unpaved								$ -	$ -	Pending CCTV Inspection
51	8	Group 1	Group 1	Manhole	SSMHT0001131	3205 W ERWIN ST	Vented	2	No	None	Yard	Unpaved	At Grade		Std 48 Round	Brick	6.55	88.93		Group 1	Group 1	Included in Group 1 Remedial Measures
52	8	C	C	Manhole	SSMHT0001132	3523 W ERWIN ST	Solid		No	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	18.36	237.74		$ -	$ -	Monitor in CMOM
53	8	D	C	Manhole	SSMHT0001133	3523 W ERWIN ST	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.60	102.16	2	$ 3,065	$ 3,065	Coat Manhole
54	8	C	C	Manhole	SSMHT0001200	3000 BLK. CHANDLER HWY.	Solid		Yes	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.90	80.74		$ -	$ -	Monitor in CMOM
55	8	C	C	Manhole	SSMHT0001713	834 N PARKDALE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.06	82.76		$ -	$ -	Monitor in CMOM
56	8	C	C	Manhole	SSMHT0001714	2401 NORTHCREST DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.96	106.70		$ -	$ -	Monitor in CMOM
57	8	C	C	Manhole	SSMHT0001715	710N FOREST AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.55	151.93		$ -	$ -	Monitor in CMOM
58	8	C	C	Manhole	SSMHT0001716	710N FOREST AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.69	103.29		$ -	$ -	Monitor in CMOM
59	8	C	C	Manhole	SSMHT0001717	517 N FORREST AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.58	76.71		$ -	$ -	Monitor in CMOM

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Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

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Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
60	8	C	C	Manhole	SSMHT0001718	511N FOREST AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.89	131.01		$ -	$ -	Monitor in CMOM
61	8	D	C	Manhole	SSMHT0001719	500 NORTHCREST DR	Vented	2	No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.43	112.62		$ 225	$ 225	Install Inflow Dish
62	8	C	C	Manhole	SSMHT0001720	510 N PARKDALE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.49	113.37		$ -	$ -	Monitor in CMOM
63	8	D	C	Manhole	SSMHT0001721	2416 W OAKWOOD ST	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 60 Round	Brick	6.70	90.82	3	$ 3,858	$ 3,858	Coat Manhole/Dish
64	8	C	C	Manhole	SSMHT0001722	2510 W OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.19	84.39		$ -	$ -	Monitor in CMOM
65	8	D	C	Manhole	SSMHT0001723	2502 W OAKWOOD ST	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.75	91.45		$ 225	$ 225	Install Inflow Dish
66	8	Group 1	Group 1	Manhole	SSMHT0001724	2530 W OAKWOOD ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.31	136.31		Group 1	Group 1	Included in Group 1 Remedial Measures
67	8	Group 1	Group 1	Manhole	SSMHT0001725	508 PAMELA DR	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.81	142.61		Group 1	Group 1	Included in Group 1 Remedial Measures
68	8	D	C	Manhole	SSMHT0001726	612 PAMELA DR	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.18	134.67	3	$ 5,387	$ 5,387	Coat Manhole
69	8	C	C	Manhole	SSMHT0001727	612 PAMELA DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.98	132.15		$ -	$ -	Monitor in CMOM
70	8	B	B	Manhole	SSMHT0001728	2515 NORTHCREST DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.92	68.39		$ -	$ -	Monitor in CMOM
71	8	D	C	Manhole	SSMHT0001729	2534 NORTHCREST DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.40	87.04		$ 225	$ 225	Install Inflow Dish
72	8	Group 1	Group 1	Manhole	SSMHT0001730	3205 W ERWIN ST	Solid		No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	11.63	152.94		Group 1	Group 1	Included in Group 1 Remedial Measures
73	8	Group 1	Group 1	Manhole	SSMHT0001731	3205 W ERWIN ST					Yard	Unpaved	At Grade							Group 1	Group 1	Included in Group 1 Remedial Measures
74	8	C	C	Manhole	SSMHT0001732	1815 BELVEDERE BLVD					Yard	Unpaved								$ -	$ -	Monitor in CMOM
75	8	C	C	Manhole	SSMHT0001733	1912 BELVEDERE BLVD					Trees/Woods	Unpaved								$ -	$ -	Monitor in CMOM
76	8	C	C	Manhole	SSMHT0001734	2022 BELVEDERE BLVD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.58	64.11		$ -	$ -	Monitor in CMOM
77	8	C	C	Manhole	SSMHT0001735	2002 BELVEDERE BLVD	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	5	Std 48 Round	Brick	6.45	87.67		$ -	$ -	Monitor in CMOM
78	8	C	C	Manhole	SSMHT0001736	2013 WOODLAWN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.79	104.55		$ -	$ -	Monitor in CMOM
79	8	C	C	Manhole	SSMHT0001737	1227 BELLAIRE DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.39	112.11		$ -	$ -	Monitor in CMOM
80	8	D	C	Manhole	SSMHT0001738	1927 N. FOREST AVE.	Vented	2	No	Light	Alley	Paved - Asphalt	Above Grade	2	Std 48 Round	Brick	4.16	58.82		$ 1,175	$ 1,175	Realign and Seal Manhole Ring add Dish
81	8	D	C	Manhole	SSMHT0001739	2022 BELVEDERE BLVD.MH confirmed on video. 140' DS of 01018 (Buried)					Trees/Woods	Unpaved								$ 1,350	$ 1,350	Raise Casting
82	8	C	C	Manhole	SSMHT0001740	1900 BLK FOREST AVE	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.19	59.19		$ -	$ -	Monitor in CMOM
83	8	D	C	Manhole	SSMHT0001741	2139 N. FOREST AVE.	Vented	2	No	Moderate	Trees/Woods	Unpaved	At Grade		Std 48 Round	Brick	8.14	108.96	3	$ 5,234	$ 5,234	Realign and Seal Manhole Ring/Coat Manhole/Dish
84	8	D	C	Manhole	SSMHT0001742	2200 BLK GARDEN VALLEY RD	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.52	88.55		$ 925	$ 925	Reconstruct Bench add Dish
85	8	C	C	Manhole	SSMHT0001743	2200 GARDEN VLLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.25	72.55		$ -	$ -	Monitor in CMOM
86	8	C	C	Manhole	SSMHT0001744	2100 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.92	68.39		$ -	$ -	Monitor in CMOM
87	8	C	C	Manhole	SSMHT0001745	1900 BLK GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.69	65.49		$ -	$ -	Monitor in CMOM
88	8	B	B	Manhole	SSMHT0001746	2100 N BARRON AVE	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.16	58.82		$ -	$ -	Monitor in CMOM
89	8	B	B	Manhole	SSMHT0001747	1734 GARDEN VLLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.13	83.64		$ -	$ -	Monitor in CMOM
90	8	D	C	Manhole	SSMHT0001748	1915 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.39	74.31	3	$ 3,973	$ 3,973	Coat Manhole/Reconstruct Chimney
91	8	C	C	Manhole	SSMHT0001750	2322 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.98	106.95		$ -	$ -	Monitor in CMOM
92	8	D	C	Manhole	SSMHT0001751	925 BELLAIRE DR	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.16	109.22	3	$ 4,594	$ 4,594	Coat Manhole/Dish
93	8	D	C	Manhole	SSMHT0001752	2300 BLK GARDEN VALLEY	Solid		Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.39	86.91		$ 500	$ 500	Replace Manhole Lid
94	8	C	C	Manhole	SSMHT0001753	2500 BLK GARDEN VLLEY RD	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.98	94.35		$ -	$ -	Monitor in CMOM
95	8	D	C	Manhole	SSMHT0001754	1220 PARKDALE DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.67	90.44		$ 225	$ 225	Install Inflow Dish
96	8	B	B	Manhole	SSMHT0001755	1000 BLK BELLAIRE DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.98	106.95		$ -	$ -	Monitor in CMOM
97	8	C	C	Manhole	SSMHT0001756	2219 W SHERWOOD ST	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.00	107.20		$ -	$ -	Monitor in CMOM
98	8	D	C	Manhole	SSMHT0001757	4318 MC CULLAR DR	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.02	132.65	3	$ 5,531	$ 5,531	Coat Manhole/Dish
99	8	C	C	Manhole	SSMHT0001758	2418 CALDWELL BLVD	Solid		Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.88	67.89		$ -	$ -	Monitor in CMOM
100	8	B	B	Manhole	SSMHT0001759	2614 CALDWELL BLVD	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.30	98.38		$ -	$ -	Monitor in CMOM
101	8	D	C	Manhole	SSMHT0001760	2535 NORTHCREST DR	Vented	2	No	None	Creek	Unpaved	Above Grade	48	Std 48 Round	Brick	7.94	106.44	3	$ 4,908	$ 4,908	Realign and Seal Manhole Ring/Coat Manhole
102	8	Group 1	Group 1	Manhole	SSMHT0001761	3205 W ERWIN ST	Vented	2	No	Moderate	Trees/Woods	Unpaved	Below Grade	2	Std 48 Round	Brick	12.18	159.87		Group 1	Group 1	Included in Group 1 Remedial Measures
103	8	Group 1	Group 1	Manhole	SSMHT0001762	3205 W ERWIN ST	Solid		No	Light	Creek	Unpaved	Above Grade	39	Std 48 Round	Brick	11.06	145.76		Group 1	Group 1	Included in Group 1 Remedial Measures
104	8	Group 1	Group 1	Manhole	SSMHT0001763	3205 W ERWIN ST	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	39	Std 48 Round	Brick	12.39	162.51		Group 1	Group 1	Included in Group 1 Remedial Measures
105	8	Group 1	Group 1	Manhole	SSMHT0001764	3205 W ERWIN ST	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	19	Std 48 Round	Brick	13.79	180.15		Group 1	Group 1	Included in Group 1 Remedial Measures
106	8	Group 1	Group 1	Manhole	SSMHT0001765	2520 W OAKWOOD ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.77	142.10		Group 1	Group 1	Included in Group 1 Remedial Measures
107	8	D	C	Manhole	SSMHT0001766	605 N PARKDALE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.78	104.43		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
108	8	Group 1	Group 1	Manhole	SSMHT0001767	3205 W ERWIN ST	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	15	Std 48 Round	Brick	12.16	159.62		Group 1	Group 1	Included in Group 1 Remedial Measures
109	8	Group 1	Group 1	Manhole	SSMHT0001768	NO NUMBER N PARKDALE DR	Solid		No	None	Trees/Woods	Unpaved	Above Grade	13	Std 48 Round	Concrete	11.96	157.10		Group 1	Group 1	Included in Group 1 Remedial Measures
110	8	Group 1	Group 1	Manhole	SSMHT0001769	3205 W ERWIN ST	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	22	Std 48 Round	Brick	11.96	157.10		Group 1	Group 1	Included in Group 1 Remedial Measures
111	8	Group 1	Group 1	Manhole	SSMHT0001770	39 40	Vented	2	No	None	Creek	Unpaved	Above Grade	69	Std 48 Round	Brick	11.47	150.92		Group 1	Group 1	Included in Group 1 Remedial Measures
112	8	Group 1	Group 1	Manhole	SSMHT0001771	202 N PARKDALE DR	Vented	2	No	None	Yard	Unpaved	Above Grade	15	Std 48 Round	Brick	10.13	134.04		Group 1	Group 1	Included in Group 1 Remedial Measures
113	8	B	B	Manhole	SSMHT0001772	215N PARKDALE DR	Solid		No	None	Yard	Unpaved	Above Grade	12	Std 48 Round	Concrete	6.30	85.78		$ -	$ -	Monitor in CMOM
114	8	C	C	Manhole	SSMHT0001773	215 N PARKDALE DR	Solid		No	Light	Yard	Unpaved	At Grade		Std 35 Round	Concrete	4.74	66.12		$ -	$ -	Monitor in CMOM
115	8	D	C	Manhole	SSMHT0001774	300 N PARK DALE DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.51	138.83	3	$ 6,478	$ 6,478	Coat Manhole/ Reconstruct Bench/Dish
116	8	D	C	Manhole	SSMHT0001775	300 N PARKDALE DR	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.16	71.42	3	$ 3,082	$ 3,082	Coat Manhole/Dish
117	8	X	X	Manhole	SSMHT0001776	312 KATHY CIR				Severe	Yard	Unpaved	Below Grade							$ -	$ -	Pending CCTV Inspection

