

# **HAWAII**

# **LABOR MARKET**

# **DYNAMICS**



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Department of Labor & Industrial Relations  
State of Hawaii



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# Executive Summary

This report provides a current overview of the local labor market and economy to inform those developing workforce development policies and making workforce investment decisions. The following are some significant findings:

- Among the 50 states, Hawaii ranks 42nd in the nation in terms of labor force size and population.
- Almost two-thirds of Hawaii's population 16 years old and older participates in the labor force, nearly the same as the U.S. rate.
- Hawaii's job count continued to edge downward in 2010 for the third year in a row, however the severity of the job loss declined significantly from the previous year's decrease.
- Compared with the nation, the state's unemployment rate remained relatively low, averaging 6.6 percent in 2010, placing Hawaii in the bottom fifth of all states.
- The unemployment rates in three out of the four counties dropped in 2010. Only Hawaii County's unemployment rate rose slightly.
- Seven out of the ten major industries posted job losses in 2010, the largest reported by the natural resources and mining and construction sector which fell by 2,600 positions. In addition to the education and health services industry, the information, and other services industries managed positive growth over the past year.
- According to Quarterly Workforce Indicator (QWI) data, in the third quarter of 2010, the number of new hires increased by 11.6 percent.
- Growth in green jobs are projected to outpace Hawaii's overall job gains and could possibly more than double in size by the year 2018.
- The pace of non-farm job growth is expected to be better over the short-term from 2010 to 2012 compared to the 2008 to 2018 period.
- While there will be many job openings for workers with limited skills, about one in five openings will require a bachelor's degree or higher.

# Introduction

The Hawaii Labor Market Dynamics report focuses on significant labor market statistics and trends affecting Hawaii's economy in 2010. In addition to highlighting job trends over the past year and reporting anticipated short- and long-term job forecasts, statistics on Hawaii's green workforce are also presented. Comparisons are made between national and state figures whenever possible. County statistics are also

shown when available. Major developments that impacted the local economy during this period are also cited.

Workforce and economic analyses provided in this report supports Hawaii's workforce information system as directed by the U.S. Department of Labor's Employment and Training Administration.

# Labor Market Highlights

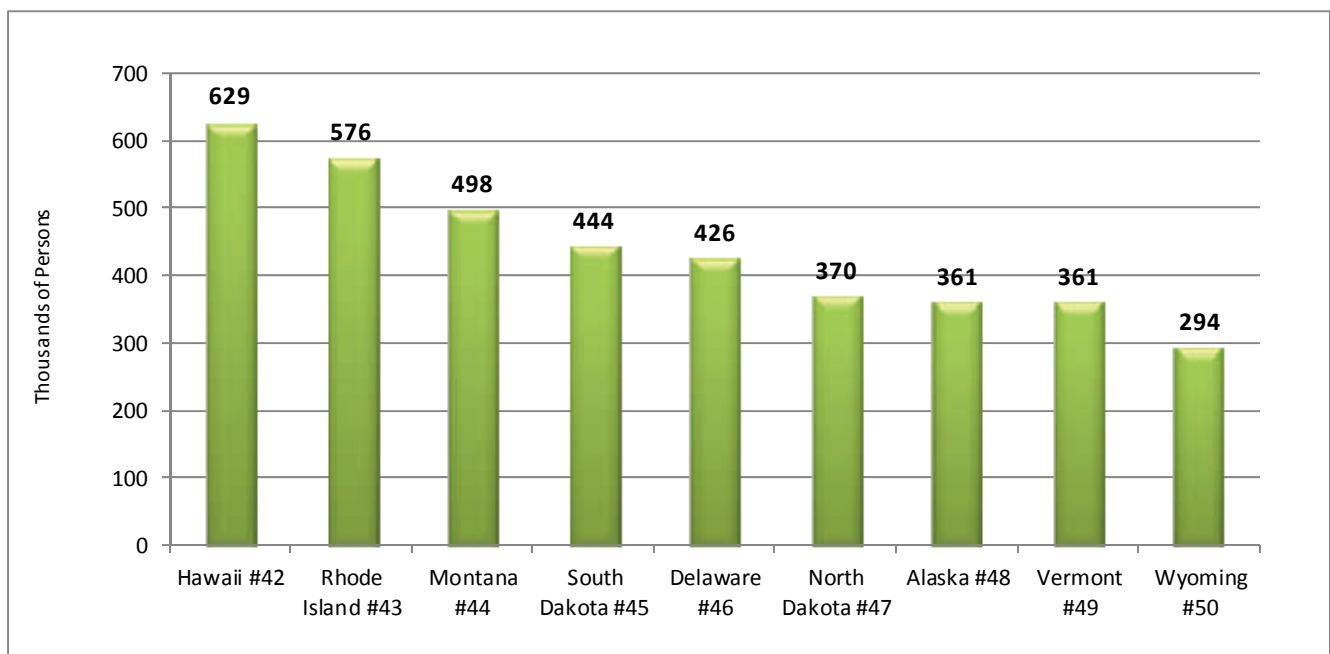
According to population estimates for 2010, with a population count of just over 1,300,000, Hawaii ranks 42<sup>nd</sup> in size compared to the other 50 states<sup>1</sup>.

There were approximately 629,000 persons in the

Hawaii civilian labor force in 2010 (Figure 1) of which 487,400 were employed and 41,600 were unemployed<sup>2</sup>.

Hawaii's labor force participation ratio averaged 63.6 percent in 2010.

Figure 1. Hawaii ranked 42nd in the U.S. in labor force size in 2010

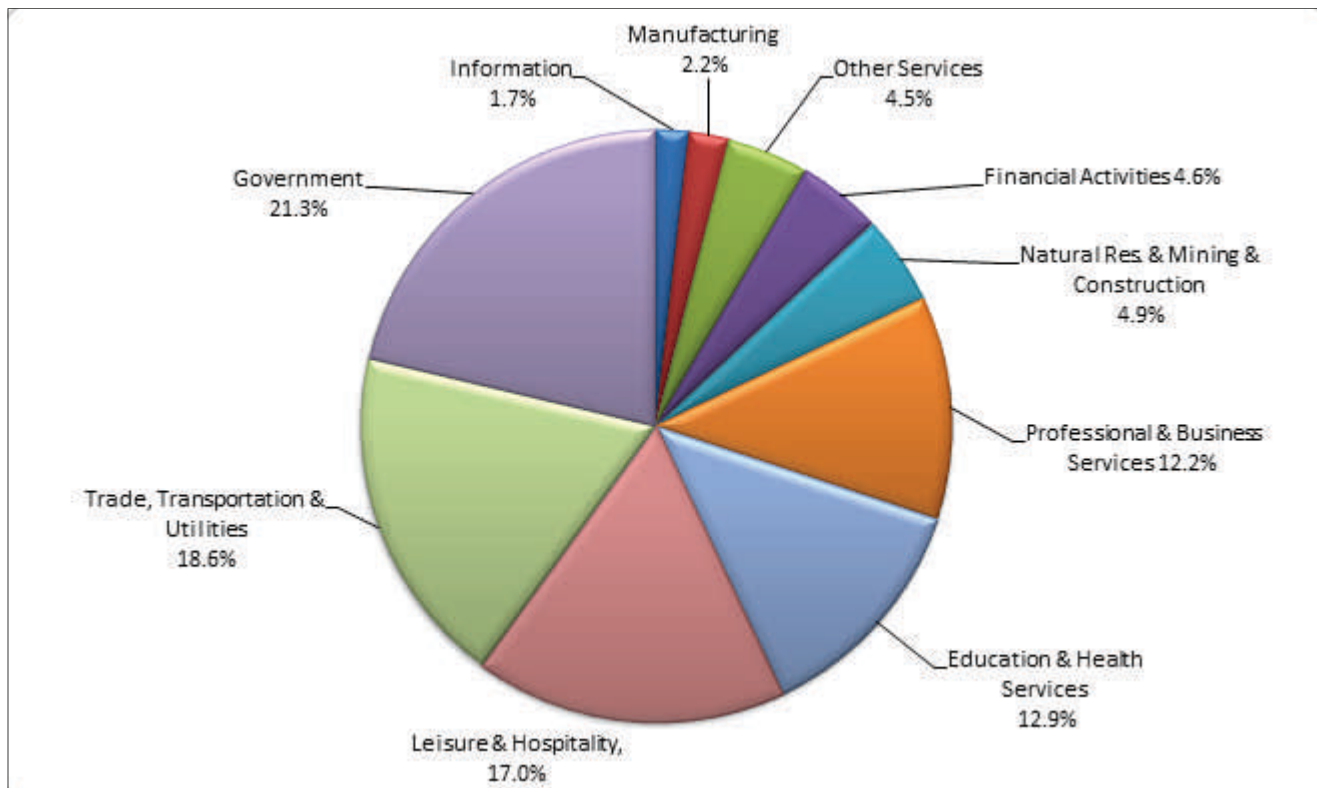


The state's non-farm job market recorded 586,900 jobs in 2010. This figure is based on the monthly payroll survey of business establishments, which defines employment differently than the household survey.

Only 7.1 percent of Hawaii's non-farm job market consisted of goods-producing industries. The balance

was made up of service-providing industries (Figure 2). Three of the sectors, government; trade, transportation, and utilities; and leisure and hospitality, continue to account for more than half of Hawaii's jobs.

