THE NATIONAL CREDIT ACT OF SOUTH AFRICA AND THE MOTOR FINANCE SECTOR

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DECLARATION

I declare that **The National Credit Act of South Africa and the Motor Finance Sector** is my own work and that all the resources that I have used or quoted have been indicated and acknowledged by means of complete references.

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H.C. Pieterse Date

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ABSTRACT

In the midst of a global recession, this study explored whether the act of obtaining motor vehicle finance has become more onerous since the implementation of the National Credit Act, 2005, (NCA), and to determine which variables are contributing to the phenomenon of declining motor finance figures. A quantitative research methodology was applied whereby a portion of the analysis was based on historical motor finance application data attained from a medium sized motor finance institution. Another portion considered survey data obtained from 152 South African consumers and 42 Credit Analysts collected by way of self administered questionnaires. Various statistical tools, including Independent Sample t-Tests and Pearson product-moment correlation tests were applied to the data. The results of the study indicate that the act of obtaining motor finance has indeed become more complex since the inception of the NCA. Of the variables tested, motor vehicle retail prices and general living costs were identified as the main impediments limiting the amount of motor finance granted in the South African motor finance sector.

Key terms: The National Credit Act; Prime interest rate; Motor vehicle retail price; Approval ratio; Motor finance sector

TABLE OF CONTENTS

LIST OF TABLES

LIST OF FIGURES

LIST OF DIAGRAMS

LIST OF ABBREVIATIONS

ABA	American Bankers Association
APACS	Association for Payment Clearing Services
BBA	British Banker's Association
DIC	Dealer Incentive Commission
DTI	Department of Trade and Industry
EIU	Economist Intelligence Unit Limited
GDP	Gross Domestic Product
MFC	The Motor Finance Corporation
NCA	National Credit Act, 2005
NCR	National Credit Regulator
OFT	Office of Fair Trading
PWC	PricewaterhouseCoopers
SARB	South African Reserve Bank
SME	Small to Medium Sized Enterprise
UK	United Kingdom
USA	United States of America
VPI	Vehicle Pricing Index

CHAPTER 1
OVERVIEW OF THE RESEARCH

1.1 INTRODUCTION

This dissertation focuses on the development of the motor finance sector in South Africa, and more specifically the amount of motor finance extended since the inception of the National Credit Act (NCA). This chapter seeks to supply the background, motivation and purpose for conducting the research. The following items will be discussed in this chapter, namely, the problem statement, the main research questions, and the aims of the research. An introductory literature review on the topics of credit regulation and the NCA in particular will then be provided, which includes its effect on the motor finance sector in South Africa. The research design and methodology will be offered following the above sections and a chapter layout will be presented.

1.2 BACKGROUND TO AND MOTIVATION FOR THE RESEARCH

Consumer credit has not enjoyed as much consideration in recent years as it is enjoying currently. The United States of America (USA), the United Kingdom (UK) and various other developed as well as developing countries are experiencing a recession following a prolonged period of free flowing credit.

Trouble-free access to and utilization of credit facilities had resulted in consumers taking credit for granted. Whether it was for the purchase of a vehicle, or just to cover an everyday expense, prior to September 2008, when the credit crises in the USA emerged, the process of obtaining a credit facility was a formality. One of the major causes for financial institutions experiencing liquidity problems over the years has been related to lenient or inadequate credit standards for borrowers. Therefore, a lack of adequate lending criteria coupled with low interest rate charges is being blamed for the current economic and financial difficulties experienced in the USA.

Well-defined credit criteria are essential for approving credit in a safe and sound manner. As at February 2009, the South African economy, and more specifically the financial institutions or banks, have managed to endure the recession storm to a large degree, and the NCA is mainly acknowledged as one of the main reasons for this endurance. Easily accessible credit facilities, rising levels of over-indebtedness, and reckless activities by credit providers were identified as some of the main motivations for the creation of the NCA in the first place.

Previous credit regulation made provisions for compulsory payment of prescribed deposits and prescribed maximum periods when it came to instalment sale and lease agreements. These provisions were presumably aimed at the prevention of over-indebtedness as it prevented consumers from binding themselves to an extended period and the compulsory deposit requirement meant that only those consumers who could actually afford the credit received it. It is however believed that these regulations did not achieve what it aimed to do, which was to sufficiently protect the consumer.

A fundamental purpose of the NCA is to achieve integrity in the credit market. It was therefore intended to remove unfair practices thereby resulting in creditworthy consumers from all household income levels being granted access to credit. Certain provisions of the Act were designed to enhance the likelihood of those in lower income groups' of obtaining credit, and for purposes of this dissertation more specifically, vehicle finance. Under the new Act, a mandatory upfront deposit is no longer a requirement and the finance period can be increased from the traditional fifty four months, as prescribed by the Credit Agreements Act, to seventy two months or even longer. In order to further enhance the likelihood of those in lower income groups securing vehicle finance, total household income instead of personal income is to be evaluated for the granting of credit under the new Act.

