U.S. Department of Housing and Urban Development | Office of Policy Development and Research

# Worst Case Housing Needs 2007

**A Report to Congress** 



# WORST CASE HOUSING NEEDS 2007

# A REPORT TO CONGRESS

#### Prepared for

U.S. Department of Housing and Urban Development Washington, D.C.

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# **Foreword**

I am pleased to transmit to the U.S. Congress this report from the Department of Housing and Urban Development, "Worst Case Housing Needs 2007." The report, the twelfth in the longstanding series on worst case housing needs, provides national data and information on critical problems facing low-income American renting families.

The report draws on data from the American Housing Survey (AHS), which is funded by HUD and conducted by the Census Bureau. The AHS has been conducted every 2 years since 1973 and is a key source of national data on housing markets, conditions, and dynamics. It is important to note that the report is based on data from 2007, before the full repercussions of the U.S. mortgage market crisis were felt across the broader economy.

This year's report shows that the number of worst case needs households remained effectively flat, with levels still 18 percent higher than in 2000. Worst case needs remains an equal opportunity problem, with significant incidence across races, family types, geographic regions, and boundaries of cities, suburbs and rural areas.

In addition, the report highlights the critical role that unit availability, and not just market supply alone, plays in determining burdens. For the very lowest income groups, there is an insufficient and shrinking supply of affordable rental housing. Moreover, even though there are sufficient affordable units on a national basis for very low-income renters, many of the lower rent units are occupied by renters with higher incomes. This leaves many of the very low-income renters unable to find affordable housing and forced to take on greater burdens in higher rent units.

Further, the report studies the urban geography of the incidence of worst case needs among families. We discovered two distinct patterns. In cities, most worst case needs families lived in higher poverty neighborhoods. By contrast, most worst case needs families living in suburbs and non-metro areas were located in low poverty neighborhoods.

Finally, the report demonstrates that HUD programs providing rental assistance and spurring the production of affordable housing play a critical role in creating stable housing for low-income renters. However, the evidence is clear: the scope of the problem demands that we do more to ensure that all Americans are suitably housed.

Raphael W. Bostic Assistant Secretary for

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Policy Development and Research

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# **Executive Summary**

The report is the twelfth in the series of worst case housing needs reports that have been issued by the Department of Housing and Urban Development (HUD) since 1991.

Worst case housing needs (WCN) are experienced by unassisted very low-income renters who either (1) pay more than one-half of their monthly income for rent; or (2) live in severely inadequate conditions, or both. HUD defines "very low-income" as below 50 percent of the local area median income (AMI) and "extremely low-income" as below 30 percent of AMI.

# **Findings**

# **Demographics of Worst Case Needs**

- The number of households with worst case housing needs in 2007 was 5.91 million households, comprising 12.97 million individuals. This number was a slight (and statistically insignificant) decrease of 1.5 percent from the 5.99 million worst case needs in 2005.
- The small decrease in worst case needs from 2005 to 2007 occurred following a large and statistically significant increase of 19.6 percent during the 2001to-2005 period. The number of households with worst case needs increased from 5.01 million in 2001, to 5.18 million in 2003, to 5.99 million in 2005 and then dropped slightly to 5.91 million in 2007.
- The primary cause of worst case needs is severe rent burden. Of the 5.91 million households with worst case housing needs, 5.48 million had severe rent burden as their sole problem, 190,000 households lived in severely inadequate housing, and 240,000 households had both problems.
- Income Levels. In general, worst case needs are more prevalent among extremely low-income families. A majority of WCN households (4.33 million) had extremely low incomes, and a smaller but substantial portion (1.58 million) were in the 30 to 50 percent of area median income group.
- Family Types. Worst case needs are found across different types of families.
   Among the 5.91 million WCN households were: 2.19 million families with children; 1.21 million elderly households; 602,000 non-elderly disabled households; and 1.91 million "other" households.
- Disabilities. In addition to the 602,000 non-elderly disabled households, there were an additional 404,000 families with children that also had an adult with disabilities present bringing the combined total of these two types of households with disabilities and worst case housing needs to more than 1 million. Disabled households were found to have the highest likelihood of having WCN among the four main family types (families with children, elderly, disabled and "other" households). Among unassisted very low-income households with

disabilities, the likelihood of having worst case needs was 65.6 percent. This exceeds the second highest rate of elderly households (58 percent) and is far above the rates among families with children (47.8 percent) and "other" households (47.7 percent).

- Race and Ethnicity. Worst case needs were found across racial and ethnic groups. There were 2.92 million non-Hispanic white households, 1.35 million non-Hispanic black households, and 1.23 million Hispanic households with worst case housing needs.
- Geography. Worst case needs were found across national regions and across central cities, suburbs and non-metropolitan areas. In the West, 40.0 percent of very low-income renters had worst case needs in 2007, while the incidence in the South was 37.4 percent and 36.2 percent in the Northeast. The Midwest had the lowest incidence, yet in this region too, more than one-third of very low-income renters, 34.3 percent, had worst case needs. In central cities, 37.7 percent of very low-income renters, or 2.80 million households, had worst case housing needs. Very low-income renters were most likely to have worst case housing needs in the suburbs (39.2 percent) although overall fewer worst case needs households (2.05 million) lived in these areas. In non-metropolitan areas, 32.1 percent of very low-income renters, or 1.05 million households had worst case needs.
- Working Families. During 2007, almost one-half (46 percent) of households with children that experienced worst case needs were working full-time (with earned incomes at least at the minimum wage for 40 hours per week).

# **Housing Supply**

 Although there were a sufficient number of affordable units for very low-income renter families, there were an insufficient number of these units available for these families. Units are counted as available if they were either occupied by very low-income renters or vacant and available for rent (the remainder being occupied by higher income families). There were an insufficient number of both affordable and available rental units for extremely low-income renters.

# Neighborhoods

- Relative to all renters, families with worst case housing needs were only somewhat more likely to live in high poverty neighborhoods.
- More than 40 percent of worst case needs renters in cities lived in higher poverty neighborhoods (indicating both a lack of housing options in cities; and a lack of affordable housing even in high poverty areas).
- Most worst case needs renters in suburbs and non-metro areas lived in low poverty neighborhoods (reflecting both the overall proportion that such neighborhoods comprise in these areas and the lack of affordable housing options throughout these areas).

# **Chapter 1. Introduction and Key Findings**

This introduction provides a brief background on worst case housing needs and a summary road map of the Report. It also includes a list of 24 key findings from the main body of the Report.

What are worst case housing needs?

Households have worst case housing needs if they: are renters with very low-incomes; do not currently have housing assistance; and either have a severe rent burden and/ or live in severely inadequate housing. Severe rent burden means a family is paying more than one-half their income for rent. Severely inadequate housing includes a variety of serious physical problems related to heating, plumbing, electric, or maintenance.

Homeless persons are not included in estimates of worst case needs in this and earlier reports because the American Housing Survey counts only persons living in housing units.<sup>2</sup>

#### **Worst Case Needs**

Households With Worst Case Housing Needs:

Are very low-income renters;

Do not have housing assistance;

#### And either:

- Have a severe rent burden (pay more than one-half their income for rent);
   and/or
- (2) Live in severely inadequate conditions

Homeowners are also not included in worst case needs, although they may have very low-incomes and have high housing costs consuming more than one-half of their incomes.

Two common terms used throughout this report refer to the income levels of renters: "very low-income" and "extremely low-income." "Very low-income" households are below 50 percent of area median income; and "extremely low-income" are those with incomes below 30 percent of area median income.

Department of Housing and Urban Development (HUD) programs use "area median incomes" calculated on the basis of local family incomes, with adjustments for household size. However, as a general rule of thumb, the nationwide median income

<sup>&</sup>lt;sup>1</sup> Rent-to-income ratios are calculated on the basis of gross rent, which is the sum of rent plus tenant-paid utilities.

<sup>&</sup>lt;sup>2</sup> HUD is assessing the potential of supplementing future estimates of worst case needs with estimates of people who experience homelessness from local Homeless Management Information Systems (HMIS). The fourth Annual Homeless Assessment Report, transmitted to Congress in July 2009, reported that during the 12-month period of October 1, 2007, to September 30, 2008, about 1.6 million people used an emergency shelter or transitional housing, including 1,092,600 individuals (68 percent) and 516,700 people in families (32 percent).

(for HUD programs) in 2007 was \$59,000, with the "very low-income" level being at \$29,500 per year, and the "extremely low-income" level at \$17,700 per year. All of these income levels are for a family of four.<sup>3</sup> Families with fewer than four people or who are living in areas with lower family incomes can have far smaller incomes than these national figures of 30 and 50 percent of median income.

- Chapter 2 focuses on the demographics and geography of worst case needs households.
- Chapter 3 focuses on housing supply issues.
- Chapter 4 explores poverty levels of the neighborhoods where worst case needs households live.

Chapter 5 and various appendices include more detailed discussion of methodology, terms, sources and related topics.

## **Chapter 2 – Demographics of Worst Case Needs**

Chapter 2 examines various demographic characteristics of households with worst case housing needs, including income, race and ethnicity, family types, geography and other factors. The chapter also includes a short examination of transportation costs, by looking at commuting patterns, of worst case needs households, included in this report for the first time. The chapter then takes a closer look at working families, including families with children, that still have worst case needs and concludes with a short examination of the effect of housing assistance to reduce the level of worst case needs.

## Unmet needs for decent, affordable rental housing

Finding 1: In 2007, There Were 5.91 Million Households (Comprising 12.97 Million People) With Worst Case Housing Needs.

**Finding 2: Severe Rent Burden Remains the Key Housing Issue**. Of the 5.91 million households with worst case needs, 5.48 million had severe rent burden as their sole priority problem. 190,000 households lived in severely inadequate housing, and 240,000 households experienced both of these problems.

**Finding 3: No Statistically Significant Change From 2005 to 2007.** The 5.91 million households reporting worst case problems in 2007 represent a slight and statistically insignificant decrease of 1.5 percent from the 5.99 million worst case needs in 2005.

<sup>&</sup>lt;sup>3</sup> These income levels are based on "national median" income as calculated for HUD programs by inflating Census 2000 and ACS 2005 survey data to mid-FY 2007 to distinguish this median from the Census published 2007 median family income. Chapter 5 includes a chart with examples of specific area median income limits in selected major cities

Finding 4: Longer Term Trend Consistent With Increase in Worst Case Needs From 2001 to 2005. The relative stability during the 2005-to-2007 period followed a large and statistically significant increase of 19.5 percent during the 2001-to-2005 period. The number of households with worst case needs increased from 5.01 million in 2001, to 5.18 million in 2003, to 5.99 million in 2005 and dropped slightly to 5.91 million in 2007.

#### **Worst case needs by income group**

Finding 5: Most Worst Case Needs Households Were Extremely Low-Income. In 2007, of the 5.91 million households with worst case needs, a majority (4.33 million) fell into the extremely low income group, and a smaller but substantial portion (1.58 million) were in the 30 to 50 percent of area median income group.

Finding 6: Extremely Low-Income Renters Had a Higher Likelihood of Worst Case Needs. Among all extremely low-income renter households (those with less than 30 percent of area median income), 46.8 percent had worst case housing needs. Among renters in the 30 to 50 percent of area median income range, 23.6 percent had worst case housing needs.

#### **Race and ethnicity**

**Finding 7: Worst Case Needs for Housing Cut Across Lines of Race and Ethnicity.** In 2007, there were 2.92 million non-Hispanic white households, 1.35 million non-Hispanic black households, and 1.23 million Hispanic households who had worst case needs. The incidence of worst case needs among non-Hispanic whites who are very low-income renters was 39.0 percent in 2007, compared with 33.3 percent for non-Hispanic black households, and 37.4 percent for Hispanic households.

# **Family types**

Finding 8: Over One-Third of Worst Case Needs Households Were Families With Children. In 2007, 2.19 million households (34.6 percent) of the 6.33 million very low-income renter households with one or more child had worst case housing needs. These families with children represented a large share, 37.0 percent, of households with worst case needs.

Finding 9: About One in Five Worst Case Needs Households Were Seniors. In 2007, 1.21 million households (34.6 percent) of the 3.49 million very low-income renter households with either a head or spouse at least 62 years of age had worst case housing needs. These 1.21 million households made up 20.5 percent of households with worst case housing needs.

Finding 10: There Were More Than 1 Million Non-Elderly Worst Case Needs Households in Which at Least One Adult Had a Disability. In 2007, 602,000 disabled households had worst case housing needs (35.3 percent of all such households). A household is counted in the disabled category if it is non-elderly, without children and received some form of government assistance indicating a payment for disability. An additional 404,000 families with children had an adult with disabilities present. Together, these two households types therefore comprised more than 1 million worst

case housing needs households in which at least one adult had a disability. Disabled households made up 10.2 percent of all worst case needs households. When families with children that also have an adult with disabilities are included, this proportion increases to 17.0 percent.

Finding 11: Disabled Households Had the Highest Incidence of Worst Case Housing Needs Among Unassisted Households (of the Four Types of Families). The likelihood of having worst case housing needs among unassisted very low-income renters is highest among disabled households, with rates higher than those of the other family types (the elderly, families with children and other households). Among unassisted very low-income households with disabilities, the likelihood of having worst case needs is 65.6 percent. This exceeds the second highest rate of elderly households (58.0 percent) and is far above the rates among households with children (47.8 percent) and "other" households (47.7 percent).

#### **Geography of worst case needs**

**Finding 12:** All Regions of the Country Had High Levels of Worst Case Housing Needs. Very low-income renters do not escape high levels of worst case needs in any region of the country—Northeast, Midwest, South, or West. In the West, 40.0 percent of very low-income renters had worst case needs in 2007, while the incidence in the South was 37.4 percent and 36.2 percent in the Northeast. The Midwest had the lowest incidence, yet in this region too, more than one-third of very low-income renters, 34.3 percent, had worst case needs.

Finding 13: Substantial Worst Case Housing Needs Were Found in Central Cities, Suburbs, and Non-Metro Areas. In central cities, 37.7 percent of very low-income renters, or 2.80 million households, had worst case housing needs. In suburban areas, very low-income renters had a higher incidence of worst case housing needs (39.2 percent) although overall fewer worst case needs households (2.05 million) lived in these areas. Non-metropolitan areas had 1.05 million households with worst case needs - with almost one-third (32.1 percent) of all very low-income renters in these areas falling into this situation. The overall distribution of worst case needs households generally reflected the distribution of very low-income renters, of which 46.5 percent were living in central cities, 32.8 percent were in suburbs, and 20.5 percent resided in non-metropolitan areas during 2007.

## **Transportation and worst case needs**

Finding 14: Many Working Worst Case Needs Families Also Experience Lengthy Commutes to Work. Of the 2.92 million worst case needs households that reported they were working at a fixed location, 485,000 households had commutes of longer than 30 minutes to get to work, and 348,000 households had to commute more than 20 miles to get to work (these two commute types overlap and are not exclusive of each other). Taking into account the overlap between those two groups, there were a total of 583,000 households who had either one or both of these types of lengthy commutes and had worst case housing needs.

#### **Working families**

Finding 15: Working Households Had High Rates of Worst Case Needs. During 2007, of 1.56 million renter households with both extremely low incomes and earnings consistent with full-time employment, 860,000 households (55 percent) had worst case housing needs. Among the 3.39 million extremely low-income renter households with earnings as their primary source of income, 2.07 million (61 percent) had worst case needs. Among renters in the 30 to 50 percent of area median income range with earnings as their primary source of income, over one in five (21.6 percent), or 1.07 million households, had worst case housing needs.

Finding 16: Worst Case Needs Among Wage Earning Families With Children Were Also High. Almost one-half (46 percent) of households with children that experienced worst case needs were working full-time (with earned income at least at the minimum wage for forty hours per week). Among extremely low-income renters with children, about 1.04 million (34 percent) were working full time in 2007, and 540,000 of these had worst case housing needs.

#### **Effect of housing assistance on worst case needs**

Finding 17: Without Housing Assistance, Lower Income Households Are Far More Likely To Experience Worst Case Needs. Among unassisted renters with extremely low incomes, 73.4 percent had worst case needs during 2007. Incidence of severe problems is far lower, but still substantial at 27.8 percent, among unassisted households with incomes from 30 to 50 percent of area median income.

**Finding 18: Housing Assistance Mitigates the Overall Number of Worst Case Needs.** If current government housing assistance were withdrawn, and those receiving it experienced worst case needs at incidence rates of those currently without such assistance, there would be an additional 2.74 million worst case needs households (2.46 million extremely low-income and 280,000 in the 30 to 50 percent of area median income range).

# **Chapter 3 – Availability of Affordable Housing Stock**

Chapter 3 analyzes housing supply issues, looking specifically at the number of affordable and available rental units for different income level groups.

Finding 19: There Is an Insufficient Supply of Affordable and Available Rental Housing for the Lowest Income Groups. For every 100 extremely low-income renter households, there were only 76 rental units that would be affordable to them at 30 percent of income for rent, and of these only 44 such units were actually available to them (that is, either occupied by renters in this income group or vacant and available for rent).

**Finding 20: Shortages of Affordable and Available Rental Units Are Not Confined to Extremely Low-Income Renters.** For somewhat higher low-income groups, the affordable stock is nominally sufficient to house every household above 45 percent of AMI. However, for rental units that are both affordable and available, the available stock does not match the number of renters until household incomes reach 70 to 75 percent of AMI.

Finding 21: There Are Insufficient Affordable and Available Rental Units for Renter Households Between 30 and 50 Percent of Area Median Income. For every 100 renter households in the 30 to 50 percent of median income range, there were 112.9 rental units that were affordable to them. However, of these units only 74 rental units were available to this income group (that is either occupied by such households in this income group and not occupied by higher income households, or vacant and available for rent).

## **Chapter 4 – Worst Case Needs and Neighborhoods**

Chapter 4 is an in-depth analysis of neighborhood locations of worst case needs renters, and also a comparison of neighborhood types (by poverty level) across central city, suburb, and non-metropolitan areas. This analysis was first added in the last Worst Case Needs Report (Affordable Housing Needs 2005) and is expanded in this report.

Finding 22: Worst Case Needs Households Were More Likely To Live in Poorer Neighborhoods. Nationwide, 29.8 percent of worst case needs households resided in neighborhoods with poverty rates that are greater than 20 percent. This figure compares to 24.3 percent of all renter households and 20 percent of all households that resided in these poorer neighborhoods. Only 34.9 percent of worst-case households lived in low-poverty neighborhoods in contrast to 40.3 percent of all renters and 50.0 percent of all households.

Finding 23: Worst Case Needs Households in Central Cities Were Far More Concentrated in Higher Poverty Neighborhoods. In central cities, 43.6 percent of worst-case households lived in neighborhoods with poverty rates of 20 percent or more. Despite living in neighborhoods where housing is likely to be less expensive, a high percentage of very low-income renters in central cities were still unable to locate affordable housing.

Finding 24: In Suburban and Non-Metro Areas, Worst Case Needs Households Were Less Likely To Live in High Poverty Neighborhoods, but Could Not Access Affordable Housing. In suburban areas, approximately one-half of both worst-case needs households (52.7 percent) and renters with very low-income (48.9 percent) lived in neighborhoods with the lowest poverty rates. These high proportions reflect the fact that numerous suburban areas have few neighborhoods with high poverty rates. The only suburban residential options that very low-income renters have are likely to leave them without sufficient affordable housing options. Likewise, in non-metro areas, about half of both worst-case need households (49.6 percent) and renters with very low-incomes (50.9 percent) resided in neighborhoods with moderate poverty levels of 10 to 20 percent—reflecting both the prevailing neighborhood characteristics and lack of affordable housing in such areas.

# Chapter 2. **Demographics of Worst Case Needs**

#### **Worst Case Needs in 2007**

This chapter examines various demographic characteristics of households with worst case housing needs, including income, race and ethnicity, family types (families with children, seniors, and persons with disabilities), geography, and other factors. The chapter also includes a brief analysis of transportation costs, by looking at commuting patterns of worst case needs households, included in this report for the first time. Finally, the chapter takes a closer look at working families, including families with children, that still have worst case needs and concludes with a short examination of the effect of housing assistance to reduce worst case needs.

In 2007, 5.91 million very low-income renter households had worst case housing needs because they were unassisted and they had severe rent burdens exceeding one-half of their income or lived in severely inadequate housing conditions. These 5.91 million households included 12.97 million individual people.

During the 2005-to-2007 period, the level of worst case needs remained basically unchanged. The Department of Housing and Urban Development (HUD) reported a total level of 5.99 million worst case needs households in 2005. There was a slight decline of 87,000 households (a 1.5 percent change), from that level in 2007, but this decline is well within the margin of error and thus is not statistically significant.<sup>1</sup>

# **Types of Worst Case Housing Problems**

#### **Severe rent burdens**

Severe rent burden constitutes by far the largest portion of worst case needs. Families with severe rent burdens pay more than one-half of their monthly income for rent. Out of 5.91 million households with worst case needs, 5.72 million (96.8 percent) had severe rent burdens. Of these 5.72 million households, 4.25 million were extremely low-income (below 30 percent of area median income) and the remaining 1.47 million households were in the 30 to 50 percent of area median income group.

The low incomes of these renter households means that, after paying one-half of their income for rent, very little would be left for necessities such as food, medical care, transportation expenses, education and childcare.

<sup>&</sup>lt;sup>1</sup> The 90 percent confidence interval for the 2007 estimate is 5.675 million to 6.135 million.

#### Severely inadequate housing conditions

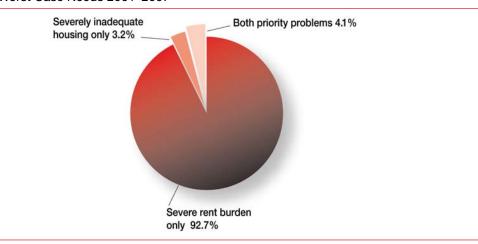
Compared with rent burdens, physical housing problems account for a much smaller portion of worst case needs. In 2007, 429,000 households with worst case needs lived in severely inadequate housing. Severely inadequate housing includes a variety of serious physical problems related to heating, plumbing, electric, or maintenance (a full description is provided in Appendix B). More than one-half of these households (56 percent) also had severe rent burdens, and a smaller portion (44 percent) had severely inadequate conditions as their only priority housing problem.

Exhibit 2-1. Worst Case Needs in 2007

	0–30% of Area Median Income	30–50% of Area Median Income	Total (below 50% Area Median Income)
Total Unassisted Renter Households	5,893	5,861	11,754
Worst Case Needs Households	4,327	1,578	5,905
Percent of Households with WCN	73.4%	27.8%	50.2%

Numbers are in thousands of households.

Exhibit 2-2. Worst Case Needs 2001-2007



#### **Trend in Worst Case Needs 2001 to 2007**

Although the level of worst case needs remained relatively stable between 2005 and 2007, this stability followed a longer period of substantially worsening conditions for very low-income renters.

As Exhibit 2-3 illustrates, the small (statistically insignificant) decrease in worst case needs from 2005 to 2007 followed a very large increase in worst case needs during the 2001-to-2005 period. Between 2001 and 2005, worst case needs increased by nearly one-fifth (19.5 percent). Over the longer 2001-to-2007 period, the estimated increase in worst case needs was 17.8 percent. Thus, it is critical to observe trends in worst case needs over a longer term period. Indeed, when the report on the 2003

data was issued, it showed a much smaller increase in housing needs than was found in other private research studies. Seen in this context, the overall level of worst case needs in 2007 is still consistent with a longer term trend.

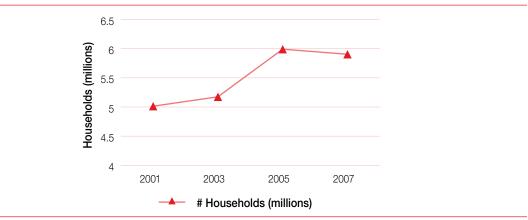


Exhibit 2-3. Worst Case Needs 2001-2007

Exhibit 2-4 shows the same trend in worst case needs from 2001 to 2007 in comparison with the total number of all U.S. households during the same period.

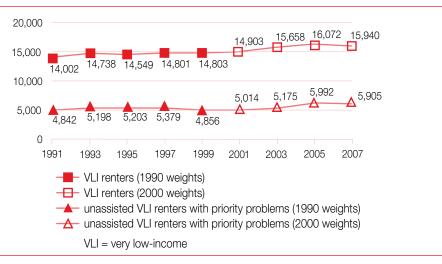
Exhibit 2-4. Worst Case Needs 2001-2007

	2001	2003	2005	2007
All households (millions)	105.44	105.87	108.90	110.72
Renter households with worst case needs (millions)	5.01	5.18	5.99	5.91
Worst case needs as percent of all households	4.76%	4.89%	5.50%	5.33%

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

Looking back a bit further, worst case needs increased by 22.0 percent between 1991 and 2007, a rate of growth exceeding the 13.8 percent increase in very low-income renters and the 18.9 percent increase in total U.S. households during the same period. These changes imply a long-term increase in incidence as well, so that 51.0 percent of unassisted very low-income renters had worst case needs in 2007, the same incidence observed in 1997, but higher than the 48.1 percent incidence in 1991. It should be noted that year-to-year comparisons are not always comparable, due to changes in the American Housing Survey (AHS) in some years and because the pre-2000 AHS figures are weighted using 1990 Census data.

**Exhibit 2-5.** Overall Trend in the Number of Very Low-Income Renters and Those with Worst Case Needs, 1991–2007



The slight decline in worst case needs from 2005 to 2007 was accompanied by a decline in the total number of extremely low-income renters, from 9.73 million households to 9.24 million households during the same period. This phenomenon is explained in greater detail, along with other possible causes of the small decline in worst case needs, in Appendix D, "Additional Examination of the 2005-to-2007 Trend in Worst Case Needs."

# **Worst Case Needs by Income Groups**

By definition, households with worst case needs for affordable housing are below the very low-income threshold (50 percent of median income), but households with extremely low incomes constitute nearly three-fourths of those with worst case needs. In 2007, of the 5.91 million households with worst case needs, 73.3 percent (4.33 million households) fell into the extremely low-income group, and a smaller but substantial portion (26.7 percent, or 1.58 million households) were in the 30 to 50 percent of median income group. Because severe rent burden, rather than inadequate housing, accounts for most worst case needs, income is obviously a critical factor.

The predominance of extremely low-income renters among worst case households is explained by two factors. First, 58 percent of very low-income renters are also extremely low-income renters, having incomes below the 30 percent of median income threshold. Second, unless they receive housing assistance, the poorer subset of renters is much more likely to experience severe housing problems.

