Danish Competition and Consumer Authority

COMPETITIVE MARKETS AND CONSUMER WELFARE

35 | 2020

CONSUMERS BENEFIT FROM SIMPLIFIED MANDATORY INFORMATION IN CONSUMER CREDIT ADVERTISEMENTS

By law, advertisements for consumer credit must include standard information in the form of a financial disclosure. The purpose of the disclosure is to ensure that consumers understand the central financial characteristics of the loan before deciding whether to purchase it. Law also dictates that these financial disclosures must be clear, concise and placed prominently in the advertisements.

Behavioral research has revealed that voluminous and complex information may be counter-productive.

This analysis demonstrates that consumers benefit from less information in advertisement material, if it still provides the consumer with key financial aspects of the credit. With less information, consumers are significantly better at recalling individual elements from credit advertisements presented in a simulated commercial break and find it easier to compare and choose the better of two offers.

Read the full article →

The Danish Competition and Consumer Authority (DCCA) conducted a behavioral study to determine how simplified disclosures in advertisement of consumer credits affect consumers. The different experiments that make up the study are motivated by insights from behavioral science into how extensive information disclosures may cause information overload. Thus, they are not always beneficial for consumers[1,2].

The Consumer Credit Directive (CCD) regulates advertisement of consumer credits in EU markets. The directive requires businesses to discl2ose different aspects of the credit (cf. Box 1). Additionally, the current rules requires lenders to display the disclosure prominently (i.e. on the actual advertisement as opposed to in a link), which means that it is increasingly difficult to create advertisements that fit into the new digital reality of smaller screens on smartphones and tablets. For example, under the current Danish guidelines set out by the Danish Consumer Ombudsman all information must be available on the landing page and cannot be placed in such a way that the consumer has to scroll down or click a link to access further information.

In a series of laboratory experiments and online surveys the DCCA tested how the CCD requirements performed relative to a simplified version. The experiments were designed to test three unique aspects of consumers' interaction with credit advertisments:

1. Consumers' ability to recall of financial information from advertisement material presented in a simulated TV-commercial break

2. Consumers' ability to choose the better of two credit offers as part of a product purchase

3. Consumers ranking of credit offers for personal loans.

In summary, the study found that consumers benefit from a simplified disclosure consumer credit marketing material in the following ways:

- Consumers´ ability to remember financial information was significantly enhanced with a simplified disclosure in TV media.

- However, the ability to recall information depended on ad run time. The experiments demonstrate that a combination of longer run time and a simpler disclosure gave the highest recall rate.

- Increasing the visual prominence of financial information had a positive effect on consumers' ability to recall important information.

- Consumers were largely able to identify the better of two offers in a choice experiment with the standard and simplified disclosure. Yet, the simplified disclosure significantly reduced decision time and effort needed to complete the choice task and they found it simpler to compare loans.

- The choice experiment indicated that consumers use the annual percentage rate (APR) when choosing installment plans, but failed to recognize that APR may be a misleading comparison parameter in some specific cases where the amount of credit are not identical.

- The simplified disclosure did not cause consumers to find loans more attractive compared to loans with the traditional disclosure.

Box 1 **Mandatory information disclosures**

Mandatory information disclosures in advertisement of consumer credits is regulated by the Consumer Credit Directive, article 4 (DIRECTIVE 2008/48/EC). The directive states that: Any advertising concerning credit agreements which indicates an interest rate or any figures relating to the cost of the credit to the consumer shall include standard information in accordance with this Article. The standard information shall specify in a clear, concise and prominent way by means of a representative example:

a) The borrowing rate, fixed or variable or both, together with particulars of any charges included in the total cost of the credit to the consumer.

b) The total amount of credit.

c) The annual percentage rate of charge.

d) If applicable, the duration of the credit agreement.

e) In the case of a credit in the form of deferred payment for a specific good or service, the cash price and the amount of any advance payment.

f) If applicable, the total amount payable by the consumer and the amount of the instalments.

g) Where the conclusion of a contract regarding an ancillary service relating to the credit agreement, in particular insurance, is compulsory in order to obtain the credit or to obtain it on the terms and conditions marketed, and the cost of that service cannot be determined in advance, the obligation to enter into that contract shall also be stated in a clear, concise and prominent way, together with the annual percentage rate of charge.

