

The seal of the City of Houston, Texas, is a circular emblem. It features a central five-pointed star above a steam locomotive. Below the locomotive is a plow. The words "CITY OF HOUSTON" are inscribed in an arc at the top, and "TEXAS" is inscribed in an arc at the bottom. The entire seal is rendered in a light gray, semi-transparent style.

WASTEWATER TREATMENT FACILITIES

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The Wastewater Treatment System (System) collects, conveys and processes wastewater from an estimated 2.0 million people, generated in a service area, which includes the City of Houston, several municipalities and unincorporated communities in the Houston metropolitan area. The system consists of approximately 6,200 miles of sanitary sewer lines, over 425,000 services connections, approximately 400 lift stations, 41 (5 major and 36 satellite) wastewater treatment plants, and three major sludge treatment facilities. The average daily wastewater flow through the system is estimated at 277 million gallons per day (MGD). As reflected by state permits, the effective treatment capacity of the system is 564 MGD. The permitted capacity of plants is a part of the wastewater system treatment capacity that ranges from 0.20 MGD for the smallest plant to over 200 MGD for the 69th Street Wastewater plant.

Prior to granting a building permit for construction, the City evaluates the wastewater system's ability to transport and treat the estimated volumes of additional wastewater. Impact fees are collected, at least in part, to recover the cost of facilities previously constructed. These fees can be applied to the construction of new facilities providing additional capacity.

The Wastewater Utility Treatment Facilities Improvements Program provides for the continued upgrading of the wastewater collection and treatment system. Additional funds are provided to comply with the regulations issued by the Texas Commission on Environmental Quality (TCEQ) and the U.S. Environmental Protection Agency (EPA).

The five-year program totals approximate \$954 million and is financed through two funding sources with the largest single source being revenue bonds.

WASTEWATER TREATMENT FACILITIES

Highlights of the FY2012-2016 CIP include:

- Compliance with anticipated TCEQ Citywide Agreed Order.
- Continued rehabilitation of neighborhood sewers to improve service, remove excessive infiltration, prevent sanitary sewer overflows, and eliminate sewage backups (\$29 million in FY2012).
- Continue the program to assess, repair, and replace the city wide force main system.
- Continue funding for upgrade, rehabilitation, or renewal of various wastewater treatment plants.
- Continue funding for lift station renewal/replacement. This will greatly reduce the backlog of the current lift stations needed to be upgrade.
- Continue to improve the 69th Street Wastewater Treatment Plants.
- Increase funding for Northside Sewer Relief Tunnel projects.

WasteWater - Summary of Funding Sources

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					2012-2016	Total
		2012	2013	2014	2015	2016		
Acquisition	600	160					160	760
Design	27,438	10,867	12,958	13,948	12,775	9,117	59,665	87,103
Construction	155,183	173,250	163,910	163,318	167,694	168,676	836,848	992,031
Equipment		8,635	4,699				13,334	13,334
Civic Art								
Other		7,000	5,594	6,204	5,786	6,420	31,004	31,004
Total Allocations	183,221	199,912	187,161	183,470	186,255	184,213	941,011	1,124,232
Funding Source	Estimated 2011	Fiscal Year Planned Appropriations					2012-2016	Total
		2012	2013	2014	2015	2016		
Fund 1850 - Reimbursement of Equipment/Projects	171							171
Fund 5000 - Community Development Block Grant		6,539					6,539	6,539
Fund 8319 - Water & Sewer Contributed Capital Fund	150	9,500					9,500	9,650
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	140,250	128,818	128,988	125,235	148,646	145,960	677,647	817,897
Tx Water Development Board	42,650	55,055	58,173	58,235	37,609	38,253	247,325	289,975
Total:	183,221	199,912	187,161	183,470	186,255	184,213	941,011	1,124,232

