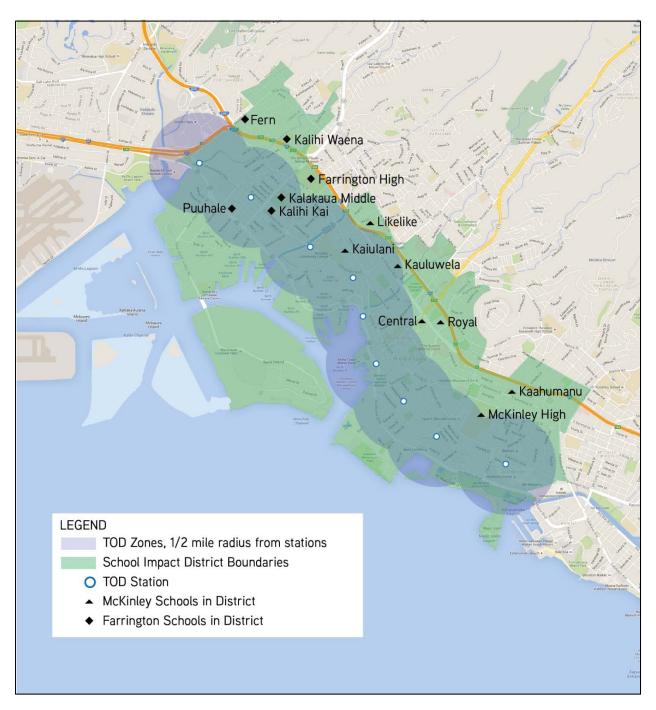
DRAFT ANALYSIS OF THE KALIHI TO ALA MOANA SCHOOL IMPACT DISTRICT



MAP 1: The Kalihi to Ala Moana District with Schools Serving the Area and the $\frac{1}{2}$ mile Radius Around Each Rail Station

Draft Analysis of the Kalihi to Ala Moana School Impact District

This report was prepared in accordance with Act 245, Session Laws of Hawaii 2007, and Act 188, Session Laws of Hawaii 2010. The legislation is now codified in Chapter 302A, Sections 1601 to 1612, Hawaii Revised Statutes.

The Board of Education must approve taking this report out to public hearing before final Board action.

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Executive Summary

The purpose of this analysis is to determine whether there is a need to establish a school impact fee district to address the anticipated growth in Department of Education ("DOE") schools resulting from expected residential growth in the four-mile area along the eastern most path of the Honolulu Area Rapid Transit in urban Honolulu. The nine transit stations and the schools serving the four-mile route are pictured on the cover page map.

The City and County of Honolulu ("City") and the State of Hawaii's Hawaii Community Development Authority ("HCDA") have plans to approve up to 35,000 additional residential units in the areas within a half-mile radius of the nine transit stations from Middle Street to Ala Moana. The State of Hawaii's Hawaii Public Housing Authority ("HPHA") also announced plans to redevelop four housing projects in areas close to the rail line with an estimated 4,000 net new units. The total for all proposed units is 39,000.

The number of additional DOE students generated by the full build out of 39,000 multi-family units would be approximately 10,000. After filling all estimated excess classroom capacity in existing schools, there would still be a need to establish facility space for slightly more than 8,500 elementary, middle school and high school students. If the Board of Education ("BOE") guidelines for school size prevail, the need translates into up to six new elementary schools, one and a half middle schools, and one and a half high schools.

The area being studied has roughly 70,000 to 80,000 people and had been expected to increase by 21,000 in the next 20 years. The additional 39,000 transit-related units now being proposed for the area will require the City to update its population growth projections for the urban core of Honolulu.

This analysis has determined that the per-unit Kalihi to Ala Moana school impact fee should be \$584 for construction and .0016 acres for land. If a fee in lieu of land is charged, the land amount is \$8,790. The total all-cash fee would be \$9,374 per new unit. The maximum amount of school impact fees that could be collected within the district, if all 39,000 additional units were built, would be 63.5 acres of land and \$22,736,872 in construction contributions.

THE KALIHI TO ALA MONA SCHOOL IMPACT DISTRICT

Section 1. Introduction

The Department of Education ("DOE") anticipates that the establishment of a rail line from East Kapolei to Ala Moana will encourage, shape, and concentrate the pattern of future residential growth in the Honolulu urban corridor. Growth in urban Honolulu is expected in the areas closest to the nine train stations which start at Middle Street in Kalihi and terminate at Kona Street at the Ala Moana Shopping Center. Where there is residential growth, there will be enrollment growth in the DOE schools that serve the new residents.

For many years, the DOE's method of building schools was based on a model relying on proposed suburban plans for vacant, former agricultural lands. New school sites were provided by residential developers according to requirements set by state and county governments. Developers of large projects were agreeable to providing school sites in their planned neighborhoods because the schools and their facilities were part of the amenities offered to buyers.

The proposed Kalihi to Ala Moana School Impact Fee District is a departure from the suburban model as there are very few residential projects already announced by area landowners across the district. Instead, the district is proposed on the basis of transit-oriented development ("TOD") plans being made by the City and County of Honolulu's ("City") Department of Planning and Permitting ("DPP") and the State of Hawaii's Hawaii Community Development Authority ("HCDA") and Hawaii Public Housing Authority ("HPHA").

The DOE is relying on the City's plans that set a maximum number of new residential units that will be permitted near each rail station. These residential developments will take place in areas the City will rezone into TOD zoning areas. The maximum number of new TOD units does not include the number of units being planned for redevelopment by HPHA, which have only been revealed relatively recently. The HPHA projects, however, are dependent on receiving TOD zoning in order to build as densely as planned.

Because the demographics of public housing differ from what is expected from the City's TOD development, this analysis uses a different variable to estimate more precisely the enrollment impacts of public housing. But this analysis proposes that the same formula to calculate fees is applied to both private and public-agency developed housing units. Affordable and public housing projects are not exempt from paying school impact fees.

The proposed district is much smaller than the other impact fee districts adopted by the Board of Education ("BOE"). There are no large land holdings where a suburban-style school campus can be easily accommodated within a proposed project. The DOE will have to provide school facilities in areas where most existing single parcels of land are not large enough to build conventional size school campuses. And, the price of land per acre far exceeds the price of any other land the DOE has ever considered purchasing.

The proposed Kalihi to Ala Moana district also differs from other school impact districts because the anticipated residential growth will be primarily in the form of multi-family ("MF") units.

The DOE anticipates the new housing to be located almost exclusively in high density, high-rise buildings. If there is an exceptional case of single-family housing being developed in the district, the DOE believes the impact on school enrollment of so few units will not add significantly to school enrollment. Thus, there will be no difference in the fee amounts paid for single-family and MF units.

The school impact fee formula explained in this analysis takes into account these urban housing differences and expects fewer DOE students per residential unit (with the exception of public housing). The formula also reflects the higher cost per acre of potential, future school sites within the proposed district.

Urban Area Exceptions

There are two sections of the Impact Fee Law, Chapter 302-A 1604 (b) (7) and 1605, that provide flexibility to the DOE, to plan for "non-traditional facilities" in existing urban areas. The DOE must take advantage of those options in the Kalihi to Ala Moana district. This analysis seeks three different exceptions to the law.

The first exception is to rely on the actual acreage per student within the Kalihi to Ala Moana district rather than the statewide acreage provided per student in recent new schools (this is referred to in the law as "school site area averages"). This is an acknowledgement that new urban schools will not provide the same acres per student as recent suburban schools, but they will provide at least the same amount as is currently being provided in the district. The DOE must adapt to the reality that new or expanding urban school sites will be small and very expensive.

The second exception is the need to amend the law itself to broaden the purposes for expending fee in lieu of land funds, Chapter 302-A-1608 (e). The law now restricts fees in lieu of land to be spent only on school site acquisition and related expenses, and not for construction costs. The DOE is seeking an amendment to Chapter 302-A-1608, so that within the Kalihi to Ala Moana School Impact Fee District, fees in lieu of land can be used to acquire finished square footage within high-rise buildings. In the urban area, the definition of a school site would include securing acreage on the ground as well as the square footage of floor space layered on top of each other. A draft copy of the proposed amendment will be circulated soon.

The third exception is a practicality based on the best estimates of the type of new housing that would be built in the impact district. The DOE assumes that almost all of the units will be multi-family ("MF") units and proposes that only the MF fee amount applies whether a unit is single-family ("SF") or MF.

What follows is the analysis required by law in order to implement school impact fees. It is a best guess about the future and can only rely on recent history and predictions about the pace of urban growth in the core of Honolulu.

Background

Residential developers in Hawaii have provided land and money for public schools since the early 1980's. The DOE collected payments of school land and cash when developers were required to make "fair-share contributions" by the State Land Use Commission or the counties as a condition of project approval.

The DOE was only granted its own authority to collect impact fees with the passage of Act 245, Session Laws of Hawaii 2007 ("Act 245"). The impact fee law is codified into Chapter 302A, Sections 1601 to 1612, Hawaii Revised Statues.

The groundwork for Act 245 was done by the School Impact Fee Working Group (hereinafter "Group") created by the State Legislature in 2005. The Group submitted its findings and recommendations in a report, *Hawaii School Impact Fee Working Group Report* (hereinafter "2007 Report"). The 2007 Report provided a framework, or procedure, for determining fee schedules for those areas of the state experiencing enough new residential development to require new or expanded school facilities.

The Impact Fee Law

The Legislature determined that new residential developments within identified school impact districts create demand for public school facilities. Therefore, developers of new housing are required to pay a portion of the cost of providing new or enlarged public schools to serve the additional students who will be living in the new housing. The land or fees charged are based on each new development's proportionate share of the additional demand on public school facilities.

Act 245 incorporated many of the findings and recommendations in the 2007 Report. It determined that it cost the State of Hawaii approximately \$17,102 in school construction to cover the additional students generated by each new unit of single-family housing from 1997 to 2007, and \$8,499 for each multi-family unit. Every 100 units of new single-family homes required 0.856 acres of school land and .425 acres for every 100 multi-family units.

Act 245 requires developers to provide most of the land needed for new schools, or pay a fee in lieu of land. In addition, developers are also required to contribute either ten percent (10%) of all new school construction costs, or ten percent (10%) of the construction costs of expanding an existing school. The 90% balance of school construction funds would continue to come from state tax revenues.