1 Weil, David, et al. "The effectiveness of regulatory disclosure policies." Journal of Policy Analysis and Management: The Journal of the Association for Public Policy Analysis and Management 25.1 (2006): 155-181.
2 Adams, Paul, et al. "Testing the Effectiveness of Consumer Financial Disclosure: Experimental Evidence from Savings Accounts. NBER – Working Paper

Advertisement channels

Over recent years, online advertisement has grown to become the dominant source of information on financial products for consumers. According to the Consumer Barometer Survey by Google[3] 27 pct. of EU consumers reported, that online advertisement was their first encounter with a personal loan, which they subsequently purchased. Compared to traditional print media, many online media have limited space available due to the relative small screen sizes. It is a concern that the mandatory disclosure requirements are difficult to present in a prominent and readable way that comply with the requirements in the directive. Consumers may overlook important aspects of the credit due to small text sizes or become frustrated by the mass of information provided.

TV commercials are another major source of information consumer loans. A recent study by The Advertising Standards Authority (ASA) in the UK[4] highlighted some of the important issues consumers face with superimposed text in TV commercials. Superimposed text or "supers" are often used in advertisement of credit products and they imply that the mandatory information disclosure is placed in a box at the bottom of the ad and hence screen, see figure 1. The study by ASA reported a list of factors and their relative impact on consumers' ability to engage with the superimposed text. The most important factors on the list was reported to be the contrast of the text and run time since both of these impact consumers' ability to read and comprehend the superimposed texts. Moreover, consumers considered the use of complex numerical information, including percentages, confusing.

The study has resulted in an update of the national guidelines in the UK, specifying good practice for visibility of superimposed text and a formula for calculating time requirements, similar to national guidelines in Denmark (see box 2).

Box 2. **Danish guidelines for advertisement run time**

The exposure time for advertisement, containing mandatory information disclosures in TV-media is determined by a national guideline. The run time for an ad can be calculated using the formula below. Run time = 2 sec + 0,2 sec * word count If the material contains a lot of color or moving content, a default of 3 seconds is used instead. The font size used should cover at least 1/30 of the screen height in case of static content and 1/25 in the case of a lot of color or moving content These guidelines ensure that the advertisement material is compliant with the notion of: "clear, concise and prominent" in the consumer credit directive.

An important finding in the ASA-study mentioned above was that consumers prefer short and concise supers over longer pieces of text. In this light, it is relevant to consider whether the disclosure requirements could be reduced to overcome issues of information overload in advertisement for consumers while making the current rules simpler to the benefit of businesses.

Simplified disclosure

To test this the DCCA designed a simplified disclosure. The simplified disclosure builds on behavioral studies, which suggest that a number of cognitive biases may reduce the effectiveness of disclosures in general. In the case of consumer credits, information overload and visual attention may play a large role for how consumers perceive and respond to the disclosure.

In general, the purpose of the current rules for financial disclosure is to ensure that consumers understand the different aspects of the advertised credit. Once the principal, the APR, and the term of the credit is set, the monthly repayment and the total cost of the credit can be deducted implicitly. However, previous studies have demonstrated that consumers do not understand the relationship between the different financial aspects of a credit. Because of this, consumers' decisions can be influenced by highlighting, i.e. directing visual attention, towards certain aspects of the credit.

Moreover, as a sign of information overload, consumers' decision accuracy decreases when more information is added to loan offers[5]. Lastly, studies have indicated that consumers often do not understand percentage based characteristics such as the APR[6].

The design of the simplified disclosure used in this experiment builds on these insights and sought to:

1. Reduce the amount of information to a minimum while keeping financial information about different aspects of the credit.