**Figure 2. Three largest industries comprise more than half of Hawaii's jobs in 2010**



## Hawaii Compared to the Nation

### Civilian Labor Force

In terms of labor force estimates, data based on a monthly household survey show Hawaii's civilian labor force followed the trends of the rest of the nation and maintained a rank similar to its population count. During the 2000 to 2010 period, after a drop in 2002, Hawaii's labor force continued to climb until 2008

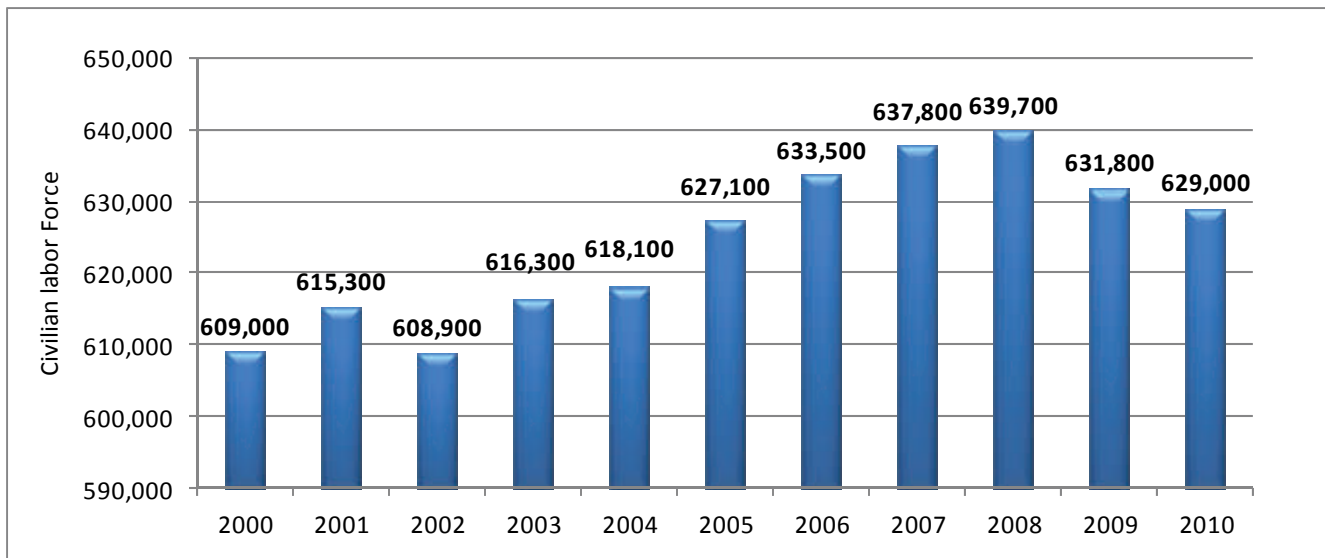
(Figure 3). The decrease in 2009 was fairly steep relative to the other states. A total of 26 states also reported declines for that year. Of those 26, Hawaii's labor force posted the sixth largest percentage loss at -1.2 percent, which placed Hawaii 45 out of 50 in terms of over-the-year change. Although the state's labor force continued

to decline in 2010, the magnitude of the drop was less in 2010 at -0.4 percent, and Hawaii's overall rank improved to 32 in the nation.

For the first six months of 2011, Hawaii's civilian labor force revealed an improvement over the 2010 data. The numbers tended to trend higher than the previous year for every month.

Roughly 587,400 persons were employed in 2010 while 41,600 were unemployed. This means approximately 63.6 percent of Hawaii's civilian non-institutional population 16 years and older participated in the labor force in 2010 versus 64.7 percent for the nation. The remainder of the working-age population is not in the labor force, which includes homemakers, stay-at-home caregivers, students, disabled persons, retirees, and those who are neither working nor seeking employment.

**Figure 3. Hawaii's Civilian Labor Force, 2000 - 2010**



### Unemployment Rates

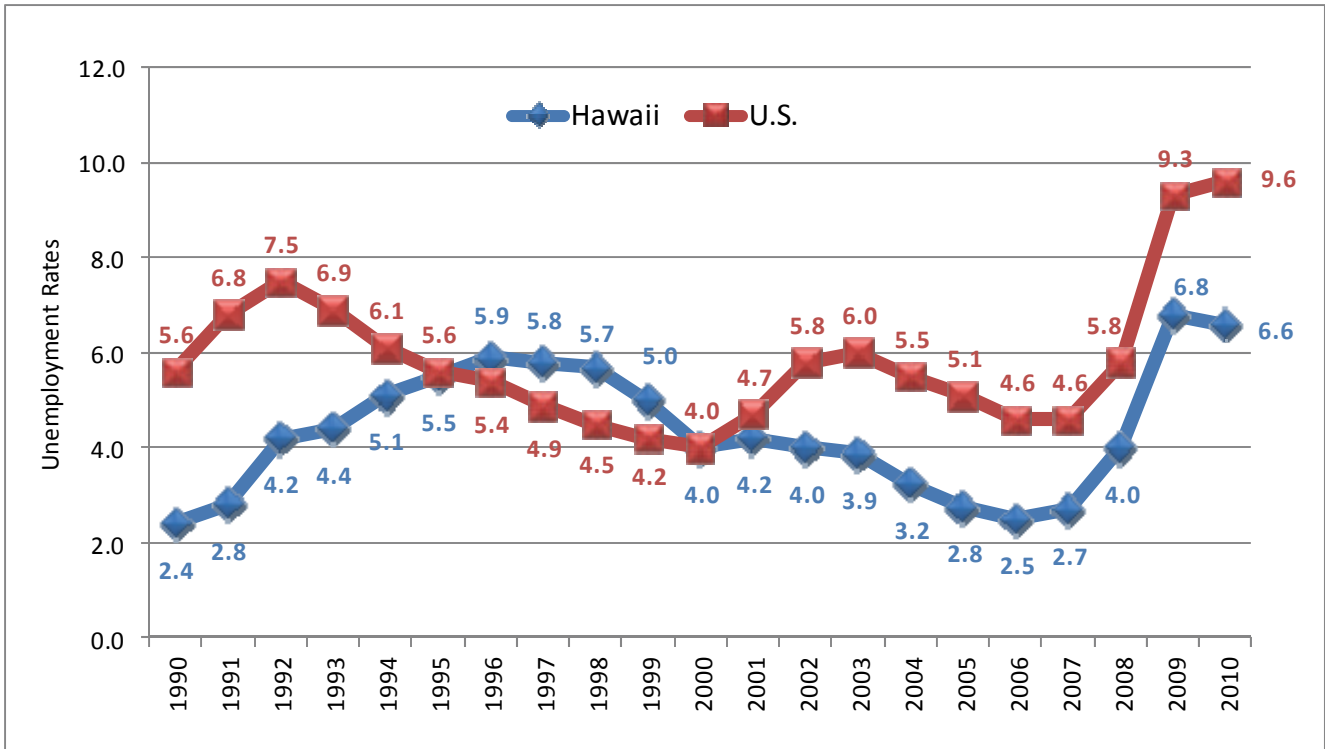
Since the year 2000, the unemployment rate for Hawaii has remained consistently lower than the national rate of unemployment (Figure 4). In fact since 2003, Hawaii's rate has been at least 1.8 percentage points below the national rate.

Following the terrorist attacks in 2001, during which time Hawaii's rate increased slightly, from 4.0 percent in 2000 to 4.2 percent in 2001, the ratio improved over the next five years. In 2006, unemployment reached a low of 2.5 percent, nearly equaling the historical low of 2.4 percent not seen since 1989 and 1990. After peak-

ing at 6.8 percent in 2009, Hawaii's unemployment rate dipped to 6.6 percent in 2010, and appears to be improving further in 2011.

An over-the-year comparison for the first six months of 2011 show a favorable unemployment rate for every month thus far. The current rate, as of June 2011 was 6.0 percent for Hawaii compared to 9.2 percent for the nation. Although Hawaii's rate in 2011 has shown some encouraging signs, there is still a ways to go before the unemployment ratio reaches the pre-recession low of 2.5 percent in 2006.

Figure 4. Hawaii’s unemployment rate still lower than U.S. (not seasonally adjusted)



# Labor Force Employment and Unemployment

## Non-Farm Employment

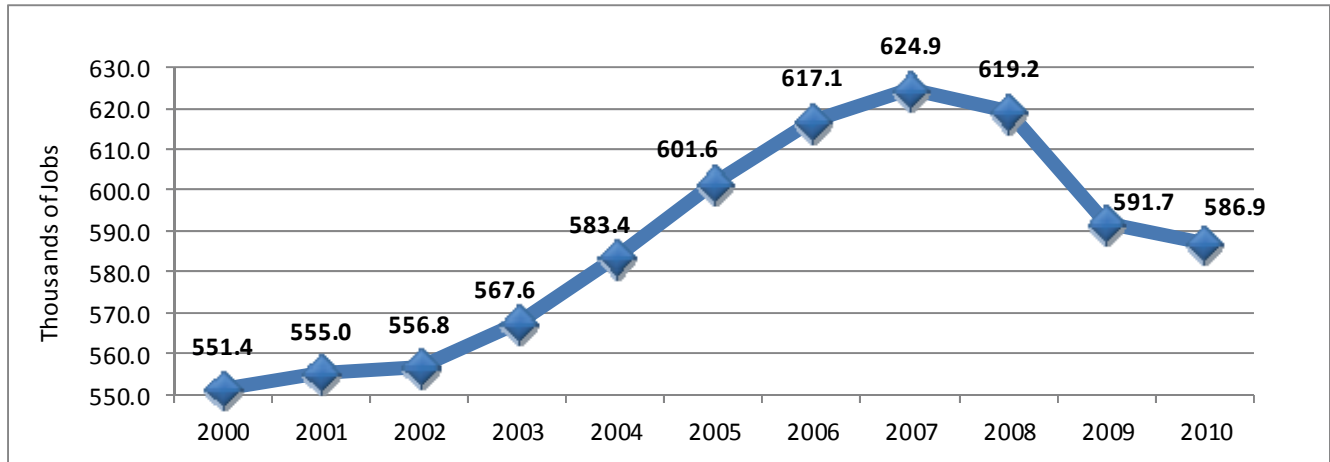
Over the past 10 years, the expansion in Hawaii’s nonfarm employment, which is based on the monthly payroll survey of business establishments, peaked in 2007, registering a new high of 624,850 (Figure 5). From 2008 to 2010, the percentage change in Hawaii’s non-farm employment growth paralleled the national trend, which is in line with the recession that has gripped the nation since the end of 2007 (Figure 6). A slight decline in 2008 was followed by a larger loss of 4.6 percent in 2009. Non-farm employment continued to shrink in 2010 but

the pace of the decline slowed. During the 2007-2010 slowdown, Hawaii’s non-farm employment contracted by 6.1 percent, placing Hawaii in the bottom third of all states, with a rank of 35 out of 50 states.

Overall, Hawaii’s job growth has been stronger than the nation. The state’s non-farm payrolls expanded by 6.4 percent over the ten-year period compared to a slight decrease for the nation.



