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Housing in California's Future--Nature of the Problem and Priorities for Action

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Housing in California's Future--Nature of the Problem and Priorities for Action

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Abstract

This paper examines current housing conditions and housing policy in California, describes key issues faced by different regions and segments of the population, identifies the major mechanisms for addressing these issues, and suggests where attention should be focused in addressing future growth pressures. California's two key housing issues relate to affordability and location relative to jobs and transportation routes. These issues have been further complicated by the collapse of the housing bubble in 2007 and 2008, which led to extensive foreclosures and price declines throughout the state. State regions with the least affordable housing going into the housing bubble have not experienced the greatest housing cost adjustments during the downturn. Improvements in affordability that have occurred at the outskirts of metropolitan areas may lead to worsening congestion and transportation access as the workforce moves away from job centers to more affordable housing. The addition of "global warming" legislation—AB 32 and SB 375—also complicates efforts to resolve California's housing issues. Housing policy at the state level is dependent on funding that comes from federal and local sources and an implementation system that often requires interacting with multiple state agencies, other levels of government and the major private sector actors in the housing market (builders and financial institutions). Going forward, major roles for the state include providing coordination and direction for housing availability for all segments of the population, expanding funding resources for housing production and services for underserved income groups, and providing a venue for addressing the balance between housing needs and transportation planning.

Housing in California's Future--Nature of the Problem and Priorities for Action[2]

I. Introduction

California's housing supply has been a concern for nearly three decades. Beginning in the early 1970s, the state's median home price began to diverge from the US median, and ten years later, the California median home price was 65 percent greater than the US median. By the early 1990s this differential had widened to 85 percent, and exceeded 100 percent by 2003. This appreciation pattern has had consequences for the affordability of housing as well as the geographic balance between jobs and housing throughout the state.

A California Department of Housing and Community Development report in 2000, *Raising the Roof*, not only described rising costs but also highlighted the concern that production was not keeping pace with demand. (Landis *et al*, 2000). The California Budget Project has reiterated concerns with affordability over the past half decade, focusing in *Locked Out* (California Budget Project 2004 and 2008) on costs faced by low income renters. The combination of sharply rising prices and the location of more affordable housing at the outskirts of major urban centers has turned the housing problem into a location and transportation problem as well. Rising oil prices that peaked at over $130/barrel[3] in mid 2008 and growing concern with global warming further underline this aspect of California's housing "problem."

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[2] This paper benefited from the extensive comments received from Marian Wolfe, principal of Vernazza Wolfe Associates, Linda Wheaton, Assistant Deputy Director of the California Department of Housing and Community Development, and Kirk McClure, Professor, School of Architecture and Urban Planning, University of Kansas. Any opinions expressed or remaining errors are our own and are no reflection on their careful, helpful reviews.

[3] http://research.stlouisfed.org/fred2/data/OILPRICE.txt

Will the housing "crash" that started in 2007 "fix" the problem, ending California's housing affordability problems? Home sales and home prices are falling nationwide, and California unfortunately is a "leader" in exposure to subprime loans and in the rate of foreclosure. California's median price had dropped by over 50% from its 2007 peak, to below the median for 2001 as of 1st Quarter 2009. The 4th Quarter 2008 OFHEO same-home price index was down 27 percent from the 3rd Quarter 2006 peak. At the writing of this paper, census affordability measures are not yet available for the bust period, but clearly the sharp decreases in affordability of the previous several years has been reversed, at least for homebuyers. Yet the price reversal has had other consequences--homeowners have lost equity, some builders and lenders have gone bankrupt, and other builders have "mothballed" developments until better times. Plummeting home prices primarily in California's Central Valley may complicate rather than resolve the state's long term housing issues, regarding where housing is built, how related infrastructure is financed, and who can afford to live in and move into the state.

This paper describes the dimensions of California's housing problem, identifies the state's major mechanisms for addressing these issues, and suggests where attention should be focused in addressing the consequences of expected future growth pressures. The first part of the paper (Sections 2 through 6) addresses current conditions and trends. Section 2 examines housing supply conditions. Section 3 considers affordability in homeowner and rental markets. Section 4 describes the immediate consequences of the mortgage meltdown on delinquencies, foreclosures, home prices and rents. Section 5 analyzes the links between location and affordability, and addresses issues of density of new development. Section 6 identifies demographic changes that add new considerations

to future demand. The second part of the paper discusses housing policy in terms of two key housing issues--affordability and location. We ask what affordability and location issues must be addressed, what types of policies could treat the issues, and how should housing policy interact with transportation policy? Section 7 draws from the first part of the paper to suggest a set of priorities for California housing policy. Section 8 describes the legal and institutional structure within which housing policy is shaped in California and how funds for affordable housing are currently distributed. We cover recommendations for elements of a state housing policy to encourage provision of housing to meet the needs of all income groups in Section 9 and summarize our conclusions in Section 10.

2. Enough Housing?

With home prices falling and subdivisions standing empty, it is hard to argue that California does not have enough total housing stock. Indeed, by some measures the problem was improving even before the subprime crash, despite persistent concerns with housing availability. California housing stock grew from 12.2 million in 2000 to 13.3 million in 2007, an increase of about 1.1 million homes or 9 percent. This rate of increase is below the *Raising the Roof* estimate of 1.9 million additional housing units needed between 2000 and 2010 (or 1.3 million by 2007, at an average rate of 190,000 units per year), but this "lag" in supply has been met by an even slower growth in demand. Since 2000, California employment has grown more slowly than expected in the projections underlying *Raising the Roof*. California's labor force increased by only 7.9 percent between 2000 and 2007, and total employment grew by only 4.4 percent. Nevertheless,

the question of supply is not independent of the question of location. Statewide numbers may show an overall numerical improvement but also show a continuing geographic mismatch between housing location and demand.

2.1 Demand and Changing Demographics

Demand from household growth has been further moderated by the overall change in the demographic mix, which has contributed to larger household size. While the state's population grew by 11.2 percent from 2000 to 2007, households grew by only 8.9 percent. Household size increased slightly, from 2.87 to 2.94 persons per household (See Table 1.).

Table 1
California Housing Stock and Occupancy, 1990, 2000 and 2007

					Vacancy Rate		
Year	Total Housing Stock	Single Family	Multifamily and Other	MF as % of Total	Home-owner	Rental	Average Household Size
1990	11,182,513	6,930,681	4,251,831	38%	1.8%	6.0%	2.79
2000	12,214,550	7,815,035	4,399,515	36%	1.2%	4.5%	2.87
2004	12,758,070	8,216,798	4,541,272	36%	0.9%	5.4%	2.95
2007	13,312,456	8,603,213	4,709,243	35%	2.3%	6.1%	2.94

Source: Authors from California Department of Finance data (stock and household size) and US Bureau of the Census data (vacancy rates by housing type).

These changes at least in part are due to differences in household size and growth rates by ethnicity. The Hispanic and Asian population groups, which have traditionally had larger average household sizes than other groups, have grown faster than other population cohorts in California. Combined, they account for 86.7% of the state's population growth between 2000 and 2004, when household size reached 2.95 persons per household. Demographic changes do not fully account for the change in household size. The high cost of housing and stagnant income growth may also lead to larger

households, as evidenced by grown children continuing to live with their parents, and the doubling up of families in a single household. (Koss-Feder 2009, Brandon 2008).

2.2 Supply

The mid 2000s was a strong period of residential construction in California. In 2004 and 2005, California single family residential building permits reached their highest level since 1989 (See Figure 1). Multifamily permits in 2004 were at their highest level since 1990.[4] A portion of the growth in multifamily housing was connected to increased rates of ownership, since in some markets much of the new multifamily stock was intended for sale, not for rent. In the past three years this construction level has declined. The largest decline was in permits for single family homes, which by 2008 were less than one fourth of the 2005 level. Multifamily permits dropped by almost half compared to the peak 2004 level. The slowdown in building activity is consistent with the weakening for-sale housing market. Improvements in affordability will depend both on how much and on *where* new construction occurs.

A comparison of new residential building to total housing stock shows the areas where single family stock is expanding most rapidly, relative to market size, are primarily on the outskirts of the state's largest urban areas (eg. Riverside County) or in California's Central Valley, as shown in Figure 2. This pattern was encouraged by the availability of vacant land and a positive attitude towards growth shared by elected and appointed officials. High shares of multifamily permits also occur in these locations. In addition, high shares of new multifamily permits are also found in several large urban counties, including Santa Clara and San Diego. The geographic patterns of new building activity

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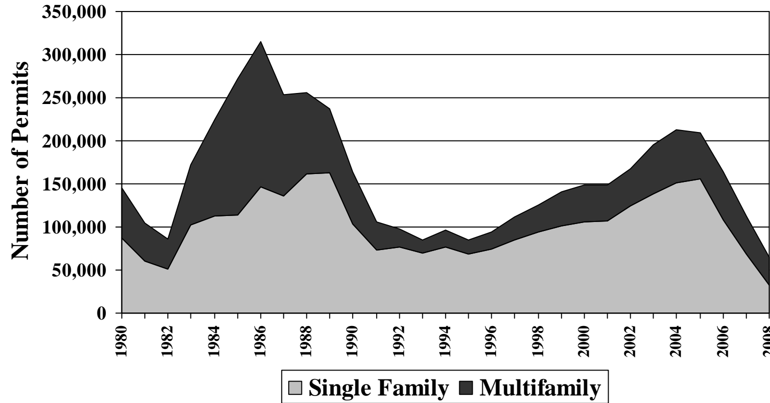
[4] Multifamily building activity in the mid-1980s was inflated in response to tax policy changes, later removed, allowing an accelerated cost recovery system

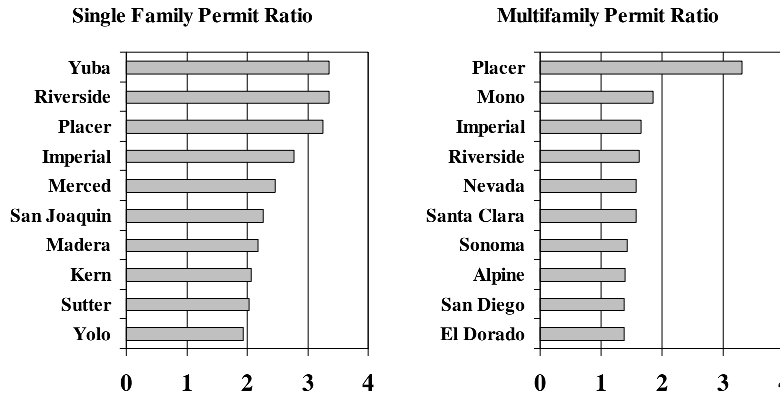
have had implications for where housing is most available and affordable and for the balance between jobs and housing in different parts of the state.

Figure 1
California Residential Building Activity 1980-2007



Source: Authors from California Construction Industry Research Board data.

Figure 2
Index: Share of New Unit Permits to Share of Housing Supply
California MSAs with largest ratios of permits to market size



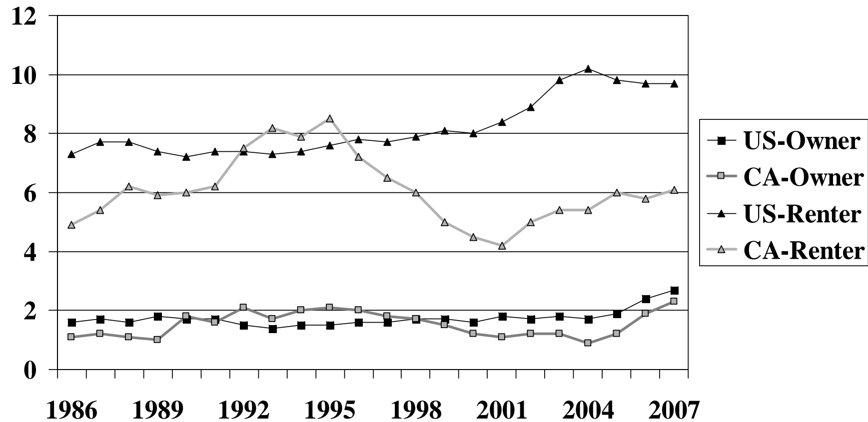
Index= (Share of Permits, 2000-2008)/(Share of Units, 2000); Value of 1 indicates that the county's share of residential building activity was equal to it's 2000 share of housing. Counties with values greater than one are adding relatively high shares of new housing.
Source: Computed by authors from Construction Industry Research Board and California Department of Finance data.

2.3 Availability

Vacancy rates in California vary over time, as shown in Table 1. Based on vacancy levels, the rental housing market in California became much tighter than in other parts of the country after the state emerged from a deep recession in the early 1990s. The gap between US and California vacancies widened during the dot com boom and narrowed very little even after the economy slowed (see Figure 3).[5] In 2004, only Vermont and New Hampshire had lower rental vacancy rates. California also had the third lowest homeowner vacancy rate of states with populations of 5 million or more (less than one percent). Although vacancy rates improved by 2007, California average rental vacancies at 6.1 percent remained well below the US average (9.7 percent) or median (9.5 percent) and average vacancies in most other large states. In 2007, California's rental vacancy was the 9th lowest in the US and 4th lowest among the 29 states with populations of 3 million or more. California's ranking in homeowner vacancies improved much more than rental vacancies (to 10th among the 29 largest states) between 2004 and 2007, consistent with the extensive increase in single family building activity during that period.