WasteWater - Summary of Funds

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CIP No.	Project	Est. 2011	Fiscal Year Planned Appropriations					2012-2016
			2012	2013	2014	2015	2016	
R-000019	Emergency Needs for Wastewater Utility							
	Fund 8500 - Water & Sewer Sys	20,247	6,000	5,085	5,170	5,260	5,350	26,865
	Project Total:	20,247	6,000	5,085	5,170	5,260	5,350	26,865
R-000020	Miscellaneous Needs (Acquisition, Engineering, Construction, and Legal) for Public Utility							
	Fund 8500 - Water & Sewer Sys		1,000	509	1,034	526	1,070	4,139
	Project Total:		1,000	509	1,034	526	1,070	4,139
R-000035	Wastewater Force Main Renewal and Replacement Program							
	Fund 8500 - Water & Sewer Sys	2,124	3,300	3,860	3,924	3,992	4,061	19,137
	Project Total:	2,124	3,300	3,860	3,924	3,992	4,061	19,137
R-000037	Corrosion Prevention and Rehabilitation Program							
	Fund 8500 - Water & Sewer Sys		816	830	844	858	873	4,221
	Project Total:		816	830	844	858	873	4,221
R-000265	Wastewater Treatment and Sludge Plant Improvements Program							
	Fund 8500 - Water & Sewer Sys	40,028	34,899	41,000	46,758	73,516	45,911	242,084
	Project Total:	40,028	34,899	41,000	46,758	73,516	45,911	242,084
R-000266	Neighborhood Sewer Rehabilitation Program in various Service Areas							
	Tx Water Development Board	21,163	28,985	28,862	31,279	31,823	32,368	153,317
	Project Total:	21,163	28,985	28,862	31,279	31,823	32,368	153,317
R-000267	Lift Station Renewal and Replacement Improvements Program							
	Fund 5000 - Community Develop		6,539					6,539
	Fund 8319 - Water & Sewer Con		9,500					9,500
	Fund 8500 - Water & Sewer Sys	24,152	28,306	28,963	24,020	18,631	31,501	131,421
	Project Total:	24,152	44,345	28,963	24,020	18,631	31,501	147,460
R-000268	Rehabilitation/Replacement of Various Wastewater Facilities Program							
	Fund 8500 - Water & Sewer Sys	500	230	117		907		1,254
	Project Total:	500	230	117		907		1,254
R-000294	Sims Bayou TCEQ Compliance Program							
	Tx Water Development Board			2,797				2,797
	Project Total:			2,797				2,797
R-000295	Citywide TCEQ Compliance Program							

WasteWater - Summary of Funds

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CIP No.	Project	Est. 2011	Fiscal Year Planned Appropriations					2012-2016
			2012	2013	2014	2015	2016	
	Tx Water Development Board	16,784	20,570	20,920	21,269			62,759
	Project Total:	16,784	20,570	20,920	21,269			62,759
R-000298	Alameda Sims Wastewater Treatment & Sludge Processing Facility Improvements Program							
	Fund 8500 - Water & Sewer Sys	8,927		7,017	6,183		9,844	23,044
	Project Total:	8,927		7,017	6,183		9,844	23,044
R-000302	Wastewater Facilities Safety and Security Improvements Program							
	Fund 8500 - Water & Sewer Sys	1,375		936		968		1,904
	Project Total:	1,375		936		968		1,904
R-000500	Utility Improvement under Street & Bridge and Storm Drainage CIP projects							
	Fund 8500 - Water & Sewer Sys	2,586	2,717	3,145	11,354	4,646	965	22,827
	Project Total:	2,586	2,717	3,145	11,354	4,646	965	22,827
R-000509	69th Street Wastewater Treatment Plant Improvements Program							
	Fund 8500 - Water & Sewer Sys	11,851	19,335	5,869	1,784	16,542	21,013	64,543
	Project Total:	11,851	19,335	5,869	1,784	16,542	21,013	64,543
R-000512	Supervisory Control & Data Acquisition (SCADA) System & Process Improvement							
	Fund 8500 - Water & Sewer Sys		1,725					1,725
	Project Total:		1,725					1,725
R-000521	Sewer Line Replacement by Other Governmental Agencies							
	Fund 8319 - Water & Sewer Con	150						
	Fund 8500 - Water & Sewer Sys	2,483	1,766	837	1,546	544	480	5,173
	Project Total:	2,633	1,766	837	1,546	544	480	5,173
R-000800	Collection System - Sponsor Participation Categorical (Residential and Commercial, previous R-000800 and R-							
	Fund 8500 - Water & Sewer Sys	12,500	4,000	4,000	4,000	4,000	4,000	20,000
	Project Total:	12,500	4,000	4,000	4,000	4,000	4,000	20,000
R-000801	Providing Sewer Service To The Areas Inside The City That Are Unserved							
	Fund 8500 - Water & Sewer Sys	7,850	5,728	877	4,582	3,266	5,291	19,744
	Project Total:	7,850	5,728	877	4,582	3,266	5,291	19,744
R-001000	Evaluation Of Wastewater Treatment Plant Service Areas							
	Fund 8500 - Water & Sewer Sys	1,000	1,035	702				1,737
	Project Total:	1,000	1,035	702				1,737