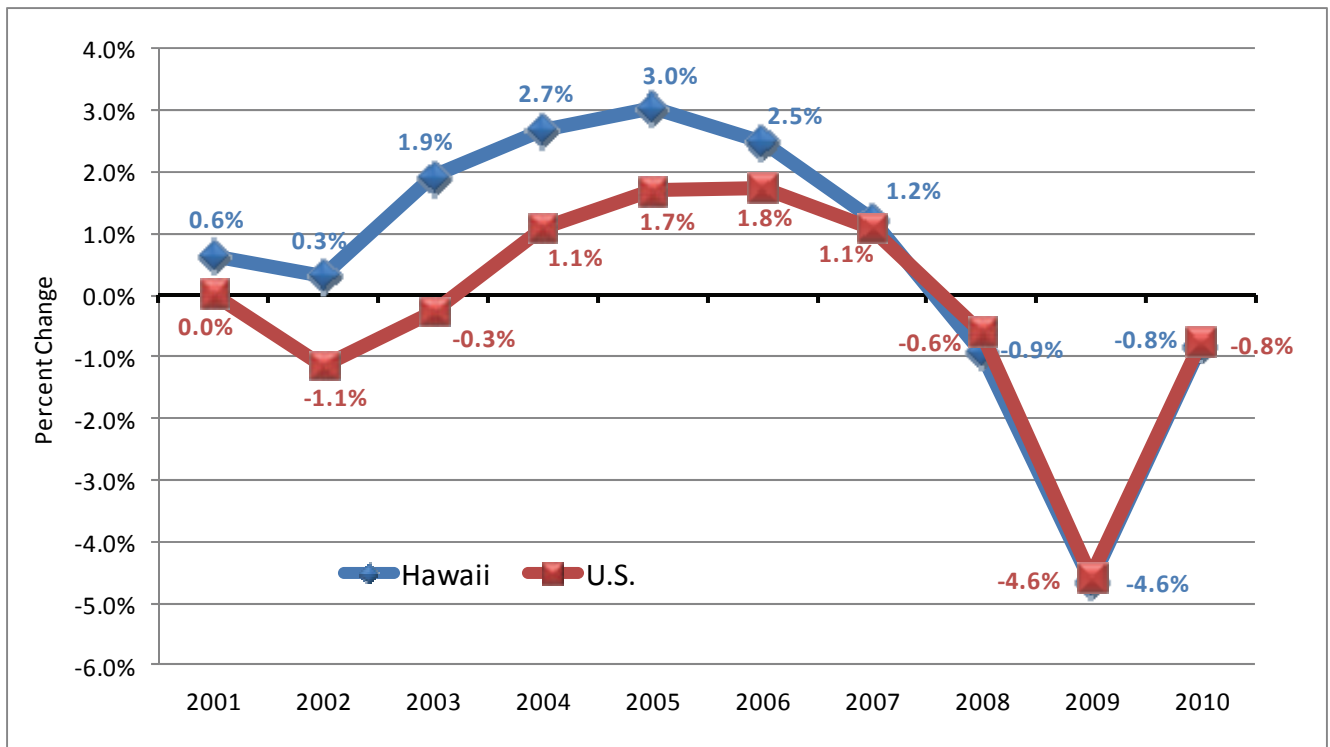
Figure 5. Hawaii's 10-Year Job Trend (not seasonally adjusted)



So far 2011 monthly non-farm employment data for both the state and the nation look better than previous-year totals. Although both have been trending upwards,

Hawaii's growth has generally trailed the national figures in terms of month to month percentage growth.

Figure 6. Hawaii vs. U.S. job trend in the last ten years (not seasonally adjusted)



# At the County Level

Hawaii consists of four county labor market areas- Honolulu Metropolitan Statistical Area (MSA) the largest job market, followed by Maui County, Hawaii County, and Kauai County. Since nearly three-quarters

of all jobs originate in Honolulu MSA, the economic activity of this area is largely reflected in the overall state data.

## Unemployment Rates

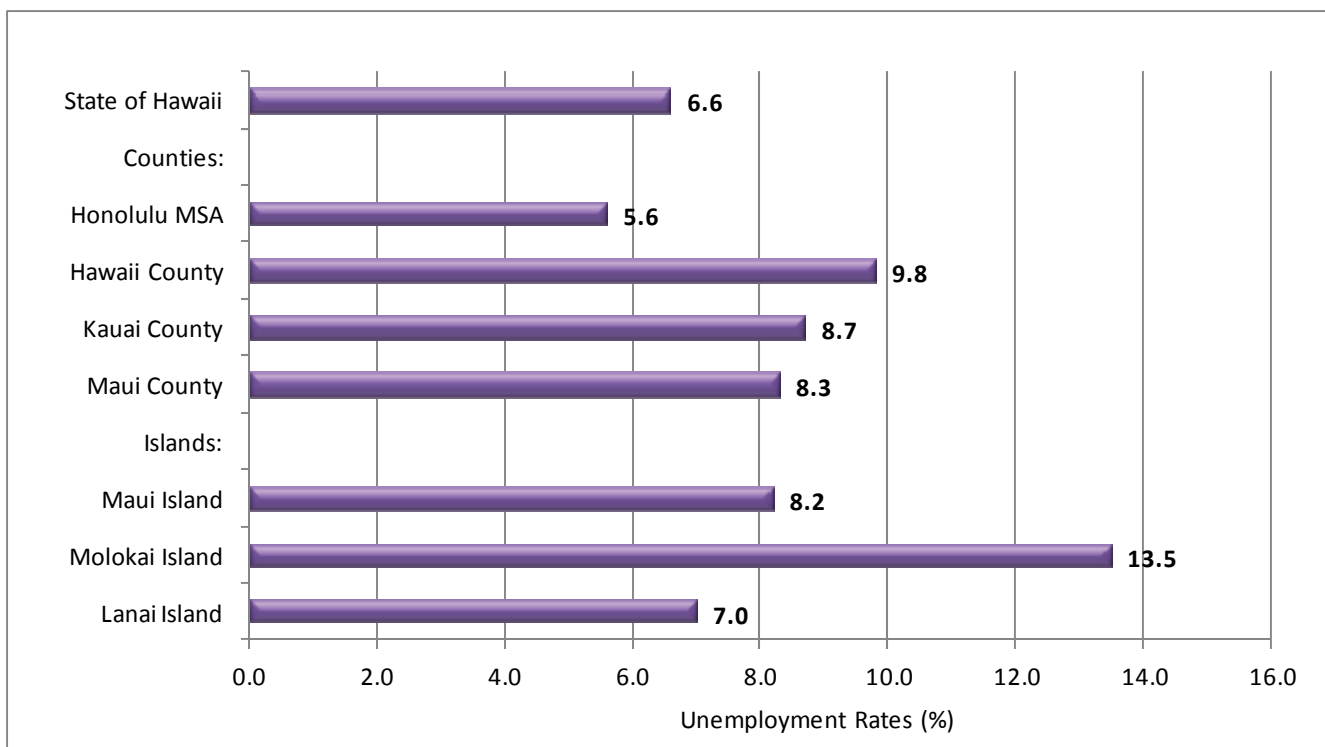
Unemployment rates have been uneven among the counties. The unemployment rates of the urban areas tend to be lower than those of more rural regions (Figure 7).

All counties displayed similar unemployment data trends from 2000-2010 (Figure 8 and Table 1). Following a steady decline from 2001 to 2006, the unemployment rates surged over the next three years, particularly from 2008 to 2009. From 2006 to 2009, the jobless ratios for Kauai County, Hawaii County, and Maui County rose by over 6 percentage points each. After

somewhat easing in 2010, every county except Hawaii County inched downward slightly, the largest percentage declines occurring within Kauai and Maui Counties. Only Hawaii County experienced a slight uptick in its unemployment ratio.

From 2000-2010, Honolulu MSA's unemployment rate has been the lowest of the counties or near the bottom. The rate increase from 2006 to 2009 at 3.4 percentage points was the smallest among the counties. In 2010, Honolulu MSA had the lowest jobless rate of 5.6 percent, well below the other counties.

**Figure 7. Unemployment rate for Counties in Hawaii (not seasonally adjusted), 2010**



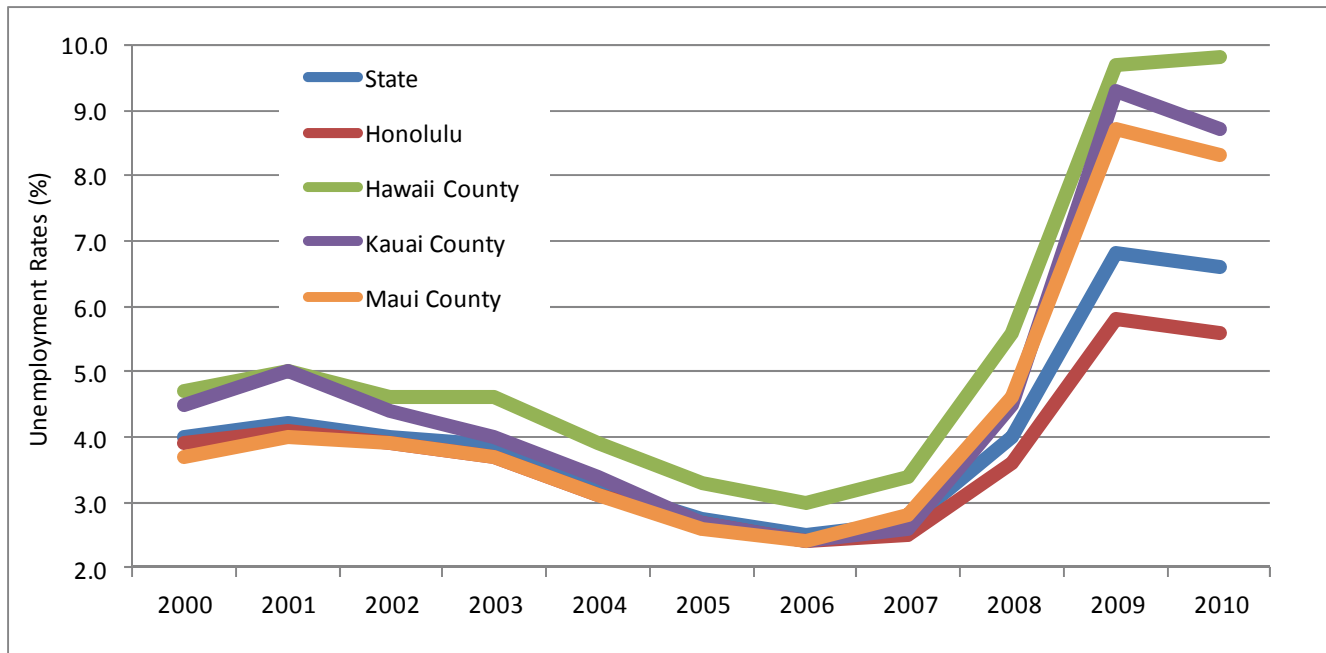
Prior to 2007, Maui County’s unemployment ratio was at the same level as Honolulu MSA or in some years even lower. However, from 2006 to 2009, the ratio jumped from 2.4 percent to 8.7 percent. Within the county, the unemployment rate for Molokai climbed to 13.7 percent in 2009, the highest since 1996 when the jobless ratio reached 14.8 percent. Maui County’s unemployment rate eased slightly in 2010 to 8.3 percent, but is still higher than the pre-recession rate.

Kauai County experienced the most dramatic increase from 2006 to 2009, surging by 6.9 percentage points to 9.3 percent. The ratio then fell in 2010 by 0.6 percentage point to 8.7 percent, the largest decline among all the counties.

Hawaii County posted the highest unemployment rate throughout the previous 10-year period. The ratio rose every year from 2006 to 2010 unlike the other counties which experienced a drop in 2010. However, the increase from 2009 to 2010 was minimal and thus far data for 2011 show a slight downward trend for the county.