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
118	8	D	C	Manhole	SSMHT0001777	316 KATHY CIR.	Vented	2	No	Light	Yard	Unpaved	Above Grade	5	Std 48 Round	Brick	11.18	147.27	3	$ 6,541	$ 6,541	Coat Manhole
119	8	D	C	Manhole	SSMHT0001778	2402 W CLAUDE ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.67	90.44		$ 1,500	$ 1,500	Repair Chimney and Coat
120	8	D	C	Manhole	SSMHT0001779	1625 W. GENTRY PKWY.	None		No	Severe	Trees/Woods	Unpaved	Above Grade	18	Std 48 Round	Brick	9.45	125.47	3	$ 5,744	$ 5,744	Replace Lid/Coat Manhole/Dish
121	8	D	C	Manhole	SSMHT0001781	2300 BLK. W. GENTRY PKWY.	Vented	2	Yes	None	Sidewalk	Paved - Concrete	At Grade		30 Inch Diameter	Brick	3.70	53.02		$ 1,500	$ 1,500	Repair Chimney and Coat
122	8	B	B	Manhole	SSMHT0001782	2300 BLK. W. GENTRY PKWY.	Vented	2	Yes	None	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Concrete	6.30	85.78		$ -	$ -	Monitor in CMOM
123	8	D	C	Manhole	SSMHT0001783	2310 W. GENTRY PKWY.	Vented	2	No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	6.81	92.21		$ 875	$ 875	Realign and Seal Manhole Ring and Dish
124	8	C	C	Manhole	SSMHT0001784	2300 BLK. W. GENTRY PKWY.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.58	89.31		$ -	$ -	Monitor in CMOM
125	8	B	B	Manhole	SSMHT0001785	2322 WOODLAWN ST	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.84	54.78		$ -	$ -	Monitor in CMOM
126	8	D	C	Manhole	SSMHT0001786	1500 BLK. W. GENTRY PKWY.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.28	123.33	3	$ 4,933	$ 4,933	Coat Manhole
127	8	X	X	Manhole	SSMHT0001787	1500 BLK. W. GENTRY PKWY.					Trees/Woods	Unpaved								$ -	$ -	Pending CCTV Inspection
128	8	D	C	Manhole	SSMHT0001788	1625 W. GENTRY PKWY.	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	3	Std 48 Round	Brick	4.21	59.45	3	$ 2,378	$ 2,378	Coat Manhole
129	8	C	C	Manhole	SSMHT0001799	2100 BANDERA DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.70	53.02		$ -	$ -	Monitor in CMOM
130	8	D	C	Manhole	SSMHT0001800	2118 BANDERA DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.49	100.77	3	$ 4,031	$ 4,031	Coat Manhole
131	8	D	C	Manhole	SSMHT0001802	409 N BARREN AVE	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	4	Std 48 Round	Brick	5.54	76.20		$ 2,150	$ 2,150	Realign and Seal Manhole Ring/Repair Chimney and Coat
132	8	D	C	Manhole	SSMHT0001803	1801 W ERWIN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.36	73.94		$ 2,450	$ 2,450	Realign and Seal Manhole Ring/Repair Chimney and Coat
133	8	B	B	Manhole	SSMHT0001804	1815 W ERWIN ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	3.86	55.04		$ -	$ -	Monitor in CMOM
134	8	B	B	Manhole	SSMHT0001805	209N FOREST AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.79	91.95		$ -	$ -	Monitor in CMOM
135	8	C	C	Manhole	SSMHT0001807	401 BANDERA DR.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.62	64.61		$ -	$ -	Monitor in CMOM
136	8	C	C	Manhole	SSMHT0001808	2006 ERWIN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.74	91.32		$ -	$ -	Monitor in CMOM
137	8	D	C	Manhole	SSMHT0001809	2014 W ERWIN ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.28	60.33		$ 225	$ 225	Install Inflow Dish
138	8	C	C	Manhole	SSMHT0001810	225 DAYTON ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.72	103.67		$ -	$ -	Monitor in CMOM
139	8	D	C	Manhole	SSMHT0001811	1700 W CLAUDE ST	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	6	Std 48 Round	Concrete	8.09	108.33		$ 2,150	$ 2,150	Realign and Seal Manhole Ring/Repair Chimney and Coat
140	8	D	C	Manhole	SSMHT0001812	1700 W CLAUDE ST	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	10	Std 35 Round	Brick	4.82	67.13	3	$ 2,685	$ 2,685	Coat Manhole
141	8	Group 1	Group 1	Manhole	SSMHT0001813	1825 W ERWIN ST	Solid		No	Severe	Trees/Woods	Unpaved	Above Grade	17	Std 48 Round	Brick	4.99	69.27		Group 1	Group 1	Included in Group 1 Remedial Measures
142	8	Group 1	Group 1	Manhole	SSMHT0001814	2021 W ERWIN ST	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	14	Std 48 Round	Brick	5.34	73.68		Group 1	Group 1	Included in Group 1 Remedial Measures
143	8	Group 1	Group 1	Manhole	SSMHT0001815	1915 W ERWIN ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	31	Std 48 Round	Concrete	7.89	105.81		Group 1	Group 1	Included in Group 1 Remedial Measures
144	8	B	B	Manhole	SSMHT0001816	1915 ERWIN ST	Vented	2	No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	6.33	86.16		$ -	$ -	Monitor in CMOM
145	8	C	C	Manhole	SSMHT0001817	2214 W ERWIN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.82	79.73		$ -	$ -	Monitor in CMOM
146	8	C	C	Manhole	SSMHT0001818	2209 W ELM ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.18	71.67		$ -	$ -	Monitor in CMOM
147	8	C	C	Manhole	SSMHT0001819	204 MIKE AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.02	57.05		$ -	$ -	Monitor in CMOM
148	8	C	C	Manhole	SSMHT0001820	234 S MIKE AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.46	113.00		$ -	$ -	Monitor in CMOM
149	8	D	C	Manhole	SSMHT0001821	220 S LYONS AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.28	110.73		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
150	8	D	C	Manhole	SSMHT0001822	316 S LYONS ST (Buried)				None	Street	Paved - Asphalt	At Grade							$ 1,350	$ 1,350	Raise Casting
151	8	B	B	Manhole	SSMHT0001823	202 S BOON AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.74	66.12		$ -	$ -	Monitor in CMOM
152	8	B	B	Manhole	SSMHT0001824	1821 PINE ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.00	69.40		$ -	$ -	Monitor in CMOM
153	8	C	C	Manhole	SSMHT0001825	411 FAIR PARK DR.	Solid		No	None	Driveway	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.74	66.12		$ -	$ -	Monitor in CMOM
154	8	C	C	Manhole	SSMHT0001826	400 BLK. S. LYONS AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.83	92.46		$ -	$ -	Monitor in CMOM
155	8	D	C	Manhole	SSMHT0001827	2200 BLK. W. FRONT ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.85	117.91	3	$ 4,716	$ 4,716	Coat Manhole
156	8	D	C	Manhole	SSMHT0001828	2718 W GENTRY PKWY	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.02	57.05		$ 225	$ 225	Install Inflow Dish
157	8	Group 1	Group 1	Manhole	SSMHT0001829	1614 W. ERWIN ST.	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	6.26	85.28		Group 1	Group 1	Included in Group 1 Remedial Measures
158	8	Group 1	Group 1	Manhole	SSMHT0001830	200 BLK. S. GLENWOOD BLVD.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.74	91.32		Group 1	Group 1	Included in Group 1 Remedial Measures
159	8	C	C	Manhole	SSMHT0001831	203 S GLENWOOD ST	Vented	2	Yes	None	Street	Paved - Asphalt	Above Grade	1	Std 48 Round	Brick	5.12	70.91		$ -	$ -	Monitor in CMOM
160	8	D	C	Manhole	SSMHT0001832	211 S GLENWOOD BLVD	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.64	77.46		$ 225	$ 225	Install Inflow Dish
161	8	B	B	Manhole	SSMHT0001833	211 S GLENWOOD BLVD	Solid		No		Yard	Unpaved	Above Grade	1	Std 48 Round	Brick	NONE			$ -	$ -	Monitor in CMOM
162	8	B	B	Manhole	SSMHT0001834	211 S GLENWOOD BLVD	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick				$ -	$ -	Monitor in CMOM
163	8	Group 1	Group 1	Manhole	SSMHT0001835	238 S. GLENWOOD BLVD.	Vented	2	No	Moderate	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	6.98	94.35		Group 1	Group 1	Included in Group 1 Remedial Measures
164	8	D	C	Manhole	SSMHT0001836	1519 PARK ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.52	75.95		$ 225	$ 225	Install Inflow Dish
165	8	D	C	Manhole	SSMHT0001837	305 S HILL AVE	Vented	2	No	None	Street	Paved - Asphalt	At Grade		Std 60 Round	Brick	6.78	91.83		$ 225	$ 225	Install Inflow Dish
166	8	C	C	Manhole	SSMHT0001838	313 S HILL AVE	Vented	1	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.70	78.22		$ -	$ -	Monitor in CMOM
167	8	Not Applicable	Not Applicable	T-Connection	SSMHT0001839	1801 W ERWIN ST (No MH - T-Connection)						Paved - Asphalt								$ -	$ -	None
168	8	D	C	Manhole	SSMHT0001801	409 N BARREN AVE	Solid		No	Light	Creek	Unpaved	Above Grade	22	36 Inch Diameter	Concrete	4.96	68.90		$ 650	$ 650	Realign and Seal Manhole Ring
169	8	D	C	Manhole	SSMHT0001841	2302 PINE BURR RD	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.32	60.83	3	$ 2,658	$ 2,658	Coat Manhole/Dish
170	8	D	C	Manhole	SSMHT0001842	705 LYONS AVE	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.10	70.66	3	$ 2,826	$ 2,826	Coat Manhole
171	8	D	C	Manhole	SSMHT0001843	500 BLK. S. LYONS AVE.MH confirmed on video. 178' US of 02619 and 165' DS of 1848			Buried		Parking Lot	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
172	8	B	B	Manhole	SSMHT0001844	600 BLK. S. LYONS AVE.	Solid		No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.17	71.54		$ -	$ -	Monitor in CMOM
173	8	B	B	Manhole	SSMHT0001845	411 FAIR PARK DR.	Solid		No	None	Road Shoulder	Unpaved	Above Grade	1	Std 48 Round	Sealed Brick	6.41	87.17		$ -	$ -	Monitor in CMOM
174	8	D	C	Manhole	SSMHT0001847	2000 BLK. FAIR PARK DR. MH confirmed on video. 454' US of 01845			Buried		Road Shoulder	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
175	8	C	C	Manhole	SSMHT0001848	609 FAIR PARK DR	Solid		No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Concrete	15.21	198.05		$ -	$ -	Monitor in CMOM
176	8	D	C	Manhole	SSMHT0001850	609 FAIR PARK DR	Solid		No	None	Trees/Woods	Unpaved	Above Grade	18	Std 48 Round	Brick	9.52	126.35	3	$ 5,704	$ 5,704	Realign and Seal Manhole Ring/Coat Manhole
177	8	E	A	Manhole	SSMHT0001851	2002 BELLWOOD RD.	Solid		No	Moderate	Gutter	Paved - Concrete	At Grade		Std 48 Round	Brick	12.50	163.90	3	$ 7,312	$ 7,312	Replace Manhole
178	8	D	C	Manhole	SSMHT0001852	2002 BELLWOOD RD.	Solid		No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Concrete	5.80	79.48		$ 650	$ 650	Realign and Seal Manhole Ring
179	8	D	C	Manhole	SSMHT0001853	1900 BELLWOOD RD.	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Sealed Brick	5.20	71.92		$ 1,500	$ 1,500	Seal Chimney
180	8	D	C	Manhole	SSMHT0001854	700 BLK. S. LYONS AVE.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.35	73.81	3	$ 2,952	$ 2,952	Coat Manhole
181	8	D	C	Manhole	SSMHT0001855	900 BLK. S. LYONS ST.	Vented	2	Yes	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.48	75.45		$ 1,500	$ 1,500	Repair Chimney and Coat
182	8	C	C	Manhole	SSMHT0001856	2017 W. JACKSON ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.92	80.99		$ -	$ -	Monitor in CMOM
183	8	B	B	Manhole	SSMHT0001857	1004 S. ACADEMY ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.82	79.73		$ -	$ -	Monitor in CMOM
184	8	B	B	Manhole	SSMHT0001858	1000 BLK. S. PEACH AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		24 Inch Diamter	Concrete	4.56	63.86		$ -	$ -	Monitor in CMOM
185	8	B	B	Manhole	SSMHT0001859	927 S. PEACH AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.36	86.54		$ -	$ -	Monitor in CMOM
186	8	B	B	Manhole	SSMHT0001860	842 S. PEACH AVE.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.36	73.94		$ -	$ -	Monitor in CMOM
187	8	B	B	Manhole	SSMHT0001861	900 BLK. S. ACADEMY AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.32	86.03		$ -	$ -	Monitor in CMOM
188	8	D	C	Manhole	SSMHT0001862	2002 BELLWOOD RD	Solid		No	Light	Yard	Unpaved	At Grade		Std 48 Round	Concrete	12.96	169.70	2	$ 5,091	$ 5,091	Coat Manhole
189	8	D	C	Manhole	SSMHT0001863	814 S. PEACH AVE.	Solid	Solid		Light	Street	Paved - Asphalt	At Grade							$ 1,220	$ 1,220	Replace Ring and Cover
190	8	D	C	Manhole	SSMHT0001864	927 S. PEACH AVE.	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	7	Std 48 Round	Brick	4.17	58.94		$ 650	$ 650	Realign and Seal Manhole Ring
191	8	C	C	Manhole	SSMHT0001865	1400 BLK. W. CONNALLY ST.	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	1	Std 48 Round	Brick	6.22	84.77		$ -	$ -	Monitor in CMOM
192	8	C	C	Manhole	SSMHT0001866	1511 BELLWOOD RD.	Solid		No	Light	Field	Unpaved	Above Grade	3	Std 48 Round	Concrete	12.05	158.23		$ -	$ -	Monitor in CMOM
193	8	B	B	Manhole	SSMHT0001867	731 HURT AVE.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.94	106.44		$ -	$ -	Monitor in CMOM
194	8	B	B	Manhole	SSMHT0001868	702 S. PEACH AVE.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.38	74.19		$ -	$ -	Monitor in CMOM
195	8	B	B	Manhole	SSMHT0001869	702 S. PEACH AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.56	63.86		$ -	$ -	Monitor in CMOM
196	8	C	C	Manhole	SSMHT0001870	1918 W. ROBBINS ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.84	130.38		$ -	$ -	Monitor in CMOM
197	8	D	C	Manhole	SSMHT0001871	1411 W. CONNALLY ST.	Solid		No	None	Trees/Woods	Unpaved	Above Grade	14	Std 48 Round	Brick	7.65	102.79	3	$ 4,112	$ 4,112	Coat Manhole
198	8	B	B	Manhole	SSMHT0001872	1403 S. PEACH AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.76	78.98		$ -	$ -	Monitor in CMOM
199	8	D	C	Manhole	SSMHT0001878	2700 BLK. VAN HWY.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.94	106.44	3	$ 4,483	$ 4,483	Coat Manhole/Dish
200	8	C	C	Manhole	SSMHT0001879	2642 W GENTRY PKWY	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.09	108.33		$ -	$ -	Monitor in CMOM
201	8	C	C	Manhole	SSMHT0001880	2642 W GENTRY PKWY	Solid		No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	7.67	103.04		$ -	$ -	Monitor in CMOM
202	8	D	C	Manhole	SSMHT0001881	1699 SHAWNEE BLVD	Vented	2	No	Light	Street	Paved - Asphalt	Above Grade	2	Std 48 Round	Brick	6.83	92.46		$ 925	$ 925	Reconstruct Bench add Dish
203	8	D	C	Manhole	SSMHT0001882	1427 SHAWNEE BLVD	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.03	57.18	3	$ 2,512	$ 2,512	Coat Manhole/Dish
204	8	D	C	Manhole	SSMHT0001883	2600 BLK CANTON ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.13	108.84	3	$ 5,354	$ 5,354	Coat Manhole/Reconstruct Chimney
205	8	B	B	Manhole	SSMHT0001884	1625 WICHITA AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.42	62.09		$ -	$ -	Monitor in CMOM
206	8	C	C	Manhole	SSMHT0001885	2400 BLK. W. GENTRY PKWY.	Vented	2	Yes	Moderate	Street	Paved - Asphalt	At Grade		30 Inch Diameter	Brick	4.96	68.90		$ -	$ -	Monitor in CMOM
207	8	D	C	Manhole	SSMHT0001886	1800 LAWTON DR	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.92	131.39	3	$ 5,481	$ 5,481	Coat Manhole/Dish
208	8	D	C	Manhole	SSMHT0001887	3000 VAN HWY	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.56	63.86	3	$ 2,779	$ 2,779	Coat Manhole/Dish
209	8	B	B	Manhole	SSMHT0001888	3000 BLK GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.16	71.42		$ -	$ -	Monitor in CMOM
210	8	D	C	Manhole	SSMHT0001889	300 BLK GARDEN VALLEY RD	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.73	116.40		$ 225	$ 225	Install Inflow Dish
211	8	B	B	Manhole	SSMHT0001899	2721 GARDEN VALLEY RD	Vented		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.85	105.31		$ -	$ -	Monitor in CMOM
212	8	Group 1	Group 1	Manhole	SSMHT0001900	200 BLK N PARKDALE DR	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	8	Std 48 Round	Brick	9.79	129.75		Group 1	Group 1	Included in Group 1 Remedial Measures
213	8	Group 1	Group 1	Manhole	SSMHT0001901	2317 STATE HWY 64	Solid		No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.19	159.99		Group 1	Group 1	Included in Group 1 Remedial Measures
214	8	Group 1	Group 1	Manhole	SSMHT0001902	2317 STATE HWY 64	Solid		No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	12.92	169.19		Group 1	Group 1	Included in Group 1 Remedial Measures
215	8	Group 1	Group 1	Manhole	SSMHT0001903	2371 STATE HWY 64	Vented	2	No	None	Drainage Ditch	Paved - Concrete	Above Grade	66	Std 48 Round	Brick	7.95	106.57		Group 1	Group 1	Included in Group 1 Remedial Measures
216	8	Group 1	Group 1	Manhole	SSMHT0001904	2371 STATE HWY 64	Vented	2	No	Moderate	Trees/Woods	Unpaved	Above Grade	2	Std 48 Round	Brick	14.73	192.00		Group 1	Group 1	Included in Group 1 Remedial Measures
217	8	Group 1	Group 1	Manhole	SSMHT0001905	2325 STATE HWY 64	Solid		No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.45	163.27		Group 1	Group 1	Included in Group 1 Remedial Measures
218	8	Group 1	Group 1	Manhole	SSMHT0001906	2329 STATE HWY 64	Solid		No	None	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.91	156.47		Group 1	Group 1	Included in Group 1 Remedial Measures
219	8	Group 1	Group 1	Manhole	SSMHT0001907	2302 STATE HWY 64	Solid		No	Light	Street	Paved - Asphalt	Below Grade	1	Std 48 Round	Brick	9.21	122.45		Group 1	Group 1	Included in Group 1 Remedial Measures
220	8	Group 1	Group 1	Manhole	SSMHT0001908	2302 STATE HWY 64	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	10.12	133.91		Group 1	Group 1	Included in Group 1 Remedial Measures
221	8	B	B	Manhole	SSMHT0001909	2614 W. ERWIN ST.	Vented	2	Yes	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	4.70	65.62		$ -	$ -	Monitor in CMOM
222	8	C	C	Manhole	SSMHT0001910	2700 BLK. CHANDLER HWY.					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
223	8	D	C	Manhole	SSMHT0001911	202 N. PARKDALE DR.	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	5	Std 48 Round	Sealed Concrete	11.12	146.51		$ 2,150	$ 2,150	Realign and Seal Manhole Ring/Repair Chimney and Coat
224	8	C	C	Manhole	SSMHT0001912	2800 W. ERWIN ST.	Vented	2	Yes	None	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Brick	14.16	184.82		$ -	$ -	Monitor in CMOM
225	8	C	C	Manhole	SSMHT0001913	2800 W. ERWIN ST.					Trees/Woods	Unpaved								$ -	$ -	Monitor in CMOM
226	8	D	C	Manhole	SSMHT0001914	2800 BLK. CHANDLER ST.	Vented	2	Yes	None	Street	Paved - Asphalt	Above Grade	1	Std 48 Round	Brick	5.71	78.35	3	$ 3,359	$ 3,359	Coat Manhole/Dish
227	8	D	C	Manhole	SSMHT0001915	2701 W. ERWIN ST.	Solid		No	None	Trees/Woods	Unpaved	Above Grade	28	Std 48 Round	Concrete	7.51	101.03	2	$ 3,681	$ 3,681	Realign and Seal Manhole Ring/Coat Manhole
228	8	C	C	Manhole	SSMHT0001916	2214 W ERWIN ST					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
229	8	D	C	Manhole	SSMHT0001918	2323 W FRONT ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	18	Std 48 Round	Brick	8.09	108.33	3	$ 4,983	$ 4,983	Realign and Seal Manhole Ring/Coat Manhole
230	8	D	C	Manhole	SSMHT0001919	2323 W FRONT ST	Solid		No	Light	Yard	Unpaved	Above Grade	6	Std 48 Round	Concrete	10.68	140.97		$ 650	$ 650	Realign and Seal Manhole Ring
231	8	D	C	Manhole	SSMHT0001921	2300 BLK. W. FRONT ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.03	107.58	3	$ 4,303	$ 4,303	Coat Manhole
232	8	D	C	Manhole	SSMHT0001922	2323 WEST FRONT ST	Solid		Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.91	93.47	3	$ 3,964	$ 3,964	Coat Manhole/Dish
233	8	D	C	Manhole	SSMHT0001923	2600 BLK. W. FRONT ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.15	96.49		$ 1,500	$ 1,500	Repair Chimney and Coat