[5] There is no strict benchmark for a "natural" vacancy rate at which supply and demand are in balance. Blank and Winnick 1953 used 5 percent as a hypothetical point at which prices begin to rise. Rosen and Smith 1983 conclude that the "natural" rate by market can vary widely, from as low as 5 percent to over 15 percent, and that the change relative to the local area's average is more significant than an overall natural rate. Gabriel and Northaft 2001 find much lower natural rates--in the range of 4.0 to 4.5 percent. The US average from 1986 to 2005 was 8.1 percent. We use a comparison to the US as a whole and to other similar urban markets to gauge the tightness of California's rental market.

Figure 3
Homeowner and Renter Vacancy, US and California
1986-2007



Source: Authors from US Bureau of the Census, Annual Vacancy Rates by state.

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The California Department of Finance reports annual vacancy rates by county, but does not distinguish between homeowner and renter vacancy. The counties with the tightest housing markets are primarily in the coastal areas, while the rural and small metro counties in the state have very high rates of vacancy, as shown in Table 2. Supply and vacancy are both factors affecting affordability.[6] In addition, counties with the highest vacancy rates are also places where high proportions of vacation and second homes may affect overall occupancy estimates for the county.

[6] The California Department of Finance includes newly built homes in both numerator and denominator in calculating vacancy. Thus, there is a positive relationship between higher vacancy rates and higher rates of new construction, because of the lag between unit completion and occupancy.

Table 2 California Counties with the Lowest and Highest Vacancy Rates, 2000 and 2007			
Lowest Vacancy Rates		Highest Vacancy Rates	
County	Percent Vacant	County	Percent Vacant
2007		2007	
San Mateo	1.88	Modoc	21.44
Santa Clara	2.29	Mariposa	25.06
Alameda	3.00	Tuolumne	25.84
Contra Costa	3.03	Lake	26.32
Ventura	3.30	Calaveras	28.16
Orange	3.53	Trinity	29.99
Yolo	3.53	Sierra	30.74
Stanislaus	3.75	Plumas	32.89
San Benito	3.75	Mono	55.72
San Joaquin	3.95	Alpine	68.17
2000		2000	
Santa Clara	2.32	Modoc	21.28
San Mateo	2.48	Mariposa	25.07
Contra Costa	2.95	Tuolumne	25.88
Solano	3.06	Lake	26.30
Alameda	3.11	Calaveras	28.23
Ventura	3.37	Trinity	29.99
Yolo	3.59	Plumas	32.77
Orange	3.53	Sierra	30.97
San Benito	3.72	Mono	56.31
Stanislaus	3.75	Alpine	68.10

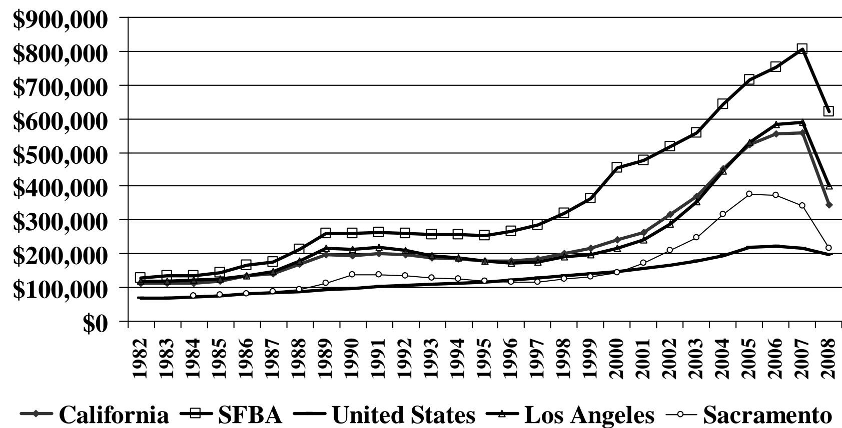
Source: California Department of Finance data, Table E-5

3. Affordability Issues--At What Cost?

California housing costs for decades have risen more quickly than in the country as a whole. As shown in Figure 4, California median home prices were almost 2.5 times the US level in 2007. In parts of the San Francisco Bay Area, median prices were more than three times the US median level. Many factors are involved in this differential, including the mix of homes sold, quality of life, overall income levels, effects of the global housing market on some of the state's major urban centers, and public sector constraints on adding new supply. The sharply narrowing differential between California

and US median home prices in 2008 reflects the changing mix of homes sold (especially with respect to location) as well as declining home values. Sales of foreclosed homes in the Central Valley, at greatly deflated values, have risen while existing homes in many other parts of the state are kept off the market. The affordability estimates discussed in this section precede the collapse in California home prices in 2008 and 2009. The housing conditions resulting from this collapse are discussed further in Section 4.

Figure 4
Median Home Price, Existing Homes California, United States,
San Francisco Bay Area, Los Angeles, and Sacramento
1982-2007



Source: California Association of Realtors & National Association of Realtors

3.1 Defining Affordability

Affordability is a normative concept. Affordability benchmarks are generally determined institutionally in the United States. Once defined by government or private institutions or the political process, measures and benchmarks are used to provide context for absolute levels and changes in home prices and rents and for comparison of housing conditions across geographic areas.

A variety of definitions are used to determine whether housing is "affordable." The US Department of Housing and Urban Development has used a standard related to housing costs relative to income. A household is considered "cost burdened" if it spends more than 30 percent of its annual income on housing. The Decennial Census and American Community Survey statistics use this ratio as a descriptive measure of housing markets, and present the data by household tenure. This benchmark evolved from the lender standard (historically used by realtor associations) of a housing cost-to-income ratio of 25-28 percent, which was used to determine the supportability of a loan (Kroll and Wyant, 2009). The National Association of Home Builders uses a similar standard, assuming a household can afford to spend 28 percent of its monthly income on the mortgage payment, and basing monthly mortgage payments on current sales prices (with assumptions regarding down payments) and fixed-rate mortgage interest. California's Department of Housing and Community Development defines households paying 30 percent or more of their income on housing as "generally considered to be overpaying or cost burdened," and those paying 50 percent or more as severely overpaying. (California Department of Housing and Community Development 2009).

3.2 Affordability and Home Sales

Until the recent housing market collapse, California metropolitan areas have been among the least affordable markets nationwide, even taking higher incomes into account. As recently as second quarter 2008, six of the ten (and 14 of the 25) least affordable metropolitan markets in the US were in California, based on the National Association of Homebuilders-Wells Fargo index, which measures the percent of homes sold that could be "affordable" to a person with the median income level. These six include not only the

"world" cities of San Francisco and Los Angeles, but also more remote areas and places on the fringe of large cities.

The housing slump of 2008/2009 has greatly improved affordability compared to the 2005 through 2007 period, by lowering individual California home prices by over 25 percent on average and the median price by more than one third. In many California markets, less than 10 percent of homes sold in first quarter 2007 were affordable to the median income household, by the NAHB calculations, compared to 41 percent nationwide. By first quarter 2009, 32 percent of homes sold were affordable in the state's least affordable market. Many California markets by 2009 exceeded the US 2007 affordability rate of 43 percent (but the US rate had risen to 72.5 percent by first quarter 2009). Although California metropolitan areas still lag affordability levels nationwide, affordability relative to other parts of the US has improved. Five of the ten least affordable metropolitan markets were still in California, but only eight of the top 25 were in the state (see Table 3).

The changes have been dramatic in many places. Los Angeles had only 3 percent of homes affordable in 2007 by the NAHB index, but saw affordability rise to 14.8 percent of homes by second quarter 2008, and to 42 percent of homes by first quarter 2009. In the San Francisco/San Mateo County area, the NAHB Housing Opportunity Index rose from 6.7 in first quarter 2007, to 13.8 in second quarter 2008, to 32.1 percent in first quarter 2009. Similar changes occurred in San Diego (from 9.4 in first quarter 2007 to 31.1 in second quarter 2008 and 58.8 in first quarter 2009) and the Santa Ana/Anaheim/Irvine area (from 4.4 in first quarter 2007 to 23.0 second quarter 2008 and 48.2 in first quarter 2009). While these numbers are striking, they may also be

misleading. First, the number of home sales has been heavily depressed, with many homes that do not have to sell being held off the market. Second, because recent numbers are heavily influenced by foreclosure sales, prices may be depressed much more than in a market that does not include such a high share of distressed sales. For these reasons, the size and sustainability of affordability improvements is questionable, especially in the San Francisco Bay Area, where affordability numbers are still below the pre-slump, US level of 41 percent.

Table 3
US Metropolitan Areas with the Least Affordable Housing, 2007-2009 (1st Quarter)

	Q1-2009	Q1-2008	Q1-2007
United States	***72.5***	***53.8***	***43.9***
New York-White Plains-Wayne, NY-NJ	21.5	12.5	6.0
Ocean City, NJ	31.5	28.2	15.0
San Francisco-San Mateo-Redwood City, CA	**32.1**	**12.7**	**6.7**
San Luis Obispo-Paso Robles, CA	**34.7**	**13.8**	**6.9**
Los Angeles-Long Beach-Glendale, CA	**42.1**	**10.5**	**3.0**
Nassau-Suffolk, NY	43.0	20.1	12.1
Honolulu, HI	44.1	32.1	21.8
Flagstaff, AZ	45.8	35.2	23.2
Hanford-Corcoran, CA	**48.2**	**31.9**	**18.2**
Santa Ana-Anaheim-Irvine, CA	**48.2**	**17.4**	**4.4**
Newark-Union, NJ-PA	49.3	27.8	21.2
Miami-Miami Beach-Kendall, FL	49.6	16.5	10.0
Mc Allen-Edinburg-Mission, TX	50.3	48.2	N/A
Santa Cruz-Watsonville, CA	**50.9**	**22.2**	**8.2**
St. George, UT	51.3	36.2	32.8
Atlantic City-Hammonton, NJ	52.4	36.2	32.8
El Paso, TX	52.9	31.4	27.6
Santa Fe, NM	53.1	40.7	19.5
Napa, CA	**54.2**	**15.8**	**6.7**
Laredo, TX	55.1	39.5	24.1
Bellingham, WA	55.9	42.4	35.3
Mount Vernon-Anacortes, WA	56.6	29.4	28.8
Seattle-Bellevue-Everett, WA	57.0	32.9	22.6
Brownsville-Harlingen, TX	58.7	49.6	35.9
San Diego-Carlsbad-San Marcos, CA	**58.8**	**25.2**	**9.4**

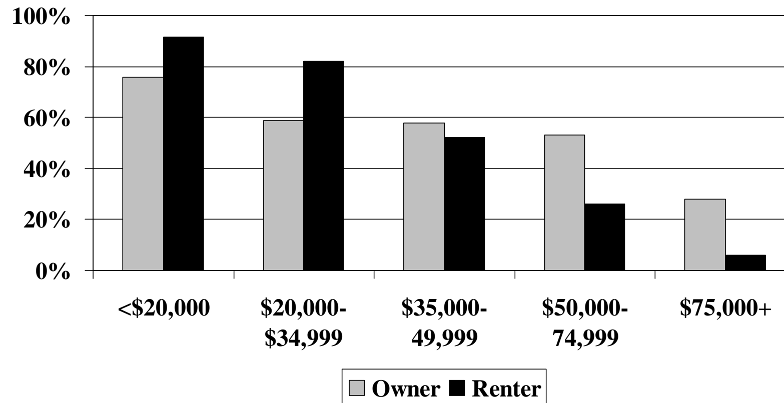
Source: National Association of Home Builders; the NAHB-Wells HOI is the "share of homes sold in that area that would have been affordable to a family earning the local median income based on standard mortgage underwriting criteria" http://www.nahb.org/page.aspx/category/sectionID=135

3.3 Affordability in the Rental Market

California renters overall have historically faced similar affordability problems to homeowners, although not necessarily with the same timing. The Census Bureau Decennial Census and American Community Survey provide data on the share of income spent on rent. California had the highest median rent in the country between 2002 and 2004 and was surpassed only by Hawaii in 2005 and 2006. In 2005, California was the only state where more than half of renters spent over 30 percent of their income on rent (joined by Florida in 2006). The 2007 American Community Survey estimated that 43.8 percent of homeowners experienced housing costs in excess of 30 percent of their incomes, while 51.2 percent of renters paid in excess of 30 percent.

Both homeowner and renter affordability concerns vary by income levels and age of the householder. As would be expected, low income households are much more likely to pay over 30 percent of their income on housing than are high income households. As shown in Figure 5, the range of this difference is much greater for renter households than for homeowner households. Over 90 percent of renter households with incomes below $20,000 pay more than 30 percent of their income on rent, while fewer than ten percent of households earning $75,000 or more have rents exceeding 30 percent of income. For homeowners, the share of households with incomes of $20,000 or less who pay over 30 percent of their income on housing is somewhat less than for low income renter households--about 75 percent, while the share of households with incomes of $75,000 or more is over 20 percent.

