The views expressed herein are those of the author and do not necessarily represent those of the Federal Reserve Bank of San Francisco or the Federal Reserve System.
INTRODUCTION

The worst of the housing crisis may be behind us, but the recent housing market recovery opens up a number of new community development questions. Of particular concern is the potential impact of investor purchases of single-family residences, especially in hard-hit neighborhoods that experienced severe price depreciation and offered an abundant supply of distressed property. According to Harvard’s Joint Center for Housing Studies, more than 3.0 million homes switched on net from the owner-occupied to the rental stock nationally between 2007 and 2011.¹ Much of this switch was driven by resident owners losing their homes during the foreclosure crisis.

Figure 1 below shows the homeownership rate for Arizona, California and Nevada, relative to the U.S., from 2000 to 2012.² These three states, which are part of the Federal Reserve’s 12th District, were particularly hard-hit by the foreclosure crisis and suffered greater homeownership losses, relative to the nation as a whole. From their peaks in 2006 to the most recent data available for 2012, the homeownership rate in Arizona, California and Nevada fell 6.3 percentage points (pp), 5.7 pp, and 10.0 pp, respectively. Over the same period, the U.S. homeownership rate fell just 3.6 pp. Given that foreclosures were more concentrated among low-income neighborhoods, the losses in homeownership in these areas were even more severe.

Fig. 1 - Annual Homeownership Rates, 2000-2012

Source: Housing Vacancies and Homeownership Survey. U.S. Census Bureau.

This decline in homeownership has been accompanied by growth in rental demand. The renter share of all U.S. households increased from 31 percent in 2004 to 35 percent in 2012. National data suggest that this increase in rental demand has been met by growth in the market share of single-family rentals since the housing bust. Single-family homes have traditionally made up a sizeable share of the rental housing stock, but this share is growing in many markets in the wake of the foreclosure crisis. From 2005 to 2010, single-family units as a share of the renter-occupied stock grew from 30.8 percent to 33.5 percent, which was the largest increase among all rental property types. Single-family rental housing has become the fastest growing component of the rental market. This trend of growing absentee ownership raises important community development questions around the issues of neighborhood stabilization, rental costs, property maintenance, and lost asset building opportunities for potential first-time homebuyers.

A variety of sources seem to suggest that institutional investors are slowing down their acquisitions of single-family homes for rental as a result of home price appreciation and limited inventory. Purchases by institutional investors, defined as entities that acquire at least 10 properties in a calendar year, accounted for 5.6 percent of all U.S. residential sales in the first quarter of 2014, down from 7.0 percent a year prior, which is the lowest level since the first quarter of 2012. A recent Bloomberg News article quoted Jonathan Gray, global head of real estate for the large institutional investor Blackstone Group LP, as saying, “The institutional wave has passed… It’s at a much lower level than it was 12 or 24 months ago.” Some institutional investors are expanding their involvement in the single-family rental market by providing financing to smaller landlords. Earlier this year, Blackstone’s B2R Finance LP originated its first loan for $5.7 million and Colony American Homes formed a joint-venture with plans to originate $1 billion in landlord financing this year; both companies plan to package the loans as mortgage-backed securities. While the institutional wave of acquisitions may have passed, the effects of these purchases linger.

These rapid shifts in non-resident ownership have dramatically changed the housing landscape in communities across the country. The long-term effects of this tenure shift in single-family homes from owner-occupied to rental remain to be seen, but communities are still seeking to understand the extent to which these changes have taken place at the local level. This Research Brief examines trends in rental housing composition in Arizona, California and Nevada and takes a closer look at local areas that have seen the fastest growth in single-family rentals. These three states were hit particularly hard by the foreclosure crisis and have major markets that have been impacted by investor purchases.

