



Hawaii's Home and Vacation Rental Market:

Impact and Outlook

April 20, 2020

Prepared for

HAWAII TOURISM
AUTHORITY

Executive Summary – Overview of Approach and Market Size Estimate

Overview and Methodology

JLL’s Hotels & Hospitality Group (“JLL”) was engaged by the Hawaii Tourism Authority (“HTA”) to conduct a study of the impact of home and vacation rentals in Hawaii.

JLL estimated the size and impact of the home and vacation rental market in the state and compared this to the size of the traditional hotel and resort market. JLL conducted primary research and surveyed both Hawaii homeowners’ behavior with regard to making their living units available to visitors, (supply) and visitors’ activity with regard to staying in home and vacation rentals (demand).

With this research methodology, JLL sized the market in terms of number of overnight stays, party composition, length of stay, price paid, and hosts’ and visitors’ motivation.

To compile this report, JLL conducted the following steps:

- Studied the current state of the market, including conducting a survey a visitors to project demand and a survey of residents to project supply;
- Updated the estimate of the market size based on available data and modelling given the survey results; and
- Quantified the economic impact of the home and vacation rentals market and assessed its impact on the overall lodging market in the state.

The research study summarized herein is an update to JLL’s previous study finalized in April 2017 (Hawaii’s Home and Vacation Rental Market: Impact and Outlook <https://www.hawaiitourismauthority.org/media/2006/hawaii-home-and-vacation-rental-market-impact-and-outlook-december-2016.pdf>). Key slides throughout this report reference how the home and vacation rental market has changed since this previous deliverable.

Market Size Estimate

- Hawaii’s home and vacation rental market totals an estimated \$1.4 billion in accommodations spend but is expected to decrease in size

Based on JLL’s research surveys of visiting guests—to estimate demand—and Hawaii residential unit owners/occupants—to estimate supply—the size of Hawaii’s home and vacation rental market is estimated at approximately \$1.4 billion in accommodations spend as of 2018, equating to approximately one-sixth of the size of the traditional hotel/resort market in the state.

JLL created a five-year estimate of the home and vacation rental market size over the next five years. The home and vacation rental market has marked notable growth during the past several years but is deemed to be relatively mature; additionally, Bill 89 was recently enacted which will impact the home and vacation rental market in the City and County of Honolulu (Oahu Island). JLL created separate forecasts for Oahu Island, and for the rest of Hawaii to reflect the different projections based on the aforementioned legislation.

The impact of this legislation, along with the responses from JLL’s demand and supply surveys were incorporated to arrive at the projections depicted later in this report. The result is an estimated market size of \$1.1 billion in 2023.

Note: Figures and commentary presented in this report reflect data collected through December 31, 2019 – before the first COVID-19 case was identified in the United States. As such, the timeframe analyzed does not pertain to a period where the pandemic impacted the State of Hawaii’s home and vacation rental market or lodging demand and performance.

Executive Summary – Key Findings Based on Survey Data

- **Home and vacation rentals leading to continued growth in visitors accommodated**

The home and vacation rentals market is growing the pie of visitors to Hawaii, rather than simply taking share from traditional hotels/resorts. Furthermore, research suggests that there is relatively little overlap between visitors who stay in home and vacation rentals and visitors who stay in traditional hotels/resorts. During the timeframe evaluated, hotel occupied room nights per visitor arrival has been trending down overall while the percent of visitors who stay in home and vacation rentals has trended up.

Given the high occupancy rates in Hawaii’s traditional hotel/resort sector—in fact, Hawaii posts the highest occupancy rates of any state in the U.S.—and amid a relatively constrained new hotel development pipeline, especially for larger properties, the hotel sector is mature and is deemed to have more limited ability to capture additional demand. As such, given that the number with visitor arrivals is growing at more 3x the pace of hotel demand, the home and vacation rental market is positioned to have the ability to capture this additional demand, notwithstanding the recently-enacted legislation to curb unlicensed home sharing activity.

- **Survey respondents evidence continued increased desire to make living unit available as a rental, but legislation is expected to curb growth**

JLL’s supply survey suggests that 11% of residents have recently made their living unit available as a home and vacation rental, up from 9% in 2016. The previously relatively low barriers to entry into the rental market have led to an increase in inventory, albeit coupled with a slight decline in rental units’ average occupancy rates, as compared to 2016.

Similarly, of respondents who have not previously made their residential units available, a somewhat larger percentage of respondents is ‘somewhat likely’ or ‘very likely’ to make their living unit available for bookings going forward than in 2016, indicative of Hawaii residents’ continued desire to continue to participate in this market. The survey thus suggest some growth in inventory available for bookings, but the change in the proportion is gradual, which speaks to the relative maturity of the home and vacation rental market in Hawaii. The growth is also indicative of the continued demand from visitors, and also ongoing pressures related to housing affordability.

At the same time, half of respondents indicated they were undecided as to how often they will make their living unit available going forward, suggesting that there will be “leavers”. The inventory available for rentals is thus expected to continue to fluctuate.

- **The motivation for participating in the home and vacation rental business model is often financial**

70% of Hawaii residents who indicated that they make their living unit available for do so to make incremental income and meet housing cost gaps. This is up from 60% in JLL’s previous survey; the increased proportion can be partly explained by the rise in housing costs.

The JLL supply survey suggests that two-thirds of unit owners who participate in this business model are occasional, part-time hosts, whereas one-third represents more professional, full-time operators, according to survey data.

- **Home and vacation rentals are on average a lower-cost option for visitors; significant proportion of bookings represent *induced* demand**

Some 30% percent of surveyed visitors directly indicated they would not have made the trip had it not been for the option to stay at a home or vacation rental. However, the total proportion of visitors that represents induced demand is likely to be notably higher than this given that 74% of visitors paid less for their home and vacation rental than the average nightly room rate for a traditional hotel/resort in Hawaii. JLL concludes that between 30% to 74% of visitor demand that booked their stay in a home or vacation rental represents induced travel demand.

Executive Summary – Statewide Economic Impact

Estimated economic impact of home and vacation rental visitor spend

- JLL estimates that the total spend in Hawaii associated with home and vacation rentals was **\$3.3 billion in 2018**. This encompasses accommodations and other spend such as food and beverage, transportation and retail, per visitor spend figures obtained from HTA.
- This spend is expected to decline to **\$2.6 billion in 2023** given the expected decrease in the supply of rentals resulting from Bill 89.
- The table below also depicts the proportion of this spend which is expected to result from the induced demand, in other words the demand pertaining to visitors who would not have made their trip had it not been for the option to stay in a home or vacation rental. As is presented in detail on slides 9 and 10, JLL concludes that between 30% to 74% of visitor demand that booked their stay in a home or vacation rental represents induced travel demand. For purposes of the below table, the mid-point of this range is taken, indicating that the induced demand is 52%.
- The economic impact in terms of sales generated from the spend related to Hawaii’s home and vacation rentals market in 2018 is **\$6.0 billion** and the associated household income generated is **\$1.6 billion**.
- An estimated **46,000 jobs in Hawaii** are supported annually by home and vacation rental guests. And direct, indirect and induced state government tax revenue generated totals an estimated \$347.4 million as of 2018.

Key Estimates (\$ Millions)		Economic Impact (\$ Millions, except Jobs)			
		Output multiplier (2012 I/O model) ¹	Income multiplier (2012 I/O model) ¹	Total Job multiplier (2012 I/O model) ¹	State tax multiplier (2012 I/O model) ¹
Total Estimated Spend Resulting from Home and Vacation Rental Guests (Accommodations Spend Plus All Other Spend)		1.813	0.472	13.918	0.104
2018	\$ 3,331	\$ 6,040.1	\$ 1,571.5	46,000	\$ 347.4
2023F	\$ 2,639	\$ 4,785.3	\$ 1,245.1	37,000	\$ 275.2
Hawaii Visitor Spend Impact From Induced Demand Because of Option to Stay at Home and Vacation Rentals (Accommodations Spend Plus All Other Spend)					
2018	\$ 1,732	\$ 3,140.6	\$ 817.1	24,000	\$ 180.6
2023F	\$ 1,372	\$ 2,487.8	\$ 647.3	19,000	\$ 143.1

Source: JLL

Source: HTA, DBEDT, JLL

¹ Multipliers pertain to DBEDT 2012 I-O Model, Type II multiplier. The visitor expenditure multiplier for each county was weighted given the proportion of visitors to each county and blended to derive a state-wide multiplier.

² According to HTA and DBEDT, these jobs may not be new jobs.

Evaluation of Visitor Survey (Demand)

Evaluation of Visitor Survey (Demand)

To establish the profile of *demand* for home and vacation rentals in the state of Hawaii, JLL sent an online survey to more than 4,000 recent visitors to Hawaii who indicated that they had stayed in a home or vacation rental on a recent trip. The figures collected from the survey were then utilized in order to estimate the overall size of the home and vacation rental market in the state.

The survey covered the following areas, among others:

- Type of accommodation used
- Booking method
- Length of stay and party size
- Purpose of trip
- Motivation to book home or vacation rental vs. a traditional hotel/resort
- Spend on accommodations and other categories during trip

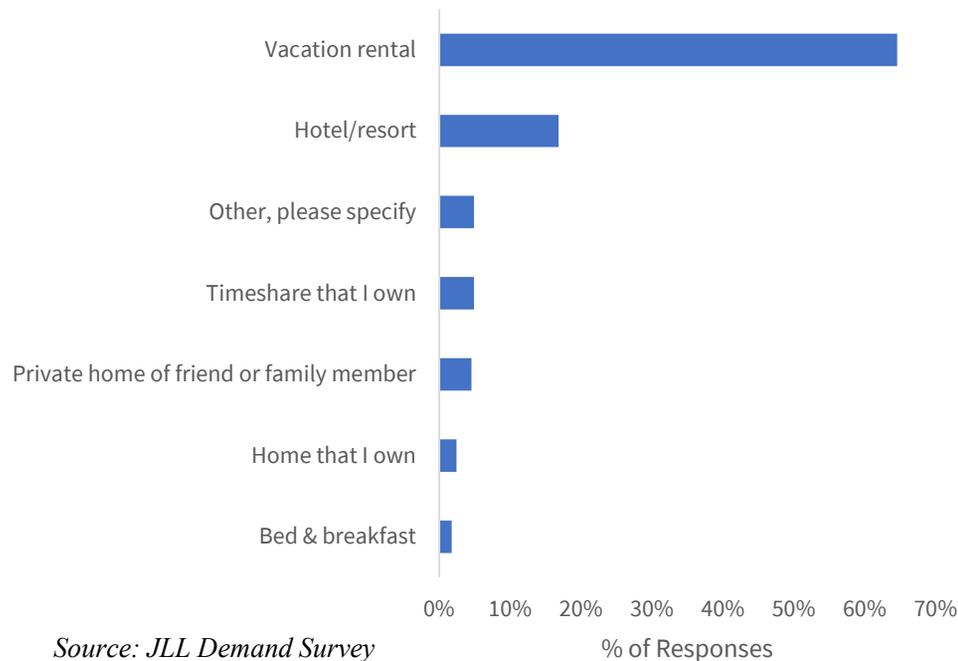
In addition to this demand survey, JLL also evaluated research reports issued by HTA, along with publicly sourced data and reports on the home and vacation rental market in conjunction with JLL's overall research and experience in this market sector, in order to cross-reference and vet the survey results.