Conversely, the Act also imposes significantly more stringent conduct requirements and regulations on credit providers, and as such, has required them to rethink their strategies, policies and lending criteria. The NCA requires a credit provider to ensure that a consumer can afford the credit that is applied for before actually approving the credit application. Were a credit provider to neglect this responsibility, a court could find that the agreement was concluded recklessly, and subsequently make a ruling setting aside all or part of the consumer's rights and obligations in terms of the agreement. The force and effect of the credit agreement could also be suspended in its entirety, although, as per the South African Consumer Tribunal, no such ruling has as yet been made by the courts with regards to a motor finance transaction.

It is believed that the above mentioned requirements has made it far more difficult to obtain vehicle finance, as credit applicants have to prove that they earn sufficient income to provide for the new instalment in addition to all their existing monthly expenses. This development seems to be contradictory to one of the major aims of the NCA, which is to make credit more accessible to all income groups, as the lower-income group is effectively being driven out of the credit market all together.

Effective regulations are vital to the ongoing existence of the South African motor finance sector and the development and growth of the South African economy. For any regulation to be effective as well as cost effective, it has to adapt and respond to changes in institutional and market conditions. Regulations that are too rigid and not updated as changes in the financial system occur will be inefficient at best. The notion that application of the NCA is single-handedly responsible for access to motor finance being more restricted should be investigated though, as other factors, economic or social in nature, could be having an even larger impact on the amount of motor finance being granted in South Africa.

The negative impact that any new credit regulation may have on the motor finance sector and the economy as a whole could be limited through the knowledge of exactly which variables influences the amount of motor finance being extended to the consumer. With this knowledge to their exposal and through innovative thinking and pro-active measures, credit providers should be able to adapt to any new regulations more effectively. They should also be able to formulate effective strategies to exploit these new regulations to their benefit which could result in a competitive advantage that is tough to imitate.

1.3 PROBLEM STATEMENT

Those in favour of a higher level of social equality has argued that a less regulated credit environment allows those consumers in lower income brackets to access overdraft, credit card, and motor finance facilities. This enhances their mobility and access to funds that could be applied towards academic studies, which would improve their employability levels thus allowing them to break free from the poverty trap (Richards, Palmer & Bogdanova, 2007: 506). It is also argued that the first principle of social policy should be to treat users of consumer credit as adults, who are entirely capable of managing their own financial affairs, and not to restrict their freedom of access to it in order to protect the relatively small minority who get into difficulties (Crowther Committee Report, 1971).

The fundamental purpose of the NCA, according to Kelly-Louw (2007) is to achieve integrity in the credit market. It was therefore intended to remove unfair practices, inappropriate disclosures, and anti-competitive practices from the market. This should also result in creditworthy consumers from all household income levels being granted access to credit.

By limiting a consumers' ability to access credit, their mobility within a society is also limited. Prudential regulations that are too rigid may hinder the normal workings of the economy which could lead to a decline in the overall efficiency of financial markets. It is thus of paramount importance for a balance to be reached between protecting consumers against unscrupulous credit providers and stimulating the normal workings of the economy.

It would thus appear as if there exists a strong case for not limiting the consumers' ability to access credit whereby their mobility within a society is not limited. Conversely, the current world economic difficulties brought on by the credit crisis highlights a definite need for government enforced lending practices.

Ironfield-Smith, Keasey, Summers, Duxbury, & Hudson (2005) found that with the changes taking place in the world economy, and the increase in those consumers with real difficulties and who are unable to service their loan payments, suggests that some form of regulation or policy may be required to protect this vulnerable group and prevent it from growing further. Consumer protection whilst maintaining a high degree of economic efficiency should be the ultimate objective of any financial regulation though.

The Economist Intelligence Unit Limited (EIU) (2008) found that certain provisions of the NCA has made it far more difficult to obtain mortgages and vehicle financing because credit applicants have to prove that they earn sufficient income to service the new instalment in addition to all their existing monthly expenses. It is speculated in the media that the decline in vehicle sales figures, the rate at which motor vehicle retailers are closing down, and large scale retrenchments in the vehicle manufacturing industry since the start of 2009 can all be traced back to the NCA. Limited access to motor finance has resulted in motor vehicle sales figures plummeting, which has a backwards knock-on effect on vehicle retailers and manufacturers, which ultimately results in large scale retrenchments. These developments in the motor industry over the past few months would make it appear as if the NCA is failing in its attempts to protect consumers, because those same consumers it aims to protect are currently joining the job seekers market.

