Economic Impact of

Alaska's 2017 Visitor Industry



Prepared for: STATE OF ALASKA Alaska Department of Commerce, Community, and Economic Development

Division of Economic Development



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November 2018

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Alaska Department of Commerce, Community, and Economic Development Division of Economic Development

Prepared by:



www.mcdowellgroup.net

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Executive Summary

Alaska's visitor industry plays a vital role in the state's economy, one that has become increasingly important in recent years as Alaska experienced an economic recession. With visitor spending affecting many segments of the economy, measuring the economic impact of tourism is complex. To accurately gauge the role of the visitor industry in Alaska's economy, the Alaska Department of Commerce, Community, and Economic Development contracted with McDowell Group to measure the economic impact of out-of-state visitors to Alaska in 2017. (This study follows five previous reports over the last decade, measuring impacts in 2008, 2011, 2013, 2014, and 2015.) Following are key findings from the study.



Total Economic Impacts

Including direct, indirect, and induced impacts, Alaska's out-of-state visitor industry accounted for 43,300 annual jobs in the state in 2017. Peak employment is estimated at 52,000 jobs. The industry generated \$1.5 billion in labor income, and \$4.5 billion in economic output, over the same period.

The visitor industry has shown strong growth over the last decade, reflecting significant increases in visitor volume. Between 2008 and 2017, visitor volume increased by 15 percent (and by 27 percent since the industry's low point in 2010), reaching a record 2.2 million visitors in 2017. Over the same period, the number of visitor industry jobs grew by 20 percent; and both labor income and economic output grew by 32 percent.

Economic impacts are based on direct visitor industry spending of \$2.8 billion, which includes \$2.5 billion in visitor spending, \$326 million in spending on air and ferry tickets to enter/exit the state, \$297 million in cruise line spending and payroll, and \$22 million in spending by cruise ship crew members.

In 2017, Alaska's visitor industry accounted for...







Impacts by Region

Alaska's out-of-state visitors travel, and thus have economic impacts, throughout the state. Southcentral has the highest number of visitor industry-related jobs, at 20,700, or 48 percent of the statewide total, followed by Southeast (11,925 jobs; 28 percent), Interior (8,500 jobs; 20 percent), Southwest (1,800 jobs; 4 percent), and the Far North (375 jobs; 1 percent). Labor income was distributed accordingly, ranging from \$761 million in Southcentral down to \$13 million in the Far North.

Far North 375 Jobs; \$13m LI Interior 8,500 Jobs \$276m LI Southcentral

Economic Impacts of Alaska's Visitor Industry, 2017, by Region

Southwest

\$50m Labor Income

11,925 Jobs \$445m Labor Income

Southeast

20,700 Jobs

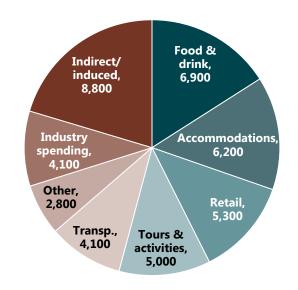
\$761m LI

Impacts by Sector

Employment resulting directly from visitor spending is concentrated in five sectors: food and drink (6,900 jobs), accommodations (6,200 jobs), retail (5,300), tours and activities (5,000), and transportation (4,100). The "other" category represents another 2,800 jobs. Employment resulting from additional industry spending (which includes cruise line spending and payroll, crew member spending, and air/ferry ticket purchases) totaled 4,100 jobs.

Indirect and induced employment, which results from visitor dollars circulating through the Alaska economy, totaled 8,800 jobs. These jobs are are distributed throughout the state's economy – virtually the entire service and support sector.

Employment Impacts of Alaska's Visitor Industry, 2017, Number of Jobs by Sector



Role in Alaska's Economy

The 43,300 jobs connected to Alaska's visitor industry represented 10 percent of total statewide employment in 2017. Total visitor industry-related labor income of \$1.5 billion represented 5 percent of the statewide total. The visitor industry plays the biggest role in Southeast, where it accounted for 23 percent of employment, followed by the Interior at 13 percent, Southcentral at 7 percent, Southwest at 5 percent, and Far North at 2 percent.



Revenues to Municipal and State Governments

State revenues resulting from out-of-state visitors totaled \$125.6 million in 2017 and are detailed in the chart below. The largest component of visitor industry revenues to State government is revenue earned by Alaska Railroad Corporation (\$31.9 million), followed by Fish and Game revenues from licenses/tags (\$25.5 million) and Commercial Passenger Vessel (CPV) Tax revenues (\$19.9 million). Payments from cruise lines, which include the CPV, Gambling Tax, Ocean Ranger Program, and Environmental Compliance categories, totaled \$33.3 million, excluding (confidential) corporate income tax payments. The total State revenue amount should be considered conservative as it is not possible to quantify all user fees and taxes paid by non-resident visitors and visitor industry-related businesses..

State revenues resulting from the visitor industry grew by 38 percent between 2011 and 2017, reflecting strong growth in visitor traffic as well as increased Fish and Game fees, among other factors. Comparing 2008 to 2017 results in a decrease of 8 percent, due to the higher CPV tax during the first several years of the program.