Evaluation of Visitor Survey (Demand)

Visitor research continues to suggest that demand segments that stay in home and vacation rentals have relatively little overlap with traditional hotel/resort guests.

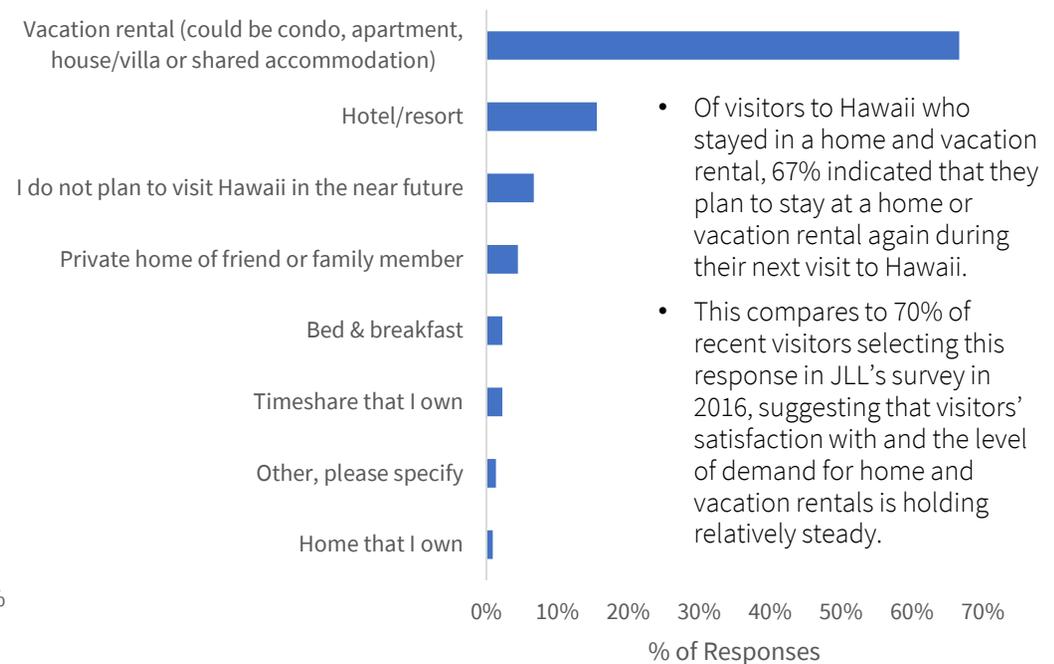
- As noted above, the demand survey was sent to recent visitors to Hawaii who indicated that they had stayed in a home or vacation rental on their recent trip.
- Of those visitors who use home and vacation rentals in Hawaii, there is relatively low overlap in uses with visitors who stay in traditional hotels/resorts. In other words, travelers who expressed a preference for choosing home and vacation rentals accommodations were not as likely to express interest in staying at a traditional hotel during future visits.
- Of the visitors surveyed, 17% indicated they also stayed in hotels/resorts on the same or additional trips, suggesting that a relatively small proportion of home or vacation rental users views hotels/resort as a substitute.

During your visit(s) to Hawaii within the past 24 months, in what type of property did you stay? Please select all that apply.



Source: JLL Demand Survey

At what type of property do you plan to stay on your next trip to Hawaii?



- Of visitors to Hawaii who stayed in a home and vacation rental, 67% indicated that they plan to stay at a home or vacation rental again during their next visit to Hawaii.
- This compares to 70% of recent visitors selecting this response in JLL's survey in 2016, suggesting that visitors' satisfaction with and the level of demand for home and vacation rentals is holding relatively steady.

Evaluation of Visitor Survey (Demand)

Price point, range of locations outside of traditional hotel zones, and more flexible arrangements for larger parties are key drivers in visitors' choosing home and vacation rentals.

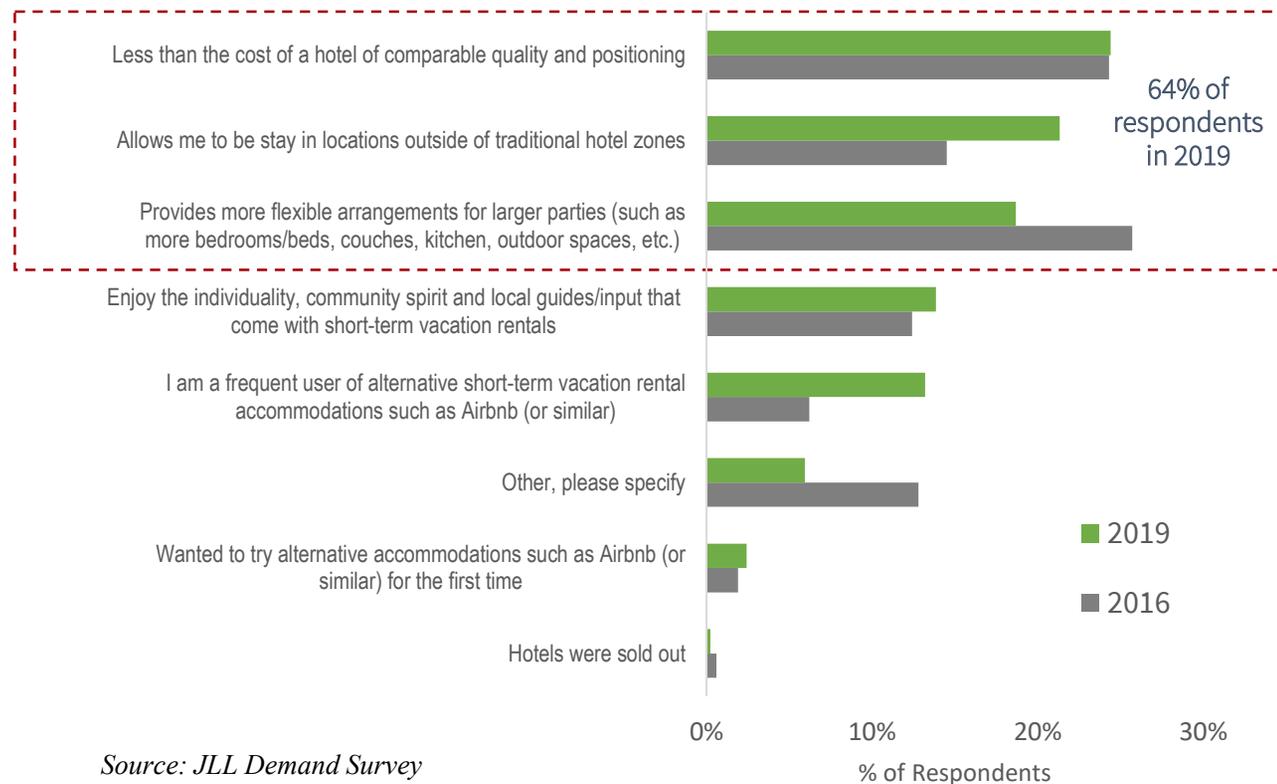
The relatively lower cost of home and vacation rentals compared to traditional hotels of comparable quality and positioning was the most frequently noted response for choosing home and vacation rentals. The ability to stay outside of traditional hotel zones and more flexible arrangements for larger parties are the next two highest-ranking responses in JLL's demand survey.

This distribution of primary reasons indicated is in line with what JLL has surveyed in other markets in the U.S. and globally.

Additional conclusions:

- Approximately 24% of respondents in the 2019 survey and 2016 survey noted "price" as a motivation for choosing to stay at a home or vacation rental in Hawaii.
- "More flexible arrangements for larger parties" remains along the top three motivators, but has been overtaken by "price" as the top motivator.
- Of "other" reasons, respondents noted access to parking and the lack of resort/destination fees as common motivators.
- Only a very small share of respondents indicated that they booked a vacation or home rental due to traditional hotels/resorts being sold out. This suggests that a significant portion of home and vacation rental guests in Hawaii do not view hotels as a substitute; the responses suggest that they generally do not first check hotel availability and then consider home and vacation rentals as a secondary option.

What are the primary reasons that you decided to stay in a short-term vacation rental during your visit(s) to Hawaii within that past 24 months?