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
234	8	C	C	Manhole	SSMHT0001924	2700 BLK. W. FRONT ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.89	156.21		$ -	$ -	Monitor in CMOM
235	8	D	C	Manhole	SSMHT0001925	2700 BLK. W. FRONT ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.37	74.06		$ 225	$ 225	Install Inflow Dish
236	8	D	C	Manhole	SSMHT0001926	2822 W. FRONT ST.	Vented	2	No	Moderate	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	6.05	82.63	3	$ 3,530	$ 3,530	Coat Manhole/Dish
237	8	B	B	Manhole	SSMHT0001927	2822 W. FRONT ST.	Vented	2	No	Moderate	Road Shoulder	Unpaved	Below Grade	1	Std 48 Round	Brick	4.21	59.45		$ -	$ -	Monitor in CMOM
238	8	B	B	Manhole	SSMHT0001928	430 S. PARKDALE DR.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.68	103.17		$ -	$ -	Monitor in CMOM
239	8	B	B	Manhole	SSMHT0001930	508 S. PARKDALE DR.	Solid		No	None	Road Shoulder	Unpaved	Above Grade	21	Std 48 Round	Concrete	9.95	131.77		$ -	$ -	Monitor in CMOM
240	8	D	C	Manhole	SSMHT0001931	522 S. PARKDALE DR.	Vented	2	No	Severe	Gutter	Paved - Concrete	At Grade		Std 48 Round	Brick	9.80	129.88	3	$ 5,420	$ 5,420	Coat Manhole/Dish
241	8	D	C	Manhole	SSMHT0001932	2402 MAPLEWOOD PL.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.68	103.17		$ 225	$ 225	Install Inflow Dish
242	8	C	C	Manhole	SSMHT0001933	2410 MAPLEWOOD PL.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.88	93.09		$ -	$ -	Monitor in CMOM
243	8	C	C	Manhole	SSMHT0001934	2405 PINEBURR RD.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.13	83.64		$ -	$ -	Monitor in CMOM
244	8	B	B	Manhole	SSMHT0001935	2710 PINEBURR RD.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.35	111.61		$ -	$ -	Monitor in CMOM
245	8	D	C	Manhole	SSMHT0001936	519 SOUTHGATE AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.44	100.14	3	$ 4,006	$ 4,006	Coat Manhole
246	8	B	B	Manhole	SSMHT0001937	3005 PIN OAK ST.	Vented	2	No	Light	Yard	Unpaved	At Grade		Std 48 Round	Brick	4.68	65.37		$ -	$ -	Monitor in CMOM
247	8	B	B	Manhole	SSMHT0001938	3015 CHANDLER ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		30 Inch Diameter	Brick	5.24	72.42		$ -	$ -	Monitor in CMOM
248	8	C	C	Manhole	SSMHT0001939	200 BLK. GOLF AVE.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.39	137.31		$ -	$ -	Monitor in CMOM
249	8	C	C	Manhole	SSMHT0001940	3200 BLK. W. PINE ST.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.10	158.86		$ -	$ -	Monitor in CMOM
250	8	D	C	Manhole	SSMHT0001941	3215 PINE ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.98	81.75	3	$ 3,270	$ 3,270	Coat Manhole
251	8	D	C	Manhole	SSMHT0001942	307 S. VAUGHN AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.24	97.62		$ 225	$ 225	Install Inflow Dish
252	8	D	C	Manhole	SSMHT0001943	3008 W. ERWIN ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.70	78.22		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
253	8	D	C	Manhole	SSMHT0001944	3000 BLK. W. ERWIN ST.					Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
254	8	D	C	Manhole	SSMHT0001945	3100 BLK. W. ERWIN ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	Below Grade	1	Std 48 Round	Brick	4.60	64.36		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
255	8	C	C	Manhole	SSMHT0001946	214 WILLOWBROOK AVE.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.81	155.21		$ -	$ -	Monitor in CMOM
256	8	D	C	Manhole	SSMHT0001947	207 WILLOWBROOK AVE.	Vented	2	No	Light	Trees/Woods	Unpaved	At Grade		Std 48 Round	Brick	5.57	76.58	3	$ 3,288	$ 3,288	Coat Manhole/Dish
257	8	D	C	Manhole	SSMHT0001948	118 TOURNAMENT RD.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.40	99.64	3	$ 3,986	$ 3,986	Coat Manhole
258	8	B	B	Manhole	SSMHT0001964	3220 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.03	107.58		$ -	$ -	Monitor in CMOM
259	8	B	B	Manhole	SSMHT0001965	3116 TULSA ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.40	99.64		$ -	$ -	Monitor in CMOM
260	8	C	C	Manhole	SSMHT0001966	1527 LOOP 323	Vented	2	No	Light	Road Shoulder	Unpaved	Above Grade	10	Std 48 Round	Concrete	10.38	137.19		$ -	$ -	Monitor in CMOM
261	8	C	C	Manhole	SSMHT0001967	3000 BLK GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.64	90.06		$ -	$ -	Monitor in CMOM
262	8	D	C	Manhole	SSMHT0001968	3312 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Concrete	7.28	98.13		$ 2,000	$ 2,000	Repair Chimney
263	8	C	C	Manhole	SSMHT0001969	3000 BLK GARDEN VALLEY RD	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	6	Std 48 Round	Concrete	7.85	105.31		$ -	$ -	Monitor in CMOM
264	8	D	C	Manhole	SSMHT0001970	1631 LOOP 323	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	22	Std 48 Round	Concrete	10.61	140.09		$ 2,150	$ 2,150	Realign and Seal Manhole Ring/Repair Chimney and Coat
265	8	D	C	Manhole	SSMHT0001971	214 MELINDA LN	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.89	105.81	3	$ 4,233	$ 4,233	Coat Manhole
266	8	B	B	Manhole	SSMHT0001972	216 TOURNAMENT RD.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.70	116.02		$ -	$ -	Monitor in CMOM
267	8	X	X	Manhole	SSMHT0001976	3205 W ERWIN ST					Yard	Unpaved								$ -	$ -	Pending CCTV Inspection
268	8	Group 1	Group 1	Manhole	SSMHT0001977	3205 W ERWIN ST	Vented	2	No	Light	Creek	Unpaved	Above Grade	19	Std 48 Round	Brick	6.79	91.95		Group 1	Group 1	Included in Group 1 Remedial Measures
269	8	Group 1	Group 1	Manhole	SSMHT0001978	2926 GARDEN VALLEY RD	Solid		No	None	Trees/Woods	Unpaved	Above Grade	11	Std 48 Round	Brick	10.50	138.70		Group 1	Group 1	Included in Group 1 Remedial Measures
270	8	Group 1	Group 1	Manhole	SSMHT0001979	3205 W ERWIN ST	Solid		No	Light	Yard	Unpaved	Above Grade	5	Std 48 Round	Brick	9.92	131.39		Group 1	Group 1	Included in Group 1 Remedial Measures
271	8	Group 1	Group 1	Manhole	SSMHT0001981	3205 W ERWIN ST	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	9	Std 48 Round	Brick	11.78	154.83		Group 1	Group 1	Included in Group 1 Remedial Measures
272	8	X	X	Manhole	SSMHT0001982	2926 GARDEN VALLEY RD					Trees/Woods	Unpaved								$ -	$ -	Pending CCTV Inspection
273	8	Group 1	Group 1	Manhole	SSMHT0001983	3205 W ERWIN ST	Vented	2	No	None	Field	Unpaved	Above Grade	31	Std 48 Round	Brick	17.28	224.13		Group 1	Group 1	Included in Group 1 Remedial Measures
274	8	D	C	Manhole	SSMHT0002004	2500 BLK BELVEDDERE BLVD	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.75	91.45	3	$ 3,883	$ 3,883	Coat Manhole/Dish
275	8	C	C	Manhole	SSMHT0002005	1423 HAWTHORNE AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.85	67.51		$ -	$ -	Monitor in CMOM
276	8	C	C	Manhole	SSMHT0002006	1422 HAWTHORNE AVE	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	8	Std 48 Round	Brick	8.62	115.01		$ -	$ -	Monitor in CMOM
277	8	C	C	Manhole	SSMHT0002007	2643 ROSEMONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	12.12	159.11		$ -	$ -	Monitor in CMOM
278	8	B	B	Manhole	SSMHT0002008	1422 HAWTHORNE AVE	Solid		No	Moderate	Trees/Woods	Unpaved	Above Grade	69	Std 48 Round	Concrete	9.56	126.86		$ -	$ -	Monitor in CMOM
279	8	B	B	Manhole	SSMHT0002009	2430 BELVEDERE BLVD	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	6.06	82.76		$ -	$ -	Monitor in CMOM
280	8	D	C	Manhole	SSMHT0002010	2322 W. ROSEMONT ST.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.80	66.88		$ 2,425	$ 2,425	Repair Chimney and Coat/Reconstruct Bench/Dish
281	8	C	C	Manhole	SSMHT0002011	2519 ROSEMONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.46	62.60		$ -	$ -	Monitor in CMOM
282	8	C	C	Manhole	SSMHT0002012	2513 ROSEMONT ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.00	107.20		$ -	$ -	Monitor in CMOM
283	8	B	B	Manhole	SSMHT0002013	1700 BLK WISTERIA DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.70	90.82		$ -	$ -	Monitor in CMOM
284	8	C	C	Manhole	SSMHT0002014	1700 BLK WISTERIA DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.40	87.04		$ -	$ -	Monitor in CMOM
285	8	B	B	Manhole	SSMHT0002015	1321 KENILWORTH AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.69	90.69		$ -	$ -	Monitor in CMOM
286	8	C	C	Manhole	SSMHT0002016	2507 SHERWOOD ST	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.46	62.60		$ -	$ -	Monitor in CMOM
287	8	Group 1	Group 1	Manhole	SSMHT0002018	3205 W ERWIN ST	Vented	2	No	Moderate	Creek	Unpaved	Above Grade	11	Std 48 Round	Brick	6.98	94.35		Group 1	Group 1	Included in Group 1 Remedial Measures
288	8	Group 1	Group 1	Manhole	SSMHT0002019	3205 W ERWIN ST	Solid		No	Light	Yard	Unpaved	At Grade		Std 48 Round	Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
289	8	D	C	Manhole	SSMHT0002020	2400 BELVEDERE BLVD	Vented	2	No	Moderate	Road Shoulder	Unpaved	Below Grade	1	Std 48 Round	Concrete	6.70	90.82		$ 1,575	$ 1,575	Realign and Seal Manhole Ring/Dish/Reconstruct Bench
290	8	D	C	Manhole	SSMHT0002021	1411 N HAWTHORNE AVE	Vented	2	No	Light	Alley	Unpaved	Above Grade	1	Std 48 Round	Brick	4.44	62.34		$ 225	$ 225	Install Inflow Dish
291	8	D	C	Manhole	SSMHT0002022	200 S. VAUGHN AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	13.70	179.02	3	$ 7,161	$ 7,161	Coat Manhole
292	8	Group 1	Group 1	Manhole	SSMHT0002023	3205 W ERWIN ST	Vented	2	No	None	Field	Unpaved	Above Grade	6	Std 48 Round	Brick	11.15	146.89		Group 1	Group 1	Included in Group 1 Remedial Measures

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
293	8	Group 1	Group 1	Manhole	SSMHT0002024	3205 W ERWIN ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	7	Std 48 Round	Brick	13.17	172.34		Group 1	Group 1	Included in Group 1 Remedial Measures
294	8	Group 1	Group 1	Manhole	SSMHT0002025	2371 STATE HWY 64	Vented	2		None	Drainage Ditch	Paved - Concrete	Above Grade	110		Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
295	8	C	C	Manhole	SSMHT0002026	300 S BOON AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.82	67.13		$ -	$ -	Monitor in CMOM
296	8	C	C	Manhole	SSMHT0002027	1723 W ELM ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.64	64.86		$ -	$ -	Monitor in CMOM
297	8	B	B	Manhole	SSMHT0002028	314 S PEACH AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.88	67.89		$ -	$ -	Monitor in CMOM
298	8	B	B	Manhole	SSMHT0002029	310 S BRUCK AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.92	68.39		$ -	$ -	Monitor in CMOM
299	8	B	B	Manhole	SSMHT0002030	210 S BRUCK AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.30	47.98		$ -	$ -	Monitor in CMOM
300	8	B	B	Manhole	SSMHT0002031	402 HILLCREST AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.96	68.90		$ -	$ -	Monitor in CMOM
301	8	B	B	Manhole	SSMHT0002032	2100 BLK. W. FRONT ST.	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	4.75	66.25		$ -	$ -	Monitor in CMOM
302	8	B	B	Manhole	SSMHT0002033	3005 PIN OAK ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	2.62	39.41		$ -	$ -	Monitor in CMOM
303	8	D	C	Manhole	SSMHT0002034	609 FAIR PARK DR	Solid		No	None	Yard	Unpaved	Above Grade	7	Std 48 Round	Concrete	8.65	115.39		$ 650	$ 650	Realign and Seal Manhole Ring
304	8	D	C	Manhole	SSMHT0002035	609 FAIR PARK DR	Solid		No	None	Field	Unpaved	Above Grade	5	Std 48 Round	Sealed Concrete	9.89	131.01		$ 650	$ 650	Realign and Seal Manhole Ring
305	8	B	B	Manhole	SSMHT0002036	609 FAIR PARK DR	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	9.63	127.74		$ -	$ -	Monitor in CMOM
306	8	B	B	Manhole	SSMHT0002037	1900 BELLWOOD RD.	Solid		No	Light	Street	Paved - Asphalt	Above Grade	1	Std 48 Round	Brick	6.36	86.54		$ -	$ -	Monitor in CMOM
307	8	B	B	Manhole	SSMHT0002038	1309 S. PEACH ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	5.91	80.87		$ -	$ -	Monitor in CMOM
308	8	D	C	Manhole	SSMHT0002040	114 N GASTON AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.22	72.17	3	$ 3,837	$ 3,837	Realign and Seal Manhole Ring/Coat Manhole
309	8	D	C	Manhole	SSMHT0002041	205 S FENTON AVE	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.55	63.73		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
310	8	B	B	Manhole	SSMHT0002100	800 BLK. S. LYONS ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.62	64.61		$ -	$ -	Monitor in CMOM
311	8	D	C	Manhole	SSMHT0002147	1027 S. LYONS AVE.	Vented	2	No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	5.11	70.79	3	$ 3,056	$ 3,056	Coat Manhole/Dish
312	8	D	C	Manhole	SSMHT0002535	NONE AUBURNDALE BLVD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.34	61.08	3	$ 2,443	$ 2,443	Coat Manhole
313	8	C	C	Manhole	SSMHT0002536	1710 GENTRY PKWY	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick		6.40		$ -	$ -	Monitor in CMOM
314	8	C	C	Manhole	SSMHT0002537	1700 BLK FOREST AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.77	53.90		$ -	$ -	Monitor in CMOM
315	8	D	C	Manhole	SSMHT0002538	1025 N GLENWOOD BLVD	Vented	2	No	Moderate	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	4.37	61.46		$ 1,125	$ 1,125	Pipe Seal and Dish
316	8	D	C	Manhole	SSMHT0002539	1808 W. GENTRY PKWY.	Vented	2	Yes	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	12.87	168.56	3	$ 6,742	$ 6,742	Coat Manhole
317	8	C	C	Manhole	SSMHT0002540	1803 W. GENTRY PKWY.	Solid		No	None	Yard	Unpaved	At Grade		Std 48 Round	Concrete	9.19	122.19		$ -	$ -	Monitor in CMOM
318	8	C	C	Manhole	SSMHT0002541	1300 BLK. N. GLENWOOD BLVD.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	9.32	123.83		$ -	$ -	Monitor in CMOM
319	8	C	C	Manhole	SSMHT0002542	1803 W. GENTRY PKWY.	Vented	2	Yes	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	12.68	166.17		$ -	$ -	Monitor in CMOM
320	8	C	C	Manhole	SSMHT0002543	1905 W. GENTRY PKWY.	Vented	2	Yes	None	Road Shoulder	Paved - Concrete	At Grade		Std 48 Round	Brick	5.32	73.43		$ -	$ -	Monitor in CMOM
321	8	C	C	Manhole	SSMHT0002544	1900 BLK. W. GENTRY PKWY.	Solid		No	None	Road Shoulder	Unpaved	Above Grade	4	Std 48 Round	Brick	8.30	110.98		$ -	$ -	Monitor in CMOM
322	8	D	C	Manhole	SSMHT0002545	2045 WOODLAWN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.22	59.57	3	$ 3,083	$ 3,083	Coat Manhole/Reconstruct Bench
323	8	D	C	Manhole	SSMHT0002546	NO # W OAKWOOD ST	Vented	2	No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	4.96	68.90		$ 1,500	$ 1,500	Repair Chimney and Coat
324	8	D	C	Manhole	SSMHT0002547	1908 W OAKWOOD ST	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	2.58	38.91		$ 225	$ 225	Install Inflow Dish
325	8	B	B	Manhole	SSMHT0002548	605 MAXWELL DR	Solid		No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	9.21	122.45		$ -	$ -	Monitor in CMOM
326	8	B	B	Manhole	SSMHT0002549	500 N BARREN AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.58	76.71		$ -	$ -	Monitor in CMOM
327	8	D	C	Manhole	SSMHT0002550	517 BARREN AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.01	94.73		$ 1,500	$ 1,500	Repair Chimney and Coat
328	8	D	C	Manhole	SSMHT0002551	701 N BARRON AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.80	117.28	3	$ 4,691	$ 4,691	Coat Manhole
329	8	D	C	Manhole	SSMHT0002552	610 N DAYTON ST	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	16	25 Inch Diamter	Brick	6.90	93.34	3	$ 4,384	$ 4,384	Realign and Seal Manhole Ring/Coat Manhole
330	8	C	C	Manhole	SSMHT0002553	610 N DAYTON ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	18	30 Inch Diameter	Brick	2.94	43.44		$ -	$ -	Monitor in CMOM
331	8	C	C	Manhole	SSMHT0002554	515 BANDERA DR	Vented	1	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.72	91.07		$ -	$ -	Monitor in CMOM
332	8	D	C	Manhole	SSMHT0002555	515 N DAYTON ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.25	135.55	3	$ 5,422	$ 5,422	Coat Manhole
333	8	D	C	Manhole	SSMHT0002556	1700 W CLAUDE ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	22	Std 48 Round	Brick	5.01	69.53	3	$ 3,431	$ 3,431	Realign and Seal Manhole Ring/Coat Manhole
334	8	C	C	Manhole	SSMHT0002557	709 110	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.26	85.28		$ -	$ -	Monitor in CMOM
335	8	C	C	Manhole	SSMHT0002558	1575 W OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.90	93.34		$ -	$ -	Monitor in CMOM
336	8	D	C	Manhole	SSMHT0002559	500 BLCK STATE HWY 110	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.30	85.78		$ 1,500	$ 1,500	Repair Chimney and Coat
337	8	C	C	Manhole	SSMHT0002560	504 STATE HWY 110	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.96	106.70		$ -	$ -	Monitor in CMOM
338	8	C	C	Manhole	SSMHT0002561	1412 W LOLLAR ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.99	81.87		$ -	$ -	Monitor in CMOM
339	8	D	C	Manhole	SSMHT0002562	427 W OAKWOOD ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.71	53.15	3	$ 2,126	$ 2,126	Coat Manhole
340	8	D	C	Manhole	SSMHT0002563	817 W OAKWOOD ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	6.16	84.02		$ 225	$ 225	Install Inflow Dish
341	8	C	C	Manhole	SSMHT0002564	426 N MOORE AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.27	47.60		$ -	$ -	Monitor in CMOM
342	8	D	C	Manhole	SSMHT0002565	1010 CHARLES ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.68	52.77		$ 225	$ 225	Install Inflow Dish
343	8	D	C	Manhole	SSMHT0002566	1007W LOLLAR ST	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.80	66.88		$ 225	$ 225	Install Inflow Dish
344	8	B	B	Manhole	SSMHT0002567	1010 W LOLLAR ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.38	61.59		$ -	$ -	Monitor in CMOM
345	8	D	C	Manhole	SSMHT0002568	403 N ROSS AVE	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.16	46.22		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
346	8	B	B	Manhole	SSMHT0002569	427 W. OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.44	49.74		$ -	$ -	Monitor in CMOM
347	8	D	C	Manhole	SSMHT0002570	1018 W PAUL ST	Vented	2	No	Light	Street	Paved - Asphalt	Above Grade	1	Std 48 Round	Brick	5.55	76.33	3	$ 3,278	$ 3,278	Coat Manhole/Dish
348	8	B	B	Manhole	SSMHT0002571	1018 W PAUL ST	Solid		No	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	5.95	81.37		$ -	$ -	Monitor in CMOM
349	8	B	B	Manhole	SSMHT0002572	317 N ROSS AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	2.68	40.17		$ -	$ -	Monitor in CMOM
350	8	B	B	Manhole	SSMHT0002573	1221 W PAUL ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.21	72.05		$ -	$ -	Monitor in CMOM