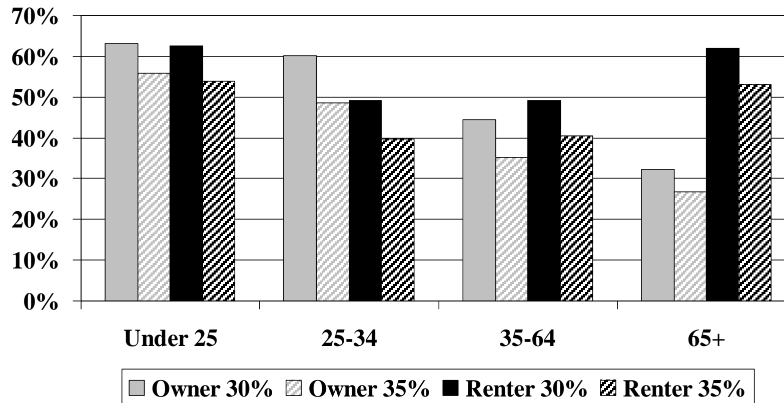
Figure 5
California Households Paying More than 30% of Income for Housing
by Income and Tenure Status



Source: US Bureau of the Census, 2006 American Community Survey

When examining affordability by age, households headed by those either under 25 or over 65 are likely to spend more of their income on rent compared to other households. More than half of households with heads under 25 years old pay more than 35 percent of their income on housing costs, regardless of housing tenure, as shown in Figure 6. This share drops more for renters than for homeowners for the next householder age cohort (25 to 34). The share continues to drop for homeowner households, yet over one fourth of households headed by those 65 and older pay more than 35 percent of income on rent. Older rental households are much less cushioned from housing prices than are older homeowner households, who may have purchased the home years earlier, paid off the mortgage and face lower property taxes because of Proposition 13 protections. The share of renter households paying more than 35 percent of income on housing is almost as high for those 65 and over as for those under 25.

Figure 6
California Households Paying More than 30% or 35% of Income for Housing, by Age and Tenure Status



Source: US Bureau of the Census, 2006 American Community Survey

Issues of affordability affect the majority of very low and low income households, whether renters or homeowners,[7] and a significant portion of moderate income households. The situation is most pervasive for the youngest (homeowner and renter) and oldest (renter) households. Only in the oldest homeowner households do less than one third of households pay over 35 percent of their income on housing costs.

3.4 A County Affordability Measure for Households

Some income and housing cost data between decennial years is not available for smaller counties. Yet affordability varies widely among geographic areas within the state. The California Budget Project, in *Locked Out* 2004 created an affordability measure for renters that can be applied at the county level. Its measure estimates the number of hours

[7] By California Department of Housing and Community Development definitions, http://www.hcd.ca.gov/fa/calhome/Guidelines_11162007.pdf, a very low income household has income 50 percent or below the median household income, and a low income household has income above 50 percent but at or below 80 percent of median household income. US Bureau of the Census, American Factfinder reports California 2006 median income at $56,645. http://factfinder.census.gov/servlet/ACSSAFFFacts?_event=Search&_state=04000US06&_lang=en&_sse=on

at minimum wage required to afford the fair market rent as defined by HUD (for most counties, the 40th percentile of units available for rent). In the 2008 update, the estimate ranges from a low of 65 hours of work in Kern County for a 2-bedroom apartment to a high of 135 hours in San Francisco County. For a studio apartment, the lowest number of hours needed was 51, for Kern and several other smaller counties, while Orange County had the highest number, 114 hours. This is nearly 3 full-weeks of work to afford a studio apartment.

Table 4
Percent of Counties with Affordable Fair Market Rents

			Percent of Counties with Affordable FMRs at Percentile Monthly Wage (2006)			
Wage Percentile	California Average Hourly Wage[8]	California Average Monthly Wage	Studio	One-Bedroom	Two-Bedroom	Three-Bedroom
25th	$10.47	$1,675	26%	7%	0%	0%
50th (Median)	$16.79	$2,686	86%	76%	33%	0%

Affordable rent is defined as 35 percent or less of the monthly wage
25th Percentile Hourly Wage: 25 percent of workers in an occupation earn wages below, and 75 percent earn wages above
Source: Authors from California Employment Development Department and California Budget Project

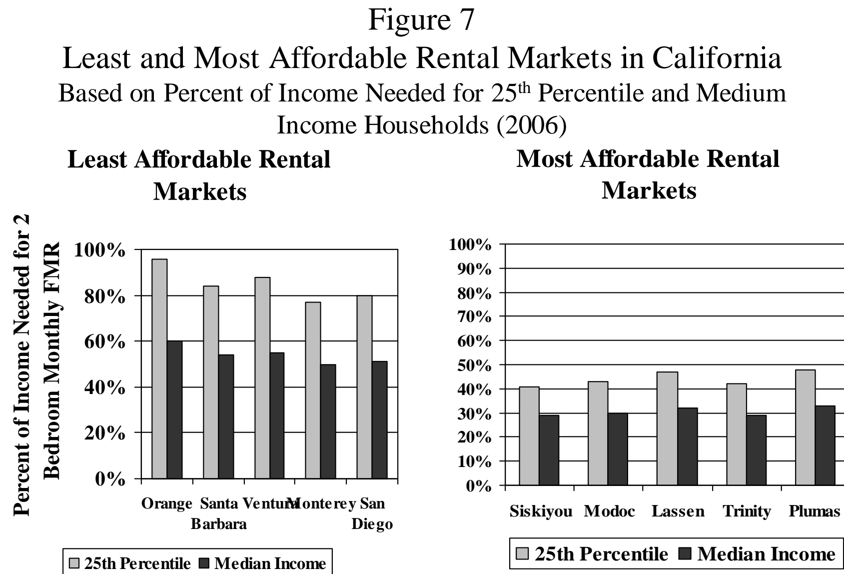
We have modified the California Budget Project approach to provide a broader measure of rental affordability as it affects workers above minimum wage, but earning the median wage or below. The results are summarized for the state as a whole in Table 4. Our estimates show that in only one fourth of California counties are HUD defined fair market studio rents "affordable" for wage earners earning at the 25th percentile or below (we define "affordable" as 35 percent or less of the monthly wage). Median rents

[8] Wages are straight-time gross pay, exclusive of premium pay. Included are base rate, cost-of-living allowances, guaranteed pay, hazardous duty pay, tips, incentive pay including commissions and production bonuses, and on-call pay. Excluded are back pay, jury duty pay, overtime pay, severance pay, shift differentials, nonproduction bonuses, and tuition reimbursements. In most cases, the wages provided are hourly.

for 2- or 3-bedroom apartments are not affordable to low wage earners in any California County. In contrast, studio and one-bedroom unit rents in most counties are affordable to the worker with a full-time median-level wage. Rents for two-bedroom units are affordable in only 1/3 of all counties, while rents for three-bedroom apartments do not meet the criteria for affordability in any county.

Figure 7 shows the counties with the least and most affordable rental markets by these measures. The least affordable include southern California and coastal markets, while the most affordable are north central counties with both limited housing stock and employment opportunities. (Appendix A includes a table of all counties by rental market affordability). Although the mortgage meltdown has had a significant impact on home prices in some parts of California, the rental market has held steady in much of the state. The differential impacts of the 2007-2008 financial crisis on California housing markets are addressed below.

Figure 7
Least and Most Affordable Rental Markets in California
Based on Percent of Income Needed for 25th Percentile and Medium Income Households (2006)



Source: Authors from Employment Development Department and California Budget Project data

4. The Mortgage Meltdown and California Housing

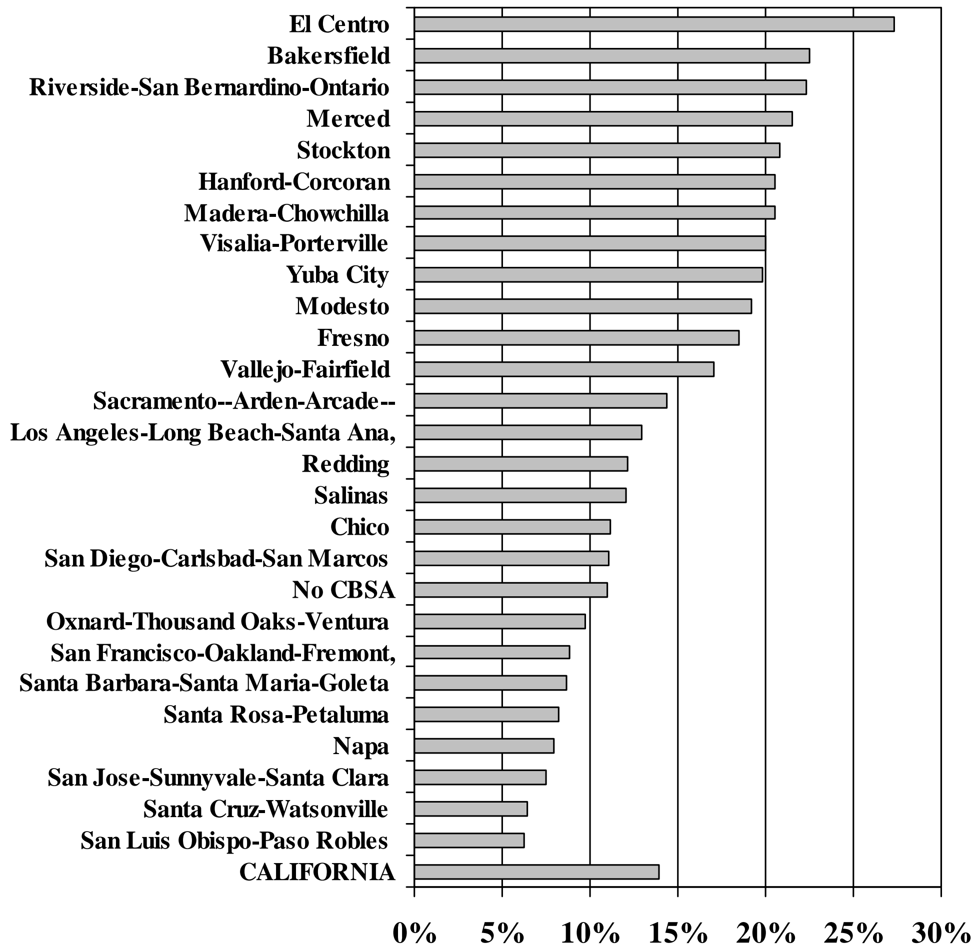
National economic and policy factors have helped to push the housing market into its current condition. The ready availability of credit for home buying during the past decade (low interest rates, weak underwriting standards, ample capital seeking investments) certainly contributed to increases in home sales, a higher homeownership rate, and rapidly rising prices in the California market. The homeownership rate rose from close to 55 percent in the mid 1990s to over 60 percent in 2006 (but dropped again to 58.3 percent in 2007). California home values (for same home sales) rose by a compounding average of 10 to 11 percent *annually* from first quarter 1995 through mid-year 2006. The first three years of this growth involved price recovery from the previous recession, but over 90 percent of the growth in value occurred after 1998. As of first quarter 2009, California home prices have dropped by 27 percent from the 2006 peak.[9] Statewide, this still leaves prices well above the national average--the Federal Housing Finance Agency (FHFA) housing price index for California for first quarter 2009 was at 465 (relative to a 1980 index of 100), compared to 370 for the US as a whole, indicating that the gap in home prices is still higher than it was in the early 1980s.

California is more heavily exposed to the subprime problem than many other parts of the US. Of all outstanding home loans in California in December 2007, 15.4 percent were in the subprime category, compared to 20.3 percent in Nevada, the state with the highest share, and 12.0 percent nationwide. Of California's subprime loans, 43 percent

[9] In contrast to the median sales price numbers discussed in Section 3, the price change statistics used here are same-home sales generated from the Office of Federal Housing Enterprise Oversight (OFHEO)/now merged into the Federal Housing Finance Agency (FHFA) weighted, repeat-sales housing price index, based on repeat mortgage transactions with mortgages purchased or securitized by Fannie Mae or Freddie Mac since 1975. http://www.ofheo.gov/hpi.aspx. The index for the US and states is indexed to 1980=100, while the metropolitan area indices are reported as 1995=100.

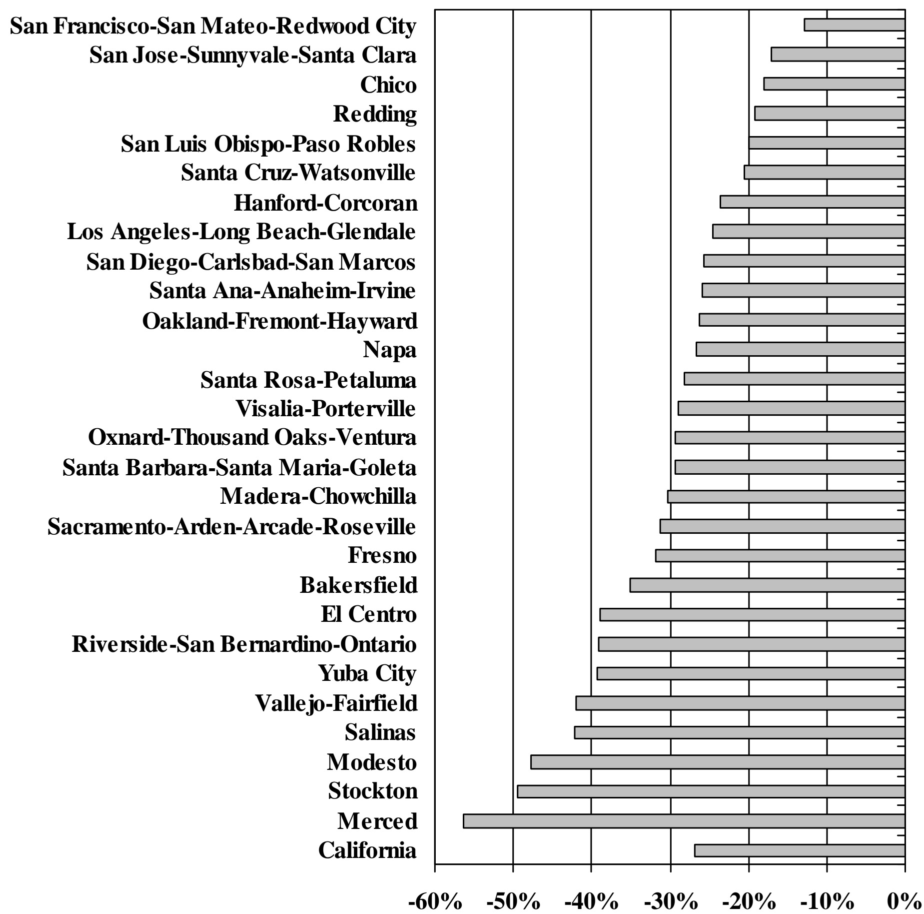
were delinquent at least 60 days in December 2008, up from 29 percent one year earlier, and 9.5 percent in December 2006. Within California, exposure seems to follow affordability--not surprisingly, the more affordable parts of the state (in terms of sales prices) had higher shares of subprime borrowers (see Figure 8).

