Credit Crunched? The Relationship between Credit Denials and the Use of Alternative Financial Institutions

Because consumer credit markets may tighten as a result of the 2008 economic downturn, this study examined the relationship between being denied credit and having a loan with alternative financial institutions. Using data drawn from the 2004 Survey of Consumer Finances (SCF), multivariate analyses showed that participants who had been denied credit in the past 5 years were twice as likely to have a loan with an alternative financial institution as individuals who had not been denied credit in the recent past. These differences remained even after using propensity score matching to attempt to mitigate differences between those who had been denied credit and those who had not been denied. Consequently, if consumer markets do indeed tighten some consumers may be pushed out of the traditional credit market (e.g., banks, credit unions), and into the non-traditional credit market (e.g., payday lenders).

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The current economic downturn was in part precipitated by risky loans and bad debt. Thus, some have speculated that consumers will shortly have to meet higher standards to obtain consumer credit. In the very near future, some consumers might be pushed out of the traditional credit market (e.g., banks, credit unions, credit cards, etc.). If these households are less able to obtain credit in the traditional credit market, they may turn to alternative institutions for their credit needs such as finance companies or payday lenders.

Although predicting future consumer behavior is always risky, the relationships between difficulty in obtaining credit from traditional sources and the use of nontraditional or alternative financial institutions can be assessed. This paper uses the 2004 Survey of Consumer Finances (SCF) to determine whether being rejected for loans or lines of credit from traditional financial institutions predicts the use of loans from alternative financial institutions. The main research question, then, is what is the relationship between being denied credit and using alternative financial institutions?

As scholars concerned about consumer wellbeing, why should this question matter? ACCI members should care because loans from non-traditional financial institutions are anything but consumer-friendly and consumer-oriented. For example, interest rates on "payday loans" can reach between 200 – 400% annually for individuals who do not quickly pay off their loan, a not uncommon occurrence (Caskey, 2001; Stegman, 2007; Stegman & Faris, 2003). Also, the fees on loans from alternative sources are often a much higher percentage of the loan (Peterson, 2004). Further, because the loan terms from non-traditional financial institutions are shorter, individuals may have more difficulty paying off the loan, interest, and associated fees (Peterson, 2004; Stegman & Faris, 2003).

Background

Theory

Rational choice theory motivates this analysis. Put simply, rational choice theory asserts that individuals will make choices that maximize their gains and minimize their costs based on the information they have access to. Thus, in the context of obtaining credit, individuals who want or need credit will seek to obtain it at the least possible cost. Since traditional financial institutions generally offer credit for the lowest cost, individuals are most likely to seek credit there.

However, some individuals may be denied credit at traditional, low-cost credit institutions. These individuals may have maxed out their credit lines from traditional sources. Alternatively, they may have a poor credit history or even no credit history which would make traditional institutions less likely to extend credit to them – especially in today's credit market. If this case, they may attempt to get credit by turning to high-cost alternative institutions. This gives rise to the hypothesis that individuals who have been denied credit will be more likely to have accounts at non-traditional financial institutions than individuals who have not been denied credit.

This hypothesis rests on the assumption that most individuals who want or need credit are going to try and get it one way or another even if they have to go to a high-cost lender. In addition to this assumption, it may be that

many individuals are not totally aware of the high costs of the loans from alternative financial institutions. Or, they may overestimate their ability to pay off the loan quickly. Thus, they may be making a decision based on incomplete information.

Prior Literature and Extension

Previous studies have shown a relationship between having been denied credit and using alternative financial institutions. For example, in a large study, 75% of individuals utilizing payday lending services had been denied credit (Elliehausen & Lawrence 2001). Further, those who use alternative financial institutions are more likely to have had a check bounce in the past five years (Stegman & Faris, 2003).

Unfortunately, most of the prior research have used only exploratory methods to examine the predictors of using alternative financial institutions. That is, they have examined as many variables as possible to get a profile of individuals who use alternative financial institutions. Further, many of these studies have looked only at the individuals who are already using alternative financial institutions – for example individuals who already have accounts with payday lenders.

This study extended previous studies in many ways. First, the focus of this study was on credit denial. Rather than test as many possible predictors of using alternative financial institutions as possible, this study focused on the credit denial issue in line with the rational actor theory. Second, this study tested the counterfactual. That is, individuals who were using alternative financial institutions were compared to those who weren't using them instead of comparing individuals who are using alternative financial institutions with each other. This allowed an assessment how much the odds of using an alternative financial institution increase when individuals are denied credit because not all individuals who are denied credit seek out alternative financial institutions. Third, this study conducted hypothesis testing by running statistical tests. Much of the previous research has simply looked at percentage differences without testing the statistical significance of those differences. Finally, this study partially accounted for selection or endogeneity effects by using propensity-score matched samples.

Method

Data and Sample

Data was drawn from the 2004 SCF. This analysis used all the main respondents (N = 4,519). I used all five implicates of the survey and used multiple imputation to synthesize the results (Lindamood, Hanna, & Bi, 2007).