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
351	8	D	C	Manhole	SSMHT0002574	1221 W CLAUDE ST MH confirmed on video. 202' DS of 2573			Buried		Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
352	8	C	C	Manhole	SSMHT0002575	211 N ROSS AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		24 Inch Diamter	Brick	2.78	41.43		$ -	$ -	Monitor in CMOM
353	8	D	C	Manhole	SSMHT0002576	102 W CLAUDE ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.49	88.17	3	$ 3,527	$ 3,527	Coat Manhole
354	8	D	C	Manhole	SSMHT0002578	702 N GASTON AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.80	79.48		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
355	8	C	C	Manhole	SSMHT0002579	1412 W OAKWOOD ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.02	94.85		$ -	$ -	Monitor in CMOM
356	8	C	C	Manhole	SSMHT0002580	504 W OAKWOOD ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.50	138.70		$ -	$ -	Monitor in CMOM
357	8	B	B	Manhole	SSMHT0002583	1606 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	10.26	135.68		$ -	$ -	Monitor in CMOM
358	8	B	B	Manhole	SSMHT0002584	617 N HILL AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.44	100.14		$ -	$ -	Monitor in CMOM
359	8	D	C	Manhole	SSMHT0002585	613 N GLENWOOD BLVD	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Brick	6.20	84.52	3	$ 3,381	$ 3,381	Coat Manhole
360	8	D	C	Manhole	SSMHT0002586	102 W CLAUDE ST	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	10	Std 48 Round	Brick	4.34	61.08	3	$ 3,093	$ 3,093	Realign and Seal Manhole Ring/Coat Manhole
361	8	B	B	Manhole	SSMHT0002587	122 N ROSS AVE	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	2.32	35.63		$ -	$ -	Monitor in CMOM
362	8	Group 1	Group 1	Manhole	SSMHT0002588	1117 W. ERWIN ST.	Vented	4	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.53	101.28		Group 1	Group 1	Included in Group 1 Remedial Measures
363	8	Group 1	Group 1	Manhole	SSMHT0002589	1117 W. ERWIN ST.	Vented	2			Street	Paved - Asphalt								Group 1	Group 1	Included in Group 1 Remedial Measures
364	8	Group 1	Group 1	Manhole	SSMHT0002590	1302 W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.34	73.68		Group 1	Group 1	Included in Group 1 Remedial Measures
365	8	Group 1	Group 1	Manhole	SSMHT0002591	1302 W. ERWIN ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.40	74.44		Group 1	Group 1	Included in Group 1 Remedial Measures
366	8	D	C	Manhole	SSMHT0002592	1105 W ERWIN ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.61	64.49	3	$ 2,804	$ 2,804	Coat Manhole/Dish
367	8	D	C	Manhole	SSMHT0002593	909 W ERWIN ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.78	66.63		$ 225	$ 225	Install Inflow Dish
368	8	D	C	Manhole	SSMHT0002594	800 BLK. W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.96	131.90	3	$ 5,276	$ 5,276	Coat Manhole
369	8	B	B	Manhole	SSMHT0002595	K824 W ERWIN ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.60	64.36		$ -	$ -	Monitor in CMOM
370	8	B	B	Manhole	SSMHT0002596	111 N PALACE AVE	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 30 Round	Brick	2.98	43.95		$ -	$ -	Monitor in CMOM
371	8	C	C	Manhole	SSMHT0002597	200 N CONFEDARATE ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.06	57.56		$ -	$ -	Monitor in CMOM
372	8	C	C	Manhole	SSMHT0002598	211 N HILL AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.22	59.57		$ -	$ -	Monitor in CMOM
373	8	D	C	Manhole	SSMHT0002599	308 N HILL AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.41	49.37	3	$ 1,975	$ 1,975	Coat Manhole
374	8	C	C	Manhole	SSMHT0002600	1420 W PAUL ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.80	79.48		$ -	$ -	Monitor in CMOM
375	8	D	C	Manhole	SSMHT0002601	1405 W CLAUD ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.78	104.43	3	$ 4,177	$ 4,177	Coat Manhole
376	8	C	C	Manhole	SSMHT0002602	1139 N HILL ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.23	72.30		$ -	$ -	Monitor in CMOM
377	8	D	C	Manhole	SSMHT0002603	126 N GASTON AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.81	92.21	3	$ 4,638	$ 4,638	Realign and Seal Manhole Ring/Coat Manhole
378	8	B	B	Manhole	SSMHT0002604	115 N HILL AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.44	100.14		$ -	$ -	Monitor in CMOM
379	8	Group 1	Group 1	Manhole	SSMHT0002605	1522 W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.41	74.57		Group 1	Group 1	Included in Group 1 Remedial Measures
380	8	Group 1	Group 1	Manhole	SSMHT0002606	1522 W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.76	78.98		Group 1	Group 1	Included in Group 1 Remedial Measures
381	8	Group 1	Group 1	Manhole	SSMHT0002607	1700 BLK. W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.44	100.14		Group 1	Group 1	Included in Group 1 Remedial Measures
382	8	Group 1	Group 1	Manhole	SSMHT0002608	1700 BLK. W. ERWIN ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.88	105.69		Group 1	Group 1	Included in Group 1 Remedial Measures
383	8	Group 1	Group 1	Manhole	SSMHT0002609	1500 BLK. W. ERWIN ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.44	74.94		Group 1	Group 1	Included in Group 1 Remedial Measures
384	8	Group 1	Group 1	Manhole	SSMHT0002610	1326 W. ERWIN ST.	Vented	2			Street	Paved - Asphalt	At Grade							Group 1	Group 1	Included in Group 1 Remedial Measures
385	8	Group 1	Group 1	Manhole	SSMHT0002611	1326 W. ERWIN ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.63	77.34		Group 1	Group 1	Included in Group 1 Remedial Measures
386	8	C	C	Manhole	SSMHT0002612	423 S. FENTON AVE.	Solid		No	Light	Yard	Unpaved	At Grade		Std 48 Round	Concrete	7.90	105.94		$ -	$ -	Monitor in CMOM
387	8	C	C	Manhole	SSMHT0002613	438 S. PEACH AVE.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.31	111.11		$ -	$ -	Monitor in CMOM
388	8	B	B	Manhole	SSMHT0002614	400 BLK. S. PEACH AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	4.68	65.37		$ -	$ -	Monitor in CMOM
389	8	B	B	Manhole	SSMHT0002615	400 BLK. S. PEACH AVE.	Solid		No	Light	Yard	Unpaved	Above Grade	2	Std 48 Round	Concrete	6.38	86.79		$ -	$ -	Monitor in CMOM
390	8	D	C	Manhole	SSMHT0002616	1606 E HOUSTON ST	Solid		No	None	Creek	Unpaved	Above Grade	68	Std 48 Round	Brick	6.99	94.47	3	$ 3,779	$ 3,779	Coat Manhole
391	8	C	C	Manhole	SSMHT0002617	1511 BELLWOOD RD.	Vented	2	No	Light	Road Shoulder	Unpaved	Above Grade	6	Std 48 Round	Brick	11.00	145.00		$ -	$ -	Monitor in CMOM
392	8	D	C	Manhole	SSMHT0002618	427 S. GLENWOOD BLVD.	Solid		No	Moderate	Gutter	Paved - Concrete	At Grade		Std 48 Round	Brick	7.20	97.12		$ 2,625	$ 2,625	Realign and Seal Manhole Ring/Pipe Seal/Dish
393	8	C	C	Manhole	SSMHT0002619	500 BLK. S. LYONS AVE.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	12.60	165.16		$ -	$ -	Monitor in CMOM
394	8	D	C	Manhole	SSMHT0002620	1605 W FRONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.15	109.09		$ 2,200	$ 2,200	Repair Chimney and Coat/Reconstruct Bench
395	8	C	C	Manhole	SSMHT0002621	1475 W FRONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 30 Round	Brick	3.41	49.37		$ -	$ -	Monitor in CMOM
396	8	Group 1	Group 1	Manhole	SSMHT0002622	1300 BLK. W. FRONT ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.14	83.76		Group 1	Group 1	Included in Group 1 Remedial Measures
397	8	Group 1	Group 1	Manhole	SSMHT0002623	344 S. GLENWOOD BLVD.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.16	58.82		Group 1	Group 1	Included in Group 1 Remedial Measures
398	8	Group 1	Group 1	Manhole	SSMHT0002624	300 BLK. S. GLENWOOD BLVD.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
399	8	Group 1	Group 1	Manhole	SSMHT0002625	300 BLK. S. GLENWOOD BLVD.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
400	8	B	B	Manhole	SSMHT0002626	1517 W FRONT ST	Solid		No	Light	Road Shoulder	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.03	57.18		$ -	$ -	Monitor in CMOM
401	8	Group 1	Group 1	Manhole	SSMHT0002627	300 BLK. S. GLENWOOD BLVD.	Solid		No	None	Road Shoulder	Paved - Asphalt	Above Grade	1	Std 48 Round	Brick	5.58	76.71		Group 1	Group 1	Included in Group 1 Remedial Measures
402	8	C	C	Manhole	SSMHT0002628	1310 W ELM ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.98	69.15		$ -	$ -	Monitor in CMOM
403	8	Not Applicable	Not Applicable	T-Connection	SSMHT0002631	1014 FRONT ST					Street	Paved - Asphalt								$ -	$ -	None
404	8	B	B	Manhole	SSMHT0002632	1014 W FRONT ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.92	118.79		$ -	$ -	Monitor in CMOM
405	8	C	C	Manhole	SSMHT0002633	1014 FRONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.28	60.33		$ -	$ -	Monitor in CMOM
406	8	C	C	Manhole	SSMHT0002634	825 W FRONT ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.26	72.68		$ -	$ -	Monitor in CMOM
407	8	C	C	Manhole	SSMHT0002635	1100 W PARK ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.62	77.21		$ -	$ -	Monitor in CMOM
408	8	D	C	Manhole	SSMHT0002637	1108 W HICKORY ST	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	3	Std 48 Round	Brick	4.10	58.06		$ 2,150	$ 2,150	Realign and Seal Manhole Ring/Repair Chimney and Coat

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
409	8	C	C	Manhole	SSMHT0002638	1000 BLK W ELM ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.25	97.75		$ -	$ -	Monitor in CMOM
410	8	D	C	Manhole	SSMHT0002639	1100 W ELM ST	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 26 Round	Brick	3.10	45.46	3	$ 1,818	$ 1,818	Coat Manhole
411	8	Group 1	Group 1	Manhole	SSMHT0002640	500 BLK. S. GLENWOOD BLVD.	Solid		Yes	None	Driveway	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.33	111.36		Group 1	Group 1	Included in Group 1 Remedial Measures
412	8	C	C	Manhole	SSMHT0002641	500 BLK. S. GLENWOOD BLVD.					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
413	8	C	C	Manhole	SSMHT0002642	506 S. CONFEDERATE AVE.	Solid		No	Light	Street	Paved - Asphalt	Above Grade	2	Std 48 Round	Brick	7.90	105.94		$ -	$ -	Monitor in CMOM
414	8	Group 1	Group 1	Manhole	SSMHT0002643	432 S. GLENWOOD BLVD.	Solid		No	Light	Drainage Ditch	Unpaved	Above Grade	8	Std 48 Round	Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
415	8	Group 1	Group 1	Manhole	SSMHT0002644	500 BLK. S. GLENWOOD BLVD.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.34	98.88		Group 1	Group 1	Included in Group 1 Remedial Measures
416	8	Group 1	Group 1	Manhole	SSMHT0002645	409 S. GLENWOOD BLVD.	Solid		No	Light	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	8.63	115.14		Group 1	Group 1	Included in Group 1 Remedial Measures
417	8	B	B	Manhole	SSMHT0002646	1400 BLK. BELLWOOD RD.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.00	69.40		$ -	$ -	Monitor in CMOM
418	8	C	C	Manhole	SSMHT0002647	436 S HILL AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.07	95.48		$ -	$ -	Monitor in CMOM
419	8	D	C	Manhole	SSMHT0002649	511 MCCAIN DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.71	128.75	3	$ 5,375	$ 5,375	Coat Manhole/Dish
420	8	B	B	Manhole	SSMHT0002650	512 MCCAIN DR	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	10.15	134.29		$ -	$ -	Monitor in CMOM
421	8	D	C	Manhole	SSMHT0002651	512 MCCAIN DR	Solid		No	None	Trees/Woods	Unpaved	Above Grade	17	Std 48 Round	Concrete	10.42	137.69		$ 650	$ 650	Realign and Seal Manhole Ring
422	8	B	B	Manhole	SSMHT0002652	1600 BLK. W. HOUSTON ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	12.55	164.53		$ -	$ -	Monitor in CMOM
423	8	D	C	Manhole	SSMHT0002653	412 S FENTON AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.19	109.59	3	$ 4,384	$ 4,384	Coat Manhole
424	8	B	B	Manhole	SSMHT0002654	428 S. FENTON AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.32	86.03		$ -	$ -	Monitor in CMOM
425	8	B	B	Manhole	SSMHT0002655	1110 S. ACADEMY ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.00	82.00		$ -	$ -	Monitor in CMOM
426	8	B	B	Manhole	SSMHT0002656	1927 W. SHAW ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.55	76.33		$ -	$ -	Monitor in CMOM
427	8	B	B	Manhole	SSMHT0002657	2000 BLK. W. SHAW ST.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.47	87.92		$ -	$ -	Monitor in CMOM
428	8	B	B	Manhole	SSMHT0002658	2115 W. SHAW ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.92	68.39		$ -	$ -	Monitor in CMOM
429	8	B	B	Manhole	SSMHT0002659	100 BLK. S. PEACH AVE.	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	8	Std 48 Round	Concrete	3.93	55.92		$ -	$ -	Monitor in CMOM
430	8	C	C	Manhole	SSMHT0002660	1401. S. LYONS AVE.	Solid	Solid	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.72	78.47		$ -	$ -	Monitor in CMOM
431	8	C	C	Manhole	SSMHT0002661	2000 BLK. W. 2ND ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	2.58	38.91		$ -	$ -	Monitor in CMOM
432	8	D	C	Manhole	SSMHT0002662	1900 BLK. W. 2ND ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.39	99.51		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
433	8	B	B	Manhole	SSMHT0002663	1200 BLK. S. PEACH AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.13	71.04		$ -	$ -	Monitor in CMOM
434	8	B	B	Manhole	SSMHT0002664	1309 S. PEACH AVE.	Vented	2	Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.83	79.86		$ -	$ -	Monitor in CMOM
435	8	B	B	Manhole	SSMHT0002665	1900 BLK LAWTON DR	Solid		No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.80	79.48		$ -	$ -	Monitor in CMOM
436	8	C	C	Manhole	SSMHT0002666	2300 BLK. W. GENTRY PKWY.	Vented	2	Yes	Moderate	Street	Paved - Asphalt	At Grade		30 Inch Diameter	Brick	5.16	71.42		$ -	$ -	Monitor in CMOM
437	8	D	C	Manhole	SSMHT0002667	2501 US HWY 69	Solid		No	None	Sidewalk	Paved - Concrete	Above Grade	6	30 Inch Diameter	Brick	4.49	62.97	3	$ 3,169	$ 3,169	Realign and Seal Manhole Ring/Coat Manhole
438	8	B	B	Manhole	SSMHT0002668	2810 CANTON ST	Vented	1	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.75	91.45		$ -	$ -	Monitor in CMOM
439	8	C	C	Manhole	SSMHT0002669	2829 CANTON ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.28	60.33		$ -	$ -	Monitor in CMOM
440	8	B	B	Manhole	SSMHT0002670	1818 ARDMORE AVE	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.19	84.39		$ -	$ -	Monitor in CMOM
441	8	C	C	Manhole	SSMHT0002671	2800 BLK W VAN ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.11	70.79		$ -	$ -	Monitor in CMOM
442	8	B	B	Manhole	SSMHT0002672	2800 BLK TULSA ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.05	82.63		$ -	$ -	Monitor in CMOM
443	8	D	C	Manhole	SSMHT0002673	1600 BLK CHARLOTTE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.77	91.70	3	$ 4,368	$ 4,368	Coat Manhole/Reconstruct Bench
444	8	B	B	Manhole	SSMHT0002674	1539 CHARLOTTE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.42	74.69		$ -	$ -	Monitor in CMOM
445	8	B	B	Manhole	SSMHT0002675	1543 LENORA AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.38	61.59		$ -	$ -	Monitor in CMOM
446	8	D	C	Manhole	SSMHT0002676	303 N. NW LOOP 323	Solid		No	None	Trees/Woods	Unpaved	Above Grade	17	Std 48 Round	Concrete	6.93	93.72		$ 1,500	$ 1,500	Seal Chimney
447	8	B	B	Manhole	SSMHT0002677	303 N. NW LOOP 323	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	5.51	75.83		$ -	$ -	Monitor in CMOM
448	8	B	B	Manhole	SSMHT0002679	1610 WISTERIA DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.70	65.62		$ -	$ -	Monitor in CMOM
449	8	Group 1	Group 1	Manhole	SSMHT0002680	2805 GARDEN VALLEY RD.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.12	121.31		Group 1	Group 1	Included in Group 1 Remedial Measures
450	8	Group 1	Group 1	Manhole	SSMHT0002681	1200 BLK. SHAWNEE BLVD.	Solid		No	Severe	Drainage Ditch	Unpaved	Above Grade	33	Std 48 Round	Concrete	11.30	148.78		Group 1	Group 1	Included in Group 1 Remedial Measures
451	8	B	B	Manhole	SSMHT0002682	227 S INGLEWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.11	58.19		$ -	$ -	Monitor in CMOM
452	8	D	C	Manhole	SSMHT0002683	903 BELLARLE DR	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.23	135.30	3	$ 5,412	$ 5,412	Coat Manhole
453	8	B	B	Manhole	SSMHT0002684	2301 GARDEN VALLEY RD	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.46	87.80		$ -	$ -	Monitor in CMOM
454	8	B	B	Manhole	SSMHT0002685	1106 N. GLENWOOD BLVD.	Solid		Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.80	54.28		$ -	$ -	Monitor in CMOM
455	8	Group 1	Group 1	Manhole	SSMHT0002686	3205 W ERWIN ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	18	Std 48 Round	Concrete	12.33	161.76		Group 1	Group 1	Included in Group 1 Remedial Measures
456	8	Group 1	Group 1	Manhole	SSMHT0002687	238 S. GLENWOOD BLVD.	Vented	2	No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.54	88.80		Group 1	Group 1	Included in Group 1 Remedial Measures
457	8	C	C	Manhole	SSMHT0002704	1408 W ELM ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.85	105.31		$ -	$ -	Monitor in CMOM
458	8	D	C	Manhole	SSMHT0002705	1100BLK W BRIAN CT	Solid		Yes	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.01	69.53	3	$ 2,781	$ 2,781	Coat Manhole
459	8	C	C	Manhole	SSMHT0002992	121 N ROSS AVE	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	22	Std 30 Round	Brick	4.25	59.95		$ -	$ -	Monitor in CMOM
460	8	B	B	Manhole	SSMHT0003147	641 S. CONFEDERATE AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.13	58.44		$ -	$ -	Monitor in CMOM
461	8	C	C	Manhole	SSMHT0003148	1300 BLK. W. CONNALLY ST.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.38	48.99		$ -	$ -	Monitor in CMOM
462	8	D	C	Manhole	SSMHT0003149	1000 BLK. W. CONNALLY ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.47	125.72		$ 1,500	$ 1,500	Repair Chimney and Coat
463	8	D	C	Manhole	SSMHT0003150	1000 BLK. W. RUSK ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.61	77.09		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
464	8	B	B	Manhole	SSMHT0003151	1000 BLK. W. GROVE ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.52	63.35		$ -	$ -	Monitor in CMOM
465	8	C	C	Manhole	SSMHT0003152	609 S. GLENWOOD BLVD.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.19	71.79		$ -	$ -	Monitor in CMOM
466	8	B	B	Manhole	SSMHT0003153	800 BLK. S. ENGLEWOOD AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.68	90.57		$ -	$ -	Monitor in CMOM
467	8	B	B	Manhole	SSMHT0003154	800 BLK. S. CONFEDERATE AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	4.04	57.30		$ -	$ -	Monitor in CMOM