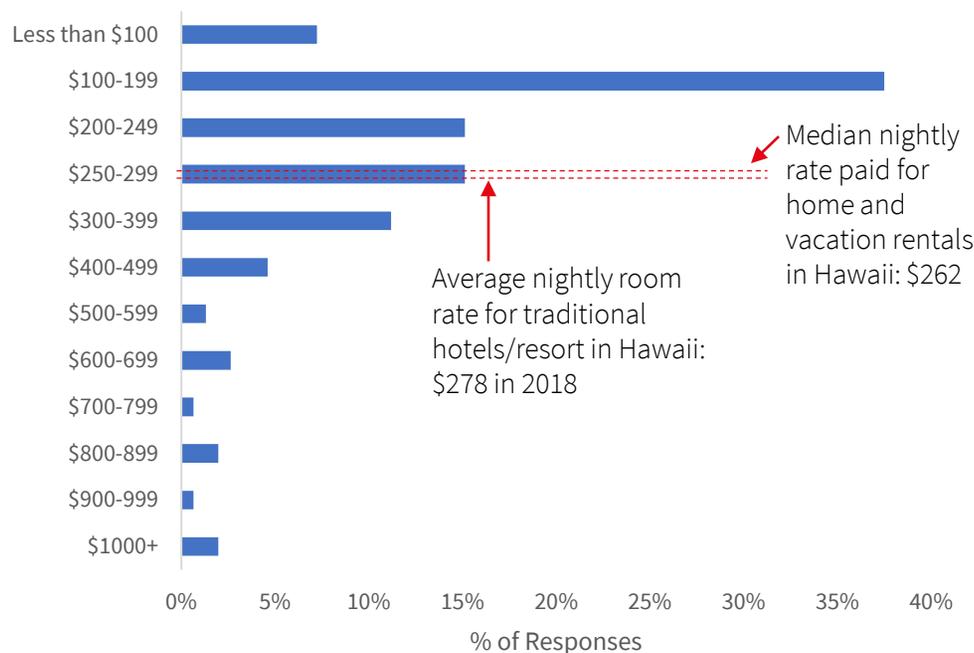
Source: JLL Demand Survey

Evaluation of Visitor Survey (Demand)

Comparison of nightly rates paid further evidences that home and vacation rentals provide a lower-price alternative.

- The median nightly rate paid for home and vacation rental bookings in Hawaii was \$262 per night in 2018, based on JLL’s demand survey. By comparison, the State of Hawaii’s hotel average daily rate was \$278, according to figures from STR, Inc. This suggests a similar price point, but home and vacation rentals see a larger party size on average, as is summarized in the table below. As such, the nightly equivalent per person price paid for home and vacation rentals is 37.2% lower.
- In JLL’s demand survey, 74% of respondents indicated paying less per night than the \$278 statewide hotel average daily rate. JLL concludes that a portion of this share of visitors represents *induced demand*– demand that would likely not have traveled to Hawaii without the option of home and vacation rentals. JLL’s conclusion with regard to the amount of induced demand is depicted on the next slide.

During your most recent visit to Hawaii, what was the average rate you paid per night for the short-term vacation rental in which you stayed?
Please include any cleaning and booking fees, etc. in the figure.



Accommodations Type	Nightly Rate	Party Size	Nightly Rate per Person
Traditional Hotel/Resort	\$278	2.3	\$126
Home and Vacation Rental	\$262	3.3	\$79 (37.2% lower)

Note: The average party size for traditional hotel/resort is assumed to be 2.3 people (this is the average party size of all visitors to Hawaii)

Source: JLL Demand Survey, HTA, STR, Inc.

Source: JLL Demand Survey

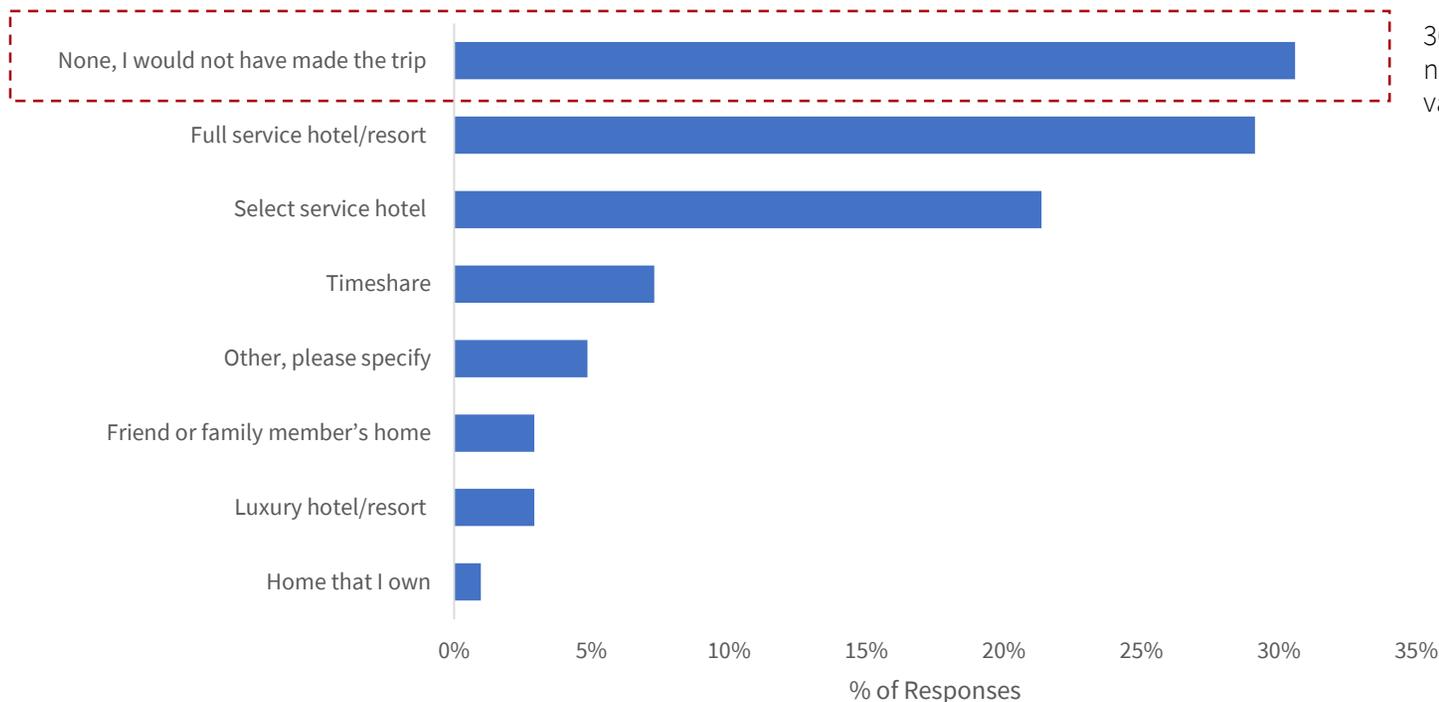
Evaluation of Visitor Survey (Demand)

30% respondents reported that if there was not a home and vacation rental option during their recent stay in Hawaii, they would not have made the trip.

This 30% percent of surveyed visitors directly represents *induced demand* to Hawaii, who would not have made the trip had it not been for this accommodations type. The proportion of visitors that represents induced demand is likely to be notably higher, as summarized on page 10, which states that 74% of visitors paid less for their home and vacation rental than the average nightly room rate for a traditional hotel/resort in Hawaii. **JLL concludes that between 30% to 74% of visitor demand that booked their stay in a home or vacation rental represents induced travel demand.**

The analysis of the below question yields additional conclusions. As is observed in other markets, home and vacation rentals and other alternative accommodations types are not deemed to be much of a substitute for luxury hotels and resorts. JLL notes that in most markets, select service and mid-market hotels are the ones losing the greatest amount of share, but in Hawaii there is a notably more limited penetration of select service hotel stock. Thus, as it relates to hotels, “Full service hotel/resort” was most frequently cited as substitute for home and vacation rentals based on JLL’s demand survey

For your most recent trip to Hawaii, had you not stayed at a short-term vacation rental, at what type of accommodation would you likely have stayed? (Please select all that apply):



30% of respondents indicated they would not have traveled to Hawaii if a home and vacation rental option was not available.

Source: JLL Demand Survey

Evaluation of Visitor Survey (Demand)

JLL demand survey suggests that when traditional hotels/resorts are priced above approximately \$200 per night, visitors begin to seek out lower-priced options, which leads them to look at home and vacation rentals.

JLL also sought to identify the *inflection point* at which price point the average visitor who stayed at a home and vacation rentals gets priced out of traditional hotels/resorts.

Survey responses suggest that it is at approximately \$200 per night and above where the share of visitors seeking traditional hotels/resorts flips to be lower than the share of guests who are considering home and vacation rentals.

In other words, when the prevailing nightly rate in the market is higher than \$200, the research indicates that visitors feel more compelled to look at lower-cost options such as home and vacation rentals.

Since this \$200/night inflection point is below the average nightly hotel/resort rate of \$278, this suggests just how prevalent the body of demand is that is seeking lower-priced options.

This is expected to continue to uphold demand for home and vacation rentals and make them a compelling option, especially in light of the hotel market's high occupancy performance that exceeds that of any other state in the country.

Source: JLL Demand Survey

*Evaluation of Home and Vacation
Rental Unit Owner Survey
(Supply)*

Evaluation of Home and Vacation Rental Unit Owner Survey (Supply)

To establish the **supply** of home and vacation rentals in the state of Hawaii, JLL contacted more than 20,000 Hawaii residents via an online survey with regard to their habits in making their living unit available to visiting guests as a home and vacation rental. The email addresses for those contacted to participate in the survey pertained to a selection of residents in the counties of Hawaii, Kauai, Maui and Oahu.

The survey was designed to quantify the supply of home and vacation rental units available to visitors, and to compile data on hosts' motivations and behaviors. The survey collected data including:

- Characteristics of the living unit (ownership type, number of rooms, etc.)
- Whether the host is present while guests are accommodated (rental of whole unit vs. portion)
- Average length of stay and party size of guests accommodated
- Average nightly rate charged during year for guests accommodated
- Motivation for making living unit available on home sharing sites

In addition to this supply survey, JLL also evaluated other research reports issued by HTA (to include DBEDT's 2018 State of Hawaii Data Book and HTA's 2018 Visitor Plant Inventory Report and 2018 Housing Survey), along with publicly sourced data and reports on the home and vacation rental market in conjunction with JLL's overall research and experience in this market sector in order to cross-reference and vet the survey results .

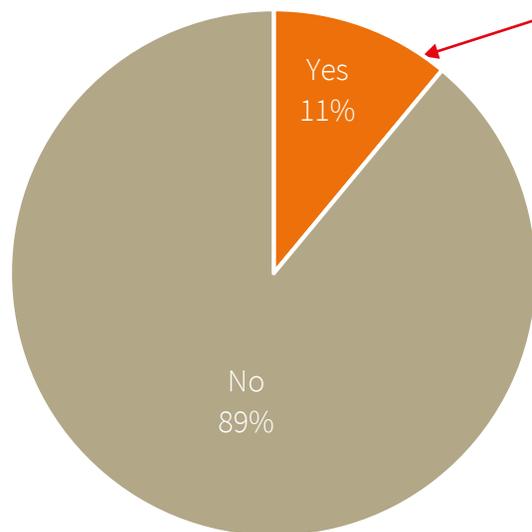
Evaluation of Home and Vacation Rental Unit Owner Survey (Supply)

The proportion of Hawaii residents who make their living unit available as a home or vacation rental has increased moderately from the previous survey.