Extremely low-income renters were much more likely to have worst case housing needs. As previously shown in Exhibit 2-1, 73.4 percent of unassisted renters with extremely low incomes had worst case housing needs in 2007. Incidence of severe problems is far lower, but still substantial at 27.8 percent, for the remaining households making up worst case needs—those with incomes from 30 to 50 percent of median.

## **Race and Ethnicity**

Worst case needs for affordable housing cut across lines of race and ethnicity. Minority status depends on definitions that are fluctuating as the nation's population becomes more diverse.<sup>2</sup> Analyzing housing needs in terms of these demographics shows both similarities and differences among the three largest groups defined by race and ethnicity.

Exhibit 2-6 shows that in 2007, there were 2.92 million non-Hispanic white households with worst case needs, 1.35 million non-Hispanic Black households with worst case needs, and 1.23 million Hispanic households with worst case needs. Together, these three race/ethnicity groups account for 93 percent of worst case needs in 2007.<sup>3</sup>

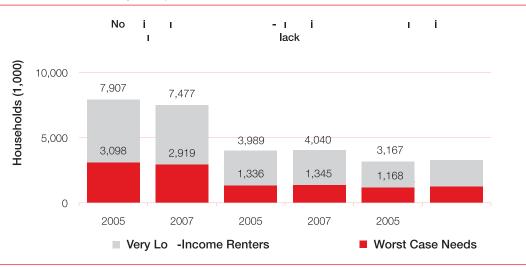


Exhibit 2-6. Race/Ethnicity Groups and Worst Case Needs, 2005–2007

In terms of incidence, non-Hispanic Whites had the highest likelihood of having worst case housing needs, with 39.0 percent of all such very low-income renter households falling into this category. Hispanic households had a 37.4 percent likelihood, and non-Hispanic black households had a 33.3 percent likelihood of having worst case housing needs. Note that these incidence levels, and those in the next three sections (family types, regions and metro types) are calculated among the total number of very low-income renters (including assisted households) in each category unless otherwise noted. For further detail, see Table A-9 in the Appendix.

Severely inadequate housing varies somewhat by demographic group. Focusing again on very low-income renters, only 2.6 percent of non-Hispanic whites experienced severe physical problems with their units in 2007, compared with 4.4 percent of both non-Hispanic blacks and Hispanics.

<sup>&</sup>lt;sup>2</sup> Beginning in 2003, the AHS used revised Census Bureau categories of race and ethnicity that are not directly comparable with prior surveys. Survey respondents now are allowed to select more than one racial group, causing small but significant decreases in the size of the single-race categories.

 $<sup>^3</sup>$  The estimated changes in worst case needs are not statistically significant for these groups. The 2005 estimates fall within the 90 percent confidence intervals of the 2007 estimates:  $\pm$  257 for non-Hispanic whites,  $\pm$ 174 for non-Hispanic blacks, and  $\pm$ 192 for Hispanics.

Among very low-income renters with severe problems, 6 percent of white households, 9 percent of black households, and 10 percent of Hispanic households lived in severely inadequate housing.

Hispanic immigration is an important factor in the U.S. demographic picture, because 843,000 Hispanic residents were added between 2005 and 2007.<sup>4</sup> Despite hardships that may be associated with immigration, HUD's examination of immigration for all groups indicates that it does not contribute significantly to worst case needs. In 2007, householders<sup>5</sup> who are naturalized citizens accounted for 6.3 percent of worst case needs, proportional to their 6.0 percent share of unassisted very low-income households. Likewise, non-citizen householders constituted 14.3 percent of worst case needs, slightly less than their 16.5 percent share of unassisted very low-income households. Among unassisted very low-income renters, incidence of worst case needs is 44.2 percent for non-citizen householders, and 53.3 percent for naturalized citizens, averaging 46.6 percent for all immigrant householders. By comparison, 52.3 percent of U.S. native householders have worst case needs. These data show that, on a proportional basis, unassisted very low-income renters who are immigrants are slightly less likely than U.S. native householders to have worst case housing needs.

# Worst Case Needs by Race/Ethnicity Group and Across Central Cities, Suburbs, and Non-Metro Areas

Exhibit 2-7 shows the distribution of worst case needs by the three main race/ ethnicity groups covered and their distribution across central cities, suburbs, and non-metro areas.

Non-Hispanic White households with worst case needs lived most often in central cities and suburbs (with roughly the same distribution in each type of area), and somewhat less commonly in non-metro areas. Both non-Hispanic Black and Hispanic households with worst case needs lived most commonly in central cities, somewhat less commonly (though still with a considerable share) in suburban areas and much less commonly in non-metro areas.

Exhibit 2-7 also shows that non-Hispanic White households with worst case needs were more numerous than the other two largest race/ethnicity groups in all three metropolitan location types—central cities, suburbs, and non-metro areas.

<sup>&</sup>lt;sup>4</sup> This estimate is based on Census Bureau figures for U.S. resident population in July 2007, relative to age cohorts that existed in July 2005. Births occurring within the U.S. thus are not counted but deaths are netted out.

<sup>&</sup>lt;sup>5</sup> In the American Housing Survey, "householder" refers to the reference person who is responding to the survey, not necessarily to the head of household.

Exhibit 2-7. Worst Case Needs by Race/Ethnicity and Metro Type, 2007

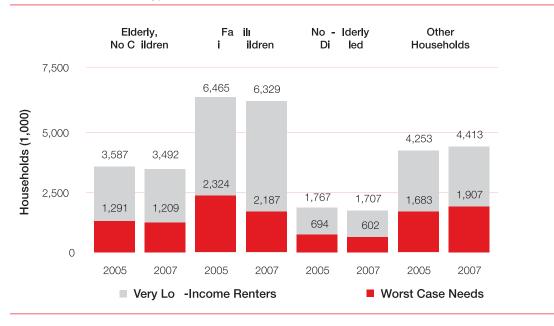
				71	•			
	Metropolitan Location							
Race	Central Cities	Percent	Suburbs	Percent	Non- metro Areas	Percent	Totals	Percent
Non-Hispanic White (thousands)								
Households with Worst Case Needs	1,089	37.3%	1,064	36.5%	766	26.2%	2,919	100%
Non-Hispanic Black (thousands)								
Households with Worst Case Needs	789	58.7%	417	31.0%	139	10.3%	1,345	100%
Hispanic (thousands)								
Households with Worst Case Needs	690	55.9%	466	37.8%	78	6.3%	1,234	100%

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

# **Worst Case Needs by Family Types**

The composition of different households reflects variations in their stage of life, income, other resources, and housing needs. Exhibit 2-8 shows the differences among four household types and illustrates how the number of very low-income renters of these households relates to worst case needs for each group.

Exhibit 2-8. Household Type and Worst Case Needs, 2005–2007



#### **Families with Children**

In 2007, 6.33 million very low-income renter households included one or more children under 18 years of age, and 2.19 million of these households had worst case housing needs. The resulting incidence of 34.6 percent is a non-significant change from the 35.9 percent rate in 2005. Both a lower incidence and a smaller number of very low-income renters contributed to the reduction of 140,000 in worst case needs among families with children. Families with children represented a large share (37.0 percent) of households with worst case needs in 2007.

Another substantial fraction of very low-income renters with children (27.7 percent) have rental assistance, and, by definition, these 1.75 million households do not have worst case needs.

# **Elderly Households**

HUD defines elderly households as those with either a household head or spouse who is at least 62 years of age and includes no children under 18 years of age. During 2007, elderly households constituted 1.21 million, or 20.5 percent, of households with worst case needs.

Between 2005 and 2007, the estimated number of elderly households with worst case needs declined by 80,000 and those that reported receiving housing assistance increased by 50,000. Among elderly very low-income renter households, 34.6 percent had worst case needs and 40.3 percent reported housing assistance in 2007.

# **Households Including Persons with Disabilities**

In 2007, there were 602,000 non-elderly disabled households with worst case housing needs. Disabled households thus made up 10.2 percent of all worst case needs households (when families with children that also have an adult with disabilities are included, this proportion increases to 17.0 percent). In terms of incidence, 35.3 percent of all non-elderly disabled very low-income renter households had worst case housing needs. This incidence level on its own is roughly comparable to the incidence of worst case needs among families with children (34.6 percent) and elderly households (34.6 percent) and somewhat below that for "other" households (43.2 percent).

However, when examining incidence of worst case needs among *unassisted* very low-income renters, the rate for disabled households is the highest of the four family types considered. Almost two-thirds (65.6 percent) of unassisted very low-income renter households with disabilities have worst case housing needs. This is the highest incidence level, exceeding the second highest rate of elderly households (58 percent), and far above the rates among households with children (47.8 percent) and "other" households (47.7 percent).

Between 2005 and 2007, the number of non-elderly disabled households with worst case needs declined from 694,000 to 602,000. However, the apparent decline in worst case needs among these households was not statistically significant and was

accompanied by two other changes in the data: (1) a decline in the total number of non-elderly disabled households from 1.767 million to 1.707 million; and (2) an increase in the number of such households that reported receiving housing assistance (thus removing them from those who could be considered as worst case needs) from 703,000 to 790,000. It is likely that both of these changes were due to either changes in the AHS Survey between those two years (such as the change in the question on housing assistance) or other factors in the data, rather than overall population changes or an actual increase in the receipt of assistance.

In 2008, PD&R issued a separate report on worst case needs among non-elderly disabled households, entitled, *Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report* (February 2008). This report was made possible by improved survey questions in the AHS about the receipt of various government supplemental income programs. The improved AHS Survey allowed the report to include better detail on housing needs among the disabled. The report found that a larger portion of all households with worst case needs were in the non-elderly disabled household category. Based on these improvements, a household is counted as a "disabled household" if it (1) is non-elderly; (2) is without children present; and (3) reports having received assistance from Social Security, Supplemental Security Income (SSI), public welfare, or "worker's compensation or other disability payment."

A key finding of the supplemental report was that in 2005 there were an additional 365,000 households within the group of households with children that had worst case needs that also had an adult with a disability present. In 2007, this number increased to 404,000 households with children that also included an adult with disabilities. Note that these families are already counted within the families with children category discussed above. Together, these two groups—the non-elderly disabled households and households with children that also had an adult with disabilities present—represent more than 1 million households with worst case needs. This figure is 17.0 percent of all households with worst case housing needs.

<sup>&</sup>lt;sup>6</sup> The improved 2005 estimate of 694,000 was an increase over the estimate of 540,000 households using the old methodology. The new method added a fourth income source to the proxy for disability, using a new question about "worker's compensation, SSDI [Social Security Disability Income] or other disability payment," which was added to the AHS beginning in 2005. See a discussion of the disability proxy in Appendix B, and in *Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report* (HUD, 2008).

<sup>&</sup>lt;sup>7</sup> A review of past *Affordable Housing Needs* reports identified a mislabeled column heading in several appendix tables. Specifically, Tables A-6, A-7, and A-8 of *Affordable Housing Needs 2005* and previous reports include a heading, "Nonfamily Reporting SSI Income." This shorthand heading would be more accurately titled, "Nonelderly Disabled Household Without Children," because it does not reflect that (1) families consisting of related individuals but no children are included, and (2) income types other than SSI were included in the three-source proxy. The mislabeled category contains those households that have nonelderly heads and no children present and reported income from Social Security, SSI, or welfare (variables QSS, QSSI, or QWELF for 2005, and QSS or QWELF for 2003). When no children are present, welfare income is likely to be associated with disability rather than with children, as the Temporary Assistance to Needy Families program notably would be.

<sup>&</sup>lt;sup>8</sup> See Exhibit 4 in Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report (HUD, 2008).

#### Other Households

The final household category shown in Exhibits 2-8 and 2-9 is other households, These are renter households that are not elderly, not disabled, and do not have children in the household. This group may be further broken down into "other families" (related persons without children) and "other non-family households" (single persons, or unrelated persons sharing housing), as shown in Appendix Table A-6a.

As shown in Exhibit 2-9, of the 5.91 million households with worst case housing needs, 1.91 million were "other households." These 1.91 million households included 352,000 "other families" (related persons without children) and 1.56 million "other non-family households" (single persons or unrelated persons sharing housing). Between these two household types, the "other non-family households" had a higher incidence of worst case needs (46.0 percent of the 3.38 million total number of very low-income renter households) than the "other families" households (34.0 percent of the 1.03 million total very low-income renter households).

**Exhibit 2-9.** Incidence of Worst Case Needs Among Unassisted Very Low-Income Renters, By Family Type, 2007

	Disabled Households	Elderly Households	Families with Children	"Other Households"
Total VLI Renter Households	1,707	3,492	6,329	4,413
Number of Unassisted VLI Renters	917	2,083	4,578	3,997
Number of WCN Households	602	1,209	2,187	1,907
WCN as percent of VLI renters	35.3%	34.6%	34.6%	43.2%
WCN as percent of Unassisted VLI Renters	65.6%	58.0%	47.8%	47.7%

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

# **Geography of Worst Case Needs**

## **Worst Case Needs by Region**

High levels of worst case needs are prevalent among very low-income renters in all of the four major regions—Northeast, Midwest, South, and West. Exhibit 2-10 shows that in the West, 40.0 percent of very low-income renters had worst case needs in 2007. Incidence was 36.2 percent in the Northeast and 37.4 percent in the South. The Midwest had the lowest incidence, yet in this region too, more than one-third of very low-income renters, 34.3 percent, had worst case needs. The greater prevalence of worst case needs in the West to some extent reflects higher housing costs in the region.

The population of very low-income renters reported by the AHS declined somewhat in much of the country between 2005 and 2007. Only in the Midwest did the number of very low-income renters increase (by 260,000). This addition was balanced by a comparable 250,000 decrease in the number of very low-income renters in the South

and exceeded by reductions of 50,000 in the Northeast and 90,000 in the West. As the most populous region, the South continues to provide homes for one-third (33 percent) of very low-income renters, while the other three regions each have between 21 and 24 percent of very low-income renters.

Exhibit 2-10. Worst Case Needs and Housing Assistance by Region

	2003	2005	2007
Northeast			
Very low-income renters (thousands)	3,444	3,538	3,487
Worst case needs	1,146	1,354	1,263
Percent with worst case needs	33.3%	38.3%	36.2%
Midwest			
Very low-income renters (thousands)	3,327	3,331	3,587
Worst case needs	1,009	1,152	1,230
Percent with worst case needs	30.3%	34.6%	34.3%
South			
Very low-income renters (thousands)	5,294	5,444	5,192
Worst case needs	1,649	1,987	1,942
Percent with worst case needs	31.1%	36.5%	37.4%
West			
Very low-income renters (thousands)	3,592	3,759	3,673
Worst case needs	1,371	1,500	1,470
Percent with worst case needs	38.2%	39.9%	40.0%

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

# **Worst Case Needs by City, Suburb, and Non-Metro Area**

Worst case needs are distributed not only across all regions of the country but also throughout central cities, suburbs, and non-metropolitan areas.

Central cities had the highest number of worst case needs, with 2.80 million households living there. However, families living in the suburbs had a higher likelihood of experiencing worst case needs—with 39.2 percent of very low-income renter households falling into that category compared to 37.7 percent in central cities. Even in non-metropolitan areas, almost one-third (32.1 percent) of very low-income households had worst case housing needs. Worst case needs households in non-metro areas made up 17.8 percent of all worst case needs.

The changes in incidence for the 2005-to-2007 period are statistically insignificant for all three geographies.

**Exhibit 2-11.** Worst Case Needs and Housing Assistance in Central Cities, Suburbs, and Non-Metro Areas

	2003	2005	2007
Central Cities			
Very low-income renters (thousands)	7,446	7,505	7,420
Worst case needs renters (thousands)	2,532	2,909	2,800
Percent with worst case needs	33.9%	38.8%	37.7%
Suburbs			
Very low-income renters (thousands)	5,506	5,417	5,239
Worst case needs renters (thousands)	1,987	2,092	2,052
Percent with worst case needs	36.1%	38.6%	39.2%
Non-Metropolitan Areas			
Very low-income renters (thousands)	2,685	3,149	3,281
Worst case needs renters (thousands)	657	991	1,053
Percent with worst case needs	24.5%	31.5%	32.1%

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

# **Transportation and Worst Case Needs**

The issue of affordable housing is inherently linked to a host of other critical issues, including access to jobs, schools, businesses, public services, and amenities. Households may choose to pay higher housing costs for better access to these necessities. Access to jobs in particular is a critical issue for working families because higher transportation costs will further erode already limited budgets of low-income families. The AHS provides some basic data on commuting times and distances of renter families, and these data are summarized here for households with worst case needs and other renters.

Exhibit 2-12 provides estimates of renter households having persons working at a fixed location, including the number of these households with lengthy commutes. Those with lengthy commutes either needed more than 30 minutes or had to travel more than 20 miles to get to work. A substantial number of worst case needs households that were working had lengthy commutes. The data show that, of the 2.92 million worst case needs households that were working at a fixed location, 583,000 households, or 38 percent, had commutes that either took more than 30 minutes to get to work, or had a distance of more than 20 miles to do so, or both.

These long commutes likely add a substantial burden to these households, who already experience high housing costs (and/or severely inadequate conditions). The data show that there is not always a tradeoff between housing and transportation times and costs, but that many families experience both high housing and transportation costs.

**Exhibit 2-12.** Commuting Times and Distances of Renter Households Working at a Fixed Location, by Income as Percent of AMI (thousands of households)

	0–30%	31–50%	51–80%	All Renters
All Renters				
Total	3,296	4,541	5,904	23,212
Commute >30 minutes	500	790	1,046	4,593
Commute distance >20 miles	341	570	906	3,670
Commute >30 minutes and/or >20 miles**	616	926	1,298	5,565
Worst Case Needs/Severe Problems*				
Total	1,963	958	439*	-
Commute >30 minutes	286	199	88	-
Commute distance >20 miles	217	131	61	-
Commute >30 minutes and/or >20 miles	358	225	98	-
Assisted				
Total	773	563	358	-
Commute >30 minutes	123	74	52	_
Commute distance >20 miles	58	49	40	-
Commute >30 minutes and/or >20 miles	146	85	62	-

Table includes only renter households having persons who were working at a fixed location. Assisted households are included for comparison purposes.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

The AHS data for 2007 show that about two-thirds of homeowners who were working had shorter commutes (under 30 minutes or under 20 miles to get to work) while one-third had longer commutes (in both categories). About three-fourths of all renters who were working had shorter commutes by time (less than 30 minutes) and about 85 percent had shorter commutes by distance (under 20 miles), with the remainder having longer commutes in both categories.

# **Working Households With Worst Case Needs**

Among households with working-age, non-disabled family members, both their work participation and severe housing problems are issues of substantial policy interest. Numerous federal and state policies and programs focus on helping families move toward long-term self-sufficiency while providing short-term assistance for daily needs. The success of these policies, as well as the substantial impact of housing problems, including severe rent burdens, is a key issue and the analysis of worst case housing needs can shed substantial light on the issue.

<sup>\*</sup> Over 50% of median income is by definition not WCN – the households in this column are unassisted renters with a priority problem (but are over the income threshold for inclusion in worst case needs).

<sup>\*\*</sup> This row shows the number of renters with either type of long commute, or both of them (without double counting), and not an additional category of renters.

# **Very Low-Income Renters With Significant Work Participation**

In 2007, 1.91 million very low-income renter households with worst case needs had earnings equivalent to a full-time job at the minimum wage. By this measure, worst case needs are found among 29 percent of the 6.48 million very low-income renters with significant work participation. These working, worst case needs households included 860,000 with extremely low incomes and 1.05 million with incomes between 30 and 50 percent of area median income.

Well over one-half (55.5 percent) of extremely low-income renter households with earnings exceeding a full-time minimum wage job nevertheless had worst case needs. A smaller but still significant portion (21.2 percent) of renters with significant work participation providing incomes of 30 to 50 percent of area median income had worst case housing needs.

A more inclusive proxy for estimating workforce participation counts households that had earned income as their primary source of income. <sup>10</sup> Based on this measure, out of 8.35 million very low-income renter households with earnings as their primary source of income, 3.14 million had worst case housing needs, with 2.07 million having extremely low incomes and 1.07 million having incomes of 30 to 50 percent of area median income. The incidence of worst case housing needs among these two groups was 60.9 percent for the extremely low-income group and a smaller but still substantial 21.6 percent for the higher income subset.

These statistics show that lack of access to affordable housing is a substantial problem for the nation's very low-income workforce. As discussed above, the overwhelming majority of these worst case needs are caused by severe rent burdens. The impact of severe rent burdens on the limited earnings of these very low-income households obviously is crucial in the lives of these families, accounting for a vast share of income and leaving little in disposable income for essential costs such as medical care, education, transportation, child care or other necessities.

# **Worst Case Needs Among Families With Children and Earnings**

A substantial number of working worst case needs households also were families with children. Of the 1.91 million worst case needs households with earnings at least at full-time minimum wage, 1.0 million were families with children, including 540,000 with extremely low incomes and 460,000 with incomes between 30 and 50 percent of area median income.<sup>11</sup>

<sup>&</sup>lt;sup>9</sup> The AHS does not directly measure work participation. HUD uses household earned income of \$10,300 as a proxy for full-time employment. This level of annual income is equivalent to 40 hours per week for 50 weeks at the national minimum wage of \$5.15 per hour. The minimum wage increased to \$6.55 in 2008.

<sup>&</sup>lt;sup>10</sup> "Primary source of income" means their earnings represent 50 percent or more of household income.

<sup>&</sup>lt;sup>11</sup> Low-income working families with children are eligible to receive a cash benefit through the federal Earned Income Tax Credit. The AHS does not capture this form of income. Berube (2006) reports that the average claimant in 2004 received roughly \$1,800, or more than 10 percent of his or her annual income, from the federal credit, and that 19 states plus the District of Columbia offer their own earned income tax credits, matching the federal credit at rates ranging from 5 to 35 percent.

The number of worst case needs households that both were working and had children is even larger when defining "working" on the basis of earnings as being the primary source of income, with a total of 1.42 million families meeting all of these criteria. These 1.42 million families included 950,000 with extremely low incomes and 470,000 with incomes between 30 and 50 percent of area median income.

Similar to the pattern for working households overall, the incidence of worst case needs is higher for those very low-income families with children that have extremely low incomes. The 950,000 extremely low-income families with children having worst case housing needs represent 30.0 percent of the 1.80 million working extremely low-income families with children. For the 30 to 50 percent of area median income group, worst case needs are found in 18.5 percent of the 2.57 million working families with children.

# **Housing Assistance Mitigates the Effect of Very Low Income**

By definition, households receiving housing assistance do not have worst case needs. Housing assistance from various sources plays a substantial role in reducing worst case housing needs. Among the 5.16 million renter households that reported receiving housing assistance in 2007, 84.6 percent had incomes below the very low-income threshold. There were 3.35 million assisted households with extremely low incomes, and another 1.02 million assisted households with incomes in the 30 to 50 percent of AMI range. Thus, 65 percent of assisted households had extremely low incomes placing them at a very substantial risk of experiencing worst case housing needs if they did not receive assistance.

Applying the incidence estimates of Exhibit 2-1 to assisted renters with similar incomes (as reported in the AHS, see Table A-1) suggests that in the absence of assistance, an additional 2.74 million households would have worst case needs, including 2.46 million extremely low-income renters and 0.28 million renters with incomes of 30 to 50 percent of area median income. This simple estimate does not take account of any secondary effects such as changes in rents that might result from shifts in demand for unsubsidized housing. In addition, without rental assistance many households would become homeless.

<sup>&</sup>lt;sup>12</sup> By comparison, 69.5 percent of 6.48 million households reporting rental assistance in 2005 had very low incomes. The 2007 estimate is closer to the targeting and totals for HUD's assisted housing programs, a change that reflects improvements in the 2007 AHS that primarily excluded misreported assistance by higher-income households. See Appendix B for more detail on the changes in the 2007 AHS Survey Questionnaire.

## **Summary**

In 2007, a total of 5.91 million very low-income renters had worst case housing needs, representing 5.3 percent of U.S. households and 37.0 percent of all very low-income renter households. The number of worst case needs declined from 5.99 million households in 2005, but this change was statistically insignificant (i.e., within the margin for error). The level of 5.91 million households should also be considered in the context of a large overall increase in worst case housing needs from 5.01 million in 2001—a 17.9 percent increase during this longer period.

Severe housing cost burdens, rather than severely inadequate housing, continue to be the predominant cause of worst case needs. Of the 5.91 million households with worst case needs, 97 percent had an excessive rent burden, while 7 percent lived in severely inadequate conditions. Of this latter group of 429,000 households, 242,000 households faced both problems.

# **Chapter 3. Availability of Affordable Housing Stock**

# Why Housing Supply Is an Issue

Chapter 2 of this report focused mainly on describing who has worst case housing needs. This chapter examines the question of housing supply.

# Affordability, Availability, and Adequacy

This chapter uses three concepts to assess the rental housing stock: affordability, availability, and adequacy.

- Affordability measures the extent to which there are enough rental housing
  units of different costs to provide each household with a unit it can afford
  (based on the 30 percent of income standard). Affordability is the broadest
  measure of housing stock sufficiency, addressing whether there would be
  sufficient housing units if allocated solely on the basis of cost. The affordable
  stock includes both vacant and occupied units.
- Availability measures the extent to which affordable rental housing units are available to households within a particular income range. Some households choose to spend less than 30 percent of their incomes on rent, occupying housing that is affordable to households of lower income. These units are thus not available to the lower income households.¹ A unit is available at a given level of income if it is affordable at that level and either (1) occupied by a household with that income or less or (2) vacant.
- Adequacy extends the concept of availability by considering whether sufficient rental units are physically adequate as well as affordable and available.<sup>2</sup>

In this chapter, these concepts are examined in terms of data at the national level, and do not take into account important variations in local or metropolitan housing markets, although regional data are examined later in the Chapter, along with other variations such as those across central cities, suburbs and non-metropolitan areas.

<sup>&</sup>lt;sup>1</sup> The availability measure also removes units from consideration if they have artificially low rents because they are occupied as a benefit of employment (for example, by caretakers) or because they are owned by relatives or friends of the occupants. The 2007 AHS data indicate that 2.4 million renter households (6.2 percent) occupied their units while paying no rent. The AHS does not provide estimates of the number of households paying a positive but below-market rent because of employment or other reasons.

<sup>&</sup>lt;sup>2</sup> The AHS rates housing units using a three-level measure: adequate, moderately inadequate, and severely inadequate. For additional detail, see the entry for the variable ZADEQ in the *Codebook for the American Housing Survey, Public Use File: 1997 and Later* (U.S. Department of Housing and Urban Development 2006).

# **Measures of Affordability and Availability**

Exhibit 3-1 describes the U.S. rental housing stock in 2007 using data from the American Housing Survey (AHS).<sup>3</sup> For purposes of this analysis, income, and affordability are divided into intervals representing 5 percent of area median income (AMI).