Improvement appears likely in 2011 for every county. So far the unemployment rates for the first six months of 2011 are lower than the 2010 rates with the only exception being Kauai County in June 2011 when the rate remained the same.

**Figure 8. Unemployment rates for Counties in Hawaii (not seasonally adjusted) , 2000-2010**



**Table 1. Unemployment rates for Counties in Hawaii (not seasonally adjusted), 2000-2010**

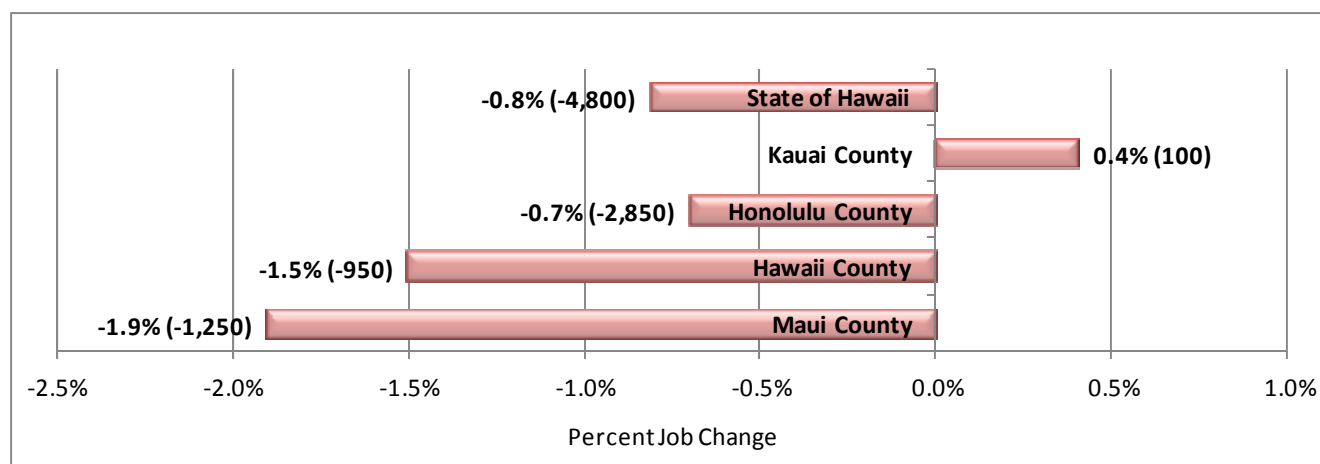
	2000	2001	2002	2003	2004	2005	2006	2007	2008	2009	2010
State	4.0	4.2	4.0	3.9	3.2	2.8	2.5	2.7	4.0	6.8	6.6
Honolulu	3.9	4.1	3.9	3.7	3.1	2.7	2.4	2.5	3.6	5.8	5.6
Hawaii County	4.7	5.0	4.6	4.6	3.9	3.3	3.0	3.4	5.6	9.7	9.8
Kauai County	4.5	5.0	4.4	4.0	3.4	2.7	2.4	2.6	4.5	9.3	8.7
Maui County	3.7	4.0	3.9	3.7	3.1	2.6	2.4	2.8	4.6	8.7	8.3

## Non-Farm Jobs

Non-farm payrolls continued to edge downward in three of the four counties from 2009 to 2010 (Figure 9). Although this marks the third year in a row of job losses, the declines are not as severe as the previous year. Maui County posted the largest percentage decline of 1.9 percent followed by Hawaii County with a decrease of 1.5 percent. While Honolulu MSA posted the largest job loss of 2,850, this amounted to the smallest percentage decline of 0.7 percent. Only Kauai County which accounts for the smallest job market, reported a slight uptick in jobs.

So far county data for 2011 have generated mixed results. On one hand, Honolulu MSA has posted gains for all six months of the year when compared to year-ago figures. The other counties have not fared as well. Kauai County posted a gain or retained the same level of employment for every month except for June 2011, which saw a slight drop compared to June 2010. Non-farm jobs in Hawaii County were up in two of the six months, February and March 2011. Meanwhile, Maui County totals were down every month.

Figure 9. Percent Job Change for Counties in Hawaii (not seasonally adjusted), 2009-2010



## Industry Highlights

Hawaii's non-farm payroll count endured a drop in jobs for the third consecutive year. From 2007 to 2010, Hawaii has lost a total of 37,950 jobs. On a more positive note, the most recent decline from 2009 to 2010 of 4,800 jobs represents the smallest loss of the three years.

Three of the ten industry sectors registered gains (Figure 10). Education and health services topped all industries, increasing by 1,150 jobs. This sector,

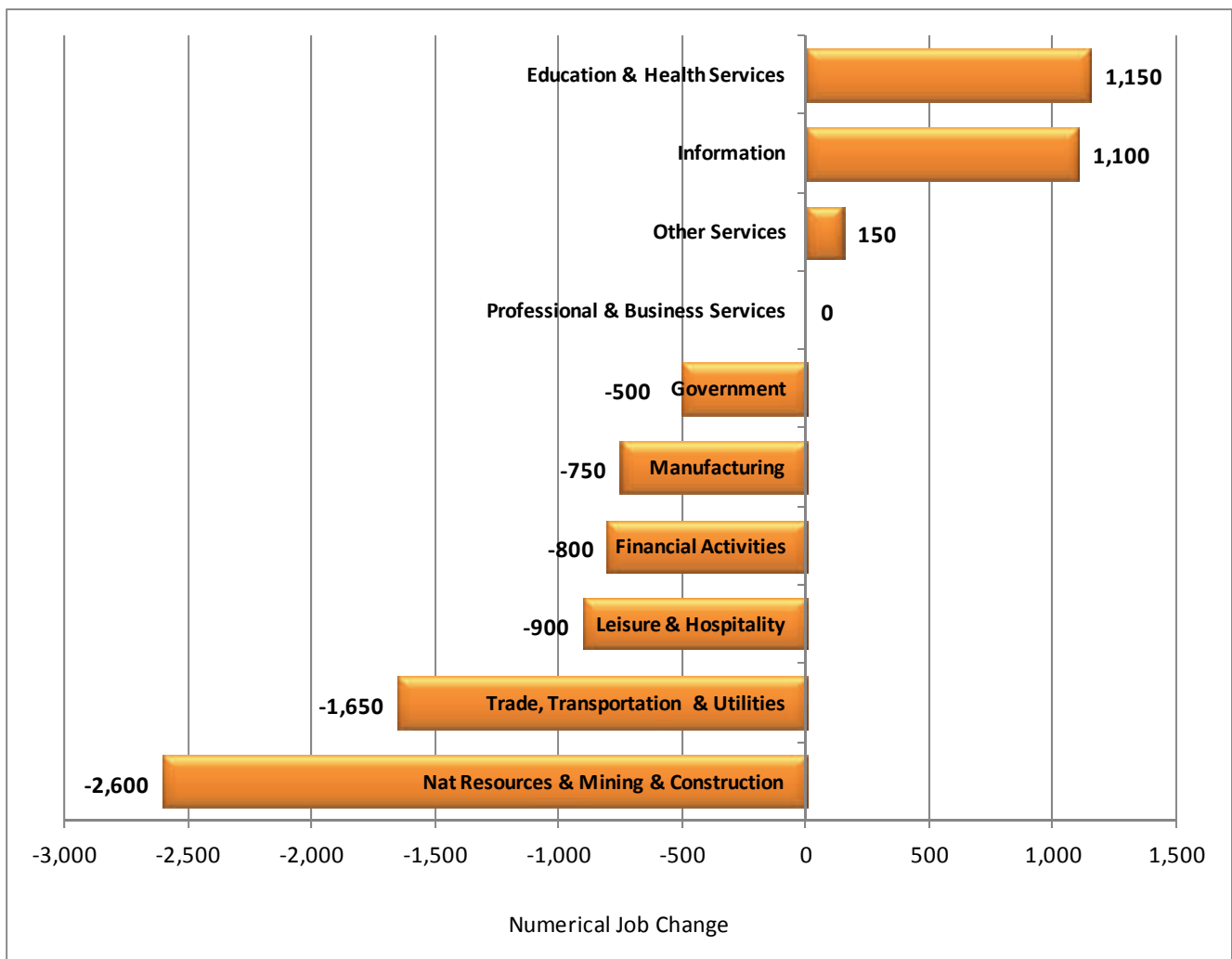
primarily impacted by demographics such as an aging population, has withstood cutbacks experienced by the other industries and, in fact, continued to add jobs over the ten-year period. The information industry, the smallest of the 10 industries, advanced by 12.1 percent for a gain of 1,100 jobs, which ended four straight years of losses. After a drop in 2009, other services managed a slight increase in 2010. Throughout the last ten years, this represents the only job reduction experienced by this industry.

Natural resources, mining, and construction provided the largest over-the-year job loss of 2,600, the bulk of the declines deriving from special trade contractors. However, this was a significant improvement over the 2009 job loss of 6,450. The trade, transportation, and utilities group and leisure and hospitality group, both driven by consumer spending, fell by 1,650 and 900 jobs, respectively. Financial activities declined by 800, mainly due to decreased activity in the finance and insurance sector. Manufacturing continued on a downward trend, losing 750 jobs in 2010. A reduction

in state government payrolls outweighed a boost in federal government jobs, resulting in an overall drop of 500 government jobs. This reverses a four-year trend of job gains. The professional and business services industry remained unchanged from 2009.

Statewide non-farm jobs data for the first six months of 2011 looks promising. Similarly, Honolulu MSA monthly totals have been higher than previous year ago totals.