The JLL supply survey indicated that 11% of residents have made their living unit available for home and vacation rentals during the past three years, up from 9% in 2016. Similarly, of respondents who have not previously made their residential units available, a somewhat larger percentage of respondents is ‘somewhat likely’ or ‘very likely’ to make their living unit available for short-term bookings going forward than in the 2016 survey. The survey results thus suggest some growth in inventory available for home or vacation rental bookings, but the change in the proportion is quite gradual, which speaks to the relative maturity of the home and vacation rental market in Hawaii. The growth is also indicative of the continued demand from visitors, and also ongoing pressures related to housing affordability.

To estimate the total annual available inventory of home and vacation rental units, JLL grossed up the share of residents making their residential unit available to the market as a whole and applied to total number of households in Hawaii (see section “Establishing Market Size, Impact on Lodging Sector and Growth Outlook”).

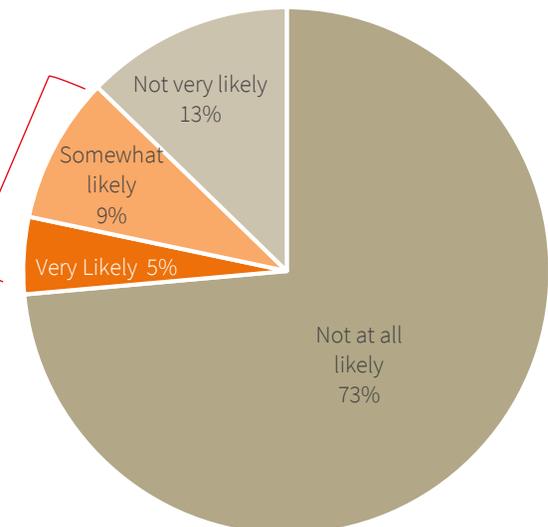
During the past three years, have you made your living unit (or part of your living unit) in Hawaii available as a short-term vacation rental?



11% of respondents indicated they have made their living unit available for a home and vacation rental in the last three years, compared to 9% of respondents in JLL’s survey conducted in 2016.

Of respondents who have not made their living unit available for a home and vacation rental, 14% are either ‘somewhat likely’ or ‘very likely’ to do so in the future, compared to 7% in 2016, which suggests residents desire to make their living unit available for bookings.

In the next 12 months, how likely are you to consider making your living unit in Hawaii available as a short-term vacation rental?



Source: JLL Supply Survey

Some 86.3% of residents who have not made their residential units available as a home or vacation rental during the previous year indicate that they are ‘not at all likely’ or ‘not very likely’ to do this going forward either. Of those who have not done so in the past, 13.7% are either ‘somewhat likely’ or ‘very likely’ to make their residential unit available as a home or vacation rental in the future. This breakdown of future likelihood is in line with surveys that JLL has conducted in other markets across the U.S. and indicates some level of structural ceiling in terms of the proportion of willing hosts in the future.

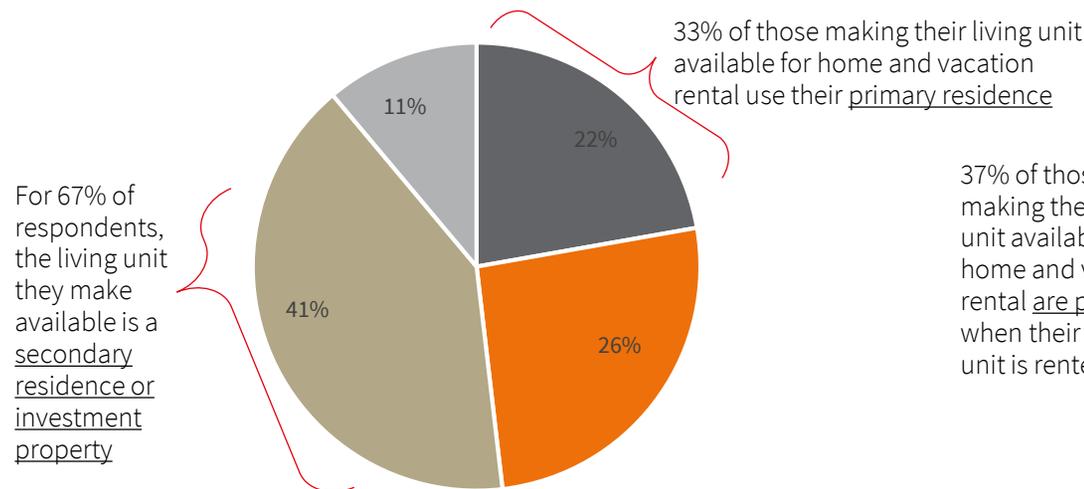
Evaluation of Home and Vacation Rental Unit Owner Survey (Supply)

The JLL supply survey suggests that two-thirds of unit owners who participate in this business model are occasional, part-time hosts, whereas one-third represents more professional, full-time operators.

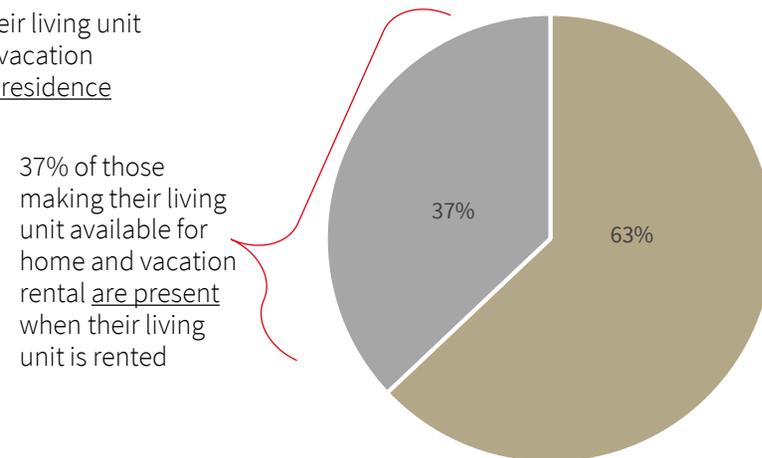
JLL asked two additional questions to determine the composition of those who make a living unit available as a home or vacation rental and to be able to distinguish between occasional, part-time hosts, vs. those who participate in this business model in a full-time capacity. Breakdowns are as follows:

- 33% of respondents who indicated that they make their living unit available for home and vacation rentals report using their primary residence (which they either own or rent) for rentals to visitors; while 67% make a secondary residence or investment property available.
- 37% are present when renting their living unit to visitors, suggesting that they rent a portion of their home out; whereas 63% are not there themselves, suggesting that they make the full living unit available to the visiting guests.

Which of the following describes the living unit (or part thereof) that you make available for short-term vacation rentals?



Which of the following best describes when the living unit is made available for short-term vacation rentals?



- I own the living unit that I make available, and it is my primary residence
- I own the living unit that I make available, and it is my secondary/part-time residence
- I own the living unit that I make available, and it is my investment property
- I am a renter of the living unit I make available

- I typically make my living unit available for rental only when I am not there myself
- I typically rent a room within my living unit ; I am typically present when visitors are renting

Source: JLL Supply Survey

Consistent with other markets, the motivation for participating in the home-rental business model is often financial.

70% of residents who indicated that they make their living unit available for home and vacation rentals report that they do so to either make incremental income or meet housing gaps (40% and 30%, respectively).

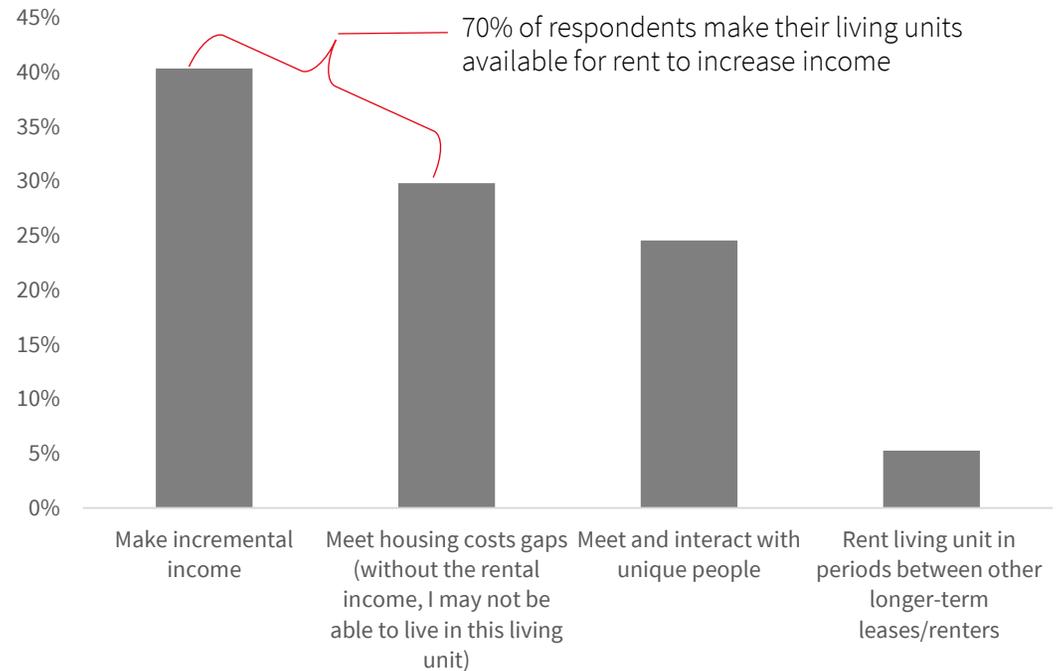
Responses in 2019 track with reasons and proportions provided by respondents in 2016, where 60% of respondents indicated that they make their living unit available for home and vacation rentals to subsidize housing costs. The increased proportion can be partly explained by the ongoing rise in housing costs in Hawaii.

Also similar to 2016, 25% respondents indicate that they make their living unit available to meet and interact with people.

