

# Affordable Housing Is Associated with Greater Spending on Child Enrichment and Stronger Cognitive Development

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**H**ousing affordability has long been a concern of government. As far back as the 1930s, President Roosevelt promoted affordable housing, including creating the Home Owners Loan Corporation to protect small homeowners from foreclosure. In the 1940s, federal policymakers formalized a rule of thumb widely used by bankers and others that set “affordable” in government housing policy as “a week’s wages for a month of rent,” or about 25 percent of monthly income. That rule of thumb—albeit now at 30 percent—continues to guide federal housing policy, although it was never empirically put to the test.

This brief builds on the growing understanding that affordable housing, via the additional income it provides families to invest in their children, has a strong connection to children’s cognitive development. This study is also the first to empirically confirm the soundness of the 30 percent rule of thumb.<sup>1</sup>

## Family Budgets and Children’s Development

When housing is affordable, families theoretically have extra “give” in their budget to spend on other things, including child enrichment activities. But do they spend more on child enrichment activities, and does it matter? An earlier study found that spending approximately 30 percent of household

### KEY FINDINGS

- Families who spend 30 percent of their household income on rent spend \$125 more per year on child enrichment than those who spend only 10 percent of income on rent, and \$75 more than those who devote 50 percent of their income to rent.
- The sweet spot of spending on children’s enrichment items is when families spend approximately 30 percent of their income on housing.
- Those with the most and least affordable housing spend the least on child enrichment items.
- The findings empirically support the rule of thumb that “affordable” housing is roughly 30 percent of household income.

income on housing was associated with greater cognitive development in children.<sup>2</sup> In fact, along the entire range of spending on housing, devoting around 30 percent of income to housing was the “sweet spot” for the best performance on measures of cognitive development. Spending less than 30 percent or significantly more was associated with poorer performance on tests of math and reading achievement.

The current study draws on a large survey of consumer spending to determine whether the stronger cognitive development is because of additional spending on child enrichment items, such as books, museum trips, or music lessons.

The study limits the participating families to those with incomes below approximately \$30,000 a year, or at or below 200 percent of the federal poverty line.

## “Affordable” Housing Is Associated with Greater Family Spending on Children

On average, the modest-income families in the study spent about \$4,000 a year on their children between 2004 and 2009, including necessities and enrichment activities. Approximately \$1,000 of that amount is for enrichment items alone. Only a small fraction of these families, approximately one in ten, spent nothing on child enrichment.

The study finds that spending roughly 30 percent of household income on housing is associated with the greatest spending on child enrichment. Spending on child enrichment items increases until housing costs reach 30 to 35 percent of income and then declines as housing cost burdens grow. Thus, both those spending the least and the most on housing (those at the extreme ends of the distribution) spend less on their children’s enrichment than those spending approximately 30 percent of income to housing. As in the earlier study, children in families spending roughly 30 percent of income on housing performed best on tests of cognitive skills.

A family spending approximately 30 percent of its income on housing spent about \$125 more on their children’s enrichment activities per year than those who spent 10 percent of income on housing, and \$50 more than those who spent half their income on housing. (A family that devoted 10 percent of its income to housing spent approximately \$800 annually on child enrichment, while a family devoting 50 percent to housing spent approximately \$875). Interestingly, at 60 percent, spending declines dramatically and at a much faster rate.

These findings help to explain the earlier findings that lower housing costs burdens were not necessarily better for children’s cognitive development. In this current analysis, families with the lowest housing cost burden (spending only 10 percent) on housing are not devoting their additional disposable income to child enrichment. This is also the group with the highest incomes in the sample, and they are worth exploring further in future research. On the other hand, the lower spending could also signal that this group is paying so little for their housing because the housing is substandard, which is known to have greater health risks and negative impacts on cognitive and social-emotional development, as a brief by Rebekah Levine Coley and colleagues in this series attests.<sup>3</sup>

## Policy Implications

Evidence reveals that investing in children’s cognitive and social-emotional development pays off not only in greater success in school, but in less incarceration, higher employment, and less reliance on public programs later in life.<sup>4</sup> The current findings show that affordable housing can play a role in those investments.