**Figure 10. Hawaii’s over-the-year job change (not seasonally adjusted), 2009-2010**



# Local Employment Dynamics

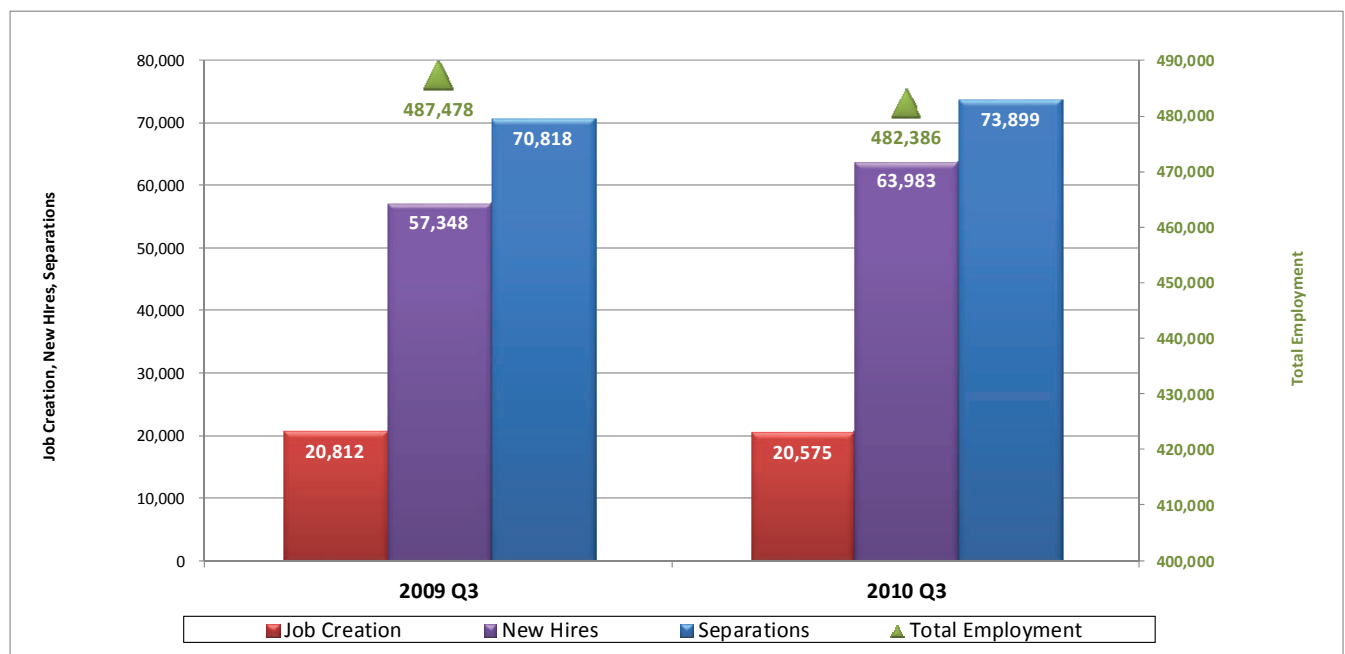
The U.S. Census Bureau’s Local Employment Dynamic (LED) program produces Quarterly Workforce Indicators (QWI) that provide an overview of the State’s workforce<sup>3</sup>. The latest data available is for the third quarter of 2010 and comparisons against the same quarter a year ago reveal some of the changes happening within our workforce. For the scope of this report, only the larger industries were included for analysis. Public administration was not included because the QWI data currently does not use state and federal government data in Hawaii.

In the third quarter of 2010, total employment in Hawaii averaged 482,386, a decrease of 5,092 or 1.0 percent from the third quarter of 2009 (Figure 11). Construction industry employment suffered the greatest setback as it lost 2,863 employees from the third quarter of 2009 to the third quarter of 2010, a drop of 9.0 percent (Table 2). However, there was positive movement for the administrative, support,

waste management, and remediation services sector which expanded employment by 1,471 workers, or 3.5 percent. Smaller gains were experienced by the health care and social assistance sector, as well as the information industry.

As the state struggled in the midst of the ‘great recession’, job creation suffered a small setback of 1.1 percent over the past year to average 20,575. This indicator is defined as the number of jobs created by new companies or expansion of existing companies. So despite the overall decline in total employment, there were still new jobs being created in the third quarter of 2010. The information industry showed the most dramatic improvement over the year as new job gains averaged 798 more than the prior year, for a 234.0 percent jump. The construction industry sector also fared pretty well in creating 2,187 new jobs – a 13.9 percent increase over jobs created the same time a year ago. As the leading job creator, accommodation and

Figure 11. Quarterly Workforce Indicators, State of Hawaii, 2009 Q3 - 2010 Q3



food services produced 3,452 new jobs in the third quarter of 2010.

On a positive note, the number of new hires rose significantly by 6,635, or 11.6 percent, to average 63,983. What industries experienced this increase in hiring? The information industry sector led with 4,330 more new hires in the third quarter of 2010, as compared to the same quarter the year before, which represents an improvement of 471.2 percent. The administrative and support and waste management and remediation services sector also had a substantial increase in hiring with 1,292 more new hires than the previous year, or 15.4 percent more. The accommodation and food services sector being the largest industry sector in terms of total employment has the most new hires, but also fared well in hiring growth over the past year with an increase of 748, or 6.3 percent, for an average of 12,629.

Like job creation, another indicator displaying the negative trend expected during a recession, the number of separations escalated by 4.4 percent to average 73,899. This indicator counts the number of workers who left their job for various reasons. Most of the separations occurred in the accommodation and food services sector (13,960) and the administrative, support, waste management, and remediation services industry (10,472). Interestingly, the information industry also had many separations (5,743) in the third quarter of 2010, up by 4,487 or 357.2 percent from the same time a year ago. This indicates that there were a lot of movements happening within the industry, most likely in the motion picture sub-sector, because while the job creation, new hires, and separations spiked, the total employment showed only slight gains. Construction, meanwhile, experienced a drop in the number of separations in the third quarter of 2010 as compared to a year ago – down by 1,066, or 17.9 percent.

**Table 2. Quarterly Workforce Indicators by Industry, Hawaii, 2010 Q3 & Comparison to 2009 Q3**

Industry	Total Employment			Job Creation			New Hires			Separations		
	2010 Q3	# CHG	% CHG	2010 Q3	# CHG	% CHG	2010 Q3	# CHG	% CHG	2010 Q3	# CHG	% CHG
<b>Total, All Industries</b>	482,386	-5,092	-1.0%	20,575	-237	-1.1%	63,983	6,635	11.6%	73,899	3,081	4.4%
<b>Manufacturing</b>	13,168	-1,003	-7.1%	436	-125	-22.3%	1,183	-40	-3.3%	1,364	-56	-3.9%
<b>Construction</b>	28,959	-2,863	-9.0%	2,187	267	13.9%	4,178	240	6.1%	4,874	-1,066	-17.9%
<b>Wholesale Trade</b>	17,918	-72	-0.4%	572	-72	-11.2%	1,402	-107	-7.1%	1,599	-155	-8.8%
<b>Retail Trade</b>	64,822	-758	-1.2%	2,151	-318	-12.9%	8,459	312	3.8%	9,005	41	0.5%
<b>Transportation &amp; Warehouse</b>	24,911	-605	-2.4%	672	-120	-15.2%	2,072	128	6.6%	2,531	-246	-8.9%
<b>Information</b>	11,039	418	3.9%	1,139	798	234.0%	5,249	4,330	471.2%	5,743	4,487	357.2%
<b>Finance &amp; Ins.</b>	15,562	-860	-5.2%	310	-88	-22.1%	938	127	15.7%	1,119	-58	-4.9%
<b>Real Estate, Rental, Leasing</b>	11,376	-259	-2.2%	561	-433	-43.6%	1,237	-443	-26.4%	1,364	-610	-30.9%
<b>Prof., Sci., Tech.</b>	23,714	-458	-1.9%	1,201	180	17.6%	2,368	237	11.1%	2,801	11	0.4%
<b>Admin., Support, Waste Mgmt., Remed. Svcs.</b>	43,109	1,471	3.5%	2,583	-488	-15.9%	9,660	1,292	15.4%	10,472	1,547	17.3%
<b>Educational Svcs.</b>	13,614	136	1.0%	686	87	14.5%	2,149	27	1.3%	3,262	67	2.1%
<b>Health Care &amp; Social Asst.</b>	59,365	1,242	2.1%	1,837	-696	-27.5%	5,789	125	2.2%	7,614	-441	-5.5%
<b>Arts, Enter., Rec.</b>	11,611	-444	-3.7%	700	348	98.9%	1,727	-77	-4.3%	2,118	-260	-10.9%
<b>Accommodation &amp; Food Svcs.</b>	88,834	-907	-1.0%	3,452	178	5.4%	12,629	748	6.3%	13,960	-131	-0.9%
<b>Other Services</b>	23,502	412	1.8%	1,325	306	30.0%	3,168	492	18.4%	3,517	449	14.6%

Note: Data extracted on 9/6/2011 from LED website: <http://lehd.did.census.gov/led/datatools/qwiapp.html>

# The Greening of Hawaii's Workforce <sup>4,5</sup>

As Hawaii's green economy continues to emerge, there is strong interest in assessing the state's green workforce. As a result, the Department of Labor and Industrial Relations' Research and Statistics office, through a grant funded by the American Recovery and Reinvestment Act (ARRA), conducted a green jobs survey in 2010 to study green employment in Hawaii. Survey results were obtained from data provided by

4,008 private businesses during the first quarter of 2010, which represents a 44 percent overall response rate. Green job projections were developed for both the short-term and long-term that coincided with the timeframe of official industry and occupation projections published by the Department of Labor and Industrial Relations.

Green jobs were defined as those that engage in at least one of the following five core areas:

- G**enerate clean, renewable, sustainable energy
- R**educe pollution and waste, conserve natural resources, recycle
- E**nergy efficiency
- E**ducation, training and support of a green workforce
- N**atural, environmentally-friendly production

Some of the key findings include the following:

- Private sector green jobs were estimated at 11,145 in 2010 which constitute 2.4 percent of total private employment. Green jobs were found in 203 occupations covering 19 major industry groups.
- Current green job vacancies are estimated at 670, representing 1.5 percent of Hawaii's total unemployment.
- Between 2010 and 2012, the expansion in green employment is projected to outpace the overall growth in Hawaii's labor market. Businesses anticipate green jobs to increase by 26 percent to 14,048, accounting for 2.9 percent of total employment.
- Between 2010 and 2018, the green workforce is anticipated to grow by at least 28 percent, and could possibly more than double in size.

## Green Jobs by County

Every county is anticipated to experience solid growth in green jobs from 2010 to the year 2012 (Table 3). Green job growth will be fastest for Hawaii County at almost 42 percent. Oahu, which will post the largest

numerical gain in the green workforce, will expand by 27 percent followed by Maui County at 17 percent, and Kauai County at 15 percent.