Occupancy and Median Nightly Rate

Given survey responses, JLL estimates that average occupancy for the home and vacation rentals is 39%, with the secondary residences/investment properties having a higher average annual occupancy rate than primary residences. Similarly, the median nightly rate charged at secondary residences/investment properties is higher than that of primary residences that are rented out.

Please indicate the reason(s) you consider making your living unit available for short-term vacation rentals. (Select all that apply.)



Source: JLL Supply Survey

Occupancy and Average Nightly Rate	Sample Size of Responses	Annual Occupancy	Median Nightly Rate
Home and vacation rental is primary residence	9	24%	\$157
Home and vacation rental is secondary residence or investment property	18	53%	\$234
Average of all responses in JLL Supply Survey	27	39%	\$196*

Source: JLL Supply Survey

*Establishing Market Size, Impact on
Lodging Sector and Growth Outlook*

Establishing Market Size, Impact on Lodging Sector and Growth Outlook

Based on the data points tabulated both from the demand and supply surveys, JLL estimated the overall size of the home and vacation rental market in Hawaii, in terms of inventory of residential units being used as home and vacation rentals, nights per year that the accommodation was booked by a visiting guests, and average nightly rates paid.

The occupancy figures that JLL computed, and that are depicted in this report, pertain to the number of occupied nights during the full year (365 nights), to allow for an apples-to-apples comparison to the traditional hotel/resort market, where occupancy is also expressed over 365 nights per year. For avoidance of doubt, if a home and vacation rental was occupied 193 nights of the year, the resulting occupancy rate is 53% [$193 / 365 = 53\%$].

JLL then compared the home and vacation rental market to the size of Hawaii's traditional hotel/resort market. JLL also evaluated accommodations and growth trends with regard to both markets.

Then, incorporating the evidence gathered from the surveys and its experience in this segment as a whole, JLL forecasted the expected growth and resulting size of the home and vacation rental market in Hawaii in the future. This projection takes into account past growth and emerging trends and preferences in the rental markets.

To augment the analysis and provide parallel angles for assessing the data, JLL referenced DBEDT's 2018 State of Hawaii Data Book and HTA's 2018 Visitor Plant Inventory Report, 2018 Housing Survey, lodging performance data, and the Measuring Housing Demand in Hawaii, 2015-2015 report.

Hawaii’s home and vacation rentals market totals an estimated \$1.44 billion in annual revenue, representing approximately one-sixth of revenue earned by traditional hotels and resorts in Hawaii.

JLL estimated the total size of the home and vacation rentals market in Hawaii by taking the number of housing units in the state and determining based on the survey responses the proportion of these which of these are being made available as home and vacation rentals on a part-time and full-time basis. JLL then applied the average occupancy and nightly rate figures to these units based on the survey results, to arrive at the total estimated annual revenue.

Estimation of Market Size: Home and Vacation Rentals in Hawaii, 2018						
Housing Units and Proportion Thereof*	Household Composition	Share of Residents who Make Residential Unit Available for Home and Vacation Rentals	Occupancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Home and Vacations Rental Accommodations Revenue
68%	Primary Residence		24%	3,580,000	\$ 157	562,000,000
32%	Secondary Residence/Investment Property	11.02%	53%	3,710,000	\$ 234	868,000,000
546,500	Total		39%	7,290,000	\$ 196**	1,430,000,000
Comparison: Estimated Total Hotel Spend, 2018			80%	15,800,000	\$ 278*	\$ 7,906,000,000†
Home and Vacation Rentals Market Share as % of Hotel Market, 2018			49%	47%	71%	18%
Home and Vacation Rentals Market Share as % of Hotel Market, 2016			52%	47%	67%	16%

*Proportion of Housing Units taken from Hawai'i Housing Planning Study, 2011 – Inventory Report.

**The overall median nightly rate is calculated from all data points for the "Primary Residence" and "Secondary Residence/Investment Property" category and is as such not mathematically equal to the weighted average computed by dividing total spend by total room nights.

†Total Hotel Spend pertains to total estimated hotel revenue (accommodations plus all other revenue): Based on STR's HOST Almanac, room revenue for full service resorts pertains to 54.5% of total revenue. JLL as such divided the \$278 nightly rate by 0.545 to gross up to a total daily revenue figure.

Visitor demand for home and vacation rentals is expected to continue to increase in the future.

The below summarizes survey respondents’ current and future expected usage of the accommodations type in Hawaii:

- Of those respondents who currently make their living units available as a home and vacation rental, 3.6% indicated they are likely to make the unit available more often in the future while 35.7% plan to maintain their current level.
- Of visitors to Hawaii, 26.7% indicated that they will likely increase the number of home and vacation rental accommodations nights used for future visits, while 42.6% expect their activity to stay steady.
- The category with the highest number of responses in both cases was thus to “maintain” the current level of activity. This suggests that from a supply standpoint, the business model is already quite established.

Expected Future Activity of Hosts and Visitors in Hawaii			
Hosts		Visitors	
Make living units available for home and vacation rentals	% current participating owners	Use home and vacations rentals on future visits	% responses
Less often	3.6	Decrease # of nights stayed	4.5
More often	3.6	Increase # of nights stayed	26.7
About the same	35.7	About the same	42.6
Undecided/Do not know	57.1	Undecided/Do not know	26.1

Source: JLL

Supply of home and vacation rentals is expected to stabilize.

Assumptions to estimate future market size in 2023

JLL structured its survey to ascertain the proportion of Hawaii residents who have made their residential units available as a home or vacation rental during the previous year, and also asked, for those who have not done so previously, what their likelihood is going forward.

In its projections, JLL applied an 'odds adjusted' methodology in determining the share of residential unit owners who are likely to make a unit available as a home or vacation rental in the future, applying assumptions based on the survey responses.

Since the home and vacation rental market is deemed to be relatively mature and established in Hawaii and Bill 89 was recently enacted which will impact the home and vacation rental market in the City and County of Honolulu (Oahu Island), JLL conducted **separate projections** for the City and County of Honolulu, and for the rest of Hawaii, which are detailed on this slide, and on the next slide.

Forecasted market in 2023: City and County of Honolulu

- As a starting point, JLL took the 11% of residents who, according to the supply survey, make their living unit available to visiting guests as a home or vacation rental.
- As for the future projections, JLL applied additional assumptions and calculations to estimate the proportion of residents in the City and County of Honolulu who make their living unit available as a home or vacation rental going forward in light of Bill 89. JLL made these calculations based on:
 - Taking the 800 units which currently have a permit to operate
 - Assumed the addition of 1,725 bed & breakfast homes, a process which is set to begin in October 2020
 - Added a factor for units that operate sporadically without a permit
- The result is that the number of residents making their living unit available in the City and County of Honolulu (Oahu Island) decreases during JLL's forecast horizon from today's proportion, due to Bill 89. This results in a **6.7 percentage point decrease** in the proportion of living unit owners participating in the home and vacation rental market during the forecast period.
- Hence, JLL projects the percentage of living unit owners in the City and County of Honolulu participating in the home and vacation rental market to decrease to 4.3% by 2023. This calculation is detailed in the appendix.

Forecasted market in 2023: Rest of Hawaii

- As previously above, JLL projects that the percentage of living unit owners in the rest of Hawaii (i.e., Hawaii, Maui and Kauaii Counties) participating in the home and vacation rental market will increase **by 2.6 percentage points**. This projection assumes that:
 - One-third of those owners who have not made their residential units available previously, but indicated they are ‘very likely’ to do so enter the market by 2020, and
 - Another one-third of those owners who have not made their residential units available previously, but indicated they are ‘very likely’ to do so enter the market by 2023, and
 - One-fifth of those living unit owners currently making their units available for home and vacation rental in the rest of Hawaii but who are undecided of their future rentals leave the market.

Forecasted market in 2023: State of Hawaii

- Given the separate projections for the City and County of Honolulu and the rest of Hawaii, the result in the overall percentage of living unit owners in the State of Hawaii participating in the home and vacation rental market is forecast to decrease to 7.6% by 2023. This represents a **decrease of 3.4 percentage points**, on a weighted average basis.

	Honolulu County	Rest of Hawaii	Blended Statewide Average
Respondents who make their living units available as home and vacation rentals (current survey)	11.0%	11.0%	11.0%
Assume one-third of those ‘very likely’ to start making living unit available enter market in 2020	0.0%	1.5%	
Assume another one-third of those ‘very likely’ to start making living unit available enter market by 2023	0.0%	1.5%	2.5%
Assume one-fourth of those ‘somewhat likely’ to start making living unit available enter market by 2023	0.0%	2.3%	
Assume one-fifth of those currently making living unit available but undecided of future rentals leave the rental market by 2023 (Rest of Hawaii)	n/a	(2.7%)	(5.5%)
Assumption as to residents who leave the market due to Bill 89	(6.7%)	n/a	
Total proportion of participating residents in 2023	4.3%	13.6%	7.6%
Percentage point change 2023 vs. today	-6.7	+2.6	-3.4

Source: JLL

Home and vacations rental market in the State of Hawaii is expected to be a \$1.1 billion annual market in 2023.