The main objective of this dissertation will be to explore whether the act of obtaining vehicle finance has indeed become more onerous since the implementation of the NCA. The sub-objectives of the research study will firstly be to determine whether other economic variables, more specifically, the prime interest rate level or motor vehicle retail prices, could be responsible for, or contributing to the developments currently taking place in the motor finance sector. Secondly, to formulate strategies that could be employed by stakeholders in the motor finance sector in order to minimize the effect of these variables, and possible future restrictive regulations in order to continually grow the sector thereby stimulating the South African economy.

1.3.1 GENERAL RESEARCH QUESTION

The general research question that requires further exploration is as follows:

- Is there a relationship between the introduction of the NCA, the prime interest rate, motor vehicle retail prices and the amount of motor finance granted to the South African consumer?

1.3.2 SPECIFIC RESEARCH QUESTIONS

In terms of the literature study, the following specific research questions should be addressed in this research project:

- How can credit regulation be conceptualised and what are its key aspects?
- How can the NCA be conceptualised and what are its key aspects?
- How can motor vehicle finance in South Africa be conceptualised and what are its key aspects?
- How can the effect of the NCA on motor vehicle finance be conceptualised and what are its key aspects?
- How can the effect of the Prime Interest Rate on motor finance be conceptualised and what are its key aspects?
- How can the effect of Motor Vehicle Retail Prices on motor finance be conceptualised and what are its key aspects?

In terms of the empirical study, the following specific research questions should be addressed in this research project:

- What are the results regarding new applications for motor finance in a South African motor finance institution, pre- and post NCA application?

- Does a relationship exist between the prime interest rate, motor vehicle retail prices and the outcome of new motor finance applications in a South African motor finance institution?
- Does the South African consumer and motor finance credit analysts share the same view regarding the impact of the NCA as the main impediment preventing the consumer from applying for motor finance?
- Is there a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance?
- In the view of motor finance credit analysts, is the NCA regarded as being the major reason for motor finance applications being declined?

1.3.3 AIMS OF THE RESEARCH

The aims of the research study is to conduct a thorough empirical evaluation of credit conditions in the motor finance sector pre- and post NCA application, to determine outcomes and process measures instituted by the major players in the South African motor finance sector, and to formulate measures to minimise the negative effect that credit regulation or other economic variables, namely the prime interest rate level or motor vehicle retail prices may have on the motor finance provider.

In terms of the questions that originated in order to solve the identified problems, the general aim of this research study is to examine whether a relationship exist between application of the NCA, the prime interest rate, motor vehicle retail prices and the amount of motor finance granted in the South African motor finance sector.

1.3.4 RESEARCH HYPOTHESIS

Hypotheses are statements that describe the relationship or difference between two or more variables related to the research problem or question. Hypotheses are generally created in one of two ways. Firstly, they are deducted from the existing theories and models within a discipline. Secondly, they are inductively derived from the observations, experience and visualizations (Mouton & Marais, 1994). Hypotheses are usually formulated as relationships between variables that need to be tested. A hypothesis can thus also be described as a conjectural statement of the relationship that exists between two or more variables (Mouton & Marais, 1994).

The concept of a null hypothesis in quantitative research refers to an instance where it is postulated that no relationship exists between the variables being tested. The objective of a quantitative research procedure is to disprove the null hypothesis or to prove that the relationship between variables is not coincidental and cannot be assigned to chance. Hypotheses are predictions of some specific event with a probability greater than pure chance. According to Goodwin (2000) the prediction is based on theory, and the study is guided by the hypothesis in order to prove its accuracy.

The central hypothesis of this study can be formulated as follows: There is a relationship between Application of the NCA and the rate of credit application approval in the South African motor finance sector. In addition to this, other economic factors like the prime interest rate and motor vehicle retail prices have an even greater effect than the NCA on the amount of motor finance being extended to the consumer.

In terms of the specific research questions the sub-hypotheses can be identified as:

$H0_1$: There is no significant difference between approval ratio means for periods pre- and post NCA application

$H1_1$: There is a significant difference between approval ratio means for periods pre- and post NCA application

$H0_2$: There is no relationship between the prime interest rate and the approval ratio of new motor finance applications

$H1_2$: There is a relationship between the prime interest rate and the approval ratio of new motor finance applications

$H0_3$: There is no relationship between motor vehicle retail prices and the approval ratio of new motor finance applications

$H1_3$: There is a relationship between motor vehicle retail prices and the approval ratio of new motor finance applications

$H0_4$: There is not a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance

$H1_4$: There is a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance

$H0_5$: There is not a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance

$H1_5$: There is a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance

$H0_6$: There is not a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance

$H1_6$: There is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance

$H0_7$: There is no relationship between Total Household Income and the consumers' opinion regarding the NCA as the main consideration in their decision to apply or not apply for motor finance