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
468	8	C	C	Manhole	SSMHT0003155	800 BLK. S. ENGLEWOOD AVE.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.96	81.50		$ -	$ -	Monitor in CMOM
469	8	D	C	Manhole	SSMHT0003156	909 S. ENGLEWOOD AVE.	Solid		No	None	Trees/Woods	Unpaved	Above Grade	14	Std 48 Round	Brick	5.71	78.35	3	$ 3,134	$ 3,134	Coat Manhole
470	8	B	B	Manhole	SSMHT0003157	912 S. CONFEDERATE AVE.	Solid		Yes	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	4.88	67.89		$ -	$ -	Monitor in CMOM
471	8	D	C	Manhole	SSMHT0003158	1300 BLK. LINDSEY LN.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.46	75.20	3	$ 3,008	$ 3,008	Coat Manhole
472	8	D	C	Manhole	SSMHT0003159	900 BLK. S. ENGLEWOOD AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.44	150.54	3	$ 6,022	$ 6,022	Coat Manhole
473	8	D	C	Manhole	SSMHT0003160	900 BLK. S. ENGLEWOOD AVE.	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	9	Std 48 Round	Brick	4.56	63.86	3	$ 2,554	$ 2,554	Coat Manhole
474	8	D	C	Manhole	SSMHT0003161	900 BLK. S. ENGLEWOOD AVE. MH confirmed on video. 113 US of 03160 and 274' DS of 12907					Trees/Woods	Unpaved								$ 1,350	$ 1,350	Raise Casting
475	8	C	C	Manhole	SSMHT0003162	1000 BLK. S. ENGLEWOOD AVE.	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	25	Std 48 Round	Concrete	8.88	118.29		$ -	$ -	Monitor in CMOM
476	8	B	B	Manhole	SSMHT0003163	634 S. ROSS AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		24 Inch Diamter	Concrete	4.66	65.12		$ -	$ -	Monitor in CMOM
477	8	B	B	Manhole	SSMHT0003337	1216 S. LYONS AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.15	71.29		$ -	$ -	Monitor in CMOM
478	8	C	C	Manhole	SSMHT0004546	1503 CRESCENT DR.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.39	162.51		$ -	$ -	Monitor in CMOM
479	8	Group 1	Group 1	Manhole	SSMHT0005674	1000 BLK. W. HOUSTON ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.69	115.89		Group 1	Group 1	Included in Group 1 Remedial Measures
480	8	D	C	Manhole	SSMHT0005675	1100 BLK. W. HOUSTON ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.42	74.69		$ 725	$ 725	Replace Manhole Lid add Dish
481	8	B	B	Manhole	SSMHT0005676	1300 BLK. W. HOUSTON ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.42	125.09		$ -	$ -	Monitor in CMOM
482	8	C	C	Manhole	SSMHT0005677	1300 BLK. W. HOUSTON ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.10	83.26		$ -	$ -	Monitor in CMOM
483	8	B	B	Manhole	SSMHT0005678	800 BLK. W. HOUSTON ST.	Vented	2	Yes	None	Street	Brick	At Grade		Std 48 Round	Sealed Brick	11.98	157.35		$ -	$ -	Monitor in CMOM
484	8	B	B	Manhole	SSMHT0005679	607 S. ENGLEWOOD AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.18	84.27		$ -	$ -	Monitor in CMOM
485	8	D	C	Manhole	SSMHT0005680	736 S. ENGLEWOOD AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.68	140.97	3	$ 5,639	$ 5,639	Coat Manhole
486	8	D	C	Manhole	SSMHT0005681	1400 BLK. W. CONNALLY ST.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	9.36	124.34		$ 900	$ 900	Pipe Seal
487	8	B	B	Manhole	SSMHT0005682	626 S. CONFEDERATE AVE.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.78	66.63		$ -	$ -	Monitor in CMOM
488	8	B	B	Manhole	SSMHT0007475	2926 GARDENVALLEY RD	Solid		Yes	None	Yard	Unpaved	Above Grade	13	Std 48 Round	Concrete	10.70	141.22		$ -	$ -	Monitor in CMOM
489	8	B	B	Cleanout	SSMHT0009389	2000 W. ROBBINS ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade			Other	5.47			$ -	$ -	Monitor in CMOM
490	8	D	C	Cleanout	SSMHT0009393	2107 WWODLAWN ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	3.09			$ 75	$ 75	Install Cleanout Cap
491	8	B	B	Cleanout	SSMHT0009394	129N FOREST AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	4.99			$ -	$ -	Monitor in CMOM
492	8	B	B	Manhole	SSMHT0009395	409 BROOKHOLLOW DR.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.71	65.75		$ -	$ -	Monitor in CMOM
493	8	Not Applicable	Not Applicable	End of Line Segment	SSMHT0009396	500 BLK. SUNNYSIDE DR.					Street	Paved - Asphalt								$ -	$ -	None
494	8	B	B	Cleanout	SSMHT0009616	723 N GASTON AVE	Vented	2	No	None	Street	Paved - Asphalt	At Grade			Other	6.58			$ -	$ -	Monitor in CMOM
495	8	D	C	Cleanout	SSMHT0009618	1218 KENILWORTH AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	4.12			$ 75	$ 75	Install Cleanout Cap
496	8	D	C	Cleanout	SSMHT0009619	3108 VAN HWY	Vented	2	No	Moderate	Road Shoulder	Unpaved	At Grade			Other	10.48			$ 75	$ 75	Install Cleanout Cap
497	8	C	C	Cleanout	SSMHT0009621	No # NONE					Field	Unpaved								$ -	$ -	Monitor in CMOM
498	8	D	C	Cleanout	SSMHT0009622	400 BLK. FAIR PARK DR.			Buried		Parking Lot	Paved - Asphalt								$ 575	$ 575	Replace Cleanout Lid/Cap
499	8	B	B	Cleanout	SSMHT0009977	514 S. HERNDON AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	3.00			$ -	$ -	Monitor in CMOM
500	8	D	C	Cleanout	SSMHT0009978	514 S. HERNDON AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	6.78			$ 75	$ 75	Install Cleanout Cap
501	8	D	C	Cleanout	SSMHT0009979	432 S. CONFEDERATE AVE.	Vented	2	No	Severe	Street	Paved - Asphalt	At Grade			Other	3.20			$ 75	$ 75	Install Cleanout Cap
502	8	C	C	Cleanout	SSMHT0009980	500 BLK. S. PEACH AVE.					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
503	8	C	C	Cleanout	SSMHT0009981	400 BLK. ROSE PARK DR.					Road Shoulder	Unpaved								$ -	$ -	Monitor in CMOM
504	8	C	C	Cleanout	SSMHT0009982	609 FAIRPARK DR					Yard	Unpaved	Below Grade							$ -	$ -	Monitor in CMOM
505	8	C	C	Cleanout	SSMHT0009983	609 FAIRPARK DR					Yard	Unpaved								$ -	$ -	Monitor in CMOM
506	8	C	C	Manhole	SSMHT0009984	609 FAIRPARK DR					Yard	Unpaved								$ -	$ -	Monitor in CMOM
507	8	D	C	Manhole	SSMHT0009986	609 FAIR PARK DR	Solid		No	None	Yard	Unpaved	Above Grade	5	Std 48 Round	Concrete	7.26	97.88		$ 650	$ 650	Realign and Seal Manhole Ring
508	8	Not Applicable	Not Applicable	End of Line Segment	SSMHT0009987	No # NONE					Field	Unpaved								$ -	$ -	None
509	8	B	B	Cleanout	SSMHT0010020	807 S. CONFEDERATE AVE.	Vented	2		Moderate	Street	Paved - Asphalt	At Grade				3.76			$ -	$ -	Monitor in CMOM
510	8	B	B	Cleanout	SSMHT0010021	907 W. GROVE ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade				3.14			$ -	$ -	Monitor in CMOM
511	8	D	C	Cleanout	SSMHT0010022	910 W. RUSK ST.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade				2.48			$ 75	$ 75	Install Cleanout Cap
512	8	B	B	Manhole	SSMHT0010084	525 N CONFEDER	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	9.14	121.56		$ -	$ -	Monitor in CMOM
513	8	D	C	Manhole	SSMHT0010085	1316 W OAKWOOD ST	Vented	2			Street	Paved - Asphalt	At Grade							$ 75	$ 75	Install Cleanout Cap
514	8	B	B	Cleanout	SSMHT0010086	1606 GARDEN VALLEY RD					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
515	8	B	B	Cleanout	SSMHT0010246	1220 W PAUL ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade				2.03			$ -	$ -	Monitor in CMOM
516	8	B	B	Cleanout	SSMHT0010247	326 N MOORE AVE	Vented	2	No	Severe	Street	Paved - Asphalt	At Grade				2.61			$ -	$ -	Monitor in CMOM
517	8	B	B	Cleanout	SSMHT0010248	411 N GLENWOOD BLVD				Severe	Street	Paved - Asphalt	Below Grade	1			3.40			$ -	$ -	Monitor in CMOM
518	8	D	C	Cleanout	SSMHT0010249	411 N. GLENWOOD BLVD	Vented	2		Severe	Road Shoulder		Below Grade	21			5.7			$ 75	$ 75	Install Cleanout Cap
519	8	D	C	Cleanout	SSMHT0010250	632 MAXWELL DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade				4.41			$ 75	$ 75	Install Cleanout Cap
520	8	B	B	Cleanout	SSMHT0010251	1610 N. ARDMORE AVE.	Vented	2	No	Light	Road Shoulder	Unpaved	Above Grade	4			1.66			$ -	$ -	Monitor in CMOM
521	8	C	C	Cleanout	SSMHT0010252	3102 CHANDLER ST.			Buried		Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
522	8	B	B	Manhole	SSMHT0010281	1100 BLK. W. DOBBS ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.48	75.45		$ -	$ -	Monitor in CMOM
523	8	D	C	Cleanout	SSMHT0010282	626 S. PALACE AVE.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade				5.38			$ 75	$ 75	Install Cleanout Cap

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
524	8	B	B	Manhole	SSMHT0010342	211 N NW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	3	Std 48 Round	Concrete	9.46	125.60		$ -	$ -	Monitor in CMOM
525	8	B	B	Cleanout	SSMHT0011028	1220 W LOLLAR ST					Street	Paved - Asphalt	Below Grade	5						$ -	$ -	Monitor in CMOM
526	8	B	B	Cleanout	SSMHT0011033	1824 W OAKWOOD ST	Vented		No	Moderate	Yard	Unpaved	Below Grade	2			6.90			$ -	$ -	Monitor in CMOM
527	8	B	B	Manhole	SSMHT0011358	403 S GLENWOOD BLVD	Solid		No	None	Yard	Unpaved	At Grade		Std 24 Round	Concrete	2.30	35.38		$ -	$ -	Monitor in CMOM
528	8	B	B	Manhole	SSMHT0011365	415 S. LYONS AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.51	113.63		$ -	$ -	Monitor in CMOM
529	8	D	C	Manhole	SSMHT0011537	200 BLK. GOLF AVE.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.98	69.15	3	$ 3,266	$ 3,266	Replace Manhole Lid/Coat Manhole
530	8	C	C	Cleanout	SSMHT0011807	401 N DAYTON ST					Street	Paved - Asphalt	Paved - Asphalt	Below Grade						$ -	$ -	Monitor in CMOM
531	8	B	B	Cleanout	SSMHT0011844	219 S. VAUGHN AVE.	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade			Other	6.88			$ -	$ -	Monitor in CMOM
532	8	B	B	Cleanout	SSMHT0012021	611 NEGEM DR	Vented	2	No	Moderate	Sidewalk	Paved - Concrete	At Grade			Other	2.17			$ -	$ -	Monitor in CMOM
533	8	C	C	Cleanout	SSMHT0012574	1000 HICKORY ST					Street	Paved - Asphalt	Paved - Asphalt	Below Grade						$ -	$ -	Monitor in CMOM
534	8	B	B	Cleanout	SSMHT0012580	3001 CHANDLER HWY.	Solid		No	None	Street	Paved - Asphalt	At Grade			Other	5.31			$ -	$ -	Monitor in CMOM
535	8	D	C	Manhole	SSMHT0012581	609 FAIR PARK DR	Solid		No	None	Driveway	Unpaved	Above Grade	22	Std 48 Round	Concrete	7.91	106.07		$ 650	$ 650	Realign and Seal Manhole Ring
536	8	D	C	Manhole	SSMHT0012713	925 S GLENWOOD BLVD (552 ft Upstream of 03158 from CCTV)					Street	Paved - Asphalt	Below Grade	3						$ 1,350	$ 1,350	Raise Casting
537	8	D	C	Manhole	SSMHT0012830	3205 W. ERWIN ST.	Solid		No	Moderate	Yard	Unpaved	Above Grade	7	Std 48 Round	Brick	5.68	77.97	3	$ 3,119	$ 3,119	Coat Manhole
538	8	C	C	Manhole	SSMHT0012873	400 BLK. S. GLENWOOD BLVD.					Road Shoulder	Unpaved								$ -	$ -	Monitor in CMOM
539	8	C	C	Manhole	SSMHT0012874	411 S. GLENWOOD BLVD.	Solid		No	None	Road Shoulder	Unpaved	At Grade		Std 48 Round	Brick	8.77	116.90		$ -	$ -	Monitor in CMOM
540	8	B	B	Manhole	SSMHT0012876	600 BLK. HILLCREST AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.36	48.74		$ -	$ -	Monitor in CMOM
541	8	C	C	Manhole	SSMHT0012877	517 SOUTHGATE AVE.					Yard	Unpaved								$ -	$ -	Monitor in CMOM
542	8	B	B	Manhole	SSMHT0012878	1014 FRONT ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.96	68.90		$ -	$ -	Monitor in CMOM
543	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012879	514 S. HERNDON AVE.					Street	Paved - Asphalt								$ -	$ -	None
544	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012880	500 BLK. S. HERNDON AVE.					Street	Paved - Asphalt								$ -	$ -	None
545	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012882	432 S. CONFEDERATE AVE.					Street	Paved - Asphalt								$ -	$ -	None
546	8	B	B	Manhole	SSMHT0012883	352 FRONT ST	Vented	2	No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.94	81.24		$ -	$ -	Monitor in CMOM
547	8	B	B	Manhole	SSMHT0012884	2423 PARKDALE DR	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.21	109.85		$ -	$ -	Monitor in CMOM
548	8	D	C	Manhole	SSMHT0012887	2323 W FRONT ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	2	Std 48 Round	Brick	7.66	102.92	3	$ 4,117	$ 4,117	Coat Manhole
549	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012888	2800 W. ERWIN ST.					Street	Paved - Asphalt								$ -	$ -	None
550	8	C	C	Manhole	SSMHT0012907	1000 BLK. S. ENGLEWOOD AVE.	Solid		No	None	Trees/Woods	Unpaved	Above Grade	23	Std 48 Round	Concrete	8.23	110.10		$ -	$ -	Monitor in CMOM
551	8	B	B	Manhole	SSMHT0012909	800 BLK. S. ENGLEWOOD AVE.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.14	83.76		$ -	$ -	Monitor in CMOM
552	8	C	C	Manhole	SSMHT0012915	1700 BLK. W. ERWIN ST.					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
553	8	B	B	Manhole	SSMHT0012916	118 S HILL AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.58	76.71		$ -	$ -	Monitor in CMOM
554	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012918	1001 W ELM ST					Street	Paved - Asphalt								$ -	$ -	None
555	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012919	1221 W CLAUDE ST					Street	Paved - Asphalt								$ -	$ -	None
556	8	X	X	Manhole	SSMHT0012920	220 N GLENWOOD BLVD					Street	Paved - Asphalt								$ -	$ -	Pending CCTV Inspection
557	8	C	C	Manhole	SSMHT0012923	521 W OAKWOOD ST					Street	Paved - Asphalt								$ -	$ -	Monitor in CMOM
558	8	B	B	Manhole	SSMHT0012924	1420 N PARKDALE DR	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.59	76.83		$ -	$ -	Monitor in CMOM
559	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012926	1900 BLK LAWTON DR					Street	Paved - Asphalt								$ -	$ -	None
560	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012927	2301 STATE HWY 64					Street	Paved - Asphalt								$ -	$ -	None
561	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012928	1221 W CLAUDE ST					Street	Paved - Asphalt								$ -	$ -	None
562	8	B	B	Manhole	SSMHT0012929	1432 BELVEDERE BLVD	Solid		No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.67	103.04		$ -	$ -	Monitor in CMOM
563	8	Not Applicable	Not Applicable	T-Connection	SSMHT0012930	2520 W OAKWOOD ST					Street	Paved - Asphalt								$ -	$ -	None
564	8	B	B	Manhole	SSMHT0012931	1110 S. ACADEMY ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.94	81.24		$ -	$ -	Monitor in CMOM
565	8	C	C	Manhole	SSMHT0012999	1320 N. NW LOOP 323	Vented	2	No	Light	Road Shoulder	Unpaved	Above Grade	3	Std 48 Round	Concrete	5.28	72.93		$ -	$ -	Monitor in CMOM
566	8	B	B	Manhole	SSMHT0013000	1320 N. NW LOOP 323	Vented	2	No	Severe	Trees/Woods	Unpaved	Below Grade	3	Std 48 Round	Concrete	5.51	75.83		$ -	$ -	Monitor in CMOM
567	8	D	C	Manhole	SSMHT0013003	3000 BLK GARDEN VALLEY RD	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	7	Std 48 Round	Concrete	7.51	101.03	2	$ 3,731	$ 3,731	Coat Manhole/Reconstruct Bench
568	8	Group 1	Group 1	Manhole	SSMHT0013004	1500 BLK N NW LOOP 323	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	46	Std 48 Round	Brick	10.25	135.55		Group 1	Group 1	Included in Group 1 Remedial Measures
569	8	Group 1	Group 1	Manhole	SSMHT0013005	1500 BLK N NW LOOP 323	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	27	Std 48 Round	Sealed Brick	10.42	137.69		Group 1	Group 1	Included in Group 1 Remedial Measures
570	8	D	C	Manhole	SSMHT0013006	3205 W ERWIN ST	Solid		No	Light	Field	Unpaved	Above Grade	11	Std 48 Round	Concrete	4.22	59.57		$ 650	$ 650	Realign and Seal Manhole Ring
571	8	B	B	Manhole	SSMHT0013007	2512 LYNN DR	Vented	2	No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.28	148.53		$ -	$ -	Monitor in CMOM
572	8	X	X	Manhole	SSMHT0013008	3205 W. ERWIN ST.					Yard	Unpaved								$ -	$ -	Pending CCTV Inspection
573	8	D	C	Manhole	SSMHT0013009	3205 W. ERWIN ST.	Solid	Solid	CNO		Yard	Unpaved	Below Grade	2						$ 1,000	$ 1,000	Replace Ring and Cover
574	8	D	C	Manhole	SSMHT0013039	3205 W ERWIN ST	Solid		No	None	Field	Unpaved	Above Grade	7	Std 48 Round	Concrete	6.83	92.46		$ 650	$ 650	Realign and Seal Manhole Ring
575	8	D	C	Manhole	SSMHT0013040	3205 W ERWIN ST	Solid		No	None	Yard	Unpaved	Above Grade	6	Std 48 Round	Concrete	8.96	119.30		$ 650	$ 650	Realign and Seal Manhole Ring
576	8	B	B	Manhole	SSMHT0013041	3205 W ERWIN ST	Solid		No	None	Yard	Unpaved	At Grade		Std 48 Round	Concrete	6.72	91.07		$ -	$ -	Monitor in CMOM
577	8	Group 1	Group 1	Manhole	SSMHT0013042	3400 BLK W ERWIN ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	36	Std 48 Round	Concrete	18.35	237.61		Group 1	Group 1	Included in Group 1 Remedial Measures
578	8	Group 1	Group 1	Manhole	SSMHT0013043	2804 GARDEN VALLEY RD.	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	35	Std 48 Round	Brick	8.04	107.70		Group 1	Group 1	Included in Group 1 Remedial Measures
579	8	C	C	Manhole	SSMHT0013045	900 BLK. N. NW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	1	Std 48 Round	Concrete	8.30	110.98		$ -	$ -	Monitor in CMOM
580	8	D	C	Manhole	SSMHT0013046	900 BLK. N. NW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	9	Std 48 Round	Concrete	9.77	129.50		$ 650	$ 650	Realign and Seal Manhole Ring
581	8	Group 1	Group 1	Manhole	SSMHT0013047	2926 GARDEN VALLEY RD	Vented	2	No	None	Trees/Woods	Unpaved	Above Grade	28	Std 48 Round	Brick	9.56	126.86		Group 1	Group 1	Included in Group 1 Remedial Measures

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Group 1 = Manhole condition rating and/rehabilitation was included in the Group 1 Remedial Measures previously being addressed.