Future Size of Home and Vacation Rental Market in the State of Hawaii								Residential Unit Type					
Year	Hawaii Housing Units	Share of Residents who Make Residential Unit Available	Estimated Occupancy	Occupied Room Nights	Blended Median Nightly Rate	Total Estimated Accommodations Revenue	Transient Accommodations Tax	68% Primary Residence			32% Secondary Residence/Investment Property		
								Occupancy	Occupied Room Nights	Total Estimated Accommodations Revenue	Occupancy	Occupied Room Nights	Total Estimated Accommodations Revenue
2018	546,500	11.0%	39%	7,300,000	\$ 196	\$ 1,433,000,000	\$ 132,600,000	24%	3,580,000	\$ 562,000,000	53%	3,720,000	\$ 871,000,000
2019F	547,593	11.0%	39%	7,300,000	\$ 199	\$ 1,474,000,000	\$ 136,400,000	24%	3,580,000	\$ 578,000,000	53%	3,720,000	\$ 896,000,000
2020F	548,688	10.2%	39%	6,980,000	\$ 203	\$ 1,446,000,000	\$ 133,800,000	24%	3,420,000	\$ 567,000,000	53%	3,560,000	\$ 879,000,000
2021F	549,786	9.3%	39%	6,360,000	\$ 207	\$ 1,348,000,000	\$ 124,700,000	24%	3,110,000	\$ 527,000,000	53%	3,250,000	\$ 821,000,000
2022F	550,885	8.5%	39%	5,700,000	\$ 210	\$ 1,230,000,000	\$ 113,800,000	24%	2,790,000	\$ 482,000,000	53%	2,910,000	\$ 748,000,000
2023F	551,987	7.6%	39%	5,080,000	\$ 214	\$ 1,107,000,000	\$ 102,400,000	24%	2,490,000	\$ 434,000,000	53%	2,590,000	\$ 673,000,000
Growth	0.2%									9.250%			

Source: JLL

Tax Rate is per State of Hawaii - Department of Taxation

- JLL then estimated the size of Hawaii’s home and vacation rental sharing market through 2023. Housing unit stock grew by an estimated 0.4% in 2015; JLL assumed annual growth of 0.2% through 2023.
- JLL applied the proportions of individuals who make their residential unit available as a home or vacation rental based on proportions presented on the previous slide through 2023; years in between were estimated based on straight-line growth between the two years.
- Home and vacation rental occupancy levels in the state are estimated at 39% currently; this is down slightly from the 42% estimated in JLL’s survey in 2016, attributable to the additional number of hosts in the market. As previously noted, The occupancy figures that JLL computed, and that are depicted in this report, pertain to the number of occupied nights during the full year (365 nights), to allow for an apples-to-apples comparison to the traditional hotel/resort market, where occupancy is also expressed over 365 nights per year.
- The result is an estimated market size of \$1.1 billion in 2023.
- The State of Hawaii – Department of Taxation assesses a Transient Accommodations Tax on accommodations earned by those renting their unit out as a home or vacation rental. The tax rate is 9.250%. This amount is computed above as well.

The home and vacations rental market in the City and County of Honolulu is expected to decrease to \$442 million by 2023.

Future Size of Home and Vacation Rental Market in City and County of Honolulu								Residential Unit Type							
Year	Honolulu County Housing Units	Share of Residents who Make Residential Unit Available	Estimated Occupancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accommodations Revenue	Transient Accommodations Tax	68% Primary Residence				32% Secondary Residence/Investment Property			
								Occ- upancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accommodations Revenue	Occ- upancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accommodations Revenue
2018	352,493	11.0%	39%	4,710,000	\$ 196	\$ 925,000,000	\$ 85,600,000	24%	2,310,000	\$ 157	\$ 363,000,000	53%	2,400,000	\$ 234	\$ 562,000,000
2019F	353,197	11.0%	39%	4,710,000	\$ 204	\$ 961,000,000	\$ 88,900,000	24%	2,310,000	\$ 163	\$ 377,000,000	53%	2,400,000	\$ 243	\$ 584,000,000
2020F	353,904	9.3%	39%	4,020,000	\$ 212	\$ 854,000,000	\$ 79,000,000	24%	1,970,000	\$ 170	\$ 335,000,000	53%	2,050,000	\$ 253	\$ 519,000,000
2021F	354,612	7.6%	39%	3,290,000	\$ 220	\$ 726,000,000	\$ 67,200,000	24%	1,610,000	\$ 177	\$ 284,000,000	53%	1,680,000	\$ 263	\$ 442,000,000
2022F	355,321	5.9%	39%	2,550,000	\$ 229	\$ 586,000,000	\$ 54,200,000	24%	1,250,000	\$ 184	\$ 230,000,000	53%	1,300,000	\$ 274	\$ 356,000,000
2023F	356,032	4.3%	39%	1,850,000	\$ 238	\$ 442,000,000	\$ 40,900,000	24%	900,000	\$ 191	\$ 172,000,000	53%	950,000	\$ 285	\$ 270,000,000
<i>Growth</i>	<i>0.2%</i>				<i>4.0%</i>					<i>9.250%</i>				<i>4.0%</i>	

Source: JLL

Tax Rate is per State of Hawaii - Department of Taxation

- JLL estimated the housing supply in Honolulu County to be 352,493 units, based on US Census Housing Estimates as of July 1, 2018. Housing unit stock in the entire state grew by an estimated 0.4% in 2015; JLL assumed annual growth of 0.2% in the entire state through 2023.
- JLL applied the proportions of individuals who make their residential unit available as a home or vacation rental based on proportions presented on the previous slide through 2019. JLL estimates that a certain percentage of these individuals will leave the market due to HB 89 per what is outlined on page 22; years in between were estimated based on straight-line growth between the two years.
- Home and vacation rental occupancy levels in the state are estimated at 39% currently; this is down slightly from the 42% estimated in JLL’s survey, attributable to the additional number of hosts in the market. As previously noted, the occupancy figures that JLL computed, and that are depicted in this report, pertain to the number of occupied nights during the full year (365 nights), to allow for an apples-to-apples comparison to the traditional hotel/resort market, where occupancy is also expressed over 365 nights per year.
- JLL assumed 4% rate growth, above hotels’ rate growth projections for Hawaii and the nation as a whole, given what will be more constrained supply and the ability to drive greater pricing power.
- The State of Hawaii – Department of Taxation assesses a Transient Accommodations Tax on accommodations earned by those renting their unit out as a home or vacation rental. The tax rate is 9.250%. This amount is computed above as well.

The home and vacations rental market in Hawaii, Kauai, and Maui Counties is expected to grow to a \$665 million annual market by 2023.

Future Size of Home and Vacation Rental Market in Rest of Hawaii								Residential Unit Type							
Year	Rest of Hawaii Housing Units	Share of Residents who Make Residential Unit Available	Estimated Occ- upancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accommodations Revenue	Transient Accommodations Tax	68% Primary Residence				32% Secondary Residence/Investment Property			
								Occ- upancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accom- modations Revenue	Occ- upancy	Occupied Room Nights	Median Nightly Rate	Total Estimated Accom- modations Revenue
2018	194,008	11.0%	39%	2,590,000	\$ 196	\$ 508,000,000	\$ 47,000,000	24%	1,270,000	\$ 157	\$ 199,000,000	53%	1,320,000	\$ 234	\$ 309,000,000
2019F	194,396	11.0%	39%	2,590,000	\$ 198	\$ 513,000,000	\$ 47,500,000	24%	1,270,000	\$ 159	\$ 201,000,000	53%	1,320,000	\$ 236	\$ 312,000,000
2020F	194,784	12.5%	39%	2,960,000	\$ 200	\$ 592,000,000	\$ 54,800,000	24%	1,450,000	\$ 160	\$ 232,000,000	53%	1,510,000	\$ 239	\$ 360,000,000
2021F	195,174	12.9%	39%	3,070,000	\$ 202	\$ 622,000,000	\$ 57,500,000	24%	1,500,000	\$ 162	\$ 243,000,000	53%	1,570,000	\$ 241	\$ 379,000,000
2022F	195,564	13.2%	39%	3,150,000	\$ 204	\$ 644,000,000	\$ 59,600,000	24%	1,540,000	\$ 163	\$ 252,000,000	53%	1,610,000	\$ 244	\$ 392,000,000
2023F	195,955	13.6%	39%	3,230,000	\$ 206	\$ 665,000,000	\$ 61,500,000	24%	1,590,000	\$ 165	\$ 262,000,000	53%	1,640,000	\$ 246	\$ 403,000,000
Growth	0.2%				1.0%		9.250%			1.0%				1.0%	

Source: JLL

Tax Rate is per State of Hawaii - Department of Taxation

- JLL applied the proportions of individuals who make their residential unit available as a home or vacation rental based on proportions presented on slide 22 through 2023; years in between were estimated based on straight-line growth between the two years.
- Home and vacation rental occupancy levels in the state are estimated at 39% currently; this is down slightly from the 42% estimated in JLL’s 2016 survey, attributable to the additional number of hosts in the market. As previously noted, the occupancy figures that JLL computed, and that are depicted in this report, pertain to the number of occupied nights during the full year (365 nights), to allow for an apples-to-apples comparison to the traditional hotel/resort market, where occupancy is also expressed over 365 nights per year.
- Given that there is not evidence that the occupancy rates are continuing to rise, JLL held this occupancy rate steady during the forecast horizon.
- JLL assumed 1% rate growth, in line with hotels’ rate growth projections for Hawaii and the nation as a whole. This is lower than the 3% growth rate that JLL assumed in its last survey as economic growth has gotten more mature, and is now slowing.
- The State of Hawaii – Department of Taxation assesses a Transient Accommodations Tax on accommodations earned by those renting their unit out as a home or vacation rental. The tax rate is 9.250%. This amount is computed above as well.

Appendix

Visitation to Hawaii has been increasing at more than three times the amount by which hotel occupied room nights are increasing, suggesting that much of the incremental demand is being accommodated in home and vacation rentals.

Hotel occupied room nights per visitor arrival has continued to mark a slight downward trend as additional visitors stay in home and vacation rentals.