WasteWater - Summary of Funds

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CIP No.	Project	Est. 2011	Fiscal Year Planned Appropriations					2012-2016
			2012	2013	2014	2015	2016	
R-002003	Northside Sewer Relief Tunnel Rehabilitation Program							
	Fund 8500 - Water & Sewer Sys	2,800	12,351	18,926	5,946	5,807	7,629	50,659
	Project Total:	2,800	12,351	18,926	5,946	5,807	7,629	50,659
R-002011	Neighborhood Sewer Systems Improvements							
	Fund 1850 - Reimbursement of	171						
	Fund 8500 - Water & Sewer Sys	1,827	5,610	6,315	8,090	9,183	7,972	37,170
	Project Total:	1,998	5,610	6,315	8,090	9,183	7,972	37,170
R-002013	Large Diameter Sewer (LDS) Rehabilitation Program							
	Tx Water Development Board	4,703	5,500	5,594	5,687	5,786	5,885	28,452
	Project Total:	4,703	5,500	5,594	5,687	5,786	5,885	28,452
	Total Appropriations:	183,221	199,912	187,161	183,470	186,255	184,213	941,011

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Emergency Needs for Wastewater Utility		Council District					CIP No.:	
		Location: W	Served: W			R-000019		
		Geographic Ref.: N/A	Key Map: V			(ADOPTED)		
		Neighborhood: N/A						
Description: This program provides for unforeseen emergency needs for engineering services, construction, and equipments for facility and sewer line failure of Public Utility.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is needed to provide public health and safety, and to ensure regulatory compliance.		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total
			2012	2013	2014	2015	2016	
Acquisition		600						600
Design		1,932						1,932
Construction		17,715						17,715
Equipment								
Civic Art								
Other			6,000	5,085	5,170	5,260	5,350	26,865
Total Allocations		20,247	6,000	5,085	5,170	5,260	5,350	47,112
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		20,247	6,000	5,085	5,170	5,260	5,350	47,112
Tx Water Development Board								
Total Funds		20,247	6,000	5,085	5,170	5,260	5,350	47,112

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Miscellaneous Needs (Acquisition, Engineering, Construction, and Legal) for Public Utility	Council District					CIP No.: R-000020 (ADOPTED)	
	Location: W				Served: W		
	Geographic Ref.: N/A				Key Map: N/A		Neighborhood: N/A
Description: This program provides for unforeseen miscellaneous needs for acquisition, engineering services, construction, and legal services required in conjunction with various projects and activities of Public Utility. Justification: This program is needed to provide for unforeseen costs.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design							
Construction							
Equipment							
Civic Art							
Other		1,000	509	1,034	526	1,070	4,139
Total Allocations		1,000	509	1,034	526	1,070	4,139
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		1,000	509	1,034	526	1,070	4,139
Total Funds		1,000	509	1,034	526	1,070	4,139

