Summary

In this Issue Brief we discuss research that explores the impact of banning or strictly regulating high-cost consumer financial services like payday loans. Industry supporters maintain that such bans deprive consumers of vital access to cash, while opponents contend that these services trap individuals in a cycle of debt and thus generate more harm than good. We specifically measure the effect of state bans on payday lending on the demand for an alternative source of high-cost consumer credit: tax refund anticipation loans. We employ a unique matched zip-code strategy to construct an appropriate control group. Our results provide support for the view that “cycle-of-debt” borrowers dominate the payday lending market. These results imply that restrictions on high-cost consumer financial services may improve consumer welfare.

Introduction

Payday loans and the impact of high-cost credit services are a source of contentious debate. Twelve states have outright bans on payday lending, which consists of short-term, high-interest loans to workers in advance of a future paycheck. At the same time, a majority of states allow the industry to operate with varying levels of regulation. The controversy over the legal status of high-cost credit services in general, and payday loans in particular, centers on the question of whether these practices improve or diminish the well-being of low- and moderate-income individuals.¹ Industry supporters maintain that these financial products—often referred

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to as alternative financial services—provide critical access to cash for low-income workers and families who have no other options. In this view, borrowers understand the high-cost of these services and only borrow when the benefits of liquidity—say being able to repair a car needed for work—outweigh the steep fees and interest payments.\(^2\) Opponents counter that much of the alternative borrowing that takes place stems from “behavioral” motivations that are self-destructive or counterproductive.\(^3\) Among other claims, this camp maintains that low-income individuals become trapped in a “cycle of debt” in which they incur additional debt merely to pay off prior debt, resulting in increased financial hardship and distress.

At first blush, academic research would seem to support both sides of the debate. Some studies find harmful effects from payday lending,\(^4\),\(^5\) while others find negative outcomes from restrictions on payday lending.\(^6\),\(^7\) Some of the differing conclusions may result from different assessments of harm. Zinman\(^8\) and Morgan, Strain, and Seblani\(^9\) find that banning payday lending increases bounced checks. Because returned check fees are arguably higher than equivalent payday loan interest charges, it is possible to argue that banning payday loans will harm consumers. At the same time, it is possible that both of these forms of alternative credit reduce consumer well-being and that the appropriate policy response would be to limit access to high-cost credit services more broadly. Indeed, Morgan, Strain, and Seblani\(^10\) also find evidence that payday lending is associated with higher levels of personal bankruptcy, as do

** The views and opinions presented here are those of the authors and do not necessarily reflect those of the Federal Reserve Bank of Boston or the Federal Reserve system.

7. Ibid. 6
8. Ibid.
10. Ibid.
Skiba and Tobacman.\textsuperscript{11} From this perspective, before we interpret specific measures of harm, we should focus on the question of whether, on average, demand for high-cost credit comes from rational, strategic borrowers or from individuals who are engaging in counterproductive, “cycle of debt” borrowing.

Research Approach

In order to get traction on the question of borrower behavior in our study,\textsuperscript{12} we use data on two sources of high-cost credit: payday loans and tax refund anticipation loans (RALs). Payday loans are short-term advances secured by a future paycheck, while RALs are a form of consumer finance in which taxpayers who are due a refund get a short-term loan that is secured—and repaid—by the refund when it is received. Annualized interest rates for RALs range from 70\% to 500\% on these products, making them comparable to the 300-400\% annual percentage rates that are common for payday loans.\textsuperscript{13,14} Our empirical strategy is to measure what happens to demand for RALs when a state bans or strictly regulates payday loans. In the short run—say, the first few weeks after a ban—we would expect that both strategic and counterproductive borrowers might increase their demand for alternative sources of credit, including RALs. However, over the medium to long term, we would expect the behavior of the two borrower types to diverge. Strategic borrowers should continue to show increased demand for alternative credit sources as their borrowing stems from rational motivations and increases their well-being. By contrast, we expect that demand from counterproductive borrowers should decline. Because RALs cannot be repeatedly used in the same manner as payday loans, and because other sources of alternative finance are not perfect substitutes, the banning of payday loans is likely to disrupt the cycle of debt for some borrowers. These borrowers should show

\textsuperscript{13} Wu, C. C., & Fox, J. A. (2007). One step forward, one step back: Progress seen in efforts against high-priced refund anticipation loans, but even more abusive products introduced. Boston and Washington, DC: National Consumer Law Center and Consumer Federation of America.
reduced demand. Although both types of borrowers likely exist in the consumer credit marketplace, from a policy perspective we are interested in which effect dominates in the wake of a payday credit ban.