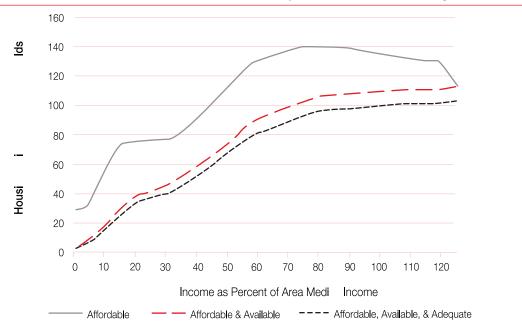


Exhibit 3-1. Three Measures Characterize the Sufficiency of the U.S. Rental Housing Stock, 2007

The point at which the Affordable line crosses 100 represents the income level at which there is an affordable rental unit for every household. This point occurs at 45 percent of AMI, meaning the number of rental housing units is sufficient—with ideal allocation—to provide affordable housing to households with incomes above 45 percent of area median income. This is unchanged from 2005. Affordable units peak at an income level of 85 percent of AMI. Beyond this, more households than housing units are being added. The downward slope beyond 85 percent of AMI represents a reduction in housing need, because the households with incomes greater than each successive threshold are more and more likely to spend less than 30 percent of their incomes on housing.

The Affordable and Available line shows a different story. Its position below and to the right of the Affordable line indicates that availability is a substantial additional constraint. For example, the Affordable and Available line indicates that about 76 percent

<sup>&</sup>lt;sup>3</sup> Measures of affordability and availability do not reflect small-scale geographic detail. The results presented in this chapter reflect large-scale measures that compare the entire housing stock with the entire rental population. Although this chapter presents more geographically restricted measures, they are still too large to fairly represent housing demand and supply as owners and renters experience them because these are local phenomena. Thus, these results should be viewed with some caution as national or regional indicators based on underlying local housing markets. More severe shortages or generous surpluses can occur in specific housing markets, despite these national and regional findings. For an overview of issues related to local markets, see Khadduri, Burnett and Rodda (2003).

of households with incomes below 30 percent of AMI could be housed in affordable units if such units somehow could be perfectly allocated. The 76 percent figure is an increase from 68 percent in 2005 and about the same as the 78 percent in 2003.

The Affordable and Available line shows that a considerable portion of the most affordable housing stock is occupied by households who could afford to spend more. As a result, many units that are affordable to lower income renters are not available to them. The affordable stock is nominally sufficient to house every household above 45 percent of AMI, yet the available stock does not match the number of renters until household incomes reach 70-75 percent of AMI.<sup>4</sup> This 70-percent balance point is about the same as it was in 2005 but is higher than the 65 percent of AMI that sufficed in 2003.

The Affordable, Available, and Adequate line in Exhibit 3-1 shows that excluding physically inadequate units further reduces the sufficiency of the rental housing stock. Even for renters with low incomes up to 80 percent of median, only 95 adequate units are available per 100 renters. The adequate stock is not fully sufficient for demand until those units affordable only above 115 percent of AMI are included.<sup>5</sup>

## **Rental Stock by Income**

Fewer affordable units are available to households with the lowest incomes. Exhibit 3-2 illustrates this by presenting the housing stock measures for the standard income groups used in this report. There is a mismatch between the number of extremely low-income renters and the number of affordable units available to them. There are only 76.2 affordable units for every 100 extremely low-income households. The ratio of available units is about three-fifths as great, at 44.2 units per 100 households. If physically adequate units are required, only 37.4 are available per 100 extremely low-income households.

<sup>&</sup>lt;sup>4</sup> This statement interprets the horizontal difference between the Affordable and the Affordable/Available line, which can be understood as showing the income levels of families who are "displaced" by higher income households. The preceding example reflects the vertical difference between the lines, which represents the difference between nominal and available supply of affordable units for households of a given income level.

<sup>&</sup>lt;sup>5</sup> The 2007 AHS dropped certain questions related to the state of common hallways, which had previously been included in the overall adequacy measure. Consequently, it is likely that some units are rated as adequate in 2007, which would not have been so rated in 2005. This is particularly true for apartments in larger structures.

<sup>&</sup>lt;sup>6</sup> Research based on the Residential Finance Survey indicates that 12 percent of units with gross rents of \$400 or less produced negative net operating income, suggesting they are heading for demolition or conversion to nonresidential use (Joint Center for Housing Studies 2006, 24).

Exhibit 3-2. Rental Housing Stock by Income Category, 2007

	Housing Units per 100 Households				
Income	Affordable	Affordable and Available	Affordable, Available, and Adequate		
Extremely low-income renters (0–30% AMI)	76.2	44.2	37.4		
Very low-income renters (0–50% AMI)	112.9	73.9	66.5		
Low-income renters (0-80% AMI)	139.8	105.5	95.4		

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

At the very low-income level there are enough units overall to house all renters, but there is a mismatch of available units here as well. There are only 74 available units for every 100 very low-income households, and fewer than 67 that are also physically adequate. At the higher levels of income, the available rental stock is sufficient to house all renters, though a small proportion of units have physical problems.

Exhibit 3-3 illustrates that the supply of affordable housing stock rose between 2005 and 2007 relative to extremely low-income households but fell relative to very low-income households. The overall supply of affordable units per 100 extremely low-income renters increased by more than 8 units, from 67.6 to 76.2. For the same population, the deficiency in available units eased by more than 4 units per 100 renters, from 39.9 to 44.2. On the other hand, very low-income renters experienced decreases in the stock under both the affordable measure (4 units) and the available measure (almost 3 units). Taking a somewhat longer view, the changes from 2003 are generally in the direction of reduced supply, although the number of affordable and available units for extremely low-income households is basically unchanged. Very low-income households experienced a larger reduction in supply than did extremely low-income households during the 2003-to-2007 period.

Exhibit 3-3. Trend in Rental Housing Stock by Income Category, 2003–2007

	Housing Units per 100 Households				
		Change			
	2003	2005	2007	2003-07	2005–07
Extremely low-income renters (0-30% AMI)					
Affordable	78.2	67.6	76.2	- 2.0	+ 8.6
Affordable and available	44.0	39.9	44.2	+ 0.2	+ 4.3
Very low-income renters (0–50% AMI)					
Affordable	127.0	117.1	112.9	- 14.1	- 4.2
Affordable and available	81.4	76.7	73.9	- 7.5	-2.8

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

#### **Rental Stock by Location**

Deficiencies in the affordable and available stock are less severe in nonmetropolitan areas, as Exhibit 3-4 illustrates. The available stock is larger in nonmetropolitan areas at all levels of income above 15 percent of AMI, reaching the one-unit-per-household ratio around 60-65 percent of AMI, compared with 70-75 percent of AMI for cities and suburbs.

The similar profiles of the city and suburb lines in Exhibit 3-4 show that on average, central cities and suburbs have about the same proportion of units available for every 100 renters at all income levels.

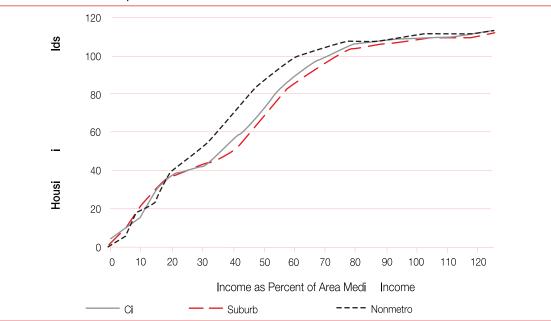


Exhibit 3-4. Nonmetropolitan Areas Have More Available Rental Units Than Cities and Suburbs

Exhibit 3-5 summarizes the sufficiency patterns among cities, suburbs, and nonmetropolitan areas. Notably, although cities and suburbs display comparable available-unit-ratios—with slightly more than 40 units for every 100 extremely low-income renters and 68–72 units for every 100 very low-income renters—the underlying supply of affordable units is more constrained in central cities than in suburbs. The difference between the Affordable and the Available estimates implies that in cities, higher income households occupy about 30 units that would be affordable at very low incomes. Comparable displacement figures are 43 units in suburbs and 53 units in non-metropolitan areas.

**Exhibit 3-5.** Rental Housing Stock by Income Groups in Central Cities, Suburbs, and Nonmetropolitan Areas, 2007

	Hous	useholds		
Income	Affordable	Affordable and Available	Affordable, Available and Adequate	
Central Cities				
Extremely low-income renters (0-30% AMI)	60.7	41.4	36.0	
Very low-income renters (0-50% AMI)	102.7	72.3	64.1	
Low-income renters (0-80% AMI)	133.9	105.5	94.3	
Suburbs				
Extremely low-income renters (0-30% AMI)	79.1	42.7	39.5	
Very low-income renters (0–50% AMI)	110.6	68.1	62.8	
Low-income renters (0-80% AMI)	146.5	104.3	96.1	
Nonmetropolitan Areas				
Extremely low-income renters (0–30% AMI)	108.4	53.0	48.7	
Very low-income renters (0-50% AMI)	139.7	86.7	78.0	
Low-income renters (0-80% AMI)	141.5	107.4	96.7	

AMI = Area Median Income.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

Exhibit 3-6 examines how affordability ratios and availability ratios changed across central cities, suburbs, and non-metropolitan areas during the 2003-to-2007 period. The key finding is that while the sufficiency of affordable and available units improved during the 2005-to-2007 period for every category of urbanization and income level, the opposite is true over the longer 2003-to-2007 period.

Nonmetropolitan areas show smaller improvements over during the 2005-to-2007 period and larger declines during the 2003-to-2007 period than do central cities and suburbs. Thus, although nonmetropolitan areas continue to have more favorable supply conditions, their relative advantage has declined.

The very low-income category shows the smallest improvements during the 2005-to-2007 period and the largest declines during the 2003-to-2007 period compared with the other two income categories. Although the extremely low-income category can hardly be said to have a satisfactory supply, its relative dearth has eased somewhat, particularly in the suburbs, where it shows the only improvement in affordable and available stock during the 2003-to-2007 period.

**Exhibit 3-6.** Trend in Rental Housing Stock by Income Groups in Central Cities, Suburbs and Nometropolitan Areas, 2003–2007

			Affordabl	е			Afforda	ble and A	vailable	
	Но	using Uni	ts per 10	0 Househo		Ho	using Uni	ts per 100	Househo	
	2003	2005	2007	Differ 2003–07		2003	2005	2007		rence 2005–07
Central Cities	2000	2000	2001	2000 01	2000 01	2000	2000	2001	2000 01	2000 01
Extremely low- income renters (0–30% AMI)	65.6	52.2	60.7	-4.9	8.5	43	31.8	41.4	-1.6	9.6
Very low- income renters (0–50% AMI)	120.3	106.1	102.7	-17.6	-3.4	81.5	64.1	72.3	-9.2	8.2
Low-income renters (0–80% AMI)	137.4	133.9	133.9	-3.5	0.0	107.7	93.6	105.5	-2.2	11.9
Suburbs										
Extremely low- income renters (0–30% AMI)	74.5	66.7	79.1	4.6	12.4	39.1	32.4	42.7	3.6	10.3
Very low- income renters (0–50% AMI)	121.2	113.9	110.6	-10.6	-3.3	73.3	64.6	68.1	-5.2	3.5
Low-income renters (0–80% AMI)	149.6	145.3	146.5	-3.1	1.2	106.9	96.7	104.3	-2.6	7.6
Nonmetro- politan areas	140.0	140.0	1-10.0	0.1	1.2	100.0	00.7	10-1.0	2.0	7.0
Extremely low- income renters (0–30% AMI)	121.4	106.1	108.3	-13.1	2.2	56.7	49.4	53.0	-3.7	3.6
Very low- income renters (0–50% AMI)	160.3	148.9	139.7	-20.6	-9.2	97.6	82.6	86.7	-10.9	4.1
Low-income renters (0–80% AMI)	155.1	140.9	141.5	-13.6	0.6	115.6	98.3	107.4	-8.2	9.1

AMI = Area Median Income.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

Exhibit 3-7 details the affordable, available, and physically adequate stock relative to renter populations in the four regions for each of the standard income categories. The West has the greatest mismatch, with considerably fewer units for every 100 households than the other three regions have.

Exhibit 3-7. Rental Housing Stock by Region and Income Category, 2007

	Housing Units per 100 Households		
Income	Affordable	Affordable and Available	Affordable, Available, and Adequate
Northeast			·
Extremely low-income renters (0–30% AMI)	73.1	47.8	42.2
Very low-income renters (0–50% AMI)	103.8	71.4	64.1
Low-income renters (0-80% AMI)	132.7	100.0	89.7
Midwest			
Extremely low-income renters (0–30% AMI)	75.8	45.3	42.9
Very low-income renters (0–50% AMI)	139.8	92.6	85.9
Low-income renters (0-80% AMI)	146.8	115.4	106.4
South			
Extremely low-income renters (0–30% AMI)	84.3	46.3	40.5
Very low-income renters (0-50% AMI)	118.1	74.7	65.4
Low-income renters (0-80% AMI)	145.6	108.6	97.6
West			
Extremely low-income renters (0-30% AMI)	68.2	36.0	32.5
Very low-income renters (0–50% AMI)	88.1	56.9	51.6
Low-income renters (0-80% AMI)	131.1	96.3	86.8

#### **Sufficiency Relative to Fair Market Rent**

HUD establishes, for every housing market, a Fair Market Rent (FMR) that is intended to represent the cost of decent existing housing that is neither new, nor luxury, nor subsidized. The FMR is used in the largest housing assistance program, Housing Choice Voucher Program, to determine the maximum level of subsidy for assisted households. It is also used in other contexts as an indicator of reasonable housing costs in a given area. A natural question is whether the stock of housing renting for less than the FMR is adequate to meet the needs of households that can afford to pay no more than the FMR.

Exhibit 3-8 illustrates that the rental stock is insufficient using the FMR standard as well. Although enough affordable units exist in each region, the number of available units in each region is sufficient to house only 83–90 percent of the households that can afford rents no higher than the FMR.

<sup>&</sup>lt;sup>7</sup> In general, the FMR is the 40th percentile rent paid by recent movers for standard-quality units within each region. For further information, see http://www.huduser.org/datasets/fmr.html.

Exhibit 3-8. Rental Stock of Below-FMR Units, 2007

	Households (thousands)		Housing Units (thousands)			Housing Units per 100 Households Affordabl		
		Affordable	Affordable and Available	Affordable, Available, and Adequate	Affordable	Affordable and Available	Available, and Adequate	
All	20,097	23,627	17,017	15,329	117.6	84.7	76.3	
Northeast	4,478	5,153	3,912	3,497	115.1	87.4	78.1	
Midwest	3,842	4,826	3,451	3,182	125.6	89.8	82.8	
South	6,641	7,879	5,499	4,878	118.6	82.8	73.5	
West	5,135	5,769	4,155	3,773	112.3	80.9	73.5	
Cities	9,246	10,312	7,876	6,980	111.5	85.2	75.5	
Suburbs	6,946	8,316	5,754	5,300	119.7	82.8	76.3	
Nonmetropolitar areas	3,905	4,998	3,387	3,049	128.0	86.7	78.1	

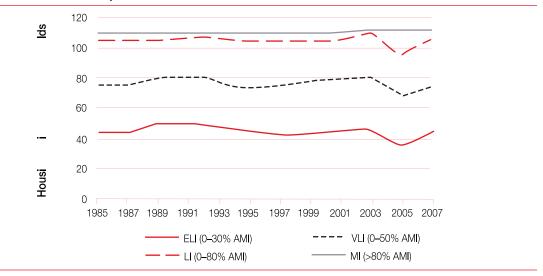
FMR = Fair Market Rent.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

#### **Trends in Rental Stock**

Through 2007, the availability of the affordable rental stock has been relatively stable for more than two decades. Exhibit 3-9 shows the available rental units for every 100 households for the four standard income categories during the 1985-to-2007 period.<sup>8</sup>

Exhibit 3-9. Availability of Affordable Rental Units, 1985–2007



<sup>&</sup>lt;sup>8</sup> This figure is based on custom tabulations of the American Housing Survey national data sets for odd-numbered years in the period.

Availability turned downward in 2005 for renters of all income groups below 80 percent of AMI, but most of the losses were recovered in 2007. Middle-income renters continued to experience stable supply during the 2003-to-2007 period.

Exhibit 3-10 examines the factors responsible for the change in the availability of affordable units from 2005 to 2007. The HUD income limits rose by approximately 5 percent during the period, although median household income (as measured in the AHS) rose about 5.25 percent. Other things being equal, this implies that a larger proportion of households would be in the higher income categories in 2007 than in 2005. Table 3-10 supports this implication; it shows decreases in the number of extremely low-income and very low-income households, although the very low-income decrease is much smaller in percentage terms. At the same time, the number of housing units affordable and available to extremely low-income households rose by 6 percent, but the proportion affordable and available to very low-income households

Exhibit 3-10. Factors Explaining Changes in Rental Housing Availability Rate, 2005–2007

	Extremely Low-					
	Income Units (30% AMI)	Very Low-Income Units (50% AMI)	Low-Income Units (80% AMI)	All Units		
Cumulative hous	seholds (thousands	)				
2005	9,982	16,324	23,812	33,951		
2007	9,555	16,251	23,902	35,054		
Percent change	- 4.28	- 0.45	+ 0.38	+ 3.25		
Cumulative affordable and available housing units (thousands)						
2005	3,982	12,539	25,400	37,924		
2007	4,224	12,011	25,207	39,330		
Percent change	+ 6.08	- 4.21	- 0.76	+ 3.71		
Income limit (median, current dollars)						
2005	14,804	24,665	39,402	NA		
2007	15,500	25,850	41,200	NA		
Percent change	+ 4.70	+ 4.80	+ 4.56	NA		
Median househo	ld income (all rente	ers, current dollars)				
2005				26,000		
2007				27,364		
Percent change				+ 5.25		
Median monthly housing cost (all renters, current dollars)						
2005				672		
2007				722		
Percent change				+ 7.44		

AMI = Area Median Income. NA = data is not available.

<sup>&</sup>lt;sup>9</sup> Note that AMI is calculated on the basis of all households, not just renters.

fell by 4.21 percent. As a consequence, the relative supply of affordable and available units for extremely low-income households rose but that of affordable and available units for extremely low-income households fell, as exhibit 3-3 illustrated.

The reason for the difference between changes in extremely low-income and very low-income units is not clear. The median monthly housing cost for all rental units rose 7 percent between 2005 and 2007, which would imply a general reduction in the affordable stock. Preliminary analysis of the dynamics of the rental housing stock during the period, however, suggests that the extremely low-income stock gained from rental units filtering downward in cost, while the stock of strictly very low-income units<sup>10</sup> experienced a net decline from filtering. In addition, the very low-income stock experienced a net loss of about 5 percent from units entering and leaving the rental stock,<sup>11</sup> while the net change in the extremely low-income stock from these sources was essentially zero.<sup>12</sup>

## Changes in Rental Stock, 2005 to 2007, by Affordability Categories

Additional evidence of the supply of affordable rental housing can be drawn from the HUD report, Rental Market Dynamics: 2005–2007 (June 2009). 13 Exhibit 3-11 shows the change in rental units affordable to various income groups. Units are grouped into eight categories of affordability. At the lower end of the rent scale these groups include: non-market (either no cash rent or a subsidized rent), extremely low rent (affordable to renters with incomes that are less than 30 percent of the area median income), very low rent (affordable to renters with incomes between 30 and 50 percent of area median income), low rent (affordable to renters with incomes between 50 and 60 percent of area median income), and moderate rent (affordable to renters with incomes within 60 to 80 percent of area median income).

Between 2005 and 2007, there was an increase in the overall U.S. rental stock of 1.4 million units (3.7 percent increase). However, at the lower end of the affordability scale, there was a large net loss of 1.14 million affordable units (10.8 percent) in the "very low rent" group—those rental units affordable to families between 30 and 50 percent of area median income. These data show that overall changes in rental housing do not always directly benefit all segments of the stock itself.

<sup>&</sup>lt;sup>10</sup> That is to say, units affordable at the very low income threshold, but not affordable at the extremely low income threshold.

<sup>&</sup>lt;sup>11</sup> This would include new construction, demolition, conversion to and from owner-occupied status, conversion to and from nonresidential use, and so on.

<sup>&</sup>lt;sup>12</sup> See "Rental Market Dynamics, 2005–2007," (June 2009), prepared by Frederick J. Eggers and Fouad Moumen http://www.huduser.org/portal/datasets/cinch/cinch07/Rental\_Mrkt\_05-07.pdf

<sup>&</sup>lt;sup>13</sup> "Rental Market Dynamics, 2005–2007," (June 2009). It is important to note that the weights used in the Rental Market Dynamics report may differ from those used elsewhere in this report and thus unit counts cited here may not always be directly comparable to this report's unit counts.

Exhibit 3-11. Rental Units by Affordability Categories, 2005–2007 (thousands)

Affordability Categories	Rental Units in 2005	Rental Units in 2007	Change	Percent Change
Nonmarket	8,363,000	8,186,000	-177,000	-2.1
Extremely low rent	2,262,000	2,201,000	-61,000	-2.7
Very low rent	10,566,000	9,429,000	-1,137,000	-10.8
Low rent	5,914,000	6,309,000	395,000	+ 6.7
Moderate rent	6,526,000	7,608,000	1,082,000	+ 16.6
High rent	1,916,000	2,367,000	451,000	+ 23.6
Very high rent	899,000	1,385,000	486,000	+ 54.0
Extremely high rent	1,473,000	1,840,000	366,000	+ 24.9
Total	37,919,000	39,324,000	1,405,000	+ 3.7

Source: American Housing Survey Rental Market Dynamics: 2005-2007 (HUD PD&R, 2009)

#### **Crowding**

While crowding (defined as more than one person per room) is not a component of the definition of worst case housing needs, 14 it can be a symptom of affordability problems and housing-related stress. Households may double up, and young adults or couples may delay forming new households, because of an inability to afford their own units. This section examines the extent of crowding by income and location as well as the supply of large units relative to the number of large households. 15

Overall about 4.3 percent of renter households are crowded, as shown in Exhibit 3-12. The incidence of crowding is significantly lower in non-metropolitan areas, 3.2 percent, and higher in central cities, 5.1 percent. On a regional basis, the Midwest has substantially less crowding, 2.2 percent, and the West has substantially more (7.0 percent). These regional and metropolitan patterns match the ordering of the affordable and available stock ratios by metropolitan status and region, as illustrated in Exhibits 3-5 and 3-7. These parallels reinforce the hypothesis that crowding is a strategy for coping with reduced affordability.

These patterns are slightly improved from 2005, when the overall incidence of crowding was 4.8 percent. The incidence of crowding by region and metropolitan status has fallen about in proportion for all categories, leaving the relative incidence unchanged.

<sup>&</sup>lt;sup>14</sup> Crowding is classified as a moderate problem rather than a severe problem.

<sup>&</sup>lt;sup>15</sup> For a more thorough discussion of crowding and its measurement using AHS data, see Blake, Kevin S. and Kellerson, Rebecca. *Measuring Overcrowding in Housing*. Prepared for the U.S. Department of Housing and Urban Development, Office of Policy Development and Research by ICF Consulting. September 2007. http://www.huduser.org/publications/pdf/Measuring\_Overcrowding\_in\_Hsg.pdf.

Exhibit 3-12. Geographic Pattern of Crowded Renter Households, 2007

	Households (thousands)	Incidence per 100 Households
All areas	1,511	4.31
Metropolitan status		
Central cities	772	5.12
Suburbs	516	3.99
Nonmetropolitan areas	222	3.16
Region		
Northeast	290	4.10
Midwest	157	2.21
South	445	3.68
West	619	7.04

Larger households are much more likely than smaller households to be crowded. Exhibit 3-13 shows a substantially greater incidence of crowding among households with five or more persons, with 41 percent of such large households being crowded. Indeed, a renter household with five or more members is about eight times more likely to be crowded than a renter household with four persons.

Despite the inverse relationship between income and crowding, extremely low-income households show less crowding than very low-income households do. The explanation is that extremely low-income households are more likely to be one-person households, which by definition cannot be crowded.

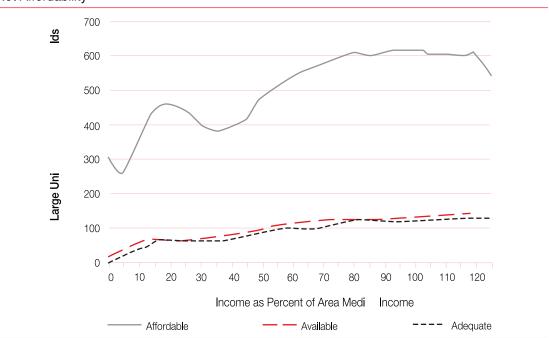
Exhibit 3-13. Characteristics of Crowded Renter Households, 2007

	Households (thousands)	Incidence per 100 Households
All	1,511	4.31
Income*		
Extremely low-income renters (≤30% AMI)	515	5.57
Other very low-income renters (30–50% AMI)	437	6.52
Other low-income renters (50-80% AMI)	318	4.15
Middle-income renters (>80% AMI)	241	2.11
Household size		
One person	NA	NA
Two persons	69	0.74
Three persons	29	0.55
Four persons	205	5.04
Five or more Persons	1,207	40.94

AMI = Area Median Income. NA = data not available.

<sup>\*</sup>Income categories in this table exclude lower income subsets.

Crowding experienced by large families is not caused simply by a lack of large units. The number of affordable large units is abundant relative to the number of large households. In Exhibit 3-14, the Affordable line is entirely above the 100-units-per-large-household line that denotes sufficient stock; in fact, the number of affordable units with five or more rooms is two to five times larger than the number of households with five or more persons.



**Exhibit 3-14.** Insufficiency of Large Units is Primarily a Problem of Availability for Large Families, Not Affordability

The main cause of crowding must be the lack of available affordable units. Thus, crowding does not appear to be caused by a lack of large units, but by the fact that smaller households prefer these units as well and keep them off the market. In addition, large units may be concentrated in certain areas, so that they are not available to large households in other areas.

Exhibit 3-15 summarizes the supply of rental units with five or more rooms relative to households with five or more persons. Even at 30 percent of AMI, there are 396.4 large units available for every 100 large renter households, and this increases to 602.6 per 100 for middle income renters; however, only 64.3 units are *available* per 100 extremely low-income households that need large units. Even for very low-income renters, there are only 86.4 units per 100 households.