2. Avoid the use of percentages.
3. Optimize the way information is presented

Consequently, the following information was included in the simplified disclosure.

a. Advance payment
b. Monthly installment
c. Duration of the agreement (term)
d. The total amount of credit/the cash price
e. The total amount payable amount

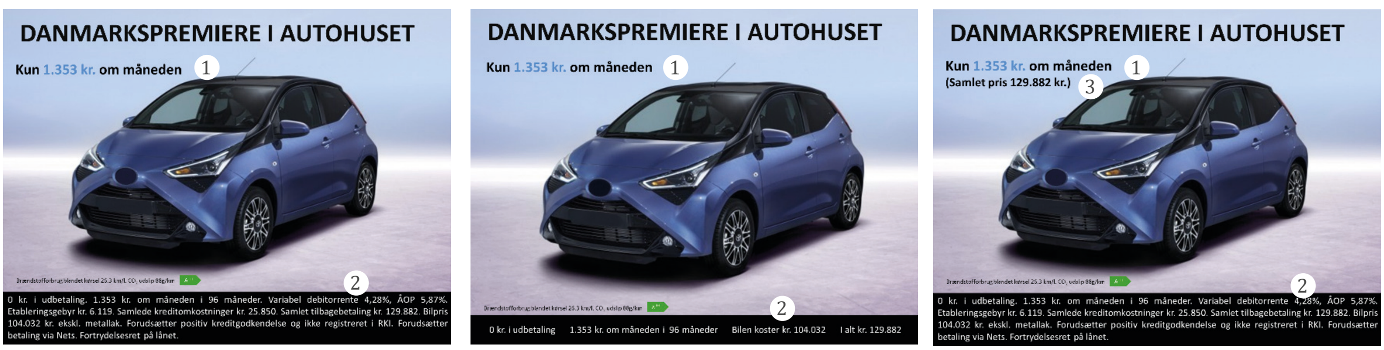
3 https://www.consumerbarometer.com/en/about
4 https://www.asa.org.uk/resource/superimposed-text-legibility-and-understan-ding.html

5 Lunn, P., Bohacek, M. and Rybicki, A. (2016). "An Experimental Investigation of Personal Loan Choices," Research Series,economic and Social Research Institute (ESRI), number BKMNEXT314
6 McHugh, S., R. Ranyard and A. Lewis (2011). 'Understanding and Knowledge of Credit Cost and Duration: Effects on Credit Judgements and Decisions'. Journal of Economic Psychology, 32, 609-620.

Figure 1 presents three examples of the same advertisement material with the standard disclosure (a), the simplified disclosure (b) and an alternative to standard disclosure where one loan attribute is highlighted (c). This version of the advertisement material explored how saliency affects decision-making by highlighting the total amount payable under the main message. All attributes (interest, loan amount, advance payment etc.) and the layout of the different loan advertisements were all inspired by advertisements present in the market at the time of the experiment[7]. advertisement for consumer credits. The remaining five ads were used as "fillers" to mask the purpose of the test. The ads were displayed in a randomized order to eliminate ordering effects. The exposure time for the ads for consumer credit was set according to national guidelines (see box 2). This test was repeated in an online survey to explore the effect of run time on the ability to recall information cf. figure 2.

Figure 1: **Three versions of the same advertisement**

A **B** **C**



A) standard disclosure, **B**) simplified disclosure and **C**) standard disclosure with highlighted total payable amount. All three versions contains 1) main message (the monthly cost) 2) box with mandatory disclosure. In c) the total payable amount (3) has been highlighted below the main message.

The behavioral experiments
The initial part of the experiment took place in a controlled laboratory setting with 100 respondents. The laboratory was equipped to measure biometric data cf. box 3. After the initial laboratory experiment, a national representative online survey with 3,500 respondents were conducted. The main purpose of all the different tests was to compare how the simplified disclosure (intervention) and the standard disclosure (control) influenced consumers' ability to understand, recall, evaluate and decide on personal loans and credit purchases. The experiment consisted of three parts presented in the following sections.

Experiment 1 – Commercial breaks:
The purpose of the first part of the experiment was to test consumers' ability to recall different financial attributes from ads. Consumers in the lab were asked to view a series of different advertisements designed to simulate a traditional commercial break. Three of the ads were