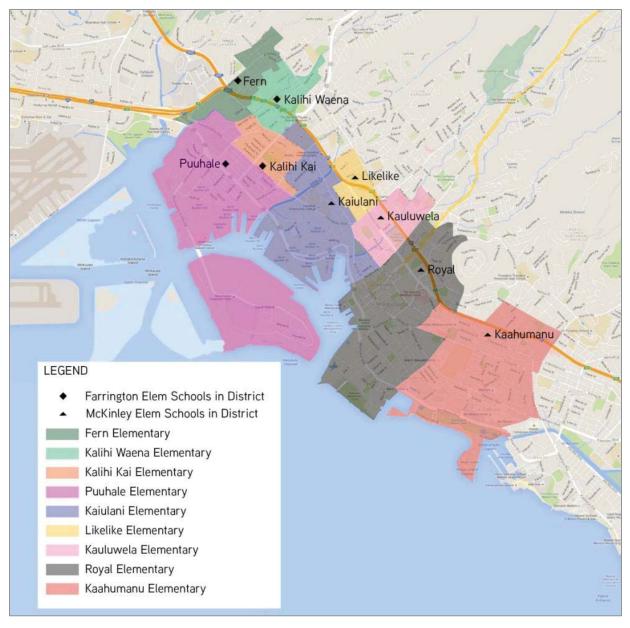
The school impact fee law does not exempt developers of small projects, individual home builders, government housing, or other affordable housing projects. For the purposes of this analysis, the term developer is meant to include all home builders regardless of the number of units being constructed.

The law requires the DOE to identify impact districts where school impact fees should be charged. It also requires the DOE to conduct an analysis of each of the proposed districts to verify the need for new school facilities and to determine the amount of fees charged. The

written analysis must contain a map showing the boundaries of the impact district, and analysis to support the need to construct new or expand existing school facilities within the next 25 years to accommodate projected growth in the district.

The school impact fee law was amended by Act 188, Session Laws of Hawaii 2010 ("Act 188"). Act 188 clarified many mechanical aspects of implementing the school impact fee law.

Map 2: Elementary School Service Areas that make up the Boundaries for the Kalihi to Ala Moana Impact Fee District



Section 2. Describing the Kalihi to Ala Moana School Impact District

Act 245 defines "school impact district" as a geographic area designated by the BOE where anticipated growth will create the need for one or more new schools or the expansion of one or more existing schools. These schools are, or will be, located within the district and will primarily serve new housing units within the area. The analysis must demonstrate that growth and development are occurring and creating the need for new or expanded school facilities.

A train running across the south shore of Oahu might not by itself increase the already forecasted population growth along the general area of its route, but the train will very likely concentrate future growth in the vicinity of the train stations. It is expected that new, denser residential developments will be encouraged and permitted within a quarter and half mile of the stations.

The City's plans to encourage development projects in proximity to rail stations describe the anticipated new housing as being communities for full-time, year-round residents. This differs from residential development in other areas of the state that may have a larger transient or vacation component and fewer students per unit.

District Defined by Elementary School Service Areas

The proposed Kalihi to Ala Moana School Impact District would be defined by the attendance area boundaries of the elementary schools that serve the areas surrounding the nine train stations from the Middle Street station in Kalihi through Downtown and Kakaako and ending at the Ala Moana Station. There are nine elementary schools serving the approximately four-mile stretch from west to east: Fern, Kalihi Waena, Puuhale, Kalihi Kai, Likelike, Kaiulani, Kauluwela, Royal, and Kaahumanu. The attendance area of each elementary school is illustrated in Map 2.

Those elementary schools primarily feed into Kalakaua and Central Middle Schools and then eventually Farrington and McKinley High Schools. A small subset of elementary students in schools making up the proposed district will attend middle schools generally mauka of the proposed school impact district boundaries and mauka of the H-1 freeway. However, they will only make up a small portion of the population served by the mauka middle schools. Washington Middle also serves half of Kakaako and most of the Ala Moana area, but it also serves a much larger area, east of the proposed district.

Linapuni Elementary is a small elementary school located in the Kuhio Park public housing area. It is defined as an Early Childhood Center and has pre-kindergarten, kindergarten, and first grade students only. Students finishing at Linapuni go on to Fern and Kalihi Waena elementary schools. Because the school is small (enrollment for 2015-2016 was 133 students) and draws almost exclusively from the Kuhio projects, it is not expected to be impacted by TOD or HPHA expansion plans and was not included in this analysis.

City and County Neighborhood Areas

The City studies and sorts data for various neighborhoods to provide a closer look at community characteristics. There are 35 Neighborhood Areas ("NA") that correspond roughly to the

boundaries of the 35 neighborhood boards. Census data by census blocks are sorted into the NAs.

The NAs that most closely correspond to the four miles of the rail line are the Kalihi-Palama NA #15; Downtown NA #13; and Ala Moana-Kakaako NA #11.

Census Tracts

The proposed Kalihi to Ala Moana School Impact District covers 20 census tracts. The western boundary of the district coincides with the western boundaries of Tract 62.01 Kam IV Road, Tract 60 Umi Street, and Tract 59 Mokauea Street. Their common western boundary is Middle Street.

The eastern boundary of the district is the same as the eastern boundaries of Tract 36.03 Ahana Street, Tract 36.04 Kaheka-Makaloa Streets, and Tract 37 Ala Moana. The common boundary on the east is Kalakaua Avenue.

Section 3. Recent General Population Trends

The population of the City has grown by roughly 80% since statehood 50 years ago. However, the rate of growth, as measured every ten years by the US Census, has declined since the first two high growth decades after statehood, the 1960's and 1970's. Table 1 illustrates the slowing rate of growth from 1990 to 2000 and a return in the past ten years (2000 to 2010) to growth rates similar to the 1980's.

The total population of the Kalihi/Palama NA of around 40,000 people is much larger than the Downtown and Ala Moana/Kakaako areas, with close to 15,000 and 19,000 people, respectively. The Kalihi/Palama population has been relatively stable since 1980. In contrast, the Ala Moana/Kakaako area almost doubled in population since 1980, with the highest rate of growth between 2000 and 2010. The Downtown NA has grown by 70% since 1980, with most of the growth occurring between 1980 and 2000 and very little growth between 2000 and 2010.

In the 30 years between 1980 and 2010, the larger stable population of the Kalihi/Palama area balances out the higher rates of growth in the Downtown and Ala Moana/Kakaako areas so that the combined rate of growth is very close to the rate of growth county-wide. The combined population of the three NAs remains steadily at around 7.7 % of the population of the City.

-						
	1960	1970	1980	1990	2000	2010
Honolulu County	500,409	630,528	762,565	836,231	876,156	953,207
Neighborhood Area						
Kalihi/Palama NA#15			40,144	40,147	37,987	40,385
Ages 5-17			9,189	7,515	7,239	n/a
Downtown NA #13			8,674	11,752	14,570	14,662
Ages 5-17			806	1,214	1,315	n/a
Ala Moana/Kakaako NA#11			10,032	10,943	14,186	19,187
Ages 5-17			759	632	1,146	n/a
Total Kalihi to Ala Moana			58,850	62,842	66,743	74,234
Ages 5-17			10,754	9,361	9,700	n/a
Kalihi to Ala Moana NA share						
of Total Honolulu Population			7.72%	7.51%	7.62%	7.79%
Growth Trends						
	1960-	1970-	1980-	1990-	2000-	1980-
	1970 %	1980 %	1990 %	2000 %	2010 %	2010 %
Honolulu County	change 26.0%	change 20.9%	change 9.7%	change 4.8%	change 8.8%	change 25.0%
Neighborhood Area	20.070	20.970	9.170	4.070	0.070	23.070
Kalihi/Palama NA#15						
			0.0%	-5.4%	6.3%	0.6% n/a
Ages 5-17 Downtown NA #13			-18.2%	-3.7%	n/a	
Ages 5-17			35.5% 50.6%	24.0% 8.3%	0.6% n/a	69.0% n/a
Ala Moana/Kakaako NA#11						
Ages 5-17			9.1% -16.7%	29.6% 81.3%	35.3% n/a	91.3% n/a
Total Kalihi to Ala Moana			6.8%	6.2%	11.2%	26.1%
Ages 5-17			-13.0%	3.6%	n/a	n/a
			-13.070	5.070	11/a	п/а

TABLE 1Population Trends by County, Neighborhood Areas, and Age

Source: 2010 US Census; The State of Hawaii Data Book 2011, Hawaii State Department of Business, Economic Development and Tourism; City and County of Honolulu Department of Planning and Permitting Research Branch.

Table 2 lists the 2010 population of the 20 census tracts in the proposed impact district. Total resident population is 69,690. This would compare with the slightly larger population of 74,234 in the three combined NA described above.

2010 **# of Public** Total Public Resident Housing School School Students Tract # **Census Tract Name** population Units **Students** per 100 units 54 Mayor Wright 1,637 412 452 109.7 3,440 58 Waiakamilo 1.040 838 80.6 61 Kalihi Waena 4,175 864 674 78.0 62.01 Kam IV Road 6,047 1,536 1,066 69.4 60 Umi St. 5,421 1,336 684 51.2 Mokauea St. 59 3.353 687 301 43.8 55 Palama 2,078 640 252 39.4 56 Kapalama 6,749 1,909 700 36.7 53 Aala 3,636 1,544 391 25.3 52 Chinatown 3,293 1,595 334 20.9 51 Foster Botanic 3,090 1,586 292 18.4 36.04 Kaheka-Makaloa 2,519 1,532 17.8 273 57 Iwilei-Anuenue 2,148 935 16.9 158 36.01 Sheridan St. 4,109 2,153 300 13.9 36.03 Ahana St. 2,807 1,775 236 13.3 Kakaako 3,970 2,260 11.6 38 263 40 Central Business 1,552 941 87 9.2 42 Queen Emma 3,432 1,967 112 5.7 Ala Moana 5,579 3,659 37 205 5.6 39 Civic Center 655 242 9 3.7 Total 69,690 28,613 7,627 26.7

TABLE 2 2010 Resident Population, Housing, Housing Units and Public School Students by Census Tract, per 100 units

Source: 2010 Population and Housing Characteristics by Geographic Area, City and County of Honolulu Department of Planning and Permitting.

Population of School-Aged Children

The 2010 Census information in Table 2 provides the total number of public school students living in the 20 selected census tracts. The 7,627 public students make up roughly 11% of the resident population of the selected census tracts.

The 2010 DOE enrollment figures for the nine elementary schools whose service areas define the proposed district, the two middle schools that serve the area, and the two high schools was 9,614 students. The 2015 figure is 9,232 students.

Section 4. Population Projections

County-Wide

The City provides population projections for the County, Neighborhood Areas, and subsets of the population such as school-age children. Other population projections are offered by the State of Hawaii Department of Business, Economic Development and Tourism ("DBEDT"). Tables 3 and 4 provide City estimates for population growth from 2015 to 2035. The county-wide population growth is projected to be a steady gain over the next 20 years, with a total gain of a little more than 10%. The DBEDT provided projection of county-wide school age children indicates Honolulu children will increase at a slightly faster rate than the general population until the growth slows from 2030 to 2035. The percent of population growth predicted for school-age children in the 20-year span is almost 12%.