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Wastewater Force Main Renewal and Replacement Program		Council District					CIP No.:	
		Location: W	Served: W			R-000035		
		Geographic Ref.: N/A	Key Map: V			(ADOPTED)		
		Neighborhood: N/A						
Description: This program is for the renewal and replacement of wastewater force mains throughout the City to provide reliable operation. The City operates and maintains over 1.5 million linear feet of force mains.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is necessary due to the age and condition of the City's force mains. Funding of this program is essential to control operation and maintenance costs in the form of emergency repairs and to ensure regulatory compliance, i.e. SSOs.		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total
			2012	2013	2014	2015	2016	
Acquisition								
Design		2,124		351	357	363	369	3,564
Construction			3,300	3,509	3,567	3,629	3,692	17,697
Equipment								
Civic Art								
Other								
Total Allocations		2,124	3,300	3,860	3,924	3,992	4,061	21,261
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		2,124	3,300	3,860	3,924	3,992	4,061	21,261
Total Funds		2,124	3,300	3,860	3,924	3,992	4,061	21,261

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Corrosion Prevention and Rehabilitation Program		Council District					CIP No.:	
		Location: W	Served: W			R-000037		
		Geographic Ref.: N/A	Key Map: N/A			(ADOPTED)		
		Neighborhood: N/A						
Description: This program includes the design, investigation and subsequent corrosion protection on existing wastewater force mains and facilities. This includes the protective coatings on Aerial Crossings as well as the cathodic protection of force main lines.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program has a positive impact on system reliability, public safety, customer satisfaction and management efficiencies. It also fulfills the need to renew and replace deteriorated materials.		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations				Project Total	
			2012	2013	2014	2015	2016	
Acquisition								
Design			816	830	844	858	873	
Construction								
Equipment								
Civic Art								
Other								
Total Allocations			816	830	844	858	873	
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund			816	830	844	858	873	
Total Funds			816	830	844	858	873	

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Wastewater Treatment and Sludge Plant Improvements Program	Council District					CIP No.: R-000265 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This program provides for the design and construction of electrical, mechanical, structure, process, and piping improvements at various wastewater treatment facilities throughout the City. Justification: This program is required to control operations and maintenance costs and ensure regulatory compliance.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition		10					10
Design	9,957	5,371	6,690	4,423	4,174	861	31,476
Construction	30,071	29,518	34,310	42,335	69,342	45,050	250,626
Equipment							
Civic Art							
Other							
Total Allocations	40,028	34,899	41,000	46,758	73,516	45,911	282,112
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	40,028	34,899	41,000	46,758	73,516	45,911	282,112
Total Funds	40,028	34,899	41,000	46,758	73,516	45,911	282,112

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Neighborhood Sewer Rehabilitation Program in various Service Areas	Council District					CIP No.: R-000266 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This program provides for the systematic renewal/replacement of the existing sewer system as required citywide. Justification: This program is required to renew/replace deteriorated neighborhood collection systems throughout the City.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design							
Construction	21,163	28,985	28,862	31,279	31,823	32,368	174,480
Equipment							
Civic Art							
Other							
Total Allocations	21,163	28,985	28,862	31,279	31,823	32,368	174,480
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund							
Tx Water Development Board	21,163	28,985	28,862	31,279	31,823	32,368	174,480
Total Funds	21,163	28,985	28,862	31,279	31,823	32,368	174,480