Measures

The dependent variable was dichotomous and indicated whether the respondent or others in the household had a loan from an alternative financial institution. The SCF asked individuals about the accounts they and members of their household had with various types of organizations. To be coded as having a loan with an alternative financial institution participants had to have an account with a finance or loan company or other organization that did not offer depository services but could be sources of loans. (Finance companies associated with car manufacturers or mortgage brokers were excluded from this category). If participants had such a loan, they received a 1 for this variable. If participants did not have accounts with these organizations they received a coding of 0.

The main independent variable was also a dichotomous variable where participants indicated whether they had been denied credit in the past five years.

Control covariates known to predict being denied credit (Crook & Hochguertel, 2007) were also included to help avoid spurious findings. These covariates included not applying for credit in the past for fear of rejection, attitudes toward credit, the number of individuals in a household, the sex, age, education, and race or ethnicity of the respondent, and total family income.

Analyses

The first analysis was a logistic regression. I regressed participants' reports of having an account at an alternative financial institution on having been denied credit as well as the control covariates.

The second analysis was the same logistic regression conducted on a sample generated by propensity score matching. I used propensity score matching in an attempt to control for omitted variable bias – part of the selection problem. This is because individuals who have been denied credit in the past are a select group – they differ from those who have not been denied credit in many ways (Crook & Hochguertel, 2007).

With propensity score matching, individuals who were denied credit were matched to individuals who had not been denied credit, but whose characteristics made them most similar (Dehejia & Wahba, 2002). The remaining

individuals (those who had not been denied credit and were not like the individuals who had been) were dropped from the sample. Thus, the only participants left in the propensity score matched sample were those who had been denied credit in the past, and those who had characteristics that made them likely to have been denied credit, but who were not actually denied. This helps to cut down on findings that are due to selection (D'Agostino, 1998).

Results

The logistic results from the full sample indicated that even after controlling for the covariates, the individuals whose past credit requests had been denied were more likely to have accounts at alternative financial institutions than individuals who had not been denied credit (See Table 1). The log-odds for this association was slightly above 2.0 which indicates that individuals who have been denied credit in the past had odds of having accounts at alternative financial institutions that were twice as high as individuals who had never been denied credit.

Table 1
Logistic Regression Analysis of Using Alternative Financial Institutions ($N = 4{,}519$)

	B	*S.E.*	*Log Odds*
Intercept	-1.43***	.34	
Denied Credit in Past 5 Years	.73***	.10	2.08
Discouraged in Applying for Credit	.16	.11	1.17
Credit is Good[a]	.28**	.10	1.32
Credit can be Good or Bad[a]	.17	.09	1.19
# of Individuals in Household	.10***	.03	1.11
Sex of Respondent[b]	-.14	.10	.87
Age of Respondent	-.02***	.003	.98
Total Family Income (Logged)	.04	.06	1.04
Years of Education of Respondent	.02	.02	1.02
Respondent African-American[c]	.10	.12	1.09
Respondent Hispanic-American[c]	.09	.19	1.11
Respondent Other Race/Ethnicity[c]	-.25	.17	.78

[a] Omitted category is credit is bad [b] Omitted category is male [c] Omitted category is White, Non-Hispanic
*$p < .05$. **$p < .01$. ***$p < .001$.

Running the logistic regression in the propensity matched samples was a stronger test of the hypothesis because this sample only included people who had been denied credit and people who had not been denied credit but who had the same characteristics. In the matched sample, having been denied credit was still associated with having an account at an alternative financial institution (Table 2). The log odds for having been denied credit in the past five years were still around 2.0 even though participants who had been denied credit had roughly the same characteristics with regard to income, education, family size, etc. as those who had not been denied credit.

Table 2

Logistic Regression Analysis of Using Alternative Financial Institutions in Propensity Score Matched Samples (*N* = 1,604).

	B	*S.E.*	*Log Odds*
Intercept	-2.21***	.64	
Denied Credit Type in Past 5 Years	.70***	.14	2.01
Discouraged in Applying for Credit	.20	.14	1.22
Credit is Good[a]	.10	.16	1.11
Credit can be Good or Bad[a]	.06	.17	1.06
# of Individuals in Household	.10*	.05	1.11
Sex of Respondent[b]	-.13	.15	.88
Age of Respondent	-.02*	.005	.98
Total Family Income (Logged)	.31	.17	1.36
Years of Education of Respondent	-.02	.03	.98
Respondent African-American[c]	.01	.30	1.01
Respondent Hispanic-American[c]	.11	.17	1.12
Respondent Other Race/Ethnicity[c]	-.20	.24	.82

[a] Omitted category is credit is bad [b] Omitted category is male [c] Omitted category is White, Non-Hispanic

*$p < .05$. **$p < .01$. ***$p < .001$.

Conclusion

This study examined whether being denied credit related to the use of alternative financial institutions. I hypothesized that a positive relationship would exist, and indeed the findings demonstrated that individuals who had been denied credit in the past had odds of having an account with alternative financial institutions that were twice as high as those individuals who had not been denied.

These findings suggest that in line with the rational actor hypothesis, individuals who want credit will generally obtain it. If they cannot get low-cost credit from traditional lending institutions, they will seek it from high-cost alternative institutions. Applying this finding to current economic conditions implies that if consumer credit markets have tightened and if some consumers are pushed out of the traditional credit market, then they may seek credit lines from alternative financial institutions. This would be financially problematic for individuals given the high costs of credit from alternative financial institutions.

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