Box 3: **Biometric data**

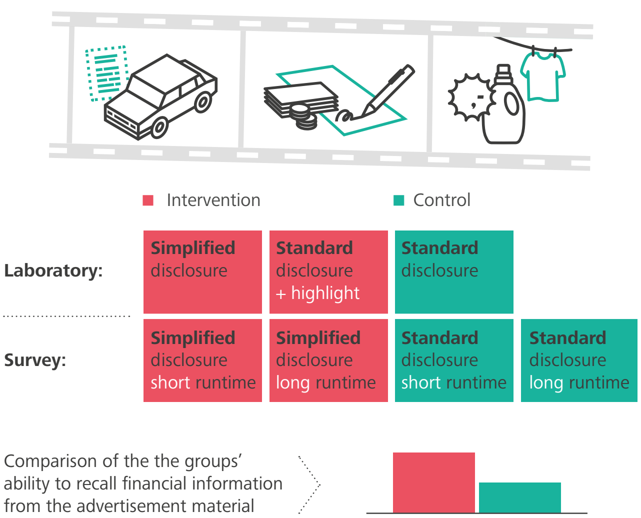
The laboratory experiment utilized eye tracking to derive how visual attention was distributed across the marketing material. An eye tracker can measure how much time a respondent spend on looking at different objects or pieces of text in the material. Moreover, the eye tracker can provide information on how many times a respondent had to visit an area with standard information before choosing a credit offer. Finally, the biometric data station allowed for measurements of how much time participants spend on each task

7 Based on a recent ruling by the Danish Supreme Court, the Danish consumer ombudsman has later questioned whether the information presented in the box with mandatory information disclosure is sufficiently prominent. The DCCA does not believe that the suggested increase in information prominence would have a significant impact on the results presented here.

Figure 2: **Overview of part 1 of the experiment**

1. Commercial break

Randomized sequence of advertisement material during commercial break



After the commercial break, respondents were prompted in a multiple-choice survey to identify key financial attributes, e.g. the total payable amount, from the relevant ads. For each ad, the consumer was asked a question about the main message (the attribute that the seller choose to highlight in the ad), referred to as "main", and a question about the information in the box (the mandatory disclosure), referred to as "box" (see figure 1 for a visual example of these).

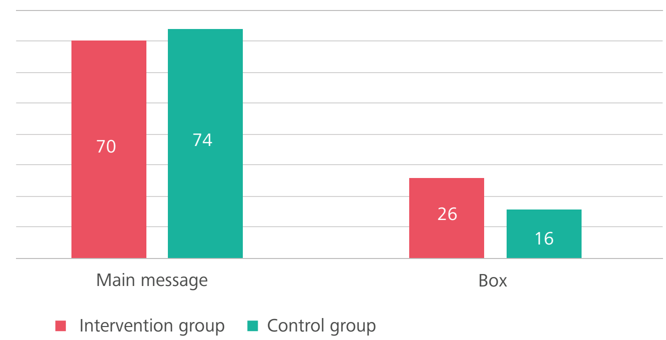
The advertisement material with the simplified disclosure (intervention) contained less unique characteristics (cf. figure 1b compared to 1a) and was therefore only displayed for 9 seconds compared to 18 seconds for the standard disclosure (control). In this way, the test complied with the existing guidelines for run time (see box 2).

Results – Simplified disclosures improves recall but depends on run time

Both groups had the same ability to recall both the main message of the material and a piece of information from the box cf. figure 3. Although the percentage of correct answers in the intervention group is higher, there was no statistically significant difference between the groups.

Figure 3: **Lab experiment**

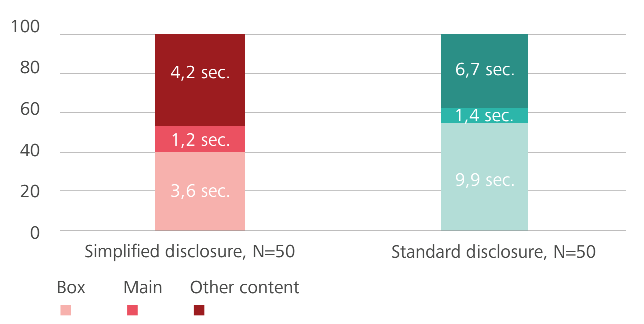
Pct. of correct recall of financial attributes



Interestingly, despite the fact that respondents were much better at recalling the main message of the material the eye tracking data revealed, that they spend only a small fraction of the available time attending to it, cf. figure 4. This means that it is not viewing time pr. se but the visual prominence of the information that determines how well it is remembered. Respondents attended longer to the box with standard information compared to the main message. In the intervention group respondents looked at the box with standard information for 3.6 seconds compared to almost 10 seconds for the control group. However, they had the same ability to recall information from the box.