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Lift Station Renewal and Replacement Improvements Program		Council District					CIP No.:																																																								
		Location: W	Served: W			R-000267																																																									
		Geographic Ref.: N/A	Key Map: V			(ADOPTED)																																																									
		Neighborhood: N/A																																																													
Description: This program is to rehabilitate, replace, consolidate or divert wastewater lift stations throughout the City. It provides for design and construction of the required improvements; structural, mechanical and electrical components at the lift stations.		Operational and Maintenance Costs: (\$ Thousands)																																																													
Justification: This program is needed for reliable and efficient collection of wastewater throughout the City. It protects public health and ensures compliance with regulatory requirements.		<table border="1"> <tr> <td></td> <td style="text-align: center;"><u>2012</u></td> <td style="text-align: center;"><u>2013</u></td> <td style="text-align: center;"><u>2014</u></td> <td style="text-align: center;"><u>2015</u></td> <td style="text-align: center;"><u>2016</u></td> <td></td> </tr> <tr> <td>Personnel</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>Supplies</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>Svcs. & Chgs.</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>Capital Outlay</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>Property Mgmt.</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>Total</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> <tr> <td>FTEs</td> <td></td><td></td><td></td><td></td><td></td><td></td> </tr> </table>							<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		Personnel							Supplies							Svcs. & Chgs.							Capital Outlay							Property Mgmt.							Total							FTEs						
	<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>																																																										
Personnel																																																															
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Property Mgmt.																																																															
Total																																																															
FTEs																																																															
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total																																																							
			2012	2013	2014	2015	2016																																																								
Acquisition																																																															
Design		5,397	1,977	2,339	4,994	5,081	5,660	25,448																																																							
Construction		18,755	40,443	26,624	19,026	13,550	25,841	144,239																																																							
Equipment			1,925					1,925																																																							
Civic Art																																																															
Other																																																															
Total Allocations		24,152	44,345	28,963	24,020	18,631	31,501	171,612																																																							
Source of Funds																																																															
Fund 5000 - Community Development Block Grant			6,539					6,539																																																							
Fund 8319 - Water & Sewer Contributed Capital Fund			9,500					9,500																																																							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		24,152	28,306	28,963	24,020	18,631	31,501	155,573																																																							
Tx Water Development Board																																																															
Total Funds		24,152	44,345	28,963	24,020	18,631	31,501	171,612																																																							

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Rehabilitation/Replacement of Various Wastewater Facilities Program	Council District					CIP No.: R-000268 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This program is primarily for the refurbishment of buildings and general site improvements for all wastewater operations and utility maintenance facilities. Justification: This program is for the health and welfare of the employees and to properly maintain fixed assets.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design			117				117
Construction	500	230			907		1,637
Equipment							
Civic Art							
Other							
Total Allocations	500	230	117		907		1,754
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	500	230	117		907		1,754
Total Funds	500	230	117		907		1,754

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Sims Bayou TCEQ Compliance Program		Council District					CIP No.:	
		Location: I	Served: D, E, I			R-000294		
		Geographic Ref.: N/A	Key Map: V			(ADOPTED)		
		Neighborhood: N/A						
Description: This program provides the necessary improvements within Sims Bayou service areas to meet TCEQ regulatory requirements for sanitary sewer overflow prevention.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is required to meet TCEQ regulatory requirements.			<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total
			2012	2013	2014	2015	2016	
Acquisition								
Design								
Construction				2,797			2,797	
Equipment								
Civic Art								
Other								
Total Allocations				2,797			2,797	
Source of Funds								
Tx Water Development Board				2,797			2,797	
Total Funds				2,797			2,797	

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Citywide TCEQ Compliance Program		Council District				CIP No.:		
		Location: W	Served: W		R-000295			
		Geographic Ref.: N/A	Key Map: V		(ADOPTED)			
		Neighborhood: N/A						
Description: This program provides the necessary improvements within various service areas to meet TCEQ regulatory requirements for sanitary sewer overflow prevention.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is required to meet TCEQ regulatory requirements.				<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations				Project Total	
			2012	2013	2014	2015	2016	
Acquisition								
Design								
Construction		16,784	20,570	20,920	21,269			79,543
Equipment								
Civic Art								
Other								
Total Allocations		16,784	20,570	20,920	21,269			79,543
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund								
Tx Water Development Board		16,784	20,570	20,920	21,269			79,543
Total Funds		16,784	20,570	20,920	21,269			79,543