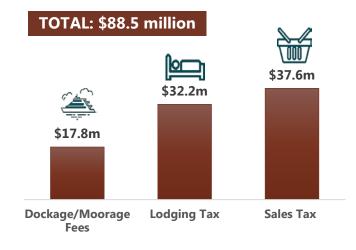
TOTAL: \$125.6 million \$31.9m \$25.5m \$19.9m \$16.0m **Ⅲ**/ \$11.2m \$8.2m \$4.2m Environmental Ocean Ranger Vehicle Rental **AMHS** CPV Fish and Game AKRR Passenger Corporate **Gambling Tax** Compliance Program Tax Income Tax -Licenses/Tags **Tourism**

State Government Revenues Attributable to Visitors, 2017

Revenues accruing to municipalities from Alaska's out-of-state visitor industry are estimated at \$88.5 million in 2017, including \$37.6 million in sales tax revenues, \$32.2 million in lodging tax revenues, and \$17.8 million in dockage/moorage payments. These revenues reflect out-of-state visitor activity only. (Property tax revenues are an additional source of municipal revenues but were not measured for this study.)

Municipal government revenues attributable to out-of-state visitors increased by 27 percent over the last decade, largely attributable to strong growth in sales and lodging tax revenues.

Municipal Revenues Attributable to Visitors, 2017



Introduction and Methodology

Introduction

Alaska's visitor industry is clearly a vital part of the state's economy. Its presence is visible throughout the state in the form of cruise ships, tour buses, floatplanes, whale watching vessels, hotels, and tramways, for example. But this economic sector can be a challenging one to measure. Unlike most other industries, visitor industry employment falls into a range of categories, including transportation, services, food/beverage, and accommodations, among others. Understanding the role of visitors in our economy requires in-depth analysis of where and how visitor dollars are spent, and how that spending impacts the broader economy.

The Alaska Department of Commerce, Community, and Economic Development (DCCED) contracted with McDowell Group to measure the economic impact of Alaska's visitor industry for the 12-month period of October 2016 through September 2017, including direct, indirect and induced effects. In addition to estimating visitor-related spending, employment, and payroll, the report shows visitor-related impacts on state and municipal governments over the same period.

The most recent comprehensive study of visitor industry impacts (also conducted by McDowell Group) covered the October 2010 through September 2011 period; three subsequent updates covered 2013, 2014, and 2015.

Methodology

Visitor Volume

Visitor volume estimates for the study period of October 2016 through September 2017 were based on fall/winter 2016-17 and summer 2017 visitor volume reports conducted by McDowell Group for DCCED.

In summer 2016, 57,441 airport and highway travelers were "tallied" (recorded as either visitors or Alaska residents) as they exited Alaska, establishing visitor/resident ratios, by exit point and month. The resulting ratios were applied, by month and by location, to traffic data (highway border crossings and airport enplanements) to arrive at visitor volume estimates for summer 2017. (Cruise passengers were assumed to be 100 percent visitors, and previously established ratios for ferry passengers were used.)

Fall/winter visitor volume for 2016-17 was determined in a similar manner; however, the ratios were from the most recent fall/winter AVSP study period, in 2011-12, when 38,015 travelers were tallied.

Traffic data was collected from the following sources: Cruise Line Agencies of Alaska (CLAA), additional cruise lines (whose traffic data is not recorded by CLAA), U.S. Department of Homeland Security (for highway border crossings), Alaska Department of Transportation and Public Facilities (DOTPF; for Anchorage and Fairbanks air passenger enplanements); Alaska Airlines, Delta Airlines, Juneau International Airport, Ketchikan International Airport, and Alaska Marine Highway System.

Additional details on visitor volume methodology can be found in the AVSP and Visitor Volume reports, posted here:

Visitor Spending

Summer visitor spending estimates were based on results from 5,926 surveys of out-of-state visitors who were exiting Alaska at major exit points between May and September 2016. The survey collected information on the total amount spent in Alaska as well as the amount spent in each community visited, by spending category (lodging, tours/activities/entertainment, gifts/souvenirs/clothing, food/beverage, transportation/rental cars/fuel, packages, and other). Spending figures exclude cruise packages and transportation used to enter and exit the state.

To arrive at total visitor spending estimates, several adjustments were made to the spending figures from the survey. Tour commissions were extracted from passenger spending estimates because they accrue directly to travel agents, tour operators, and cruise lines at the time of the sale. In addition, spending by non-cruise visitors in the "overnight package" category was distributed among sectors and regions (as respondents are not able to categorize their package spending for purposes of the survey). In addition, spending was adjusted to reflect inflation between summers 2016 and 2017.

Fall/winter spending was determined in a similar manner, based on the most recent AVSP spending data, from the 2011-12 study period. These spending figures were also adjusted by inflation between the 2011-12 and 2016-17 periods.

Final spending estimates were derived from applying average spending by season, by category, and by region to visitor volume estimates.

More detail on visitor volume and spending methodology is available in the AVSP reports at the above link.

Additional Visitor Industry Spending

Additional visitor industry spending includes cruise line spending, crew member spending, and visitor spending on air and ferry tickets to enter and exit Alaska.

CRUISE LINE SPENDING

Cruise line spending was based on 2017 purchasing data provided by five major cruise lines: Princess Cruises, Holland America Line, Royal Caribbean International (which operates both Royal Caribbean Cruises and Celebrity Cruises), Norwegian Cruise Lines, and Carnival Cruise Lines. Together, these lines represented 91 percent of 2017 cruise passenger traffic. Data was not available from Disney Cruise Line or other (smaller) lines. Spending by other lines in Alaska was estimated using Carnival's per passenger spending data as a proxy, as the other lines most closely resemble Carnival in terms of their Alaska operations. (That is, the other lines do not operate land-based tours like Holland America-Princess.)

Data referring to 765 vendors was categorized by region and industry using the North American Industry Classification System (NAICS). Spending data included purchase of goods and services from Alaska providers and payments to various government entities, including port fees and other taxes.

NAICS codes were used in conjunction with IMPLAN to estimate the employment and payroll impacts of cruise line spending on local communities. IMPLAN is a predictive input-output model of local and state economies and is widely used to measure the economic impact of industry activity and industrial/commercial development. IMPLAN provides economic multipliers which are specific to boroughs, census areas, and other localities in Alaska and a range of over 500 industries.