TABLE 3Population Projections for County, School-Age Children and
Kalihi to Ala Moana Neighborhood Areas, 2015 to 2035

	2015	2020	2025	2030	2035
Honolulu County Resident	941,847	969,467	994,632	1,017,576	1,038,317
Population					
Honolulu County School Age	143,340	148,410	154,440	159,690	160,100
Children 5 to 17	145,540	140,410	134,440	159,090	100,100
Kalihi-Ala Moana Neighborhood	7 0 2 00	05.105	00 5 60	05040	100 500
Areas Resident Population	79,390	85,137	90,560	95,843	100,789

Growth Trends

	2015-2020		2020-2	2025	2025-2	2030	2030-2035	
	5-year gain	% gain						
Honolulu County Resident	27.620	2.9%	25.165	2.6%	22.944	2.3%	20,741	2.0%
Population	27,020	2.9%	25,105	2.0%	22,944	2.3%	20,741	2.0%
Honolulu County School Age	5.070	3.5%	6.030	4.1%	5,250	3.4%	410	0.3%
Children 5 to 17	5,070	3.3%	0,030	4.1%	5,250	5.4%	410	0.3%
Kalihi-Ala Moana Neighborhood	5,747	7.2%	5,423	6.4%	5 292	5.8%	4,946	5.2%
Areas Resident Population	5,/4/	1.2%	5,425	0.4%	5,283	5.8%	4,940	5.2%

	2015-2035				
	20-year gain	% gain			
Honolulu County Resident	06 470	10.2%			
Population	96,470	10.2%			
Honolulu County School Age	16,760	11.7%			
Children 5 to 17	10,700	11.7%			
Kalihi-Ala Moana Neighborhood	21,399	27.0%			
Areas Resident Population	21,399	27.0%			

	2010 ^{1/}	2015	2020	2025	2030	2035	2040
Total resident population	955,775	976,190	1,003,710	1,029,410	1,052,130	1,071,220	1,086,710
By age group	,	,	, ,	, ,	, ,	, ,	· · ·
Population: 0 to 4 years	61,183	66,030	66,960	67,240	66,900	66,850	67,390
School Age Children: 5 to 11 years	80,508	78,310	83,590	87,440	88,020	87,710	87,490
School Age Children: 12 to 13 year	22,243	21,750	21,810	23,890	24,300	24,440	24,300
School Age Children: 14 to 17 year	47,479	43,280	43,010	43,110	47,370	47,950	48,020
Subtotal school age children	150,230	143,340	148,410	154,440	159,690	160,100	159,810
Population: 18 to 64 Years	604,033	601,400	596,470	588,420	582,600	585,730	593,900
Population: 65 Years and Over	140,329	165,420	191,860	219,310	242,950	258,540	265,600
Annual Growth Rates (%)							
		2010-2015	2015-2020	2020-2025	2025-2030	2030-2035	2035-2040
Total resident population		0.4	0.6	0.5	0.4	0.4	0.3
By age group							
Population: 0 to 4 years		1.5	0.3	0.1	-0.1	0.0	0.2
School Age Children: 5 to 11 years		-0.6	1.3	0.9	0.1	-0.1	-0.1
School Age Children: 12 to 13 years		-0.4	0.1	1.8	0.3	0.1	-0.1
School Age Children: 14 to 17 years		-1.8	-0.1	0.0	<u>1.9</u>	0.2	0.0
Subtotal school age children		-0.9	0.7	0.8	0.7	0.1	0.0
Population: 18 to 64 Years		-0.1	-0.2	-0.3	-0.2	0.1	0.3
Population: 65 years and Over		3.3	3.0	2.7	2.1	1.3	0.5

 TABLE 4

 Honolulu County Population Projections, Selected Components, 2010-2040*

Source: US Census Bureau, State of Hawaii Department of Business, Economic Development and Tourism.

*Projected values were rounded to the nearest ten

Impact Fee Area

More than 1/5 of the predicted growth for the City, from 2015 to 2035, is expected to come from the population of the three NAs from Kalihi to Ala Moana. Population is expected to grow from 79,390 to 100,789. The projected growth of roughly 5,000 to 5,700 people every five years is spread out evenly across the 20 years.

As an interesting side note, Table 4 illustrates what appears to be a baby boom of children born between 2010 and 2015. The annual growth rate of school-age children in that cohort is higher than all other groups of children through age 17. The far more significant trend illustrated in Table 4 is the growth of those 65 years and older. Sometime between 2010 and 2015, the number of those 65 years and older exceeded the number of school-age children and by 2040, the seniors are expected to outnumber school-age children by more than 100,000.

DOE School Enrollment

The DOE projects enrollment for all schools in its system every year for the next five years. The most recent enrollment projections for the schools within the proposed impact district are discussed on page 17. Those projections take into account some of the anticipated enrollment impacts of new residential development. However, the most recent projections up to the 2020-2021 school year do not take into account the impacts of any accelerated development in the areas surrounding the train stations.

Section 5. Projected Growth Within the School Impact District

The City has released six different Neighborhood TOD Plans that have each included what is identified as "development potential," additional residential units in each of the plan areas. In the City's plans for Kalihi, Downtown and Ala Moana, the potential "net new" units are 5,400 for Kalihi's three station areas; 5,900 for the three downtown station areas; and up to 9,638 units for the single Ala Moana Station.

The HCDA is responsible for the TOD plans for the two stations located within their Kakaako jurisdiction. Under the HCDA's TOD Overlay Environmental Impact Statement Scenario B, the maximum number of residential units in the redevelopment area is 26,588. By subtracting out the projects approved by HCDA, but not built, and the already occupied units, there is a potential to build an additional 17,970 units.

Midway in the preparation of this analysis, the DOE was informed of plans of the HPHA to redevelop many of its existing housing projects in urban Honolulu. A major part of the plans is to increase the number of units at each project. HPHA plans for Kamehameha and Kaahumau Housing in Kalihi would add up to 1,927 more units. Plans for development of HPHA's headquarters on School Street would include 1,000 residential units and plans for Mayor Wright Housing would add an additional 1,136 units.

So this analysis is based on more than just the City's maximum proposed number of permitted units surrounding each rail station. It also includes full build out of the HCDA-controlled areas of Kakaako and the plans for increased density at four different public housing projects. The total number of potential new units in the proposed school impact fee district would be 38,933. The general assumption is that all of these future units would be multi-family structures.

Timelines and Measures for Growth

The DOE is required in its impact fee district analysis to project school facility needs for the next 25 years.

The Neighborhood TOD plans currently under review look at a development span of 25 years. HPHA plans are expected to be executed in the next five years. DOE routinely projects enrollments for five years into the future. All planned development is linked to the completion of the rail line which is now expected to be fully operational in 2019. To use the best information available, certain assumptions have to be made about multiple estimated timelines.

This analysis seems to illustrate impacts as if all residential development were to take place at the same time. That would be a mistaken impression particularly in this district as we are relying on the City and HCDA plans for the maximum number of new units allowed. The DOE relies on more specific unit counts from residential developers in the analysis of other school impact districts.

The DOE used the most recent actual and projected enrollment figures, but they go out no further than 2020. The DOE also relies on the most recent survey of classroom capacity, the ARTS survey 2012-13 ("ARTS"), which is now three years old. All estimates of future enrollment growth take into account any estimated excess classroom space. Table 6 uses the ARTS numbers to determine net classroom need if all allowable development takes place.

The Kalihi to Ala Moana district analysis has to depend on early growth projections instead of specific project information that will eventually be revealed. However, the DOE cannot postpone establishing an impact district because of the far more complex nature of any future school space in a densely populated area where land ownership is scattered, parcels are small and land is expensive.

Basic Assumptions

The 2010 estimate of the population of the areas in the proposed school impact fee district is roughly between 70,000 and 74,000 depending on reliance of either census tracts or NAs. Population is estimated to grow by roughly 21,400 by 2035.

In 2010, the selected census tracts that fall into the proposed impact district boundaries have 28,613 or 30,507 housing units depending on data by census tract or NA.

The TOD, HCDA and HPHA plans indicate a development potential of 38,933 units in the Kalihi to Ala Moana TOD areas.

So while the general population is expected to grow by 21,000 by the year 2035, the number of residential units that could be approved within a half mile of the train stations would grow by almost 39,000. Clearly this discrepancy with more units permitted than the expected number of new residents will have to be addressed when population projections are updated and housing plans are refined.

Finally, the 2010 estimate of the number of school-age children in the selected census tracts related to the impact fee district is 7,600 students from kindergarten to 12th grade. The 2010 total enrollment in all DOE schools who service some portion of the proposed school impact fee district was 9,614. This mismatch is due to the areas each school serves. They not only serve areas close to the proposed train stations, they also serve some areas outside of the proposed

TOD zoning boundaries. This is particularly true of the high schools and middle schools whose service areas go from the coastline much farther inland than the rail line.

Projected Student Impact of Additional TOD Units

The student generation rate ("SGR") is the number of expected DOE students, on average, per unit within a particular area or development project. A SGR of 0.5 for a place or project would mean on average there would be 0.5 DOE students per unit, or 5 students per 10 units and 50 students per 100 units. The estimates try to capture the student rate when a project or area has reached a maturation point where the population of children stabilizes and the rate of resident turnover is constant.

Generally, a different SGR is determined for SF housing units (stand-alone) and MF (apartment and row house). It is generally assumed that MF housing will be developed near the urban Honolulu transit stations. MF is defined as units sharing common structural features like walls, floors or roofs. No SGR was determined exclusively for SF because it is assumed there will be so few built within the district that they will not significantly impact enrollments on their own. All housing in the district would pay the same fee per unit, derived from a formula using the MF SGR.

Another significant assumption needed in determining a SGR is the income level of the target market for the proposed housing. Luxury apartments and resort area projects are expected to generate fewer children per unit than middle-income or lower-income housing. Besides the price of a unit, the number of bedrooms in the unit will also impact SGRs.

Public housing has high SGRs because units with several bedrooms are designated for larger families. A building of studio apartments would generate very few students. Housing for senior citizens that prohibit school-age children has no school impact and is exempted by Act 245 from school impact fees.

For the purpose of calculating school impact fee amounts, the DOE proposes an initial total (kindergarten to 12th grade) SGR of .12 for the units to be built in the Kalihi to Ala Moana school impact fee district. That SGR covers TOD and HCDA proposed units. The .12 SGR translates into 12 DOE students for every 100 units built. The elementary SGR would be .06 for elementary schools, kindergarten through grade 5; the middle school SGR would be .03 for grades 6 through 8; and .03 for the high school SGR for grades 9 through 12.

To get a closer estimate of the number of students generated by the redevelopment of several urban public housing projects, this analysis uses a different SGR for HPHA projects. A SGR of 1.5 is being used for public housing units. That includes a rate of .75 for elementary students, .35 for middle school students, and .40 for high school students.

The .12 SGR will be used in the formula to determine Kalihi to Ala Moana fee amounts. It is much lower than the following SGRs for MF units in the West Maui (.18), Central Maui (.22) and Leeward Oahu (.37) school impact districts. Variables in the school impact fee formula

must be updated every three years. It is possible that the SGR will need to be refined and the fees would be adjusted accordingly.