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8 Ibid.
ABOUT THE DATA

For purposes of this report, a single-family residence is defined as a one-unit structure, including both detached and attached units, such as townhomes. Smaller multi-unit rentals where an owner may reside in one of the units, such as duplexes and triplexes, are considered in a separate category. This allows us to focus on the growth of the subset of rental units in which an owner is not in residence. The state level analyses rely on the 1-year estimates, while the county level analyses use the 3-year estimates in order to achieve greater accuracy at the more local level. The ACS data used in this report can only tell us about changes in the market share of single-family rentals—they do not provide precise estimates of investor purchases. The ACS does not distinguish between owner types; we cannot gauge the extent to which properties are owned by institutional versus individual investors, or which markets have been most impacted by large-scale institutional purchases. However, in the absence of investor purchase data at the local level, the ACS data allows us to see where non-owner residency among single-family homes is growing the fastest. Our hope is that the availability of data on single-family residential tenure at the more local level will spur conversations among community developers seeking to better understand these trends and their potential impacts on LMI populations. The remainder of this report examines the growth of single-family rentals in local markets in Arizona, California and Nevada.
As seen in Figure 2, single-family units made up a growing share of the rental housing stock in Arizona, from 36.9 percent in 2007 to 43.8 percent in 2012. The shares of all other types of rental housing declined over this period, as seen in Figure 3, with multi-family rentals with 5-19 units seeing the largest decline. Of the three states profiled in this report, Arizona was the only state to see market share declines in all types of multi-family housing, which helps to explain the relatively large growth of single-family rental market share.

Note: Other includes mobile home, RV, boat, van, etc.
Source: American Community Survey, 1-year estimates
The data reveal greater variation in the market share of single-family rentals at the county level. In 2012, single-family units made up roughly 40 percent of all rental units in Pima and Maricopa Counties, but 66 percent of all rentals in Pinal County (Pima County makes up the Tucson MSA; Maricopa and Pinal make up the Phoenix-Mesa-Glendale MSA). In Pinal County, the overall number of rental units (of any size) increased by 18.7 percent, while the number of single-family rentals increased by 80.4 percent. Figure 4 shows the percentage point change in the market share of single-family rentals during this period, further demonstrating the rapid tenure change taking place in Pinal County. The rental market share of single-family rentals jumped from 43.4 percent in 2007 to 66.0 percent in 2012, an increase of 22.6 pp, far outpacing Pima and Maricopa Counties, both of which were already above the statewide change of 6.9 pp.

![Fig. 4 - Change in Market Share of Single-family Renter-occupied Housing, 2007 to 2012 (Arizona)](image)

Pinal is situated between Phoenix and Tucson and suburban growth from these major metros spilled over into the County during the housing boom. The County experienced rapid population growth, almost doubling between 2000 and 2010, and home prices in the metro area rose 127 percent from January 2000 through June 2006, the peak of the market. The foreclosure crisis hit the Phoenix metro area particularly hard, with Pinal County experiencing a higher foreclosure rate than Maricopa (where the City of Phoenix is located), as seen in Figure 5 below.

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The rapid growth of single-family rental housing likely contributed to an oversupply of rental units, as the rental vacancy rate increased in all three counties from 2007 to 2012, as seen below in Figure 6. Pinal County saw the largest increase in rental vacancy, growing to 12.3 percent in 2012. These figures represent vacancies across all rental unit types.

Source: LPS (Lender Processing Services Inc.) Applied Analytics

Fig. 5 - County Foreclosure Rate, 2006-2014 (Arizona)

Fig. 6 - Rental Vacancy Rate, 2007 vs. 2012 (Arizona)

Source: American Community Survey, 3-year estimates
One of the outstanding concerns around the tenure change of single-family homes is the impact on rents, particularly for LMI households that are likely already cost-burdened. Figure 7 below shows cost burden among single-family renter households for 2007 and 2012. The share of renters that are cost burdened increased slightly in Maricopa but decreased slightly in Pima. However, Pinal County saw a dramatic increase in the share of single-family renters that are cost burdened. It’s important to note that the data only show cost burden, not trends in absolute rent; these trends are influenced by a combination of changes in rental costs as well as changes in the household incomes of single-family renters. However, the dramatic increase in rental burdens in Pinal County warrants further exploration, particularly the impact on lower-income renters.