All payments from cruise lines to excursion providers were excluded from the final spending estimates, as this spending is already accounted for in visitor spending data. For example, payments by cruise lines to Mt. Roberts Tramway were excluded, because passengers reported that spending in the AVSP survey; therefore, it is included in the Passenger Spending category.

CREW MEMBER SPENDING

Crew member spending for 2017 was based on previous surveys of crew members conducted by McDowell Group, modified to account for changes in crew member volume by port and inflation.

SPENDING ON AIR AND FERRY TICKETS

Since spending on air and ferry tickets to enter and exit Alaska is excluded from AVSP visitor spending estimates, these figures are estimated and added to total visitor industry spending figures. Spending on air tickets was based on average Seattle-Alaska airfares, estimated volume by location, and an assumption that roughly half of spending on air tickets to enter and exit Alaska actually stays in Alaska and has some impact on the economy. Spending on ferry tickets to enter and exit the state between October 2016 and September 2017 was provided by the Alaska Marine Highway System. Since the AMHS has not required passengers to provide zip codes since 2015, the portion of this spending attributable to non-resident passengers was estimated based on percentage changes in non-resident passenger volumes between 2014-15 and 2016-17, by season and port.

Economic Impact Analysis

McDowell Group maintains a visitor industry economic impact model for assessing the effects of visitor industry-related spending in Alaska. Estimates of direct visitor industry employment and payroll are derived from visitor industry spending estimates and verified using employment and payroll data from the Alaska Department of Labor and Workforce Development and U.S. Bureau of Economic Analysis. The model incorporates modified IMPLAN multipliers to estimate indirect and induced impacts. Indirect effects include those jobs and income created as a result of visitor industry businesses purchasing goods and services in support of their business operations. Induced effects include jobs and income created as a result of employees of the visitor industry spending their payroll dollars in support of their households. Together, indirect and induced impacts are often termed "multiplier effects."

Visitor Industry Tax Revenues

The report includes estimates of tax revenues to municipalities and state government from out-of-state visitors, to the extent possible.

Regional sales tax revenue estimates were calculated based on visitor industry spending and visitor volume at the community and regional level. For both lodging and sales tax estimates, tax rates and total taxes collected by community (from the *Alaska Taxable* report, 2017) were taken into account in the analysis. Total calendar year 2017 taxes were assumed as a proxy for the study period of October 2016 to September 2017. Cruise ship dockage/moorage revenues were collected from municipalities.

Cruise line payments to the State of Alaska were reported by the Department of Revenue. Fishing and hunting licenses and tag revenues were reported by the Department of Fish and Game. Vehicle rental taxes were reported by the Department of Revenue, adjusted to account for out-of-state visitors. The Department of Revenue also reported corporate income taxes associated with the visitor industry. Alaska Marine Highway System revenues were estimated based on updated passenger volume and previous non-resident revenues. The Alaska Railroad Corporation reported passenger-related revenues, and McDowell Group estimated the percentage attributable to out-of-state visitors.

Note on Study Periods

This study measures impacts from the October 2016 through September 2017 period. For purpose of brevity and clarity, this period is referred to as "2017" in this study (with the exception of the visitor volume chapter). Note that the vast majority of spending and impacts in the study period occur in the latter year (January through September of 2017). Likewise, previous studies will be referred to by the year encompassing the majority of the 12 months, as follows:

October 2016 through September 2017 = "2017" October 2014 through September 2015 = "2015"

October 2013 through September 2014 = "2014"

October 2012 through September 2013 = "2013"

May 2011 through April 2012 = "2011"*

*Note that this methodology was shifted in all subsequent reports so that the most recent summer period would be measured.

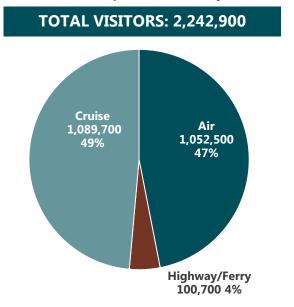
This chapter presents visitor volume for the study period of October 2016 to September 2017. These visitor volume estimates were used in conjunction with average visitor spending estimates to arrive at total visitor spending, detailed in the following chapter. For additional details on visitor volume during this time period, as well as more information on visitor volume trends, please refer to the reports *Alaska Visitor Volume Report, Summer 2017* and *Alaska Visitor Volume Report, Fall/Winter, 2015-2018*.

Visitor Volume

Alaska welcomed 2.2 million visitors during the study period of October 2016 to September 2017. By transportation market, 49 percent traveled by cruise ship, 47 percent were air visitors (entered *and* exited the state by air), and 4 percent were highway/ferry visitors (entered *or* exited the state by highway *or* ferry).

The summer (May-September) market represented 86 percent of all visitors (1,926,300), while the fall/winter (October-April) market represented 14 percent of all visitors (316,600). Alaska visitor volume is typically tracked in terms of summer and fall/winter.

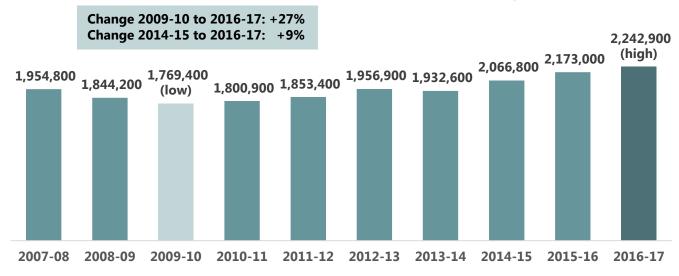
Chart 1. Alaska Visitor Volume, October 2016-September 2017, By Market



Visitor Volume Trends

Alaska's visitor volume has been increasing fairly steadily since the low point of 2009-10, showing an overall increase of 27 percent since that period. Since the last time economic impacts were measured, in 2014-15, volume increased by 9 percent. Compared to a decade ago (2007-08), volume increased by 15 percent.