**Table 3. Green Jobs by County**

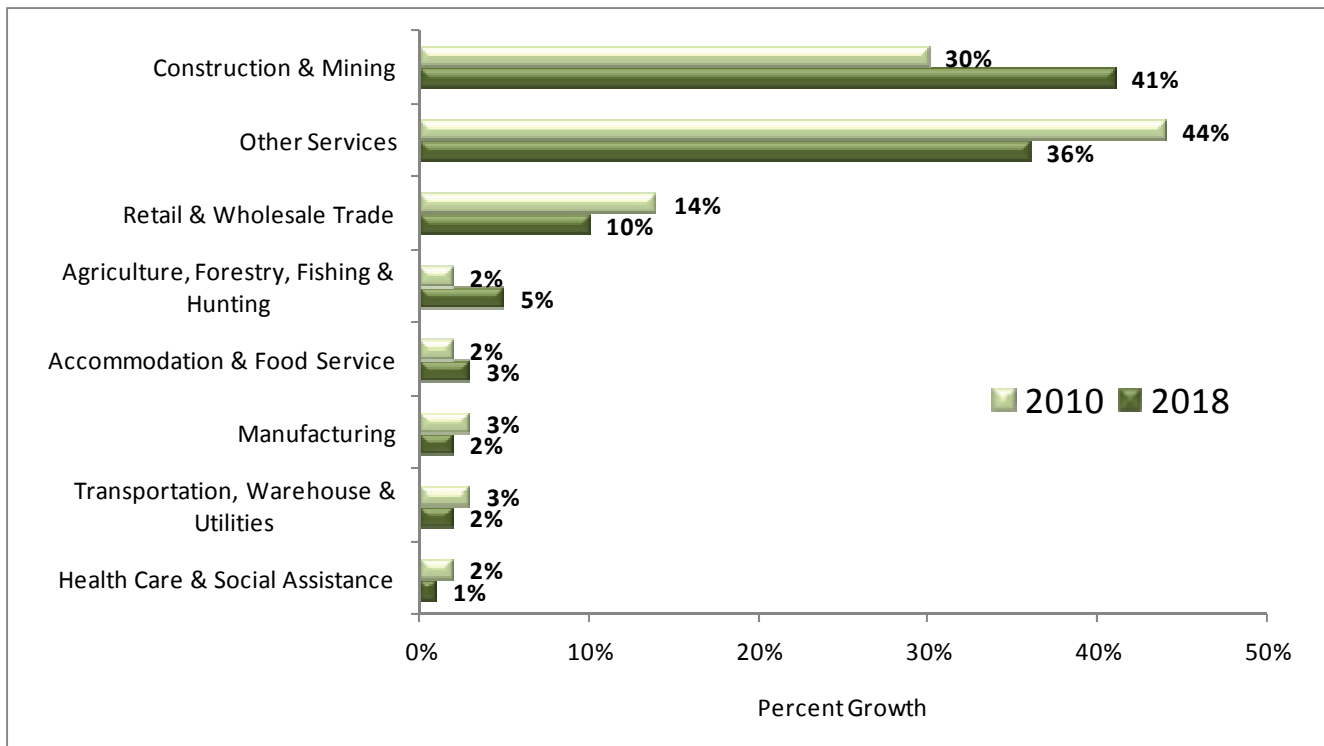
County	Green Job Employment		Change in Green Jobs	
	2010	2012	Numerical	Percent
Honolulu	6,866	8,750	1,884	27%
Hawaii	1,222	1,732	510	42%
Maui	2,597	3,035	438	17%
Kauai	460	531	71	15%
Total	11,145	14,048	2,903	26%

### Long-Term Green Jobs Projections

Long-term estimates for green employment were presented as high and low scenario outcomes. According to the data, the number of green jobs is projected to increase from 11,145 in 2010 to 14,253 in the low growth scenario or could possibly reach 22,766 according to the high growth outcome. Assuming the optimistic outlook, construction and mining will provide the biggest share of green jobs, accounting for a 41 percent

share by 2018. Other services, which includes administrative and support and waste management and remediation services, along with professional, scientific, and technical services which are areas that offer potential for green practices, will post the second largest share at 36 percent. (See Figure 12 for industry distribution of green jobs).

**Figure 12. Industry Distribution of Green Jobs, 2010 and 2018, High Growth Scenario**



The top 10 green occupations are listed in Table 4. Not surprisingly, because of the work performed, four out of the ten jobs fall under the construction and extraction occupational group. These include: electricians, construction carpenters, insulation workers of floor,

ceiling and wall, and solar photovoltaic installers. Electricians will be expanding the fastest followed by either construction carpenters and retail sales persons or vice versa depending on the scenario.

**Table 4. Top 10 Largest Green Occupations**

SOC Codes	Occupation	2010 Green Jobs	2018 High Growth Projection	2018 High Growth Percent Change	2018 Low Growth Projection	2018 Low Growth Percent Change
34-2011	Janitors & Cleaners, exc Maids & Housekeeping Cleaners	1,197	1,497	25%	1,351	13%
19-4093	Forest & Conservation Technicians	601	*	*	*	*
33-9032	Security Guards	552	578	5%	629	14%
47-2111	Electricians	438	1646	276%	814	86%
49-9021	Heating & Air Conditioning & Refrigeration Mechanics & Installers	348	690	98%	489	41%
47-2031	Construction Carpenters	306	692	126%	475	55%
47-2131	Insulation Workers - Floor, Ceiling, & Wall	277	**	**	**	**
37-3011	Landscaping & Groundskeeping Workers	276	584	112%	390	41%
47-4099.01	Solar Photovoltaic Installers	237	*	*	*	*
41-2031	Retail Salespersons	219	576	163%	337	54%

\* Data is suppressed for consistency concerns

\*\* Data is not available

For a detailed profile on the green workforce in Hawaii, the following publications can be found at [www.hiwi.org](http://www.hiwi.org)

- Hawaii’s Green Workforce: A Baseline Assessment - provides a comprehensive framework for assessing green jobs in the private sector for the State of Hawaii.
- Hawaii’s Green Workforce: Beyond the Baseline - summarizes the green jobs projections by industry and occupations.
- Hawaii’s Green Workforce: Industry Profiles and Business Directory - profiles the largest green industries and provides a directory of green businesses based on the *Hawaii Green Jobs Survey* completed in July 2010.
- Hawaii’s Green Workforce: Green Occupational Profiles—presents green career profiles reflecting new and emerging green occupations as defined in the Occupational Information Network (O\*NET) program.

# Short- and Long-term Job Outlook

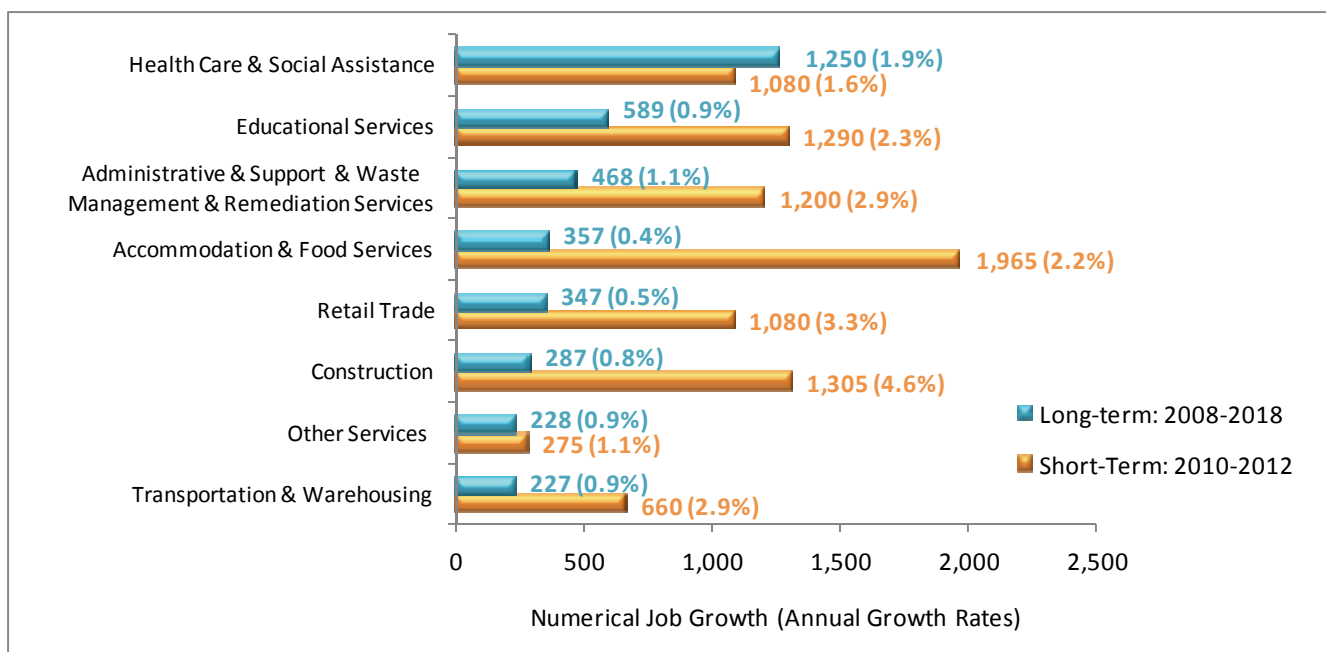
Both the short-term and long-term projections for Hawaii predict positive growth. The short-term outlook, from 2010 to 2012 points to a recovering economy and forecasts an increase of 22,840 jobs, or 1.8 percent annually. Growth over the long term will be slower and is projected to expand by 0.7 percent annually from 2008 to 2018. (Sources for More Labor Market Information section on page 21 provide links to detailed reports on the short- and long-term job outlook).

Job gains among the industries will vary slightly depending on the timeframe of the projections. More than half of the short-term job gain is projected to occur in three sectors: education and health services (4,740); trade, transportation and utilities (4,110); and leisure and hospitality (4,010). Within these sectors educational services will provide the biggest gains, followed by food services and drinking places and accommodation. Three industries will account for about two-thirds of the increase in the long-term

forecasts: education and health services (18,390); trade, transportation, and utilities (7,420); and professional and business services (6,080). Within these major sectors, the following subsectors will add at least 340 jobs per year: healthcare and social assistance; educational services; administrative and support and waste management and remediation services; accommodation and food services; and retail trade (Figure 13). During this same period, manufacturing, natural resources and mining, and the information industries will incur a slight decline in jobs.

The overall job outlook for the state appears more positive in the short-term compared to the long-term. Continued improvement in tourist arrivals should help to stimulate the local economy. New flights to China and Sydney along with the additional flights to current destinations provide hope for recovery in this industry. Major planned construction projects should also boost employment.