$H1_7$: There is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main consideration in their decision to apply or not apply for motor finance

$H0_8$: There is not a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined

$H1_8$: There is a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined

1.4 INTRODUCTORY LITERATURE REVIEW

1.4.1 THE NEED FOR CREDIT REGULATION

Consumer credit has not enjoyed as much consideration in recent years as it is currently receiving. The USA, the UK, and various other developed and developing countries, including South Africa, are experiencing a recession subsequent to an extended period of free flowing credit. As a subject for social science, in contradiction to its handling as a technical topic of financial analysis or for its consequences for the problems of financial debt, credit has been severely neglected though (Burton, Knights, Leyshon, Alferoff, & Signoretta, 2004).

Wirtz (2009) found that the ease of access to and utilization of credit facilities has resulted in consumers taking credit for granted. Whether it was for the purchase of a motor vehicle, or merely to cover an everyday expense, prior to September 2008, when the credit crises in the USA emerged, the process of obtaining a credit facility was a formality.

The literature study will focus on variables that could have lead to the credit crisis. One of the major causes for financial institutions experiencing liquidity problems over the years had been related to lenient or inadequate credit standards for borrowers. A lack of adequate lending criteria together with credit facilities that were priced too cheaply for the underlying risk is being blamed for the current economic and financial difficulties experienced in the USA (Wirtz, 2009). According to Bobo (2007: 34), 'credit is the lubricant that keeps the wheels of our economy turning smoothly. But it needs to be applied responsibly or you gum up the works'. In light of this statement, it appear as if the deregulation of the USA credit industry might be largely to blame for the current financial turmoil the country, and the world economy, finds itself in.

1.4.2 PRINCIPLES OF CREDIT REGULATION

Consumer protection whilst maintaining a high degree of economic efficiency should be the ultimate objective of any financial regulation (Falkena, Bamber, Llewellyn, & Store, 2001). Regulation does not have to impact negatively on competition between financial organizations. Falkena *et al.* (2001) found that properly constructed regulation reinforces the efficiency of market mechanisms, for example it does not impede competition but rather enhances it in several ways.

In this section, the literature study will focus on various definitions for the term regulation, as presented by Falkena *et al.* 2001, amongst others. Arguments for and against credit regulation will be highlighted and the ultimate rationale for the aspect of regulation designed to protect the consumer will be presented.

1.4.3 TYPES OF CREDIT REGULATION

In the field of financial regulation, one finds prudential regulation on the one side and conduct regulation on the other. This section of the literature review will focus on the definitions and principles of the two types of regulation as indicated by Chavez & Gonzales-Vega (1994). This section will also introduce those pieces of financial regulation instituted around the globe by presenting its main objectives and shortcomings.

1.4.4 THE NATIONAL CREDIT ACT OF SOUTH AFRICA

The NCA was borne out of the need for a single system that could regulate the credit industry in South Africa. The act repealed and replaced the previous credit Agreements Act 74 of 1980 and the Usury Act 73 of 1968, in order to regulate the demands of a complex consumer market (Renke, Roestoff, Haupt, 2007).

This section of the literature review will focus on the weaknesses of past financial regulation in South Africa, some of which were identified by Kelly-Low (2007), and the fundamental purpose of the Act. The different types of credit agreements as well as the statutory body brought into life by the act, namely the National Credit Regulator (NCR) will also be dealt with in detail.

1.4.5 OVER-INDEBTEDNESS AND RECKLESS CREDIT GRANTING

Highlighted as a major reason for the need to reform existing consumer credit legislation, consumer over-indebtedness arose due to an over-supply of credit to those considered credit worthy, resulting in heavy debt burdens for a large portion of South African consumers. In this regard, the NCA is a groundbreaking piece of consumer legislation as for the first time in the history of South African consumer legislation, specific provisions is made for measures to prevent reckless lending and over-indebtedness (Renke *et al*. 2007).

The literature study will define and explain these terms as well as focus on certain domestic issues, for instance, consumer debt and household saving. As a court may declare a credit agreement reckless in any proceedings where the validity of a credit agreement is being assessed, the suspension of reckless credit and its consequences for credit grantors will be highlighted.

1.4.6 MOTOR VEHICLE FINANCE IN SOUTH AFRICA

According to Econometrix (2008), South Africa's automotive industry contributed around 7.5% to the countries Gross Domestic Product (GDP) in 2006, and 6.9% for 2007. With roughly fifty percent of all vehicles bought in South Africa being financed, it is clear to see why the financial services industry is such a pivotal spoke in the countries economy. If it was not for the corporate sector being responsible for nearly 85% of vehicles bought, this figure would be much higher, as many large companies prefer to make cash purchases rather than to conclude motor finance transactions.