**Fig. 7 - Share of Single-Family Renters that Are Cost Burdened* (Arizona)**

<table>
<thead>
<tr>
<th>County</th>
<th>2007</th>
<th>2012</th>
</tr>
</thead>
<tbody>
<tr>
<td>Maricopa</td>
<td>45.4%</td>
<td>46.9%</td>
</tr>
<tr>
<td>Pima</td>
<td>45.0%</td>
<td>44.5%</td>
</tr>
<tr>
<td>Pinal</td>
<td></td>
<td>44.4%</td>
</tr>
</tbody>
</table>

*Defined as spending more than 30% of income on rent  
Source: American Community Survey 3-year estimates

Across multiple indicators, Pinal County’s housing market appears to be undergoing the most dramatic changes. Given its position as a “bedroom community” to the both the Phoenix and Tucson metro areas, the rapid growth in population and housing during the boom have made it more susceptible to these shifts in the post-recessionary period.
As seen in Figure 8, single-family units made up a growing share of the rental housing stock in California, from 34.1 percent in 2007 to 37.0 percent in 2012. In contrast, rentals with 2-4 units and 5-19 units lost market share, as seen in Figure 9, while multi-family properties with 20+ units and other types of rentals remained basically unchanged. Given the variation in the state’s regional housing markets, the following sections examine these trends in the Bay Area, the Central Valley, and Southern California.

Note: Other includes mobile home, RV, boat, van, etc.
Source: American Community Survey, 1-year estimates
At the regional level, tenure changes in single-family homes vary by county, as seen below in Figure 10 for the Bay Area. Single-family rentals lost slight market share in San Mateo and San Francisco Counties; some of this market share loss appears to have been captured by growth in small multi-family rentals with 2-4 units. The counties that experienced the largest growth in single-family rental market share were Napa, Solano, and Contra Costa Counties, which saw growth of 4.8 pp, 6.8 pp, and 7.5 pp, respectively. These figures are noticeably larger than the statewide average change of 2.8 pp.

Solano and Contra Costa Counties, located in the East Bay of the SF Bay Area region, were also among the areas hardest-hit by the foreclosure crisis, as seen in Figure 11 below. Fast growing suburbs like Vallejo in Solano County and Brentwood and Antioch in eastern Contra Costa County experienced dramatic price declines and high rates of foreclosure during the crisis and the abundance of distressed properties attracted investors to the area.

Source: American Community Survey 3-year estimates
The rental vacancy rate fell in six of the nine Bay Area counties from 2007 to 2012, as seen below in Figure 12, suggesting a tighter rental market across the region. Alameda, San Francisco, and Contra Costa saw the overall largest declines in the rental vacancy rate over this time period. However, Solano, Napa and Contra Costa had the highest rental vacancy rates in the region in 2012. These figures represent vacancies across all rental unit types.

**Fig. 11 - County Foreclosure Rate 2006-2014 (Bay Area)**

![Graph showing county foreclosure rates from 2006 to 2014.](source: LPS (Lender Processing Services Inc.) Applied Analytics)

**Fig. 12 - Rental Vacancy Rate (Bay Area)**

![Bar chart showing rental vacancy rates in 2007 and 2012.](source: American Community Survey 3-year estimates)
One of the outstanding concerns around the tenure change of single-family homes is the impact on rents, particularly for LMI households that are likely already cost-burdened. Figure 13 below shows cost burden among single-family renter households for 2007 and 2012. As expected, there is variation across counties: Napa, San Francisco and Sonoma saw the largest increases in rental burdens among single-family renters, while Contra Costa, Marin and Solano saw decreases. However, the data only show cost burden, not trends in absolute rent; these trends are influenced by a combination of changes in rental costs and the incomes of single-family renter households.

The Bay Area is a diverse region and each submarket faces its own set of housing recovery and demographic challenges. However, across multiple indicators, Contra Costa, Solano, and Napa Counties appear to be experiencing a number of challenges in the post-recessionary period, facing some of the region’s largest rental cost burdens, highest rental vacancy and foreclosure rates, and fastest growing single-family rental market share.
Tenure changes in single-family homes vary across the Central Valley, as seen below in Figure 14. In Merced, despite overall growth of 13.6 percent in renter-occupied housing units from 2007 to 2012, single-family rentals lost slight market share; some of this loss appears to have been captured by growth in the market share of duplexes. The counties that experienced the largest growth in single-family rental market share were Sacramento, San Joaquin and Madera Counties, which saw growth of 6.7 pp, 8.9 pp, and 10.1 pp, respectively. These figures are noticeably larger than the statewide average change of 2.8 pp.