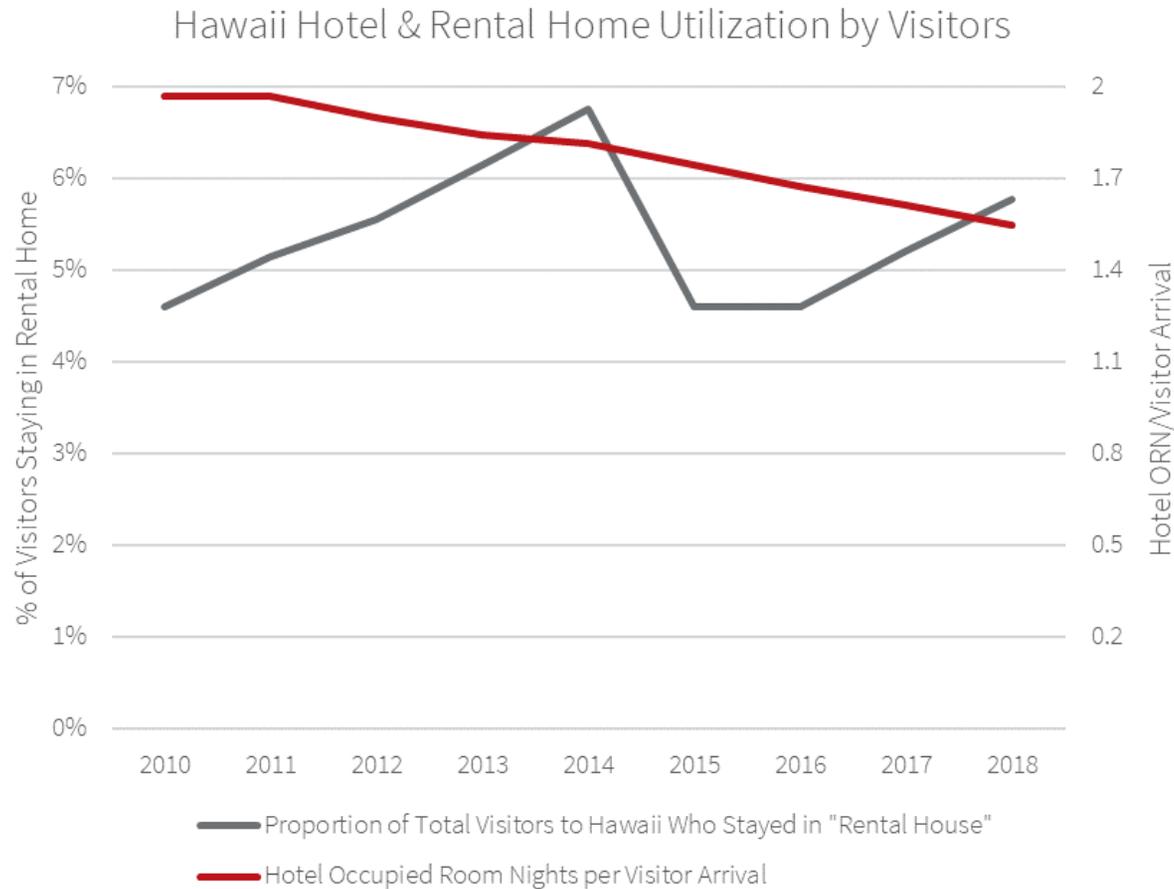
Year	Est. Occupied Room Nights	Hotel Occupied Room Nights per Visitor Arrival	Visitor Arrivals	Visitor Days	Visitor Days who Stay in Hotels	Average Length of Stay (All Visitors)	Average Party Size
2010	13,828,000	1.970	7,018,133	65,465,125	62.5%	9.3	2.1
2011	14,366,000	1.968	7,299,047	68,466,519	62.7%	9.4	2.2
2012	15,232,000	1.897	8,028,743	74,519,278	63.4%	9.3	2.2
2013	15,072,000	1.844	8,174,461	74,942,169	63.0%	9.2	2.2
2014	15,072,000	1.814	8,308,114	75,646,053	63.5%	9.1	2.2
2015	15,074,000	1.743	8,649,357	78,281,080	60.2%	9.1	2.1
2016	14,943,000	1.673	8,934,277	80,225,407	61.1%	9.0	2.2
2017	15,179,000	1.614	9,404,346	84,065,784	58.6%	8.9	2.3
2018	15,294,000	1.547	9,888,845	88,284,715	60.3%	8.9	2.3

1.1%	CAGR 2010-2018	3.9%
------	----------------	------

Source: HTA, JLL

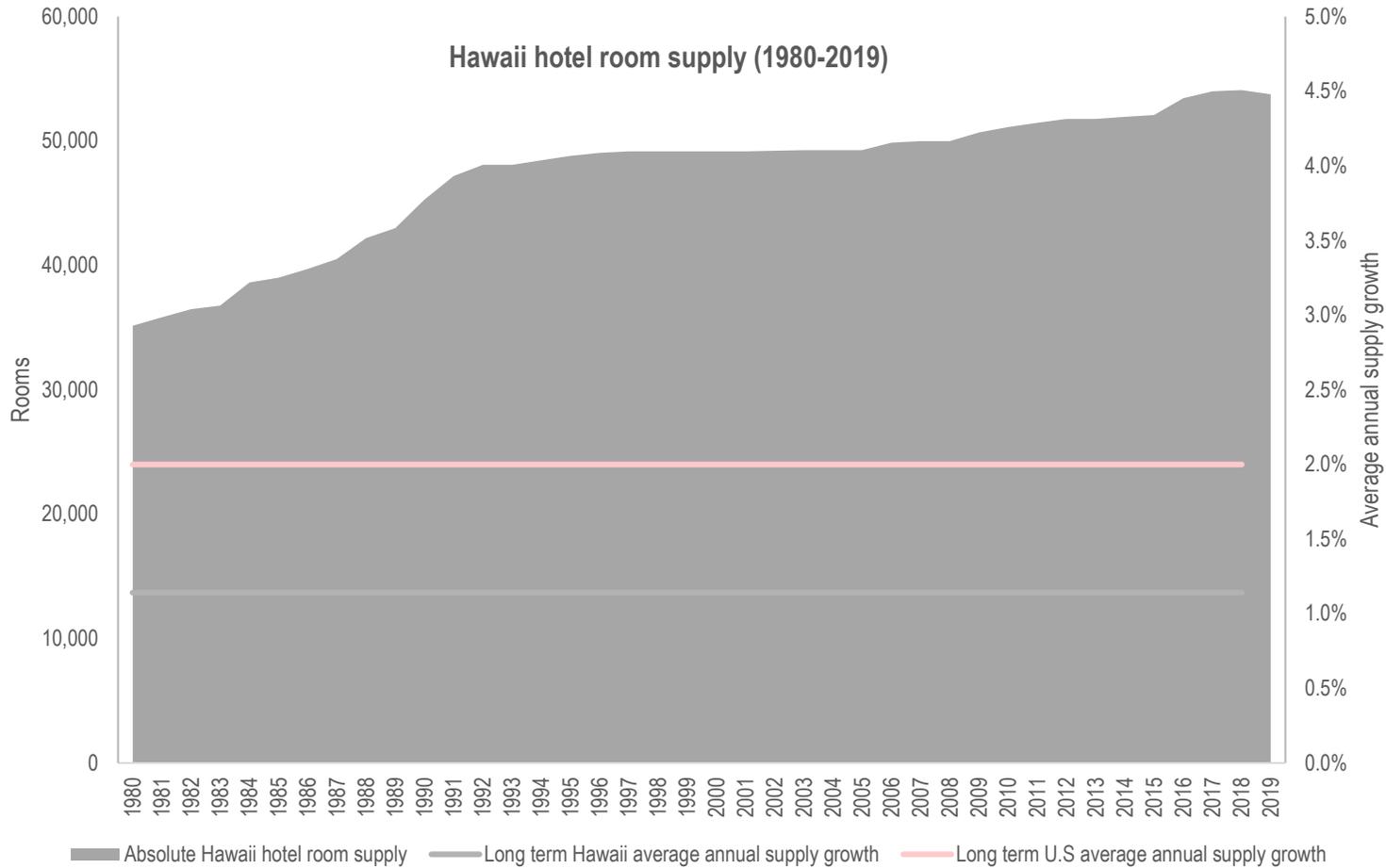
Visitor arrivals continue to outpace growth in hotel occupied room nights

During the timeframe evaluated, hotel occupied room nights per visitor arrival has been trending down overall while the percent of visitors who stay in home and vacation rentals has trended upwards.



Source: HTA, STR, JLL

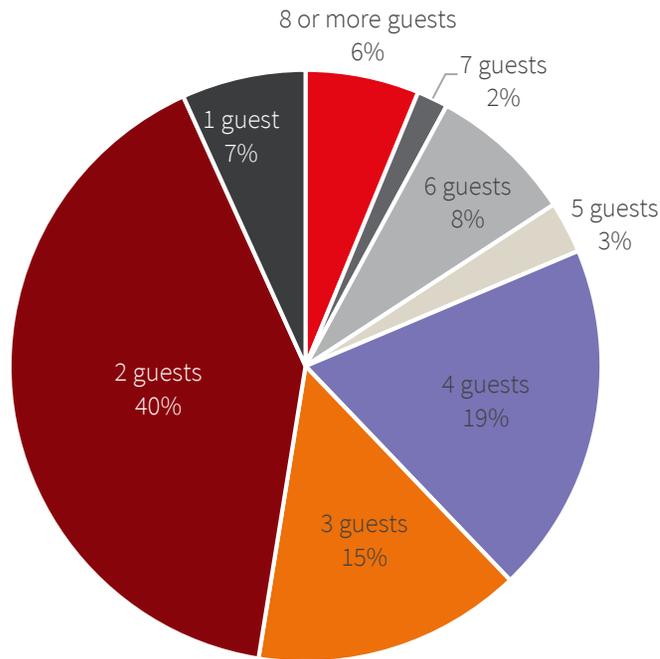
Since 2015, Hawaii’s hotel inventory has increased by approximately 2,000 hotel rooms, with growth in supply being notably below the national level.



Source: STR, JLL

JLL demand survey indicates average home and vacation rental party size per booking of 3.3 guests.

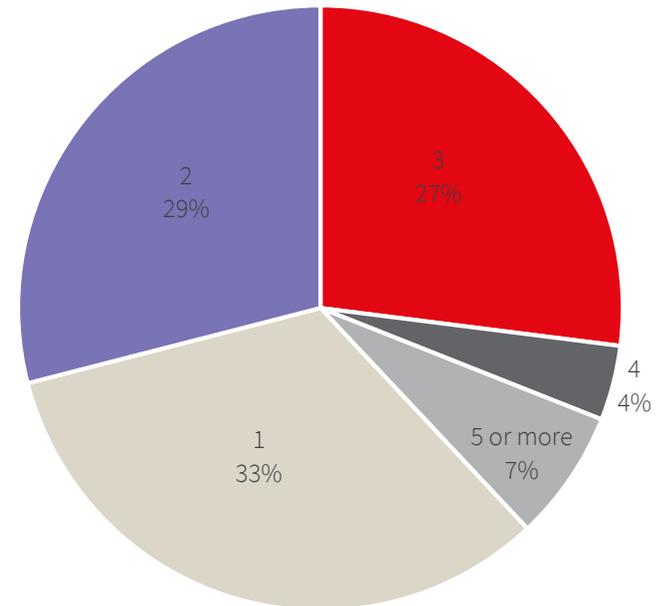
Thinking back to your most recent visit to Hawaii when you stayed in a short-term vacation rental, how many people stayed in the accommodation with you (including yourself)?



Source: JLL Demand Survey

The range of product offered by home and vacation rentals tends to be complementary to traditional hotel offerings.