Figure 4: **Lab experiment**

Pct. time spent attending towards different elements in the commercials



The ability to recall information from the box was equal for both groups and therefore either the less information or the better visual separation of information or both must have counter-balanced the fact that less time was available for the intervention group.

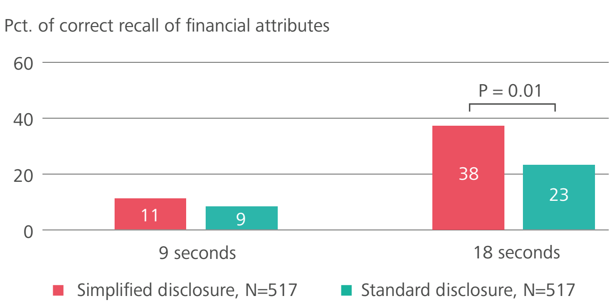
The recall rate for the information placed in the box, was still far below the recall rate for the main message, cf. figure 3.

Therefore, the test was repeated in an online survey where time was manipulated to be equal for both groups. The purpose of this part of the experiment was to see whether the time influences the recall rate. Hence, will longer run time increase the recall rate for the information placed in the box?

In this survey both the simplified and the standard disclosure was displayed to consumers for either 9 or 18 seconds and the respondents were tasked with recalling key financial attributes from the main or box parts of the ads. It is important to note that online surveys typically contain more noise and the results may therefore not be directly comparable to those from the lab test. However, we can still compare differences between groups within the test.

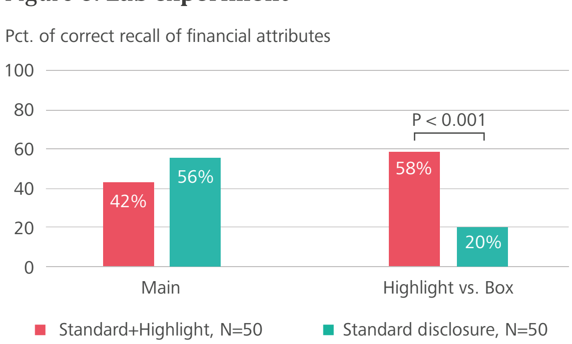
This test revealed an important finding regarding the information placed in the box, cf. figure 5. For both groups, the number of correct answers increased significantly when the run time was increased from 9 to 18 seconds, but the increase was larger for the intervention group. Doubling the run time for material with the simplified disclosure significantly outperforms the standard disclosure.

Figure 5: **Survey experiment**



Results – Highlighting secondary information works
The solution presented in figure 1C was also tested as an alternative to the simple disclosure. This version retains the standard disclosure but highlights one of the attributes, here the total payable amount, just below the main message. The likelihood of respondents remembering that information compared to a situation where the same information was provided only in the box was tested.

Figure 6: **Lab experiment**



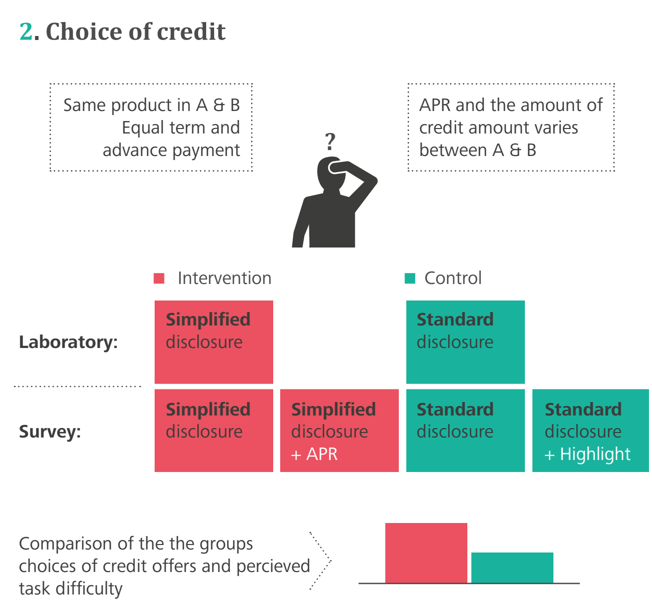
Highlighting an attribute significantly improves recall of this attribute compared to simply placing it in the box. The improved recall of the highlighted information did however come at the expense of a slightly reduced ability to recall the main message of the material.