In terms of crowding experienced by families of different racial and ethnic types, Hispanic renter households are more likely to be crowded. In 2007, 9.5 percent of very low-income Hispanic households have no severe problems yet are overcrowded according to the one-person-per-room benchmark (Appendix, Table A-9). The corresponding values are 1.2 percent for Non-Hispanic White households and 2.8 percent for Non-Hispanic Black households. Hispanic families are more likely to live in multi-

**Exhibit 3-15.** Metropolitan Patterns of Supply of Large Units for Large Households (five or more persons and five or more rooms only), 2007

	Units per 100 Large Households				
	Affordable	Affordable and Available	Affordable, Available, and Adequate		
Nation		7.1.			
Extremely low-income renters (0–30% AMI)	396.4	64.3	61.5		
Very low-income renters (0-50% AMI)	479.5	86.4	81.9		
Low-income renters (0–80% AMI)	602.6	122.9	116.2		
Central Cities					
Extremely low-income renters (0–30% AMI)	236.7	48.2	44.8		
Very low-income renters (0-50% AMI)	366.0	76.2	71.6		
Low-income renters (0-80% AMI)	497.4	115.5	108.6		
Suburbs					
Extremely low-income renters (0–30% AMI)	477.0	78.0	76.5		
Very low-income renters (0-50% AMI)	481.7	82.0	79.8		
Low-income renters (0-80% AMI)	646.7	119.6	115.6		
Nonmetropolitan areas					
Extremely low-income renters (0-30% AMI)	705.1	87.9	84.8		
Very low-income renters (0-50% AMI)	768.8	120.3	112.2		
Low-income renters (0–80% AMI)	775.7	146.4	135.3		

AMI = Area Median Income.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

generational households in non-caregiving relationships (U.S. Census Bureau, 2003). Non-Hispanic Blacks, and especially Whites, are less likely to live in this arrangement<sup>16</sup> and much less likely to be overcrowded.

The importance of this association is compounded by the fact that Hispanics represent the fastest-growing segment of the U.S. population. The Hispanic population increased by 58 percent between 1990 and 2000, and is projected to increase another 34 percent by 2010 (U.S. Census Bureau, 2004).

Thus the availability of large units in regions where the Hispanic population is large is worthy of consideration.

Hispanics are concentrated in the West, as 43 percent of the Hispanic population lived there in 2000 (U.S. Census Bureau, 2001). The West also is the region where the incidence of crowding is two-thirds greater than any other region (Exhibit 3-11) and it has the most severe shortage of affordable units for very low-income households, with only 56.9 units available for every 100 very low-income households (Exhibit 3-7).

<sup>&</sup>lt;sup>16</sup> While 8 percent of both black and Hispanic adults over 30 were grandparents living with their grandchildren in 2000 (compared with 2 percent of non-Hispanic whites over 30), only 35 percent of these Hispanic grandparents lived there to care for the grandchildren, compared with 52 percent of the black grandparents (U.S. Census Bureau 2003).

Exhibit 3-16 shows that for every 100 large very low-income renter households in the West, only 43.1 large units are available. The availability of large affordable units is substantially more limited in the West than in other regions. The number of large units available for very low-income renters is fully sufficient in the Midwest and nearly so in the South, at least on a regional basis.

**Exhibit 3-16.** Regional Patterns of Supply of Large Units for Large Households (five or more persons and five or more rooms only), 2007

	Units per 100 Large Households				
	Affordable	Affordable and Available	Affordable, Available, and Adequate		
Northeast					
Extremely low-income renters (0–30% AMI)	379.9	65.4	57.2		
Very low-income renters (0–50% AMI)	520.2	80.5	74.2		
Low-income renters (0-80% AMI)	651.2	104.9	95.8		
Midwest					
Extremely low-income renters (0–30% AMI)	469.5	71.6	69.5		
Very low-income renters (0–50% AMI)	710.7	139.2	133.3		
Low-income renters (0-80% AMI)	817.9	181.8	173.6		
South					
Extremely low-income renters (0–30% AMI)	415.8	73.7	71.7		
Very low-income renters (0–50% AMI)	498.8	93.6	88.5		
Low-income renters (0-80% AMI)	647.1	143.9	136.8		
West					
Extremely low-income renters (0–30% AMI)	323.6	43.1	43.1		
Very low-income renters (0–50% AMI)	284.5	47.6	46.0		
Low-income renters (0–80% AMI)	396.1	72.7	68.7		

AMI = Area Median Income.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data

#### **Summary**

One way to assess the condition of the market for affordable rental housing is to compare, on a cumulative basis, the number of affordable units with the number of renters relative to their income levels. This chapter has presented three such ratios, based on (1) affordable units, (2) affordable units that also are occupied by such renters or are available for rent, and (3) affordable and available units that also are in physically adequate condition.

Nationwide in 2007, there existed a rental unit that would have been affordable for every renter household with income above 45 percent of area median income. This is about what it was in 2005. However, the comparable figure in 2003 was 40 percent, implying that the affordable rental stock decreased relative to the number of households in this critical very low-income range.

The number of affordable units that are actually available to households with the lowest incomes was substantially fewer than the number of apparently affordable units because many affordable units were rented to higher income families. Employing the Availability measure, the national supply of affordable units per renter household does not become sufficient until household incomes reach 70 percent of AMI.

Available units become progressively harder to obtain at lower income levels. While there were 113 affordable units available per 100 low-income renters in 2007, the availability ratio was only 74 per 100 very low-income renters and 44 per 100 extremely low-income renters. National measures of affordability and availability do not fully reflect the regional concentrations or shortages of units relative to households. Nonmetropolitan areas have more affordable and available rental units than cities or suburbs. However, the immobility of housing makes such units inaccessible for very low-income renters who need them near their families and employment. In addition, larger households are much more likely than smaller households to be crowded, and large units also are distributed in areas where they are unavailable to large families.

A substantial proportion of available units are physically inadequate. Employing the additional criterion of physical adequacy, the number of available units in 2007 was reduced from 74 to 67 units per 100 very low-income renters, and from 44 to 37 units per 100 extremely low-income renters.

Occupancy by higher-income households restricts the supply of units renting for less than the Fair Market Rent to only about 85 percent of households who can afford only such units. This is about the same as the 84 units for every 100 households that were available in 2005 and an increase from the 79 units per 100 households that were available in 2003. The mixed change in availability of affordable units between 2005 and 2007 can be attributed to a modest decrease in renter households that interacted with differential filtering of the housing stock for extremely low-income and very low-income households. For very low-income renters, both affordability and availability ratios declined from 2005 to 2007, and they declined even more from 2003 to 2007. For extremely low-income renters, affordability and availability ratios improved from 2005 to 2007, although affordability is still below the levels recorded in 2003 and availability is no better than it was in 2003.

## **Chapter 4. Worst Case Needs and Neighborhoods**

#### **Poverty and Neighborhood Distress**

This chapter examines worst case needs renters and the neighborhoods where they live. The analysis examines the poverty levels of neighborhoods where worst case needs renters live, and compares their residential patterns with all U.S. households and other very low-income renters. The comparison includes a breakdown of residential living patterns across central cities, suburbs, and non-metropolitan areas.

Concentrated neighborhood poverty can have a significant impact on a household's well-being. For example, studies indicate that living in areas with poverty rates of 20 to 30 percent can have high social costs in terms of safety, quality of schools, municipal services, and access to employment opportunities. Evidence suggests that neighborhoods characterized by high concentrations of poverty of more than 40 percent can actually lead to a downward spiral of poverty for residents living there.<sup>1</sup>

This chapter divides neighborhoods into four basic categories based on the percentage of people in poverty: 0 to 10 percent in poverty, 10 to 20 percent in poverty, 20 to 30 percent in poverty, and 30 percent or greater in poverty.<sup>2</sup> Nationwide, one-half of all neighborhoods (census tracts) fall into the first category with low poverty rates and 30 percent of neighborhoods fall into the second category with moderate poverty rates of 10 to 20 percent. The other two categories with high poverty rates (20 to 30 percent and 30 percent or greater) each contain 10 percent of the nation's neighborhoods.<sup>3</sup>

In this chapter, the prevalence of worst case needs households in each of the four neighborhood categories is compared with other household residential patterns: for all households in general, for renters, and for all very low-income renters. This analysis sheds some light on the question of whether the severe rent burden of worst case needs households may be due to a lack of affordable housing or a decision on their part to accept severe rent burdens as the price of locating to better neighborhoods when lower cost options are available.

<sup>&</sup>lt;sup>1</sup> See, for example, Jargowsky (1997), Kingsley and Pettit (2003), "Areas of Concentrated Poverty: 1999" U.S. Census Bureau (2005), and Galster (2006).

<sup>&</sup>lt;sup>2</sup> "Neighborhoods" in this chapter are defined as census tracts. Census tracts generally have a population of between 1,500 and 8,000 people, with an optimum size of 4,000 people. Poverty rates in this chapter are calculated excluding college students, because the presence of students in some areas may result in a tract appearing to be a high-poverty area while the poverty rates of year-round residents may be quite low.

<sup>&</sup>lt;sup>3</sup> The census tracts and appropriate neighborhood types are merged with the American Housing Survey (AHS) file. Weighting of the AHS sample provides estimates of housing units for each neighborhood and other specified categories

## **Worst Case Needs Households and Neighborhood Poverty Rates**

### National Neighborhood Characteristics and Residential Patterns

The first two exhibits in this chapter highlight basic characteristics of the different neighborhood types and enable comparison of residential patterns of worst case needs and other types of households nationally.

First, Exhibit 4-1 shows the four basic categories of neighborhoods by poverty rate and key socio-economic factors. These factors include percent of owner-occupied housing, unemployment, educational achievement of residents, income levels, and reported neighborhood crime. As shown in the Exhibit, the factors are closely related with the overall poverty rate of the neighborhood, providing a good indication that neighborhood poverty rate often reflects a whole host of other socio-economic issues. This outcome is supported by a substantial amount of research that shows important correlations between neighborhood well-being and poverty rates.

Exhibit 4-1. Neighborhood Characteristics

	< 10%	10–20%	20–30%	30% or >	Average
Neighborhood Characteristics <sup>a</sup>					
Population density <sup>b</sup>	3,906	6,825	11,868	17,005	6,233
Percent in owner-occupied housing	75.3	58.0	45.1	33.9	65.4
Percent unemployed <sup>c</sup>	3.7	6.4	9.9	15.5	5.7
Percent bachelors degree or higher	36.8	21.1	15.9	11.8	28.8
Average median family income	65,795	41,920	32,141	23,547	53,239
Central cities	68,120	43,537	32,026	23,096	49,050
Suburbs	68,681	43,274	32,912	24,660	61,175
Non-metropolitan areas	54,559	39,728	31,779	24,307	44,379
Percent of households that responded:					
Neighborhood has crime	12.0	16.3	24.2	32.0	15.5
Public elementary school is unsatisfactory	1.3	1.8	2.6	3.7	1.7

<sup>&</sup>lt;sup>a</sup> Average values of neighborhood characteristics are given for each neighborhood type. The statistics on educational attainment, neighborhood crime, and satisfaction with elementary schools are from the 2007 American Housing Survey (AHS). The remaining variables are from the 2000 Decennial Census.

Source: Census Bureau tabulations of 2007 AHS and 2000 Decennial Census data performed under contract to Department of Housing and Urban Development

<sup>&</sup>lt;sup>b</sup> Population per square mile.

<sup>&</sup>lt;sup>c</sup> The percent unemployed excludes college towns. It is from the 2000 Decennial Census and may vary from the Consumer Population Survey (CPS) measure of unemployment. The unemployment rate in 2007 was 4.6 percent.

Exhibit 4-2 shows the residential distribution of all households nationally across the four types of neighborhoods. It provides information on where renters and homeowners reside across the neighborhood types and whether these households are located within a central city or suburb of a metropolitan statistical area (MSA), or in a non-metropolitan area outside an MSA. This information will be useful for comparison with the chapter's later findings on the neighborhood distribution of worst case needs households. These data will be used to compare the neighborhood quality of worst case needs households with that of other households and renters.

Generally, the Exhibit shows that most of the poorer neighborhoods are located in central cities, and relatively few exist in suburban and non-metropolitan areas. The results show that 28 percent of all housing units in central cities are located in high-poverty neighborhoods. In comparison, only 6 percent of housing in the suburbs and only 14 percent of housing in non-metropolitan areas are located in neighborhoods with high levels of poverty. Nationwide, out of an estimated 16.6 million housing units located in poorer neighborhoods (greater than 20 percent poverty), more than one-half (8.7 million) are situated in central cities. In contrast, less than one-fifth (2.9 million) of housing units in high poverty neighborhoods are located in suburban areas and less than one-fourth (4.0 million) are found in non-metropolitan areas.

Exhibit 4-2. Distribution of Renter Households by Neighborhood Poverty and Metropolitan Status

	Census Tracts with Non-College Poverty Rates of:				
(Numbers in 1,000s)	< 10%	10–20%	20–30%	30% or >	Total
Central Cities					
Renters in central cities	4,311	5,172	2,653	2,955	15,091
percent of renters in central cities	28.6	34.3	17.6	19.6	100
All occupied housing units	12,677	9,980	4,500	4,242	31,399
percent of occupied units in central cities	40.4	31.8	14.3	13.5	100
Suburbs					
Renters in suburban areas	7,606	3,811	1,035	474	12,926
percent of renters in suburban areas	58.8	29.5	8.0	3.7	100
All occupied housing units	36,502	10,226	2,004	939	49,671
percent of occupied units in suburban areas	73.5	20.6	4.0	1.9	100
Non-Metropolitan Areas					
Renters in non-metropolitan areas	2,220	3,439	926	453	7,037
percent of renters in non-metropolitan areas	31.5	48.9	13.2	6.4	100
All occupied housing units	12,000	13,677	2,832	1,140	29,649
percent of occupied units in non-metro areas	40.5	46.1	9.6	3.8	100
National Total					
All renters	14,137	12,422	4,614	3,882	35,054
percent of all renters	40.3	35.4	13.2	11.1	100
All occupied housing units	61,179	33,883	9,336	6,321	110,719
percent of all occupied housing units	55.3	30.6	8.4	5.7	100

Source: Census Bureau tabulations of 2007 American Housing Survey and 2000 Decennial Census data performed under contract to Department of Housing and Urban Development

#### **Distribution of Worst Case Needs Households By Neighborhood Type**

Exhibit 4-3 illustrates where worst case needs households reside by neighborhood type, both nationwide and across central cities, suburbs and non-metropolitan areas. Nationally, 70.2 percent of worst case needs households live in neighborhoods with less than 20 percent poverty: 34.9 percent live in low poverty neighborhoods and 35.3 percent live in neighborhoods with moderate poverty rates. Nationally, 29.8 percent of worst case needs households reside in poorer neighborhoods with poverty rates greater than 20 percent, including 13.6 percent in neighborhoods with poverty rates greater than 30 percent.

**Exhibit 4-3.** Distribution of Worst-Case and Very Low-Income Renters by Neighborhood Poverty and Metropolitan Status

	Census Tracts with Non-College Poverty Rates of						
(Numbers in 1,000s)	< 10%	10–20%	20–30%	30% or >	Total		
Central Cities							
Worst-case renters	670	908	605	617	2,801		
as percent of all worst-case renters	23.9	32.4	21.6	22.0	100.0		
VLI renters	1,504	2,422	1,484	2,010	7,420		
as percent of all VLI renters	20.3	32.6	20.0	27.1	100.0		
Gap: % WCN > % all VLI renters	3.7	-0.2	1.6	-5.1			
Suburbs							
Worst-case renters	1,081	652	203	115	2,051		
as percent of all worst-case renters	52.7	31.8	9.9	5.6	100.0		
VLI renters	2,563	1,796	569	310	5,238		
as percent of all VLI renters	48.9	34.3	10.9	5.9	100.0		
Gap: % WCN > % all VLI renters	3.8	-2.5	-1.0	-0.3			
Non-Metropolitan Areas							
Worst-case renters	310	522	150	72	1,053		
as percent of all worst-case renters	29.4	49.6	14.2	6.8	100.0		
VLI renters	806	1,670	515	293	3,282		
as percent of all VLI renters	24.6	50.9	15.7	8.9	100.0		
Gap: % WCN > % all VLI renters	4.9	-1.3	-1.4	-2.1			
Total, All Areas							
Worst-case renters	2,061	2,082	958	804	5,905		
as percent of all worst-case renters	34.9	35.3	16.2	13.6	100.0		
VLI renters	4,873	5,887	2,568	2,613	15,940		
as percent of all VLI renters	30.6	36.9	16.1	16.4	100.0		
Gap: % WCN > % all VLI renters	4.3	-1.7	0.1	-2.8			

Source: Census Bureau tabulations of 2007 American Housing Survey and 2000 Decennial Census data performed under contract to Department of Housing and Urban Development

Further analysis by central cities, suburbs, and non-metropolitan areas provides some interesting findings. Worst case needs households are much more concentrated in high poverty neighborhoods in central cities and much less so in both suburbs and non-metropolitan areas. Although most of the 56.3 percent of worst case households in central cities still reside in neighborhoods with less than 20 percent poverty, the 43.6 percent of the distribution that live in high poverty areas is much higher than the national average of 29.8 percent of all worst case needs households that live in such areas nationally.

The suburban and non-metropolitan areas have much lower proportions of worst case households, 15.5 and 21.0 percent, respectively, in their high poverty neighborhoods. These lower rates in both suburban and non-metropolitan areas reflect the fact that far fewer housing units overall are located in high poverty neighborhoods in these geographic areas, as shown in Exhibit 4-2.

The remainder of this chapter compares the residential patterns of worst case needs renters with those of all U.S. households, all renters, and very low-income renters overall.

#### **Comparison With All U.S. Households and Renters**

The comparison of worst case needs renters shown in Exhibit 4-3 with all renters and homeowners shown in Exhibit 4-2 illustrates that a considerably higher portion of worst case needs households live in high poverty neighborhoods. The 29.8 percent of worst case needs households that reside in neighborhoods with poverty rates greater than 20 percent is disproportionately higher than the 24.3 percent of all renter households and the 14.1 percent of all households. In contrast, the low-poverty neighborhoods include only 34.9 percent of worst case households, despite containing 40.3 percent of all renters and 55.3 percent of all households. These results might be expected because the concentration of worst case needs households in neighborhoods with high poverty rates reflects the lower rents that typically exist in poorer neighborhoods.

#### **Comparison With All U.S. Very Low-Income Renter Households**

How the neighborhood quality of worst case needs households compares with that of all very low-income renters is also of great interest. Because worst case needs households are very low-income renters themselves, one might expect their choice of neighborhoods within each locality to be roughly consistent with very low-income renters overall. Indeed, the distribution of very low-income renters presented in Exhibit 4-3 shows a very similar distribution to worst case needs households among the different neighborhood types.

The residential patterns of worst case needs renters also track very similarly to those of very low-income renters overall in each of the three types of geography considered: central cities, suburbs, and non-metropolitan areas. In central cities, 43.6 percent of worst case needs households live in neighborhoods with poverty rates of 20 percent or more. This rate is only slightly below the 47.1 percent rate of all very low-income

renters who live in these areas. Housing is relatively less expensive in neighborhoods with high rates of poverty, but worst case needs households still experience severe rent burden living there.

As discussed previously, the suburbs and non-metropolitan areas present a very different picture. Much lower percentages of worst case needs households reside in high-poverty neighborhoods in the suburbs and non-metropolitan areas because few of these types of neighborhoods exist in these geographic areas. In suburban areas approximately one-half of both worst case needs households and renters with very low incomes live in neighborhoods with the lowest poverty rates. These high percentages of very low-income renters in low-poverty neighborhoods reflect the fact that numerous suburban areas have few neighborhoods with high poverty rates. As a result, the only suburban residential options that very low-income renters have are likely to be located in low-poverty neighborhoods, but cause them severe rent burdens.

In non-metropolitan areas, nearly 30 percent of worst case needs households live in low poverty neighborhoods and about one-half of both worst case needs households and all very low-income renters live in neighborhoods with moderate poverty levels. Similar to suburban areas with low-poverty neighborhoods, numerous non-metropolitan areas consist predominantly of neighborhoods with moderate poverty rates and few high poverty ones. These areas, therefore, present very low-income renters with few choices about whether to lease housing that would result in a very high rent burden.

One interesting difference between worst case needs households and very low-income renters overall is the small national gap of 4.3 percentage points between the proportion of worst case needs households (34.9 percent) and that of all very low-income renters (30.6 percent) residing in low poverty areas. Although very small, this difference seems to show that worst case needs renters are slightly more likely to live in low poverty neighborhoods than very low-income renters overall. However, when renter households receiving government housing assistance are taken into account, the 4.3 percentage difference is reduced to only 1.4 percent (which is not statistically significant). This is because assisted households tend to be more concentrated in higher poverty neighborhoods for a variety of reasons, including the locations where public housing was constructed decades ago (Table A-15 in Appendix A shows more detail). This analysis thus does not provide support for the contention that worst case needs households in the aggregate are incurring severe rent burdens as a result of "strategic behavior" to locate in better neighborhoods.

As stated, a goal of this chapter is to explore the question of whether worst case needs households may be incurring severe rent burdens as a strategic decision to "buy up" into better quality neighborhoods. Overall, the data presented in this chapter do not provide much support for that contention. Rather, there is significant evidence that the lack of affordable housing, regardless of location, is the reason why households with worst case needs experience severe rent burden.

#### **Summary**

This chapter examined the extent to which worst case needs households are living in distressed neighborhoods. It also explored the related question of whether worst case needs households incurred severe rent burdens in order to live in low-poverty neighborhoods.

A majority of worst case needs households live in lower poverty areas. However, a considerably higher percentage of worst case needs households live in high-poverty neighborhoods compared with all U.S. households overall. Nearly one-third of households with worst case housing needs were living in high-poverty neighborhoods in 2007 compared with less than one-fourth of all renters and less than 15 percent of all households.

More than 40 percent of worst case needs households in central cities live in high-poverty neighborhoods. Even in high-poverty neighborhoods, where housing is less expensive, worst case needs households still incur severe rent burdens living there.

The prevalence of worst case needs households in the four neighborhood types classified by poverty level corresponds very closely to that of very low-income renters. This was true even though worst case needs households share the same income group as very low-income renters but sustain severe rent burdens. In very low-poverty neighborhoods nationally, only a 4.3-percentage point disparity was found in the concentration of worst case needs households compared with very low-income renters.

For worst case needs households in low-poverty neighborhoods, no strong evidence supported the hypothesis that, overall, they incurred severe cost burdens in order to live in those more favorable neighborhoods.

# **Chapter 5. Background and Methodology**

Since 1991, the Department of Housing and Urban Development (HUD) has issued regular reports to Congress on worst case needs for housing assistance among the nation's very low-income renters. These reports developed from requests from Congressional Committees in the 1980s for information on housing needs. In 1990, the U.S. Senate Appropriations Committee directed HUD to "resume the annual compilation of a worst case housing needs survey of the United States... [to estimate] the number of families and individuals whose incomes fall 50 percent below an area's median income, who either pay 50 percent or more of their monthly income for rent, or who live in substandard housing." This report is the twelfth in a series of Worst Case Needs reports to Congress, prepared by HUD's Office of Policy Development and Research.

Households with worst case needs are defined as unassisted renters with very low incomes (below 50 percent of the area median income) who pay more than one-half of their income for housing or live in severely substandard housing. HUD originally developed the definition of worst case needs in consultation with the Office of Management and Budget and Congressional Committees. It was based on the federal preference rules that prioritized admissions for housing assistance programs in the 1980s and early 1990s. To assess changes over time, HUD has retained this consistent definition of worst case needs for affordable housing.

Although federal preferences for housing assistance have been repealed, the current definition of worst case needs is still highly useful. As stated, a consistent definition makes it possible to assess changes over time, and severe rent burden and physical adequacy of living conditions remain key indicators of the overall need for safe and affordable housing.

These publications are available on line at http://www.huduser.org.

<sup>&</sup>lt;sup>1</sup> Committee Report to accompany H.R. 5158, The VA-HUD Appropriations Act for FY 1991 (S. Rpt. 101-474).

<sup>&</sup>lt;sup>2</sup> HUD's previous reports to Congress about worst case housing needs are as follows:

Priority Problems and "Worst Case" Needs in 1989 (June 1991, HUD-1314-PDR).

The Location of Worst Case Needs in the Late 1980s (December 1992, HUD-1387-PDR).

Worst Case Needs for Housing Assistance in the United States in 1990 and 1991 (June 1994, HUD-1481-PDR).

Rental Housing Assistance at a Crossroads: A Report to Congress on Worst Case Housing Needs (March 1996).

<sup>•</sup> Rental Housing Assistance—The Crisis Continues (April 1998).

Rental Housing Assistance—The Worsening Crisis: A Report to Congress on Worst Case Housing Needs (March 2000).

A Report on Worst Case Housing Needs in 1999: New Opportunity Amid Continuing Challenges, Executive Summary (January 2001).

Trends in Worst Case Needs for Housing, 1978–1999 (December 2003).

Affordable Housing Needs: A Report to Congress on the Significant Need for Housing (December 2005).

Affordable Housing Needs 2005: Report to Congress (May 2007).

Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report (February 2008).

#### **The American Housing Survey**

This report uses data from the latest available American Housing Survey (AHS) in 2007. The AHS is sponsored by HUD and conducted by the U.S. Census Bureau and is the only detailed periodic national housing survey in the United States. It provides nationally representative data on a wide range of housing subjects, including apartments, single-family homes, mobile homes, vacant homes, family composition, income, housing and neighborhood quality, housing costs, equipment, fuel type, size of housing units, and recent moves. National data are collected every 2 years from a sample of about 53,000 housing units. The survey, which started in 1973, has sampled the same housing units since 1985; it also samples newly constructed units to ensure both continuity and timeliness of the data. Information from the Worst Case Needs reports has helped inform public policy decisions, including decisions on targeting of existing resources, determining the need for additional resources, and the form housing assistance should take.

#### **Explanation of Household Income Categories**

Many HUD programs and other federal housing programs use specific income limits to determine whether households qualify for those programs. HUD has developed a useful means of establishing these income limits so they reflect area income levels. Income limits are set on the basis of area median incomes for each metropolitan area and non-metropolitan county. Area median incomes are also adjusted for family size before income limits are determined.

The terms "low-income," "very low-income," and "extremely low-income" used in this report follow the specific meanings of those terms as used in several of HUD's affordable housing programs:

- Low-income. Not more than 80 percent of area median income. Defined by the United States Housing Act of 1937 and used as an income limit for many rental and homeownership programs.
- Very low-income. Not more than 50 percent of area median income. Defined by the United States Housing Act of 1937 and used as an income limit for many rental programs.
- Extremely low-income. Not more than 30 percent of area median income. Although "extremely low income" is not a defined term in the U.S. Housing Act of 1937, the income threshold itself is used for the purpose of establishing admissions standards in HUD's major rental assistance programs.

Exhibit 5-1 illustrates income limits for selected U.S. cities.