This section of the literature review will focus on the major players in the motor finance sector, historically as well as presently. The different finance options available to consumers under the Act, as described by Campbell & Logan (2008), will be discussed and various views on the impact of the NCA on the sector as a whole will be aired. Those sections of the NCA that is believed to have the greatest impact on motor finance will be discussed, and the impact it has had on other sectors within the industry, namely microfinance, will be highlighted. This section will also identify certain other economic factors, namely, the prime interest rate and motor vehicle retail prices that could impact on the amount of motor finance extended to consumers.

1.5 RESEARCH DESIGN

Research aims to enhance our understanding of a certain subject matter. More specifically, its aim is the ultimate discovery of truth (Leedy & Ormrod, 2005). Therefore the aim of research design is to ensure that the type of measurement used to analyze the data will allow researchers to interpret the data correctly and improve our insight of the topic investigated (Leedy & Ormrod, 2005). In order to accomplish this, careful planning and consideration should be given to the research design methods used to analyze the data.

There are four factors which should be considered within this section, namely, the variables being investigated, the type of research which will be conducted, the unit of analysis and the methods used to ensure reliability and validity.

1.5.1 TYPE OF RESEARCH

The research approach followed was a quantitative approach. Hypotheses were formulated prior to commencement of the research study. The hypotheses were explicitly declared and measured by way of utilizing a measuring instrument. The research was conducted with the aim of testing the hypotheses and finally, to accept or reject the formulated hypotheses as a manner of conclusion.

The study will be illustrated using exploratory and descriptive research. The first part of the study, which includes the literature review, will be presented in a qualitative and descriptive manner. The second part of the study which involves the empirical study will be presented in an exploratory manner using a quantitative research method. According to Tustin, Lightelm, Martins & Van Wyk (2005: 89), ‘quantitative research findings are subject to mathematical or statistical manipulation to produce broadly representative data of the total population’.

1.5.2 UNIT OF ANALYSIS

A medium sized motor finance house, affiliated to one of the major banks and competing in the South African motor finance sector, was the primary unit of analysis. In addition to this, the views of credit analysts from the four major banks, including the views of the consumer was recorder. These were termed the secondary units of analysis.

1.5.3 DATA COLLECTION AND ANALYSIS

Quantitative financial information, covering a period of twenty four months pre- and twenty four months post NCA application was collected from the primary unit of analysis. In addition to this, quantitative as well as certain qualitative data was collected from the primary as well as the secondary units of analysis by way of self administered questionnaires.

During the analysis phase of the research project, the following descriptive statistical measurement tools were applied:

- Measures of central tendency (mean, median, mode)
- Measures of dispersion (standard deviation, minimums, maximums)
- Boxplots
- Scatterplots
- Bar Charts

The following parametric statistical tests were applied to the data:

- Independent Sample t-Test
- Pearson product-moment correlation test

In addition to the above parametric statistical procedures, the following non-parametric tests were performed:

- Spearman rank-order correlation test
- Wilcoxon signed-rank test
- Mann-Whitney test

1.5.4 RESEARCH VARIABLES

The dependent variable in this research study is: the amount of motor finance granted to the consumer, and the independent variables are application of the NCA, the prime interest rate and motor vehicle retail prices. The aim of the research is to establish whether application of the NCA, the prime interest rate and motor vehicle retail prices (independent variables) has an effect on the amount of motor finance granted to the consumer (dependent variable).

Mouton & Marais (1994) suggested that the independent variable should be controlled by the researcher. Control over the independent variable in this specific research effort will be managed by measuring the situation pre- and post NCA application.

1.5.5 METHODS TO ENSURE RELIABILITY AND VALIDITY

The research study was designed in such a manner as to ensure that the greatest reliability and validity is attained.

1.5.5.1 Reliability

The reliability of a measure is simply its consistency. The reliability of the research was ensured by stating the literature sources on which the theoretical views are based. Therefore chapter two, three, four and five of the research report includes a detailed conceptualisation of the concepts, credit regulation, the NCA, the prime interest rate and motor vehicle retail prices in particular. These conceptualisations were mined from relevant former and current literature. A number of classical sources were used as references as these concepts are particularly noteworthy and offer a historical perspective on the evolution of the concepts. Additionally, measuring instruments of which the reliability has been demonstrated through prior research was chosen in order to test the formulated hypotheses.

1.5.5.2 Validity

The validity of a measurement is the extent to which the instrument measures what it is supposed to measure (Leady & Ormrod, 2005). Internal validity on a contextual level was ensured through the application of the chosen theories, models and measuring instruments in a representative mode and presented in a standardised manner. In order to ascertain that the conclusions drawn from the research study are warranted from the data collected, multiple sources of data collection were applied in order to ensure triangulation.

