A homebuyer Subsidy and children's education

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Executive Summary

The Chilean DS01 homeownership subsidy program was designed to help low-income families secure stable housing by subsidizing home purchases. This policy brief presents new findings on the subsidy's effects on children's education and long-term economic prospects. Our study shows that children from families receiving the subsidy demonstrate meaningful improvements in school performance, college attendance, and employment rates, indicating that housing stability provided by the subsidy contributes to lasting socioeconomic benefits.

These findings underscore the potential of the DS01 subsidy as a policy tool to address educational disparities, reduce overcrowding, and support the broader economic mobility of Chile's low-income households. The evidence suggests that homeownership subsidies, beyond addressing housing needs, can generate enduring intergenerational impacts, positioning them as an effective strategy to tackle inequality.

Key Findings

- Significant Educational Gains: The children of subsidy-winning families experience substantial gains in educational outcomes, including higher grades, improved class ranking, and better performance on standardized tests. They also reduced their school absenteeism and grade retention.
- Impact Larger for Boys and Larger Families: Educational improvements were more pronounced for boys and children from larger families, where the subsidy helped alleviate overcrowding, creating a better learning environment at home.
- Long-Term Benefits: Children from subsidy-receiving families are more likely to complete high school
 and attend college. Additionally, those entering the labor market without pursuing college
 demonstrate higher employment rates, underscoring the subsidy's enduring influence on education
 and employment outcomes.
- Minimal Changes in Neighborhood and School Quality: Most families did not relocate far from their
 original neighborhoods, and school changes were limited, resulting in little variation in neighborhood
 or school quality before and after the subsidy. This is likely driven by the restrictive nature of the
 policy price caps.

Recommendations

- Promote Flexibility in Housing Location Choices: Consider increasing the price cap on housing prices to expand housing location options and encourage moves to higher-quality neighborhoods and schools, as limited relocation may restrict the program's broader potential benefits.
- Increase Awareness of Education Benefits: Conduct targeted outreach to inform potential applicants of the long-term educational benefits of the subsidy, fostering higher uptake among families with young children.
- Encourage Long-term Tracking and Support: Establish mechanisms to monitor the long-term educational and labor market outcomes of children in subsidized households, providing additional resources as needed to ensure sustained positive effects.

Introduction

Access to stable, quality housing is increasingly recognized as a foundation for economic mobility, impacting a range of life outcomes for low-income families. In 2011, Chile introduced the DS01 homebuyer subsidy program to address the housing affordability crisis, particularly in urban centers like Santiago. This program provided significant financial support to help low-income families purchase homes in the private market, covering nearly 85% of the home's value on average for the most vulnerable recipients.

While the primary aim of the DS01 program was to facilitate homeownership and alleviate housing instability, the broader social impacts of such stability—especially on children's educational and long-term economic prospects—are less understood. This policy brief examines the DS01 subsidy's unintended but potentially transformative effects on children's academic outcomes and early labor market engagement, offering insights into how housing stability can influence human capital development. By analyzing comprehensive administrative data, this report sheds light on the implications of homeownership subsidies not only as a housing policy but also as a tool for promoting intergenerational mobility.

Context: The DS01 Homebuyer Subsidy in Chile

The DS01 homebuyer subsidy, introduced in Chile in 2011, was designed as a targeted initiative to make homeownership accessible to low-income families. In a country where nearly half of the population resides in Santiago—a region grappling with high housing demand and limited affordability—the program aimed to bridge the gap for those unable to purchase a home without substantial financial assistance.

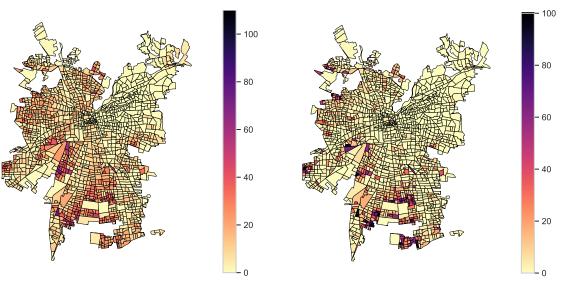
The DS01 subsidy was structured across three tiers based on applicants' income and vulnerability levels, with the highest subsidy tier reserved for the lowest-income households. This tier provided a voucher covering, on average, 85% of the house value, making homeownership a feasible goal for many recipients. Unlike other housing assistance programs that mandate location restrictions, the DS01 subsidy allowed beneficiaries to choose their homes within the private market, subject to minimal habitability standards and price restrictions.

Despite offering homeownership flexibility, the DS01 subsidy program did not lead to substantial mobility across different neighborhoods. This limited movement is largely due to the restrictive nature of the program's price cap, which constrained beneficiaries to choose from a small selection of affordable neighborhoods within Santiago. As a result, most recipients remained close to their original locations, experiencing minimal changes in neighborhood quality or school options. In Figure 1, we present the initial and final distribution of the location of awarded households, showing that families tend to concentrate in neighborhoods of the periphery, where housing is less expensive. This unique context allows us to examine the effects of housing stability on educational and economic outcomes without the confounding influence of significant neighborhood changes.