**Figure 13. Hawaii’s top growth industries: Projected annual job growth for short- and long-term**

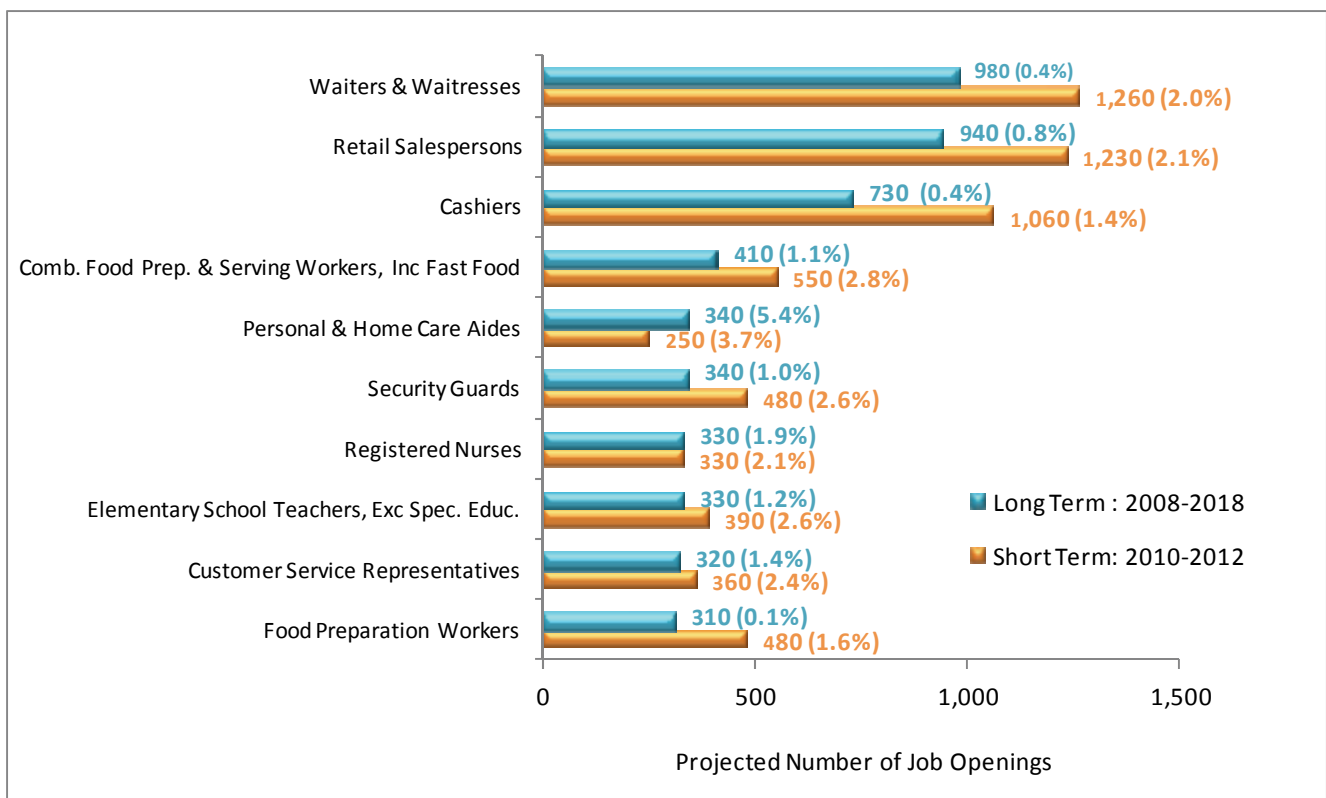


Job openings are created when an industry grows or a worker creates a vacant position by leaving the labor force or changing occupations. Many of the job openings (growth plus replacements) for the short-and long-term will occur in entry level, transitional jobs in which there is a constant turnover of workers. (Figure 14). Eight of the ten occupations with the most projected job openings require short- or moderate term on-the-job training and pay a median annual wage between

\$18,220 and \$32,200 or less than \$16.00 an hour. Waiters and waitresses, retail salespersons, and cashiers are expected to be in the highest demand.

Two of the ten occupations with the most projected job openings require higher education and training. They include registered nurses and elementary school teachers.

**Figure 14. Ten Hawaii occupations projected to have the most annual job openings**



Jobs that pay median annual wages of more than \$48,000 will provide a substantial number of job openings through 2018. Four of the occupations: carpenters, construction laborers, electricians, and police and sheriff's patrol officers do not require postsecondary training (Figure 15).

The long-term outlook for the number of job openings by education reflects employers' need for a wide range of trained workers. While there will be many openings for workers who can obtain their training on the job, there will also be a substantial number of job openings that will require at least a bachelor's degree. About 20 percent of all job openings forecasted through 2018 will require a bachelor's degree or higher (Figure 16).

Figure 15. High-wage occupations projected to have the most average annual openings up to 2018

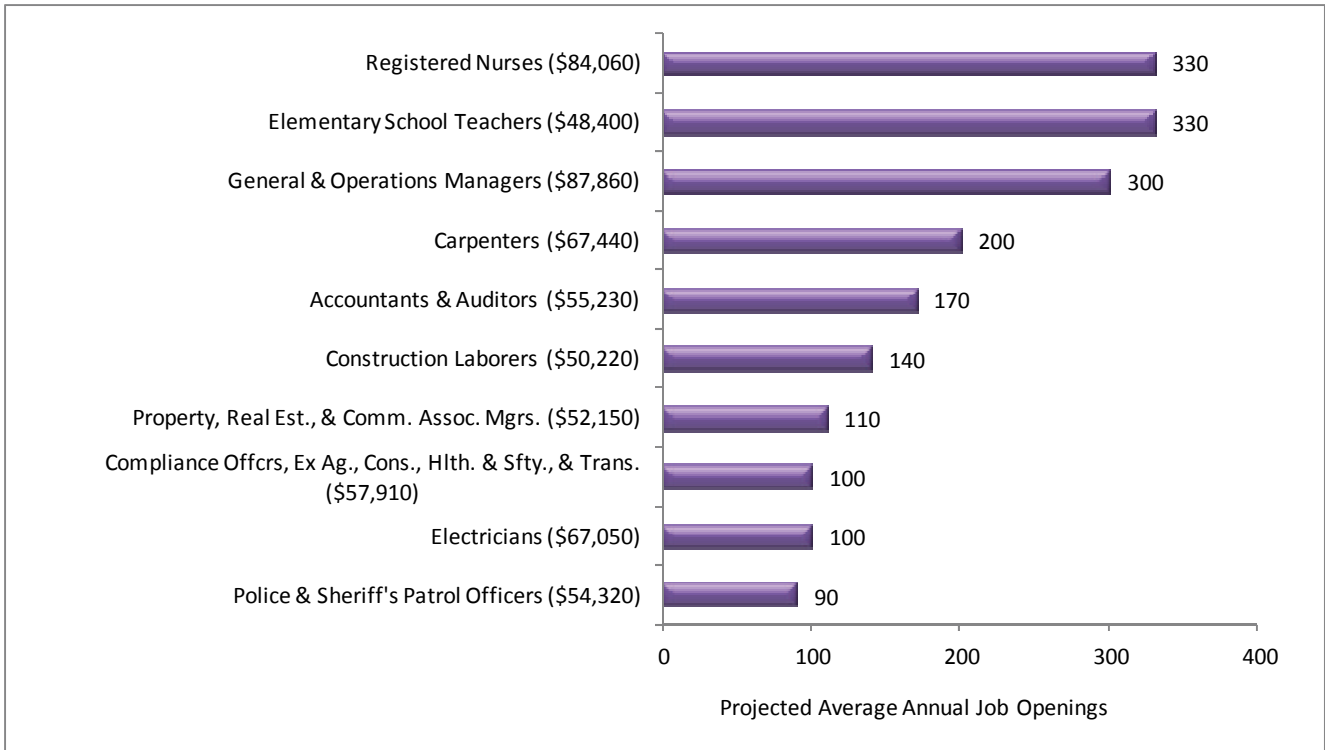
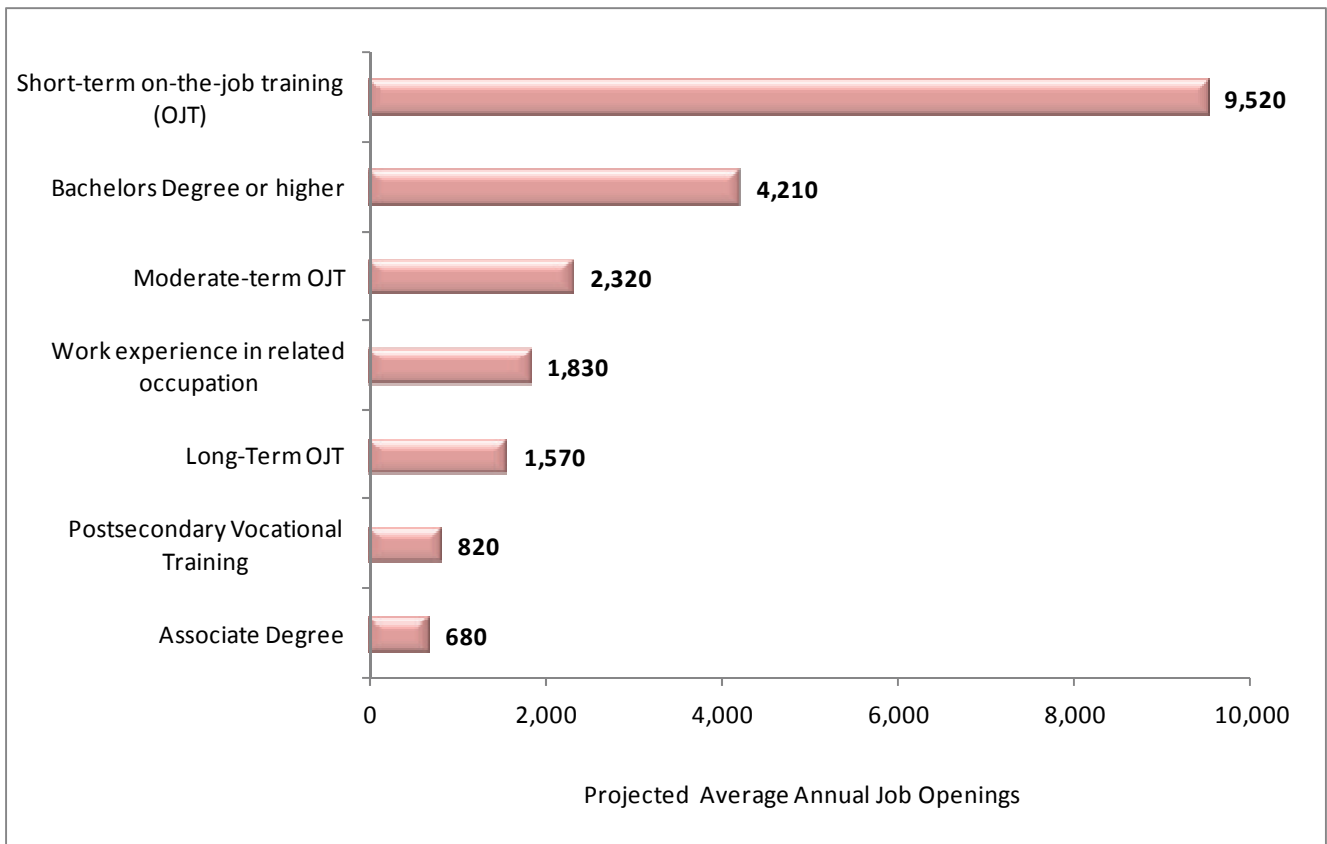


Figure 16. Projected average annual openings by education and training required, 2008-2018



# Reason for Optimism

One indication that Hawaii’s economy is starting to improve is the elevated demand for more workers by employers. Table 5 presents figures on advertised jobs by county from 2008-2011.