Figure 8
Subprime Loans as Share of Loans Outstanding,
December 2007



Source: Authors from First American CoreLogic, Loan Performance data.

Figure 9
Change in OFHEO Home Price Index, from Peak to 1st Quarter 2009, California and MSAs



Source: Authors from Federal Housing Finance Agency, HPI data.

Some of these places also experienced high rates of new construction during much of the 2000 to 2007 period, often of higher priced homes aimed at commuters rather than local residents. These places were particularly vulnerable to price drops when financing dried up. Many of the higher cost parts of the state have been much less affected by both exposure to the problem (in terms of the share of loans in the subprime

category) and price adjustments accompanying defaults and foreclosures (see Figure 9). Thus this crisis, at least for the present, is skewing home prices rather than relieving the problem in the state's tightest markets.

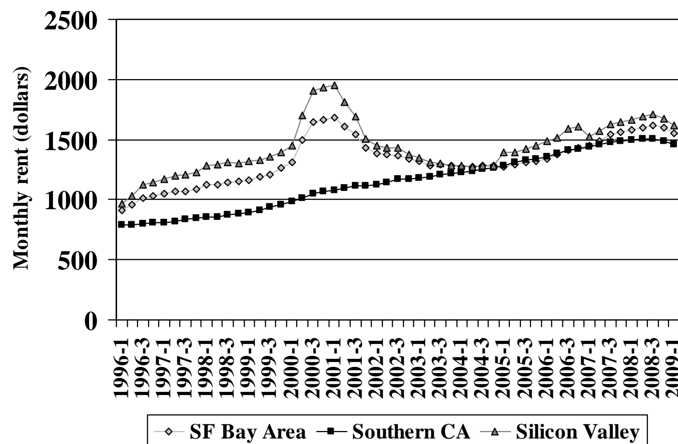
What might prices look like a year or two from now, and how would this affect affordability in the years to come? In thinking about the future, a few factors are likely to be important. First, the current median price level is being depressed by foreclosure activity and tight credit. The incentives for a lender disposing of foreclosed property are very different from the incentives of an existing homeowner who is selling to move to another property. Prices accepted in foreclosure sales are substantially lower than those that would be accepted by an existing home owner. Thus, once the first large accumulation of foreclosed properties has been disposed of, prices may begin to rise again. At the same time, credit will remain much tighter than in the period preceding the peak of the market. Borrowers will be required to meet strict underwriting standards for the foreseeable future. While subprime loans may not be entirely a thing of the past, they will be available to a much smaller number of homebuyers. Tight credit will keep any price rise much more moderate than in the previous run-up. A long or deep recession would further depress home sales and prices. With these factors in mind, the price side of affordability overall will remain better than in the peak years. A severe recession could counteract some of this benefit if incomes are also depressed.

Rents, which went through a bubble-like rise and fall in the late 1990s in the San Francisco Bay Area, [10] responded much more slowly than home prices to the 2008/09

[10] In contrast to the more recent bubble in for-sale prices, the rent increases in 1999 and 2000 were in response to real economic conditions—rapidly rising need for housing from young workers and supply constraints. However, because the demand growth came from the dot-com bubble, demand collapsed quickly and so did rent levels when the dot-com bubble burst and young workers quickly left the region.

financial crisis. (See Figure 10). Rents continued their gradual rise through third quarter 2008, and then began to dip slightly. If rent changes continue to be modest, then the rental affordability numbers discussed in Section 3 will remain a concern, especially as unemployment rises. Other uncertainties also affect the outlook for rental affordability. Homeowners switching to rentals and potential homeowners delaying purchases have increased demand for rental housing, but the recession could dampen this growth in demand, with households seeking to lower housing costs by doubling up. Furthermore, although little new construction is occurring, rental housing stock could increase if condominium projects that are vacant or under construction are converted to rental projects. Even with these supply improvements, the variations in affordability will remain. The location of these supply changes and how supply is added to the market (as owner-stock or rentals, market rate or assisted) will influence the impacts on affordability.

Figure 10
Rent Levels, SF Bay Area, Silicon Valley and Southern California
Quarterly, 1996- 2009 Q1



Source: Real Estate Research Council from RealFacts.

5. Housing Where?

Since 2000, all California counties have added to their supply of housing. Even increases in the high end housing stock can benefit the overall affordable housing supply through filtering, a process in which units move down through successively lower income housing submarkets as they age and deteriorate. Has the increased supply satisfied demand and increased affordability, especially for those earning the median wage or less? The number of housing units alone cannot answer this question, as the affordability of housing is irrevocably tied to transportation and the location of jobs. Where people live in relationship to their jobs determines not only the length of their commutes, but the travel modes they choose, how much time they spend traveling, their commute costs, and environmental consequences of their travel. Traffic congestion increases and commutes lengthen as people move farther from their work to take advantage of housing growth and affordable housing built on the urban fringe. One way to look at the relationship between job growth and housing growth is by examining the jobs/housing balance.

If we only consider statewide averages, it might seem that California is doing well on this measure. Because California lost jobs beginning in the third quarter of 2001 and did not recover to the previous level until fourth quarter of 2004, state housing growth looks strong relative to job growth: California added 1.7 housing units for every new job between 2000 and 2006. Since California's households have an average of 1.3 workers, this seems a more than adequate ratio of housing construction to job creation.

However, the picture is more complicated at the county or metropolitan area level. Some counties with job losses or slow employment growth have improved their housing situation. For example, by 2006, the San Francisco Bay Area still had not regained jobs

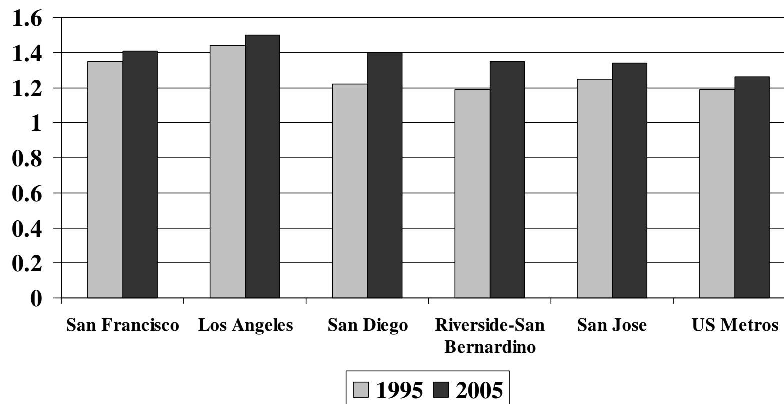
lost since 2000, but added almost 135,000 housing units. Multifamily units comprised 35 percent of the housing stock in 2000, but 44 percent of new units. Los Angeles County added 4.6 housing units for every new job, and more than half of housing units added were multifamily units.

Where job growth was strong, the Southern California coastal urban areas did a much poorer job of meeting additional housing need. San Diego County added 0.75 housing units per job, Orange County added 0.38 housing units per job, while the Riverside/San Bernardino area, which historically had been providing housing for workers employed in Los Angeles and Orange Counties, added only 0.71 housing units per job. As a result, growth of households exceeded growth of housing units in several of these counties, and persons per household grew. In contrast, a number of Central Valley places added housing in anticipation of growing demand--the ratio of homes to jobs added was 1.4 in San Joaquin County, 1.7 in Stanislaus, and 1.9 in Merced.

The relationship between jobs/housing balance and traffic congestion is complex. Some measures indicate that while traffic congestion has increased in all California metropolitan areas, those areas where housing growth lagged job growth have experienced the biggest changes in congestion. The Texas Transportation Institute travel time index grew by 0.07 in urban areas nationwide and by 0.09 in very large urban areas. In San Francisco and Los Angeles, the index grew by only 0.06, while it increased by 0.18 in San Diego and 0.16 in Riverside-San Bernardino. (See Figure 11). However, a more comprehensive cross-county analysis shows that long commutes are correlated with high housing to job ratios—indicating that where suburban or exurban development

patterns exist, commutes will be longer. The relationship is complicated by affordability factors (Statistical analysis supporting this finding is discussed in Appendix B).

Figure 11
Travel Time Index, California Metro Areas, 1995 and 2005



Source: Texas Transportation Institute. Travel Time Index – The ratio of travel time in the peak period to the travel time at free-flow conditions. A value of 1.35 indicates a 20-minute free-flow trip takes 27 minutes in the peak.

The housing to jobs ratio is inversely related to the share of income spent on rental housing (see further discussion in Appendix B). In other words, households spend more of their income on housing in places with fewer homes relative to the number of jobs. The share of income spent on housing is also higher in larger (more urban) counties.

If job growth outpaces housing growth, then even strong housing development may fail to produce enough housing to improve affordability. Some counties, including San Bernardino and Riverside have grown their housing supply by 10 and 24 percent respectively, with Riverside's growth among the highest in the state, but even these high levels of residential construction have lagged behind job growth and household growth. Both counties have the high rents relative to wage levels, perhaps a combination of a low share of construction in multifamily and relatively low wages compared to other parts of

the state. At the more expensive end of the housing market, Ventura and Orange counties, with the least affordable housing in the state, have low housing to job ratios and had housing construction lagging job growth since 2000. (See Table 5)

Table 5
Comparison of Housing/Job Ratios and Rental Affordability

Counties with the Lowest Housing/Jobs Ratios 2006				Counties with the lowest ratio of 2000-2006 Housing Change to Job Change			
County	Ratio of Housing to Jobs	Ratio of Housing Change to Job Change*	Percent of County Median Income Required for 2BR Rental	County	Ratio of Housing to Jobs	Ratio of Housing Change to Job Change	Percent of County Median Income Required for 2BR Rental
California	**0.85**	**1.70**			**0.85**	**1.70**	
Orange	0.67	0.38	60%	Orange	0.67	0.38	60%
San Francisco	0.69	-0.14	47%	San Bernardino	1.00	0.50	48%
Santa Clara	0.69	-0.21	35%	San Benito	1.05	0.60	28%
Yolo	0.70	1.08	36%	Ventura	0.84	0.72	55%
Napa	0.79	0.83	44%	San Diego	0.85	0.75	51%
San Mateo	0.80	-0.15	47%	Kings	0.94	0.76	31%
Alameda	0.81	-1.78	38%	Tuolumne	1.66	0.82	37%
Santa Barbara	0.81	1.07	54%	Napa	0.79	0.83	44%
Los Angeles	0.82	4.60	50%	Riverside	1.16	0.87	48%
Monterey	0.83	4.61	50%	Kern	0.95	0.90	31%
Ventura	0.84	0.72	55%	Tulare	0.90	0.96	32%
Fresno	0.85	1.19	36%	Solano	1.13	1.00	41%
San Diego	0.85	0.75	51%	Madera	1.03	1.01	38%
Sacramento	0.87	1.09	35%	Shasta	1.13	1.05	33%
Tulare	0.90	0.96	32%	Santa Barbara	0.81	1.07	54%

* Places with negative ratios had job *loss*, so all housing increases were a net gain to the housing/job ratio.

Source: Computed by authors from California Department of Finance and California Employment Development Department data.

The counties topping the list for low housing/job ratios and high shares of income needed for rental housing are a priority for affordable housing policies from both the state and local levels. Addressing these policies will also help to address the issue of growing traffic congestion. Counties with relatively low housing job ratios but moderate price

levels (such as Yolo or Sacramento) could become at risk of deteriorating affordability were housing production to slow down in the face of continuing job growth. Commute patterns may be a further indicator of where supply is beginning to lag demand. Counties that currently have affordable housing but are seeing job growth outpace housing growth (such as San Benito, in the sphere of the San Jose metropolitan area) are places where public action (state and local) may be needed to avert problems that could emerge rapidly in the next few years.

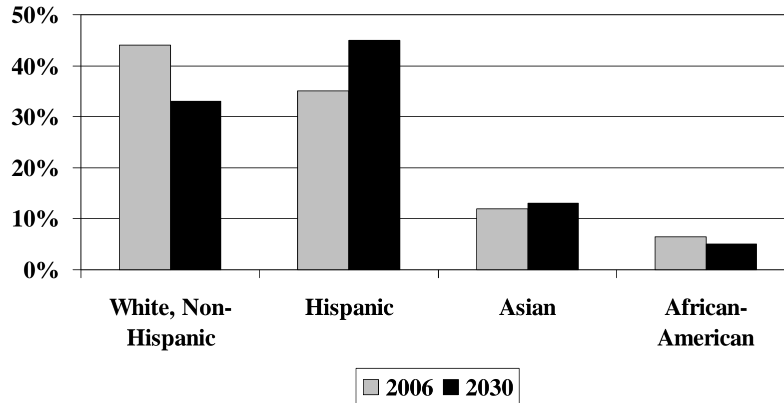
6. Longer Term Factors for Housing Policy

Factors other than quantity, affordability and location play an important role in the type of housing provided now and in the future. California's demographic profile has been changing and will continue to change over the next 20 years in both ethnic and age categories. Overall, California is expected to increase in population by 44 percent by 2030, from 34.1 million in 2000 to 49.2 million in 2030.