External validity was ensured through the inclusion of the four leading motor finance institutions in South Africa as well as one of the leading medium sized finance houses in the research study, thus ensuring that the sample is representative of the total population. The historical financial data obtained from the primary unit of analysis consisted of several years' worth of monthly information pertaining to the approval ratio of new motor finance applications received. The trends identified in the data were confirmed through data collected from the leading motor finance institutions by way of a self administered questionnaire.

1.6 RESEARCH METHOD

The research was prepared in three phases as presented in Table 1.1:

Table 1.1 Research method

PHASE 1	**LITERATURE REVIEW**
Step 1	Credit Regulation
Step 2	The National Credit Act of South Africa
Step 3	Motor Vehicle Finance in South Africa
PHASE 2	**EMPIRICAL STUDY**
Step 1	Hypothesis formulation
Step 2	Data Collection
Step 3	Selection of measuring instruments
Step 4	Population and sample
Step 5	Data Processing
Step 6	Reporting and interpretation of results
PHASE 3	**CONCLUSIONS, LIMITATIONS AND RECOMMENDATIONS**
Step 1	Conclusions
Step 2	Limitations of the research
Step 3	Recommendations

1.7 CHAPTER LAYOUT

The flow of research determined the succession of chapters which are arranged as follows:

- **Chapter 2: Credit Regulation.** This chapter encompasses a literature review regarding the theoretical aspects of credit regulation. The aim of this chapter is to conceptualise credit regulation as a concept and to describe its evolution and application across the globe. This chapter focuses on describing the key characteristics of credit regulation and the impact it has had on the motor finance sectors of various countries.

- **Chapter 3: The NCA.** This chapter includes a literature review regarding the theoretical aspects of the NCA and conduct regulation. The objectives of the NCA and the challenges which its introduction was to address, as well as general financial regulation objectives are discussed.

- **Chapter 4: Motor vehicle finance in South Africa.** This chapter of the dissertation includes a literature review build upon a detailed discussion on the motor finance sector in South Africa and its evolution prior and post NCA application. This chapter specifically addresses the different finance options as well as the various motor finance products available to the consumer.

- **Chapter 5: The impact of the NCA on motor finance.** This chapter encompasses a literature review regarding the consumer credit report published by the NCR, as well as the views of various experts regarding the impact of the NCA and other economic variables on the amount of motor finance granted to the consumer.

- **Chapter 6: Empirical Study.** This chapter describes the empirical research of the study. It describes the research methodology, which involves stating the aims of the empirical research and providing details of the research population and sample, the measuring instruments chosen, the administration of the questionnaire, data processing, statistical methods applied and the formulation of the research hypothesis.

- **Chapter 7: Research Results.** This chapter reports on the results obtained during the empirical study. It focuses on testing the hypothesis formulated in chapter 6 and is dedicated to the impact assessment of the NCA, prime interest rate, and motor vehicle retail prices on the South African motor finance sector.

- **Chapter 8: Conclusions, limitations and recommendations.** This chapter involves the formulation of conclusions from the results obtained in chapter 7. It offers a summary of the research and presents the key findings. The limitations for the study and recommendations to mitigate the negative effect of credit regulation on the motor finance sector are also provided in this chapter.

1.8 CHAPTER SUMMARY

This chapter supplied the background, motivation and purpose for conducting this research. The problem statement, main research questions, and the aims of the research were explored. An abridged literature review on the topics of credit regulation and the NCA in particular were provided, which covered its effect on the South African motor finance sector. The research design and methodology was discussed and the chapter concluded with a presentation of the chapter layout.

CHAPTER 2
CREDIT REGULATION

2.1 INTRODUCTION

The aim of this chapter is to conceptualize credit regulation as a concept and to describe its evolution and application across the globe. Special focus is placed on describing the key characteristics of credit regulation and the impact it has had on the motor finance sectors of various countries.

2.2 THE NEED FOR CREDIT REGULATION

Consumer credit has not enjoyed as much thought in resent days as it is enjoying presently. The USA, UK, and various other developed and developing countries, including South Africa, are experiencing a recession following a long-drawn-out period of free flowing credit. Gertler and Gilchrist (1993) found that the effect of a recession is further worsened by the inability of credit-dependent organisations and consumers to borrow at the levels they could in good times, either as a result of banks decreasing the supply of loans after a monetary tightening, or because their credit-worthiness declines when net worth falls. As a subject for social science, in contradiction to its handling as a technical topic of financial analysis or for its consequences for the problems of financial debt, credit has been severely neglected (Burton *et al.* 2004)

Wirtz (2009) found that the ease of access to and utilization of credit facilities has resulted in consumers taking credit for granted. Whether it was for the purchase of a motor vehicle, or merely to cover an everyday expense, prior to September 2008, when the credit crises emerged in the USA, the process of obtaining a credit facility was a formality.