For the detailed methodology on setting HUD income limits for fiscal year 2007, see http://www.huduser.org/datasets/il/il07/IncomeLimitsBriefingMaterial.pdf.

Exhibit 5-1. HUD Income Limits in Selected Cities, Fiscal Year 2007

	Annual Income for a Four-Person Household						
	30% AMI (\$)	50% AMI (\$)	80% AMI (\$)	AMI (\$)			
New York City	21,250	35,450	56,700	56,800			
Los Angeles	22,200	37,000	59,200	56,500			
Chicago	22,600	37,700	59,600	69,800			
Houston	18,300	30,500	48,800	57,300			
Philadelphia	21,650	36,050	57,700	71,600			
Phoenix	18,050	30,050	48,100	59,100			
Jacksonville	18,100	30,150	48,250	59,700			
Washington, DC	28,350	47,250	60,000	94,500			
Denver	21,500	35,850	57,350	71,400			
Atlanta	21,350	35,600	56,950	67,100			
Seattle	23,350	38,950	59,600	75,600			

#### Worst Case Needs by Definition Are Below the "Very Low-Income" Threshold

Exhibit 5-2 shows how the two severe problems (severely inadequate housing and severe rent burden), represented by the smaller ovals, combine with the very low-income limits, represented by the large oval, to constitute worst case housing needs. The large oval represents the total universe of 11.57 million unassisted very low-income renter households, as reported by the AHS in 2007. Of these very low-income renter households, 5.67 million do not have either of the severe problems, while 5.91 million households have one or both of the severe problems constituting worst case housing needs.

Worst Case Needs,
5.91 million

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Exhibit 5-2. Bird's Eye View of Worst Case Housing Needs in 2007

Although the United States has a total of 35.05 million renter households, the diagram does not show the 19.11 million renters who are outside the largest oval, because they have incomes above the very low-income threshold or receive some form of housing assistance. A substantial number of these households—those represented by the overhanging portions of the small ovals—also face severe problems, especially severe rent burden. Among all renters, 8.45 million have one or both severe problems.

#### **Housing Assistance and Affordable Housing Programs**

HUD provides rental housing assistance through three key programs:

- Public housing. This program provides affordable housing to 1.1 million families. The units are owned and managed by local public housing agencies (PHAs). Families are required to pay 30 percent of their income for rent.
- Project-based assisted housing. The project-based Section 8 program provides assistance to 1.3 million families living in privately owned rental housing. The assistance is attached to the units, which are reserved for low-income families that are required to pay 30 percent of their income for rent.
- Tenant-based rental assistance. Administered through local PHAs, the Section 8 voucher program assists more than 2.0 million families to help pay their rent in the private rental market. Although 30 percent is a baseline, families often pay more than 30 percent of their income in rent and may use these portable subsidies to locate housing of their choice.

A number of other federal housing programs produce affordable housing, typically with shallower subsidies. Although these units are often more affordable than market-rate units, without additional rental subsidies (such as vouchers), extremely low-income families would often have to pay well over 30 percent of their income to occupy for units in these programs.

These programs include the following:

Low Income Housing Tax Credit (LIHTC) program. This tax credit program subsidizes the capital costs of units that will have rents affordable to households with incomes at or below 60 percent of area median income. Between 1995 and 2006, approximately 16,800 projects with 1.23 million units were placed into service through the LIHTC program.<sup>3</sup>

<sup>&</sup>lt;sup>3</sup> For more information on the LIHTC program, see: U.S. Department of Housing and Urban Development, Office of Policy Development and Research, January 2009. *Updating the Low-Income Housing Tax Credit (LIHTC) Database: Projects Placed in Service Through 2006.* Available at: http://www.huduser.org/intercept.asp?loc=/Datasets/lihtc/report9506.pdf.

- HOME Investment Partnership (HOME). This program provides annual formula grants to state and local governments that can be used to assist homeowners, first-time homebuyers, or renters. Between 1992 and 2007, HOME provided subsidies for 307,000 affordable rental units (138,000 new construction, 153,000 rehabilitation, and 16,000 acquisition). Qualifying rents must be affordable to households with incomes at or below 65 percent of area median income or must be below local Fair Market Rents, whichever is less.
- Housing Opportunities for Persons with AIDS (HOPWA). HOPWA funds have been available to state and local governments and non-profits by annual formula and competitive grants since 1992. Currently, 67,000 low-income households receive housing assistance that serves as a base for participating in care and HIV treatment. Assistance is targeted to a special needs population. Grantees report that 77 percent of recipients have extremely low incomes, and another 16 percent have very low incomes.
- Older rental subsidy programs. Programs named for sections of the National Housing Act, primarily the Section 221(d)(3) Below Market Interest Rate (BMIR) Program and the Section 236 mortgage assistance program were active from the early 1960s through the early 1970s. They were designed to produce housing affordable for families with incomes above the public housing income limits.

For further detail on HUD program requirements, see "Programs of HUD, 2006: Major Mortgage, Grant, Assistance, and Regulatory Programs" (HUD 2006a).

#### References

Berube, Alan. 2006. *Using the Earned Income Tax Credit To Stimulate Local Economies*. Washington, DC: Brookings Institution. http://www.brook.edu/metro/pubs/Berube20061101eitc.pdf.

Blake, Kevin S., and Rebecca Kellerson. 2007 (September). *Measuring Overcrowding in Housing*. Prepared for the U.S. Department of Housing and Urban Development, Office of Policy Development and Research by ICF Consulting. http://www.huduser.org/publications/pdf/Measuring\_Overcrowding\_in\_Hsg.pdf.

Eggers, Frederick J., and Fouad Moumen. 2007. *Rental Market Dynamics: 2003–2005*. U.S. Department of Housing and Urban Development, Office of Policy Development and Research. http://www.huduser.org/datasets/cinch.html.

\_\_\_\_\_\_. 2009. American Housing Survey Rental Market Dynamics: 2005–2007. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research. http://www.huduser.org/datasets/cinch/cinch07/Rental\_Mrkt\_05-07.pdf.

Galster, George, 2002. "An Economic Efficiency Analysis of Deconcentrating Poverty Populations" Journal of Housing Economics 11:303-29.

Jargowsky, Paul A. 1997. *Poverty and Place; Ghettos, Barrios, and the American City.* New York: Russell Sage Foundation.

Joint Center for Housing Studies of Harvard University. 2006. *State of the Nation's Housing: 2006.* Cambridge, MA: Joint Center for Housing Studies of Harvard University. www.jchs.harvard.edu.

Khadduri, Jill, Kimberly Burnett, and David Rodda. 2003. *Targeting Housing Production Subsidies: Literature Review.* U.S. Department of Housing and Urban Development, Office of Policy Development and Research. http://www.huduser.org/publications/pdf/targetinglitreview.pdf.

Kingsley, G. Thomas, and Kathryn L.S. Pettit. 2003. "Concentrated Poverty: A Change in Course." In *Neighborhood Change in Urban America*, No. 2. Washington, DC: Urban Institute. www.urban.org/nnip.

Shroder, Mark. 2002. "Does Housing Assistance Perversely Affect Self-Sufficiency? A Review Essay," *Journal of Housing Economics* 11: 381–417.

U.S. Census Bureau. 2001. *The Hispanic Population: 2000.* Census 2000 Brief C2KBR/01-3. Washington, DC: U.S. Census Bureau.

\_\_\_\_\_\_. 2003. *Grandparents Living With Grandchildren: 2000.* Census 2000 Brief C2KBR-31. Washington, DC: U.S. Census Bureau.

\_\_\_\_\_. 2004. U.S. Interim Projections by Age, Sex, Race, and Hispanic Origin: 2000-2050. http://www.census.gov/ipc/www/usinterimproj. Washington, DC: U.S. Census Bureau.

H150/03, Housing and Household Economic Statistics Division. http://www.census.gov/hhes/www/housing/ahs/ahs.html. Washington, DC: U.S. Census Bureau.
U.S. Department of Housing and Urban Development (HUD), Office of Policy Development and Research (PD&R). 2003. <i>Trends in Worst Case Needs for Housing, 1978–1999: A Report to Congress on Worst Case Housing Needs—Plus Update on Worst Case Needs in 2001</i> . http://www.huduser.org/publications/affhsg/worstcase03. html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2005a. Affordable Housing Needs: A Report to Congress on the Significant Need for Housing. http://www.huduser.org/publications/affhsg/affhsgneed.html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2005b. "FY 2005 HUD Income Limits Briefing Material." http://www.huduser.org/datasets/il/il05/index.html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2006a. <i>Programs of HUD: Major Mortgage, Grant, Assistance, and Regulatory Programs.</i> http://www.huduser.org/resources/hudprgs/ProgOfHUD06.pdf. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2006b. <i>U.S. Housing Market Conditions.</i> http://www.huduser.org/periodicals/ushmc.htm. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2006c. Fair Market Rents. http://www.huduser.org/datasets/fmr.html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2006d. Codebook for the American Housing Survey, Public Use File: 1997 and Later. http://www.huduser.org/datasets/ahs/ahsprev.html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2008a. The Third Annual Homeless Assessment Report to Congress. http://www.hudhre.info/documents/3rdHomelessAssessmentReport.pdf. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2008b. Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report." (February 2008). http://www.huduser.org/publications/affhsg/affhsgneedsdis.html. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.
2009. Updating the Low-Income Housing Tax Credit (LIHTC) Database: Projects Placed in Service Through 2006. http://www.huduser.org/intercept.asp?loc=/ Datasets/lihtc/report9506.pdf. Washington, DC: U.S. Department of Housing and Urban Development, Office of Policy Development and Research.

# Appendix A. Data on Housing Problems and Supply of Affordable Housing

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Table A-1a. Housing Conditions of Renter Households by Relative Income, 2005 and 2007

Table A-Ta. Housing Conditions of Re	Household Income as Percentage of HUD-Adjusted Area Median Family Income					
2007	0–30%	30–50%	50-80%	80–120%	>120%	All Incomes
Total households (1,000)	9,243	6,697	7,650	5,518	5,946	35,054
Unassisted with severe problems <sup>a</sup>	4,327	1,578	681	245	162	6,993
Unassisted with non-severe problems only <sup>a</sup>	828	2,935	2,960	1,048	674	8,445
Unassisted with no problems <sup>a</sup>	738	1,168	3,541	4,059	4,949	14,455
Assisted <sup>b</sup>	3,350	1,016	468	166	161	5,161
Any with severe problems	5,732	1,711	703	253	165	8,564
Rent burden >50% of income	5,588	1,579	486	98	42	7,793
Severely inadequate housing	372	198	224	156	123	1,073
Any with non-severe problems only <sup>c</sup>	1,778	3,375	3,095	1,077	690	10,015
Rent burden 30-50% of income	1,536	3,062	2,524	684	293	8,099
Moderately inadequate housing	324	393	494	308	307	1,828
Crowded housing	196	369	305	99	127	1,096
Any with no problems	1,733	1,611	3,853	4,187	5,090	16,476
				as Percenta	_	
	OI	HUD-Adjus	sted Area M	edian Family	/ income	All
2005	0–30%	30–50%	50-80%	80–120%	>120%	Incomes
Total households (1,000)	9,729	6,342	7,488	5,449	4,943	33,951
Unassisted with severe problems <sup>a</sup>	4,643	1,349	472	264	132	6,860
Unassisted with non-severe problems only <sup>a</sup>	981	2,604	2,363	799	557	7,303
Unassisted with no problems <sup>a</sup>	816	1,127	3,661	3,832	3,804	13,240
Assisted	3,289	1,262	992	555	450	6,547
Any with severe problems	6,151	1,548	532	290	145	8,665
Rent burden >50% of income	5,999	1,361	321	147	61	7,891
Severely inadequate housing	430	228	215	142	84	1,100
Any with non-severe problems only <sup>c</sup>	1,804	3,253	2,727	909	593	9,286
Rent burden 30-50% of income	1,535	2,934	2,091	452	226	7,238
	340	417	488	325	289	1,859
Moderately inadequate housing	0.10					
Moderately inadequate housing  Crowded housing	229	346	347	170	109	1,200
			347 <b>4,229</b>	170 <b>4,249</b>	109 <b>4,204</b>	1,200 <b>16,000</b>

<sup>&</sup>lt;sup>a</sup> See table A-3 for housing problems experienced by unassisted renters.

<sup>&</sup>lt;sup>b</sup> The American Housing Survey (AHS) survey questions on housing assistance changed between 2005 and 2007; see Appendix B.

<sup>&</sup>lt;sup>c</sup> See Table A–2 for estimates of the incidence of non-severe problems without regard to whether severe problems are also present

Table A-1b. Housing Conditions of Owner Households by Relative Income, 2005 and 2007

Table A-1b. Housing Conditions of Ov	Household Income as Percentage of HUD-Adjusted Area Median Family Income					
2007	0–30%	30–50%	50-80%	80-120%	>120%	All Incomes
Total households (1,000)	6,192	7,630	12,213	13,195	36,436	75,665
Unassisted with severe problems	3,667	2,136	1,991	1,101	1,057	9,951
Unassisted with non-severe problems only	1,185	2,264	3,370	3,312	4,175	14,307
Unassisted with no problems	1,339	3,230	6,851	8,783	31,204	51,407
Assisted	_	_	_	_	_	_
Any with severe problems	3,667	2,136	1,991	1,101	1,057	9,951
Cost burden >50% of income	3,595	2,077	1,858	979	838	9,347
Severely inadequate housing	143	86	149	123	231	732
Any with non-severe problems only	1,185	2,264	3,370	3,312	4,175	14,307
Cost burden 30–50% of income	1,019	2,035	2,945	2,983	3,710	12,691
Moderately inadequate housing	189	199	304	234	410	1,336
Crowded housing	54	140	290	190	145	820
Any with no problems	1,339	3,230	6,851	8,783	31,204	51,407
				ome as Per ea Median I		ome All
2005	0–30%	30–50%	50-80%	80–120%	>120%	Incomes
Total households (1,000)	7,473	7,614	11,820	15,230	32,812	74,950
Unassisted with severe problems	4,444	1,836	1,481	850	671	9,282
Unassisted with non-severe problems only	1,670	2,183	3,555	3,300	2,838	13,546
Unassisted with no problems	1,360	3,596	6,784	11,080	29,302	52,122
Assisted	_	_	_	_	_	_
Any with severe problems	4,444	1,836	1,481	850	671	9,282
Cost burden >50% of income	4,360	1,744	1,347	685	405	8,542
Severely inadequate housing	201	130	156	170	266	923
Any with non-severe problems only	1,670	2,183	3,555	3,300	2,838	13,546
Cost burden 30–50% of income	1,508	1,919	3,099	2,876	2,378	11,780
Moderately inadequate housing	195	224	352	260	353	1,384
Crowded housing	56	142	255	237	146	837

Table A-2a. Housing Conditions of Renters and Owners, 1995–2007—Number of Households

	1995	1997	1999	2001	2003	2005	2007
Total households (1,000)	97,694	99,487	102,802	105,435	105,868	108,901	110,719
Unassisted with							
severe problems	11,744	12,206	12,203	13,494	13,398	16,142	16,944
Unassisted with non-severe problems only	17,693	17,900	18,237	19,217	19,790	20,849	22,752
Unassisted with no	63,023	63,682	66,163	66,445	66,468	65,362	65,862
problems Assisted	5,230	5,697	6,168	6,279	6,211	6,547	5,161
Cost burden >50%							
of income	11,158	12,223	12,141	13,330	13,188	16,433	17,140
Cost burden 30–50% of income	15,481	15,115	15,862	16,923	17,856	19,403	21,153
Severely inadequate housing	2,022	1,797	2,056	2,108	1,971	2,023	1,805
Moderately inadequate		=		. =			/
housing	4,348	5,191	4,821	4,504	4,311	4,177	3,954
Crowded housing	2,554	2,807	2,570	2,631	2,559	2,621	2,529
Renter households (1,000)	34,150	34,000	34,007	33,727	33,614	33,951	35,054
Unassisted with severe problems	5,777	6,024	5,591	5,758	5,887	6,860	6,993
Unassisted with non-severe problems only	7,651	7,451	7,560	7,283	7,557	7,303	8,445
Unassisted with no	15,492	14,827	14,657	14,407	13,958	13,240	14,455
problems Assisted	5,230	5,697	6,203	6,279	6,211	6,547	5,161
	5,230	5,097	0,203	0,279	0,211	0,547	5,101
Rent burden >50% of income	6,236	6,686	6,301	6,412	6,477	7,891	7,793
Rent burden 30–50% of income	7,424	6,778	7,141	6,916	7,468	7,502	8,340
Severely inadequate housing	849	1,072	1,183	1,168	1,038	1,100	1,073
Moderately inadequate							
housing	2,277	3,021	2,768	2,508	2,525	2,542	2,400
Crowded housing	1,673	1,891	1,666	1,658	1,615	1,635	1,511
Owner households (1,000)	63,544	65,487	68,795	71,708	72,254	74,950	75,665
Unassisted with severe problems	5,967	6,182	6,604	7,736	7,511	9,282	9,951
Unassisted with non-severe problems only	10,042	10,449	10,684	11,934	12,233	13,546	14,307
Unassisted with no	47,531	48,855	51,507	52,038	52,510	52,122	51,407
problems Assisted	_	_	_				_
Cost burden >50%							
of income	4,922	5,537	5,841	6,918	6,711	8,542	9,347
Cost burden 30–50% of income	8,057	8,337	8,716	10,007	10,388	11,901	12,813
Severely inadequate housing	1,173	725	867	940	933	923	732
Moderately inadequate	0.5=:	6 :=-					. =
housing Crowded begins	2,071	2,170	2,064	1,996	1,786	1,635	1,554
Crowded housing	881	916	894	973	944	986	1,018

Table A-2b. Housing Conditions of Renters and Owners, 1995–2007—Percentage of Households

Table A-2b. Housing	1995	1997	1999	2001	2003	2005	2007
Total households	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
Unassisted with severe	1001070	1001070	1001070	1001070	1001070	1001070	1001070
problems	12.0%	12.3%	11.9%	12.8%	12.7%	14.8%	15.3%
Unassisted with non-							
severe problems only	18.1%	18.0%	17.7%	18.2%	18.7%	19.1%	20.5%
Unassisted with no problems	64.5%	64.0%	64.4%	63.0%	62.8%	60.0%	59.5%
Assisted	5.4%	5.7%	6.0%	6.0%	5.9%	6.0%	4.7%
Cost burden >50%	0.470	0.1 70	0.070	0.070	0.070	0.070	7.770
of income	11.4%	12.3%	11.8%	12.6%	12.5%	15.1%	15.5%
Cost burden 30-50%							
of income	15.8%	15.2%	15.4%	16.1%	16.9%	17.8%	19.1%
Severely inadequate	2.1%	1.8%	2.0%	2.0%	1.9%	1.9%	1.6%
housing Moderately inadequate	2.170	1.0%	2.0%	2.0%	1.9%	1.9%	1.0%
housing	4.5%	5.2%	4.7%	4.3%	4.1%	3.8%	3.6%
Crowded housing	2.6%	2.8%	2.5%	2.5%	2.4%	2.4%	2.3%
Renter households	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
Unassisted with severe							
problems	16.9%	17.7%	16.4%	17.1%	17.5%	20.2%	19.9%
Unassisted with non-							
severe problems only	22.4%	21.9%	22.2%	21.6%	22.5%	21.5%	24.1%
Unassisted with no	45 40/	40.00/	40.40/	40.70/	44 50/	00.00/	44.00/
problems	45.4%	43.6%	43.1%	42.7%	41.5%	39.0%	41.2%
Assisted	15.3%	16.8%	18.2%	18.6%	18.5%	19.3%	14.7%
Rent burden >50% of income	18.3%	19.7%	18.5%	19.0%	19.3%	23.2%	22.2%
Rent burden 30–50%	10.070	19.7 /0	10.070	19.070	19.070	20.2 /0	22.2/0
of income	21.7%	19.9%	21.0%	20.5%	22.2%	22.1%	23.8%
Severely inadequate							
housing	2.5%	3.2%	3.5%	3.5%	3.1%	3.2%	3.1%
Moderately inadequate housing	6.7%	8.9%	8.1%	7.4%	7.5%	7.5%	6.8%
Crowded housing	4.9%	5.6%	4.9%	4.9%	4.8%	4.8%	4.3%
Owner households				100.0%			
Unassisted with severe	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%	100.0%
problems	9.4%	9.4%	9.6%	10.8%	10.4%	12.4%	13.2%
Unassisted with non-							
severe problems only	15.8%	16.0%	15.5%	16.6%	16.9%	18.1%	18.9%
Unassisted with no							
problems	74.8%	74.6%	74.9%	72.6%	72.7%	69.5%	67.9%
Assisted	_		_				
Cost burden >50%							
of income	7.7%	8.5%	8.5%	9.6%	9.3%	11.4%	12.4%
Cost burden 30–50%	10 70/	10 70/	10 70/	14 00/	1/1/10/	15.00/	16.00/
of income Severely inadequate	12.7%	12.7%	12.7%	14.0%	14.4%	15.9%	16.9%
housing	1.8%	1.1%	1.3%	1.3%	1.3%	1.2%	1.0%
Moderately inadequate	0.00/	0.00/	0.00/	0.00/	0.50/	0.00/	0.40/
housing Crowded housing	3.3% 1.4%	3.3% 1.4%	3.0% 1.3%	2.8% 1.4%	2.5% 1.3%	2.2% 1.3%	2.1% 1.3%
	71170	,0	070	,0			1.0 /0

**Table A–3.** Housing Conditions of Unassisted Renter Households by Relative Income, 2005 and 2007

2005 and 2007	Household Income as Percentage of HUD-Adjusted Area Median Family Income							
2007	0–30%	30–50%	50-80%	80–120%	>120%	All Incomes		
Total unassisted households (1,000)	5,893	5,681	7,182	5,352	5,785	29,893		
Any with Severe Problems	4,327	1,578	681	245	162	6,993		
Rent burden >50% of income	4,246	1,472	470	96	42	6,326		
[And rent > fair market rent]	1,458	1,043	463	96	42	3,102		
Severely inadequate housing	268	161	215	149	120	913		
Any with non-severe problems only	828	2,935	2,960	1,048	674	8,445		
Rent burden 30–50% of income	701	2,693	2,440	661	283	6,777		
Moderately inadequate housing	191	330	457	305	302	1,586		
Crowded housing	132	326	286	96	124	964		
Any with no problems	738	1,168	3,541	4,059	4,949	14,455		
				ne as Percen Median Fam				
			,		ily illoonic	ΔII		
2005	0–30%	30–50%	50–80%	80–120%	>120%	All Incomes		
2005 Total unassisted households (1,000)	0–30% 6,440							
***		30–50%	50–80%	80–120%	>120%	Incomes		
Total unassisted households (1,000)  Any with severe problems	6,440	30–50% 5,081	50–80% 6,496	80–120% 4,894	>120%	Incomes 27,404		
Total unassisted households (1,000)	6,440 4,643	30–50% 5,081 1,349	50–80% 6,496 472	80–120% 4,894 264	>120% 4,492 132	27,404 6,860		
Total unassisted households (1,000)  Any with severe problems  Rent burden >50% of income	<b>6,440 4,643</b> 4,545	30–50% 5,081 1,349 1,184	50-80% 6,496 472 295	<b>80–120% 4,894 264</b> 134	>120% 4,492 132 56	<b>27,404 6,860</b> 6,214		
Total unassisted households (1,000)  Any with severe problems  Rent burden >50% of income  [And rent > fair market rent]	<b>6,440 4,643</b> 4,545 1,454	30–50% 5,081 1,349 1,184 829	50–80% 6,496 472 295 290	<b>80–120% 4,894 264</b> 134 134	>120% 4,492 132 56 56	<b>1ncomes 27,404 6,860</b> 6,214 2,763		
Any with severe problems  Rent burden >50% of income  [And rent > fair market rent]  Severely inadequate housing  Any with non-severe problems only	<b>6,440 4,643</b> 4,545 1,454 318	30–50% 5,081 1,349 1,184 829 203	50–80% 6,496 472 295 290 182	<b>80–120% 4,894 264</b> 134 134 129	>120% 4,492 132 56 56 76	<b>1000000000000000000000000000000000000</b>		
Total unassisted households (1,000)  Any with severe problems  Rent burden >50% of income  [And rent > fair market rent]  Severely inadequate housing	6,440 4,643 4,545 1,454 318 981	30–50% 5,081 1,349 1,184 829 203 2,604	50-80% 6,496 472 295 290 182 2,363	80–120% 4,894 264 134 134 129 799	>120% 4,492 132 56 56 76 557	<b>1ncomes 27,404 6,860</b> 6,214 2,763 908 <b>7,303</b>		
Total unassisted households (1,000)  Any with severe problems  Rent burden >50% of income  [And rent > fair market rent]  Severely inadequate housing  Any with non-severe problems only  Rent burden 30–50% of income	6,440 4,643 4,545 1,454 318 981 833	30–50% 5,081 1,349 1,184 829 203 2,604 2,375	50–80% 6,496 472 295 290 182 2,363 1,836	80-120% 4,894 264 134 139 799 397	>120% 4,492 132 56 56 76 557 216	<b>1ncomes 27,404 6,860</b> 6,214 2,763 908 <b>7,303</b> 5,657		
Any with severe problems  Rent burden >50% of income  [And rent > fair market rent]  Severely inadequate housing  Any with non-severe problems only  Rent burden 30–50% of income  Moderately inadequate housing	6,440 4,643 4,545 1,454 318 981 833 203	30–50% 5,081 1,349 1,184 829 203 2,604 2,375 339	50-80% 6,496 472 295 290 182 2,363 1,836 421	80-120% 4,894 264 134 139 799 397 273	>120% 4,492 132 56 56 76 557 216 273	<b>1ncomes 27,404 6,860</b> 6,214 2,763 908 <b>7,303</b> 5,657 1,509		

**Table A–4.** Incidence of Housing Problems Among Renters by Relative Income, 2005 and 2007—Number and Percentage (1 of 3)