The principal statistical challenge in measuring the effect of a credit restriction such as a payday-lending ban is estimating how the individuals who are subject to the restriction would have behaved in the absence of such a restriction. To date, most of the literature that estimates demand for alternative sources of credit uses one or more states that did not implement credit restrictions as a control group for the state or states that did implement the ban\textsuperscript{15,16}. Although this method is often necessitated by limited data, in this research we utilize a dataset that enables a more exact approach. Following studies of the effects of the minimum wage, we compare the effects of the credit restriction by comparing small geographic areas that lie just on either side of a state border where only one state implemented the ban. Specifically, we compare demand for RALs in neighboring pairs of zip codes separated by a state border.\textsuperscript{17} In general, we expect that two neighboring zip codes are much more similar to each other in terms of socioeconomic characteristics than are two neighboring states. Because the high-cost credit market is concentrated among lower income populations, we estimate the effects for individuals who receive the earned income tax credit (EITC) as well as for the overall population.

Our data on RALs comes from the Internal Revenue Service (IRS), while our data on payday lending regulations comes from the National Conference on State Legislatures as well as several sources in the literature.\textsuperscript{18,19} We estimate effects for the time period 2006-2010.\textsuperscript{20}

\textsuperscript{17} We specifically utilize zip code tabulation areas (ZCTAs). The minimum wage literature makes use of county border pairs. For a detailed description of this strategy, see Dube, A., Lester, T. W., & Reich, M. (2010). Minimum wage effects across state borders: Estimates using contiguous counties. \textit{Review of Economics and Statistics} 92(4), 945–64. doi:10.1162/REST_a_00039.
\textsuperscript{20} For a variety of practical and technical reasons, data from periods before and after this period are not informative for our research question. See Galperin and Weaver (2014) for a more detailed discussion.
Figures 1 and 2 provide a visual representation of our strategy. Figure 1 depicts the states that implemented a ban from 2006 to 2010, as well as the states that either always or never banned payday loans.

![Figure 1. Strict regulation of payday lending, by state, from 2006 to 2010.](image1)

We counted states as banning or strictly limiting payday lending if they either explicitly banned the industry or limited the industry’s maximum annual percentage rate to 36% or less. Figure 2 depicts the zip-code areas that border those states implementing a ban. These are the geographic areas that identify the effect of the regulatory changes.

![Figure 2. Zip-code tabulation areas bordering states that implemented strict regulation of payday lending from 2006 to 2010.](image2)
Research Results

The results of our analysis provide support for the idea that counterproductive borrowers dominate the payday lending market. When compared to neighboring areas, zip codes that are located in states that banned payday lending experienced decreased demand for refund anticipation loans. Furthermore, the effect is most pronounced among the lower income EITC recipients who are more likely to use payday loans. The regression coefficients indicate that a zip code that is located in a state that bans payday lending experiences a 1.3 percentage point decrease in the proportion of low-income residents who request a refund anticipation loan (significant at the 95% level). This outcome is equivalent to a 4.8% drop in total demand for RALs. Overall, these results are consistent with the effect we would expect from an interruption of the cycle of debt. They are the opposite of the result we would expect from strategic payday borrowing.

Table 1. Results of regressing proportion of EITC and refund recipients who requested a RAL on strict state regulation of payday loans, year dummies and zip code pair fixed-effects

<table>
<thead>
<tr>
<th></th>
<th>Model 1</th>
<th>Model 2</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>(All zip-code pairs along the borders of switcher states)</td>
<td>(Zip-code pairs along the borders of switcher states, matched on concentration of low to medium income households and proportion of EITC filers)</td>
</tr>
<tr>
<td>Ban on payday lending</td>
<td>-0.008</td>
<td>-0.013*</td>
</tr>
<tr>
<td></td>
<td>(0.006)</td>
<td>(0.005)</td>
</tr>
<tr>
<td>ZIP pair fixed-effects</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Year effects</td>
<td>Yes</td>
<td>Yes</td>
</tr>
<tr>
<td>Number of observations</td>
<td>37,292</td>
<td>25,580</td>
</tr>
<tr>
<td>Number of ZIP pairs</td>
<td>3,736</td>
<td>941</td>
</tr>
</tbody>
</table>

*Note: Standard errors in parentheses are clustered in two dimensions: on states and two-state border segments. *p<0.05, **p<0.01
Implications for Public Policy

The primary policy implication of this research relates to the regulation of high-cost consumer financial services. First, this research indicates that banning or strictly regulating these financial services may, on average, increase consumer welfare. To the extent that counterproductive borrowers dominate the payday lending market, the benefits of breaking a cycle of indebtedness may outweigh the harm that comes from limiting access to credit. At the same time, it is important to note that there remain conflicting results in the literature. Although we believe that our zip-code matching technique represents the most precise estimates of payday lending bans to date, we encourage further research to establish a definitive conclusion on this important topic.

References


Wu, C. C., & Fox, J. A. (2007). One step forward, one step back: Progress seen in efforts against high-priced refund anticipation loans, but even more abusive products introduced.