Finance Research Letters 24 (2018) 145–150

Contents lists available at ScienceDirect

Finance Research Letters

journal homepage: www.elsevier.com/locate/frl

Readability of the credit card agreements and financial charges

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ARTICLE INFO

Article history:
Received 5 June 2017
Revised 24 July 2017
Accepted 22 August 2017
Available online 25 August 2017

JEL classification:
G21
E40

Keywords:
Credit card
Readability
Financial charges
Annual percentage rates

ABSTRACT

We examined the readability of credit card agreements and its relationship with financial charges. Examining the credit card agreements filed with the Consumer Financial Protection Bureau in 2014, we found that the typical credit card agreement is written at an 8th to 9th grade level, which is higher than the average American reading level. We show that the readability of credit card agreements is negatively related to financial charges: cards with easier-to-read agreements are associated with lower annual percentage rates, lower minimum monthly payments, and lower cash advance fees.

Credit cards are a very important part of an individual's everyday life in the U.S. Over 75% of Americans have at least one credit card, and credit card owners have an average of 3.7 cards (Stark, 2003; CreditCardForum, 2017). "In the first six months of 2015 alone, there were some 14.5 billion U.S. general purpose credit card transactions accounting for more than $1.4 trillion in purchase volume" (Cordray, 2015).[1] Credit cards allow people to make purchases without the need to actually have cash, and thus if consumers do not use their cards wisely they can end up accruing debt. According to a report from the Consumer Financial Protection Bureau, there were 703 billion U.S. dollars in credit card loans outstanding as of the end of the second quarter of 2015 (Cordray, 2015). A study conducted by GALLUP in 2014 indicates that Americans are relying less on credit cards, and that at 48%, the percentage of cardholders who always pay the full amount of their credit card balances each month is at a record high since 2001. However, the study shows that there are still 13% of cardholders paying no more than the minimum amount required (Swift, 2014). The findings suggest that credit card debt can be extremely dangerous to the financial stability of some consumers.

In 2010 Congress passed the Dodd-Frank Wall Street Reform and Consumer Protection Act. As a result of the Act, the Consumer Financial Protection Bureau (CFPB) was established to make consumer financial markets work for consumers and protect them from unfair, deceptive, and abusive practices. In 2011, the CFPB initiated a program to improve the readability level of credit card agreements to help consumers better understand their credit cards. Although credit card agreements are the most important document that cardholders should read before signing up, they are rarely read or understood by them. A study conducted by the U.S. Government Accountability Office in 2006 shows that "the disclosures in the customer solicitation materials and card member agreements provided by four of the largest credit card issuers were too complicated

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[1] Primary source: HSN Consultants, Inc., The Nilson Report, Issue 1069 (Aug. 2015).

http://dx.doi.org/10.1016/j.frl.2017.08.003
1544-6123/

for many consumers to understand" (GAO, 2006). CreditCards.com examined the readability of credit card agreements and found that the average agreement is written at a reading level that is well above the average consumers' reading level (CreditCards.com, 2016). A poll conducted by CreditCards.com also indicated that 24% of respondents never read credit card agreements (Ray, 2016). Furthermore, when asked to describe credit card agreements the majority of respondents used negative words, such as "lengthy," "long," "wordy," "verbose," "confusing," "unclear," and "boring" (Ray, 2016).

In this paper we examine the readability of credit card agreements and its relationship with the financial charges faced by cardholders. This topic is important because if credit card agreements with lower readability are associated with higher financial charges, the card issuers might be putting consumers who are not able or do not have time to digest credit card information at a disadvantage. To the best of our knowledge, this is the first study in the literature to investigate the relationship between readability and financial charges of credit cards. We studied the credit card agreements filed with the CFPB in 2014 and found that the average credit card agreement is written at an 8th to 9th grade level, higher than the 7th grade level that is the average American reading level. More importantly, we show that cards with easier-to-read agreements are associated with lower annual percentage rates (APRs), lower minimum monthly payments, and lower cash advance fees. A large proportion of credit cards have no annual fees, and we found no statistical difference in the likelihood of charging zero annual fees between cards with different readability levels. Our findings indicate the importance of reading credit card agreements and refraining from taking out cards with agreements that are difficult to understand. Additionally, there is scope for the Consumer Financial Protection Bureau and financial institutions to make further improvements to make credit card agreements more accessible to consumers.

1. Literature review

The literature on credit cards is growing. Earlier studies focused on the stickiness of credit card interest rates. For example, Ausubel (1991) showed that credit card interest rates were very inflexible relative to funding costs, even though credit card issuers were constantly earning three to five times the ordinary return of the banking industry. On the other hand, Brito and Hartley (1995) provided a model showing that the stickiness of credit card interest rates was compatible with a competitive equilibrium in which a marginal entrant earns zero profits (see, e.g., Mester, 1994; Stavins, 1996; Park, 1997; Stango, 2002; Knittel and Stango, 2003; Akin et al., 2013). Several studies on credit cards have examined card issuers' or consumers' behavior in credit card markets. For instance, Calem and Mester (1995) found that as a result of information barriers, high balance credit card customers faced higher switching costs and were more likely to be rejected when applying for new cards (see Calem et al., 2006). Han et al. (2011) showed that credit card issuers continued to supply unsecured credit to consumers with a bankruptcy history, but the offers were less favorable and included more hidden costs (see also Han and Li, 2011). Firestone (2014) found that Blacks and Hispanics were less likely to receive credit card offers even after controlling for income and credit risk. Linares Zegarra and Wilson (2014) demonstrated a negative relationship between APRs and the long-term risk of cardholders, suggesting that consumers with higher credit risk were more likely to shop around for cards with favorable terms. Stango and Zinman (2016) found that because of cross-lender pricing heterogeneity, there was considerable variation in the APRs faced by borrowers with similar credit risk.

Another strand of research has addressed the effect of credit cards on consumption and delinquency rates. Using household-level data, Ekici and Dunn (2010) revealed a negative relationship between credit card debt and future consumption. Domowitz and Sartain (1999) found that credit card debt along with medical debt were the main contributors to bankruptcy. Agarwal et al. (2010) found that consumers responding to inferior credit card offers had higher credit risk and were more likely to default ex post, suggesting an adverse selection effect (see, e.g., Agarwal et al., 2003). Gross and Souleles (2002) suggested that default costs might be an important factor affecting consumers' propensity to default (see Fay et al., 2002).

This study aims to add to the growing literature on credit cards by examining the relationship between the readability of credit card agreements and financial charges. We found that the typical card agreement was written at an 8th to 9th grade level, which is higher than the average American reading level. Moreover, cards with easier-to-read agreements usually have lower APRs, lower minimum monthly payments, and lower cash advance fees. Our evidence reinforces the importance of reading credit card agreements and avoiding cards with agreements that are too difficult to understand.

2. Data

To measure the readability levels of credit card agreements, we used the Flesch reading ease score:

$$FRES = 206.835 - 1.015 \times ASL - 84.6 \times ASW,$$

where *FRES* is the Flesch reading ease score, *ASL* denotes average sentence length and *ASW* average number of syllables per word. The Flesch reading ease score is often used by researchers as a measure of document readability (see, e.g., Smith and Smith, 1971; Schroeder and Gibson, 1990; De Franco, Hope, Vyas, and Zhou, 2015).[2] The score can be used to determine the level of education someone needs to be able to understand the meaning of a text easily. Table 1 illustrates the relationship

[2] In a study not presented here, we used the Gunning Fog score, Flesch Kincaid grade level, and SMOG index to measure readability, and obtained similar results. The results are available from the authors upon request.