	2005	2007	2005	2007
Renter households (1,000)	33,951	35,054	100.0%	100.0%
Unassisted with severe problems	6,860	6,993	20.2%	19.9%
Unassisted with non-severe problems only	7,303	8,445	21.5%	24.1%
Unassisted with no problems	13,240	14,455	39.0%	41.2%
Assisted	6,547	5,161	19.3%	14.7%
Any with severe problems	8,665	8,564	25.5%	24.4%
Rent burden >50% of income	7,891	7,793	23.2%	22.2%
Severely inadequate housing	1,100	1,073	3.2%	3.1%
Rent burden only <sup>a</sup>	6,883	6,918	20.3%	19.7%
Any with non-severe problems only	9,286	10,015	27.4%	28.6%
Rent burden 30-50% of income	7,238	8,099	21.3%	23.1%
Moderately inadequate housing	1,859	1,828	5.5%	5.2%
Crowded housing	1,200	1,096	3.5%	3.1%
Rent burden only	6,363	7,234	18.7%	20.6%
Any with no problems	16,000	16,476	47.1%	47.0%
Income 0-30% HAMFI (1,000)	9,729	9,243	100.0%	100.0%
Unassisted with severe problems	4,643	4,327	47.7%	46.8%
Unassisted with non-severe problems only	981	828	10.1%	9.0%
Unassisted with no problems	816	738	8.4%	8.0%
Assisted	3,289	3,350	33.8%	36.2%
Any with severe problems	6,151	5,732	63.2%	62.0%
Rent burden >50% of income	5,999	5,588	61.7%	60.5%
Severely inadequate housing	430	372	4.4%	4.0%
Rent burden only <sup>a</sup>	5,160	4,892	53.0%	52.9%
Any with non-severe problems only	1,804	1,778	18.5%	19.2%
Rent burden 30–50% of income	1,535	1,536	15.8%	16.6%
Moderately inadequate housing	340	324	3.5%	3.5%
Crowded housing	229	196	2.4%	2.1%
Rent burden only	1,263	1,302	13.0%	14.1%
Any with no problems	1,775	1,733	18.2%	18.7%

**Table A-4.** Incidence of Housing Problems Among Renters by Relative Income, 2005 and 2007—Number and Percentage (2 of 3)

	2005	2007	2005	2007
Income 30-50% HAMFI (1,000)	6,342	6,697	100.0%	100.0%
Unassisted with severe problems	1,349	1,578	21.3%	23.6%
Unassisted with non-severe problems only	2,604	2,935	41.0%	43.8%
Unassisted with no problems	1,127	1,168	17.8%	17.4%
Assisted	1,262	1,016	19.9%	15.2%
Any with severe problems	1,548	1,711	24.4%	25.5%
Rent burden >50% of income	1,361	1,579	21.5%	23.6%
Severely inadequate housing	228	198	3.6%	3.0%
Rent burden only <sup>a</sup>	1,233	1,429	19.4%	21.3%
Any with non-severe problems only	3,253	3,375	51.3%	50.4%
Rent burden 30–50% of income	2,934	3,062	46.3%	45.7%
Moderately inadequate housing	417	393	6.6%	5.9%
Crowded housing	346	369	5.5%	5.5%
Rent burden only <sup>a</sup>	2,535	2,655	40.0%	39.6%
Any with no problems	1,542	1,611	24.3%	24.1%
Income 50-80% HAMFI (1,000)	7,488	7,650	100.0%	100.0%
Unassisted with severe problems	472	681	6.3%	8.9%
Unassisted with non-severe problems only	2,363	2,960	31.6%	38.7%
Unassisted with no problems	3,661	3,541	48.9%	46.3%
Assisted	992	468	13.2%	6.1%
Any with severe problems	532	703	7.1%	9.2%
Rent burden >50% of income	321	486	4.3%	6.4%
Severely inadequate housing	215	224	2.9%	2.9%
Rent burden only <sup>a</sup>	289	465	3.9%	6.1%
Any with non-severe problems only	2,727	3,095	36.4%	40.5%
Rent burden 30–50% of income	2,091	2,524	27.9%	33.0%
Moderately inadequate housing	488	494	6.5%	6.5%
Crowded housing	347	305	4.6%	4.0%
Rent burden only	1,930	2,327	25.8%	30.4%
Any with no problems	4,229	3,853	56.5%	50.4%

**Table A–4.** Incidence of Housing Problems Among Renters by Relative Income, 2005 and 2007—Number and Percentage (3 of 3)

	2005	2007	2005	2007
Income 80-120% HAMFI (1,000)	5,449	5,518	100.0%	100.0%
Unassisted with severe problems	264	245	4.8%	4.4%
Unassisted with non-severe problems only	799	1,048	14.7%	19.0%
Unassisted with no problems	3,832	4,059	70.3%	73.6%
Assisted	555	166	10.2%	3.0%
Any with severe problems	290	253	5.3%	4.6%
Rent burden >50% of income	147	98	2.7%	1.8%
Severely inadequate housing	142	156	2.6%	2.8%
Rent burden only <sup>a</sup>	143	95	2.6%	1.7%
Any with non-severe problems only	909	1,077	16.7%	19.5%
Rent burden 30-50% of income	452	684	8.3%	12.4%
Moderately inadequate housing	325	308	6.0%	5.6%
Crowded housing	170	99	3.1%	1.8%
Rent burden only	428	679	7.9%	12.3%
Any with no problems	4,249	4,187	78.0%	75.9%
Income >120% HAMFI (1,000)	4,943	5,946	100.0%	100.0%
Unassisted with severe problems	132	162	2.7%	2.7%
Unassisted with non-severe problems only	557	674	11.3%	11.3%
Unassisted with no problems	3,804	4,949	77.0%	83.2%
Assisted	450	161	9.1%	2.7%
Any with severe problems	145	165	2.9%	2.8%
Rent burden >50% of income	61	42	1.2%	0.7%
Severely inadequate housing	84	123	1.7%	2.1%
Rent burden only <sup>a</sup>	57	38	1.2%	0.6%
Any with non-severe problems only	593	690	12.0%	11.6%
Rent burden 30–50% of income	226	293	4.6%	4.9%
Moderately inadequate housing	289	307	5.8%	5.2%
Crowded housing	109	127	2.2%	2.1%
Rent burden only	207	272	4.2%	4.6%

HAMFI = HUD-adjusted area median family income.

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

**Table A–5.** Incidence of Housing Problems Among Very Low-Income Renters by Household Type, 2005 and 2007—Number and Percentage (1 of 2)

	Number		Perce	entage
	2005	2007	2005	2007
Elderly (1,000)	3,587	3,492	100.0%	100.0%
Unassisted with severe problems	1,291	1,209	36.0%	34.6%
Unassisted with non-severe problems only	528	505	14.7%	14.5%
Unassisted with no problems	409	369	11.4%	10.6%
Assisted	1,358	1,409	37.9%	40.3%
Any with severe problems	1,722	1,607	48.0%	46.0%
Rent burden >50% of income	1,664	1,572	46.4%	45.0%
Severely inadequate housing	110	101	3.1%	2.9%
Rent burden only <sup>a</sup>	1,484	1,397	41.4%	40.0%
Any with non-severe problems only	937	947	26.1%	27.1%
Rent burden 30–50% of income	888	892	24.8%	25.5%
Moderately inadequate housing	97	118	2.7%	3.4%
Crowded housing	9	3	0.3%	0.1%
Rent burden only <sup>a</sup>	837	828	23.3%	23.7%
Any with no problems	928	938	25.9%	26.9%
Families with children (1,000)	6,465	6,329	100.0%	100.0%
Unassisted with severe problems	2,324	2,187	35.9%	34.6%
Unassisted with non-severe problems only	1,674	1,767	25.9%	27.9%
Unassisted with no problems	676	624	10.5%	9.9%
Assisted	1,791	1,751	27.7%	27.7%
Any with severe problems	3,012	2,909	46.6%	46.0%
Rent burden >50% of income	2,904	2,788	44.9%	44.1%
Severely inadequate housing	238	234	3.7%	3.7%
Rent burden only <sup>a</sup>	2,533	2,491	39.2%	39.4%
Any with non-severe problems only	2,301	2,311	35.6%	36.5%
Rent burden 30–50% of income	1,948	1,964	30.1%	31.0%
Moderately inadequate housing	311	304	4.8%	4.8%
Crowded housing	548	530	8.5%	8.4%
Rent burden only <sup>a</sup>	1,501	1,542	23.2%	24.4%
Any with no problems	1,153	1,108	17.8%	17.5%

**Table A–5.** Incidence of Housing Problems Among Very Low-Income Renters by Household Type, 2005 and 2007—Number and Percentage (2 of 2)

	Num	ber	Percentage		
	2005	2007	2005	2007	
Non-elderly disabled (1,000) <sup>b</sup>	1,767	1,707	100.0%	100.0%	
Unassisted with severe problems	694	602	39.3%	35.3%	
Unassisted with non-severe problems only	267	218	15.1%	12.8%	
Unassisted with no problems	102	97	5.8%	5.7%	
Assisted	703	790	39.8%	46.3%	
Any with severe problems	989	882	56.0%	51.7%	
Rent burden >50% of income	946	845	53.5%	49.5%	
Severely inadequate housing	93	78	5.3%	4.6%	
Rent burden only <sup>a</sup>	780	703	44.1%	41.2%	
Any with non-severe problems only	443	492	25.1%	28.8%	
Rent burden 30–50% of income	407	477	23.0%	27.9%	
Moderately inadequate housing	78	57	4.4%	3.3%	
Crowded housing	0	3	0.0%	0.2%	
Rent burden onlyª	366	432	20.7%	25.3%	
Any with no problems	334	332	18.9%	19.4%	
Other households (1,000)	4,253	4,413	100.0%	100.0%	
Unassisted with severe problems	1,683	1,907	39.6%	43.2%	
Unassisted with non-severe problems only	1,116	1,273	26.2%	28.8%	
Jnassisted with no problems	757	816	17.8%	18.5%	
Assisted	698	416	16.4%	9.4%	
Any with severe problems	1,975	2,043	46.4%	46.3%	
Rent burden >50% of income	1,846	1,962	43.4%	44.5%	
Severely inadequate housing	217	157	5.1%	3.6%	
Rent burden only <sup>a</sup>	1,597	1,729	37.5%	39.2%	
Any with non-severe problems only	1,376	1,403	32.4%	31.8%	
Rent burden 30-50% of income	1,226	1,265	28.8%	28.7%	
Moderately inadequate housing	271	239	6.4%	5.4%	
Crowded housing	18	30	0.4%	0.7%	
Rent burden only <sup>a</sup>	1,094	1,154	25.7%	26.2%	
Any with no problems	902	966	21.2%	21.9%	

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

<sup>&</sup>lt;sup>b</sup> Non-elderly disabled represents childless households with adults identified as disabled, using a proxy based on source of income.

**Table A-6a.** Housing Problems and Characteristics of Very Low-Income Renters by Household Type, 2007 (1 of 2)

Flousefiold Type, 2007 (1 of 2)		Elderly,	Families With	Other	Nonelderly	Other
	Total	No Children	Children	Families	Disabled <sup>b</sup>	Nonfamily
Renter households (1,000)	15,940	3,492	6,329	1,033	1,707	3,380
Number of children	12,801	0	12,801	0	0	0
Number of persons	36,521	4,299	23,250	2,451	2,279	4,242
Children/household	0.80	0.00	2.02	0.00	0.00	0.00
Persons/household	2.29	1.23	3.67	2.37	1.34	1.26
Unassisted with severe problems	5,905	1,209	2,187	352	602	1,555
Unassisted with non-severe problems only	3,763	505	1,767	324	218	949
Unassisted with no problems	1,906	369	624	234	97	582
Assisted	4,366	1,409	1,751	123	790	293
Any with severe problems	7,442	1,607	2,909	379	882	1,664
Rent burden >50% of income	7,167	1,572	2,788	364	845	1,598
Severely inadequate housing	570	101	234	29	78	128
Rent burden only <sup>a</sup>	6,320	1,397	2,491	313	703	1,416
Any with non-severe problems only	5,153	947	2,311	363	492	1,040
Rent burden 30-50% of income	4,598	892	1,964	335	477	930
Moderately inadequate housing	718	118	304	51	57	188
Crowded housing	565	3	530	11	3	19
Rent burden only	3,957	828	1,542	302	432	852
Any with no problems	3,345	938	1,108	291	332	675

**Table A–6a.** Housing Problems and Characteristics of Very Low-Income Renters by Household Type, 2007 (2 of 2)

	Total	Elderly, No Children	Families With Children	Other Families	Nonelderly Disabled <sup>b</sup>	Other Nonfamily
Other Characteristics						
One person in household	6,863	2,771	132	0	1,267	2,693
Husband-wife family	3,045	436	1,928	511	169	0
Female head	9,894	2,373	4,437	548	951	1,585
Minority head	8,464	1,287	4,282	612	790	1,493
AFDC/SSI income	3,019	685	1,370	3	961	0
Social security income	3,941	2,887	484	33	538	0
Income below 50% poverty	3,649	600	1,658	163	349	878
Income below poverty	8,298	1,626	3,709	386	1,176	1,402
Income below 150% of poverty	12,600	2,634	5,547	676	1,516	2,226
High school graduate	10,880	1,986	4,077	730	1,175	2,911
Two+ years post high school	2,392	381	669	182	245	916
Earnings at minimum wage:						
At least half time	7,815	296	4,136	820	186	2,377
At least full time	6,474	189	3,590	706	104	1,885
Earnings main source of income	8,348	257	4,371	850	133	2,737
Housing rated poor	973	86	471	66	152	197
Housing rated good+	11,622	2,904	4,388	734	1,217	2,380
Neighborhood rated poor	1,280	123	676	76	151	254
Neighborhood rated good+	11,233	2,838	4,153	721	1,182	2,338
Central cities	7,420	1,471	2,830	510	805	1,805
Suburbs	3,281	835	1,283	180	392	591
Non-metropolitan areas	5,239	1,186	2,216	343	509	984
Northeast	3,587	841	1,243	175	423	905
Midwest	3,487	1,021	1,226	220	472	549
South	5,192	910	2,332	376	520	1,054
West	3,673	721	1,528	262	291	872

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

<sup>&</sup>lt;sup>b</sup> Non-elderly disabled represents childless households with adults identified as disabled using a proxy based on source of income.

 $\textbf{Table A-6b.} \ \ \text{Housing Problems and Characteristics of Extremely Low-Income Renters by Household Type, 2007 (1 of 2)}$ 

	Total	Elderly, No	Families With	Other	Nonelderly	Other
Renter households (1,000)	Total 9,243	Children 2,336	Children 3,452	Families 393	Disabled <sup>b</sup>	1,743
Number of children	7,160	0	7,160	0	0	0
Number of persons	19,797	2,717	12,396	935	1,612	2,136
Children/household	0.77	0.00	2.07	0.00	0.00	0.00
Persons/household	2.14	1.16	3.59	2.38	1.22	1.23
Unassisted with severe problems	4,327	901	1,602	203	518	1,103
Unassisted with non-severe problems only	828	175	381	48	51	174
Unassisted with no problems	738	154	188	71	54	271
Assisted	3,350	1,105	1,282	71	696	195
Any with severe problems	5,732	1,272	2,259	225	787	1,188
Rent burden >50% of income	5,588	1,257	2,195	222	759	1,155
Severely inadequate housing	372	68	145	15	59	86
Rent burden only <sup>a</sup>	4,892	1,125	1,948	186	627	1,006
Any with non-severe problems only	1,778	501	703	66	294	213
Rent burden 30–50% of income	1,536	466	556	57	289	169
Moderately inadequate housing	324	76	150	11	20	69
Crowded housing	196	3	176	6	0	12
Rent burden only <sup>a</sup>	1,302	426	408	49	275	144
Any with no problems	1,733	562	490	102	238	341

**Table A-6b.** Housing Problems and Characteristics of Extremely Low-Income Renters by Household Type, 2007 (2 of 2)

	Total	Elderly, No Children	Families With Children	Other Families	Nonelderly Disabled <sup>b</sup>	Other Nonfamily
Other Characteristics						
One person in household	4,605	1,985	110	0	1,087	1,422
Husband-wife family	1,222	213	762	158	88	0
Female head	6,177	1,684	2,632	233	744	884
Minority head	4,963	975	2,384	226	634	745
Afdc/ssi income	2,420	562	1,060	0	798	0
Social security income	2,572	1,862	316	20	374	0
Income below 50% poverty	3,649	600	1,658	163	349	878
Income below poverty	7,717	1,618	3,205	346	1,162	1,386
Income below 150% of poverty	9,129	2,283	3,418	389	1,317	1,721
High school graduate	5,985	1,234	2,093	282	880	1,497
Two+ years post high school	1,248	233	274	87	170	484
Earnings at minimum wage:						
At least half time	2,621	62	1,495	226	29	809
At least full time	1,555	22	1,032	130	5	365
Earnings main source of income	3,391	88	1,803	270	41	1,190
Housing rated poor	583	59	300	22	110	93
Housing rated good+	6,677	1,939	2,291	290	934	1,223
Neighborhood rated poor	803	92	436	31	117	127
Neighborhood rated good+	6,395	1,868	2,150	290	892	1,196
Central cities	4,508	1,068	1,662	195	639	944
Suburbs	1,925	502	718	66	307	332
Non-metropolitan areas	2,810	766	1,072	132	373	468
Northeast	2,152	515	696	66	344	532
Midwest	2,229	740	722	86	382	298
South	2,883	610	1,260	146	382	485
West	1,979	471	774	95	211	429

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

<sup>&</sup>lt;sup>b</sup> Non-elderly disabled represents childless households with adults identified as disabled, using a proxy based on source of income.

**Table A–7.** Housing Problems and Characteristics of Worst Case Renters by Household Type, 2007 (1 of 2)

110d3c110ld 1ypc, 2007 (1 01 2)			Families			
	Total	Elderly, No Children	With Children	Other Families	Nonelderly Disabled <sup>b</sup>	Other Nonfamily
Renter households (1,000)	5,905	1,209	2,187	352	602	1,555
Number of children	4,336	0	4,336	0	0	0
Number of persons	12,966	1,477	7,857	833	793	2,006
Children/household	0.73	0.00	1.98	0.00	0.00	0.00
Persons/household	2.20	1.22	3.59	2.37	1.32	1.29
Unassisted with severe problems	5,905	1,209	2,187	352	602	1,555
Unassisted with non-severe problems only	_	_	_	_	_	_
Unassisted with no problems	_	_	_	_	_	_
Assisted	_	_	_	_	_	_
Any with severe problems	5,905	1,209	2,187	352	602	1,555
Rent burden >50% of income	5,717	1,190	2,123	336	573	1,495
Severely inadequate housing	429	75	149	27	59	119
Rent burden only <sup>a</sup>	5,038	1,043	1,903	290	472	1,329
Any with non-severe problems only	_	_	_	_	_	_
Rent burden 30-50% of income	_	_	_	_	_	_
Moderately inadequate housing	_	_	_	_	_	_
Crowded housing	_	_	_	_	_	_
Rent burden only <sup>a</sup>	_	_	_	_	_	_
Any with no problems	_	_	_	_	_	_

**Table A–7.** Housing Problems and Characteristics of Worst Case Renters by Household Type, 2007 (2 of 2)

	Total	Elderly, No Children	Families With Children	Other Families	Nonelderly Disabled <sup>b</sup>	
Other Characteristics						
One person in household	2,685	962	70	0	444	1,208
Husband-wife family	995	134	612	179	71	0
Female head	3,587	815	1,539	191	273	768
Minority head	2,986	413	1,439	197	277	660
AFDC/SSI income	917	131	461	0	325	0
Social security income	1,408	1,025	209	14	160	0
Income below 50% poverty	1,768	301	738	76	166	488
Income below poverty	3,754	637	1,592	193	471	861
Income below 150% of poverty	5,226	978	2,088	287	565	1,308
High school graduate	4,184	756	1,407	252	417	1,352
Two+ years post high school	1,085	152	269	82	103	478
Earnings at minimum wage:						
At least half time	2,627	74	1,242	281	45	984
At least full time	1,907	44	1,000	203	16	644
Earnings main source of income	3,138	77	1,419	305	33	1,304
Housing rated poor	376	25	176	15	65	95
Housing rated good+	4,279	999	1,498	256	422	1,104
Neighborhood rated poor	421	32	199	28	52	110
Neighborhood rated good+	4,193	994	1,479	240	414	1,066
Central cities	2,800	533	965	172	267	865
Suburbs	1,053	225	394	50	144	240
Non-metropolitan areas	2,052	451	828	130	191	450
Northeast	1,230	273	382	48	142	386
Midwest	1,263	338	410	79	183	254
South	1,942	333	819	136	174	480
West	1,470	266	576	89	103	435

 $<sup>^{\</sup>rm a}$  The estimates for "rent burden only" exclude households with any non-severe problem.

<sup>&</sup>lt;sup>b</sup> Non-elderly disabled represents childless households with adults identified as disabled, using a proxy based on source of income.

**Table A–8.** Housing Problems and Characteristics of Extremely Low-Income Worst Case Renters by Household Type, 2007 (1 of 2)

2) 11000011010 19p0, 2001 (1 of 2)	Total	Elderly, No Children	Families With Children	Other Families	Nonelderly Disabled <sup>b</sup>	Other Nonfamily
Renter households (1,000)	4,327	901	1,602	203	518	1,103
Number of children	3,232	0	3,232	0	0	0
Number of persons	9,335	1,068	5,746	474	656	1,391
Children/household	0.75	0.00	2.02	0.00	0.00	0.00
Persons/household	2.16	1.19	3.59	2.34	1.27	1.26
Unassisted with severe problems	4,327	901	1,602	203	518	1,103
Unassisted with non-severe problems only	_	_	_	_	_	_
Unassisted with no problems	_	_	_	_	_	_
Assisted	_	_	_	_	_	_
Any with severe problems	4,327	901	1,602	203	518	1,103
Rent burden >50% of income	4,246	895	1,577	200	499	1,076
Severely inadequate housing	268	49	84	12	42	80
Rent burden only <sup>a</sup>	3,703	789	1,402	169	405	936
Any with non-severe problems only	_	_	_	_	_	_
Rent burden 30-50% of income	_	_	_	_	_	_
Moderately inadequate housing	_	_	_	_	_	_
Crowded housing	_	_	_	_	_	_
Rent burden only	_	_	_	_	_	_
Any with no problems	_	_	_	_	_	_

**Table A–8.** Housing Problems and Characteristics of Extremely Low-Income Worst Case Renters by Household Type, 2007 (2 of 2)

	Total	Elderly, No Children	Families With Children	Other Families	Nonelderly Disabled <sup>b</sup>	Other Nonfamily
Other Characteristics						
One person in household	2,095	752	62	0	406	875
Husband-wife family	618	83	394	96	46	0
Female head	2,689	619	1,163	120	236	551
Minority head	2,219	343	1,076	112	243	445
AFDC/SSI income	807	112	404	0	291	0
Social security income	1,059	756	167	8	128	0
Income below 50% poverty	1,768	301	738	76	166	488
Income below poverty	3,617	635	1,483	177	468	854
Income below 150% of poverty	4,273	880	1,591	203	515	1,084
High school graduate	2,977	542	984	145	352	955
Two+ years post high school	712	99	166	48	82	317
Earnings at minimum wage:						
At least half time	1,494	24	756	142	8	565
At least full time	861	7	538	72	0	243
Earnings main source of income	2,066	39	945	174	16	891
Housing rated poor	266	17	133	6	57	53
Housing rated good+	3,111	734	1,073	158	358	788
Neighborhood rated poor	316	30	167	14	45	60
Neighborhood rated good+	3,039	723	1,049	144	354	769
In central cities	2,126	446	745	92	228	616
Suburbs	787	138	313	28	128	179
Non-metropolitan areas	1,414	317	544	84	162	309
Northeast	1,013	201	321	34	126	330
Midwest	949	274	292	44	162	177
South	1,382	247	593	82	149	310
West	984	179	396	43	80	286

 $<sup>^{\</sup>rm a}$  The estimates for "rent burden only" exclude households with any non-severe problem.

<sup>&</sup>lt;sup>b</sup> Non-elderly disabled represents childless households with adults identified as disabled, using a proxy based on source of income.

**Table A–9.** Incidence of Housing Problems Among Very Low-Income Renters by Race and Ethnicity, 2005 and 2007—Number and Percentage (1 of 2)

	Number		Percentage		
	2005	2007	2005	2007	
Non-Hispanic White (1,000)	7,907	7,477	100.0%	100.0%	
Unassisted with severe problems	3,098	2,919	39.2%	39.0%	
Unassisted with non-severe problems only	1,700	1,696	21.5%	22.7%	
Unassisted with no problems	1,175	1,099	14.9%	14.7%	
Assisted	1,934	1,763	24.5%	23.6%	
Any with severe problems	3,764	3,469	47.6%	46.4%	
Rent burden >50% of income	3,596	3,374	45.5%	45.1%	
Severely inadequate housing	306	197	3.9%	2.6%	
Rent burden only <sup>a</sup>	3,187	3,007	40.3%	40.2%	
Any with non-severe problems only	2,300	2,271	29.1%	30.4%	
Rent burden 30-50% of income	2,098	2,101	26.5%	28.1%	
Moderately inadequate housing	310	289	3.9%	3.9%	
Crowded housing	97	87	1.2%	1.2%	
Rent burden only	1,904	1,917	24.1%	25.6%	
Any with no problems	1,843	1,737	23.3%	23.2%	
Non-Hispanic Black (1,000)	3,989	4,040	100.0%	100.0%	
Unassisted with severe problems	1,336	1,345	33.5%	33.3%	
Unassisted with non-severe problems only	746	752	18.7%	18.6%	
Unassisted with no problems	388	362	9.7%	9.0%	
Assisted	1,519	1,581	38.1%	39.1%	
Any with severe problems	1,969	1,960	49.4%	48.5%	
Rent burden >50% of income	1,880	1,853	47.1%	45.9%	
Severely inadequate housing	181	177	4.5%	4.4%	
Rent burden only <sup>a</sup>	1,562	1,644	39.2%	40.7%	
Any with non-severe problems only	1,176	1,253	29.5%	31.0%	
Rent burden 30–50% of income	1,046	1,082	26.2%	26.8%	
Moderately inadequate housing	208	203	5.2%	5.0%	
Crowded housing	94	114	2.4%	2.8%	
Rent burden only	886	945	22.2%	23.4%	
Any with no problems	843	827	21.1%	20.5%	

**Table A–9.** Incidence of Housing Problems Among Very Low-Income Renters by Race and Ethnicity, 2005 and 2007—Number and Percentage (2 of 2)

	Nun	nber	Perce	entage
	2005	2007	2005	2007
Hispanic (1,000)	3,167	3,297	100.0%	100.0%
Unassisted with severe problems	1,168	1,234	36.9%	37.4%
Unassisted with non-severe problems only	928	1,049	29.3%	31.8%
Unassisted with no problems	267	301	8.4%	9.1%
Assisted	805	713	25.4%	21.6%
Any with severe problems	1,496	1,504	47.2%	45.6%
Rent burden >50% of income	1,423	1,446	44.9%	43.9%
Severely inadequate housing	151	145	4.8%	4.4%
Rent burden only <sup>a</sup>	1,234	1,249	39.0%	37.9%
Any with non-severe problems only	1,256	1,279	39.7%	38.8%
Rent burden 30-50% of income	1,050	1,130	33.2%	34.3%
Moderately inadequate housing	169	152	5.3%	4.6%
Crowded housing	328	313	10.4%	9.5%
Rent burden only	793	857	25.0%	26.0%
Any with no problems	415	513	13.1%	15.6%

 $<sup>^{\</sup>rm a}$  The estimates for "rent burden only" exclude households with any non-severe problem.