Figure 1: Distribution of Household Recipients in Santiago

Panel A: Initial Location of Recipients

Panel B: Final Location of Recipients



Notes: Figure 1 shows the distribution of household recipients at the time of application (Panel A) and after using the voucher to purchase a new house (Panel B). We divide the city according to the census tracts in the Chilean Census 2017.

The Impact of DS01 on Student Outcomes

Educational Outcomes for Children of Subsidy Recipients

- Improved School Performance: Following receipt of the high-subsidy voucher, children exhibited an average 0.27 standard deviation improvement in grades, alongside improved class rank and standardized test scores. These gains suggest significant positive impacts on academic performance, likely driven by stable housing conditions that enhance learning environments at home.
- Reduced Absenteeism and Dropout Rates: Children from awarded households were more likely to attend school consistently, with chronic absenteeism -measured as missing more than 10% of the schooldays reduced by 4.1 percentage points. Dropout and retention rates also declined, indicating that housing stability contributes to greater school engagement and lower educational disruption.
- Higher Daycare and Preschool Enrollment: Preschool enrollment among young children in awarded households increased by 2.2 percentage points, with the strongest effects observed among children under age 5. Increased access to early education may provide additional benefits by helping prepare children for formal schooling and narrowing early achievement gaps.
- Enhanced Long-Term Outcomes: We observed lasting effects extending into secondary and post-secondary education. Students in subsidy-awarded households were more likely to graduate high school and attend college, with modest gains in early labor market participation, suggesting that the benefits of housing assistance persist beyond K-12.

Mechanisms Behind Educational Gains

- Minimal Changes in Neighborhood Quality: Analysis reveals that awarded households did not relocate to drastically different neighborhoods. Due to price caps and limited relocation options, families often remain in neighborhoods with slightly worse socioeconomic characteristics. This suggests that the educational benefits stem from improved housing stability rather than significant neighborhood effects.
- Consistent School Quality: Similarly, students in awarded households did not experience significant changes in school quality. In Chile, school choice is independent of residential location, allowing families to maintain continuity in educational settings post-relocation.
- Housing Stability and Reduction in Overcrowding: The subsidy allowed families, especially larger households, to move into less crowded living spaces. For households with more than four members, children showed a 0.32 standard deviation increase in grades, over twice the effect observed in smaller households. This suggests that the reduction in overcrowding was a key factor in improving children's educational outcomes, as larger families benefited more significantly from the space provided by stable housing.
- Gender and Age at Application: Boys experienced larger educational benefits than girls, with a 0.34 standard deviation increase in grades compared to a 0.20 increase for girls. Additionally, while age at application did not significantly alter educational outcomes, children already in high school at the time of application demonstrated slightly stronger impacts, particularly in high school completion and test scores.

Impacts on Parents and Resource Allocation

- Reduced Parental Employment: Parents in awarded households showed a slight reduction in formal labor participation, working fewer months annually. This decrease, likely facilitated by greater housing stability, may allow parents to dedicate more time to family and child-rearing activities, which could indirectly support their children's educational achievements.
- Stable or Modestly Improved Family Resources: Although the subsidy provided immediate housing stability, overall income did not significantly increase. Family resources remained relatively stable, reflecting that the primary benefit was housing stability rather than income gains.
- Enhanced Parental Expectations for Children's Education: After receiving the subsidy, parents in awarded households demonstrated a notable increase in educational expectations for their children, with a 3.2% increase in the likelihood of expecting college completion and a 25.4% increase in the possibility of anticipating graduate-level education. This shift in parental outlook can profoundly impact children's academic motivation and aspirations, aligning family goals with long-term educational success.

Conclusion

The evidence from this study underscores the potential of homeownership subsidies as a powerful tool to enhance children's educational outcomes and support family stability in lower-income contexts. Unlike more restrictive housing policies, the flexibility provided by the home buyer subsidy allowed families to select from a limited but stable set of neighborhoods, reducing extreme variability in school quality and neighborhood characteristics. This stability, coupled with a reduction in household overcrowding, translated into significant gains in educational attainment and well-being for children in recipient households.

The results suggest that housing stability alone can play an influential role in children's development, as shown by marked improvements in grades, standardized test scores, and reduced chronic absenteeism. Importantly, this

policy impacted both cognitive and non-cognitive skills across different educational stages, from early daycare through high school and even into post-secondary education and early labor market participation. Additionally, the positive shift in parental expectations for their children's education highlights the broader, intergenerational benefits of such policies, fostering an environment that encourages higher aspirations and long-term educational success.

While the high subsidy tier yielded substantial benefits, the findings prompt further exploration into housing policy designs that could maximize educational and social mobility without heavy restrictions on family choice. Policymakers may consider expanding support for scalable homeownership options that enable families to leverage local resources and create lasting impacts on future generations. Overall, these results indicate that homeownership subsidies can not only improve housing security but also serve as an effective means to promote human capital development and contribute to reducing intergenerational inequalities.