With the UK economy falling into a steep downturn, Munoz, Mollenkamp, MacDonald (2008) found that the British public is amongst the most indebted consumers in the world, with personal insolvencies increasing by 8.8% to 27,087 in England and Wales in the third quarter of 2008. A PricewaterhouseCoopers (PWC) poll determined that one in six UK consumers say that they can't service their debts and debt-counselling centres are receiving record numbers of calls.

One of the major causes for financial institutions experiencing difficulty over the years has been related to lax or inadequate credit standards for borrowers. A lack of adequate lending criteria together with credit facilities that were priced too cheaply for the underlying risk is blamed for the current economic and financial difficulties experienced in the USA (Wirtz, 2009).

In a consultative paper issued by the Basel Committee on Banking Supervision (1999), it was stated that banks must operate under sound, well-defined credit-granting criteria. The establishment of sound, well-defined credit criteria is essential to approving credit in a safe and sound manner. The credit criteria should clearly set out who is eligible for credit and for how much, what types of credit are available and under what terms and conditions. It is therefore imperative that financial institutions obtain sufficient information in order to adequately assess a borrowers' risk profile.

The Basel Committee identified that at a minimum, the following information must be available in order for a sound credit decision to be made:

- The purpose of the credit and source of repayment
- The integrity and reputation of the borrower or counterparty
- The current risk profile (including the nature and aggregate amounts of risk) of the borrower or counterparty and its sensitivity to economic and market developments
- The borrower's repayment history and current capacity to repay, based on historical financial trends and cash flow projections
- A forward-looking analysis of the capacity to repay based on various scenarios
- The legal capacity of the borrower to assume the liability

- For commercial credit, the borrower’s business expertise and the status of the borrower’s economic sector and its position within the sector
- The proposed terms and conditions of the credit, including covenants designed to limit changes in the future risk profile of the borrower
- Where applicable, the adequate and enforceability of collateral or guarantees, including under various scenarios

Danielsson, Goodhart, Shin (2002) argued that financial institutions were relying too heavily on credit ratings provided by rating agencies for making credit decisions. These agencies have been shown to provide conflicting and inconsistent forecasts of consumers’ credit worthiness as they are unregulated and the quality of their risk estimates are largely unobserved.

According to Barron (2007), a credit operation should be constantly fluid, thus reacting to both the internal and external forces acting upon it. As the first real signs of a credit crunch appeared in mid September 2008, when financial markets came under pressure, banks across the USA started tightening up on their credit requirements. Since then, those applicants who actually manage to secure a loan have to be content with premiums a great deal higher than what they were previously used to.

Financial institutions are not prepared to entertain any applications outside of its policy limits, and thus display a general intolerance for risk whilst the economy is in its current state. Higher collateral requirements, increased interest rates and shorter repayment periods have resulted in more documentation and even higher upfront down payments. More questions are being asked and overall turnaround times have increased significantly. As a result of the increased focus on credit standards, USA banks are receiving more applications from customers who traditionally used to bank with another institution.

With credit criteria as stringent as it is currently in the USA, a speedy recovery, or improvement in the economy is not likely as the higher borrowing costs are resulting in projects, designed to fuel the economy, being delayed temporarily or even mothballed indefinitely (Wirtz, 2009). Figure 2.1 indicates that the credit crises have resulted in a more stringent collateral requirement being laid down than what was the case previously.