In Madera, the number of total renter-occupied units increased seven percent from 2007 to 2012, while the number of single-family rentals increased 26 percent. However, Madera’s housing stock is heavily concentrated in single-family homes; in 2012, 84 percent of all housing units were single-family. In contrast, Sacramento and Fresno have a more diverse range of housing types, with 72 percent and 71 percent, respectively, of all housing units being single-family in 2012. Given that there is more variation in the types of housing stock in these areas, the relatively large market share growth of single-family rentals is notable. Fresno saw a decline in the overall number of smaller multi-family rentals with two to four units over the period.

Relative to other regions in the state, the foreclosure crisis hit the Valley particularly hard, as seen below in Figure 15. Merced, San Joaquin and Stanislaus Counties experienced the highest foreclosure rates throughout the housing bust, with Merced reaching a peak foreclosure rate of 7.6 percent in mid-2009. The region has since seen dramatic improvements in foreclosures, with most counties presently hovering around one percent.
The rental vacancy rate increased in five of the nine Valley counties from 2007 to 2012, as seen below in Figure 16. Madera, Fresno and Merced saw the overall largest increases in the rental vacancy rate over this time period. These three counties also had the highest rental vacancy rates in the region as of 2012. These figures represent vacancies across all rental unit types.

**Fig. 16 - Rental Vacancy Rate (Central Valley)**

*Source: American Community Survey 3-year estimates*
One of the outstanding concerns around the tenure change of single-family homes is the impact on rents, particularly for LMI households that are likely already cost-burdened. Figure 17 below shows cost burden among single-family renter households for 2007 and 2012. As expected, there is variation across counties: Tulare, Kern, and San Joaquin Counties saw the largest increases in rental burdens among single-family renters, while Kings, Madera, and Fresno saw the largest decreases. Across the region, the largest shares of single-family renters are cost burdened in Stanislaus, San Joaquin, and Sacramento Counties. However, the data only show cost burden, not trends in absolute rent; these trends are influenced by a combination of changes in rental costs and the incomes of single-family renter households.

The trends in the Valley are more difficult to untangle, relative to other regions in the state. For example, Merced saw a decline in single-family rental market share, despite having the region’s highest foreclosure rate, and it has the region’s highest rental vacancy rate as of 2012. Merced also saw the region’s largest price declines during the bust. Overall, Merced’s housing market was extremely fragile during the time when investors were doing the most acquisitions. In contrast, a relatively stronger market like Sacramento saw faster growth in single-family market share, declining rental vacancy rates, and increases in single-family rental cost burden.

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*Defined as spending more than 30% of income on rent
Source: American Community Survey 3-year estimates

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Tenure changes in single-family homes vary across Southern California, as seen below in Figure 18. Single-family rentals gained market share from 2007 to 2012 across the entire region. The counties that experienced the largest growth in single-family rental market share were Orange, San Bernardino, and Riverside Counties, which saw growth of 4.4 pp, 4.8 pp, and 8.5 pp, respectively. Single-family rentals are more heavily concentrated in the Inland Empire; in 2012, single-family units made up 49.6 percent and 47.2 percent of all rental units in Riverside and San Bernardino Counties, respectively. In contrast, single-family units made up just 29 percent of all rental units in Orange County in 2012; large multi-family rentals with 50 or more units had the next largest rental market share of 19 percent.

