

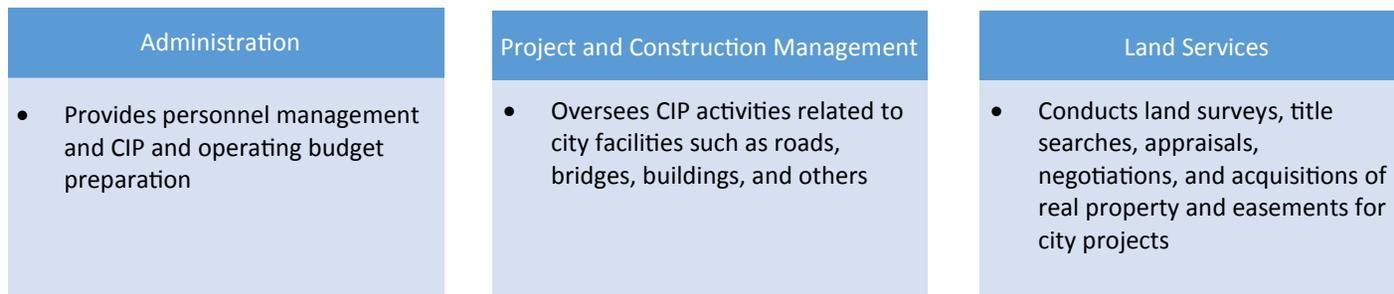
## Chapter 6 - Department of Design & Construction

The Department of Design and Construction (DDC) is the central agency responsible for administering the city's Capital Improvement Program (CIP). The department's mission is consistent with the charter mandate to direct and perform the project planning, engineering, design, and construction of public facilities.

The department's goals are to:

- Be fiscally responsible;
- Coordinate with users, consultants, and other agencies to manage projects from project planning through construction;
- Provide valuable engineering expertise and advice to all city agency planning;
- Analyze and embrace new engineering and construction innovations to continuously improve the city's quality of service; and
- Promote professional development within the department through training, education, and leadership.

The department consists of three operating functions:

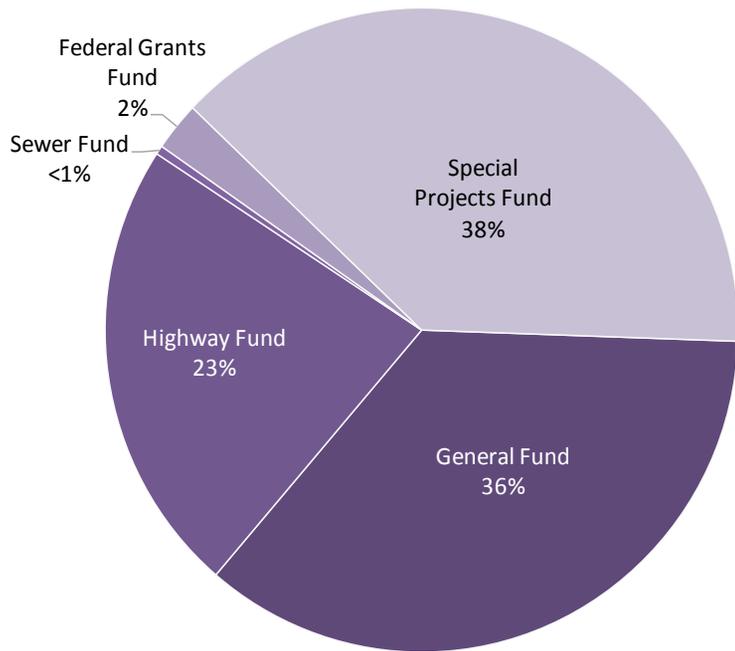


*To support planning and provide land acquisition, design, construction, and inspection for public facilities of the City and County of Honolulu.*