The most striking changes expected for the population include the mix in terms of race and ethnicity and the age distribution of household heads (Figures 12 and 13). The largest ethnic category by 2030 will be Hispanic, increasing from a population share of 32 percent to 45 percent. The white non-Hispanic population, which is currently the majority, will decrease to a share of 33 percent by 2030. The African-American population will decline by 2030 from seven to five percent. Other racial and ethnic groups, including Asian, Pacific Islander, American Indian and multi-racial will see a modest increase of two percent or less, changes which are small at the state level, but

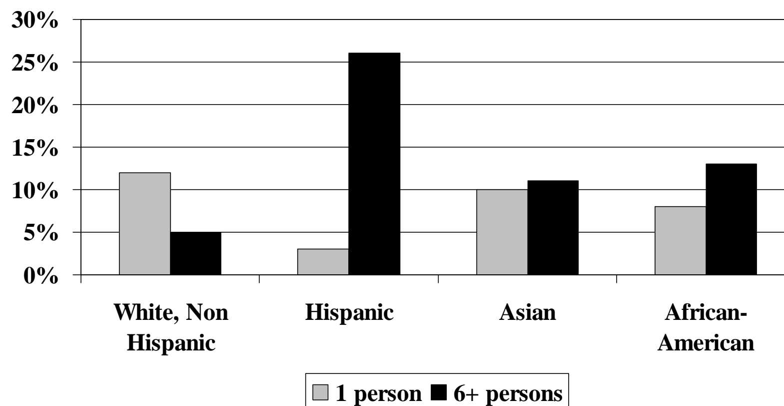
may obscure significant submarket impacts within California. (See Appendix Table A-2 for more detailed data by ethnic category).

Figure 12
California Population Distribution by Ethnic Category
2006 and 2030 (Projected)



Source: California Department of Finance, *Population Projections by Race/Ethnicity, Gender and Age for California and Its Counties 2000-2050.*

Figure 13
Population by Household Size, Selected Ethnic Groups and
Size Categories, California 2006



Source: California Department of Finance, *Current Population Survey Report*, 2006.

Significant changes in the type of housing demand may accompany the changing population mix, if the current differences in household characteristics by ethnic group continue. For example, if the Hispanic population continues to have lower incomes and larger households, then the need for (larger) affordable housing units will intensify with this shift.

At the same time, demand from retired households (which will be smaller and have a mix of incomes) will also increase. The California Department of Finance forecasts that the share of the population 65 and older will grow from 11 percent of Californians to 18 percent by 2030. Issues that will be most important to this group in selecting housing, apart from affordability, are primarily locational and will include access to health care, access to daily necessities, mobility, and leisure activities

7. Housing Issues--An Overview

Our analysis shows that the primary housing issues facing California relate to affordability and location. These arise from a combination of the type of demand growth (often high wage earners and low wage earners competing for housing in the same labor market) and housing supply constraints in many of the markets with strong income or employment growth. Key issues and findings include:

- Housing is undersupplied in many of the state's major urban centers. When employment growth is strong, development in many of these centers has not kept pace with the subsequent growth in housing demand.
- Although low to median wage workers have earnings higher than their counterparts in many other US locations, the higher incomes do not make up for

higher housing costs--large urban areas with low housing to job ratios have the greatest rental affordability problems.

- The past ten years have seen significant investments in denser housing in many of the most expensive parts of California. This has not resolved the affordability problem, because much of the investment has been at the high end of multifamily production and in ownership more than rental, but those locations have seen less deterioration in traffic congestion than other parts of the state.
- Expanded housing supply in fringe location markets has provided some incremental benefits in affordable housing but at the cost of sharp increases in traffic congestion.
- The restructured California housing market in the face of the mortgage meltdown should lead to improved affordability in some parts of the state, but at the risk of exacerbating existing location imbalances between jobs and affordable housing.
- Many local governments face tight operating budgets that lead them to evaluate new development largely in terms of potential revenue and cost to the city. New construction is expected to pay the marginal costs of the new activities (residential or nonresidential) that are brought into the community. As a result, builders tend toward higher end products, which can better absorb the incremental costs associated with fees for roads, sewer and water services, education, and some social services infrastructure.
- Without coordination, direction and support from the state or regional level, communities will continue to make decisions on housing construction versus job growth based on the immediate impacts to the city budget rather than the longer

term cumulative impacts on quality of life, commute costs, affordability, and worker availability.

The next section examines the California response structure, describing how housing policy is set in the state and specific programs designed for addressing affordability and location concerns.

8. The Institutional Context for California's Housing Policies

California's housing patterns are the result of a complex mix of public sector regulations and incentives, from the federal, state and local level, and private sector investment decisions, from companies (developers, lenders, investment firms) and individuals. Crafting improvements to housing affordability and location efficiency (meaning the location of housing close to employment and transportation networks) requires creative use of resources from all levels of government as well as consideration of the investment motivations of those who create housing stock and those who reside in it, and the political context in which local governments make land use decisions. This section of the paper describes resources currently available to address California's housing needs, broken out by government level and housing goals.

8.1 Affordable Housing Programs

A tightly interwoven network of programs and policies at the Federal, state and local level lay the groundwork for addressing affordable housing needs in California. At the local level, land use policy as specified by the general plan, and zoning ordinances, which in part implement the general plan, direct where homes may be built, at what size and density, and how land is utilized. Overlays by other jurisdictions, agencies such as

redevelopment agencies, and special districts also provide resources for and restrictions on housing construction. As demonstrated earlier, the lack of affordable housing in a local area often results from a combination of strong economic conditions which generate demand, and restrictive housing policies that limit the intensity of new housing construction.

Efforts and resources to improve the affordability of housing may take several forms. Major groupings, as shown in Table 6, include:

- Enabling policies--policies or ordinances that permit and encourage the construction of housing units at affordable rents and sales prices for low to moderate income residents.
- Supply-side financial support--including grants, loans, tax credits, and insurance associated with the construction, purchase, and rehabilitation of buildings by housing providers or by individual homeowners.
- Demand-side financial support--subsidized mortgages and downpayments for first-time homebuyers and for some priority groups of moderate income homebuyers (eg teachers); rent vouchers and other direct rental subsidies.
- Policies to promote a balance between supply and demand--grants for development of housing close to jobs.

The programs may be administered at the local, state, or federal level, and many programs involve participation by more than one level of government. Final implementation may be in the hands of a nonprofit or for-profit developer or the individual homebuyer, homeowner, or renter. Adding an affordable rental unit can be the combined result of zoning at the local level that permits adequate density, local incentives

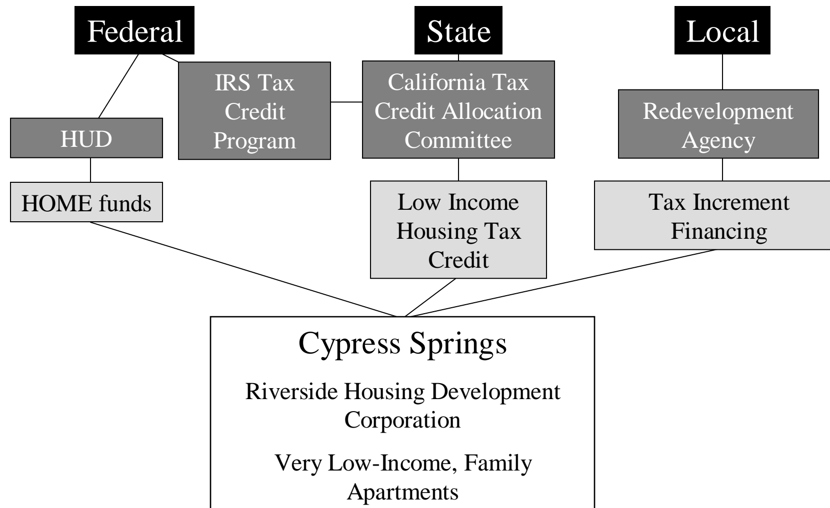
or requirements that a portion of the development be affordable for specified income levels (ie. "inclusionary" or “below market rate” requirements), the allocation of tax credits to the developer to make construction of the unit affordable, FHA multifamily mortgage insurance to make financing available, CalHFA programs to reduce the cost of financing, and a voucher to provide the funds for a low-income tenant to move into the structure. Figure 14, for example, shows the range of programs and resources used for the Cypress Springs affordable rental housing development in Riverside.

Table 6
Typology of Programs Shaping California Affordable Housing Policy

	Private and Nonprofit Sector	Local Government Sector*	State Government Sector	Federal Government Sector
Enabling Policies and Ordinances	Work with local government to negotiate provision of affordable units in exchange for: • additional units • density • other factors	• General plan • zoning ordinance and administration • redevelopment area plan • development fees	• General plan legislation • fair-share housing allocation requirements • redevelopment enabling legislation • property tax policies	CRA Lending Requirements
Supply-Side Support	• For profit and nonprofit builders	• Local jurisdictions administer Federal CDBG and HOME grants • Redevelopment tax increment financing housing set-aside. • Housing and land trusts.	• Distributes state bond-funded resources for housing construction. • State Low Income Housing Tax Credit. • Distributes Federal Low Income Housing and state tax credits among housing producers.	• Community Development Block Grants • HOME block grants. • Low Income Housing Tax Credit • FHA mortgage insurance for multifamily builders/owners.

Table 6 Typology of Programs Shaping California Affordable Housing Policy				
	Private and Nonprofit Sector	Local Government Sector*	State Government Sector	Federal Government Sector
Demand-Side Support	• Advocacy groups • Special needs support • May partner with CalHFA for first-time homebuyer downpayment assistance.	• May administer HOME Tenant Based Rental Assistance • May be involved in Section 8 administration • Partner with CalHFA for first-time homeowner downpayment assistance.	• First-time homebuyer assistance programs • Mortgage assistance for teachers in targeted locations. • Mortgage revenue bonds	• Section 8 housing vouchers • HOME block grants • FHA mortgage insurance • CDBG • USDA Rural Development grants and loans
Promote Supply-Demand Balance	• Private and nonprofit developers of mixed-use space • Transit Oriented Development	• Zoning and General Plans (housing and transportation elements) • Congestion management programs • Regional housing needs allocations	• Jobs-Housing Balance Initiative Grant (JHB)--one-time award (Prop 46 funding) • Workforce Housing Reward Program (succeeded JHB in 2004; Prop 46 funding) • Transit Oriented Development Housing Program (TOD; Proposition 1C funding) • AB 32 and SB 375 • Regional Housing Needs allocation / housing element requirements	• Safe, Accountable, Flexible, Efficient Transportation Equity Act 04 2005
*Local Government Sector = cities, counties, regional agencies, and Councils of Governments Source: Compiled by the authors from web pages and reports issued by the US Department of Housing and Urban Development, the California Department of Housing and Urban Development, and web sites explaining specific acts (full details in the References section).				

Figure 14
Resources Contributing to Affordable Rental Housing:
Riverside Example



Statewide policy is only one piece of this mixture of requirements and resources, as illustrated in Table 7. While some funding is generated at the state level (bonds, revolving loan funds), much of the funding for which the state has some role in allocation comes either from Federal programs (block grants, tax credits) or from local redevelopment funds. Much of the decision-making regarding the amount and type of housing that may be built occurs at the local level. The state's role in this aspect of housing policy is through oversight over the general planning process, requirements for the administration and funding of redevelopment areas, and other legislation and administrative activities related to the location and density of development, including Regional Housing Needs Assessment and the housing element certification process.

Table 7 Resources, Programs and Policies Related to California State Housing Policy			
Agency	Program	Summary	Recipients
Federal Level			
US Internal Revenue Service[11]	Low Income Housing Tax Credit	Tax-based subsidy overseen by the IRS and managed by state agencies (the Tax Credit Allocation Committee, or TCAC in California). The investment is repaid over 10 years through tax credits.	Developers (for-profit or nonprofit)
HUD	Community Development Block Grant	Among other things, CDBG funds can be used for housing rehabilitation, acquisition, and new construction, including funding of needed infrastructure.	Communities, states
HUD	HOME	Block grants for programs targeted to affordable housing.	Communities, states
HUD	Tenant-Based Section 8 and Housing Choice Voucher Program	Rental vouchers for very low income families, to subsidize costs of private housing.	Renters, through local housing authorities
HUD, Federal Housing Administration (FHA)	Single Family Mortgage Insurance	Mortgage insurance for mortgages issued to various low to moderate income borrowers, and for a variety of housing (including cooperative housing, reverse mortgages etc.) No direct state component.	Borrowers
USDA	Rural Development Housing Programs	Range of funding opportunities for rural housing, from mortgage loans to rental assistance	Developers, households
State Level			
CalHFA	Mortgage revenue bonds	Affordable home loan programs for low-to-moderate income homebuyers	Developers, households

[11] The deductibility of mortgage interest for owner-occupants is the most significant IRS program that impacts housing costs, and a major element of US housing policy (Dolbeare 2004). This program is not listed in Table 9 because it does not have a direct link to California housing policy.