How many bedrooms are there in the unit you make available for rental?

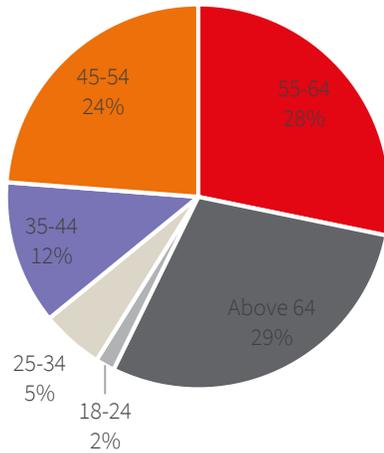


Source: JLL Supply Survey

The layout of home and vacation rentals is different from the typical physical accommodation of a traditional hotel (one-bedroom), suggesting that the home and vacation rentals model is somewhat complementary to the offerings of the hotel and resort market.

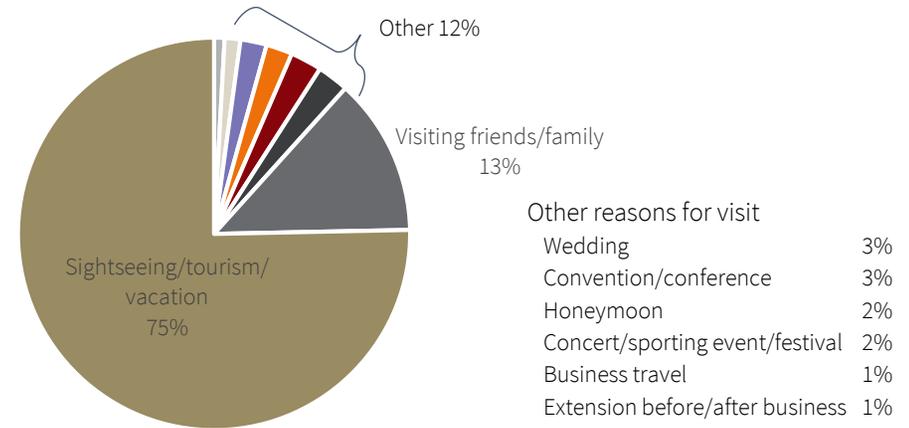
JLL posed additional questions of those responding to the visitor Demand survey. As noted, the survey was distributed among a list of recent visitors to Hawaii who indicated that they had stayed at a home and vacation rental.

What is your age?



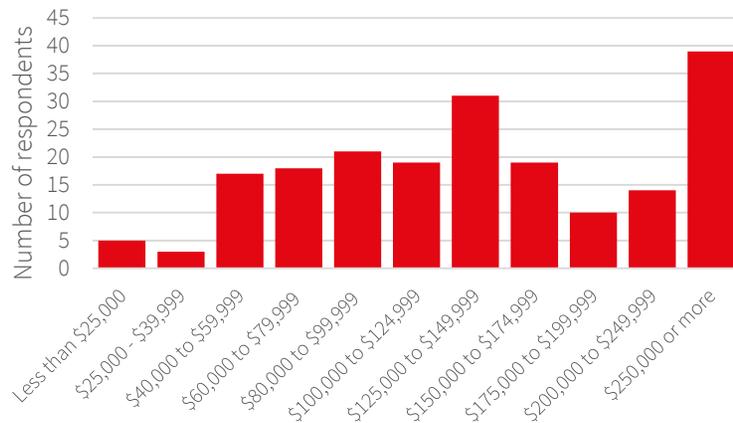
Source: JLL Demand Survey

What was the primary purpose of your visit(s) to Hawaii in the past 24 months?



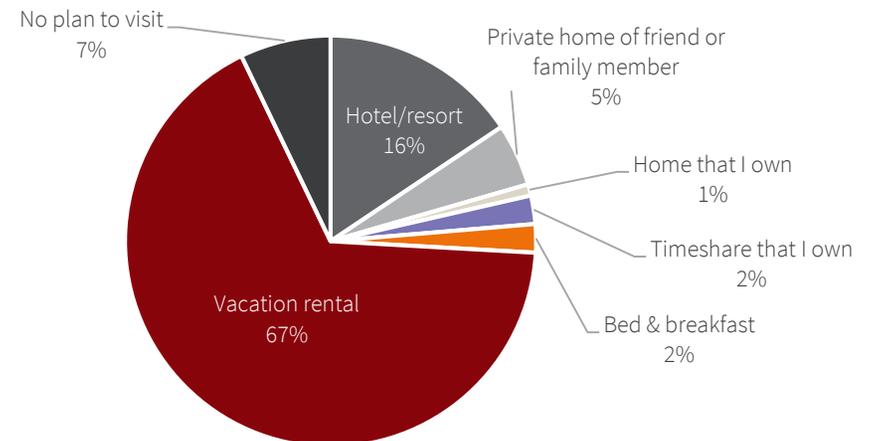
Source: JLL Demand Survey

What is your approximate household income?



Source: JLL Demand Survey

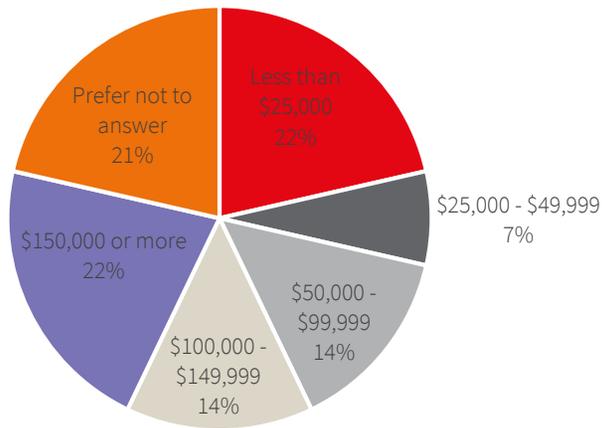
At what type of property do you plan to stay on your next trip to Hawaii?



Source: JLL Demand Survey

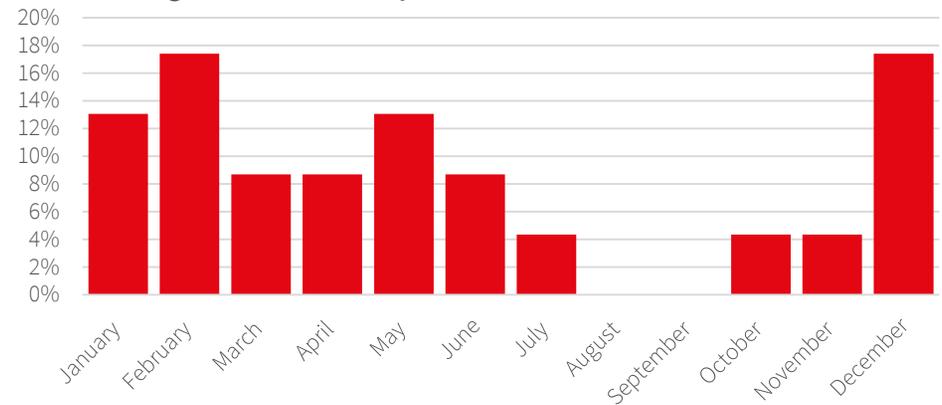
JLL posed additional questions of those responding to the Supply survey (i.e. owners making their homes available as a home and vacation rental).

What is your approximate household income?



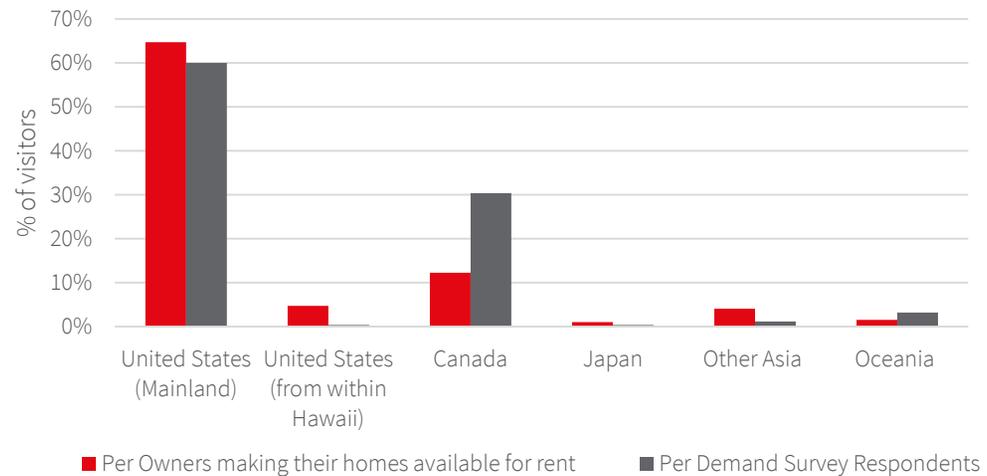
Source: JLL Supply Survey

During what months of the year have you observed the highest demand for your short-term vacation rentals?



Source: JLL Supply Survey

From where do your visiting short-term vacation guests originate?



Source: JLL Supply and Demand Surveys

The below tables detail the calculations discussed on slide 21.

City and County of Honolulu Home and Vacation Rental Inventory		
	Annualized Room Nights	Proportion of Total
Supply as of year-end 2019*	3,270,000	100.0%
<i>Assumptions as to inventory in 2023</i>		
Current permits (for 800 units)	290,000	8.9%
Plus 1,715 B&Bs	630,000	19.3%
Subtotal	920,000	28.1%
Assumption for units operating without license	365,000	11.2%
Total annual inventory	1,285,000	39.3%
Amount by which inventory reduces (100% minus 39.3% = 60.7%)		60.7%
<i>*based on Oahu home and vacation rental inventory as provided by HTA</i>		
Source: JLL		

City and County of Honolulu	
<u>Proportion of residents making living unit available as home or vacation rental</u>	
Today	11.0%
Remove 60.7% of this proportion (for 2023 estimate)	-6.7%
Remaining proportion in 2023	4.3%
Source: JLL	



Daniel Fenton
Executive Vice President
+1 831 298 7215
dan.fenton@am.jll.com

Lauro Ferroni
Senior Director, Research
+1 312 228 2566
lauro.ferroni@am.jll.com

Tina Valdecanas
Senior Associate
+1 984 209 6149
tina.valdecanas@am.jll.com