Chart 2. Alaska Visitor Volume, 2007-08 to 2016-17 (October-September)



Sources: AVSP 6 and 7; Interim Visitor Volume reports.

Visitor Industry Spending

This chapter details the "direct" visitor industry spending impacts in Alaska in the 2017 study period. Direct industry spending includes spending by out-of-state visitors on their Alaska trip, cruise line spending, cruise ship crew member spending, and spending by visitors on their air and ferry tickets to enter/exit Alaska.

Visitor Spending

Out-of-state visitors to Alaska spent an estimated \$2.2 billion in Alaska in 2017. This figure includes in-state spending only, excluding the cost of transportation to and from the state, such as air tickets, cruise or cruise/tour packages, and ferry tickets.

For purposes of this study, tour commissions were extracted from passenger spending data because they accrue directly to travel agents, tour operators, and cruise lines at the time of the sale.

Visitor Spending by Region and Sector

In the AVSP survey, respondents were asked to estimate their purchases in each community they visited, by spending category. Chart 3 shows how spending is distributed by sector, while Chart 4 shows how spending is distributed by region.

Visitor spending occurs in various sectors of the economy, with several categories receiving about one-fifth each: lodging (21 percent), gifts (20 percent), food/beverage (20 percent), and tours (18 percent). Note that the "other" category is largely made up of overnight packages that affect several sectors.

Nearly half (44 percent) of visitor spending occurs in the Southcentral region; one-third (32 percent) in Southeast, 18 percent in Interior, 5 percent in Southwest, and 1 percent in Far North. Visitor spending does not reflect the relative volume of visitors by region; Southeast actually receives more visitors than Southcentral but represents less spending. Most Southeast visitors are cruise passengers who do not purchase lodging in Southeast communities.

Chart 3. Total Visitor Spending in Alaska 2017, By Sector

TOTAL VISITOR SPENDING: \$2.2 Billion

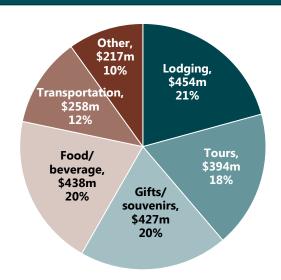
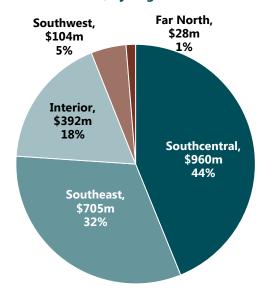


Chart 4. Total Visitor Spending in Alaska 2017, By Region



Additional Visitor Industry Spending

Direct spending by visitors in the state is supplemented by three types of additional spending that must be considered in economic impact analysis:

- Cruise line spending and payroll
- Cruise ship crew member spending
- Spending by visitors on airfare and ferry tickets to enter/exit the state

Each type of spending is detailed below.

Cruise Line Spending and Payroll

As noted above, direct visitor spending excludes purchases of cruise and cruise/tour packages; the portion of these expenditures that affects the Alaska economy are accounted for in the cruise line spending category. This spending includes payments to hotels, motorcoach companies, the Alaska Railroad Corporation, and other components of land tours that are included in the cruise package price.

Cruise lines and their subsidiaries spent an estimated \$297 million on goods and services provided by Alaska businesses, employee payroll, and tax payments during the 2017 study period. This estimate is derived from detailed 2017 purchasing and wage information provided by five major cruise lines: Princess Cruises, Holland America Line, Royal Caribbean International (which operates both Royal Caribbean Cruises and Celebrity Cruises), Norwegian Cruise Lines and Carnival Cruise Lines. Together, these lines represented 91 percent of 2017 cruise passenger traffic. Spending by the other cruise lines was assumed to resemble those of Carnival on a perpassenger basis based on comparable scale of operations.

For purposes of economic impact analysis, spending was compiled by business sector and region. Spending data was also adjusted to exclude payments to tour vendors, which are already accounted for in the visitor spending. (Many cruise passengers purchase shore excursions from their cruise line, then the cruise line pays the operator on behalf of the passenger.)

Crew Member Spending

Approximately 27,000 crew members visited Alaska in 2017, spending an estimated \$22 million in the state. Each crew member generally sails on 10 to 20 individual voyages, visiting multiple communities on each voyage. Crew members make a wide variety of purchases while in port: they visit restaurants and bars; they purchase communication-related items such as phone cards, Internet, and postage; and they visit retail outlets such as Fred Meyers, Costco, and Wal-Mart. Estimated spending by crew members in 2017 was based on previous surveys of crew members conducted by McDowell Group, modified to account for changes in crew member volume by port and inflation.

Visitor Spending on Air and Ferry Travel

AIR TRAVEL

An estimated \$315 million in airplane ticket spending is estimated to have accrued to Alaska in 2017. While the AVSP survey does not collect spending on airplane tickets to enter and exit the state, visitor spending on air travel impacts the state's economy in the form of landing fees, fuel purchases, airline employee wages, and other expenditures in support of airline operations.

To estimate visitor spending on air travel, the estimated number of air visitors was multiplied by average Seattle-Alaska round-trip fares, by season. One-half of the total ticket spending was assumed to stay in-state. Spending was distributed by region based on exiting air traffic volume. This methodology is inexact: passengers fly to and from various destinations with various pricing, and many passengers fly to or from points other than Seattle. In the absence of more specific data, this provides a reasonable and conservative estimate of impacts from visitor spending on airfare in and out of the state.