Table 7 Resources, Programs and Policies Related to California State Housing Policy			
Agency	Program	Summary	Recipients
Housing and Community Development (HCD)	CalHOME	Homeownership assistance for very low, low and moderate income households, through grants and loans	Public agencies, nonprofits, households
HCD	HOME Investment Partnership Program	Block grants for programs targeted to affordable housing.	Cities, counties, community housing organizations
HCD	Multifamily Housing Program	Deferred payment loans for construction, rehabilitation and preservation of permanent and transitional rental housing for lower income households.	Affordable housing developers
HCD	Housing Element Law and Regional Housing Needs Assessment	HCD evaluates local housing element compliance with state regulations and administers the regional housing needs assessment process.	Affects city and county general planning and access to certain funds.
Local Level			
Redevelopment Agencies	Housing Set-Aside Program	Communities with redevelopment districts are generally required by state law to set-aside 20 percent of their tax increment revenue in a low and moderate income housing fund. The redevelopment agencies are given flexibility in the use of the fund.	Varies by program; primarily private and nonprofit developers
Planning/ Zoning	Housing Element of General Plan; Zoning ordinances; Density Bonus Law	Cities and counties enact specific land use laws that determine where housing may be built, how much may be built, and in effect at what level of affordability. California Density Bonus Law offers further means of encouraging affordable housing.	Affects private and nonprofit development
Source: Compiled by the authors from web pages and reports issued by the US Department of Housing and Urban Development, the US Internal Revenue Service, the California Department of Housing and Urban Development, and web sites explaining specific programs (full details in the References section).			

8.2 New Approaches to the Jobs/Housing Balance

The discussion above has focused largely on affordability measures, but the last section of Table 6 brings the discussion to jobs/housing balance issues. These issues have come to the forefront with two pieces of legislation in the past two years. The Global Warming Solutions Act of 2006 (AB32) requires a reduction in greenhouse gas emissions in California to 1990 levels by 2020 (a 25 percent reduction from 2006). AB 32, the Global Warming Solutions Act of 2006, became a housing and land use measure, in practice, when the state attorney general required that greenhouse gas emissions be considered as part of the general planning process. SB 375, passed in August 2008, requires that a combination of land use and transportation planning be included in efforts to reduce greenhouse gas emissions. The measure provides incentives for transit-oriented development and compact growth, and ties the regional housing needs assessment to the transportation planning process. This process will begin when the next round of housing elements begins.

SB 375 changes California's Housing Element law by linking regional planning efforts for transportation and housing. The bill emphasizes the concentration of future development around stops in transit-rich areas over a general vision of limiting sprawl or managing transportation within the suburban jobs/housing mix. This is accomplished by coordinating the transportation and housing planning processes on an eight-year cycle. The Regional Housing Needs Assessment (RHNA) allocation numbers must conform to the Sustainable Communities Strategy created by the metropolitan planning organizations (MPOs) to determine how to meet the emissions reductions required by the state. The MPOs are required to provide local governments with a housing allocation representing

their “fair share” of regional growth. This can take the form of infill or transit-oriented development. Under the bill, two types of development projects that conform to the Sustainable Communities Strategy are exempt from CEQA, or qualify for streamlined review: residential or mixed-use projects, and transit priority projects.

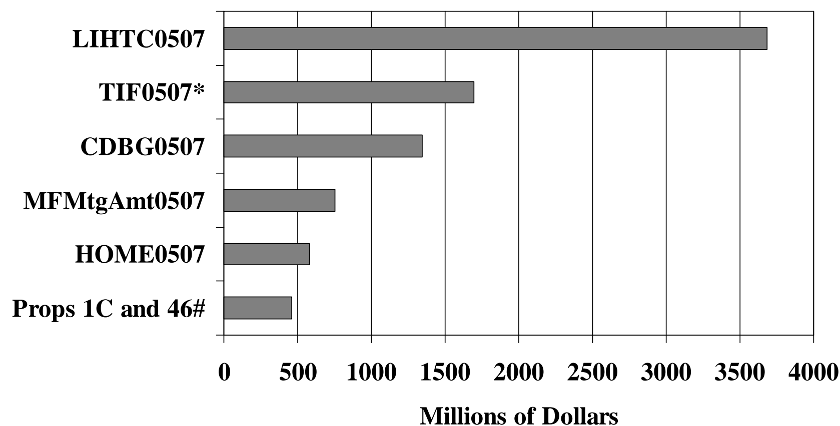
The link to the regional housing needs assessment is a necessary step to including the consideration of affordable housing within sustainable development. As indicated in the analysis of California trends, a required jobs/housing balance alone is not necessarily enough to become an affordable housing measure. Increasing the supply of housing close to jobs or transit alternatives will moderate prices more easily if it also includes affordable housing as one component of the housing mix. SB 375 includes incentives for providing affordable housing as part of infill development, but regional Sustainable Communities Strategies have yet to be developed. The success of the bill will be determined by the extent the MPOs can guide their localities in complying with a regional sustainability plan (Fulton, 2009).

8.3 Funding Source, Levels and Allocations

In addition to direct US spending of $5.2 billion in Section 8 tenant based and voucher programs, billions more were distributed to California through various affordable housing programs and related jobs/housing balance programs in FY 05/06 and FY 06/07 combined (see Figure 15). For this time period, California communities received $3.7 billion in the form of low income housing tax credits (LIHTC), a federal level subsidy passed through the state level. The California Tax Credit Allocation Committee determines how the credits are allocated. While tax credits are not direct funding mechanisms, the incentives have played a significant role in affordable housing

development statewide, and in this report are measured alongside direct subsidies. The redevelopment-related tax increment financing set-aside for housing was the largest source of funds generated within California ($1.7 billion for FY 05/06 and 06/07 combined). These funds, for the most part, stay in the community in which they are generated. Much of the remaining funding is from the federal level and distributed by either the federal government or the state. However, about five percent comes from two statewide initiatives, the Housing and Emergency Shelter Trust Fund Acts of 2002 (Proposition 46) and 2006 (Proposition 1C).

Figure 15
Comparison of Affordable Housing Programs by Funding Levels 2005-2007



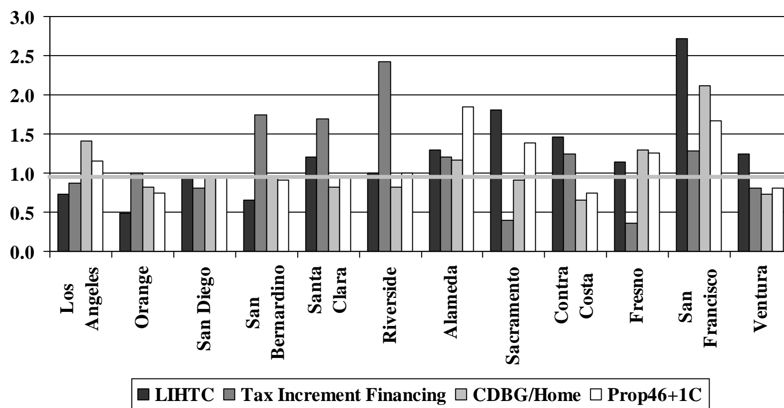
* Housing component of TIF. # Includes small amounts awarded prior to 2005.
Source: Authors from California Department of Housing and Community Development data.

Resources are not spread evenly among the different parts of the state, with some areas benefiting from proportionately large shares of one type of resource (for example tax credits) and having a much smaller share of other resources (for example, tax increment financing, block grant funding, or the Proposition 46 and 1B funds). Figure 16

shows an index of funding levels for the twelve largest counties in the state, for several types of low income housing resources. The index shows the ratio of the county's share of the housing fund to the county's share of population. Most large counties (with the exception of San Diego and Orange counties) receive more than their population based share of funds in at least one category.

The distribution of funds to the smallest counties is much more uneven. Of the state's twenty smallest counties, in the 2000 to 2007 period, only one, Yuba, with a population of 60,000 received housing-related block grant funds and only five had redevelopment-related tax increment financing, More than half of the smallest counties received Prop 46/1C funding (all but one at well below the county's population share). Only with low income housing tax credit allocations, did several of the smaller counties receiving a funding share well beyond their proportionate population size.

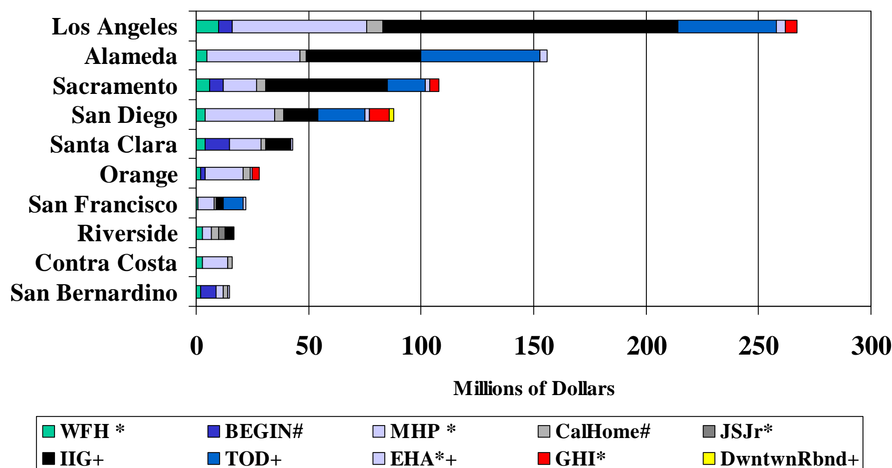
Figure 16
Index of Affordable Housing Resources (1: Resources in Proportion to Population), California's 12 Largest Counties



Source: Authors from California Housing and Community Development Department data.
Index: (County share of state housing fund)/(County share of state population)

From 2003 through the first half of 2008, just over $1 billion has been awarded from funding allocated through Proposition 46 and Proposition 1C. Figure 17 shows the Proposition 46 and 1C funds distributed for the counties receiving the largest shares of funds. The funds from these voter-approved sources are shared between programs directly dealing with affordable housing provision and programs designed to encourage a balance of housing and jobs. About 40 percent of the funding in the 2005-06 through 2007-08 fiscal years goes directly to housing construction--

Figure 17
Allocation of Proposition 46 and 1C Funds (All Years)



Source: Authors from California Department of Housing and Community Development data.
* Construction related; # finance related (mortgage or insurance); + urban infill related.

- The Multifamily Program (MHP) funds rental housing for lower income households.
- The Workforce Housing program (WHF, which ended in 2006) rewarded cities for issuing permits for affordable homes.
- The Joe Serna Jr. Workforce Housing Grant program (JSJr) offers loans and grants for construction of farmworker housing.

- Emergency Housing Assistance (EHA) funds infill conversion and dense housing next to transit
- The Governor's Homeless Initiative (GHI) funds permanent housing for the homeless.
- Mortgage assistance through BEGIN and CalHome is used to support homeownership (about 11 percent of funds).
- Infill Infrastructure Grants (IIG) provide support for activities that promote dense housing development in qualifying infill areas.
- The Transit Oriented Development program funds developments that tie into existing transit networks.

More than half of the funding allocated to the three largest recipients (and about 46 percent for all counties) is in programs associated with jobs-housing balance and transit oriented development.

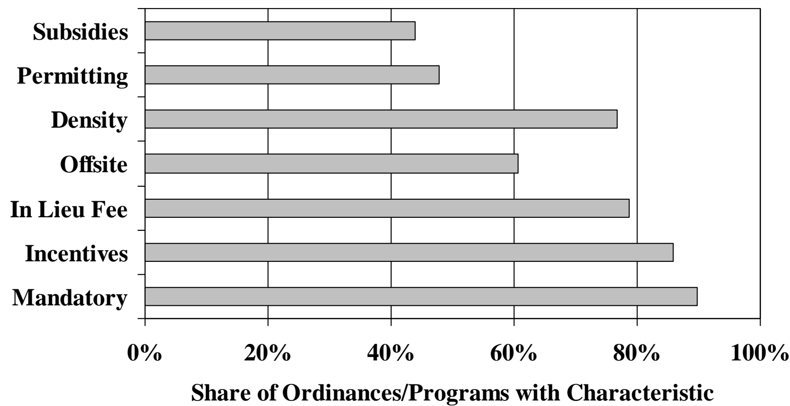
8.4 Incentives and Mandates for Affordable Housing

Complementary to expenditures for housing have been incentives and mandates for construction of affordable housing. California does not mandate inclusionary ordinances at the local level—that is, ordinances that require builders to provide for a percentage of below market rate units in a housing development—but some communities have used this approach to satisfy other California housing regulations (Calavita and Grimes 1998). For example, California's general plan law requires that communities plan housing for all economic segments (Wheaton 2008).

Detailed requirements of inclusionary ordinances vary widely. Major distinctions include whether or not the requirement is mandatory or based only on incentives; whether

the below market rate units must be provided on-site, off-site, or through in-lieu payments (or through a choice among the alternatives), whether density bonuses are included as an incentive, whether there are other incentives related to the permitting process, and whether subsidies are available to assist in provision of the units (Figure 18). The type of project that triggers inclusionary requirements, the number or percentage of units that must be below market rate, and the income group targeted also vary among jurisdictions.