After all planned units are occupied within the district, the total estimated number of additional students expected to reside in the Kalihi to Ala Moana school impact district is roughly 10,278 from kindergarten through grade 12. Table 5 provides a rough estimate of how the growth would be distributed across the district. The largest number of projected new students would attend schools currently located within the McKinley High School Complex.

 TABLE 5

 Kalihi to Ala Moana Proposed Housing Units and Number of Students Generated

Number of proposed addit	bitur			1		
		City & H Proposed		HPHA P Un	-	Total Prop Units
K	alihi	890 1,9		27	2,817	
Downt	own	10,410		2,1		12,546
Kaka	ako	17,97		0		17,970
Ala Mo		5,60		0		5,600
	otal	34,87		4,0		38,933
1	Juli	5-1,07	5	7,00		00,700
Student Generation Rate		TOD u	nits	Public H	ousing	
Elemen	tarv	0.06		0.	0	
	ddle	0.03		0.3		
	High	0.03		0.4		
	otal	0.03		1.		
1		mber of		nber of		make w
		Students			Total Nu of Stude	
Farrington Complex	100	Students	1 ubii	nousing	or stude	
Kalihi						
Elementary Students		53	1	,445	1,49	8
Middle School Students		27		674	701	
High School Students		27		771	798	
Total		107		2,890	2,99	
McKinley Complex					· · ·	
Downtown						
Elementary Students		625	1	,602	2,22	7
Middle School Students		312		748	1,06	0
High School Students		312		854	1,16	
Total		1,249	3	3,204	4,45	3
Kakaako						
Elementary Students		1,078			1,07	
Middle School Students		539			539	
High School Students		539			539	
Total Ala Moana	<u> </u>	2,156			2,15	U
Elementary Students		336			336	
Middle School Students		168			168	
High School Students		168	<u> </u>		168	
Total		672			672	
Subtotal for McKinley Complex						
Elementary Students		2,039	1	,602	3,64	1
Middle School Students		1,019		748	1,76	7
High School Students		1,019		854	1,87	
Total		4,077	3	3,204	7,28	1
Total for Kalihi to Ala Moana				0.45		
Elementary Students		2,092		3,047	5,13	
Middle School Students		1,046		,422	2,46	
High School Students		1,046		,625	2,67	
Total		4,184	6	5,094	10,27	0

* *DOE Policy* #6701: Maximum BOE design enrollment guidelines for new schools: 750 students for elementary schools; 1,000 students for middle schools; and 1,600 students for high schools

Table 6 applies the estimated additional student count to the current enrollment, classroom capacity, and short-term enrollment projections of the schools serving the area.

TABLE 6

Kalihi to Ala Moana District School Enrollment, ARTS Survey, Projected Enrollment, TOD Impacts, Classroom Space

		toric Iment	Average Annual Growth 2010- 2015	ARTS Results	ARTS less 2015 Enrollment	Projected Enrollment	Estimated Additional Students at Full TOD	Projected Average Annual Growth 2015- 2020p	ARTS less 2020 Projected Enrollment	Classroom Shortage After Full TOD
	2010	2015		2012		2020p				
Kalihi - Farrington Complex	-									
Elementary Schools										
Fern	497	505	2	582	77	560		11.0	22	
Kalihi Kai	605	587	-4	746	159	630		8.6	116	
Kallihi Waena	572	525	-9	562	37	630		21.0	-68	
Puuhale	234	238	1	275	37	258		4.0	17	
subtotal		1,855		2,165	310	2,078		44.6	87	
Proposed TOD Units of 2,817							1,499			-1,412
Middle Schools		•								
Kalakaua	956	989	7	1,174	185	902		-17.4	272	
Proposed TOD Units of 2,817							701			-429
High School	•		•	•						
Farrington	2,521	2,376	-29	2,227	-149	2,424		9.6	-197	
Proposed TOD Units of 2,817							798			-995
Downtown/Kakaako/Ala Moana - 1	McKin	lev Con	plex	1						
Elementary Schools		v	•							
Kaiulani	402	377	-5	510	133	420		8.6	90	
Kauluwela	366	365	0	522	157	365		0	157	
Likelike	351	352	0	476	124	386		6.8	90	
Kaahumanu	583	525	-12	623	98	564		7.8	59	
Royal	351	392	8	368	-24	380		-2.4	-12	
subtotal	001	2,011	0	2,499	488	2,115		20.8	384	
Proposed TOD Units of 36,116		2,011		2,177	100	2,115	3,641	20.0	507	-3,257
Middle Schools							5,041			0,201
Central	394	398	1	843	445	335		-12.6	508	
Proposed TOD Units of 36,116	374	570	1	045		555	1,767	12.0	200	-1,259
High Schools	I	1					1,707			1,207
McKinley	1,782	1,603	-36	2,012	409	1,541		-12.4	471	
Proposed TOD Units of 36,116	1,702	1,005	-30	2,012	402	1,541	1,874	-12.4	4/1	-1,403
Adjacent Schools	1	I	1	1			1,074			-1,405
Farrington Complex										
Elementary Schools										
Kapalama	668	572	-19	629	57	630		11.6	-1	
Lanakila	406	378	-1)	495	117	423		9	72	
Kaimuki and Roosevelt Complexes		570		-75	11/	-145	1	,	12	<u> </u>
Elementary Schools	~									
Lunaliho	486	402	-17	573	171	448		9.2	125	
Ala Wai	469	418	-17	610	192	460		9.2 8.4	125	
Lincoln	360	320	-10	571	251	363		8.6	208	
Middle Schools	500	520	-0	5/1	231	505	I	0.0	200	
Dole	756	800	9	1,008	208	743		-11.4	265	
Washington	817	845	6	1,008	365	743		-11.4	462	
High Schools	017	043	0	1,210	303	/48		-19.4	402	
i ngn Jenoois			-71		776	704		-7.4	813	
Kaimuki	1,094	741		1,517						

Kalihi Elementary Schools

The four elementary schools in the Farrington High School Complex have a 2015 enrollment of 1,855. The DOE's last survey of classroom space indicates space for a total of 2,165 students. The projected 2020 enrollment (without the impact of any TOD-related development) would be 2,078 students, leaving possible classroom space for an additional 87 students. The estimated elementary student impact of the additional TOD-related development is 1,499 students, so the net number of students above the existing capacity of the four schools is 1,412. This indicates a need for two additional elementary schools in the Kalihi area along with adjustments to attendance boundaries, or enlarging school classroom capacity.

Kalakaua Middle School

Kalakaua Middle School is projected to have excess classroom capacity for approximately 272 students in the 2020 school year. The expected middle student impact from proposed development would be 701 students. The balance of additional 429 students, when combined with the expected number of middle school students in adjacent Kapalama and Downtown areas, indicates the need for at least one new middle school between Kalihi and Iwilei.

Farrington High School

There is currently a classroom shortage of roughly 149 students at Farrington. Farrington's enrollment has declined the past five years, but that is expected to change over the next five years with a projected shortage of classroom space for roughly 200 students. The addition of 947 more students generated by TOD/HPHA development in Kalihi would not fill a new high school on its own, but could be combined with the number of high school students generated by proposed new housing in the McKinley complex area.

Downtown/Kakaako/Ala Moana Elementary Schools

The five elementary schools in the McKinley Complex have a combined 2015 enrollment of 2,011 students. There is a combined excess classroom space for approximately 488 additional students. In the 2020 school year, the combined excess space is projected to decline to 384. The projected impact of the new development would be 3,641 additional students. The net effect is a need to house more than 3,257 additional students, with two thirds of the new students in the Kapalama-School Street-Iwilei and Downtown areas, and one third in Kakaako. It would take approximately four new schools to handle that influx of students.

CentralMiddle School

Central Middle School currently has additional space for close to 445 additional students and projects excess capacity of 508 spaces in 2020. To serve all of the projected 1,767 additional students generated by the TOD developments, it would use all of its projected excess classroom capacity and there would still be a need for space for an additional 1,259 middle school students. If that need is combined with the need for additional middle school space at Kalakaua for 429 students, approximately one and a half middle schools are needed in the impact district.

McKinley High School

There is currently sufficient space for an additional 400 students at McKinley, and that number is expected to stay roughly the same to 2020. The rail and redevelopment impact is projected to be 1,873 additional students. So the projected need for high school classroom capacity in the

McKinley service area is roughly 1,400 students, which is more significant than the need for high school classroom space for 995 students at Farrington. The combined need across the district is for an additional 2,398 high school students, enough for one and a half schools.

The Overflow Capacity of Neighboring Schools

Table 6 also illustrates the limited number of elementary students that might be accommodated by other Kalihi area schools adjacent to the school impact district. Map 3 identifies the schools adjacent to the district. There is also some space in schools adjacent to the Kakaako/Ala Moana end of the impact district. These schools are no longer in the McKinley complex of schools and would involve long commutes for all but the students in the Ala Moana TOD developments.

Dole Middle School could supply some relief to crowded conditions at Kalakaua Middle, and Washington Middle could relieve Central. Currently, Washington Middle serves portions of Kakaako and most of the Ala Moana areas.

The combined impact of TOD development on Farrington and McKinley of more than 2,400 high school students beyond the 2020 projected classroom capacity of the schools seems to call for an additional high school facility somewhere between Farrington and McKinley. Roosevelt High School does not appear as if it will have any significant excess classroom capacity. Kaimuki High School currently has excess capacity and will continue to have capacity in 2020 although its enrollment could grow due to considerations about moving the Kaimuki High service area farther to the east.

Section 6. Conclusion

Over the next 30 years, new residential development around the transit stops from Middle Street to Kalakaua Avenue could generate a maximum of roughly 10,000 additional students to an area that currently serves 9,000 students.

The additional students cannot be solely accommodated by excess classroom space in existing schools. In 2015, the schools currently serving the transit stop area had the capacity to accommodate approximately 1,700 more students, K-12. By 2020, without including any rail development, the amount of excess capacity is expected to decrease to 1,500.

According to the current BOE guidelines for new school sizes, an influx of an additional 8,500 students would require approximately six new elementary schools, one and a half middle schools, and one and a half high schools.

Potential New School Sites

The growth of new schools and school enrollment has followed the massive tide of suburban expansion that describes residential growth in Hawaii since statehood. New schools were built where new houses were being built, facilitated by the need for developers of large-scale projects to provide school sites. Future school sites are still being secured within planned, large-scale residential developments. However, there are very few large-scale developers identified in the urban core between Kalihi and Ala Moana.



Map 3: Identification of Schools Adjacent to the Kalihi to Ala Moana Impact Fee District

<u>Appendix A</u> Enrollment at Kalihi to Ala Moana Schools

Historic Enrollment 1980 to 2010

There is a general assumption that schools located in older neighborhoods have declining enrollment due to the aging of the general population in the area. There is a further assumption that should leave sufficient school capacity for any new residential development. The assumptions held true for the Kalihi to Ala Moana impact district area in the past, but they may not apply in the future. Table A-1 provides the enrollment activity.