Experiment 2 – Choosing the best offer
In the second part of the experiment, respondents had to choose between two installment plans. One plan for a car and one for a washing machine. Respondents were told that the products were identical and that they should choose the installment plan that best suited their needs. As with the previous tests, all offers reflected real market prices. For each comparison task the term and advance payment were kept equal, but the product price and APR varied systematically. In 8 out of 24 cases, the installment plan was designed so that the offer with the lowest APR had the highest total amount payable. The Intervention group received the same offers as the control group but the simplified disclosure did not include APR.

After the laboratory experiment concluded, it became evident that consumers' interpretation of the APR strongly influenced their choice of credit. Therefore, the choice task was repeated in a survey with slight modifications to test whether this was because respondents actively used the APR or because they overlooked the total payable amount.

In both the laboratory experiment and the online survey, the choice task was followed by a short questionnaire where respondents had to rate the perceived level of task difficulty.

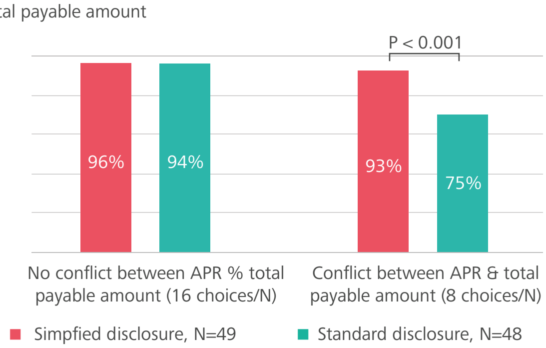
Figure 7: **Overview of the second experiment.**



Results - Consumers perception of the annual percentage rate (sometimes) affects their choice of credit.
In the choice tasks, consumers had to choose between two installment plans for both a car and a washing machine. Overall, consumers in both the control- and intervention group preferred the offer with the lowest payable amount, see figure 8. However, when the APR was lower for the offer with the highest payable amount, a sizable minority of consumers in the control group opted for the offer with the lowest APR. Since the disclosure in the intervention did not include APR, consumers in this group consistently chose the credit with the lowest amount payable in all the choice tasks.

Figure 8: **Lab experiment**

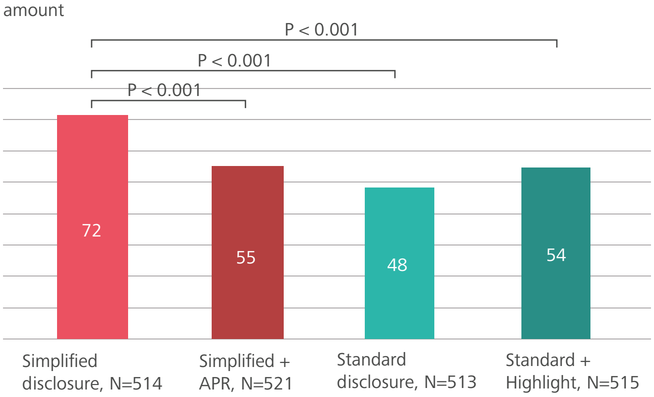
Pct. of respondents who chose the installment plan with the lowest total payable amount



The results confirm that consumers use APR to choose between installment plans and that they do so without evaluating APR properly. With the simplified disclosure (where APR is absent) 72 pct. correctly chose the cheapest installment plan. However, when APR is present and in conflict with the total payable amount, only around half choose the cheapest installment plan, cf. figure 9. There was no significant difference between the simplified disclosure with APR included (55 pct. chose the cheapest), the standard disclosure (where 48pct. chose the cheapest) or a condition where total payable amount was highlighted explicitly (where 54 pct. chose the cheapest). Cf. figure 9.

Figure 9: **Survey experiment**

Pct. of respondents who chose the installment plan with the lowest total payable amount



The results indicate that consumers use APR when choosing installment plans, but fail to recognize that APR expresses the relative cost of the credit. Since the amount of credit are not identical for the offers, this should be taken into consideration when comparing the APR across the two offers. Box 4 contains a more detailed discussion of these results.