FERRY TRAVEL

Visitors to Alaska spent an estimated \$11 million on ferry tickets to enter and exit the state in 2017. Similar to airplane tickets, spending on ferry tickets to enter and exit Alaska is not measured in the AVSP survey. For purposes of economic impact analysis, all ferry spending is attributed to Southeast because all ferries entering and exiting Alaska sail between Southeast ports and Bellingham or Prince Rupert.

The figure of \$11 million differs from the \$16 million shown in the final chapter of this report (showing State of Alaska revenues) because it refers only to tickets to enter and exit the state; \$16 million includes all revenues from out-of-state visitors to the Alaska Marine Highway System, including in-state travel.

Total Visitor Industry Spending

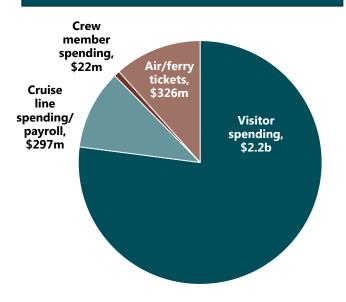
Adding together spending by visitors, cruise lines, crew members, and spending on air/ferry tickets results in total direct visitor industry spending of \$2.8 billion in 2017.

Three-quarters (77 percent) of direct spending is attributable to visitor out-of-pocket spending; 12 percent to spending on air/ferry tickets; 11 percent to cruise line spending; and 1 percent to crew member spending.

The following chapter details how this direct spending translates into jobs, labor income, and economic output.

Chart 5. Total Visitor Industry Spending, By Source, 2017

TOTAL INDUSTRY SPENDING: \$2.8 Billion



Economic Impact Analysis

Spending in Alaska by visitors and by the businesses that serve those visitors creates jobs, income, and secondary spending throughout the Alaska economy. Visitor spending creates jobs and payroll with tour companies, hotels and lodges, retail establishments, transportation providers, and a range of other businesses. Visitor industry businesses and their employees in turn re-spend a portion of that money with other Alaska businesses (some is spent outside Alaska).

Figure 1. Visitor Industry Economic Impact Model Goods **Services Direct impacts** Food/beverages Tours Visitors spend money in Alaska Souvenirs Recreation Fuel for rental cars Lodging **Indirect impacts** Goods **Services** Restaurant supply Utilities Companies that directly serve Maintenance Inventory visitors spend money Fuel for transportation Accountants **Induced impacts** Goods **Services** Groceries Medical care Employees of tourism and Clothing Housing Restaurants Recreation related companies spend money

This chapter describes the regional and statewide employment and labor income effects of visitor industry-related spending. The analysis includes direct employment and labor income, as well as indirect and induced employment and labor income (the "multiplier effects").

Employment, Labor Income, and Spending Impacts

Spending by the Alaska visitor industry, including direct, indirect, and induced effects, resulted in 43,300 jobs in 2017, \$1.5 billion in labor income, and \$4.5 billion in economic output. The employment estimate is a tally of the total number of full- and part-time jobs linked to non-resident visitor travel to Alaska. It includes annual average wage and salary employment, and total proprietors' employment (the total number of sole proprietorships or partnerships active at any time during the year). Because of the strongly seasonal nature of Alaska's visitor industry, "peak" employment is also a useful measure, estimated at 50,000 jobs in 2017.

Figure 2. Economic Impacts of Alaska's Visitor Industry, 2017







Regional Impacts

The regional distribution of visitor industry-related employment, labor income, and spending is displayed in the following map. Southcentral accounts for the largest portion of employment at 20,700 jobs (48 percent), followed by Southeast at 11,925 jobs (28 percent), Interior at 8,500 jobs (20 percent), Southwest at 1,800 jobs (4 percent), and Far North at 375 jobs (1 percent).



Figure 3. Visitor Industry Economic Impacts by Region, 2017

Employment and Labor Income by Sector

Visitor industry jobs are concentrated in five sectors of Alaska's economy (see Table 1, next page). In 2017, eating and drinking establishments ("food/drink") accounted for the most direct jobs, at 6,900, followed by accommodations (hotels, lodges, B&Bs, together accounting for 6,200 jobs), retail businesses (5,300), tours and activities providers (5,000), and transportation providers (4,100). In terms of labor income, three categories represented roughly the same amount of direct income at \$173 million: transportation, food/drink, and tours/activities. Accommodations income totaled \$163 million, and retail income totaled \$108 million. The relative amount of labor income by sector differs from the number of jobs due to certain sectors paying higher wages.

Another category of direct jobs are those created by additional "industry" spending: cruise lines, crew members, and air/ferry tickets. This spending accounted for 4,100 jobs and \$133 million in labor income in 2017.

Indirect and induced jobs and income linked with the visitor industry (totaling 8,800 jobs and \$536 million in labor income) are the most broadly distributed throughout the Alaska economy and includes all of the sectors that provide goods and services to Alaska businesses and households – virtually the entire service and support sector.

Table 1. Visitor Industry Employment and Labor Income, by Sector, 2017

	Employment	Labor Income
Direct jobs/income from visitor spending	30,400	\$870 million
Food and drink	6,900	\$173 million
Accommodations	6,200	\$163 million
Retail	5,300	\$108 million
Tours and activities	5,000	\$173 million
Transportation	4,100	\$173 million
Other	2,800	\$79 million
Direct jobs/income from industry spending	4,100	\$133 million
Indirect and induced jobs/income	8,800	\$536 million
Total visitor industry-related jobs/income	43,300	\$1.54 billion

Note: Columns may not add to Totals due to rounding.