Riverside County saw rapid population and housing growth during the boom, as many residents from Los Angeles and Orange Counties moved inland in search of more affordable homes. The overall number of occupied housing units in Riverside increased 6.6 percent from 2007 to 2012, compared to 2.1 percent in Orange County and 1.7 percent in San Bernardino County. Riverside was also the hardest-hit in the region in terms of foreclosures, as seen in Figure 19 below.
The rental vacancy rate increased across all counties in the Southern California region from 2007 to 2012, as seen below in Figure 20. San Bernardino and Riverside saw the overall largest increases over this time period and also had the highest rental vacancy rates in the region as of 2012, likely driven by an oversupply of single-family rental housing. These figures represent vacancies across all rental unit types.

**Fig. 19 - County Foreclosure Rate, 2006-2014 (Southern California)**

![County Foreclosure Rate Chart](image1)

**Fig. 20 - Rental Vacancy Rate (Southern California)**

![Rental Vacancy Rate Chart](image2)

Source: LPS (Lender Processing Services Inc.) Applied Analytics

Source: American Community Survey 3-year estimates
One of the outstanding concerns around the tenure change of single-family homes is the impact on rents, particularly for LMI households that are likely already cost-burdened. Figure 21 below shows cost burden among single-family renter households for 2007 and 2012. All Southern California counties saw increases in single-family rental cost burden, with Orange, Los Angeles and San Bernardino Counties experiencing the largest increases. Within the region, Riverside and Los Angeles Counties have the largest share of single-family renters that were cost burdened in 2012, both at 57.0 percent. However, the data only show cost burden, not trends in absolute rent; these trends are influenced by a combination of changes in rental costs and the incomes of single-family renter households.

Overall, Riverside is contending with a number of housing challenges in this post-foreclosure period. It has seen the region’s fastest growth in single-family rental market share as well as rental vacancy rate, and it has the largest share of cost-burdened single-family renter households.
As seen in Figure 22, single-family units made up a growing share of the rental housing stock in Nevada. In 2007, single family units and rentals with 5-19 units had similar shares of the market, around 34 percent. However, by 2012, the share of single family rentals had increased to 40.8 percent, while the share of 5-19 unit rentals had decreased to 27.0 percent.

Figure 23 shows this change in rental market share from 2007 to 2012, demonstrating that single-family rentals experienced the largest relative growth of 6.2 pp, while the next largest growth was in rentals with 20 or more units, which grew in market share by 1.6 pp.

Note: Other includes mobile home, RV, boat, van, etc.
Source: American Community Survey, 1-year estimates
According to the 2010 Census, 72.3 percent of the state’s population lived in Clark County (which includes the Las Vegas metro area), while Washoe (which includes the Reno metro area) had the next largest share at 15.6 percent. Thus, many of the state level trends are driven by what’s happening in Southern Nevada. In 2012, single-family homes made up 38.5 percent of all rental units in Clark and 37.2 percent in Washoe. This represents market share increases of 7.9 pp and 7.7 pp in Washoe and Clark Counties, respectively, as seen in Figure 24 below. In Clark County, the overall number of owner-occupied single-family homes declined 1.9 percent while the number of renter-occupied single-family homes increased 59.7 percent. In Washoe, the number of owner-occupied single-family homes declined 0.2 percent while the number of renter-occupied single-family homes increased 50.3 percent.

![Fig. 24 - Change In Market Share of Single-family Renter-occupied Housing, 2007 to 2012 (Nevada)](source: American Community Survey 3-year estimates)

Nevada was hard-hit by the foreclosure crisis and Clark County struggled with a particularly high foreclosure rate, as seen below in Figure 25. At its peak in January 2011, Clark County’s foreclosure rate was 9.6 percent, compared to Washoe County’s peak of 5.8 percent in December 2010. From 2007 to 2012, Clark County saw a 3.7 percent decline in the number of owner-occupied housing units, but a 21.1 percent increase in the number of renter-occupied housing units.
The rental vacancy rate decreased in Clark and Washoe Counties from 2007 to 2012, as seen below in Figure 26. The rental market tightened considerably in Clark County, with the rental vacancy rate falling three percentage points from 2007 to 2012, compared to a decrease of 1.2 percentage points in Washoe County. These figures represent vacancies across all rental unit types.