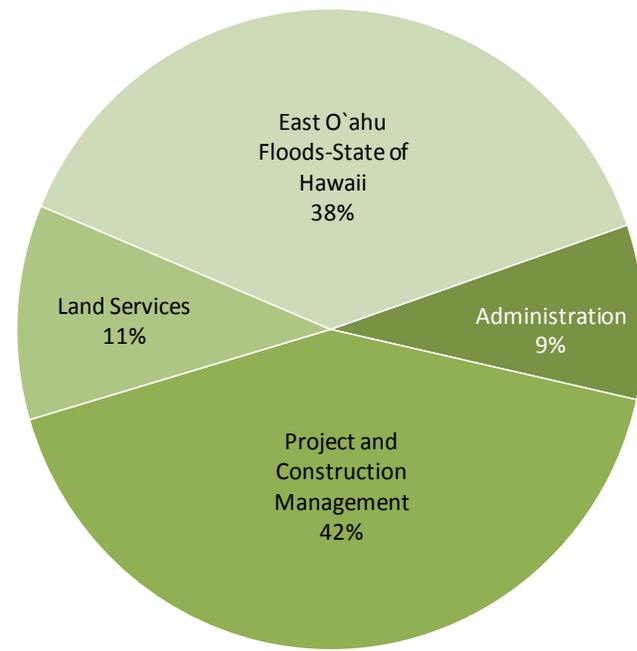
*Mission Statement*

# Spending and Staffing

## Fund Sources<sup>1</sup>



## Fund Uses<sup>1</sup>



	Total Revenues (\$ millions)	Operating Expenditures (\$ millions)	Staffing		Cost Per FTE <sup>2</sup>	Overtime Expenditures <sup>3</sup>	
			Total Authorized FTE	Total Vacant FTE		Total	Non-Holiday
FY 2015	\$0.32	\$16.78	278	55	\$60,364	\$223,093	\$218,365
FY 2016	\$0.32	\$15.73	278	53	\$56,571	\$258,473	\$255,424
FY 2017	\$0.70	\$16.66	278	58	\$59,944	\$169,066	\$166,508
FY 2018	\$0.11	\$17.17	278	71	\$61,760	\$199,340	\$198,363
FY 2019	\$10.90 <sup>4</sup>	\$26.02	194	52	\$134,118	\$208,755	\$208,278
Change from last year	10222%	52%	-30%	-27%	117%	5%	5%
Change over last 5 years	3308%	55%	-30%	-5%	122%	-6%	-5%

Source: Department of Budget and Fiscal Services (BFS). <sup>1</sup>Percentages do not total 100% due to rounding. <sup>2</sup>Cost Per FTE = Total Operating Expenditures/Total Authorized FTE. <sup>3</sup>Overtime pay is established by bargaining unit agreement, as applicable. <sup>4</sup>In FY 2019, DDC received \$10 million from intergovernmental revenue to repair damage caused by the 2018 East O`ahu Floods.

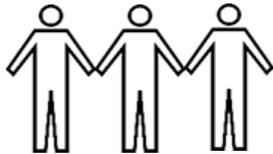
## Spending and Staffing



Operating Expenditures

**\$26.02 M ▲ 52%**

The department attributes the 52% increase to the previous fiscal year's operating expenditures to repair work performed on city canals, storm drains, streams, and ditches caused by the East O`ahu floods in 2018.



Total Vacant FTE

**52 FTE ▼ 27%**

Total vacant FTE decreased 27% from the last fiscal year. The department attributes this to the passage of the 2016 charter amendment which mandated the transfer of the Wastewater Division to the Department of Environmental Services.

## Five Year Trends



- Overtime expenditures decreased 6% from \$223,093 to \$208,755 over the last five years. This is attributed to fluctuations in the number and/or complexity of the projects.



- Total Authorized FTE decreased 30% from 278 to 194 FTE over the last five fiscal years. The department attributes this to the passage of the 2016 charter amendment which mandated the transfer of the Wastewater Division to the Department of Environmental Services in 2018.

## National Community Survey



- City and county overall built environment received a **27%** rating as being *excellent or good* in 2019. That is a 4% decrease from the 31% rating in FY 2018. This rating is much lower than the national benchmark comparison.