**Table A–10.** Incidence of Housing Problems Among Very Low-Income Renters by Region, 2005 and 2007—Number and Percentage (1 of 2)

	Nun 2005	nber 2007	Perce 2005	entage 2007
Northeast (1,000)	3,538	3,487	100.0%	100.0%
Unassisted with severe problems	1,354	1,263	38.3%	36.2%
Unassisted with non-severe problems only	600	624	17.0%	17.9%
Unassisted with no problems	369	421	10.4%	12.1%
Assisted	1,215	1,179	34.3%	33.8%
Any with severe problems	1,829	1,692	51.7%	48.5%
Rent burden >50% of income	1,732	1,620	49.0%	46.5%
Severely inadequate housing	227	166	6.4%	4.8%
Rent burden only <sup>a</sup>	1,457	1,412	41.2%	40.5%
Any with non-severe problems only	964	1,003	27.2%	28.8%
Rent burden 30–50% of income	888	893	25.1%	25.6%
Moderately inadequate housing	106	110	3.0%	3.2%
Crowded housing	91	106	2.6%	3.0%
Rent burden only	781	793	22.1%	22.7%
Any with no problems	745	792	21.1%	22.7%
Midwest (1,000)	3,331	3,587	100.0%	100.0%
Unassisted with severe problems	1,152	1,230	34.6%	34.3%
Unassisted with non-severe problems only	704	857	21.1%	23.9%
Unassisted with no problems	507	495	15.2%	13.8%
Assisted	968	1,005	29.1%	28.0%
Any with severe problems	1,450	1,554	43.5%	43.3%
Rent burden >50% of income	1,385	1,494	41.6%	41.7%
Severely inadequate housing	109	99	3.3%	2.8%
Rent burden only <sup>a</sup>	1,232	1,340	37.0%	37.4%
Any with non-severe problems only	1,025	1,143	30.8%	31.9%
Rent burden 30–50% of income	912	1,052	27.4%	29.3%
Moderately inadequate housing	135	127	4.1%	3.5%
Crowded housing	60	56	1.8%	1.6%
Rent burden only	838	968	25.2%	27.0%
Any with no problems	856	889	25.7%	24.8%

**Table A–10.** Incidence of Housing Problems Among Very Low-Income Renters by Region, 2005 and 2007—Number and Percentage (2 of 2)

	Nun 2005	nber 2007	Perce 2005	entage 2007
South (1,000)	5,444	5,192	100.0%	100.0%
Unassisted with severe problems	1,987	1,942	36.5%	37.4%
Unassisted with non-severe problems only	1,320	1,331	24.2%	25.6%
Unassisted with no problems	728	628	13.4%	12.1%
Assisted	1,410	1,291	25.9%	24.9%
Any with severe problems	2,570	2,420	47.2%	46.6%
Rent burden >50% of income	2,477	2,319	45.5%	44.7%
Severely inadequate housing	175	186	3.2%	3.6%
Rent burden only <sup>a</sup>	2,156	2,047	39.6%	39.4%
Any with non-severe problems only	1,759	1,746	32.3%	33.6%
Rent burden 30–50% of income	1,525	1,536	28.0%	29.6%
Moderately inadequate housing	331	304	6.1%	5.9%
Crowded housing	175	174	3.2%	3.4%
Rent burden only	1,275	1,291	23.4%	24.9%
Any with no problems	1,115	1,026	20.5%	19.8%
West (1,000)	3,759	3,673	100.0%	100.0%
Unassisted with severe problems	1,500	1,470	39.9%	40.0%
Unassisted with non-severe problems only	961	951	25.6%	25.9%
Unassisted with no problems	340	362	9.0%	9.9%
Assisted	958	891	25.5%	24.3%
Any with severe problems	1,850	1,775	49.2%	48.3%
Rent burden >50% of income	1,766	1,734	47.0%	47.2%
Severely inadequate housing	148	120	3.9%	3.3%
Rent burden only <sup>a</sup>	1,548	1,521	41.2%	41.4%
Any with non-severe problems only	1,308	1,261	34.8%	34.3%
Rent burden 30–50% of income	1,144	1,116	30.4%	30.4%
Moderately inadequate housing	185	176	4.9%	4.8%
Crowded housing	249	229	6.6%	6.2%
Rent burden only	904	904	24.0%	24.6%
Any with no problems	601	637	16.0%	17.3%

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

**Table A–11.** Incidence of Housing Problems Among Very Low-Income Renters by Metropolitan Location, 2005 and 2007—Number and Percentage (1 of 2)

		mber		entage
	2005	2007	2005	2007
Central cities (1,000)	7,505	7,420	100.0%	100.0%
Unassisted with severe problems	2,909	2,800	38.8%	37.7%
Unassisted with non-severe problems only	1,674	1,749	22.3%	23.6%
Unassisted with no problems	685	739	9.1%	10.0%
Assisted	2,237	2,132	29.8%	28.7%
Any with severe problems	3,769	3,584	50.2%	48.3%
Rent burden >50% of income	3,596	3,436	47.9%	46.3%
Severely inadequate housing	349	318	4.7%	4.3%
Rent burden only <sup>a</sup>	3,053	2,988	40.7%	40.3%
Any with non-severe problems only	2,433	2,425	32.4%	32.7%
Rent burden 30-50% of income	2,168	2,142	28.9%	28.9%
Moderately inadequate housing	382	355	5.1%	4.8%
Crowded housing	298	286	4.0%	3.9%
Rent burden only	1,791	1,816	23.9%	24.5%
Any with no problems	1,303	1,411	17.4%	19.0%
Suburbs (1,000)	5,417	5,239	100.0%	100.0%
Unassisted with severe problems	2,092	2,052	38.6%	39.2%
Unassisted with non-severe problems only	1,262	1,275	23.3%	24.3%
Unassisted with no problems	698	679	12.9%	13.0%
Assisted	1,365	1,233	25.2%	23.5%
Any with severe problems	2,625	2,496	48.5%	47.6%
Rent burden >50% of income	2,533	2,426	46.8%	46.3%
Severely inadequate housing	188	153	3.5%	2.9%
Rent burden only <sup>a</sup>	2,271	2,187	41.9%	41.7%
Any with non-severe problems only	1,696	1,686	31.3%	32.2%
Rent burden 30–50% of income	1,505	1,534	27.8%	29.3%
Moderately inadequate housing	214	187	4.0%	3.6%
Crowded housing	197	206	3.6%	3.9%
Rent burden only	1,311	1,331	24.2%	25.4%
Any with no problems	1,097	1,057	20.3%	20.2%

**Table A–11.** Incidence of Housing Problems Among Very Low-Income Renters by Metropolitan Location, 2005 and 2007—Number and Percentage (2 of 2)

,	<u> </u>	,		
	Nur 2005	nber 2007	Perce 2005	entage 2007
Non-metropolitan (1,000)	3,149	3,281	100.0%	100.0%
Jnassisted with severe problems	991	1,053	31.5%	32.1%
Unassisted with non-severe problems only	649	739	20.6%	22.5%
Unassisted with no problems	561	489	17.8%	14.9%
Assisted	949	1,001	30.1%	30.5%
Any with severe problems	1,305	1,362	41.4%	41.5%
Rent burden >50% of income	1,232	1,305	39.1%	39.8%
Severely inadequate housing	122	100	3.9%	3.0%
Rent burden only <sup>a</sup>	1,070	1,145	34.0%	34.9%
Any with non-severe problems only	927	1,042	29.4%	31.8%
Rent burden 30-50% of income	796	921	25.3%	28.1%
Moderately inadequate housing	160	176	5.1%	5.4%
Crowded housing	80	74	2.5%	2.3%
Rent burden only	696	810	22.1%	24.7%
Any with no problems	917	877	29.1%	26.7%
U.S. total (1,000)	16,072	15,940	100.0%	100.0%
Unassisted with severe problems	5,992	5,905	37.3%	37.0%
Unassisted with non-severe problems only	3,585	3,763	22.3%	23.6%
Unassisted with no problems	1,944	1,906	12.1%	12.0%
Assisted	4,550	4,366	28.3%	27.4%
Any with severe problems	7,699	7,442	47.9%	46.7%
Rent burden >50% of income	7,360	7,167	45.8%	45.0%
Severely inadequate housing	659	570	4.1%	3.6%
Rent burden only <sup>a</sup>	6,394	6,320	39.8%	39.6%
Any with non-severe problems only	5,056	5,153	31.5%	32.3%
Rent burden 30–50% of income	4,468	4,598	27.8%	28.8%
Moderately inadequate housing	756	718	4.7%	4.5%
Crowded housing	574	565	3.6%	3.5%
Rent burden only	3,798	3,957	23.6%	24.8%
Any with no problems	3,317	3,345	20.6%	21.0%

<sup>&</sup>lt;sup>a</sup> The estimates for "rent burden only" exclude households with any non-severe problem.

**Table A–12.** Households Occupying U.S. Rental Units by Affordability of Rent and Income of Occupants, 2005 and 2007

Relative Income of Households									y Unit A est rent		_		,
2007	10°	20	30	40	50	60	70	80	90	100	110	120+	Total
Extremely low income (≤30% HAMFI)	705	1,561	1,209	1,439	1,631	1,125	516	228	108	107	85	248	8,963
Very low income (30–50%)	270	329	562	1,000	1,470	1,343	569	262	119	95	72	210	6,301
Low income (50–80%)	266	300	342	797	1,467	1,712	929	410	194	145	144	352	7,059
Middle income or higher (>80%)	324	319	343	684	1,522	2,017	1,600	1,017	761	474	420	1,337	10,820
Total	1,566	2,509	2,456	3,920	6,091	6,198	3,614	1,917	1,183	822	722	2,147	33,144
Vacant units for rent	232	307	210	387	674	695	445	252	197	150	137	435	4,122
Relative Income of Households									y Unit A est rent				
2005	10°	20	30	40	50	60	70	80	90	100	110	120+	Total
Extremely low income (≤30% HAMFI)	805	1,610	1,163	1,630	1,828	1,167	618	349	134	112	70	240	9,726
Very low income (30–50%)	260	263	537	1,078	1,593	1,173	670	338	105	92	33	204	6,345
Low income (50–80%)	295	261	326	1,049	1,636	1,617	1,038	586	212	146	94	227	7,488
Middle income or higher (>80%)	326	266	231	710	1,497	2,039	1,595	1,260	567	488	365	1,048	10,391
Total	1,686	2,400	2,257	4,467	6,554	5,995	3,921	2,534	1,018	838	562	1,719	33,951
Vacant units for rent	151	91	162	495	851	759	503	332	186	119	73	251	3,974

HAMFI = HUD-adjusted area median family income.

<sup>\*</sup> The 10 percent of HAMFI category includes units occupied with no cash rent.

**Table A-13.** Renters and Rental Units Affordable and Available to Them by Relative Income, 1995–2007

	1995	1997	1999	2001°	2003	2005 <sup>d</sup>	2007
Renter households (1,000)	34,150	34,000	34,007	34,042	33,614	33,951	35,054
Extremely low income (≤30% HAMFI)	8,637	9,215	8,513	8,739	9,077	9,979	9,555
Very low income (30–50%)	5,897	5,889	6,243	6,315	6,581	6,345	6,697
Low income (50–80%)	7,205	6,591	7,270	7,251	7,460	7,488	7,650
Middle income or higher (>80%)	12,411	12,305	11,981	11,737	10,496	10,139	11,152
Affordable units <sup>a</sup> (1,000)	36,924	37,186	37,018	37,197	37,577	37,924	39,330
Extremely low income (≤30% HAMFI)	6,633	6,937	6,683	6,870	7,098	6,747	7,280
Very low income (30–50%)	9,933	10,826	12,089	12,366	12,863	12,368	11,071
Low income (50–80%)	15,389	15,012	14,222	13,634	13,518	14,044	15,063
Middle income or higher (>80%)	4,969	4,411	4,023	4,328	4,099	4,765	5,916
Affordable and available units <sup>b</sup> (1,000)	36,924	37,186	37,018	37,197	37,577	37,924	39,330
Extremely low income (≤30% HAMFI)	3,790	3,901	3,573	3,803	3,996	3,982	4,224
Very low income (30–50%)	6,799	7,304	7,905	8,132	8,744	8,549	7,786
Low income (50–80%)	12,026	11,882	11,841	11,665	12,396	12,865	13,196
Middle income or higher (>80%)	14,310	14,100	13,700	13,597	12,441	12,528	14,123

HAMFI = HUD-adjusted area median family income.

<sup>&</sup>lt;sup>a</sup> Affordable units are rental units, whether vacant or occupied, that rent for no more than 30 percent of specified income levels (relative to the HAMFI).

<sup>&</sup>lt;sup>b</sup> Affordable and available units are rental units that are affordable, as described above, and that also are either currently available for rent or are already occupied by a household with the specified income level.

<sup>&</sup>lt;sup>c</sup> Estimates for 2001 are based on 1990 Census weights rather than the 2000 weights used elsewhere in this report.

<sup>&</sup>lt;sup>d</sup> The estimates of units for 2005 were erroneous as originally published but are corrected in this version.

**Table A–14.** Average Income and Average Gross Rent of Renter Households by Relative Income, 2005 and 2007

	Household Income as Percentage of HAMFI			tage	e All	
2007	0–30%	30–50%	50-80%	80-120%	>120%	Incomes
Total households (1,000)	9,243	6,697	7,650	5,518	5,946	35,054
Unassisted with priority problems	4,327	1,578	681	245	162	6,993
Unassisted with other problems	828	2,935	2,960	1,048	674	8,445
Unassisted with no problems	738	1,168	3,541	4,059	4,949	14,455
Assisted	3,350	1,016	468	166	161	5,161
Average monthly income	\$679	\$1,835	\$2,800	\$4,061	\$7,941	\$3,127
Unassisted with priority problems	697	1,695	2,661	3,855	7,340	1,378
Unassisted with other problems	1,019	1,925	2,785	3,921	7,667	2,843
Unassisted with no problems	409	1,888	2,844	4,135	8,007	4,772
Assisted	633	1,727	2,767	3,470	7,671	1,352
Average gross rent	\$584	\$682	\$742	\$821	\$1,042	\$753
Unassisted with priority problems	707	966	1,338	1,399	1,492	871
Unassisted with other problems	495	614	805	1,029	1,459	790
Unassisted with no problems	532	499	570	730	973	757
Assisted	452	584	653	788	917	519
		Hous	ehold Incom of H	ne as Percen AMFI	tage	
2005	0–30%	30–50%	50-80%	80–120%	>120%	All Incomes
Total households (1,000)	9,729	6,342	7,488	5,449	4,943	33,951
Unassisted with priority problems	4,643	1,349	472	264	132	6,860
Unassisted with other problems	981	2,604	2,363	799	557	7,303
Unassisted with no problems	816	1,127	3,661	3,832	3,804	13,240
Assisted	3,289	1,262	992	555	450	6,547
Average monthly income	\$653	\$1,741	\$2,762	\$4,021	\$7,913	\$2,919
Unassisted with priority problems	648	1,624	2,651	3,628	6,533	1,206
Unassisted with other problems	983	1,813	2,764	4,060	7,969	2,724
Unassisted with no problems	418	1,749	2,757	4,031	7,915	4,377
Assisted	620	1,712	2,827	4,082	8,231	1,981
Average gross rent	\$564	\$641	\$683	\$797	\$1,016	\$709
			1 001	1,594	1,670	805
Unassisted with priority problems	647	935	1,281	1,094	1,070	000
	647 401	935 584	776	973	1,405	732
Unassisted with priority problems Unassisted with other problems Unassisted with no problems						

HAMFI = HUD-adjusted area median family income.

## Appendix B. The American Housing Survey: Terms and Data Sources

To accurately estimate worst case housing needs for federal rental assistance using American Housing Survey (AHS) data, it is essential to determine whether household incomes fall below HUD's official very low-income limits (50 percent of HUD-adjusted area median family income [HAMFI], also termed area median income [AMI]), whether a household already receives housing assistance, and whether an unassisted income-eligible household has one or more of the priority problems that formerly conferred preference in tenant selection for assistance (having rent burdens that exceed 50 percent of income, living in substandard housing, or being involuntarily displaced).

This appendix discusses the essential concepts and methods used to produce estimates and tabulations of worst case housing needs, using 2005 and 2007 AHS microdata. It also highlights limitations of the data and addresses issues relating to the consistency of estimates in this report compared with those in previous reports about worst case housing needs.

### **American Housing Survey**

### **Description**

The U.S. Census Bureau conducts the AHS on behalf of the U.S. Department of Housing and Urban Development to gather data on housing conditions and markets. The data include information about occupants, units, housing costs and financing, and numerous other related variables. The Census Bureau's field representatives interviewed occupants of homes and obtained information on vacant homes from informed people, such as landlords, rental agents, and informed neighbors. The 2007 AHS survey consisted of 52,850 interviews conducted between late April and mid-September 2007 (U.S. Census Bureau, 2008).

### **Changes in the Survey Instrument for 2007**

#### **Rental assistance**

In 2007, the AHS included significant changes to the survey questions on whether a household received government assistance with its rent. Many of the questions on rental assistance were clarified (both to improve clarity for the respondent and to improve instructions to the interviewer on how to record answers), two questions were dropped, and a new question (related to housing vouchers) was added.

Overall, the changes had a major impact on survey responses.<sup>1</sup> The following table, excerpted from the PD&R Report, *Streamlining the American Housing Survey*, (Eggers, 2009) shows the effect on the number of households that reported receiving housing assistance:

	Assisted Households Identified in the American Housing Survey						
Year	Income as Po	ercent of Area	Median Incom	e (thousands of	households)	All	
	0–30%	30–50%	50-80%	80–120%	> 120%		
2005	3,289	1,262	992	555	450	6,547	
2007	3,350	1,016	468	166	161	5,161	

The 2005 estimate of 6.547 million households receiving housing assistance was substantially above the level that should be expected based on the number of households served by HUD rental assistance programs (roughly 4.3 million households) plus other programs, such as HOME and Low-Income Housing Tax Credit (LIHTC), that might be expected to generate a positive response. The level of 5.161 million households recorded in 2007 is a much more reasonable estimate. In addition, the largest change in reporting assistance occurred among higher income groups, which was a very positive improvement (particularly among groups with more than 80 percent of AMI), because the previous estimates appeared to be much too high. In terms of the effect on this report, because the changes occurred among higher income respondents, and because the estimates of assistance below the very low-income threshold were relatively small, a large effect on the estimates of worst case housing needs was unlikely.

The exact survey questions for both the 2005 and 2007 AHS surveys are included in Appendix C.

#### Income

The 2007 AHS included a small modification of the income questions. It subdivided the combined "interest/dividend/rental" question into separate income receipt items. It also modified the "other income" question to no longer include child support or alimony.

### **Physical problems**

The 2007 AHS eliminated the questions about hallways (common stairways and light fixtures) in multi-unit structures in the section on selected physical problems. This change affects the classification of units having severe or moderate physical problems.

Other changes to the survey instrument are unlikely to have affected the estimates on affordable housing needs included in this report.

<sup>&</sup>lt;sup>1</sup> For additional discussion of the changes on housing assistance, see the report, "Streamlining the American Housing Survey" (June 2009), U.S. Department of Housing and Urban Development, prepared by Eggers, Frederick J., Econometrica, Inc. for PD&R; available at http://www.huduser.org/datasets/ahs.html. See "Appendix: Assisted Housing Items in 2007 AHS."

### Weighting

Because the AHS is based on a sample of housing units rather than a census of all housing units, estimates based on the data must be "weighted up" so that totals for each year match independent estimates of the total housing stock by better representing it. The Census Bureau "weights up" responses to account for undercoverage of households (about 2.2 percent) and household nonresponse (about 11 percent). The weights for 2001–2007 AHS data used in this report are based on the 2000 Census of Housing, with adjustments for estimated change since then.

### **Exclusions From the AHS Data**

Households reporting incomes that are zero or negative are excluded from estimates of worst case needs, although they are included in counts of total households. If such households pay rents greater than the fair market rent (FMR) while reporting zero or negative incomes, then their income situation is presumably temporary, and so they are included and higher incomes are imputed to them.

### **Household and Family Types**

### **Households and Families**

In this report, the terms "family" and "household" are not interchangeable. Although all families are households, not all households are families. A household is any group of persons living in the same housing unit. "Household" types include households with relatives, households with children, elderly single persons age 62 or older, and single persons with disabilities. "Families" refers only to a subset of households that have one or more persons in the household related to another householder by birth, marriage, or adoption.

### **Families With Children**

Household type in which a child under age 18 is present. They are presumed to meet the definition of family through relation by birth or adoption (including grandparents as parents).

### **Elderly Households**

Household type in which at least one householder or spouse is age 62 or older and no children are present.

### **Disabled Households**

Household type that includes only households that (1) are not families with children, (2) are not elderly households, and (3) receive some form of income or government assistance that is very likely to indicate that an adult with disabilities is present in the household. The "proxy" of type of income or assistance is necessary because the AHS

does not ask survey respondents directly about disabilities. To improve the reliability of these estimates, in 2005 the AHS survey was updated with improved questions on receipt of various government supplemental income programs. Based on these changes to the AHS survey, the income proxy for counting households as a "disabled household" is if it meets the criteria above and reports having received assistance from Social Security, Supplemental Security Income (SSI), public welfare, or "worker's compensation or other disability payment." It is important to note that persons with disabilities may be present in other household types (e.g., families with children, elderly households), although this report includes a separate estimate of the number of families with children that also are likely to have an adult with disabilities present based on a modified income proxy (whether they reported receiving Social Security/railroad retirement, SSI, or "retirement, survivor, disability payments"). Additional discussion of the changes in this methodology are contained in the report, *Housing Needs of Persons With Disabilities: Supplemental Findings to the Affordable Housing Needs 2005 Report (February 2008)*.

#### **Other Households**

Household type that consists of persons who are neither elderly, nor disabled and do not have children in the household. This group may be further broken down into "other families" (related persons without children) and "other non-family households" (single persons, or unrelated persons sharing housing). The definitions of these two subtypes of "other households" are as follows:

**Other families.** Household subtype in which a householder is nonelderly and has no children and in which either one or more people are related to the householder by birth, marriage, or adoption or one or more subfamilies reside there that have members related to each other by birth, marriage, or adoption.

**Other non-family households.** Household subtype in which a single nonelderly person lives alone or lives with only non-relatives. The "other nonfamily" subgroup appearing in Table A-7a and others accounts for a significant proportion (25 percent) of households with worst case needs, even after excluding those with disabilities. Most of these households are single persons living alone rather than unrelated persons sharing housing.

### **Housing Problems**

### **Rent or Cost Burden**

A ratio between housing costs (including utilities) and household income that exceeds 30 percent, which is a conventional standard for housing affordability. To the extent that respondents underreport total income, the AHS estimates may overcount the number of households with cost burden. A "severe" cost burden occurs when housing costs exceed 50 percent of reported income. A "moderate" cost burden exceeds 30 percent but is less than or equal to 50 percent of reported income. Cost burdens qualify as potential worst case needs only if they are severe rent burdens. Households reporting zero or negative income are defined as having no cost burden.

### **Inadequate Housing**

Housing with severe or moderate physical problems, as defined in the AHS since 1984 and modified as necessary to reflect changes in the survey.<sup>2</sup> Severe inadequacies constitute potential worst case housing needs, but moderate inadequacies do not.

A unit is defined as having severe physical inadequacies if it has any one of the following four problems:

- 1. **Plumbing.** Lacking piped hot water or a flush toilet or lacking both bathtub and shower, all for the exclusive use of the unit.
- 2. **Heating.** Having been uncomfortably cold during the past winter for 24 hours or more, or three times for at least 6 hours each time, due to broken-down heating equipment.
- 3. **Electrical.** Lacking electricity or having all of the following three electrical problems: exposed wiring, a room with no working wall outlet, and three or more blown fuses or tripped circuit breakers in the past 90 days.
- 4. **Upkeep.** Having any five of the following six maintenance problems: leaks from outdoors, leaks from indoors, holes in the floor, holes or open cracks in the walls or ceilings, more than a square foot of peeling paint or plaster, or rats in the past 90 days.

A unit is defined as having moderate inadequacies if it has any of the following four problems but none of the above severe problems:

- 1. **Plumbing.** Having all toilets break down simultaneously at least three times in the past 3 months for at least 3 hours each time.
- 2. **Heating.** Having unvented gas, oil, or kerosene heaters as the main source of heat (because these heaters may produce unsafe fumes and unhealthy levels of moisture).
- 3. **Upkeep.** Having any three of the six upkeep problems mentioned under severe inadequacies.
- 4. **Kitchen.** Lacking a sink, range, or refrigerator for the exclusive use of the unit.

### **Overcrowding**

The condition of having more than one person per room in a residence. Overcrowding is counted as a moderate problem rather than a severe problem that constitutes a potential worst case need.

<sup>&</sup>lt;sup>2</sup> The AHS rates housing units using a three-level measure: adequate, moderately inadequate, and severely inadequate. The questions underlying definitions of inadequate housing were changed in the 1997 AHS questionnaire to improve accuracy. For further details, see the entry for the variable ZADEQ in the *Codebook for the American Housing Survey, Public Use File: 1997 and Later.* The most recent version is available for download at http://www.huduser.org/datasets/ahs/ahsprev.html.

### "Priority" Problems

Problems qualifying for federal preference in admission to assisted housing programs between 1988 and 1996: paying more than one-half of income for rent (severe rent burden), living in severely substandard housing (including being homeless or in a homeless shelter), or being involuntarily displaced. These problems informed the original definition of worst case needs. Because the AHS sample tracks housing units and thus cannot count the homeless, AHS estimates of priority problems are limited to the two severe problems described above: severe rent burdens greater than 50 percent of income or severe physical problems. In accord with the intention to estimate the number of unassisted very low-income renters with priority problems, a number of tables in Appendix A classify households with a combination of moderate problems and severe problems as having severe problems.

### **Income Measurement**

### **Income Sources**

"Income" means gross income reported by AHS respondents for the 12 months preceding the interview. The 2007 AHS income questions were very similar to those used in 2005. The only change was that the combined "interest/dividend/rental income" question was split into separate items. The "other income" question was also modified to no longer include child support or alimony. For each person in the family, the AHS questionnaire collects the amounts of 13 different types of income. Income includes amounts reported for wage and salary income, net self-employment income, Social Security or railroad retirement income, public assistance or welfare payments, and all other money income prior to deductions for taxes or any other purpose. Imputed income from equity is not included as income in this report. Following HUD rules for determining income eligibility for HUD programs, the earnings of teenagers aged 17 years and younger are not counted as income for this report.