The schools in the impact district have seen enrollment declines in the 30 years from 1980 to 2010, but there has been a change in the enrollment pattern in the past five years, from 2010 to 2015, and the new pattern is expected to continue through 2020.

DOE makes an annual enrollment projection for each school in the system for the next five years. The projections rely mostly on the historic enrollment patterns of each school, but in areas undergoing significant residential growth, the student enrollment impact of the new development is taken into account. DOE does not anticipate a significant amount of enrollment growth due solely to new dwelling units between 2015 and 2020. The greater amount of growth is expected to follow the actual occupancy of many projected units, sometime after 2020.

The six schools in the Farrington Complex that make up the impact district lost 1,261 students from 1980 to 2010, a decline of close to 19%. The seven schools in the McKinley Complex lost 1,548 students, a 27% decline during the same period. It is important to look at the total enrollment losses across the 30 years. The total loss across the 13 selected schools for 30 years is roughly seven students per year, or an annual average decline of .75%.

Enrollment 2010 to 2015

In the past five years, enrollment for many of the selected schools has changed direction. There was enrollment growth in four of the nine impact district elementary schools from 2010 to 2015. The two middle schools serving the district, Kalakaua and Central, had small enrollment gains. The two high schools, Farrington and McKinley, continued to lose students in the past five years and at a higher annual rate than the 30 years prior.

Enrollment Projection 2013 to 2020

The 2015 DOE enrollment projection for the 2020-21 school year anticipates enrollment growth for seven of the nine elementary schools. The numbers of additional students seem small, but they represent annual growth rates of between 1.4% and 2.3%. In the next five years, both middle schools are expected to decline in enrollment along with McKinley High. Farrington High is expected to see an enrollment increase, but at an annual growth rate of .4%, much smaller than the elementary schools.

Table A-1

Historical and Projected Enrollment, Kalihi-Ala Moana School Impact District: Farrington and McKinley Complexes

			30 Year		5 Year	2020	5 Year
	1980	2010	Change	2015	Change	S chool	Projected
	School	School	1980 -	School	2010 to	Year	Change
School Name	Year	Year	2010	Year	2015	Projected	2015 - 2020
Farrington Complex	5(0)	407	(2)	505	0	5(0)	55
Fern Elementary	560	497	-63	505	8	560	55
Kalihi-Kai Elementary	1,048	605	-443	587	-18	630	43
Kalihi Waena Elementary	704	572	-132	525	-47	561	36
Puuhale Elementary	409	234	-175	238	4	258	20
Elementary Subtotal	2,721	1,908	-813	1,855	-53	2,009	154
Annual Rate of Change			-1.0%		-0.6%		1.7%
Kalakaua Middle	1,357	956	-401	989	33	902	-87
Farrington High	2,568	2,521	-47	2,376	-145	2,424	48
Total	6,646	5,385	-1,261	5,220	-165	5,335	115
Total Annual Rate of Change			-0.6%		-0.6%		0.4%
McKinley Complex							
Kaahumanu Elementary	786	583	-203	525	-58	564	39
Kaiulani Elementary	434	402	-32	377	-25	420	43
Kauluwela Elementary	636	366	-270	365	-1	365	0
Likelike Elementary	541	351	-190	352	1	386	34
Royal Elementary	408	351	-57	392	41	380	-12
Elementary Subtotal	2,805	2,053	-752	2,011	-42	2,115	104
Annual Rate of Change			-0.9%		-0.4%		1.0%
Central Middle	465	394	-71	398	4	335	-63
McKinley High	2,507	1,782	-725	1,603	-179	1,541	-62
Total	5,777	4,229	-1,548	4,012	-217	3,991	-21
Total Annual Rate of Change			-0.9%		-1.0%		-0.1%

<u>Appendix B</u> How the Impact Fee Formula Works

School impact fees consist of a construction fee and a land fee. The land fee is paid by land dedicated from a residential developer or a fee in lieu. The fee amounts are based on the development's proportionate share¹ of the need to build additional public school facilities. Each new residential unit in a district pays the same fee. The number of units each developer builds determines the total amount of fees paid.

For the Kalihi to Ala Moana district, the Department of Education ("DOE") is relying on the flexibility provided in the school impact fee law for "non-traditional facilities" in existing urban areas to modify the impact fee formula. Where the law aims to provide the same average acreage per student provided in the most recent schools built by the DOE across the state; the urban exception is to rely on actual average acreage per student within the 13 schools that comprise the Kalihi to Ala Moana district. The difference between acres per student in recent schools statewide and existing schools in the proposed district can be seen by comparing Table B-1 and Table B-2 on the following page.

DOE will make another urban exception in the Kalihi to Ala Moana district of not making a distinction between single-family ("SF") and multi-family units ("MF"). There will be so few SF units built that the MF fee formula will apply to all units. All units will be referred to as units and will be treated the same in calculating the fee amount.

Land Component

The amount of school land required from developers is based on the following three variables:

- 1) Projected number of new students generated within the Kalihi to Ala Moana impact district;
- 2) The number of dwelling units in the development; and
- 3) The average acreage per student.

The projected number of new students is determined by multiplying the proposed district's Student Generation Rate ("SGR") by the amount of proposed new units. That number is then multiplied by the average acres per student to arrive at the total school land requirement for a particular development.

Based on the DOE's most recently constructed schools in each school type across the state, the school acreage per student figures are shown in Table B-1.

¹ In determining proportionate share, new developments shall be charged for a level of service that is equal to, and no higher than, the current level of service that is being provided to existing residential areas. Level of service is defined by Act 245 to be the percentage of classrooms that are located in permanent structures, but not including classrooms located in portable buildings.

Recent Schools Built Across the State	Total Acreage of All Recent Schools	Total Design Enrollment of All Recent Schools	Acres Provided to Each Student
5 Elementary Schools			
(2004-2013)	65.63	3,350	0.0196
3 Middle Schools			
(1999-2011)	52.95	3,600	0.0147
3 High Schools			
(1997-2000)	144.34	4,930	0.0293

 Table B-1

 Average Acres per Student Based On Recent School Construction

Source: Hawai`i School Impact Fee Working Group Report, March 2007 and DOE Data

In contrast to the DOE's newest schools, the 13 older schools in the impact district currently provide less acreage per student. The urban schools provide an average acreage per student that is 39% less at the elementary level, 15% less at the middle school level and 38% less at the high school level.

	Total Acreage of All Area	Total 15-16 Enrollment of All Area	Acres per
Schools in the District	Schools	Schools	Student
0 Elementery Schoole	46.123	3,866	0.0119
9 Elementary Schools	+0.125	5,000	0.0117
2 Middle Schools	17.275	1,387	0.0115

 Table B-2

 Average Acres per Student for Schools in the Proposed District

Source: Hawai`i School Impact Fee Working Group Report, March 2007 and DOE Data

School Land Formula

To calculate the land dedication requirement for an individual project, the acres per student required for elementary, middle and high school is each multiplied by the total number of units in the project. The results are then added together for the total acreage required from each unit in the project. This is shown in Table B-3.

According to the urban exception to the land formula above, the amount of school land required to accommodate new students in the impact district is 0.1632 acres for every 100 dwelling units. If the statewide average acreage per student were used, the school land required would be .250 acres for every 100 units. The total amount of school land required by the formula for the 38,933 proposed units in Kalihi to Ala Moana district is 63.5 acres.

School Type	(1) Kalihi-Ala Moana SGR	(2) Number of Units per Project	(3) Avg. Acres per Student	Land fee in Acres for 1 Unit	Land fee in Acres for 100 Units
Elementary	0.06	1	0.0119	0.000714	0.0714
Middle	0.03	1	0.0125	0.000375	0.0375
High	0.03	1	0.0181	0.000543	0.0543
Acreage for Kalihi to	Ala Moana Propos	sed Units		0.001632	.1632

 Table B-3

 Calculating the Land Cost Component of the School Impact Fees

Fee-in-Lieu of Land

If the DOE determines it does not need land, it will notify a developer of a need for a fee-in-lieu of land.

The dollar amount of the fee-in-lieu of land is determined using the following formula: the total school land requirement multiplied by the value per acre of potential future school sites. The value is based on the appraised fair market value of improved land that allows residential development, with all necessary infrastructure improvements. The DOE had appraisals conducted for the value land within the impact district's areas, including land located in Ala Moana and Kalihi. These appraised values were adjusted for the average size of each type of school in the district. The fee-in-lieu values are shown in Table B-4.

School Type	Value Per Acre From Appraisal	Land Fee Per Unit (Acres)	Fee-in- Lieu Per Unit		
Elementary	\$7,171,217	0.000714	\$5,120		
Middle	\$4,755,124	0.000375	\$1,783		
High	\$3,475,429	0.000543	\$1,887		
Total Fee-in-Lieu of Land per Unit\$8,790					

Table B-4Fee-in-Lieu of Land

School Construction Component

Developers are also required to provide 10% of all new school construction costs generated by their project.

The construction cost impact fee is based on the following five variables:

- 1) SGR for the Kalihi to Ala Moana Impact District;
- 2) Recent statewide public school construction costs per student;
- 3) The statewide percentages of students in permanent school facilities;
- 4) The Department of Accounting and General Services' ("DAGS") construction cost factor for each of Hawaii's 26 geographically defined cost districts; and
- 5) The number of units in the development.

SGRs were discussed earlier in this document. Recent public school construction costs per student are from the 2007 *Hawaii School Impact Fee Working Group Report*, with the addition of four schools built between 2007 and 2013. Public school construction costs have been escalated from 2006 to December 2013 using the Engineering News Record Construction Cost Index and adjusted for revised construction cost factors as specified by DAGS. The construction cost factor is 1.0 for urban Honolulu. The list of DAGS construction cost factors can be found in Appendix E.

Level of Service: Permanent and Portable Classrooms

The statewide percentage of permanent classrooms to all classrooms is below. In the case of schools with grades of K-8, K-12, or 6-12, the classrooms were pro-rated based on six elementary school grades, three middle school grades, and four high school grades. For example, if a K-8 school had nine permanent classrooms and three portable classrooms; six permanent classrooms and two portable classrooms would be treated as elementary school classrooms, and three permanent classrooms and one portable classroom would be treated as middle school classrooms. Act 245 (2007) defines "level of service" as the percentage of classrooms that are in permanent structures, as opposed to portable buildings. Table B-5 calculates the "Level of Service" used the calculation of construction fees.