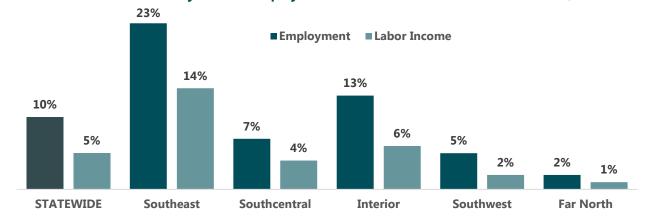
Importance in Regional and Statewide Economies

Statewide, visitor industry-related employment of 43,300 accounted for 10 percent of all employment. Total statewide visitor industry-related labor income of \$1.5 billion represented 5 percent of all labor income in Alaska. Total employment and labor income figures are based on the latest available data (2015-16) from the Bureau of Economic Analysis.

In terms of relative contribution to the regional economy, the visitor industry plays the largest role in Southeast, where it represents 23 percent of total employment and 14 percent of total labor income. The visitor industry accounts for 13 percent of employment, and 6 percent of labor income, in the Interior; 7 and 4 percent (respectively) in Southcentral; 5 and 2 percent in Southwest; and 2 and 1 percent in Far North.

Employment represents a higher percentage of the total, compared with labor income, because visitor industry jobs tend to be seasonal and thus lower-paying than in other sectors in the Alaska economy.

Chart 6. Visitor Industry-Related Employment and Labor Income as Percent of Total, 2017



Revenues to Municipal and State Governments

The visitor industry generates significant revenues for state and local governments in Alaska. User fees, sales taxes, lodging taxes, property taxes, income taxes and other payments all flow to state and local governments in Alaska directly or indirectly from the visitor industry. This chapter details, to the extent possible, state and local government revenues that can be attributed to out-of-state visitors.

State of Alaska Revenues

Summary of State Revenues

The table at right shows revenues to the State of Alaska attributable to out-of-state visitors in 2017, which totaled \$125.6 million. The largest component of State revenues is Alaska Railroad Corporation revenues from passengers and contracts to tow private rail cars (\$31.9 million), followed by Fish and Game revenues from licenses/tags (\$25.5 million) and Commercial Passenger Vessel Tax revenues (\$19.9 million). Revenues were adjusted, where necessary, to reflect only out-of-state visitors.

The total State revenue amount should be considered conservative as not all such revenues are measurable in terms of non-resident attribution rates; excluded from the

Table 2. State of Alaska Revenues Attributable to Out-of-State Visitors, 2017

Revenue Type	Revenues
Alaska Railroad Corporation revenues	\$31.9 million
Fish and Game licenses/tags	\$25.5 million
Commercial Passenger Vessel Tax	\$19.9 million
Alaska Marine Highway System revenues	\$16.0 million
Corporate Income Tax	\$11.2 million
Passenger Gambling Tax	\$8.2 million
Vehicle Rental Tax	\$7.8 million
Ocean Ranger Program	\$4.2 million
Commercial Passenger Vessel Environmental Compliance Program	\$1.1 million
Total Selected Revenues	\$125.6 million

Sources: Alaska Department of Revenue, Alaska Department of Fish & Game, Alaska Railroad, Alaska Marine Highway System. Note: Calendar year 2017 data is used for every figure except Corporate Income Tax, for which fiscal year 2017 data was the latest available.

total are airport fees, State Museum revenues, and State Park revenues, among others.

Following are details on each of the sources of State revenues.

Cruise Line Payments

The State of Alaska receives several forms of direct payments from cruise lines: the Commercial Passenger Vessel Tax (Departments of Revenue and Environmental Conservation), the Large Passenger Vessel Gambling Tax (Department of Revenue), and the Commercial Passenger Vessel Environmental Compliance Program (Department of Environmental Conservation). Added together, these revenues totaled **\$33.3 million** in 2017. (Although cruise lines also pay Corporate Income Tax, the amounts of these revenues are confidential.)

COMMERCIAL PASSENGER VESSEL TAX

According to the Alaska Department of Revenue, cruise lines paid **\$19.9 million** in 2017 for the Commercial Passenger Vessel Tax (CPV), which is a fee of \$34.50 per passenger per voyage for large vessels.

The Department of Revenue deposits all the money into the Commercial Passenger Vessel Tax Account in the General Fund. For each voyage of a commercial passenger vessel providing overnight accommodations, the Commissioner of the Department of Revenue must identify the first seven ports of call and the number of passengers on board the vessel at each port of call. Subject to appropriation by the legislature, the commissioner distributes \$5 per passenger of the tax revenue to each port of call.

OCEAN RANGER PROGRAM

Cruise line payments to the Department of Environmental Conservation are estimated to be **\$4.2 million** for calendar year 2017. This revenue is used to operate the Ocean Ranger program, which requires U.S. Coast Guard licensed marine engineers on board vessels to act as independent observers monitoring State environmental and marine discharge requirements, and to ensure that passengers and crew are protected from improper sanitation, health, and safety practices.

LARGE PASSENGER VESSEL GAMBLING TAX

The large passenger vessel gambling tax was also introduced in December 2006. This tax applies to the use of playing cards, dice, roulette wheels, and coin-operated instruments or machines designed for gaming or gambling activities aboard cruise ships operating in Alaska waters. The tax is 33 percent of the adjusted gross income from these gambling activities. Gambling taxes are payable to the Department of Revenue and deposited into the CVP Tax Account. The Department of Revenue reported gambling tax revenues of **\$8.2** million for calendar year 2017.