Results - Consumers find it easier to compare offers with the simplified disclosure.
The laboratory test revealed other important behavioral findings in favor of a simplified disclosure. Consumers in the intervention group spend less time pr. choice task and made fewer revisits, i.e. they had to switch their gaze fewer times between the two offers before making a decision and spent less time per task, c.f. figure 10. Additionally, a consistent finding across both laboratory experiments and the online survey was that consumers that received the simplified disclosure found it easier to compare and choose between credit offers, cf. figure 11.

Box 4: "Take the best APR"

The choice experiments showed that consumers in the control group in some cases opted for the credit with the lowest APR. APR expresses the relative cost of a credit and is a good tool for comparison of credit offers, provided that the amount borrowed, the term and prepayment conditions are comparable.

In the current experiment it was explicitly explained to respondents that the product presented in the two offers were the same, yet as in real life the cash price and hence the amount borrowed varied between the two offers. This should be taken into consideration when comparing offers.

In the example below two offers for the same product with different credit options are shown. Both have a term of 78 month and no prepayment. Interestingly in the survey more than half of the consumers opted for option A that had the lowest APR but highest cash price and total payable amount

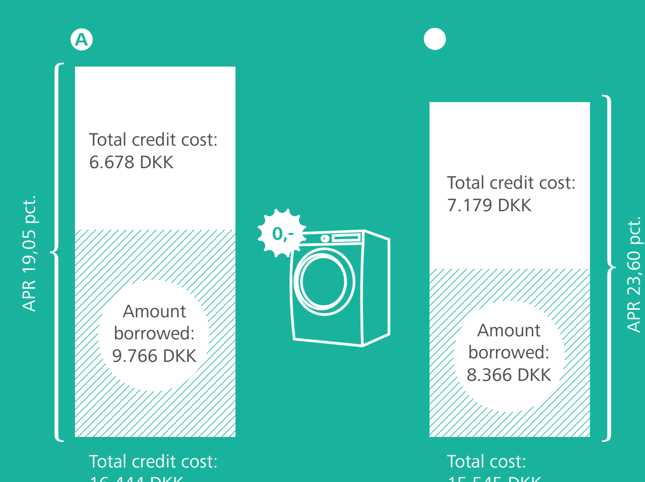


Figure 10: **Lab experiment**

Number of revisits and time spent per task

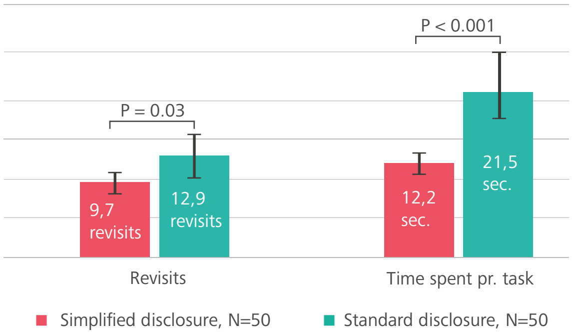
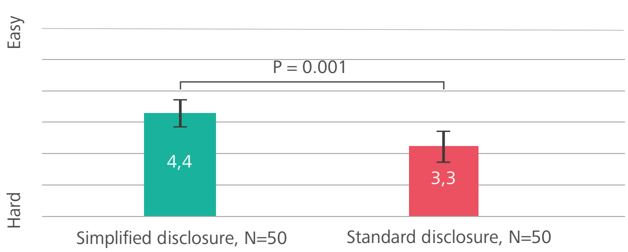