	Permanent Classrooms	Portable Classrooms	Total Classrooms	Percentage of Classrooms that are Permanent
Elementary	4,894	988	5,882	83%
Middle	1,829	236	2,065	89%
High	2,483	443	2,926	85%
Total	9,206	1,667	10,873	85%

 Table B-5

 Statewide Permanent and Portable Classrooms

Source: DOE Data, ARTS Survey 2012-2013

Impact fees cannot be used to provide a higher level of service than is already being provided. Impact fees must be based on a level of service standard that "shall apply equally to existing and new public facilities."²

² Hawaii School Impact Fee Working Group Report, Duncan and Associates and Group 70 International, Inc., March 2007, page 44.

The Construction Fee Formula for Each Unit

The formula is as follows:

Elementary SGR per unit multiplied by (x) elementary school cost per student (x) percentage of existing elementary students in permanent buildings (x) construction cost district factor;

plus (+) Middle SGR per unit (x) middle school cost per student (x) statewide percentage of existing middle school students in permanent buildings (x) cost district factor;

plus (+)

High school SGR per unit (x) high school cost per student (x) statewide percentage of existing high school students in permanent buildings (x) cost district factor;

equals (=) school construction cost per unit.

The school construction cost per unit (x) 10% = construction fee amount.³

The construction cost per unit for elementary, middle and high schools is added together and then multiplied by the number of residential units proposed.

Table B-6 illustrates the formula as it applied to the Kalihi to Ala Moana district. Total construction fee per unit is \$584.

Table B-6 Calculating the Construction Cost Component of the School Impact Fees: Kalihi to Ala Moana

School Type	Kalihi to Ala Moana SGR	Recent School Construction Costs per Student	Discounted by the Percent of Statewide Classrooms in Permanent Structures	Construction Cost Factor for Honolulu	Number of Units in the Project	Construction Costs per Unit	10% of Cost = Fee Amount
Elementary	0.06	\$48,084	.83%	1.0	1	\$2,395	\$240
Middle	0.03	\$52,928	.89%	1.0	1	\$1,413	\$141
High	0.03	\$79,401	.85%	1.0	1	\$2,024	\$203
Total Construction Cost per Unit							

³ Act 245 (§302A-1605, Hawaii Revised Statutes) states that the fee for construction shall be 10% of the construction cost per unit.

An Estimated Total of Impact Fees for the District

Based on the foregoing analysis, in the proposed Kalihi to Ala Moana impact district there would be a maximum of 38,933 additional residential units and 10,278 new public school students. The additional residential development would generate a total of 63.5 acres in land fees and \$22.7 million in construction impact fees.

An Illustration of the Board of Education Policy

Table B-2 sets the average acreage per student in the 13 schools that make up the impact district. That is the basis for calculating the land component of the Kalihi to Ala Moana impact fee. To illustrate how the Kalihi to Ala Moana formula compares to the general Board of Education ("BOE") policy for future schools, the last two tables are added. The BOE policy reflects a range of school sizes, including campus acreage and number of students.

The average acreage per student by BOE policy (Table B-7) is larger than the average acreage in the proposed district (Table B-2).

	Usable ⁴ Acres per School	Enrollment per School ⁵	Acres per Student	Average Enrollment Range
Elementary	8-15	400 - 750	.02	575
Middle	15-20	500 - 1,000	.0203	750
High	45-55	800 - 1,600	.03430562	1,200

Table B-7BOE Policy on Acreage and Enrollment

The final table (Table B-8) illustrates the impact of the projected TOD-related school enrollment growth if no urban exception was taken for the amount of land needed. Table B-8 provides a look at the projected growth as if it were located in a suburban or vacant, former agricultural area.

Table B-8 also applies the BOE policy assuming maximum build-out, meaning 100% of all proposed units were constructed. The additional enrollment would require between 10 to 21 new schools, with a total land requirement of approximately 283 acres.

The calculation in Table B-8 assumes all additional students will be housed in new schools, which is unlikely. Some students will attend existing schools that may be enlarged to accommodate growth in enrollment. Act 245 allows impact fees to be used for the expansion of existing schools in an impact district.

⁴ *DOE Policy #6701;* Usable is generally defined as land free of encumbrances determined to be unnecessary by the department of education, slope of five percent or less, with no ravines or stream beds. The DOE will make the final determination as to whether land is usable based on an evaluation of the specific property taken in the context of the development as a whole.

⁵ *DOE Policy #6701:* Design enrollment guidelines for new schools, elementary, middle and high schools

Table B-8 BOE Policy on Number of Schools Required: Minimum, Maximum and Average Size Schools

	# of Additional Students Expected in the District	# Schools Based on Minimum Enrollment (400, 500, 800) ⁵	# Schools Based on Maximum Enrollment (750, 1000, 1600)	# Schools, Based on Average Enrollment (575, 750, 1200)	Acres per Student	Acres Needed (Approx.)
Elementary	5,139	12.9	6.9	8.9	0.020	103
Middle	2,468	4.9	2.5	3.3	0.023	57
High	2,671	3.3	1.7	2.2	0.046	123
Total	10,278					283

<u>Appendix C</u> Requirements of the School Impact Fee Law

Rational Nexus and Rough Proportionality

Proposed impact fees must meet the "rational nexus" and "rough proportionality" tests established by court decisions.

"Rational nexus" was defined in the case of *Nollan v. California Coastal Commission*, 483 U.S. 825 (1987), as the reasonable connection that must exist between new development and the new or expanded facilities required to accommodate that development. "Rough proportionality" was defined in the case of *Dolan v. City of Tigard*, 512 U.S. 374 (1994), as an expansion of the rational nexus test, adding that there must be a "rough proportionality" between the impact of the new development and burden of the exaction imposed on it.

In this analysis, the required additional public school facilities are a direct result of the anticipated growth in additional residential units and their generation of additional public school students. The proposed Kalihi to Ala Moana school impact district anticipates a maximum of 39,000 new residential units, which could generate 10,000 additional new public school students. To accommodate that great an increase in enrollment, several new schools will need to be developed along with the expansion of existing campuses.

Both the land and construction cost requirement of the school impact fee ensure the proportionality of the fees paid by each new development. The acreage requirements for new school facilities are based on the actual acreage of those schools currently making up the Kalihi to Ala Moana proposed district. The cost of the land, when used to determine the fee in-lieu amount, is the fee simple value of vacant land in the impact district that would be zoned for Business Mixed Use (BMX) which allows residential use. Construction fees are based on actual historical school construction costs.

Each development pays the same fee amount per unit, and the fees can only be used to expand school capacity in facilities serving the students in the impact district.

Current Local Level of Service

Table 6 (page 17) provides information about existing and projected conditions in DOE schools located within the proposed district as well as schools in adjacent areas. The elementary schools in the proposed district range from having 24 students over current classroom capacity to 159 under capacity in the 2015-2016 school year. The middle schools have the more excess capacity, ranging from 158 to 445 classroom spaces for additional students. Farrington High School is currently over capacity by 149 students and McKinley is 409 students under. Table C-1 summarizes the information by school type.

School Type	School Capacity Survey: ARTS 12-13	Enrollment 2015-16	% of Existing Capacity
9 Elementary Schools	4,664	3,866	83%
Middle	2,017	1,387	69%
High	4,239	3,979	94%
Total	10,920	9,232	85%

 Table C-1

 2013-2014 Enrollment and 2012-2013 Classroom Capacity by School Level

Table 6 also illustrates a classroom shortage for approximately 7,300 students after the approximately 10,000 TOD-related students are added to the current projected 2020 enrollment.

Related Issues

The School Impact Fee Law requires a statewide classroom utilization report, which contains the current design enrollment per school (defined in the law as permanent classrooms, not portables), the current total student enrollment per school, and the current number of classrooms not being used for active teaching. That data can be found in Table D-1.

Table D-1 addresses the possibility of underutilized school facilities. In the 13 schools serving the proposed Kalihi to Ala Mona School Impact District, there were 19 classrooms not being used for teaching or school functions, one third of those rooms were located at Central Middle.

Busing and Redistricting to Relieve Overcrowded Schools

The School Impact Fee Law also requires an analysis of proposed redistricting; listing the advantages and disadvantages by making more efficient use of existing assets.

While redistricting is possible between schools and complexes in the impact district, this would have no effect on the amount of capacity available to students generated from the district. As discussed above, there are very few school facilities in the proposed district that are not being used for instruction or school-level supplemental and support functions.

Redistricting schools within the impact district with schools outside of the impact district is possible. However, the schools adjacent to the impact district do not have enough excess capacity to accommodate the large number of students projected for the district. At projected 2020 enrollment, with the ARTS 2012-13 survey results for classroom capacity, at most 2,200 students could be accommodated by redistricting. As stated above, there are very few classrooms being utilized for non-school level functions within the schools in the proposed impact district, so redistricting would have a very limited effect.

Busing students would create a costly operational expenditure to the DOE at a time when it has reduced its bus services. Similar to redistricting, students would need to be bussed outside of the impact district for there to be any significant reduction in the amount of additional space needed.

As discussed above, the schools in the complexes adjacent to the impact district do not have enough capacity to accommodate the large number of students projected in the District.

School Design Issues

The Act 245 requires an analysis of appropriate school land area and enrollment capacity, which may include non-traditional (i.e. mid-rise or high-rise structures) facilities to accommodate the need for public school facilities in high growth areas within existing urban developments.

The proposed fees for the Kalihi to Ala Moana District rely on two different adaptions for its urban setting. First there is a localized adjustment for campus size (using acreage of existing schools in the district as opposed to recent, average new campus sizes across the state). Second, there will be an urban adjustment that will require amending the Act 245 to permit funds collected as fees in lieu of land to be used to acquire and construct improved classroom space in multi-story buildings. In other words, land fees will be used to buy square footage of vertical space, layers one floor above another.

There are advantages of both single-story and multi-story school construction. Single-story construction eliminates the cost of stairwells and elevators, is more residential in character, and makes it easier to utilize natural light. The main advantage of multi-story schools is that they require a smaller footprint on the site, which allows for smaller sites and/or more open space on a site. Multi-story construction also facilitates stacking of utilities and shorter utility lines.

The DOE encourages the preservation of open space on its school sites, and therefore strongly supports the use of multi-story structures when appropriate. Typically, this has resulted in the stacking of the classroom buildings. Ten of the last 15 schools built by DOE have had multi-story classroom facilities.

The DOE is open to considering non-traditional designs and varying campus sizes for new schools within the proposed impact district. The DOE cannot compromise school size to such a degree that schools are unable to handle the number of students estimated in the area.

Geographic Exceptions

There are numerous reasons why parents request geographic exceptions ("GE") so their children are able to attend schools outside the service area where they reside. The DOE administrative rules⁶ govern the method of granting a student a GE. The decision to grant or deny GE's belongs solely with the principal of each school.

The SGR for the proposed impact district is based on students who attend DOE schools in the impact district and who also live in the impact district. The SGR excludes students who live in the impact district and attend a school outside of the impact district, and it also excludes students who live outside of the impact district and who attend a school inside the impact district.