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Almeda Sims Wastewater Treatment & Sludge Processing Facility Improvements Program	Council District					CIP No.: R-000298 (ADOPTED)	
	Location: D	Served: C,D,I					
	Geographic Ref.: 5351-0113	Key Map: 572L,M			Neighborhood: N/A		
Description: This program provides for the design and construction of electrical, mechanical, structure, process and piping improvement of various components of this facility. Justification: The improvements are required to control operation and maintenance costs and ensure regulatory compliance.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design	1,727			1,427			3,154
Construction	7,200		7,017	4,756		9,844	28,817
Equipment							
Civic Art							
Other							
Total Allocations	8,927		7,017	6,183		9,844	31,971
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	8,927		7,017	6,183		9,844	31,971
Tx Water Development Board							
Total Funds	8,927		7,017	6,183		9,844	31,971

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Wastewater Facilities Safety and Security Improvements Program	Council District					CIP No.: R-000302 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This program provides for the design and construction of basic safety and security improvements to the existing wastewater treatment plant facilities. Justification: This program is required for the health and safety of the employees and to protect the public from unauthorized access to hazardous facilities.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design	575						575
Construction	800		936		968		2,704
Equipment							
Civic Art							
Other							
Total Allocations	1,375		936		968		3,279
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	1,375		936		968		3,279
Total Funds	1,375		936		968		3,279

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Utility Improvement under Street & Bridge and Storm Drainage CIP projects	Council District					CIP No.: R-000500 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: To provide Utility Improvement under Street & Bridge and Storm Drainage CIP projects.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
Justification: To coordinate utility improvements with Street & Bridge and Storm Drainage CIP projects for cost effectiveness and to minimize disturbance to the citizens.	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design							
Construction	2,586	2,717	3,145	11,354	4,646	965	25,413
Equipment							
Civic Art							
Other							
Total Allocations	2,586	2,717	3,145	11,354	4,646	965	25,413
Source of Funds							
Fund 8319 - Water & Sewer Contributed Capital Fund							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	2,586	2,717	3,145	11,354	4,646	965	25,413
Total Funds	2,586	2,717	3,145	11,354	4,646	965	25,413

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: 69th Street Wastewater Treatment Plant Improvements Program	Council District					CIP No.: R-000509 (ADOPTED)	
	Location: I	Served: W					
	Geographic Ref.: 5557-1206	Key Map: 494R		Neighborhood: N/A			
Description: This program provides for the design and construction of electrical, mechanical, structure, process, and piping improvements of various components of 69th Street Wastewater Treatment Plant. Justification: The improvements are required to control operation and maintenance costs and ensure regulatory compliance.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design	4,001			595	968		5,564
Construction	7,850	12,625	1,170	1,189	15,574	21,013	59,421
Equipment		6,710	4,699				11,409
Civic Art							
Other							
Total Allocations	11,851	19,335	5,869	1,784	16,542	21,013	76,394
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	11,851	19,335	5,869	1,784	16,542	21,013	76,394
Tx Water Development Board							
Total Funds	11,851	19,335	5,869	1,784	16,542	21,013	76,394

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Supervisory Control & Data Acquisition (SCADA) System & Process Improvement	Council District					CIP No.: R-000512 (ADOPTED)	
	Location: W				Served: W		
	Geographic Ref.: N/A				Key Map: V		Neighborhood: N/A
Description: This project provides funds for continued expansion and upgrade of the Wastewater Supervisory Control and Data Acquisition (SCADA) system and process improvements for Optimum Productive Service. Justification: This project is required to control operation and maintenance costs and ensure regulatory compliance.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design							
Construction		1,725					1,725
Equipment							
Civic Art							
Other							
Total Allocations		1,725					1,725
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		1,725					1,725
Total Funds		1,725					1,725