## FY 2019 ACCOMPLISHMENTS

- Performed emergency flood damage stabilization work at Kului Gulch, Hahaione Stream, and Wailupe Stream
- Completed construction of the new Hau`ula Fire Station at a cost of \$8.2 million

## CHALLENGES MOVING FORWARD — FY 2020

- *Complying with the increasing requirements for environmental permitting*
- *Filling vacancies and having adequate staffing to be able to handle the workload*

# Project and Construction Management

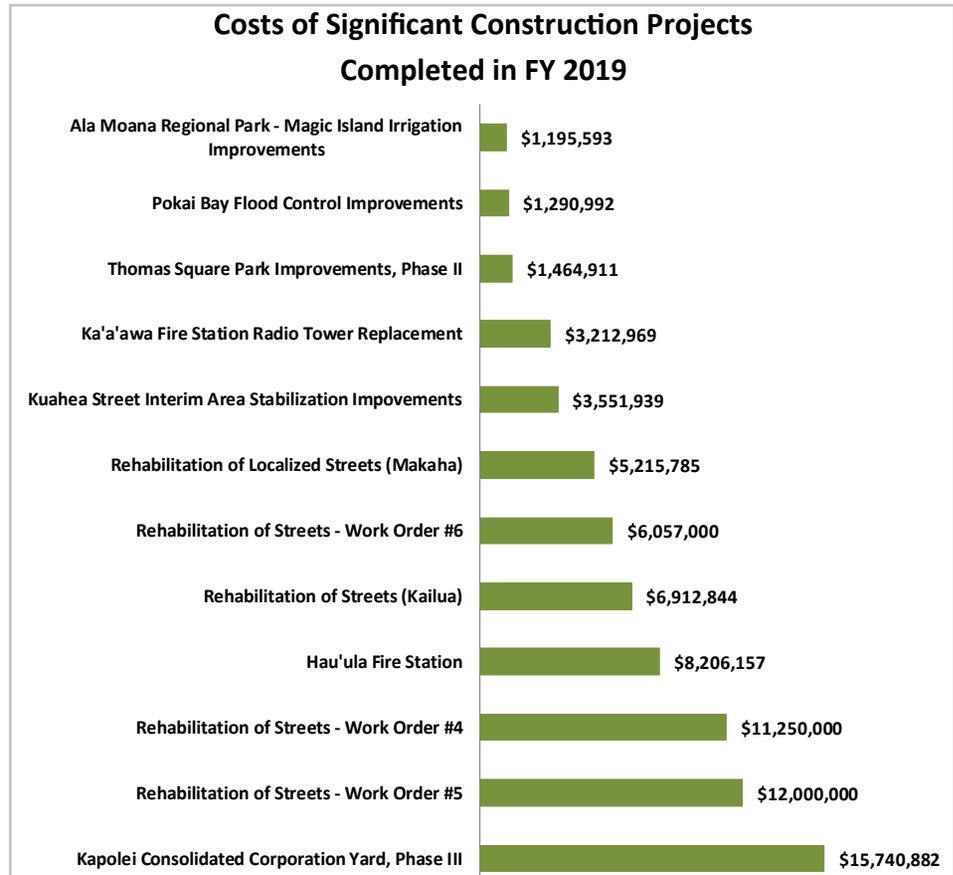
Project and Construction Management’s (PCM) mission is to oversee capital improvements to various city facilities that include roads and municipal buildings. Construction of bridges, fire, EMS, and police stations, park facilities, and golf courses are also under this program’s jurisdiction.

Project and construction management is divided into three divisions: Mechanical/Electrical (M/E), Facilities, and Civil. Each division provides planning, design, and construction management.

Facilities expenditures have decreased 36% in the last five fiscal years and 13% from the previous fiscal year. The department explained in FY 2015, there were one-time costs for consolidation and relocation of city offices to increase efficiency. With the consolidation, facilities expenditures decreased in both FY 2016 and FY 2017. In FY 2018, there were more one-time costs regarding renovation and relocation of city offices causing an increase, but from FY 2017 to 2019, facilities expenditures have steadily decreased by 2%.