Figure 18
Characteristics of Inclusionary Ordinances

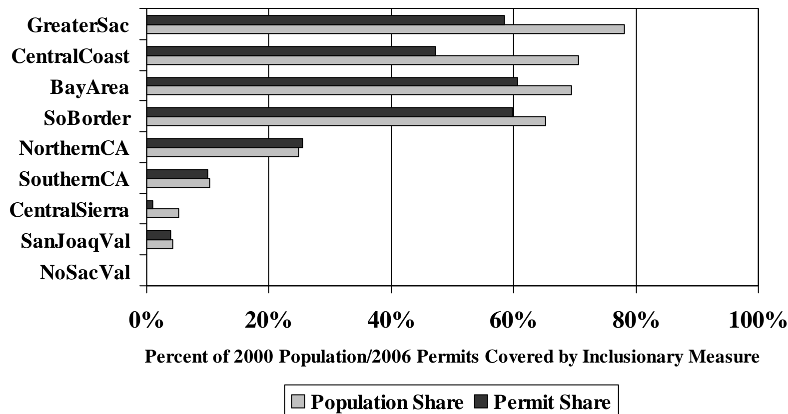


Source: Authors from California Inclusionary Housing Policy Database, 2008.

The geographic distribution of inclusionary measures and actual coverage of building activity varies widely in California. About one third of all jurisdictions have some type of inclusionary measure. Figure 19 shows for each of California's economic regions (as defined by the California Economic Strategy Panel) the share of population and the share of permit activity covered by jurisdictions with inclusionary measures. In the San Francisco Bay Area, for example, 70 percent of the population lives in

jurisdictions with inclusionary ordinances generated and over 60% of residential permit activity occurs in such jurisdictions. More than half of permit activity in the Greater Sacramento Area and the South Border area (San Diego and Imperial counties) is also in jurisdictions with inclusionary ordinances. Southern California and most of the Central Valley have much smaller shares, although there will be a large increase in coverage in Southern California if a proposed inclusionary ordinance is adopted in the City of Los Angeles.

Figure 19
Inclusionary Ordinance Coverage Compared to 2000 Population Base and 2006 Residential Permit Share



Source: Authors from California Coalition for Rural Housing California Inclusionary Housing Policy Database, California Department of Finance Table E-5, and Construction Industry Research Board 2006 City Permit Data.

The impact of these ordinances on total affordability is controversial. The direct effect on the amount of affordable housing produced will be strongest where the amount of new residential construction is large compared to the number of existing units. Yet the presence of inclusionary requirements may be a disincentive for building unless tied to other financial incentives. Wheaton 2008 mentions tax credits, HOME grants, and

mortgage assistance, among other factors that may make it feasible to achieve inclusionary requirements.

8.5 California's Role in Responding to the Mortgage Crisis

The mortgage crisis has both eased and exacerbated housing problems. Families in debt beyond their means face either insupportable costs or the loss of their homes. Communities on the outskirts of many urban areas have seen home prices plunge, but the affordability gains are spread unevenly, with much less improvement in the least affordable places.

The state has acted to address mortgage availability and quality issues in both the short-term and long term. SB 385, enacted in October 2007, expanded oversight of mortgage brokerage operations beyond the financial institutions regulated by the California Department of Financial Institutions to other institutions engaged in issuing mortgages but managed by the state Department of Corporations or the state Department of Real Estate. The measure requires adherence to principals established by the Conference of State Bank Supervisors for nontraditional lending as well as to standards set by the US Comptroller of the Currency and the Federal Reserve Board, including statements on risks inherent in the loans and consideration of the borrower's ability to pay (California Senate Bill 385, 2007; Conference of State Banking Supervisors 2007).

Other legislative action and measures emerging from the governor's office have addressed existing problems with mortgages. SB 1137, adopted in July 2008, provides some protection for borrowers by requiring lenders to provide 30 days notice to a borrower before filing a notice of default and to offer information on workout counseling to avoid foreclosure. A brokered agreement in fall 2007, with ten subprime lenders whose

portfolios covered over one fourth of subprime loans, aimed to proactively identify borrowers who may go into default, using a streamlined process to determine the borrower's ability to pay, and maintaining the starter interest rate for a longer duration of time (Said 2007, California Department of Corporations 2008). More recently, the governor and the Department of Corporations proposed a program modeled after FDIC workout strategies, requiring lenders to aggressively renegotiate loan payments or postpone foreclosure for a 90 day period after the first default notice (Lifsher 2008; California Office of the Governor 2008b).

Responses also addressed the problems faced by the homebuilding industry. In March 2009 California set aside $100 million to provide tax credits of $10,000 or up to 5 percent of the cost of a new home (never previously occupied). Homebuyers quickly responded to the program, and as of July 2009, the state had stopped accepting new applications in the expectation that the full $100 million would be absorbed by existing applications (California Franchise Tax Board 2009).

Some of the state responses have or will have a community development focus. A Community Stabilization Home Loan Program established in July 2008 allocates $200 million in below-market-rate loans to first-time homebuyers, to buy homes in communities hardest hit by foreclosures (California Office of the Governor 2008a). In addition, the State of California will be allocated an estimated $145 million in funding (in addition to almost $385 million to specific cities and counties) through the Neighborhood Stabilization Act Community Development Block Grant Program set up in the US Housing and Economic Recovery Act. The California Department of Housing and

Community Development will administer Neighborhood Stabilization Act funds, which will be used for the acquisition, rehabilitation, and sale of vacant, foreclosed homes.

8.6 State Policy Accomplishments, Limitations and a "Permanent Source"

California has provided a testing ground for a number of cutting edge proposals for both jobs housing balance and for housing affordability. At the same time, the issues are deeply entrenched in the current system by which land and housing is developed. Housing assistance programs seem to make barely a dent in the different problems. This is not to say the programs are ineffective. Analysis by Kroll and Wyant 2009 demonstrates that between 2000 and 2007, affordability levels had worsened in most of the state, but the level of housing assistance funding helped to improve affordability or to slow the rate at which it worsened. Nevertheless, a sharp economic downturn typically does much more for restoring the perception of housing affordability in the state than the combined strength of the many different programs addressing the problem   Furthermore, funding for many programs has depended on a patchwork of sources, some of which are of temporary duration, as with the bond measures known as Proposition 46 and Proposition 1C funding.

The California Department of Housing and Community Development, the governor's office, the California Debt Limit Allocation Committee, and CalHFA offer a mix of programs at the state level, but these programs are oversubscribed. Many projects require joint financing from competing entities, making coordination difficult. Additionally, there is a disconnect between the longer range planning required by programs (i.e. CDBG, HOME, tax credits) and the shorter term funding allocation increments.

Aware of the scattershot approach to housing provision, the state already has made efforts to create consistent standards across different programs administered through HCD. These efforts do not resolve other problems, such as consistency across programs outside of HCD's control and funding reliability. During the spring and summer of 2008, the California Housing and Community Development Department conducted a series of hearings throughout the state on establishing a permanent source of funding for affordable housing programs (California Department of Housing and Community Development 2008). The hearings highlighted the underlying pool of talent within the state of individuals and organizations thinking about and working on problems daily, and also drew out the many different definitions of the issue. Proposals emerging from the hearings focused on homeownership, on the supply of rental housing, and on the location of new development. Strategies focused on support for both supply and demand, and ranged from homeless services to programs for homeowners.

Recommended sources for permanent funding were myriad, and the state reported that there was widespread agreement that multiple sources of funding would be needed (in that sense, a continuation of the current situation). A variety of tax and fee sources were identified by participants (a portion of the property tax, a real estate transfer fee at the state level, sales tax, luxury tax, commuter/auto-travel related tax, title insurance fees, etc.), as well as strategies for increasing investment (a California secondary mortgage market, tax incentives and credits).

The "Permanent Fund" process offers a laundry-list of approaches. One comment on the web site (www.hcd.ca.gov/permsource/) points to the need for a "nexus" between the fund sources and the needs addressed. Perhaps even more critical is the need to

articulate a set of priorities, and to consider methods for balancing priorities in a situation where the funding cannot adequately address all needs.

9. Setting a Framework for Priorities

Current housing conditions illustrate just how rapidly conditions can change in the housing market, and the fluidity of concepts such as "affordability" and "jobs/housing balance." The mortgage crisis and collapse of Central Valley home prices greatly increased the affordability for those purchasing homes in the areas where prices are plummeting, but recent home purchasers who continue to pay their mortgages still may face strained finances, as may those losing their homes and becoming renters. The decreasing home values are misleading in terms of their effects on affordability, as homeownership often remains unattainable for lower income households unable to meet the tightening lending standards. Job losses can also switch homes from affordable to unaffordable. Lower home prices and job losses combined may change the nature of the pressure on home markets in urban centers, at least temporarily, and ease the jobs/housing imbalance. Our assessment of policy options recognizes this changeability, but also addresses the underlying processes that have kept California home prices high and commute times growing.

Housing policy needs to be built on the recognition that affordability problems exist in many different types of communities within the state, each facing a unique set of challenges. While the affordability gap may be highest in the high cost coastal areas, these communities also may have greater resources for providing affordable housing than

rural areas where lower prices may mask affordability problems of a low income population dependent on part-time service jobs as a major source of income.

Housing policy must also acknowledge that low affordability contributes to the problems of congestion and pollution that arise from the lack of housing close to jobs. While many of the least affordable places are in the metropolitan counties with strongest job profiles, places on the periphery of these areas can quickly become less affordable if growth pressures push the labor force to expand the commute shed. The correlation between transportation problems and housing location justifies a greater coordination of transportation planning and development. Transportation funds could be leveraged for the production of infill housing, or focused greenfield development in areas where infill is insufficient to meet the housing needs.

Our priorities for action are consistent with the observation in the "permanent source" dialog that a mix of programs, rather than a single policy, is required to address the problems. This is the case because i) the two broad problems (affordability and location/access--or more broadly equity and geographic balance) overlap but are not fully concurrent; ii) funding comes from multiple sources at multiple government levels; and iii) the manifestations of both types of problems vary depending on the location, density, and demographics of the local area, in addition to the basic housing and commute pattern issues. Recommendations are divided into five broad types:

- Rental housing supply and access
- Homeownership in the post-melt-down environment
- A viable pattern of urban development
- Demographic considerations in a long term strategy

- Cooperative ventures.

9.1 Rental Housing Supply and Access

Rental housing must continue to be recognized as a key component of any affordable housing strategy. State programs currently provide support for rental housing primarily on the supply side, through allocation of tax credits and through the bond-funded Multifamily Housing Program. The State also requires local redevelopment agencies to create housing set-asides, which provide resources for augmenting affordable rental housing supply. Projects that provide units for low income tenants and for special needs already receive priority in allocating tax credits. In addition to funding strategies, development incentives, such as density bonuses, could be increased for higher shares of low income units. Instead, the passage of SB1818 in 2004 actually weakened the requirement for low income housing by halving the number of affordable units needed to qualify for the density bonus.

Landlords of low income buildings often face costs that exceed revenues; state programs to encourage mixed-income level housing can help make provision of low income units affordable. Tax exempt bond funding allows mixed use development, but low income housing tax credits generally require all units in the building to meet the affordability requirements. Property tax relief, gauged to rent levels, could be one strategy for lowering the operating costs for low and moderate housing (Goodman 2004), although the revenue loss would then need to be compensated in some other way.[12]

Supply side incentives may be more effective in urban centers where there are constraints to new construction. In parts of the state where housing construction is less

[12] California's Proposition 13 would make it impossible to recoup the loss by adjusting property taxes on luxury units upwards.

constrained and overall affordability levels are higher, a California rental subsidy (demand side) program may be a more effective way to address the needs of low income families. One possible strategy is a voucher type assistance program modeled after HUD's "Section 8" or HOME Tenant-Based Rental Assistance programs.[13] Continuation of the renter assistance program and the renter's tax credit offered, are other vehicles for offering assistance to low income individuals and families. These could be expanded to reach households in greatest need, regardless of location.

9.2 Homeownership and Affordable Housing Supply in a Post-Meltdown Market

High levels of foreclosures have shown that homeownership is not necessarily a path to increased wealth and may become a burden if the borrower faces other financial problems. Programs for low to moderate income borrowers need to provide education as well as opportunity, and in the wake of the mortgage crisis, more attention should be paid to mortgage modifications. Beyond programs that assist individual households to become homeowners, the state, local government, and lending institutions must deal with the stock of foreclosed housing. This may be an opportunity for building an inventory for a state housing trust from the distressed assets that cannot be turned around. The inventory can be used for rental opportunities in affected communities and for homeownership, once home prices have stabilized. In current market conditions, tax credits may not be a useful tool for leveraging new projects, but funds from foreclosure aid and the Neighborhood Stabilization Program can be applied to the acquisition and rehabilitation of foreclosed properties.

[13] Although McClure 1998 found that in the long term Section 8 voucher programs are more expensive than subsidized production, in areas with a smaller population base, vouchers could be more effective in reaching the neediest population.

The communities less heavily affected by foreclosures, such as San Francisco and Santa Clara, are generally those with low levels of homeowner affordability. For these communities, a combination of incentives and consequences will continue to be needed at the state level to increase production of affordable units. Density bonuses, fast track review for affordable projects, or a "housing concentration zone" designation, where a larger share of property taxes are retained by the local jurisdiction for affordable units (for example through an exemption from the state Educational Revenue Augmentation Funds for the revenues associated with the units in question), could all encourage either homeowner or rental unit low- or moderate-priced unit development.

9.3 Affordable Housing, Transportation and Urban Development

Affordable housing close to core job centers is a key to addressing the jobs/housing imbalance problems. SB 375 provides a tool for coordinating the provision of housing, employment centers and transportation systems. In implementing this measure, the state should develop prototypical guidelines for using existing resources to encourage the expansion of affordable housing stock close to job centers and transit facilities in the Sustainable Communities Plans adopted by the regional MPOs. (Consideration of transit access to new jobs centers is also key in this process.) The 2009 American Recovery and Reinvestment Act (ARRA) stimulus funds directed towards reducing air quality impacts could be used in conjunction with SB 375 in linking transportation to housing. Billions of dollars have been set aside for transportation-related improvements, providing an opportunity for the development of new transit lines and rail projects to be tied to the creation of affordable housing.