According to the data, all counties experienced a considerable drop in job postings from 2008 to 2009. The numbers improved slightly for Honolulu MSA and

Maui County in 2010. So far in 2011, employers in all counties have been posting more help wanted listings, with Maui County, in particular, benefitting with an increase of 47 percent. Hawaii County went up by 25 percent, followed by Honolulu MSA with a gain of 23 percent, while job advertisements in Kauai County rose by 19 percent.

**Table 5. Advertised Job Openings by County (Monthly Average)**

	2008	2009	2010	2011*
Honolulu MSA	25,388	18,276	19,837	24,435
Maui County	2,714	1,954	2,077	3,058
Hawaii County	2,389	1,986	1,929	2,417
Kauai County	1,812	1,231	1,220	1,447

\*Data is from January to August 2011

Source: Online Advertised Jobs Data on HireNet Hawaii

## Top 10 Jobs with the Most Advertised Openings by County

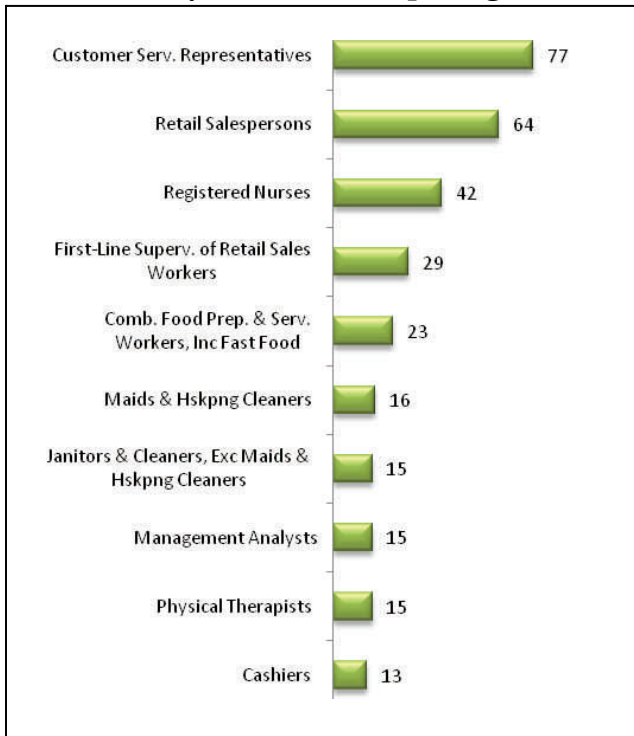
As of September 16, 2011, the top advertised jobs within each county offer a mixture of opportunities for jobseekers. The following graphs (Figure 17) display the 10 occupations with the most openings for each county.

Four of the occupations common to all counties include: registered nurses, retail salespersons, combined food preparation and serving workers, and first-line supervisors of retail workers. Although at least half of the jobs in each county can be obtained with only a

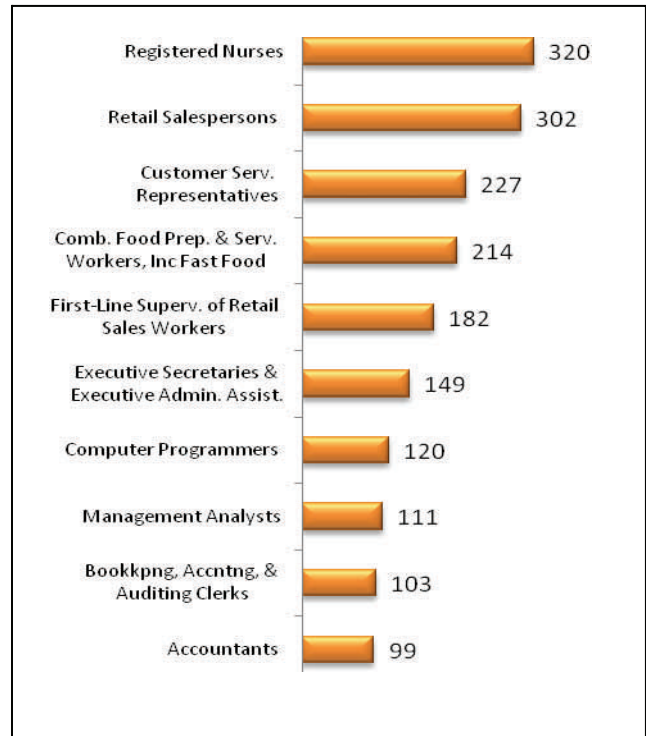
high school diploma, employment for employees with postsecondary training also exist. These are found in the following positions: on Maui County, registered nurses, management analysts, and physical therapists; in Honolulu MSA, registered nurses, computer programmers, management analysts, and accountants; on Kauai County, registered nurses and civil engineers; and on Hawaii County, registered nurses, pharmacists, management analysts, physical therapists, and occupational therapists.

Figure 17. Advertised Job Openings by County

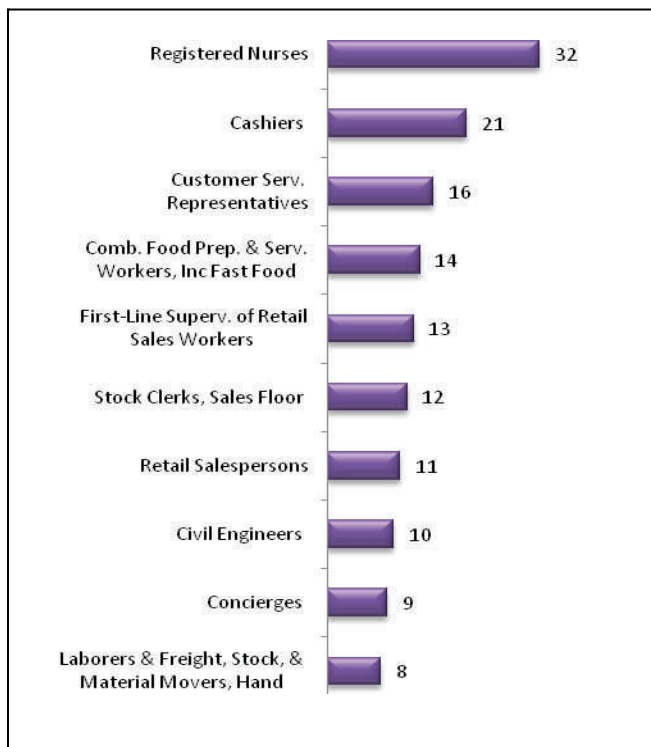
**Maui County - Advertised Openings**



**Honolulu MSA - Advertised Openings**



**Kauai County - Advertised Openings**



**Hawaii County - Advertised Openings**



Source: Online Advertised Jobs Data as of September 16, 2011

# More Labor Market Information

For more information, visit the Research and Statistics Office's website at [www.hiwi.org](http://www.hiwi.org) or [www.hawaii.gov/labor](http://www.hawaii.gov/labor). There you will find the many publications that the Labor Market Research Section produces about the state of the local labor market as well as employment projections by industry and occupations and analyses. In addition to the *Hawaii Labor Market Dynamics* report, other recently published material include:

- [\*\*Affirmative Action Programs – Labor Information\*\*](#) tables for state and counties updated *Table 1- Labor Force Information by Sex and Race* with 2010 Annual Local Area Unemployment Statistics (LAUS) data and based on 2000 Census.
- [\*\*Employment Forecasts for the Short-Term Future\*\*](#) provides short-term industry and occupational projections for Hawaii, using 3rd quarter employment data in 2010 to forecast employment for the equivalent quarter in 2012.
- [\*\*Hawaii's Green Workforce - A Baseline Assessment\*\*](#) provides a comprehensive framework for assessing green jobs in the private sector of the State of Hawaii.
- [\*\*Hawaii's Green Workforce - Beyond the Baseline\*\*](#) presents industry and occupational projections to 2018 regarding Hawaii's green workforce based on survey data from the 2010 Hawaii Green Jobs Survey.
- [\*\*Hawaii's Green Workforce - Green Occupational Profiles\*\*](#) supplements *Hawaii's Green Workforce: A Baseline Assessment*. Green Careers profiled reflect new and emerging green occupations as defined in the Occupational Information Network (O\*NET) program.
- [\*\*Hawaii's Green Workforce - Industry Profiles and Business Directory\*\*](#) supplements *Hawaii's Green Workforce: A Baseline Assessment* which profiles the three largest industries, as measured by the number of green workers in each county and provides a directory of green businesses based on the Hawaii Green Jobs Survey completed in July 2010.
- [\*\*Local Employment Dynamics\*\*](#) reports can be generated for Hawaii private industries based on eight quarterly workforce indicators such as employment, job creation and flow via new hires and separations, worker turnover, and wages by industry, age, and gender.
- [\*\*Long-Term Industry and Occupational Projections, State of Hawaii 2008-2018 \(Revised\)\*\*](#) tables contain state employment for industries and occupations and expected growth amounts for the designated time period as well as occupational openings based on growth and replacement needs.
- [\*\*Long-Term Industry and Occupational Projections, Counties 2008-2018\*\*](#) tables contain county employment for industries and occupations and expected growth amounts for the designated time period as well as occupational openings based on growth and replacement needs.
- [\*\*Occupational Employment & Wages in Hawaii 2010\*\*](#) is an annual report compiling the results of the Occupational Employment Statistics survey, collecting employment and wage data by occupation over a three-year period from approximately 6,000 establishments.



# Notes

- <sup>1</sup> U.S. Census Bureau, [<http://www.census.gov/popest/states/tables/NST-PEST2010-01.xls>], April 1, 2000 to July 1, 2010 (NST-PEST2010=01).
- <sup>2</sup> U.S. Department of Labor, Bureau of Labor Statistics, [<http://www.bls.gov/news.release/pdf/srgune.pdf>].
- <sup>3</sup> U.S. Census Bureau, Local Employment Dynamics, QWI Online, [<http://lehd.did.census.gov/led/datatools/qwiapp.html>].
- <sup>4</sup> Hawaii's Green Workforce - A Baseline Assessment, [[https://www.hiwi.org/admin/gsipub/htmlarea/uploads/Green\\_Jobs\\_Report.pdf](https://www.hiwi.org/admin/gsipub/htmlarea/uploads/Green_Jobs_Report.pdf)], December 2010.
- <sup>5</sup> Hawaii's Green Workforce - Beyond the Baseline, [<https://www.hiwi.org/admin/gsipub/htmlarea/uploads/Green%20Jobs-Beyond%20Baseline.pdf>], May 2011.