Civil expenditures increased 33% over the last five years and 4% over the last fiscal year. The department explained the Civil Division has been tasked with increased responsibilities.

Constructed Road Resurfacing (Lane Miles) has decreased 34% over the last five fiscal years and 60% over the last fiscal year. The Civil Division has completed resurfacing of the city’s roads that were in poor condition, and the number of lane miles that need resurfacing has decreased significantly.



Source: FY 2019 Department & Agency Reports, Department of Design and Construction

	Total Operating Expenditures (\$ millions)	Operating Expenditures by Divisions			Constructed Road Resurfacing (Lane Miles)	Community Survey (% Excellent or Good)
		Mechanical/Electrical (\$ millions)	Facilities (\$ millions)	Civil (\$ millions)		Street Repair
FY 2015	\$13.44	\$1.16	\$5.77	\$4.70	214	11%
FY 2016	\$12.20	\$1.55	\$4.55	\$5.13	268	15%
FY 2017	\$11.66	\$1.20	\$3.75	\$5.46	411	10%
FY 2018 <sup>1</sup>	\$11.33	\$1.12	\$4.22	\$6.00	358	12%
FY 2019	\$10.91	\$1.00	\$3.67	\$6.23	142	9%
Change from last year	-3%	-10%	-13%	4%	-60%	-3%
Change over last 5 years	1%	-14%	-36%	33%	-34%	-2%

Source: Department of Budget and Fiscal Services, Department of Design and Construction, and 2019 National Community Survey. <sup>1</sup>Effective October 1, 2017 the Wastewater Division was transferred to the Department of Environmental Services.

# Project and Construction Management

From FY 2015 to FY 2019, the planning and design project value over each fiscal year has varied. There has been a decreasing trend of 28% in the past five fiscal years and a 30% decrease from \$44 million to \$30.90 million in the last fiscal year. In addition to the transfer of the Wastewater Division to the Department of Environmental Services, the department explained that the number and values of those projects will fluctuate each year.

Construction project value for the past five fiscal years has decreased by 62% from \$255.60 million to \$96.90 million, and this past fiscal year it decreased 33% from \$145.00 million to \$96.90 million. The department stated that the number of projects and values of the projects fluctuate each year and there was a decrease in funding for the Road Resurfacing Program. In FY2018, the Rehabilitation of Streets Program budget was reduced from \$135 million to \$35 million for FY 2019.

Total Capital Improvement Projects (CIP) completed increased 40% from last fiscal year but decreased 13% over the last five years. The department stated that project completion dates can vary depending on the scope of each project. Some projects could take as little as one to two years to complete while other more complex projects could take five to ten years to complete.



Completion of Central O`ahu Ambulance Facility (top) Completion of Hau`ula Fire Station (left) and King Street Repaving (right)

Source: Department of Design and Construction

	Total Projects Encumbered		Value of Projects Encumbered		Total CIP Projects Completed	Value of CIP Projects Completed (\$ millions)	Community Survey (% Excellent or Good)
	Planning and Design	Construction	Planning and Design (\$ millions)	Construction (\$ millions)			Overall Built Environment
FY 2015	132	104	\$42.80	\$255.60	88	\$287.90	27%
FY 2016	155	106	\$62.10	\$334.10	107	\$154.50	32%
FY 2017	117	82	\$69.00	\$255.00	87	\$473.50	29%
FY 2018 <sup>1</sup>	101	72	\$44.00	\$145.00	55	\$53.40	31%
FY 2019	99	78	\$30.90	\$96.90	77	\$102.00	27%
Change from last year	-2%	8%	-30%	-33%	40%	91%	-4%
Change over last 5 years	-25%	-25%	-28%	-62%	-13%	-65%	0%