Redevelopment revenues provide an underlying basis of funding to link housing growth to job development in many urban centers, as long as job development occurs in redevelopment project areas. The use of the housing set aside funding can be tied to the housing needs generated by economic development, or underlying unmet housing needs (Joassart-Marcelli 2007). Low income housing tax credit allocation gives priority to projects that provide affordable housing close to jobs and transit links. Allocation of subsidized units can be weighted towards those employed nearby (see Cervero and Duncan 2006) within constraints of fair housing law. The current financial crisis has undermined the strength of the tax credit program, as banks no longer have the capacity to fund the credits. Stimulus funds allocated to HUD's Tax Credit Assistance Program (which provides funding for LIHTC projects) and the Treasury Department's Tax Credit Exchange Program may help fill financing gaps.

9.4 Demographic Considerations in a Long Term Strategy

With California's diverse population, programs will be more effective if they are flexible enough to vary with the type of need. This applies to both supply side and demand side programs. On the supply side, different types of affordable units (and funding strategies) would be appropriate for a rural community with an aging population being displaced by rapid growth of a second home investors (where the housing developer might partner with a service provider specializing in elder care), an inner city community where retail workers pay more than half of their income to share a housing unit (rental subsidies may be essential to keep workers close to jobs), or a community heavily populated by large, immigrant families working in low-paid services jobs (where attention to the size of unit would be important). Programs should also deter localities

from favoring one demographic – particularly seniors – to the detriment of other groups in need of assisted units. On the demand side, a young household with expectations of rising income would need a different level and duration of assistance (perhaps graduated payments, as suggested by Quigley and Raphael 2004) than a household with low wage earners and few advancement prospects. However, the benefit of the lower initial costs may be outweighed by the greater overall cost, as well as the risk of negative amortization.

9.5 Cooperative Ventures

The state's new planning legislation, as well as many of the recommendations from the housing literature, point to the importance of communications, coordination, and cooperative activity to addressing housing issues effectively. Much of the affordable housing that has been built in recent years is the result of cooperation between non-profit developments and for-profit builders, funding or tax credits provided at the federal level, allocation decisions made at the state level, and planning permission granted at the local level. With new goals of sustainable development overlaid on existing goals of housing availability and affordability, these types of cooperative activities and coordinated actions become even more important.

SB 375 recognizes the need to coordinate development efforts across planning sectors, particularly housing, transportation, land use, and air quality management. Without organization, competing interests may overshadow progress made by any one sector. A state-level administrative body could manage cross-sector collaboration, streamline the various review processes, broker solutions drawing from multiple levels of

public and private resources, and help generate developments that provide affordable and livable environments.

10. Conclusion

The primary housing issues facing California in the next two decades are affordability and location. The overall balance between supply and demand of single family homes, as measured by vacancies, has improved since 2000, but rental stock remains very tight, and the housing supply remains inadequate relative to job growth centers.

Affordability varies by geographic area within California and with economic trends over time. Development constraints have kept prices high in the state's largest metropolitan areas and coastal areas. Rental housing has been particularly vulnerable, and *even* lower-wage two-earner households in many parts of the state must devote high shares of income to rent. The sharp decline in home values that has accompanied the subprime mortgage crisis has changed the nature of the affordability problem, and may exaggerate the location issues facing lower income households.

The location issue is not a new one--the jobs/housing balance has been under discussion for decades. Our analysis demonstrates the link between congestion growth and lower ratios of housing to jobs and the link between jobs/housing imbalances and affordability issues. Neither federal programs, which address individual problems, nor local programs, which address specific geographic areas, have the scope to effectively combine location and affordability considerations. Recent state funding measures have begun to include coordination of infill and affordability in the allocation of funds. To

continue to make progress on both issues, a balance of programs will be needed that i) meet individual needs in rural and remote metropolitan areas and ii) encourage transit oriented development, improved jobs/housing balance, and provision of affordable units in larger metropolitan areas.

AB 32, the Global Warming Solutions Act of 2006, and SB 375, requiring transportation analysis and regional planning measures to implement AB 32, provide a mandate for and skeleton around which such programs can be crafted. The success of these measures will depend on the details of the programs, as well as the cooperation and collaboration of local jurisdictions and for profit and nonprofit developers.

In order to improve affordability and the jobs/housing balance, the state must first address the most critical problem – insufficient funding. The recent diminished utility of tax credits reinforces the need for a stable source of funds that would be available throughout the business cycle, regardless of market fluctuations. Funding itself can be a catalyst to facilitate the integration of assistance programs, affordability programs, and land use regulations. Combined, these strategies may be the most effective tool for improving housing affordability in California.

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Appendix A

Table A-1								
	Percent of Monthly Wage Needed to Afford Fair Market Rent at Percentile Wage							
	25th		50th		% Change 2000-2006			
County	Studio	Two-Bedroom	Studio	Two-Bedroom	Employment	Total Housing Stock	Single Family Stock	Multi-Family Stock
Siskiyou	27%	41%	19%	29%	3.7%	6%	7%	3%
Modoc	30%	43%	21%	30%	-1.8%	6%	6%	0%
Lassen	30%	47%	21%	32%	-18.2%	7%	9%	-1%
Trinity	31%	42%	21%	29%	13.4%	5%	5%	8%
Plumas	31%	48%	21%	33%	7.1%	12%	13%	0%
San Benito	32%	48%	19%	28%	15.0%	7%	8%	4%
Tehama	33%	49%	22%	33%	2.6%	10%	11%	4%
Sutter	33%	46%	22%	31%	3.7%	15%	19%	3%
Yuba	33%	46%	22%	31%	4.9%	18%	25%	-3%
Shasta	34%	48%	23%	33%	19.2%	9%	11%	6%
Tulare	34%	45%	25%	32%	6.9%	11%	12%	7%
Glenn	34%	47%	23%	31%	2.7%	5%	5%	4%
Inyo	35%	47%	23%	32%	-0.6%	2%	1%	0%
Lake	35%	53%	24%	36%	12.5%	5%	7%	9%
Humboldt	35%	54%	24%	37%	1.4%	5%	6%	4%
Tuolumne	36%	55%	24%	37%	14.4%	6%	6%	2%
Sierra	37%	56%	25%	39%	14.1%	3%	4%	0%
Mariposa	37%	52%	25%	36%	8.4%	13%	12%	0%
Merced	37%	51%	25%	34%	7.2%	17%	21%	6%
Butte	37%	53%	25%	36%	0.5%	9%	11%	6%
Kern	37%	48%	24%	31%	15.8%	14%	17%	4%
Del Norte	38%	50%	26%	34%	-3.1%	5%	6%	1%
Alpine	38%	55%	26%	37%	13.1%	14%	17%	10%
Mendocino	39%	58%	27%	40%	-0.4%	6%	6%	4%
Nevada	39%	60%	27%	42%	9.9%	11%	10%	17%
Amador	40%	61%	27%	41%	6.8%	13%	12%	34%
El Dorado	40%	55%	25%	35%	12.2%	14%	15%	15%
Placer	40%	55%	25%	35%	0.9%	31%	32%	32%
Sacramento	40%	55%	25%	35%	8.5%	13%	15%	9%
Colusa	40%	53%	27%	35%	8.5%	12%	12%	12%
Calaveras	40%	49%	28%	33%	9.2%	16%	16%	3%
Imperial	41%	57%	29%	40%	26.3%	18%	23%	18%
Sonoma	41%	63%	27%	41%	3.6%	6%	6%	9%
San Joaquin	41%	58%	27%	38%	33.9%	16%	20%	4%
Kings	41%	51%	25%	31%	10.0%	11%	13%	4%
Madera	42%	56%	28%	38%	13.4%	15%	17%	11%
Fresno	43%	56%	28%	36%	22.1%	10%	12%	5%
Santa Clara	43%	60%	25%	35%	8.8%	6%	3%	12%

Table A-1								
	Percent of Monthly Wage Needed to Afford Fair Market Rent at Percentile Wage							
	25th		50th		% Change 2000-2006			
County	Studio	Two-Bedroom	Studio	Two-Bedroom	Employment	Total Housing Stock	Single Family Stock	Multi-Family Stock
Alameda	43%	62%	27%	38%	-12.8%	4%	3%	5%
Contra Costa	43%	62%	27%	38%	10.4%	8%	9%	6%
Stanislaus	44%	57%	28%	37%	8.6%	14%	16%	5%
Yolo	44%	57%	28%	36%	-11.1%	15%	17%	12%
Mono	45%	70%	30%	47%	5.0%	15%	11%	21%
Napa	45%	66%	30%	44%	-14.9%	9%	9%	11%
San Luis Obispo	48%	70%	32%	46%	-2.4%	10%	12%	6%
Marin	50%	76%	30%	47%	10.1%	3%	3%	3%
San Francisco	50%	76%	30%	47%	-21.8%	3%	0%	4%
San Mateo	50%	76%	30%	47%	-3.5%	2%	2%	-96%
CALIFORNIA	**52%**	**73%**	**32%**	**46%**	**12.5%**	**8%**	**9%**	**6%**
Solono	53%	66%	33%	41%	1.1%	11%	11%	12%
Los Angeles	54%	81%	33%	50%	7.9%	3%	2%	4%
Santa Cruz	56%	86%	36%	56%	12.4%	4%	4%	9%
Riverside	58%	74%	38%	48%	5.6%	24%	30%	15%
San Bernardino	58%	74%	38%	48%	-1.9%	10%	11%	8%
San Diego	58%	80%	37%	51%	10.1%	8%	7%	9%
Monterey	60%	77%	39%	50%	13.3%	5%	6%	2%
Ventura	62%	88%	39%	55%	9.0%	7%	8%	9%
Santa Barbara	67%	84%	43%	54%	9.0%	7%	8%	5%
Orange	71%	96%	45%	60%	-3.9%	5%	5%	6%

Sources:

- Affordability Index created from data provided by the California Employment Development Department, 1st Quarter 2007 and Locked Out 2008: The Housing Boom and Beyond
- Employment data: Employment Development Department, Labor Market Information Division, 2007
- Housing data: California Department of Finance, California County Profiles, 2000-2006

Table A-2
California Household and Population Characteristics by Ethnic Group

	White, Non-Hispanic	Hispanic	Asian	Black	Total Population
Persons per Household	Percent of Population by Household Size (2006)				
1	12%	3%	6%	10%	8%
2	30%	11%	19%	24%	21%
3	21%	15%	20%	23%	19%
4	22%	22%	28%	20%	23%
5	10%	22%	16%	10%	15%
6+	5%	26%	11%	13%	14%
Population 2006	15,943,789	12,537,418	4,268,496	2,301,291	35,939,668
Population Share 2006	44%	35%	12%	6.4%	
Households 2006	6,837,844	3,276,727	1,417,621	848,233	12,639,136
Share of Households	54%	26%	11%	6.7%	
Mean Household Size 2006	2.3	3.8	3.0	2.7	2.8
Share of 2006 Population <18 / 65+	21% / 16%	35% / 5%	23% / 10%	30% / 9%	27% / 11%
Median Age 2006	41	26	38	33	34
Projected Population Share 2030	33%	45%	13%	5%	
Share of 2030 Population <20 / 65+	21% / 27%	34% / 11%	22% / 21%	27% / 16%	27% / 18%

Source: California Department of Finance, *Current Population Survey Report*, March 2006, http://www.dof.ca.gov/HTML/DEMOGRAP/ReportsPapers/documents/California%20Current%20Population%20Survey%20Extended%20Report,%20March%202006.pdf; California Department of Finance, Population Projections by Race/Ethnicity, Gender and Age for California and Its Counties 2000-2050 http://www.dof.ca.gov/HTML/DEMOGRAP/ReportsPapers/Projections/P3/P3.php

Appendix B
Analysis of Jobs/Housing Balance Relationship to Commute time and to Affordability

We conducted several analyses across California counties of the relationship between commute time and the jobs housing balance and of the relationship between affordability and jobs housing balance.

The share of commuters traveling more than an hour to work was higher in counties with higher ratios of housing to jobs, indicating that suburban places required longer commutes:

Table B-1 Percent Commuting to work 1 hour or More			
Dependent Variable: Percent Commuting to Work 1 Hour or More (weighted by county share of state population) Adjusted R-Squared: 0.4553			
Variable	Coefficient	T-Statistic	P>T
Ratio of housing units to jobs	0.1092881	3.92	0.000
Population Density	3.53 e-06	2.27	0.028
Total Housing Stock	1.40 e-08	4.82	0.000
Percent Job Change	0.1209854	2.95	0.005
Constant	-.0273568	-1.06	0.295

The comparison between affordability and job/housing balance showed greater affordability in counties with higher levels of housing to jobs. Affordability was weaker in larger counties, denser counties, and those with faster job growth.

Table B-2 Percent of Income Required to Pay Fair Market Rent (25th percentile worker, 2 bedroom unit)			
Dependent Variable: Percent of Income Required to Pay Fair Market Rent (weighted by county share of state population) Adjusted R-Squared: 0.4276			
Variable	Coefficient	T-Statistic	P>T
Ratio of housing units to jobs	-0.2698379	-3.29	0.002
Change in the housing/jobs ratio	-0.0073173	-0.86	0.394
Total Housing Stock	5.37 e-08	3.35	0.002
Rate of Job Growth	0.4654758	3.12	0.003
Population Density	0.0000109	1.94	0.058
Constant	0.8651336	10.88	0.000