COMMERCIAL PASSENGER VESSEL ENVIRONMENTAL COMPLIANCE PROGRAM

The Commercial Passenger Vessel Environmental Compliance (CPVEC) Program was established in July of 2001. This program requires all large passenger vessels to register and comply with environmental quality control regulations. The program is operated with fees collected from large and small passenger vessels (\$1 per berth). In 2017, **\$1.1 million** was collected for the Commercial Passenger Vessel Environmental Compliance Program.

Corporate Income Tax

Alaska's corporate income tax rates are graduated from 1 percent to 9.4 percent in increments of \$10,000 of taxable income. The 9.4 percent maximum rate applies to taxable income of \$90,000 and over. Multistate corporations apportion income using the standard apportionment formula of property, payroll, and sales.

Tax payments by individual corporations are confidential; however, the Department of Revenue reports total corporate income taxes in the "tourism" category, including payments by cruise lines and other visitor industry businesses, of **\$11.2 million** in Fiscal Year 2017 (the latest available data).

¹ "Adjusted gross income" refers to gross income, minus prizes awarded and federal and municipal taxes paid on the gaming income.

Vehicle Rental Tax

Alaska levies a 10 percent passenger vehicle tax as well as a 3 percent recreational vehicle tax. In 2017, the Department of Revenue collected a total of \$11.3 million in vehicle tax revenues. Approximately 70 percent of rental vehicle revenues are assumed to be attributable to out-of-state visitors, or **\$7.8 million**.

ADF&G License and Tag Revenues

To participate in fishing, hunting, and trapping activities, non-residents are required to purchase licenses as well as various species-specific harvest tags. According to Alaska Department of Fish and Game (ADF&G) data, non-residents spent **\$25.5 million** on licenses and tags in calendar year 2017.

Revenues to Alaska Marine Highway System and Alaska Railroad Corporation

While not in the category of fees or taxes, out-of-state visitors account for significant revenues to two transportation providers operated by the State of Alaska: the Alaska Marine Highway System (AMHS) and the Alaska Railroad Corporation.

AMHS revenue from out-of-state visitors is estimated at **\$16.0 million** in 2017, based on total revenues reported by AMHS and previous non-resident attribution rates. (This figure is higher than the \$11 million reported in the Visitor Spending section because it is total spending on all AMHS travel, not just spending on passage to and from Alaska.)

The Alaska Railroad Corporation reports total passenger-related revenues of \$35.4 million in 2017. McDowell Group estimates that 90 percent of this revenue is related to out-of-state residents, resulting in an estimate of **\$31.9 million** in visitor-associated revenues.

Municipal Revenues

This study considered three sources of municipal revenues: sales tax, lodging tax, and dockage/moorage. While municipalities also benefit from property taxes paid by visitor industry businesses, estimating those revenues is beyond the scope of this study.

Summary of Municipal Revenues

Alaska municipalities collected an estimated \$88.5 million in revenues from the out-of-state visitor industry in 2017, including \$37.6 million in sales tax revenues, \$33.1 million in lodging tax revenues, and \$17.8 million in dockage/moorage revenues. Following are details on each of source of municipal revenues.

Table 3. Municipal Revenues
Attributable to Out-of-State Visitors, 2017

Revenue Type	Revenues
Sales tax revenues	\$37.6 million
Lodging tax revenues	\$33.1 million
Dockage/moorage revenues	\$17.8 million
Total Revenues	\$88.5 million

Source: McDowell Group estimates.

Sales Tax Revenues

Sales tax revenues attributable to out-ofstate visitors are estimated at \$37.6 million for 2017. This estimate is conservative in that it does not include additional sales tax revenue generated by indirect and induced spending (multiplier effects).

Table 4. Sales Tax Revenues
Attributable to Out-of-State Visitors, 2017

Region	Revenues
Southeast	\$24.3 million
Southcentral	\$12.3 million
All other regions	\$1.0 million
Total Revenues	\$37.6 million

Source: McDowell Group estimates.

Southeast revenues accounted for two-thirds (65 percent) of the total, while Southcentral accounted for one-third (33 percent), and all other regions accounted for 3 percent. Note that these figures do not reflect total spending by region due to the lack of sales tax in several major visitor destinations, including Anchorage, Fairbanks, and Denali.

Sales tax revenues from visitor spending are a significant portion of total sales tax revenues in some communities. For example, in Ketchikan, spending by out-of-state visitors accounted for one-quarter of total 2016 City and Borough sales tax revenue. In Juneau, visitor spending accounted for one-fifth of total municipal sales tax revenue.²

Regional sales tax totals were calculated based on visitor industry spending and visitor volume at the community and regional level. Tax rates and total taxes collected by community were considered in the analysis.

Lodging Tax Revenues

Lodging tax revenues attributable to out-ofstate visitors are estimated at \$33.1 million for 2017. Southcentral revenues accounted for two-thirds (67 percent) of the total; Interior accounted for one-quarter (23 percent), Southeast accounted for 7 percent, and other regions accounted for 2 percent. Like sales tax revenues, lodging tax revenues do not directly correspond with

Table 5. Lodging Tax Revenues
Attributable to Out-of-State Visitors, 2017

Region	Revenues
Southcentral	\$22.3 million
Interior	\$7.7 million
Southeast	\$2.4 million
All other regions	\$0.6 million
Total Revenues	\$33.1 million

Source: McDowell Group estimates. Column may not add to total due to rounding.

the amount of overnight visitation in each region; they also reflect varying bed tax rates in each community.

Regional lodging tax totals were calculated based on visitor industry spending and visitor volume at the community level for over 30 communities. Tax rates and total taxes collected by community were taken into account in the analysis.

Readers are reminded that these tax figures represent only a portion of total lodging taxes collected; Alaska residents account for significant lodging tax revenues as well.