### **Supplemental and In-Kind Income Sources**

In the 1999–2005 AHS, poorer renters with high rent burdens were asked several new questions about whether persons outside their household contributed to household expenses such as rent, food, and childcare. The supplemental questions were asked of assisted renters who paid more than 35 percent of their reported income for rent and of unassisted renters with household income below \$10,000 who paid more than 50 percent of their income for rent. These questions were not asked in 2007, because the module could not be translated to the Census Bureau's new computer language (Blaise) in time. The AHS will include this module again, beginning with the 2009 survey.

### **Family Income**

Reported income from all sources for the householder (the first household member aged 18 years or older who is listed as an owner or renter of the housing unit) and other household members related to the householder.

### **Household Income**

Reported income from all sources for all household members aged 18 or older.

### **Income Categories**

### **HUD-Adjusted Area Median Family Income and Official Income Limits**

HUD is required by law to set income limits each year that determine the eligibility of applicants for assisted housing programs. In 1974, Congress defined "low income" and "very low income" for HUD rental programs as incomes not exceeding 80 and 50 percent, respectively, of the area median family income, as adjusted by HUD.<sup>3</sup> The HUD-adjusted area median family income (HAMFI) is also referred to as the area median income (AMI), although the latter term may be subject to misinterpretation. Note that income limits are based on median *family* income, not median household income. Each base income cutoff is assumed to apply to a household of four, and official income limits are further adjusted by household size: one person, 70 percent of base; two persons, 80 percent; three persons, 90 percent; five persons, 108 percent; six persons, 116 percent; and so on. Each household is assigned to an income category using the income limit appropriate to its area and the number of household members.

Statutory adjustments to official income limits in 1999 included upper caps and lower floors for areas with low or high ratios of housing costs to income and, for each nonmetropolitan county, a lower floor equal to its state's nonmetropolitan average. These statutory adjustments do not apply for 2001–2007 estimates.

### **Income Cutoffs in Association With AHS Geography**

To categorize households in relation to local income limits as accurately as possible within the limitations of the geography given on the AHS public use files, HUD compares household incomes with area income limits. Very low-income and low-income cutoffs for a household of four are defined for each unit of geography identified in the AHS national microdata files. For housing units outside these metropolitan areas, the AHS geography identifies only four regions, metropolitan status, and six climate zones. Average income limits were estimated for each of these 48 locations.

Because developing estimates of official income limits for the geography identified on the AHS microdata was time consuming, HUD prepared income limits to use with AHS geography for only 3 years: 1978, 1986, and 1995. Beginning with the 2003 AHS, income cutoffs have been based on HUD's official income limits for those years, weighted by AHS weights. These cutoffs are added to the AHS public use file by the Census Bureau.

<sup>&</sup>lt;sup>3</sup> See HUD (2005b) for a description of current adjustments.

<sup>&</sup>lt;sup>4</sup> For each of these years, HUD revised income limits for all locations in the country based on income data from the most recent decennial Census of Population and Housing. Similarly, HUD weighted the averages for nonmetropolitan areas by population, based on the decennial census.

### **Categorizing Households by Income**

For this report, when households are categorized using the very low-income and low-income cutoffs, the cutoffs are adjusted for household size using the same adjustment factors used by HUD programs.

In addition, households reporting negative income are attributed incomes just above the AMI if their monthly housing costs exceeded the FMR and they lived in adequate and uncrowded housing. The justification for imputing higher incomes is that many households in this situation live in housing with amenities such as dining rooms, balconies, and off-the-street parking and thus may be reporting only temporary accounting losses.

For housing needs estimates using AHS data since 1985, HUD has classified households with incomes above AMI by comparing their income to the actual median family income for the location, rather than with 80 percent of the low-income cutoff, as was the only approach possible for estimates made through 1983.

- Extremely low income. Income not in excess of 30 percent of HAMFI. In 2007, 13.9 percent of AHS households reported income below 30 percent of HAMFI.
- Very low income. Income not in excess of 50 percent of HAMFI. Very low income thus includes extremely low income, although the term sometimes is used loosely in specific contexts, such as mismatch analysis, to mean incomes between 30 and 50 percent of HAMFI. In 2005, 28.6 percent of AHS households reported incomes below the very low-income cutoffs.
- Low income. Reported income not in excess of 80 percent of HAMFI or, if lower, the national median family income. In 2007, 44.8 percent of AHS households reported incomes that fell below the low-income cutoffs.
- Poor. Household income below the national poverty cutoffs for the United States for that household size. (As discussed in Appendix A of the Census Bureau's AHS publications, AHS poverty estimates differ from official poverty estimates made from the Current Population Survey. AHS poverty estimates are based on income of households rather than income of families or individuals, and AHS income questions are much less detailed and refer to income during the past 12 months rather than for a fixed period.) The poverty cutoff for a family of four approximates 33 percent of HAMFI. In 2007, 46 percent of very low-income households and 81 percent of extremely low-income households were poor.
- Middle income. For this report, income above 80 percent and below 120 percent of HAMFI. In 2007, 16.9 percent of AHS households were in this category.
- **Upper income.** For this report, households with income above 120 percent of HAMFI. In 2005, 38.28 percent of households were in this category.

### **Housing Assistance Status**

The 1997 AHS included significant changes to the questions on this subject, in both content and order, from questions used earlier. After careful review, HUD and the Census Bureau adopted the following procedure to identify assisted units in a way that produces results that are more comparable to pre-1997 data. These questions were further refined in 2007 as a result of additional cognitive research, to:

- Determine whether the household must re-certify in order to determine the rent it pays;
- Determine whether the rent is lower because of a Federal, State, or local government housing program;
- Determine whether the household has a housing voucher, and, if so, whether it can be used to move to another location;
- Determine whether the housing authority is the household's landlord; and
- Determine whether the household was assigned to its housing unit or whether the householders were allowed to choose it themselves.

### Location

### **Metropolitan Statistical Area**

From 1973 to 1983, the definitions of metropolitan location in AHS data corresponded to the 243 Standard Metropolitan Statistical Areas used in the 1970 Census. Since 1984, the definition of metropolitan location in the AHS has referred to the MSAs defined in 1983, based on the 1980 census.

### Region

The four census regions are the Northeast, Midwest, South, and West.

### Mismatch of Supply and Demand for Affordable Rental Housing

### **Mismatch**

The discrepancy between the number of rental units needed by renters of various income categories and the number provided by the market that are affordable at those income levels.

### **Affordability**

Several federal rental programs define "affordable" rents as those requiring not more than 30 percent of an income cutoff defined in relation to HAMFI. Under the Low-Income Housing Tax Credit (LIHTC), for example, housing units with rents that are "affordable" to families at 60 percent of HAMFI qualify as affordable and eligible for the credit.

This report generalizes the approach developed to define LIHTC maximum rents for units of different sizes to define three categories of affordability (extremely low income, very low income, and low income) based on the incomes that are sufficient for the rents: at or below 30 percent of HAMFI, above 30 and up to 50 percent of HAMFI, and above 50 percent of HAMFI. Gross rents for each unit, including payments for utilities, are compared to 30 percent of HUD's 30 percent and 50 percent of HAMFI income limits.

The income limits used to define rent affordability are adjusted for number of bedrooms using the formula codified at 26 U.S.C. 42(g)(2)(C): no bedrooms, 70 percent of base; one bedroom, 75 percent; two bedrooms, 90 percent; three bedrooms, 104 percent; four bedrooms, 116 percent; plus 12 percent of base for every additional bedroom. This formula assumes that an efficiency unit houses one person, a one-bedroom unit houses 1.5 persons, and each additional bedroom houses another 1.5 persons. For vacant units, the costs of any utilities that would be paid by an occupant were allocated using a "hot deck" technique based on a matrix of structure type, AHS climate code, and eight categories of gross rent.

### **Three Measures of Affordability**

The following three measures are used in chapter 3 to analyze the sufficiency of the rental housing stock in relation to household incomes:

- Affordability measures the extent to which there are enough rental housing
  units of different costs to provide each household with a unit it can afford
  (based on the 30 percent of income standard). Affordability is the broadest
  measure of housing stock sufficiency, addressing whether there are sufficient
  housing units if allocated solely on the basis of cost. The affordable stock
  includes both vacant and occupied units.
- Availability measures the extent to which affordable rental housing units are available to households within a particular income range. Some households that are not of lower income choose to spend less than 30 percent of their incomes on rent, occupying housing that is affordable to households of lower income. Such housing units are thus not available to the lower income households. A unit is available at a given level of income if it is affordable at that level, and is either: (1) occupied by a household with that income or less or (2) vacant.

<sup>&</sup>lt;sup>5</sup> Note that this adjustment procedure is similar to, but distinct from, the adjustment of income limits described under Income Categories.

The availability measure removes units from consideration if they have artificially low rents because they are occupied as a benefit of employment (for example, by caretakers) or because they are owned by relatives or friends of the occupants. The 2007 AHS data indicate that 2.1 million renter households (6.1 percent) occupied their units while paying no rent. The AHS does not provide estimates of the number of households paying a positive but belowmarket rent because of employment or other reasons.

 Adequacy extends the concept of availability by considering whether sufficient rental units are physically adequate as well as available and affordable.

### Categorizing Rental Units by Affordability and Households by Income

For the analysis of mismatches between affordability and income in chapter 3, household incomes and housing unit rents were compared to 2007 income limits (for income and rent categories up to and including 80 percent of HAMFI) and to the actual median family incomes (for categories above 80 percent of HAMFI). As in the analysis of household income, households reporting negative income were redefined as having incomes just above median income if their monthly housing costs were above the FMR and they lived in adequate and uncrowded housing.

This approach, compared with the approach used in previous reports, provides more accurate estimates of the numbers of housing units qualifying as affordable under rules such as those regulating the HOME program and LIHTC. For LIHTC, housing that is affordable to incomes at 60 percent of median income must have rents that are no more than 30 percent of 120 percent of HUD's applicable very low-income limits (with appropriate adjustments for the number of bedrooms). For ease of calculation, analyses of shortages of affordable housing in previous worst case housing needs reports had compared income and rents to multiples of HAMFI; however, the statutory adjustments made in deriving HUD's official very low-income limits on average make the actual very low-income limits higher than 50 percent of median income. Therefore, the previous data tended to undercount both the number of renters and the number of units defined as affordable to them.

For purposes of mismatch analysis, units with "no cash rent" reported are categorized solely on the basis of utility costs. Utility costs are allocated to vacant units through "hot-deck" imputation based on units that are comparable on the basis of cost, number of units, region, and tenure.

### **Race and Ethnicity**

In 2003, the AHS began using revised Census Bureau categories of race and ethnicity that are not directly comparable with the 2001 and earlier AHS. Survey respondents now are allowed to select more than one racial group, causing slight but significant decreases in the size of previously monolithic categories.

# Appendix C. Changes to the AHS Survey Questions, 2005 to 2007, Regarding Receipt of Housing Assistance

This table shows the questions used by AHS interviewers to ask survey respondents about whether they received various forms of government assistance with their rent, including whether the respondent received assistance through a government rental housing assistance program.

The full survey instruments are available at www.huduser.org/ahs.html.

#### Questions Used by AHS Interviewers (1 of 4)

Questions used by AHS interv		Type of Change to Survey
2005	2007	Question
HCST12a_RENEW-	RENEW	Clarified the question
As a part of your rental agreement, [fill temp] need to answer questions about [fill temp2] income whenever your lease is up for renewal?  (1) Yes (2) No	(Some rental agreements include a special re-certification process. Re-certification means a renter is REQUIRED to report everyone who lives with them, all jobs, all savings and sources of income AND this determines the amount of rent they have to pay.) Do you have to recertify to determine the amount of rent you pay?  (1) Yes	
	(2) No	
HCST12b_REPHA-		Dropped the question
To whom [fill temp] report [fill temp2] income		
***READ THESE CATEGORIES TO THE RESPONDENT***		
(1) A building manager or landlord? (2) A public housing authority or a state or local housing agency? (3) Or, someone else? Specify (D) Don't know ***DO NOT READ THIS ONE TO THE RESPONDENT***		
HCST12c_SUBRNT1-	SUBRNT1	Clarified the question
[fill temp] pay a lower rent because the government is paying part of the cost of the unit?	Is your rent amount lower because you are in either a Federal, State or local government housing program?	
(1) Yes (2) No (D) Don't know - not sure	(1) Yes (2) No	

### Questions Used by AHS Interviewers (2 of 4)

2005	2007	Type of Change to Survey  Question
HCST12d_PROJ1- s the building owned by a public		Clarified the question (see PROJ1 below)
nousing authority?		
2) No D) Don't know - not sure		
HCST12e_APPLY-		Clarified the question (see APPLY below)
How did [fill temp] come to ve here? Did [fill temp2] apply on [fill temp3] to the management here, OR did in agency, such as public housing authority assign this address to fill temp]?		
Applied to management on own     Assigned to specific address		
HCST12f_VCHER-	VCHER	Clarified the question
oid a public housing authority, or ome similar agency, give you a CERTIFICATE or VOUCHER to help ay the rent for this [fill HTYPEFILL]?	(A housing voucher gives a renter the right to choose where they live AND it helps pay for rent.)  Does your household have a housing voucher?	
1) Yes 2) No	(1) Yes (2) No	
	VCHRMOV	New question
	Can you use your housing voucher to move to another location?	
	(1) Yes (2) No	
	PROJ1	Clarified the question (see PROJ1 in first column above and
	Is the housing authority your landlord?	PROJ2 below)
	(1) Yes (2) No	
	APPLY	Clarified the question (see HCST126 APPLY in column
	Was your household assigned to this specific ^HTYPEFILLAPPLY, or were you allowed to choose it yourself?	1 above)
	<ul><li>(1) Household assigned to specific living quarters</li><li>(2) Household allowed to choose</li></ul>	

### Questions Used by AHS Interviewers (3 of 4)

Questions Used by AHS Interv		
2005	2007	Type of Change to Survey Question
HCST12g_RCNTRL1-	RCNTRL1	Slight change to the question
Does the government limit the rent on the unit through rent control or rent stabilization?	Does the government limit the rent on your ^HTYPEFILL through rent control or rent stabilization?	
(1) Yes (2) No	(1) Yes (2) No	
HCST13a_RNTADJ1-	RNTADJ1	No change to the question (not related to rental assistance)
Does anyone in the household work for the owner, or is anyone related to the owner?	Does anyone in the household work for the owner, or is anyone related to the owner?	,
(1) Yes (2) No	(1) Yes (2) No	
HCST13b_RNTAJ2-	RNTADJ2	No change (not related to rental assistance)
Is the rent adjusted because someone in the household works for or is related to the owner?	Is the rent adjusted because someone in the household works for or is related to the owner?	,
(1) Yes (2) No	(1) Yes (2) No	
HCST13c_PRENT-	PRENT	No real change to the question (slight change in instruction to interviewer
Of the [fill temp1][fill temp] rent you reported, how much is this household required to pay?	Of the ^RENTAMOUNTFILL rent you reported, how much is this household required to pay?	on how to record the answer)
[bold]FR: MARK (None) WITHOUT ASKING IF NO CASH RENT[normal]		
(0) None (1-9997) \$1-\$9,997		
HCST13cPROB-		Dropped the question
The total amount for the rent for this [fill HTYPEFILL] is the same amount that you are required to pay, is this correct?		
<ul><li>(1) No, [fill temp] is incorrect</li><li>(2) No, [fill temp2] is incorrect</li><li>(3) Yes, both are correct</li></ul>		

### Questions Used by AHS Interviewers (4 of 4)

2005	2007	Type of Change to Survey  Question
HCST14a_PROJ2-	PROJ2	No change—but switched order and moved to below SUBRNT2
Is the building owned by the public housing authority?	Is the building owned by the public housing authority?	moved to below GGBI IIVIZ
(1) Yes (2) No	(1) Yes (2) No	
HCST14b_SUBRNT2-	SUBRNT2	No change to the question— (switched order and this is now
Does the Federal, State, or local government pay some of the cost of the unit?	Does the Federal, State, or local government pay some of the cost of the unit?	asked before PROJ2)
(1) Yes (2) No	(1) Yes (2) No	
HCST14c_RCNTRL2-	RCNTRL2	No change to the question
Does the local government limit the rent on the unit through rent control or rent stabilization?	Does the local government limit the rent on the unit through rent control or rent stabilization?	
(1) Yes (2) No	(1) Yes (2) No	

# Appendix D. Additional Examination of the 2005-to-2007 Trend in Worst Case Needs

This Appendix explores the small reported decline in worst case needs alongside various other trends, for instance changes in household incomes over the same 2005-to-2007 period.

The slight drop in worst case needs between 2005 and 2007 may be surprising in light of the current economic situation. Although economic conditions were somewhat better in the 2005-to-2007 period, that alone does not explain the drop.

The analysis concludes that the key factor in the small decline in worst case needs was a decline in the number of households reported as extremely low-income renters in the American Housing Survey (AHS)—from 9.729 million households in 2005 to 9.243 million households in 2007. This decline in the total number of extremely low-income renter households occurred as U.S. household incomes increased but HUD Area Median Income Limits changed only slightly.

### **National Trend in Poverty and Income**

Exhibit D-1 shows national poverty rates, both for persons and for families. It also displays the number of extremely low-income renter households (HUD's income category closest to family poverty) and households with worst case needs, over time. There is a general correlation between the number and proportion of households with incomes below the poverty line, or below the extremely low-income threshold, and worst case housing needs.

Exhibit D-1. National Poverty Trends Correspond With Worst Case Housing Needs, 1999–2007

		· · · · · · · · · · · · · · · · · · ·			<b>9</b> ,			
	Persons in Poverty  Number Percent		Families in Poverty  Number Percent		Extremely Low- Income Renters Percent Number (house-		Worst Case Housing Needs Percent Number (house-	
	(1,000)	(persons)	(1,000)	(families)	(1,000)	holds)	(1,000)	holds)
2007	37,276	12.5	7,623	9.8	9,243	8.3	5,905	5.3
2005	36,950	12.6	7,657	9.9	9,729	8.9	5,992	5.7
2003	35,861	12.5	7,607	10.0	9,077	8.6	5,175	4.9
2001	32,907	11.7	6,813	9.2	8,659	8.2	5,014	4.9
1999	32,791	11.9	6,792	9.3	8,553	8.3	5,591	5.4

Note: Poverty data for 1999 reflect implementation of Census 2000-based population controls.

Sources: U.S. Census Bureau, Current Population Survey (http://www.census.gov/hhes/www/poverty/histpov/histpov/b.html) and HUD PD&R tabulations of American Housing Survey data

### **Changes in Income and Rent of Renter Households**

Exhibit D-2 summarizes average incomes and average rents among both extremely low-income and other very low-income renters between 2003 and 2005. In general, the increase in worst case needs over this period was due to rents increasing faster than incomes.

The slight drop in worst case needs between 2005 and 2007 was accompanied by a drop in the number of very low-income renters reported in the AHS. There was a net decrease of 131,000 very low-income renter households during the 2005-to-2007 period reflecting a decrease of 486,000 extremely low-income renter households that was somewhat offset by an increase of 355,000 renters in the 30 to 50 percent of median income range. This might imply that incomes of both extremely low-income renters and other very low-income renters increased sufficiently to move them to a higher income group.

**Exhibit D-2.** 2003–2007 Change in Very Low-Income Renters, Incomes, and Rents, by Relative Income and Presence of Worst Case Housing Needs

	Extremely Low Income (0–30% Area Median Income)		Other Very Low Income (30–50% Area Median Income)			
	2003	2005	2007	2003	2005	2007
Renter households (thousands)	9,077	9,729	9,243	6,581	6,342	6,697
Average monthly income	\$666	\$653	\$679	\$1,706	\$1,741	\$1,835
Average monthly gross rent	\$519	\$564	\$584	\$587	\$641	\$682
Renter households with worst case needs (thousands)	3,999	4,643	4,327	1,176	1,349	1,578
Average monthly income	\$673	\$648	\$697ª	\$1,596	\$1,624	\$1,695
Average monthly gross rent	\$607	\$647	\$707ª	\$879	\$935	\$966

<sup>&</sup>lt;sup>a</sup> Note: These are average incomes and gross rents across the entire population of extremely low-income worst case needs households. Median monthly incomes for this group were \$675, and median monthly gross rents were \$600.

Source: Department of Housing and Urban Development, Office of Policy Development and Research, tabulations of American Housing Survey data (see table A-14 in appendix A)

An examination of the exhibit in greater detail, shows some differences in the reported incomes between extremely low-income renters (falling in 2005 then rising in 2007) and those of renters in the 30 to 50 percent of area median income group (rising in all years), while both groups saw rent increases throughout the period. In the case of extremely low-income renters, while there were slight fluctuations in income, in dollar terms these were quite small and were offset by larger increases in monthly rents. While the 30 to 50 percent of median income group reported increases in income, in the case of those with worst case needs the increases were exceeded by larger monthly rent increases.

Overall, in the period covered here, the most important factor affecting trends in the number of worst case needs is the number of extremely low-income renter households reported in any given year.

One interesting point to note is that among extremely low-income renters, those with worst case needs actually had higher incomes than the overall average for the entire group. However, the monthly rents among the worst case needs households were much larger than the average rent among all extremely low-income renters.

The balance of very low-income renters—those with incomes of 30 to 50 percent of median—show a slightly different pattern. Those households with worst case housing needs have lower incomes than the overall average income for this income group, and had much higher monthly rents.

For both income groups, any increases in income substantially lagged increases in rents over the longer span of 2003 to 2007. Extremely low-income renters with worst case needs experienced average income gains of 4 percent compared with rent increases of 16 percent. In the 30 to 50 percent of median group, households with worst case needs had income gains of 6 percent compared with rent increases of 10 percent.

### Decline in the Number of Extremely Low-Income Renter Households, 2005 to 2007

The 2005-to-2007 decrease in worst case needs is primarily attributable to a reduction in the number of extremely low-income renters reported in the AHS from 9.73 million in 2005 to 9.24 million in 2007. This decrease was somewhat offset by an increase in the number of renter households in the 30 to 50 percent of median income group (from 6.34 million to 6.69 million households).

Exhibit D-3. Number of Households, by Income, 2005–2007

Incomes	Household: Occupied 2005		Households in Rental Housing 2005 2007		
Less than \$5,000	1,318,719	1,116,835	2,528,328	2,217,776	
\$5,000 to \$9,999	2,028,639	1,669,470	3,734,925	3,226,855	
\$10,000 to \$14,999	3,121,838	2,774,169	3,766,553	3,564,324	
\$15,000 to \$19,999	3,221,200	2,899,533	3,260,732	3,166,420	
\$20,000 to \$24,999	3,598,038	3,261,557	3,206,276	3,027,254	
\$25,000 to \$34,999	7,374,632	6,794,518	5,372,875	5,278,834	
\$35,000 to \$49,999	10,913,097	10,374,308	5,836,569	5,931,438	
\$50,000 to \$74,999	15,792,934	15,659,996	5,208,347	5,628,196	
\$75,000 to \$99,999	10,597,265	11,232,567	2,050,709	2,443,831	
\$100,000 to \$149,999	9,992,977	11,538,638	1,264,559	1,613,819	
\$150,000 or more	6,359,643	8,193,513	541,762	764,126	
Total	74,318,982	75,515,104	36,771,635	36,862,873	

Sources: U.S. Census Bureau, American Community Survey; Office of Policy Development and Research tabulations

The drop in the number of extremely low-income renters reported in the AHS between 2005 and 2007 is consistent with additional data from the Census Bureau's American Community Survey (ACS) combined with HUD's area median income limits during the same period. The ACS data show that fewer households were in the income groups with the least amount of income (see Exhibit D-3). At the same time, HUD's area median income limits changed very little during this period. HUD defined 30 percent of median income (on a national average) at \$17,400 in 2005, with only a slight increase to \$17,700 in 2007. Thus, while incomes for the lowest income groups were increasing during this period, HUD's income limits remained relatively stable (resulting in fewer households falling under the "extremely low-income" threshold).

### **Additional Examination of the 2005-to-2007 Changes**

In order to understand the relative effects of the various factors that affected worst case needs during the 2005-to-2007 period, a shift-share analysis may be useful. A shift-share analysis attempts to identify the relative significance of various factors affecting worst case needs, imputing a measure of "shift" to each "share." Although such a model is sensitive to what factors are included, it remains instructive. The factors below reflect the changes estimated between the 2005 and 2007 AHS samples for successively smaller subsets of the population. Each succeeding calculation nets out the contribution of the larger base groups—but the remaining change becomes relatively more important because it focuses more specifically on households with worst case needs.

- Population growth and household formation: 1,818,000 additional households account for a 1.7 percent increase in worst case needs.
- Tenure shift: 1,103,000 additional renter households account for a 1.6 percent increase in worst case needs.
- Income shift: 131,000 reduction in very low-income renters accounts for a 4.1 percent decrease in worst case needs.
- Lack of assistance shift: 54,000 increase in very low-income renters without housing assistance accounts for a 1.3 percent increase in worst case needs.

<sup>&</sup>lt;sup>1</sup> Between 2005 and 2007, HUD changed its methodology for determining income limits. See Attachment 2 of http://www.huduser.org/datasets/il/il07/IncomeLimitsBriefingMaterial.pdf entitled "HUD Methodology for Estimating FY 2007 Median Family Incomes" for a detailed explanation of the methodology used for fiscal year 2007.

• Severe problems shift: 87,000 decrease in severe housing problems (worst case needs) among unassisted very low-income renters generates the residual 1.9 percent decrease in incidence of worst case needs.

These percentage shares sum to a net decrease in worst case needs by 1.5 percentage points, equaling the change from 5.992 million in 2005 to 5.905 million in 2007.<sup>2</sup>

<sup>&</sup>lt;sup>2</sup> Two additional cautionary items: First, the total number of renter households increased by 1.10 million between 2005 and 2007, a statistically significant increase of 3.2 percent in the universe of renters. In the absence of additional information, worst case needs would be expected to increase in parallel with increases in renters. (The number of homeowners increased by only 0.1 percent.) Second, there was a shift of households between income classes so that, compared with 2005 estimates, there were 0.13 million fewer very low-income renters and 1.23 million more renters with higher incomes. This shift may be due to a methodological change in the questions about income in the 2007 AHS instrument. Because very low-income renters are the population susceptible to worst case needs, the 0.8 percent decrease in their number reduced the incidence of worst case needs despite the overall increase in renter households. In any case, changes in both the number of very low-income renters and the number of worst case needs between 2005 and 2007 are not statistically significant.