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Sewer Line Replacement by Other Governmental Agencies		Council District					CIP No.:	
		Location: W	Served: W			R-000521		
		Geographic Ref.: N/A	Key Map: V			(ADOPTED)		
		Neighborhood: N/A						
Description: This program provides funding for the design and construction of wastewater line replacement in coordination with projects by other governmental agencies.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is to coordinate projects with other governmental agencies to avoid conflict, minimize disturbance to the neighborhood, and reduce cost.		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations				Project Total	
			2012	2013	2014	2015	2016	
Acquisition								
Design		150					150	
Construction		2,483	1,766	837	1,546	544	480	
Equipment								
Civic Art								
Other								
Total Allocations		2,633	1,766	837	1,546	544	480	
Source of Funds								
Fund 8319 - Water & Sewer Contributed Capital Fund		150					150	
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		2,483	1,766	837	1,546	544	480	
Total Funds		2,633	1,766	837	1,546	544	480	

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Collection System - Sponsor Participation Categorical (Residential and Commercial, previous R-000800 and R-000802)	Council District					CIP No.: R-000800 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This project provides for the City's share of the cost of participation in joint property for wastewater collection system improvements sponsored by property owners and developers. Justification: This allows additional collection system capacity to be constructed using sponsors' funds to match City funding.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design							
Construction	12,500	4,000	4,000	4,000	4,000	4,000	32,500
Equipment							
Civic Art							
Other							
Total Allocations	12,500	4,000	4,000	4,000	4,000	4,000	32,500
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	12,500	4,000	4,000	4,000	4,000	4,000	32,500
Total Funds	12,500	4,000	4,000	4,000	4,000	4,000	32,500

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Providing Sewer Service To The Areas Inside The City That Are Unserved	Council District					CIP No.: R-000801 (ADOPTED)	
	Location:	W	Served:	W			
	Geographic Ref.:	N/A	Key Map:	V			
Description: This program will provide sanitary sewer service to areas within the City limits currently on individual septic systems. Justification: This program is required to protect the water quality of the City of Houston Surface Water Supply and surrounding waterways, and to promote residential development in current unserved City neighborhoods.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total						
	FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition		150					150
Design		288	526	713			1,527
Construction	7,850	5,290	351	3,869	3,266	5,291	25,917
Equipment							
Civic Art							
Other							
Total Allocations	7,850	5,728	877	4,582	3,266	5,291	27,594
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	7,850	5,728	877	4,582	3,266	5,291	27,594
Total Funds	7,850	5,728	877	4,582	3,266	5,291	27,594

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Evaluation Of Wastewater Treatment Plant Service Areas	Council District					CIP No.: R-001000 (ADOPTED)	
	Location: W	Served: W					
	Geographic Ref.: N/A	Key Map: V			Neighborhood: N/A		
Description: This program will develop computer hydraulic models and Master Plans of the wastewater treatment plant service areas.	Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>	
Justification: This project is needed to identify hydraulic deficiencies in the wastewater system and program treatment plant and collection system expansion and improvements to accommodate projected growth and ensure regulatory compliance.	Personnel						
	Supplies						
	Svcs. & Chgs.						
	Capital Outlay						
	Property Mgmt.						
	Total FTEs						
Project Allocation	Estimated 2011	Fiscal Year Planned Appropriations					Project Total
		2012	2013	2014	2015	2016	
Acquisition							
Design	1,000	1,035	702				2,737
Construction							
Equipment							
Civic Art							
Other							
Total Allocations	1,000	1,035	702				2,737
Source of Funds							
Fund 8500 - Water & Sewer Sys Cons. Const. Fund	1,000	1,035	702				2,737
Total Funds	1,000	1,035	702				2,737