The results argue for policies that help low-income families with children attain a housing cost burden of roughly 30 percent so that they can invest more in their children’s development. Recent analysis by the Joint Center for Housing Studies shows that more than one-third of all U.S. households spend more than 30 percent of their income on housing costs, and that half of all renters do. These rates of housing cost burden demonstrate that if their housing is made affordable to this standard, for example through direct subsidy, there is significant potential for households to redirect dollars spent on housing to their children’s enrichment.<sup>5</sup>

The results also are the first to confirm empirically the validity of the rule of thumb that housing costs that exceed more than approximately 30 percent of income have a negative effect on investments in children. Although spending declines substantially beyond a 50 percent ratio—HUD’s definition of “severely burdensome”—spending on children drops off at twice the rate after reaching the 60 percent threshold than beyond the 50 percent mark.

## Study Design

The study uses data from the national Consumer Expenditure Survey (CEX) from 2004-2009. The study examines whether the effect on math and reading achievement is connected to spending on child enrichment items, and in turn housing affordability. The CEX is an annual survey of approximately 7,000 U.S. households, with each household interviewed for five consecutive quarters. It asks about spending on a more than 600 items and its regularity increases the chances of capturing seasonal and one-time purchases.

The study focused on families with children under age 12 and incomes at or below 200 percent of the poverty line. The 3,075 families in this study were typically younger (mothers were on average age 33), four-person minority households in metropolitan areas with fair market rents at about \$725 a month. In the current analysis, *child necessities* include food, clothing, health insurance, and medical costs. *Enrichment items* include child care, school fees, school resources, toys, musical instruments and instruction, playground equipment, admission to movies, theater, and

opera, and books and reading material. The study supports causal claims because the analytic techniques simulate an experiment in which the family's income and other observed characteristics are fixed so the role of those features is effectively removed. ■

## Endnotes

1. S.J. Newman and C. S. Holupka, "Housing Affordability and Investments in Children," *Journal of Housing Economics*, vol. 24 (2014), available at <http://dx.doi.org/10.1016/j.jhe.2013.11.006>
2. S. Newman and S Holupka, "Housing Affordability and Children's Well-Being," *Housing Policy Debate* (2014), available at [www.tandfonline.com/doi/abs/10.1080/10511482.2014.899261#.U8PuSY1dXXO](http://www.tandfonline.com/doi/abs/10.1080/10511482.2014.899261#.U8PuSY1dXXO)
3. See also W. Grigsby and S. Bourassa, "Section 8: The Time for Fundamental Program Change?" *Housing Policy Debate*, vol. 15 (2004): 805-34; P. Emrath and H Taylor, "Housing Value, Costs, and Measures of Physical Adequacy," *Cityscape*, vol. 14 (2012): 99-126.
4. James Heckman, "The Case for Investing in Disadvantaged Young Children," (Chicago: The Heckman Equation, 2012), available at <http://www.aft.org/pdfs/americaneducator/spring2011/Heckman.pdf>
5. See Joint Center for Housing Studies, "State of the Nation's Housing, 2014" (Cambridge, MA: JCHS, 2014); and "America's Rental Housing: Evolving Markets and Needs" (Cambridge, MA: JCHS, 2013).

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## ABOUT THE HOW HOUSING MATTERS TO FAMILIES AND COMMUNITIES RESEARCH INITIATIVE

This brief summarizes research funded by the John D. and Catherine T. MacArthur Foundation as part of its How Housing Matters to Families and Communities Research Initiative. The initiative seeks to explore whether, and if so how, having a decent, stable, affordable home leads to strong families and vibrant communities. By illuminating the ways in which housing matters and highlighting innovative practices in the field, the Foundation hopes to encourage collaboration among leaders and policymakers in housing, education, health, and economic development to help families lead healthy, successful lives. The views expressed herein are not necessarily those of the MacArthur Foundation.

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