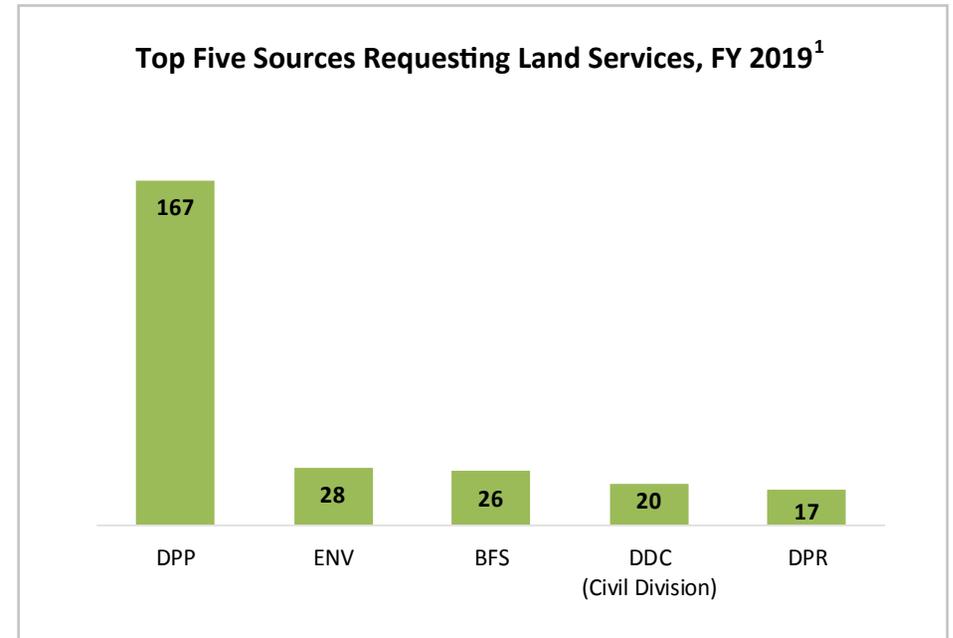
Source: Department of Budget and Fiscal Services, Department of Design and Construction, and 2019 National Community Survey. <sup>1</sup>FY 2018 totals do not include Wastewater Division which was transferred to the Department of Environmental services.

# Land Services

Land Services' mission is to provide land and engineering survey, title search, real property appraisal, negotiation, and document preparation services in connection with the acquisition of lands and easements required for city projects and activities. Acquisitions include various roadways, utility and access rights-of-way, and sites for wastewater collection and treatment facilities. Sites for solid waste collection, disposal, and transfer activities are also acquired. This program also acquires land for public use sites such as parks and playgrounds, golf courses, police and fire stations, and bus yards.

The total parcels acquired increased 9% from 139 parcels in FY 2015 to 151 total parcels in FY 2019 but decreased 67% from 454 parcels in FY 2018. The department explained that the recent decreasing trend is due to both the mayor's FY 2018 program to clear the backlog of projects and a reduction in staff.

From FY 2015 to FY 2019, the total negotiations have increased 26% from 3,578 to 4,498 but only 11% in the last fiscal year from 4,069 to 4,498. The department stated that in FY 2019 there was an increase in large, complex projects that required significant on-going negotiations. This resulted in a reduction of parcels being acquired.



Source: Department of Design and Construction (DDC), Department of Planning and Permitting (DPP), Department of Environmental Services (ENV), Department of Budget and Fiscal Services (BFS), and Department of Parks and Recreation. <sup>1</sup>Total Job Orders.

	Total Operating Expenditures (\$ millions)	Total Field Surveys Conducted	Total Title Searches Conducted	Total Parcels Acquired	Total Negotiations Conducted	Total Property Appraisals	Total Parcel and Land Court Maps
FY 2015	\$2.46	907	1,297	139	3,578	465	80
FY 2016	\$2.62	959	1,305	352	2,980	450	58
FY 2017	\$2.69	880	1,390	236	3,152	380	41
FY 2018	\$2.68	881	1,040	454	4,069	384	41
FY 2019	\$2.82	876	788	151	4,498	397	38
Change from last year	5%	<-1%	-24%	-67%	11%	3%	-7%
Change over 5 years	15%	-3%	-39%	9%	26%	-15%	-53%

Source: Department of Budget and Fiscal Services and Department of Design and Construction.