Figure 11: **Lab experiment**

Self-reported difficulty on a 1(hard) – to 7(easy) Likert scale



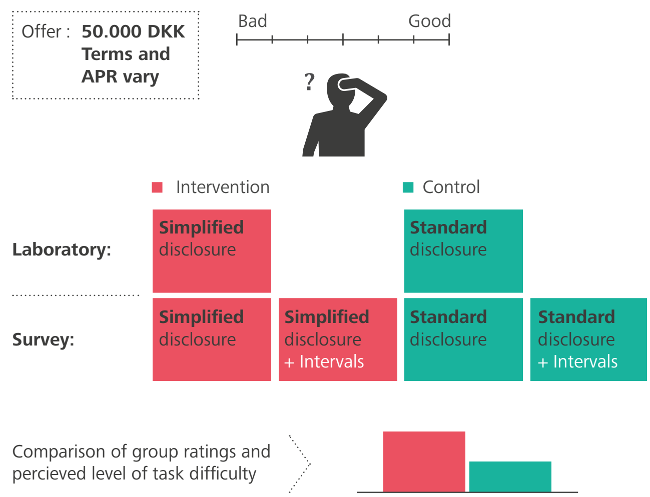
Experiment 3 – Rating credit offers

In the third experiment, respondents were asked to review advertisement material for consumer loans one at a time and conduct a rating of how attractive they found the offer on a scale from 1-7, where 1 was bad and 7 good. In the lab test respondents had to rate twenty different loans. For all loans the principal (the borrowed amount) was 50.000 DKK (≈ 6,700 EUR). The loans varied in term (24- 120 months) and APR (7-21%). Respondents in the control group rated loans with the current standard disclosure and the intervention group got the same loans but with the simplified disclosure.

Following the lab experiment, an online survey was conducted in order to see if the initial results from the lab experiment were confirmed in a larger group of respondents. In the online survey 8 loans was ranked. Two additional groups, one control and one intervention, were introduced in the online survey to test an additional variation of the advertisement material where the financial information is given in intervals; e.g. an APR from 7-21%. The advertiser may choose this in order to cover the range of offers a consumer receives based on her creditworthiness. Thus, the two additional groups received loans with the current or simplified disclosures with financial information presented in intervals cf. figure 12.

Figure 12: **Overview of the third part of the experiment**

3. Rating of credit

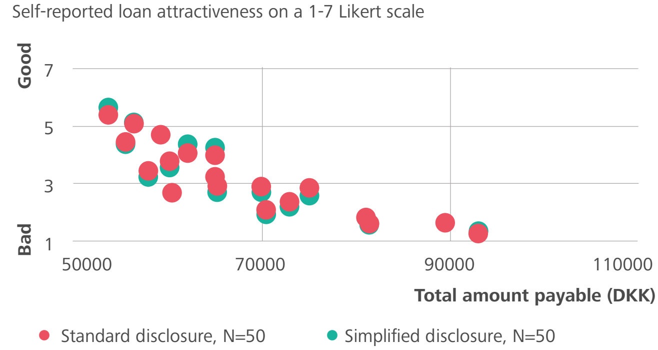


Results – Less information does not change consumers' perception of loan attractiveness

In the lab experiment and the online survey, the rating of personal loans did not differ significantly between the two groups. This means that the simplified disclosure did not affect the perceived attractiveness of the offers. As can be ascertained from figure 13, both groups in general rated the offers according to the total payable amount, which was available to both groups. Therefore, the results suggest that a reduction of information does not affect consumers' ability to judge the attractiveness of credit. Thus, the simplified disclosure does not seem in risk of making consumers more like likely to apply for less attractive loans relative to the standard disclosure.

Figure 13: **Lab experiment**

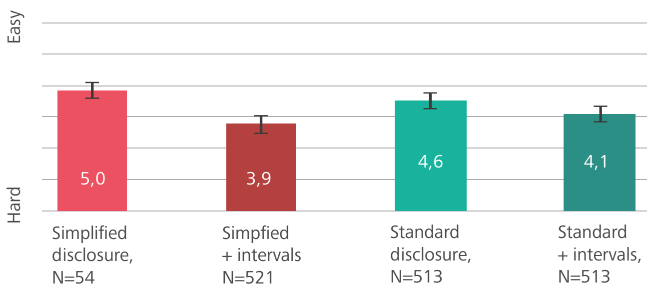
Self-reported loan attractiveness on a 1-7 Likert scale



Loans where the financial attributes were presented in intervals were not perceived as attractive. By comparing the rating of interval loans with those without intervals, the respondents rated the interval loans as if the all fell in the highest end of the interval. This finding runs contrary to an initial hypothesis that consumers were likely to rate offers based on the lowest attribute in interval and therefore potentially overestimate the attractiveness of a credit offer.

Figure 14: **Survey experiment**

Self-reported difficulty on a 1(hard)-7(easy) Likert scale



Furthermore, the respondents reported that loans with intervals were harder to rate compared to loans without intervals. Finally, consumers did not find it significantly harder or easier to rate interval loans with the standard disclosure compared to the simplified disclosure, cf. figure 14.