⁶ Hawaii Administrative Rules, Title 8, Chapter 12, Compulsory Attendance Exceptions

Very little data exists on the number of students applying or receiving GEs at individual schools, at the complex level, or statewide, but the numbers are generally small. Every school probably has some outside students coming in to attend that school as well as some students from the area going to schools outside the area. The net effect of GEs on enrollment at most schools is minimal. The number of GE students at individual schools can fluctuate year to year by the actions of one or two families.

When a school is crowded or faces the likelihood of overcrowding, a principal can decide not to accept any GE applications. However, any student residing in the school's service area must be allowed to enroll.

The rules of the federal government's No Child Left Behind Act⁷ permit students from failing schools to transfer to schools in good standing. There have been very few requests for transfers based on the federal act.

Charter Schools

Act 245 is silent as to whether impact fees can or cannot be used for charter schools. The intent of the impact fee is to provide school facilities for the students generated by the new residential projects that will pay the fees. Therefore, school impact fees may be utilized for charter schools, provided that school directly serves a sufficient amount of students generated from new development in the area. A charter school can enroll students from around the island, but to use impact fees, it would have to provide a specified number of spaces to offset the enrollment impact of the developments creating the need for a school.

Use of Public Land

The primary consideration in determining where to locate a new public school is convenience to public school students. New schools should be located where there will be large numbers of new homes. The DOE locates schools on a case-by-case basis as it negotiates with large landowners, both private and public, and DOE adapts to their development schedules. In the future, it is more likely that larger high school sites will come from state-owned land, as few private development projects are large enough to be required to provide 45 to 55 acres for a high school.

In the past, DOE has used state land for public schools in situations where large amounts of state land are developed for residential use. For example, all of the schools in the Kapolei (Oahu) and Kealakehe (Hawai`i Island) developments were built on state lands. The State of Hawaii retains the fee simple ownership of the property. The management, use and responsibility for school land transfers from the State to the DOE by executive orders from the Governor.

The DOE will continue to seek school sites in any future large development of state land in the same manner as DOE pursues school sites in large developments of private land. Future school sites are reserved in state developments in East Kapolei (Oahu), Keahuolu (Kealakehe), and Lei`alii (Lahaina).

⁷ Public Law 107-110

It is less likely that DOE will receive state parcels that stand alone (without infrastructure improvements), outside of state projects. While private developers provide school sites with infrastructure, if DOE were provided a stand-alone state parcel, the additional costs for improving the school site would most likely be borne by taxpayers.

Appendix D Act 188 Specified Classroom Report

Act 188 (2010) requires the inclusion of a "statewide classroom utilization report" in this analysis. The report includes the current "design enrollment per school", the current total enrollment per school, and the current number of classrooms not being used for active teaching. Design enrollment is specifically defined in Act 188 as "the maximum number of students, or student capacity, a permanent school facility is designed to accommodate."

In Table D-1 below, the design enrollment column will only consist of permanent classroom buildings. In general, a permanent elementary school classroom holds 23 students, and a permanent middle or high school classroom holds 25 students. For example, if an elementary school had ten permanent classrooms, its design enrollment is 230.

For schools with both elementary and middle or high school students, classrooms are pro-rated based on six elementary school grades, three middle school grades, and four high school grades.

For example, an elementary and middle school has nine permanent classrooms. These classrooms are pro-rated based on six elementary school grades and three middle school grades. Six elementary classrooms hold 138 students, and three middle school classrooms hold 75 students, for a total design enrollment of 213.

Design enrollment, as specified by Act 188, differs significantly from school facility capacity calculations because, among other issues:

- 1. Facility capacity is modified for classrooms used for special education. Special education classrooms generally have significantly fewer students than regular education classrooms.
- 2. Facility capacity includes temporary classroom facilities. Act 188 design enrollment only consists of permanent school facilities.
- 3. Facility capacity includes adjustments based on program usage.

Classrooms not used for teaching, school level support, or school-level supplementary programs include classrooms that are used for complex and state offices and programs.

Classroom use data in the following table is from the Annual Room Tracking Survey ("ARTS") for the 2012-2013 school year. Those schools with an * in the classroom use column rely on the 2011-2012 ARTS survey.

				01
				Classrooms
				Not Used for
				Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Aiea Elementary School	Aiea	366	759	4
Aiea High School	Aiea	1,083	1,825	4
Aiea Intermediate School	Aiea	593	1,075	0
Alvah Scott Elementary School	Aiea	521	920	0.67
Pearl Ridge Elementary School	Aiea	613	506	0
Waimalu Elementary School	Aiea	522	690	2
Webling Elementary School	Aiea	490	598	0
Baldwin High School	Baldwin	1,538	1,675	4
lao School	Baldwin	886	897	0
Waihe'e Elementary School	Baldwin	775	736	0
Wailuku Elementary School	Baldwin	740	1,173	1.5
Campbell High School	Campbell	2,890	2,675	0
Ewa Beach Elementary School	Campbell	778	828	0
Ewa Elementary School	Campbell	1,131	897	3
Ewa Makai Middle School	Campbell	827	700	1.84
Holomua Elementary School	Campbell	1,361	920	0
Ilima Intermediate School	Campbell	887	1,518	7.5
Iroqouis Point Elementary School	Campbell	758	828	3.5
Kaimiloa Elementary School	Campbell	690	644	2
Keone'ula Elementary School	Campbell	917	828	0
Pohakea Elementary School	Campbell	605	690	2
Ahuimanu Elementary School	Castle	330	506	1
Castle High School	Castle	1,200	1,925	1
He'eia Elementary School	Castle	467	828	4
Kahaluu Elementary School	Castle	293	552	0
Kaneohe Elementary School	Castle	648	805	1
Kapunahala Elementary School	Castle	578	690	0
King Intermediate School	Castle	627	1,450	17
Parker Elementary School	Castle	324	966	8
Puohala Elementary School	Castle	272	690	7
Waiahole Elementary School	Castle	71	276	1
Dole Middle School	Farrington	841	1,225	*1
Farrington High School	Farrington	2374	3,150	2
Fern Elementary School	Farrington	530	667	2
Ka'ewai Elementary School	Farrington	345	690	*2
Kalakaua Middle School	Farrington	1040	1,250	0
Kalihi Elementary School	Farrington	315	690	4
Kalihi Kai Elementary School	Farrington	627	1,035	2
Kalihi Uka Elementary School	Farrington	259	575	0
Kalihi Waena Elementary School	Farrington	583	759	*0
Kapalama Elementary School	Farrington	633	851	0
Linapuni Elementary School	Farrington	191	368	0
Puuhale Elementary School	Farrington	262	437	*2

Table D-1 Classroom Utilization

	om Utilizatio	1		~
				Classrooms
				Not Used for
				Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Hana High & Elementary	Hana	336	525	0
De Silva Elementary School	Hilo	429	414	0
Ha'aheo Elementary School	Hilo	183	184	0
Hilo High School	Hilo	1,249	1,925	*3
Hilo Intermediate School	Hilo	466	1,400	17
Hilo Union School	Hilo	487	759	2
Kalaniana'ole Elementary and Intermediate School	Hilo	295	1,089	10
Kapiolani Elementary School	Hilo	376	713	0
Kaumana Elementary School	Hilo	292	299	0
Keaukaha Elementary School	Hilo	407	483	6
Honoka'a Elementary School	Honokaa	373	483	0.7
Honokaa High and Intermediate School	Honokaa	676	1,200	1
Paauilo Elementary school	Honokaa	243	355	0
Waikoloa Elementary & Middle School	Honokaa	807	757	0
Waimea Elementary School	Honokaa	569	805	2.25
Waimea Middle-PCS	Honokaa	284	475	0
Hauula Elementary School	Kahuku	308	506	3
Kaaawa Elementary School	Kahuku	124	92	0
Kahuku Elementary School	Kahuku	493	667	0
Kahuku High and Intermediate School	Kahuku	1,464	1,875	0
Laie Elementary School	Kahuku	686	736	2
Lanikai PCS	Kahuku	352	345	0
Sunset Beach Elementary School	Kahuku	477	161	0
Enchanted Lake Elementary School	Kailua	510	874	1
Kaelepulu Elementary School	Kailua	193	368	0
Kailua High School	Kailua	798	1,925	3
Keolu Elementary School	Kailua	144	598	4
Maunawili Elementary School	Kailua	384	690	1
Olomana School	Kailua	91	0	0
Pope Elementary School	Kailua	235	598	0
Waimanalo Elementary and Intermediate School	Kailua	536	1,041	0
Ala Wai Elementary School	Kaimuki	455	782	1
Aliiolani Elementary School	Kaimuki	253	644	1
Hokulani Elementary School	Kaimuki	373	483	0
Jarrett Middle School	Kaimuki	264	-950	4
Jefferson Elementary School	Kaimuki	465	943	2
Kaimuki High School	Kaimuki	813	2,175	8
Kuhio Elementary School	Kaimuki	287	575	1
Lunalilo Elementary School	Kaimuki	488	851	0
Palolo Elementary School	Kaimuki	295	897	16
Washington Middle School	Kaimuki	794	1,450	0
Aina Haina Elementary School	Kaiser	609	736	1
Hahaione Elementary School	Kaiser	541	828	0
Kaiser High School	Kaiser	1168	1,500	

Table D-1 (continued) Classroom Utilization

	1			Classrooms
				Classrooms
				Not Used for
		2012 14	Destau	Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Kamiloiki Elementary School	Kaiser	435	736	0
Koko Head Elementary School	Kaiser	357	851	14
Niu Valley Middle School	Kaiser	891	950	0
Aikahi Elementary School	Kalaheo	498	690	1
Kailua Elementary School	Kalaheo	370	713	0.5
Kailua Intermediate School	Kalaheo	693	1,550	5
Kainalu Elelmentary School	Kalaheo	546	966	3
Kalaheo High School	Kalaheo	908	1,650	2
Mokapu Elementary School	Kalaheo	921	851	1
Kahala Elementary School	Kalani	454	736	0
Kaimuki Middle School	Kalani	979	1,675	11
Kalani High School	Kalani	1273	1,825	5
Liholiho Elementary School	Kalani	469	621	1
Waikiki Elementary School	Kalani	513	552	0
Wilson Elementary School	Kalani	595	644	0
Hanalei Elementary School	Kapaa	326	184	0
Kapaa Elementary School	Kapaa	941	1,219	7
Kapa'a High School	Kapaa	1,053	1,400	3
Kapaa Middle School	Kapaa	594	1,225	2
Kilauea Elementary School	Kapaa	290	368	0
Barbers Point Elementary School	Kapolei	686	920	2
Kapolei Elementary School	Kapolei	1,181	874	0
Kapolei High School	Kapolei	2,028	2,450	1
Kapolei Middle School	Kapolei	1,464	1,425	0
Makakilo Elementary School	Kapolei	559	690	0
Mauka Lani Elementary School	Kapolei	652	483	1
Kau High and Pahala Elementary	Kau	524	939	0
Naalehu Elementary & Intermediate School	Kau	412	414	0,5
Chiefess Kamakahelei Middle School	Kauai	898	1,500	1
Kauai High School	Kauai	1,156	1,625	0
King Kaumualii Elementary School	Kauai	648	897	0,5
Koloa Elementary School	Kauai	387	345	1.25
Wilcox Elementary School	Kauai	870	1,081	2
Kea'au Elementary School	Kea'au	808	1,001	
Kea'au High School	Kea'au Kea'au	832	1,035	
Kea'au Middle School	Kea'au Kea'au	613	1,073	3
Mountain View Elementary School	Kea'au Kea'au	508	644	3
Holualoa Elementary School	Kealakehe	510	207	0
Kahakai Elem, School				
Kanakai Elem, School Kealakehe Elementary School	Kealakehe Kealakehe	666 1,058	805 759	2.5
		1		
Kealakehe High School	Kealakehe	1,396	1,800	
Kealakehe Intermediate School	Kealakehe	657 501	1,225	1
Haiku Elementary School	Kekaulike	501	299	0
Kalama Intermediate School	Kekaulike	788	1,225	2
Kekaulike High School	Kekaulike	1,017	1,575	6.5
Kula Elementary School	Kekaulike	396	460	0.5