² Ketchikan Summer Visitor Profile and Economic Impact Analysis, prepared by McDowell Group for Ketchikan Visitors Bureau; Juneau Visitor Profile and Economic Impact Study, prepared by McDowell Group for Travel Juneau.

Revenues from Cruise Ships

Municipal governments collected \$17.8 million from cruise lines in 2017 in the form of moorage and docking fees, primarily Juneau and Ketchikan. The docks in Skagway, Whittier, Sitka, and Icy Strait Point are privately owned. Seward's dock is owned by the Alaska Railroad Corporation. Juneau has both private and public docks. Sitka has a deep-water dock, but it is privately owned. Some large cruise ships lighter in Sitka, for which the City charges fees.

Table 6. Dockage/Moorage Revenues to Municipalities, 2017

Port	Revenues
Juneau	\$9.1 million
Ketchikan	\$8.5 million
All other ports	\$0.2 million
Total Revenues	\$17.8 million

Sources: City and Borough of Juneau; City of Ketchikan; City and Borough of Sitka; City and Borough of Haines; City and Borough of Wrangell.

Each community has its own system of charging cruise lines for using port facilities. Dock charges are generally assessed on a per foot/per day basis. Additional charges may include tonnage fees, passenger fees, lightering fees, and water supply fees, depending on the community.

Trends in Visitor Industry Impacts

This chapter shows how the impacts of Alaska's visitor industry have increased over the last decade, based on previous McDowell Group reports covering the 2008, 2011, 2013, 2014, and 2015 study periods. (Studies were not undertaken for the intervening periods.)

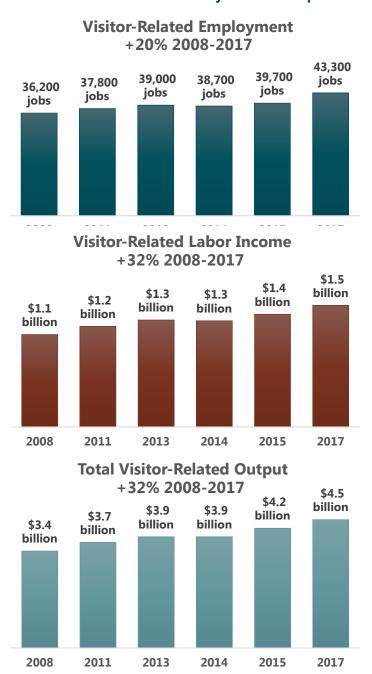
Economic Impact Trends

All economic impact indicators show strong increases over the last decade: employment, labor income, and total industry spending. Increases largely reflect the growth in visitor volume, with commensurate increases in spending.

Over the last decade (2008-2017), total employment related to Alaska's visitor industry has increased by 20 percent, or 7,100 jobs. A significant portion of this increase occurred in just the last two years, when employment increased by 9 percent. Labor income increased by 32 percent over the same time period, from \$1.1 to \$1.5 billion. This includes a 9 percent increase in the last two years (2015-17), representing \$130 million more in payroll. Total visitor-related spending, also termed "output," increased by 32 percent between 2008 and 2017, from \$3.4 billion to \$4.5 billion.

Percentage increases in labor income and output outpaced employment increases due to several factors. Labor income and output are reported in nominal dollars, which includes the effect of inflation. Inflation in urban Alaska averaged approximately 1.6 percent annually between 2008 and 2017.³ Adjusting for the effects of inflation, labor income and output increased by approximately 16 percent between 2008 and 2017. Labor income may also have been affected by benefits-related cost changes over the previous decade.

Chart 7. Trends in Visitor Industry Economic Impacts

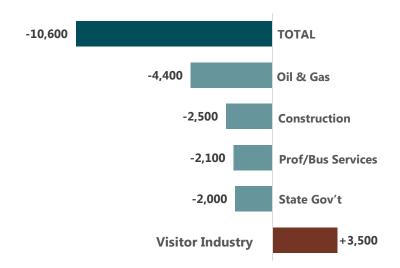


³ Inflation estimates based on Urban Alaska Consumer Price Index (CPI) as reported by DOLWD.

Comparison with Other Industries

Alaska's visitor industry has been highlighted as one of the state's few growing economic sectors over the last several years of economic recession. The chart at right shows the change in the number of jobs, by industry, between 2015 and 2017. Alaska lost 10,600 jobs between 2015 and 2017, according to Alaska Department of Labor and Workforce Development data. Losses were notable in the oil and gas sector (down 4,400 jobs), construction (down 2,500 jobs), professional and business services (down 2,100 jobs), and state government (down 2,000) jobs. In contrast, the visitor industry added 3,500 jobs over the same time period.

Chart 8. Change in the Number of Alaska Jobs, by Sector, 2015 to 2017



State and Municipal Revenue Trends

Comparing 2008 to 2017 shows a drop in State revenues attributable to out-of-state visitors, by 8 percent. This is due to a reduction in the CPV tax rate in 2011, leading to much lower CPV revenues. Between 2011 and 2017, State revenues increased by 38 percent. This more recent increase is attributable to growth in cruise line payments (commensurate with passenger growth), increased Alaska Railroad revenues, improved tracking of corporate income tax, and (in 2017) increases in fishing and hunting license fees.

Municipal government revenues attributable to out-of-state visitors increased by 27 percent over the last decade, from \$70 million to \$89 million. Increases in municipal revenues are attributable to strong growth in sales tax revenues (by 31 percent) and lodging tax revenues (by 41 percent). Dockage/moorage revenues increased by only 2 percent, in part due to cruise ships growing in capacity rather than increases in port calls.

Chart 9. Trends in State and Municipal Revenues