*Source: American Community Survey 3-year estimates* 

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**Fig. 26 - Rental Vacancy Rate (Nevada)**

<table>
<thead>
<tr>
<th>Year</th>
<th>Clark</th>
<th>Washoe</th>
</tr>
</thead>
<tbody>
<tr>
<td>2012</td>
<td>11.9%</td>
<td>9.4%</td>
</tr>
<tr>
<td>2007</td>
<td>8.9%</td>
<td>8.2%</td>
</tr>
</tbody>
</table>

*Source: American Community Survey 3-year estimates*
One of the outstanding concerns around the tenure change of single-family homes is the impact on rents, particularly for LMI households that are likely already cost-burdened. Figure 27 below shows cost burden among single-family renter households for 2007 and 2012. In Clark County, the share of single-family renters that are cost burdened increased 2.1 pp. Washoe County experienced a relatively greater increase in the share of single-family renters that are cost burdened, growing from 42.5 percent in 2007 to 49.1 percent in 2012. The ACS does not break out rental costs by unit size, so we can only observe gross median rent across all types of rentals. Gross median rent in Clark increased from $973 in 2007 to $992 in 2012, an increase of 2.0 percent. Gross median rents in Washoe increased from $879 in 2007 to $893 in 2012, an increase of 1.6 percent.

Overall, Clark and Washoe are both experiencing shifts in their rental housing landscape, with single-family homes growing in rental market share. In both counties, the number of single-family rentals increased over 50 percent between 2007 and 2012. At the same time, the share of single-family renters that are cost burdened grew in both areas, with Washoe experiencing a more rapid increase.
CONCLUSION

Across the 12th District, single-family homes are accounting for a growing share of the rental housing stock, as homes shift from being owner-occupied to renter-occupied. Investor activity has played an important role in this tenure shift, and given the concentration of distressed sales in lower-income neighborhoods, this trend has important community development implications. These include concerns around property maintenance, rental affordability, neighborhood stabilization, and the crowding out of potential first-time homebuyers.

While this Research Brief helps us understand where this tenure shift is taking place, determining the ongoing impact of this activity requires deep understanding of a variety of local forces. For example, according to research from the Local Initiatives Support Corporation, in Phoenix, investors played an important role in absorbing the oversupply of single-family homes, which helped stabilize prices and reduce vacant and abandoned properties. However, the expansion of single-family rental inventory in Phoenix has weakened economic conditions for multifamily rentals, as tenants are able to rent larger homes for about the same price as a smaller apartment. These observations are unique to the Phoenix market and the ongoing impact will be influenced by additional local demographic and political factors, such as stagnant population growth and immigration policy. In the same way, the impact of this tenure shift among single-family homes will likely vary significantly across different regions. Mitigating the potentially negative effects of this trend will require local policymakers and community development organizations to work together and find ways to positively engage with rental property owners.

Given the growth of single-family rentals in many markets, it is imperative that strong public policies play a role in promoting neighborhood stabilization and protecting renters. Allan Mallach, a senior fellow at the Brookings Institution and the Center for Community Progress, provides a regulatory framework for local governments to oversee the use of rental property, which includes five key elements: keeping track of landlords and properties; establishing minimum property condition and maintenance standards; enforcing property standards over time; covering regulatory costs; and imposing penalties for failure to comply with regulations. He also suggests affirmative measures for encouraging positive landlord behavior, such as training programs and financial incentives.

In addition, nonprofit organizations are testing and refining innovative approaches to promoting neighborhood stabilization, such as incorporating social enterprises into the redevelopment and management of single-family rental homes, or the potential of rental, lease-purchase, and ownership tenure strategies for affordable housing serving LMI households. However, the challenges of financing and operating scattered-site rental housing have limited nonprofits’ ability to acquire and manage single-family homes for rental at scale.

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12 Ibid.
The trends observed in this Research Brief raise a number of ongoing questions: What are the implications of institutional versus individual investor activity on communities? How can a variety of entities, such as local governments, community-based organizations, and investors, partner to address growing single-family rental market share? To what extent are these trends disproportionately affecting LMI communities and communities of color? We hope this data will enrich the efforts of local practitioners and policymakers who are working to promote stable and equitable neighborhoods.