Table D-1 (continued) Classroom Utilization

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				Classrooms
				Not Used for
				Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Makawao Elementary School	Kekaulike	550	598	0
Paia Elementary School	Kekaulike	356	483	0
Pukalani Elementary School	Kekaulike	478	552	0
Kohala Elementary School	Kohala	411	437	0
Kohala High School	Kohala	276	575	0
Kohala Middle School	Kohala	180	325	0
Honaunau Elementary School	Konawaena	129	230	1
Hookena Elementary School	Konawaena	139	230	7
Ke Kula O Ehunuikaimalino School	Konawaena	214	72	0
Konawaena Elementary School	Konawaena	567	759	0
Konawaena High School	Konawaena	733	1,350	9
Konawaena Middle School	Konawaena	563	750	0
Kamehameha III Elementary School	Lahaina	813	552	0
Lahaina Intermediate School	Lahaina	626	650	0
Lahainaluna High School	Lahaina	1,028	900	0
Nahienaena Elementary School	Lahaina	761	713	0
Lanai High and Elementary School	Lanai	582	1,132	0
Laupahoehoe High and Elementary School	Laupahoehoe	211	650	2
Hale Kula Elementary School	Leilehua	892	920	0
Helemano Elementary School	Leilehua	621	575	0
Iliahi Elementary School	Leilehua	454	690	0.3
Ka 'ala Elementary School	Leilehua	505	690	1.5
Leilehua High School	Leilehua	1,803	2,000	1
Solomon Elementary School	Leilehua	1,053	966	1
Wahiawa Elementary School	Leilehua	531	920	5
Wahiawa Middle School	Leilehua	818	1,175	0
Wheeler Elementary School	Leilehua	627	851	0
Wheeler Middle School	Leilehua	797	1,025	0
Kahului Elementary School	Maui	1064	874	0
Kamalii Elementary School	Maui	585	897	1
Kihei Elementary School	Maui	947	920	0
Lihikai Elementary School	Maui	943	736	
Lokelani Intermediate School	Maui	550	625	0
Maui High School	Maui	1,908	1,425	1
Maui Waena Elementary School	Maui	1,095	1,050	0
Pomaikai Elementary School	Maui	550	1,012	0
Central Middle School	McKinley	351	1,075	7
Ka'ahumanu Elementary School	McKinley	597	782	1
Kaiulani Elementary School	McKinley	421	690	2
Kauluwela Elementary Schoof	McKinley	416	644	1
Lanakila Elementary School	McKinley	433	713	1
Likelike Elementary School	McKinley	401	690	0
McKinley High School	McKinley	1677	2,625	0
Royal School Elementary School	McKinley	376	529	0
Kipapa Elementary School	Mililani	630	736	1
Mililani High School	Mililani	2,476	2,200	3
	1v1IIId1II	2,470	2,200	3

Table D-1 (continued)Classroom Utilization

Ciass	room Utilizatio			
				Classrooms
				Not Used for
				Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Mililani 'Ike Elementary School	Mililani	979	828	0
Mililani Mauka Elementary School	Mililani	853	989	0
Mililani Middle School	Mililani	1,743	1,575	1
Mililani Uka Elementary School	Mililani	669	920	1
Mililani Waena Elementary School	Mililani	719	736	1
Kamaile Academy	Moanalua	899	736	0
Moanalua Elementary School	Moanalua	666	644	0
Moanalua High School	Moanalua	2,012	1,925	0
Moanalua Middle School	Moanalua	832	925	0.5
Red Hill Elementary School	Moanalua	459	736	4
Salt Lake Elementary School	Moanalua	773	897	1
Shafter Elementary School	Moanalua	458	460	0
Kaunakakai Elementary School	Molokai	290	552	0
Kilohana Elementary School	Molokai	80	184	0
Kualapuu Public Charter School	Molokai	336	460	0
Maunaloa Elementary School	Molokai	61	230	0
Molokai High School	Molokai	336	625	0
Molokai Middle School	Molokai	209	325	0
Nanaikapono Elementary School	Nanakuli	942	1,334	0
Nanakuli Elementary School	Nanakuli	439	644	4
Nanakuli High and Intermediate School	Nanakuli	962	1,650	0
Keonepoko Elementary School	Pahoa	632	736	1
Pahoa Elementary School	Pahoa	432	345	0
Pahoa High School	Pahoa	653	1,550	2.5
Highlands Intermediate School	Pearl City	937	1,175	2
Kanoelani Elementary School	Pearl City	767	598	0
Lehua Elementary School	Pearl City	357	690	1
Manana Elementary School	Pearl City	462	552	0
Momilani Elementary School	Pearl City	423	368	0
Palisades Elementary School	Pearl City	418	759	0
Pearl City Elementary School	Pearl City	545		1
Pearl City High School	Pearl City	1,697	2,425	0
Pearl City Highlands Elementary School	Pearl City	474	690	1
Waiau Elementary School	Pearl City	544	552	1
Aliamanu Elementary School	Radford	763	920	0
Aliamanu Middle School	Radford	739	1,075	0
Hickam Elementary School	Radford	597	690	*0
Makalapa Elementary School	Radford	680	621	*12
Mokulele Elementary School	Radford	449	690	0
Nimitz Elementary School	Radford	723	920	*2.3
Pearl Harbor Elementary School	Radford	723	920	*0
Pearl Harbor Kai Elementary School	Radford	559	874	*0
Radford High School	Radford	1,315	1,800	*3
Anuenue School	Roosevelt	394	667	0
Kawanakoa Middle School	Roosevelt	850		0
Lincoln Elementary School		362	1,200	-
Lincolli Elementary School	Roosev410	302	805	1

Table D-1 (continued) Classroom Utilization

				Classrooms
				Not Used for
				Teaching or
		2013-14	Design	School Level
School	Complex	Enrollment	Enrollment	Functions
Ma'ema'e Elementary School	Roosevelt	666	8S1	0
Manoa Elementary School	Roosevelt	565	851	3
Noelani Elementary School	Roosevelt	455	460	0.5
Nuuanu Elementary School	Roosevelt	376	368	0
Pauoa Elementary School	Roosevelt	324	690	1
Roosevelt High School	Roosevelt	1,416	1,900	0
Stevenson Middle School	Roosevelt	653	1,225	1.5
Waialae Elementary Public Charter School	Roosevelt	501	690	0
Waiakea Elementary School	Waiakea	877	989	0
Waiakea High School	Waiakea	1,197	1,875	7
Waiakea Intermediate School	Waiakea	892	1,100	0
Waiakeawaena Elementary School	Waiakea	714	851	0
Haleiwa Elementary School	Waialua	190	713	6
Waialua Elementary School	Waialua	585	552	0
Waialua High and Intermediate School	Waialua	636	1,200	4
Leihoku Elementary School	Waianae	936	874	0
Maili Elementary School	Waianae	1001	782	0
Makaha Elementary School	Waianae	641	690	2.5
Waianae Elementary School	Waianae	634	989	2
Waianae High School	Waianae	1,765	2,250	0
Waianae Intermediate School	Waianae	884	1,325	0
Ele'ele Elementary School	Waimea	458	S75	1
Kalaheo School	Waimea	521	598	0
Kekaha Elementary School	Waimea	375	460	0
Niihau School	Waimea	10	72	*0
Waimea Canyon Middle School	Waimea	399	850	3
Waimea High School	Waimea	579	1,375	2.5
August Ahrens Elementary School	Waipahu	1,403	1,426	1
Honowai Elementary School	Waipahu	794	874	0
Kaleiopuu Elementary School	Waipahu	982	943	0
Waikele Elementary School	Waipahu	653	805	0.5
Waipahu Elementary School	Waipahu	1,130	943	2
Waipahu High School	Waipahu	2,441	2,425	0
Waipahu Intermediate School	Waipahu	1,314	1,575	0

Table D-1 (continued)Classroom Utilization

Appendix E Construction Cost Factors

Below is an updated list of Construction Cost Factors from the Department of Accounting and General Services ("DAGS"). These factors are applied in the calculation of historical construction costs in the calculation of the construction fee amount.

TABLE A9 REGIONAL COST FACTORS																			
: County	: Districts	:	0%	:	5%	:	10%	:	15%	:	20%	:	25%	:	30%	:	===== 35%	:Other	==
: Oahu	:Honolulu	:	x	:		:		:		:		;		:		:		:	== :
: Oahu : Oahu	:Ewa :Wahiawa	:		:	x	:	x	:		:		:		:		:		:	:
: Oahu : Oahu	:Waialua :Waianae	:		:		:		:	x x	:		:		:		:		:	:
: Oahu : Oahu	:Koolauloa :Koolaupoko	:		:	x	:		:	x	:		:		:		:		:	::
	:Wailuku :Lahaina	:		:		:		::	x	::		:		:	x	:		:	:
	:Makawao :Hana	:		:		:		:		::		:		:	x	:	x	:	:
	:Lanai :Molokai	:		:		:		:		::		:		:	x	:	x	:	:
: Hawaii : Hawaii	:Hilo :Hamakua	:		:		:		:	x	::		:	x	:		:		:	:
	:South Kohala :North Kohala			:		:		:		:		:	x	:		:	x	:	::
: Hawaii : Hawaii		:		:		:		:		:		:	x	:		:	x	:	::
: Hawaii : Hawaii	:Puna :Pohakuloa	:		:		:		:		:		:		:	x	:	x	:	:
: Kauai	:Lihue	:		:		:		:	x	:		:		:		:		:	:
	:Koloa :Waimea	:		:		:		:		:	x	:		:	x	:		:	:
: Kauai	:Kawaihau :Hanalei	:		:		:		:		:	x	:		:	×	:		:	:

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