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Northside Sewer Relief Tunnel Rehabilitation Program		Council District				CIP No.: R-002003 (ADOPTED)		
		Location: B,H,I	Served: B,H,I		Neighborhood: N/A			
		Geographic Ref.: 5359-1113	Key Map: 452,453,493,494					
Description: This program provides for the design and construction of rehabilitation of the Northside Sewer Relief Tunnel with moderate to severe corrosion.		Operational and Maintenance Costs: (\$ Thousands)						
Justification: This program is needed to rehabilitate moderate to severely corroded pipe and to protect the pipe from future corrosion.				<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>
		Personnel						
		Supplies						
		Svcs. & Chgs.						
		Capital Outlay						
		Property Mgmt.						
		Total						
		FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations				Project Total	
			2012	2013	2014	2015	2016	
Acquisition								
Design								
Construction		2,800	12,351	18,926	5,946	5,807	7,629	53,459
Equipment								
Civic Art								
Legal Fees								
Total Allocations		2,800	12,351	18,926	5,946	5,807	7,629	53,459
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		2,800	12,351	18,926	5,946	5,807	7,629	53,459
Tx Water Development Board								
Total Funds		2,800	12,351	18,926	5,946	5,807	7,629	53,459

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Neighborhood Sewer Systems Improvements		Council District					CIP No.: R-002011 (ADOPTED)	
		Location: W		Served: W				
		Geographic Ref.: N/A		Key Map: V				
Description: Replacement and renewal of neighborhood sewers and facilities to improve customer service. Justification: Neighborhood sewer lines and related structures that continue to deteriorate requiring frequent repair need to be replaced and upgraded as necessary to meet today's conditions.		Operational and Maintenance Costs: (\$ Thousands)						
				<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>
		Personnel Supplies Svcs. & Chgs. Capital Outlay Property Mgmt. Total FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total
			2012	2013	2014	2015	2016	
Acquisition								
Design		575	1,380	1,403	595	1,331	1,354	6,638
Construction		1,423	4,230	4,912	7,495	7,852	6,618	32,530
Equipment								
Civic Art								
Other								
Total Allocations		1,998	5,610	6,315	8,090	9,183	7,972	39,168
Source of Funds								
Fund 1850 - Reimbursement of Equipment/Projects		171						171
Fund 8500 - Water & Sewer Sys Cons. Const. Fund		1,827	5,610	6,315	8,090	9,183	7,972	38,997
Total Funds		1,998	5,610	6,315	8,090	9,183	7,972	39,168

2012-2016 CAPITAL IMPROVEMENT PLAN (\$ Thousands)

CITY OF HOUSTON - WasteWater

Project: Large Diameter Sewer (LDS) Rehabilitation Program		Council District					CIP No.: R-002013 (ADOPTED)	
		Location: W				Served: W		
		Geographic Ref.: N/A				Key Map: V		
Description: This project provides the funding necessary for the rehabilitation of large diameter sewer projects. Justification: Projects are needed to rehabilitate moderate to severely corroded pipe and to protect pipe from future corrosion. This is an essential investment in the most critical and valuable sewers.		Operational and Maintenance Costs: (\$ Thousands)						
		<u>2012</u>	<u>2013</u>	<u>2014</u>	<u>2015</u>	<u>2016</u>		
		Personnel Supplies Svcs. & Chgs. Capital Outlay Property Mgmt. Total FTEs						
Project Allocation		Estimated 2011	Fiscal Year Planned Appropriations					Project Total
			2012	2013	2014	2015	2016	
Acquisition								
Design								
Construction		4,703	5,500	5,594	5,687	5,786	5,885	33,155
Equipment								
Civic Art								
Other								
Total Allocations		4,703	5,500	5,594	5,687	5,786	5,885	33,155
Source of Funds								
Fund 8500 - Water & Sewer Sys Cons. Const. Fund								
Tx Water Development Board		4,703	5,500	5,594	5,687	5,786	5,885	33,155
Total Funds		4,703	5,500	5,594	5,687	5,786	5,885	33,155