Sanitary Sewer Evaluation Survey
Manhole Preliminary Rehabilitation Basin 8

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Manhole Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
582	8	Group 1	Group 1	Manhole	SSMHT0013048	2926 GARDEN VALLEY RD	Solid		No	None	Trees/Woods	Unpaved	Above Grade	16	Std 48 Round	Brick	8.56	114.26		Group 1	Group 1	Included in Group 1 Remedial Measures
583	8	B	B	Manhole	SSMHT0013062	1515 WICHITA AVE	Solid		No	None	Street	Paved - Asphalt	At Grade	1	Std 48 Round	Brick	4.26	60.08		$ -	$ -	Monitor in CMOM
584	8	Group 1	Group 1	Manhole	SSMHT0013516	2926 GARDEN VALLEY RD	None		No	Severe	Trees/Woods	Unpaved	At Grade		Std 48 Round	Brick	7.64	102.66		Group 1	Group 1	Included in Group 1 Remedial Measures
585	8	Group 1	Group 1	Manhole	SSMHT0013520	2121 W ERWIN ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	16	Std 48 Round	Concrete	6.90	93.34		Group 1	Group 1	Included in Group 1 Remedial Measures
586	8	Group 1	Group 1	Manhole	SSMHT0013527	2804 GARDEN VALLEY RD.	Solid		No	None	Yard	Unpaved	Above Grade	21	Std 48 Round	Concrete				Group 1	Group 1	Included in Group 1 Remedial Measures
587	8	Group 1	Group 1	Manhole	SSMHT0013550	1805 W ERWIN ST	Solid		No	Light	Parking Lot	Paved - Asphalt	At Grade		Std 48 Round	Concrete	12.87	168.56		Group 1	Group 1	Included in Group 1 Remedial Measures
588	8	Group 1	Group 1	Manhole	SSMHT0013551	200 BLK N PARKLAND DR	Vented	2	No	Light	Trees/Woods	Unpaved	Above Grade	14	Std 48 Round	Brick	11.69	153.69		Group 1	Group 1	Included in Group 1 Remedial Measures
589	8	Group 1	Group 1	Manhole	SSMHT0013552	519 PAMELA DR	Vented	2	No	Light	Alley	Unpaved	Above Grade	7	Std 48 Round	Brick				Group 1	Group 1	Included in Group 1 Remedial Measures
590	8	B	B	Manhole	SSMHT0013602	1718 W HOUSTON ST	Solid		No	None	Yard	Unpaved	Above Grade	1	Std 48 Round	Concrete	3.88	55.29		$ -	$ -	Monitor in CMOM
591	8	D	C	Manhole	SSMHT0013619	2914 PIN OAK ST.	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.00	69.40		$ 225	$ 225	Install Inflow Dish
592	8	B	B	Manhole	SSMHT0013620	2802 PIN OAK ST.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	2.90	42.94		$ -	$ -	Monitor in CMOM
593	8	C	C	Manhole	SSMHT0013631	2802 PIN OAK ST.	Solid		No	None	Road Shoulder	Unpaved	Above Grade	5	24 Inch Diamter	Concrete	2.68	40.17		$ -	$ -	Monitor in CMOM
594	8	C	C	Manhole	SSMHT0013633	2139 N. FOREST AVE.	Solid		No	None	Yard	Unpaved	Above Grade	14	Std 48 Round	Concrete	10.24	135.42		$ -	$ -	Monitor in CMOM
595	8	C	C	Manhole	SSMHT0013634	2000 N. FOREST AVE.	Solid		No	None	Yard	Unpaved	Above Grade	1	Std 48 Round	Concrete	9.82	130.13		$ -	$ -	Monitor in CMOM
596	8	C	C	Manhole	SSMHT0013635	2000 N. FOREST AVE.	Solid		No	None	Yard	Unpaved	Above Grade	1	Std 48 Round	Concrete	8.40	112.24		$ -	$ -	Monitor in CMOM
597	8	C	C	Manhole	SSMHT0013636	2000 N. FOREST AVE.	Solid		No	None	Yard	Unpaved	Above Grade	1	Std 48 Round	Concrete	6.29	85.65		$ -	$ -	Monitor in CMOM
598	8	B	B	Manhole	SSMHT0013637	1100 BLK. N. NW LOOP 323	Vented	2	No	Light	Road Shoulder	Unpaved	Above Grade	8	Std 48 Round	Sealed Brick	6.49	88.17		$ -	$ -	Monitor in CMOM
599	8	B	B	Cleanout	SSMHT0013639	211 N NW LOOP 323	Vented	2	No	None	Yard	Unpaved	Above Grade	1			10.03			$ -	$ -	Monitor in CMOM
600	8	D	C	Cleanout	SSMHT0013640	518 HUNTERS CT	Vented	2	No	Moderate	Driveway	Paved - Concrete	At Grade				3.60			$ 75	$ 75	Install Cleanout Cap
601	8	C	C	Manhole	SSMHT0013641	1718 W HOUSTON	Solid		No	None	Yard	Unpaved	Above Grade	5	Std 48 Round	Concrete	6.22	84.77		$ -	$ -	Monitor in CMOM
602	8	B	B	Manhole	SSMHT0013642	110 S SW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	13	Std 48 Round	Concrete	10.41	137.57		$ -	$ -	Monitor in CMOM
603	8	B	B	Manhole	SSMHT0013643	110 S SW LOOP 323	Solid		No	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	6.87	92.96		$ -	$ -	Monitor in CMOM
604	8	C	C	Manhole	SSMHT0013840	1730 N NW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	7	Std 48 Round	Concrete	6.95	93.97		$ -	$ -	Monitor in CMOM
605	8	C	C	Manhole	SSMHT0013841	200 SSW LOOP 323	Solid		No	None	Yard	Unpaved	Above Grade	18	Std 48 Round	Concrete	4.38	61.59		$ -	$ -	Monitor in CMOM
606	8	C	C	Manhole	SSMHT0013842	200 SSW LOOP 323	Solid		No	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	5.79	79.35		$ -	$ -	Monitor in CMOM
607	8	C	C	Manhole	SSMHT0013843	200 SSW LOOP 323	Solid		No	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.82	104.93		$ -	$ -	Monitor in CMOM
608	8	C	C	Manhole	SSMHT0013844	200 SSW LOOP 323	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	5.56	76.46		$ -	$ -	Monitor in CMOM
609	8	D	C	Cleanout	SSMHT0013845	609 FAIR PARK DR	Vented	2	No	Moderate	Driveway	Unpaved	Above Grade	1			5.98			$ 75	$ 75	Install Cleanout Cap
610	8	D	C	Manhole	SSMHT0014244	1511 BELLWOOD RD. SSMHT0005680A	Solid		No	None	Yard	Unpaved	Above Grade	3	Std 48 Round	Brick	14.38	187.59	3	$ 7,504	$ 7,504	Coat Manhole
611	8	C	C	Manhole	SSMHT0014245	1511 BELLWOOD RD. SSMHT0005680B	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	14.12	184.31		$ -	$ -	Monitor in CMOM
612	8	C	C	Manhole	SSMHT0014246	1511 BELLWOOD RD. SSMHT0005680C	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	15.36	199.94		$ -	$ -	Monitor in CMOM
613	8	D	C	Manhole	SSMHT0014247	500 BLK. HWY 110 SSMHT0020030A (82 ft from Downstream 02557)			Buried		Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
614	8	C	C	Manhole	SSMHT0013748	2729 GARDEN VALLEY RD	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.44	112.74		$ -	$ -	Monitor in CMOM
615	8	D	C	Manhole	SSMHT0013743	306 DONNA DR	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.39	86.91		$ 225	$ 225	Install Inflow Dish
616	8	C	C	Manhole	SSMHT0013742	3722 W. ELM ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.28	85.53		$ -	$ -	Monitor in CMOM
617	8	C	C	Manhole	SSMHT0013733	842 S CONFEDERATE AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.56	76.46		$ -	$ -	Monitor in CMOM
618	8	B	B	Manhole	SSMHT0013731	1412 W OAK WOOD ST	Solid		No	None	Driveway	Paved - Asphalt	Above Grade	1	Std 48 Round	Concrete	7.86	105.44		$ -	$ -	Monitor in CMOM
619	8	B	B	Manhole	SSMHT0013730	833 S LYONS AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.91	68.27		$ -	$ -	Monitor in CMOM
620	8	D	C	Manhole	SSMHT0013729	705 S LYONS AVE	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.49	75.57	3	$ 3,023	$ 3,023	Coat Manhole
621	8	C	C	Manhole	SSMHT0013727	2700 BLK. CHANDLER HWY.	Solid		No	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.72	103.67		$ -	$ -	Monitor in CMOM
622	8	C	C	Manhole	SSMHT0013726	1827 GENTRY	Solid		No	None	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Concrete	6	82.00		$ -	$ -	Monitor in CMOM
623	8	D	C	Manhole	SSMHT0013723	2300 BLK. W. FRONT ST.	Vented	2	No	Moderate	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	8.95	119.17		$ 1,725	$ 1,725	Repair Chimney and Coat/Dish
624	8	D	C	Manhole	SSMHT0013721	500 BLK. HWY 110 (old SSMHT0020030)			Buried		Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
625	8	D	C	Manhole	SSMHT0013751	303 N. NW LOOP 323	Solid		No	Moderate	Trees/Woods	Unpaved	Above Grade	6	Std 48 Round	Concrete	6.67	90.44		$ 650	$ 650	Realign and Seal Manhole Ring
626	8	C	C	Manhole	SSMHT0013752	1511 BELLWOOD RD.	Solid		No	None	Field	Unpaved	Above Grade	17	Std 48 Round	Concrete	15.17	197.54		$ -	$ -	Monitor in CMOM
627	8	B	B	Manhole	SSMHT0013754	2300 BLK. W. FRONT ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	6.87	92.96		$ -	$ -	Monitor in CMOM
628	8	D	C	Manhole	SSMHT0013755	1428 KENILWORTH AVE	Solid		No	Moderate	Yard	Unpaved	Below Grade	1	Std 48 Round	Brick	9.79	129.75	3	$ 5,415	$ 5,415	Coat Manhole/Dish
629	8	D	C	Manhole	SSMHT0013758	3536 W ERWIN ST	Vented	2	No	Light	Yard	Unpaved	At Grade		Std 48 Round	Brick	7.12	96.11		$ 225	$ 225	Install Inflow Dish
630	8	C	C	Manhole	SSMHT0013759	3205 W ERWIN ST	Solid		No	Moderate	Field	Unpaved	Below Grade	2	Std 48 Round	Concrete	6.87	92.96		$ -	$ -	Monitor in CMOM
631	8	D	C	Manhole	SSMHT0013760	3205 W ERWIN ST	Solid		No	Light	Field	Unpaved	Below Grade	4	Std 48 Round	Concrete	6.74	91.32		$ 1,225	$ 1,225	Raise Casting add Dish
632	8	D	C	Manhole	SSMHT0013761	1625 W. FRONT ST. (old SSMHT0020041 CCTV shows 187 ft Upstream of 02620)			Buried		Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Casting
																			Total	$ 464,224	$ 464,224	

11

7

8

Tyler, Texas
Basin 8
Group 2 Remedial Measures

N
W E
S

Cleanout
Manhole
EOLS
TEE
Mainline
Pump Station
Force Main
Rehabilitation Recommended

PIPELINE ANALYSIS

5/30/2019 RP

Sanitary Sewer Evalution Survey
Manhole Preliminary Rehabilitation Basin 15

Preliminary Rehabilitation Recommendation	Quantity	Unit Price	Total
Rehab 1001: Raise Manhole to Grade $1000 ea.	0	$ 1,000	$ -
Rehab 1002: Raise Manhole to Grade - Paved $1350	9	$ 1,350	$ 12,150
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea	0	$ 500	$ -
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea	0	$ -	$ -
Rehab.1010: Install Inflow Protector Insert $225 ea.	24	$ 225	$ 5,400
Rehab 1012: Install Missing Mainline Cleanout Cap $75 ea.	1	$ 75	$ 75
Rehab 1015: Seal Chimney $1500 ea.	2	$ 1,500	$ 3,000
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.	2	$ 650	$ 1,300
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.	2	$ 950	$ 1,900
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.	1	$ 1,000	$ 1,000
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea	2	$ 1,220	$ 2,440
Rehab 1024: Replace Manhole Lid $500 ea.	0	$ 500	$ -
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.	0	$ 250	$ -
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.	0	$ 500	$ -
Rehab 1040: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 3) Sq.Ft.	570.65	$ 40	$ 22,826
Rehab 1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 2) Sq.Ft.	293.65	$ 30	$ 8,810
Rehab 1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat (Condition 3) Sq.Ft.	992.19	$ 40	$ 39,688
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)	0	$ 500	$ -
Rehab 1047: Seal Manhole Pipe Connection $900 ea.	1	$ 900	$ 900
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.	0	$ 300	$ -
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.	8	$ 700	$ 5,600
Rehab 1205: Repair Chimney and Seal $1500 ea.	11	$ 1,500	$ 16,500
Rehab 1215: Reconstruct Chimney/Cone $1000 ea	0	$ 1,000	$ -
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.	0	$ 3,500	$ -
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf	0	$585/vf	$ -
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.	0	$ 2,500	$ -
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf	0	$450/vf	$ -
Construction Estimate			$ 121,588
Engineering and Contingency (20%)			$ 24,318
Total Estimated Project Cost			$ 145,906

Sanitary Sewer Evalution Survey
Manhole Preliminary Rehabilitation Basin 15

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
1	15	D	C	Manhole	SSMHT0000373	601 N BOIS ARC. AVE.	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Sealed Brick	5.05	70.03		$ 700	$ 700	Reconstruct Bench
2	15	B	B	Manhole	SSMHT0000374	508 W OAKWOOD ST	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.43	49.62		$ -	$ -	Monitor in CMOM
3	15	Group 1	Group 1	Manhole	SSMHT0000375	525 N SPRING AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	8.21	109.85		Group 1	Group 1	Included in Group 1 Remedial Measures
4	15	D	C	Manhole	SSMHT0000376	300 BLK N COLLEGE AVE	Solid		No	Light	Street	Paved - Brick	At Grade		Std 48 Round	Brick	3.58	51.51	3	$ 2,760	$ 2,760	Coat Manhole/Reconstruct Bench
5	15	B	B	Manhole	SSMHT0000377	205 W LOCUST ST	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	2.61	39.29		$ -	$ -	Monitor in CMOM
6	15	D	C	Manhole	SSMHT0000379	210 W FERGUSON ST	Solid		No	Light	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	9.58	127.11	3	$ 5,084	$ 5,084	Coat Manhole
7	15	Not Applicable	Not Applicable	End of Line Segment	SSMHT0000380	200 BLK W FERGUSON ST					Street	Paved - Brick								$ -	$ -	None
8	15	C	C	Manhole	SSMHT0000381	110 N COLLEGE AVE					Parking Lot	Paved - Concrete	Below Grade							$ -	$ -	Monitor in CMOM
9	15	D	C	Manhole	SSMHT0000382	324 W FERGUSON ST	Vented	2	No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	5.08	70.41		$ 2,675	$ 2,675	Realign and Seal Ring/Repair Chimney/Dish
10	15	C	C	Manhole	SSMHT0000383	412 W FERGUSON ST					Parking Lot	Paved - Concrete	Below Grade							$ -	$ -	Monitor in CMOM
11	15	D	C	Manhole	SSMHT0000384	301 W FERGUSON ST	Solid		No	Light	Alley	Paved - Concrete	At Grade		Std 48 Round	Brick	12.86	168.44		$ 1,500	$ 1,500	Repair Chimney
12	15	Group 1	Group 1	Manhole	SSMHT0000385	100 BLK E LOCUST ST	Solid		No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Concrete	10.66	140.72		Group 1	Group 1	Included in Group 1 Remedial Measures
13	15	D	C	Manhole	SSMHT0000386	217E LOCUST ST	Vented	2	No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.95	56.17	3	$ 2,472	$ 2,472	Coat Manhole/Dish
14	15	C	C	Manhole	SSMHT0000387	628 W OAKWOOD ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.28	47.73		$ -	$ -	Monitor in CMOM
15	15	C	C	Manhole	SSMHT0000388	628 OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.06	44.96		$ -	$ -	Monitor in CMOM
16	15	C	C	Manhole	SSMHT0000389	711 FERFUSON ST					Street	Paved - Concrete	Below Grade							$ -	$ -	Monitor in CMOM
17	15	C	C	Manhole	SSMHT0000764	709 W LINE	Solid		No	Light	Yard	Unpaved	At Grade		Std 48 Round	Brick	6.45	87.67		$ -	$ -	Monitor in CMOM
18	15	B	B	Manhole	SSMHT0000765	627 LINE ST	Vented		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.21	59.45		$ -	$ -	Monitor in CMOM
19	15	B	B	Manhole	SSMHT0000767	726 WEST ELM ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	2.82	41.93		$ -	$ -	Monitor in CMOM
20	15	D	C	Manhole	SSMHT0000768	514 W ELM ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.50	75.70		$ 1,500	$ 1,500	Repair Chimney
21	15	Group 1	Group 1	Manhole	SSMHT0000769	525 N SPRING AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	15.22	198.17		Group 1	Group 1	Included in Group 1 Remedial Measures
22	15	Group 1	Group 1	Manhole	SSMHT0000770	527 W. ERWIN ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	10.96	144.50		Group 1	Group 1	Included in Group 1 Remedial Measures
23	15	Group 1	Group 1	Manhole	SSMHT0000887	800 W. ERWIN ST.	Solid		Yes	Light	Street	Brick	At Grade		Std 48 Round	Brick	12.36	162.14		Group 1	Group 1	Included in Group 1 Remedial Measures
24	15	Group 1	Group 1	Manhole	SSMHT0000888	800 BLK. W. ERWIN ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	10.61	140.09		Group 1	Group 1	Included in Group 1 Remedial Measures
25	15	B	B	Manhole	SSMHT0000895	517 N ELLIS AVE	Solid		Yes	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	2.14	33.36		$ -	$ -	Monitor in CMOM
26	15	C	C	Manhole	SSMHT0000896	623 W OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.29	47.85		$ -	$ -	Monitor in CMOM
27	15	B	B	Manhole	SSMHT0001020	206 S PALACE ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.18	71.67		$ -	$ -	Monitor in CMOM
28	15	D	C	Manhole	SSMHT0001021	220 S PALACE AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	5.15	71.29	3	$ 2,852	$ 2,852	Coat Manhole
29	15	D	C	Manhole	SSMHT0001022	220 S PALACE AVE	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	5.57	76.58		$ 2,200	$ 2,200	Repair Chimney/Reconstruct Bench
30	15	D	C	Manhole	SSMHT0001134	800 BLK N SPRING AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.64	64.86	3	$ 2,595	$ 2,595	Coat Manhole
31	15	C	C	Manhole	SSMHT0001249	513 W GOODMAN ST	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	5.60	76.96		$ -	$ -	Monitor in CMOM
32	15	D	C	Manhole	SSMHT0001250	DS of SSMHT0020043					Street	Paved - Concrete	Below Grade							$ 1,350	$ 1,350	Raise Manhole
33	15	D	C	Manhole	SSMHT0001251	700 BLK N SPRING AVE	Vented	2			Street	Paved - Asphalt	At Grade							$ 1,445	$ 1,445	Replace Ring and Cover/Dish
34	15	Group 1	Group 1	Manhole	SSMHT0001252	200 N N. BROADWAY AVE.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	12.95	169.57		Group 1	Group 1	Included in Group 1 Remedial Measures
35	15	Group 1	Group 1	Manhole	SSMHT0001253	400 BLK. N. BROADWAY AVE.	Solid		No	Moderate	Road Shoulder	Unpaved	Above Grade	7	Std 48 Round	Concrete	14.55	189.73		Group 1	Group 1	Included in Group 1 Remedial Measures
36	15	Group 1	Group 1	Manhole	SSMHT0001254	300 BLK. N. BROADWAY AVE.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	12.22	160.37		Group 1	Group 1	Included in Group 1 Remedial Measures
37	15	Group 1	Group 1	Manhole	SSMHT0001255	221 N SPRING ST	Solid		Yes	None	Street	Paved - Brick	At Grade		Std 48 Round	Concrete	8.70	116.02		Group 1	Group 1	Included in Group 1 Remedial Measures
38	15	C	C	Manhole	SSMHT0001257	210 E OAKWOOD ST	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	5.56	76.46		$ -	$ -	Monitor in CMOM
39	15	D	C	Manhole	SSMHT0002534	500 BLK. W. LOCUST ST.	Vented	2	Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	13.28	173.73		$ 225	$ 225	Install Inflow Dish
40	15	C	C	Manhole	SSMHT0002728	215 W BOW ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	4.12	58.31		$ -	$ -	Monitor in CMOM
41	15	D	C	Manhole	SSMHT0002729	712 N BROADWAY	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.08	45.21	3	$ 1,808	$ 1,808	Coat Manhole
42	15	C	C	Manhole	SSMHT0002730	712 N BROADWAY	Solid		No	Moderate	Street	Paved - Asphalt	Below Grade	1	Std 48 Round	Brick	8.77	116.90		$ -	$ -	Monitor in CMOM
43	15	D	C	Manhole	SSMHT0002937	414 N BOIS D ARK AVE	Solid		No	Light	Yard	Unpaved	At Grade		Std 48 Round	Concrete	8.39	112.11		$ 650	$ 650	Realign and Seal Manhole Ring
44	15	B	B	Manhole	SSMHT0002938	414 N BOIS ARK AVE					Yard	Unpaved	Below Grade							$ -	$ -	Monitor in CMOM
45	15	D	C	Manhole	SSMHT0002939	414 N BOIS D ARK AVE	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	10.69	141.09	2	$ 4,233	$ 4,233	Coat Manhole
46	15	C	C	Manhole	SSMHT0002940	321 N BOIS D ARK AVE					Street	Paved - Asphalt	Below Grade							$ -	$ -	Monitor in CMOM
47	15	C	C	Manhole	SSMHT0002941	321 N BOIS D ARK AVE	Solid		No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.33	98.76		$ -	$ -	Monitor in CMOM
48	15	D	C	Manhole	SSMHT0002942	410 BROADWAY AVE					Street	Paved - Asphalt	Below Grade							$ 1,575	$ 1,575	Raise Manhole/Dish
49	15	C	C	Manhole	SSMHT0002943	205 W. LOCUST ST.	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	4.83	67.26		$ -	$ -	Monitor in CMOM
50	15	Group 1	Group 1	Manhole	SSMHT0002944	300 BLK. N. COLLEGE AVE.	Solid		No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.13	159.24		Group 1	Group 1	Included in Group 1 Remedial Measures
51	15	Group 1	Group 1	Manhole	SSMHT0002945	300 BLK. N. COLLEGE AVE.	Vented	2	No	Moderate	Driveway	Paved - Concrete	At Grade		Std 48 Round	Brick	9.24	122.82		Group 1	Group 1	Included in Group 1 Remedial Measures
52	15	D	C	Manhole	SSMHT0002946	200 BLK N COLLEGE AVE	Vented	4	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	12.90	168.94	3	$ 6,983	$ 6,983	Coat Manhole/Dish
53	15	D	C	Manhole	SSMHT0002947	100 BLK N BOIS D ARC AVE	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	9.89	131.01	3	$ 5,241	$ 5,241	Coat Manhole
54	15	C	C	Manhole	SSMHT0002948	211 W FERGUSON ST					Street	Paved - Asphalt	At Grade							$ -	$ -	Monitor in CMOM
55	15	D	C	Manhole	SSMHT0002949	211 W FERGUSON ST	Vented	2	No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	5.10	70.66		$ 225	$ 225	Install Inflow Dish
56	15	C	C	Manhole	SSMHT0002950	211 W FERGUSON ST	Vented	1	No	None	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Sealed Brick	8.40	112.24		$ -	$ -	Monitor in CMOM
57	15	D	C	Manhole	SSMHT0002951	303 N BOIS D ARK AVE					Street	Paved - Asphalt	Below Grade							$ 1,575	$ 1,575	Raise Manhole/Dish
58	15	C	C	Manhole	SSMHT0002952	414 N BOIS D ARK AVE	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Concrete	10.91	143.87		$ -	$ -	Monitor in CMOM

Sanitary Sewer Evalution Survey
Manhole Preliminary Rehabilitation Basin 15

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
59	15	D	C	Manhole	SSMHT0002953	NO # US HWY 69	Solid		Yes	None	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	12.08	158.61	3	$ 6,344	$ 6,344	Coat Manhole
60	15	C	C	Manhole	SSMHT0002954	409 W LOCUS ST					Yard	Unpaved	Below Grade							$ -	$ -	Monitor in CMOM
61	15	Group 1	Group 1	Manhole	SSMHT0002955	407 W. LOCUST ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	11.17	147.14		Group 1	Group 1	Included in Group 1 Remedial Measures
62	15	D	C	Manhole	SSMHT0002956	409 W. LOCUST ST.	Vented	4	No	Light	Street	Brick	At Grade		Std 48 Round	Brick	11.40	150.04		$ 225	$ 225	Install Inflow Dish
63	15	Group 1	Group 1	Manhole	SSMHT0002957	411 W. ERWIN ST.	Solid		Yes	None	Street	Brick	At Grade		Std 48 Round	Brick	12.27	161.00		Group 1	Group 1	Included in Group 1 Remedial Measures
64	15	Group 1	Group 1	Manhole	SSMHT0002958	415 W. ERWIN ST.	Vented	2	Yes	None	Street	Brick	At Grade		Std 48 Round	Brick	12.29	161.25		Group 1	Group 1	Included in Group 1 Remedial Measures
65	15	Group 1	Group 1	Manhole	SSMHT0002959	400 BLK. N. BROADWAY AVE.	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	12.44	163.14		Group 1	Group 1	Included in Group 1 Remedial Measures
66	15	Group 1	Group 1	Manhole	SSMHT0002960	100 BLK. E. LINE ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	12.03	157.98		Group 1	Group 1	Included in Group 1 Remedial Measures
67	15	Group 1	Group 1	Manhole	SSMHT0002962	100 E. LINE ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	7.68	103.17		Group 1	Group 1	Included in Group 1 Remedial Measures
68	15	Group 1	Group 1	Manhole	SSMHT0002963	100 E. LOCUST ST.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	11.98	157.35		Group 1	Group 1	Included in Group 1 Remedial Measures
69	15	Group 1	Group 1	Manhole	SSMHT0002964	100 BLK E LOCUST ST	Solid		No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Concrete	9.68	128.37		Group 1	Group 1	Included in Group 1 Remedial Measures
70	15	Group 1	Group 1	Manhole	SSMHT0002965	221 N SPRING AVE	Solid		No	Moderate	Street	Paved - Brick	At Grade		Std 48 Round	Concrete	8.87	118.16		Group 1	Group 1	Included in Group 1 Remedial Measures
71	15	Group 1	Group 1	Manhole	SSMHT0002966	300 BLK. W. ERWIN ST.	Vented	2	No	Moderate	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	12.56	164.66		Group 1	Group 1	Included in Group 1 Remedial Measures
72	15	Group 1	Group 1	Manhole	SSMHT0002967	100 BLK. N. BONNER AVE.	Vented	4	No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	11.59	152.43		Group 1	Group 1	Included in Group 1 Remedial Measures
73	15	Group 1	Group 1	Manhole	SSMHT0002968	100 BLK. N. BONNER AVE.	Vented	2	Yes	None	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	11.50	151.30		Group 1	Group 1	Included in Group 1 Remedial Measures
74	15	Group 1	Group 1	Manhole	SSMHT0002969	500 BLK. W. LOCUST ST.	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	10.88	143.49		Group 1	Group 1	Included in Group 1 Remedial Measures
75	15	D	C	Manhole	SSMHT0002986	711 FERGUSON ST	Vented	2	Yes	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	2.84	42.18		$ 2,425	$ 2,425	Repair Chimney/Reconstruct Bench
76	15	D	C	Manhole	SSMHT0002987	711 FERGUSON ST	Solid		Yes	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Brick	4.01	56.93	3	$ 2,977	$ 2,977	Coat Manhole/Reconstruct Bench
77	15	C	C	Manhole	SSMHT0002988	711 W FERGUSON ST	Solid		Yes	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Brick	2.48	37.65		$ -	$ -	Monitor in CMOM
78	15	D	C	Manhole	SSMHT0002989	302 W BORDER ST	Solid		Yes	None	Sidewalk	Paved - Concrete	At Grade		Std 30 Round	Brick	3.19	46.59	3	$ 1,864	$ 1,864	Coat Manhole
79	15	C	C	Manhole	SSMHT0002990	302 N BORDER AVE	Solid		Yes	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	5.61	77.09		$ -	$ -	Monitor in CMOM
80	15	C	C	Manhole	SSMHT0002991	1001 W OAKWOOD ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.58	89.31		$ -	$ -	Monitor in CMOM
81	15	B	B	Manhole	SSMHT0002993	726 W ELM ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.45	49.87		$ -	$ -	Monitor in CMOM
82	15	Group 1	Group 1	Manhole	SSMHT0003005	525 W SPRING AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	8.33	111.36		Group 1	Group 1	Included in Group 1 Remedial Measures
83	15	Group 1	Group 1	Manhole	SSMHT0003006	412 N SPRING AVE	Solid		No	Light	Street	Paved - Brick	At Grade		Std 48 Round	Concrete	13.63	178.14		Group 1	Group 1	Included in Group 1 Remedial Measures
84	15	D	C	Manhole	SSMHT0003010	US of SSMHT0002955					Parking Lot	Paved - Asphalt	Below Grade							$ 1,350	$ 1,350	Raise Manhole
85	15	C	C	Manhole	SSMHT0003033	324 W FERGUSON ST					Street	Paved - Brick	Below Grade							$ -	$ -	Monitor in CMOM
86	15	Not Applicable	Not Applicable	T-Connection	SSMHT0003034	324 W FERGUSON ST					Parking Lot	Paved - Asphalt								$ -	$ -	None
87	15	C	C	Manhole	SSMHT0003035	706 N BORDER AVE	Solid		Yes	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	3.07	45.08		$ -	$ -	Monitor in CMOM
88	15	D	C	Manhole	SSMHT0003036	910 N BELLA AVE.	Vented	2	No	None	Street	Paved - Asphalt	At Grade		30 Inch Diameter	Brick	2.26	34.88		$ 225	$ 225	Install Inflow Dish
89	15	C	C	Manhole	SSMHT0003037	615N BORDER AVE	Solid		Yes	None	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	2.44	37.14		$ -	$ -	Monitor in CMOM
90	15	C	C	Manhole	SSMHT0003038	710 W FERGUSON ST	Solid		No	None	Alley	Paved - Concrete	At Grade		Std 48 Round	Brick	6.33	86.16		$ -	$ -	Monitor in CMOM
91	15	Not Applicable	Not Applicable	End of Line Segment	SSMHT0003040	370 ft)					Street	Paved - BRICK								$ -	$ -	None
92	15	C	C	Manhole	SSMHT0003041	212 W FERGUSON ST	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	8.46	113.00		$ -	$ -	Monitor in CMOM
93	15	D	C	Manhole	SSMHT0003042	212 N BONNER AVE	Solid		No	None	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	11.63	152.94	3	$ 6,818	$ 6,818	Coat Manhole/Reconstruct Bench
94	15	Group 1	Group 1	Manhole	SSMHT0003043	200 BLK. N. BONNER AVE.	Vented	2	Yes	None	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	12.70	166.42		Group 1	Group 1	Included in Group 1 Remedial Measures
95	15	D	C	Manhole	SSMHT0003044	126' DS of SSMHT0003045					Yard	Unpaved	Below Grade							$ 1,350	$ 1,350	Raise Manhole
96	15	Group 1	Group 1	Manhole	SSMHT0003045	409 N BROADWAY AVE	Solid		No	Moderate	Yard	Unpaved	Above Grade	5	Std 48 Round	Concrete	15.31	199.31		Group 1	Group 1	Included in Group 1 Remedial Measures
97	15	Group 1	Group 1	Manhole	SSMHT0003046	500 BLK. N. BROADWAY AVE.	Solid		No	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	10.32	136.43		Group 1	Group 1	Included in Group 1 Remedial Measures
98	15	Group 1	Group 1	Manhole	SSMHT0003047	500 BLK. N. BROADWAY AVE.	Solid		No	Light	Road Shoulder	Unpaved	Above Grade	7	Std 48 Round	Concrete	12.00	157.60		Group 1	Group 1	Included in Group 1 Remedial Measures
99	15	D	C	Manhole	SSMHT0003055	720 W ERWIN ST	Solid		No	None	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	10.61	140.09	3	$ 5,603	$ 5,603	Coat Manhole
100	15	D	C	Manhole	SSMHT0003068	416 W BOW ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.91	55.67		$ 1,725	$ 1,725	Repair Chimney/Dish
101	15	C	C	Manhole	SSMHT0003116	731 N BOISE D ARC AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	2.97	43.82		$ -	$ -	Monitor in CMOM
102	15	C	C	Manhole	SSMHT0003122	119 W OAKWOOD ST	Solid		No	None	Parking Lot	Paved - Concrete	At Grade		Std 48 Round	Fiberglass	8.68	115.77		$ -	$ -	Monitor in CMOM
103	15	D	C	Manhole	SSMHT0004520	628 N BOIS D ARK AVE	Solid		No	None	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	5.65	77.59	3	$ 3,104	$ 3,104	Coat Manhole
104	15	D	C	Manhole	SSMHT0004522	Upstream of 20011)					Street	Paved - Asphalt	Below Grade							$ 1,575	$ 1,575	Raise Manhole/Dish
105	15	D	C	Manhole	SSMHT0004523	512 N COLLEGE AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	Below Grade	1	Std 48 Round	Brick	5.19	71.79		$ 225	$ 225	Install Inflow Dish
106	15	D	C	Manhole	SSMHT0004524	201W OAKWOOD ST	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	7.94	106.44		$ 1,500	$ 1,500	Repair Chimney
107	15	D	C	Manhole	SSMHT0004525	625 N BROADWAY AVE	Solid		No	None	Yard	Unpaved	Above Grade	27	Std 48 Round	Concrete	11.60	152.56	2	$ 5,227	$ 5,227	Coat Manhole
108	15	Group 1	Group 1	Manhole	SSMHT0004526	526 N SPRING AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	7.96	106.70		Group 1	Group 1	Included in Group 1 Remedial Measures

Sanitary Sewer Evalution Survey
Manhole Preliminary Rehabilitation Basin 15

Preliminary Repair Methods:

Rehabilitation Methods:
Rehab 1001: Raise Manhole to Grade $1000 ea.
Rehab 1002: Raise Manhole to Grade - Paved $1350
Rehab 1003: Locate and Raise Cleanout to Pavement Grade and Install T-Cone Stopper $500 ea
Rehab 1004: Locate and Raise Cleanout to Grade and Install T-Cone Stopper $300 ea
Rehab.1010: Install Inflow Protector Insert $225 ea.
Rehab 1012: Install Missing Mainline Cleanout Cap or T-cone stopper $75 ea.
Rehab 1015: Seal Chimney $1500 ea.
Rehab 1020: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Unpaved $650 ea.
Rehab 1021: Realign and Seal Manhole Ring & Cover (Rebuild Chimney as required)-Paved $950 ea.
Rehab 1022: Replace Manhole Ring & Cover (Rebuild Chimney as required) - Unpaved $1000 ea.
Rehab 1023: Replace Manhole Ring & Cover (Rebuild Chimney as required) -Paved $1220 ea.
Rehab 1024: Replace Manhole Lid $500 ea.
Rehab 1026: Replace Cleanout Casting and Cover (Unpaved) $250 ea.
Rehab 1028: Replace Cleanout Casting and Cover (Paved) $500 ea.
Rehab 1040/1041: Clean Manhole, Remove any Roots, Repair as Needed and Coat
Condition 1 - $21/sq.ft.
Condition 2 - $30/sq.ft.
Condition 3 - $40/sq.ft.
Rehab 1043: Repair/Plug Manhole Lift Holes $500 ea. Manhole (all holes)
Rehab 1047: Seal Manhole Pipe Connection $900 ea.
Rehab 1055: Remove Steps, Stop I/I and Repair as needed $300 ea.
Rehab 1110: Reconstruct 4 ft. diameter Manhole Bench & Invert $700 ea.
Rehab 1205: Repair Chimney and Seal $1500 ea.
Rehab 1215: Reconstruct Chimney/Cone $1000 ea
Rehab 1502: Replace Manhole (< 6 feet deep) Paved $3500 ea.
Rehab 1503: Replace Manhole (>6 feet deep) Paved $585/vf
Rehab 1504: Replace Manhole (< 6 feet deep) Unpaved $2500 ea.
Rehab 1505: Replace Manhole (>6 feet deep) Unpaved $450/vf

Wall Condition 1
Condition Standard: An Existing structure that is considered structurally sound with no indications of settlement, cracking or other signs of fatigue. Infiltration or exfiltration through pre-cast joints, mortar joints, or around the pipe connections may exist and structure may be experiencing mild corrosion or deterioration.

Wall Condition 2
Condition Standard: An existing structure that is exhibiting early signs of structural fatigue evidenced by minor cracks, loss of mortar or brick, moderate to moderately severe corrosion (less ½ inch in depth), minor cross sectional distortion (less than 10 %); however, it is currently supporting the soil and live load.

Wall Condition 3
Condition Standard: An existing structure that is exhibiting severe structural fatigue and collapse is eminent. Conditions indicating this degree of deterioration may include very severe corrosion (loss of original profile of one inch or greater), cross sectional distortion beyond 10 percent, exposed reinforcing steel, loose or missing bricks, missing mortar, or large sections of the structure that are gone completely.

Condition Assessment Rating

A = Very Good
Minor defects are mostly cosmetic in nature and do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration.

B = Good
Manhole has no significant structural defects. Minor defects do not impact system hydraulics nor contribute to significant infiltration/inflow. No active infiltration. Minor defects may include slightly loose casting, minor corrosion of metal surfaces, minor deterioration of concrete mortar between bricks, minor cracks, etc. .

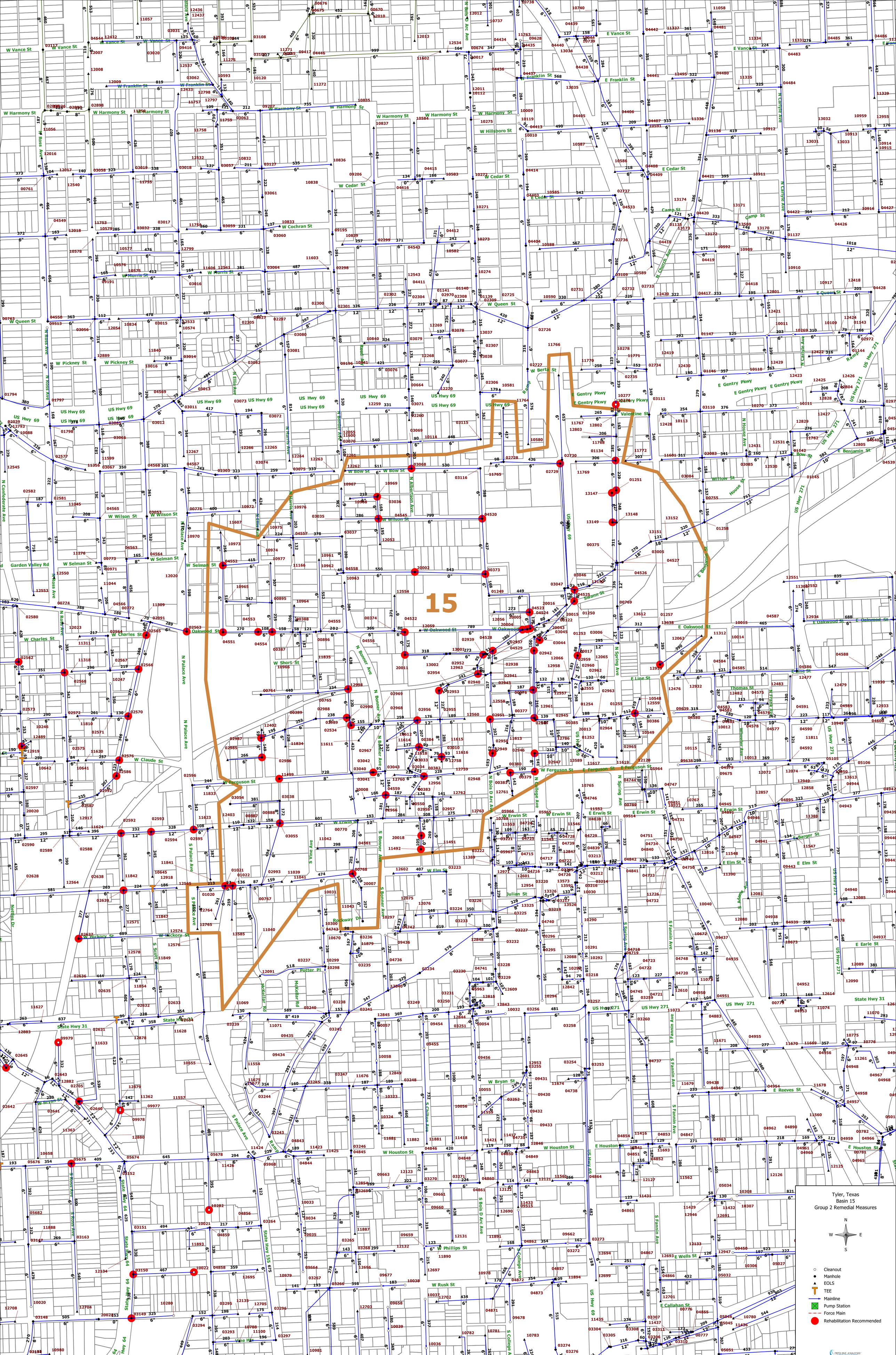
C = Fair
Manhole has no significant structural defects although minor defects were noted during inspection. System hydraulics are good and no significant infiltration/inflow sources noted. Light infiltration/inflow may be present. Nominal defects may include loose casting, nominal corrosion of metal surfaces, deterioration of concrete mortar between bricks or concrete walls, minor evidence of infiltration/inflow at precast joint sections, etc.

D = Poor
Manhole has moderate structural defects that may include cracks, loose bricks, separated casting, moderate root intrusion, broken cover and defects that may impact system hydraulics due to structural issues or contribute to significant infiltration/inflow. Some visible staining due to infiltration/inflow may be present. Active infiltration may have been observed. Moderate to severe defects may include loose casting, moderate to severe corrosion of metal surfaces, deterioration of concrete mortar between bricks, moderate to severe deterioration of precast wall sections and precast joint defects, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan.

E=Very Poor
Manhole may have severe structural defects that may include potential for structural failure, missing bricks, separated/broken casting, severe root intrusion, broken/missing cover and defects that may impact system hydraulics or contribute to significant infiltration/inflow. Visible staining due to infiltration/inflow ma y be present. Active infiltration may have been observed. Severe defects may include separated/broken casting/cover, severe corrosion of metal surfaces, missing mortar between bricks, etc. Manhole inspection was completed and the manhole will be addressed in the remediation plan or immediate repair may be warranted based on condition.

X = Condition to be determined during CCTV Inspection

Item	Basin	Condition Rating	Condition Rating Post Rehab.	Asset Type	Asset ID	Address	Lid Type	Vent Holes	Inflow Dish	Inflow Potential	Surface Cover	Surface Material	Manhole Grade	Grade-Inches	Manhole Diameter	MH Material	Rim to Invert	Manhole Wall Sq. Feet Coating	Wall Condition Rating	Construction Total	Recommended Remedial Measures	Remedial Measures
109	15	Group 1	Group 1	Manhole	SSMHT0004527	525 W SPRING AVE	Solid		No	Light	Yard	Unpaved	Above Grade	6	Std 48 Round	Concrete	10.37	137.06		Group 1	Group 1	Included in Group 1 Remedial Measures
110	15	C	C	Manhole	SSMHT0004528	414 N BOIS D ARC. AVE.	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	5.97	81.62		$ -	$ -	Monitor in CMOM
111	15	C	C	Manhole	SSMHT0004529	414 N BOIS D ARK AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	11.02	145.25		$ -	$ -	Monitor in CMOM
112	15	D	C	Manhole	SSMHT0004545	429 W WILSON ST	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	2.57	38.78	3	$ 1,551	$ 1,551	Coat Manhole
113	15	D	C	Manhole	SSMHT0004551	800BLK W OAKWOOD ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Sealed Brick	3.94	56.04		$ 1,725	$ 1,725	Repair Chimney/Dish
114	15	D	C	Manhole	SSMHT0004552	808 W SELMAN ST	Solid		Yes	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.29	60.45		$ 1,725	$ 1,725	Repair Chimney/Dish
115	15	D	C	Manhole	SSMHT0004553	713 W OAKWOOD ST	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.26	60.08		$ 1,220	$ 1,220	Raise Manhole
116	15	D	C	Manhole	SSMHT0004554	710 W OAKWOOD ST	Vented	2	Yes	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.40	49.24		$ 1,725	$ 1,725	Repair Chimney/Dish
117	15	C	C	Manhole	SSMHT0004555	623 W OAKWOOD	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	3.02	44.45		$ -	$ -	Monitor in CMOM
118	15	C	C	Manhole	SSMHT0004556	521 W OAKWOOD ST	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	4.10	58.06		$ -	$ -	Monitor in CMOM
119	15	C	C	Manhole	SSMHT0004557	621 W WILSON ST	Solid		Yes	None	Street	Paved - Asphalt	At Grade		Std 48 Round	Brick	2.67	40.04		$ -	$ -	Monitor in CMOM
120	15	B	B	Manhole	SSMHT0004558	602 W SELMAN ST	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Concrete	3.74	53.52		$ -	$ -	Monitor in CMOM
121	15	D	C	Manhole	SSMHT0004559	107 N. BONNER AVE.	Vented	2	No	Light	Sidewalk	Paved - Concrete	At Grade		Std 48 Round	Brick	13.07	171.08		$ 225	$ 225	Install Inflow Dish
122	15	C	C	Manhole	SSMHT0004561	115 S BONNER AVE	Solid		No	Moderate	Gutter	Paved - Asphalt	At Grade		Std 48 Round	Brick	6.25	85.15		$ -	$ -	Monitor in CMOM
123	15	D	C	Cleanout	SSMHT0010276	200 BLK VALENTINE ST	Vented	1	No	Moderate	Street	Paved-Brick	At Grade				8.96			$ 75	$ 75	Install Cleanout Cap
124	15	C	C	Cleanout	SSMHT0011043	215 S. BONNER AVE.					Parking Lot	Paved - Concrete								$ -	$ -	Monitor in CMOM
125	15	C	C	Manhole	SSMHT0011491	300 W ERWIN ST	Solid		No	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Brick	4.49	62.97		$ -	$ -	Monitor in CMOM
126	15	D	C	Manhole	SSMHT0011492	410 W ERWIN ST	Vented	2	No	Moderate	Alley	Paved - Concrete	At Grade		Std 48 Round	Brick	4.39	61.71	3	$ 2,694	$ 2,694	Coat Manhole/Dish
127	15	D	C	Manhole	SSMHT0011499	212 W FERGUSON ST	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	8.50	113.50	3	$ 4,540	$ 4,540	Coat Manhole
128	15	Group 1	Group 1	Manhole	SSMHT0012403	804 W. ERWIN ST.	Solid		No	Light	Street	Brick	At Grade		Std 48 Round	Brick	13.94	182.04		Group 1	Group 1	Included in Group 1 Remedial Measures
129	15	Group 1	Group 1	Manhole	SSMHT0012763	311 W. ERWIN ST.	Solid		No	Light	Street	Brick	At Grade		30 Inch Diameter	Brick	3.45	49.87		Group 1	Group 1	Included in Group 1 Remedial Measures
130	15	Group 1	Group 1	Manhole	SSMHT0012786	115 W. FERGUSON ST.	Solid		No	Light	Alley	Paved - Concrete	At Grade		Std 48 Round	Brick	14.46	188.60		Group 1	Group 1	Included in Group 1 Remedial Measures
131	15	Not Applicable	Not Applicable	T-Connection	SSMHT0012802	200 BLK N SPRING ST					Street	Paved-Brick	Below Grade							$ -	$ -	None
132	15	Not Applicable	Not Applicable	T-Connection	SSMHT0012803	815 N SPRING AVE					Street	Paved - Concrete	Below Grade							$ -	$ -	None
133	15	Not Applicable	Not Applicable	T-Connection	SSMHT0012956	412 W FERGUSON ST					Parking Lot	Paved - Concrete	Below Grade							$ -	$ -	None
134	15	X	X	Manhole	SSMHT0012958	309 NORTH BROADWAY					Parking Lot	Paved - Asphalt	Below Grade					6.40		$ -	$ -	Inspection Pending Access
135	15	D	C	Manhole	SSMHT0012959	286' US of MH SSMHT01257					Alley	Unpaved	Below Grade							$ 1,350	$ 1,350	Raise Manhole
136	15	D	C	Manhole	SSMHT0012961	218 N COLLEGE AVE	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	7.98	106.95		$ 225	$ 225	Install Inflow Dish
137	15	D	C	Manhole	SSMHT0012963	321 N BOIS D ARK AVE.	Solid		No	Light	Yard	Unpaved	Above Grade	2	Std 48 Round	Concrete	9.11	121.19		$ 2,200	$ 2,200	Repair Chimney/Reconstruct Bench
138	15	D	C	Manhole	SSMHT0012998	400 N BORDER AVE	Vented	2	No	Light	Road Shoulder	Paved - Asphalt	At Grade		Std 48 Round	Brick	4.71	65.75		$ 225	$ 225	Install Inflow Dish
139	15	B	B	Manhole	SSMHT0013001	422 E OAKWOOD ST	Solid		Yes	None	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	4.48	62.85		$ -	$ -	Monitor in CMOM
140	15	C	C	Manhole	SSMHT0013002	422 E OAKWOOD ST	Solid		No	Light	Driveway	Paved - Concrete	At Grade		Std 48 Round	Concrete	4.46	62.60		$ -	$ -	Monitor in CMOM
141	15	D	C	Manhole	SSMHT0013147	700 BLK N SPRING AVE	Solid				Road Shoulder	Unpaved	At Grade							$ 1,000	$ 1,000	Replace Ring and Cover
142	15	B	B	Manhole	SSMHT0013148	600 BLK N SPRING AVE	Solid		No	Light	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	4.32	60.83		$ -	$ -	Monitor in CMOM
143	15	D	C	Manhole	SSMHT0013149	600 BLK N SPRING ST	Vented	2	No	Moderate	Street	Paved - Asphalt	At Grade		Std 48 Round	Concrete	3.13	45.84		$ 1,175	$ 1,175	Realign and Seal Manhole Ring/Dish
144	15	Group 1	Group 1	Manhole	SSMHT0013150	500 BLK. N. BROADWAY AVE.	Solid		No	Light	Trees/Woods	Unpaved	Above Grade	28	Std 48 Round	Concrete	12.02	157.85		Group 1	Group 1	Included in Group 1 Remedial Measures
145	15	Group 1	Group 1	Manhole	SSMHT0013151	201 E BOW ST	Solid		No	Light	Yard	Unpaved	Above Grade	17	Std 48 Round	Concrete	10.74	141.72		Group 1	Group 1	Included in Group 1 Remedial Measures
146	15	Group 1	Group 1	Manhole	SSMHT0013152	201 E BOW ST	Solid		No	None	Trees/Woods	Unpaved	Above Grade	31	Std 48 Round	Concrete	5.40	74.44		Group 1	Group 1	Included in Group 1 Remedial Measures
147	15	Group 1	Group 1	Manhole	SSMHT0013589	200 N. BROADWAY AVE.	Solid		No	None	Street	Brick	At Grade		Std 48 Round	Brick	13.57	177.38		Group 1	Group 1	Included in Group 1 Remedial Measures
148	15	Group 1	Group 1	Manhole	SSMHT0013612	516 E OAKWOOD ST	Solid		No	Light	Street	Paved - Brick	At Grade		Std 48 Round	Concrete	12.74	166.92		Group 1	Group 1	Included in Group 1 Remedial Measures
149	15	C	C	Manhole	SSMHT0013638	210 E OAKWOOD ST	Solid		No	Light	Street	Paved - Concrete	At Grade		Std 48 Round	Brick	5.33	73.56		$ -	$ -	Monitor in CMOM
150	15	D	C	Manhole	SSMHT0013734	410 W ERWIN ST(old SSMHT0020018)	Vented	2	No	Light	Alley	Paved - Concrete	At Grade		Std 48 Round	Brick	4.27	60.20		$ 225	$ 225	Install Inflow Dish
151	15	D	C	Manhole	SSMHT0013735	149 feet US of 02959 from CCTV					Road Shoulder	Unpaved	Below Grade	18						$ 1,350	$ 1,350	Raise Manhole
152	15	C	C	Manhole	SSMHT0013736	522 N BROADWAY AVE(old SSMHT0020016)	Solid		No	None	Street	Paved - Concrete	At Grade		Std 48 Round	Concrete	13.27	173.60		$ -	$ -	Monitor in CMOM
153	15	C	C	Manhole	SSMHT0013737	522 N BROADWAY(old SSMHT0020015)	Solid		No	Light	Yard	Unpaved	Above Grade	2	Std 48 Round	Concrete	10.63	140.34		$ -	$ -	Monitor in CMOM
154	15	C	C	Manhole	SSMHT0013739	14 feet US 00385 from CCTV					Parking Lot	Paved - Concrete	Below Grade							$ -	$ -	Monitor in CMOM
155	15	D	C	Manhole	SSMHT0013741	422 E OAKPARK ST(old SSMHT0020011)	Vented	2	No	Light	Driveway	Paved - Concrete	Above Grade	5	Std 48 Round	Sealed Brick	3.51	50.63		$ 1,725	$ 1,725	Seal Chimney/Dish
156	15	B	B	Manhole	SSMHT0013745	215 S BONNER ST(old SSMHT0020007)	Solid		No	Light	Parking Lot	Unpaved	At Grade		Std 48 Round	Concrete	5.28	72.93		$ -	$ -	Monitor in CMOM
157	15	D	C	Manhole	SSMHT0013746	is 13 feet US of 04524 from CCTV					Street	Paved - Asphalt								$ 1,350	$ 1,350	Raise Manhole
158	15	D	C	Manhole	SSMHT0013747	207 W OAKWOOD ST(old SSMHT0020004)	Solid		No	Light	Street	PAVED - BRICK	At Grade		Std 48 Round	Concrete	7.66	102.92		$ 1,600	$ 1,600	Reconstruct Bench/Pipe Seal
159	15	D	C	Manhole	SSMHT0013749	409 W. SELMAN ST (old SSMHT0020002)	Solid		No	Light	Street	Paved - BRICK	At Grade		Std 48 Round	Brick	2.31	35.51		$ 1,500	$ 1,500	Seal Chimney
																			Total	$ 121,588	$ 121,588	


15
Tyler, Texas
Basin 15
Group 2 Remedial Measures
N
W
E
S
Cleanout
Manhole
EOLS
TEE
Mainline
Pump Station
Force Main
Rehabilitation Recommended
PIPELINE ANALYSIS
5/30/2019 RP