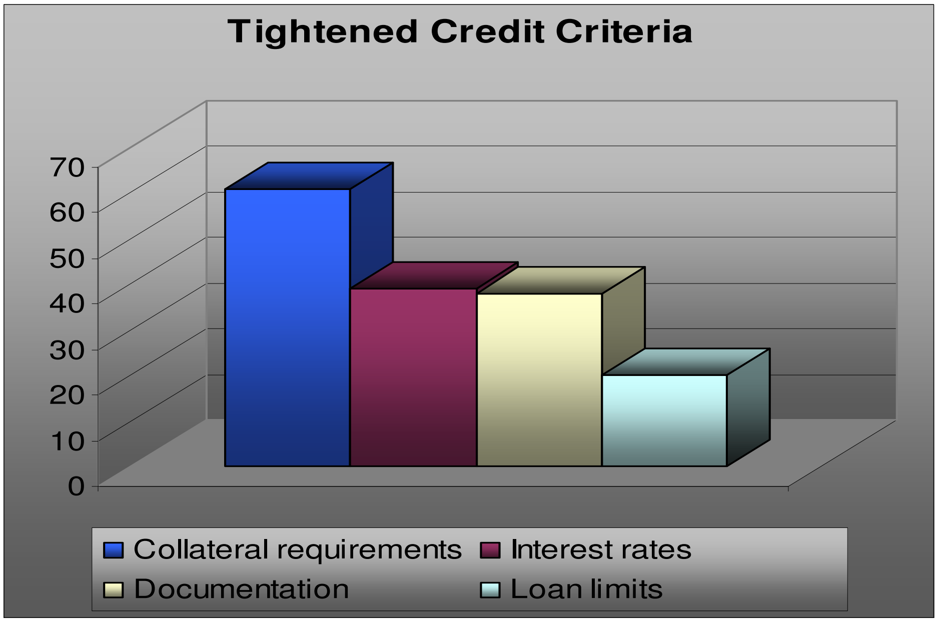


Figure 2.1: Tightened credit criteria

Adapted from: Ronald A. Wirtz, (2009:4)

Wirtz (2009) reported that a financial institution survey conducted by the Federal Reserve Bank of Minneapolis, show that banks and other financial institutions are not necessarily short on capital to lend; rather, borrowers are more reluctant to apply for credit as uncertainty on what the future holds for them increases. This uncertainty coupled with higher credit standards has lead to a substantial decline in the number of credit facilities granted in the USA.

Despite Figure 2.2 indicating that available funds are not necessarily the main reason for tightening credit standards, GMAC LLC, a large motor financing company in the USA started restricting new loans to credit-worthy applicants in October 2008, following a failed attempt to raise new funds (Stoll, Bodette, 2008). Evans (2008) stated that the slower demand for credit also partly reflects the consumers' struggles to meet current loan obligations. This view was also supported by The American Bankers

Association (ABA) when it reported that credit delinquencies in the last three months of 2007 reached its highest levels in approximately sixteen years.

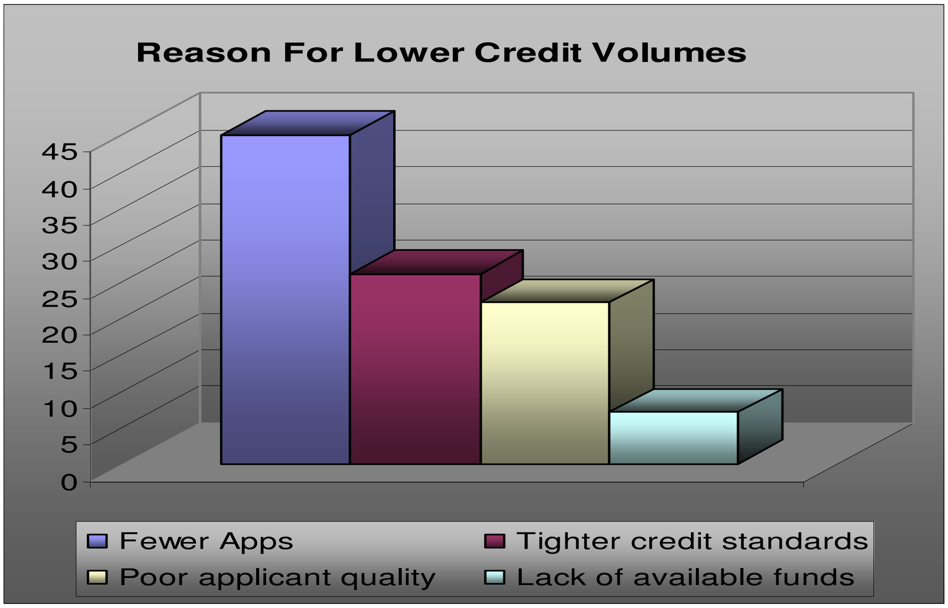


Figure 2.2: Reason for lower credit volumes

Adapted from: Ronald A Wirtz (2009:4)

Further abroad, Ironfield-Smith, Keasey, Summers, Duxbury & Hudson (2005) found that the combination of several factors resulted in UK consumers being more wary of continued spending, namely:

- Interest rate rises, which impacts largely on those consumers with accumulated debt
- The weakening housing market, which impacts negatively on consumer confidence, whilst declining property prices makes it more difficult to raise capital on the back of decreasing property values
- The growing UK current budget deficit, which increases the likelihood of tax rises
- The large USA current account deficit: This poses a threat to global financial stability

According to Bobo (2007), 'credit is the lubricant that keeps the wheels of our economy turning smoothly. But it needs to be applied responsibly or you gum up the works'. In light of this statement it is speculated that the deregulation of the USA credit industry is largely to blame for the current financial turmoil the country and the world finds itself in.

Reaching a balance between responsible lending and stimulating economic activity is paramount if the USA is to recover from the recession and is to prevent the same situation from reoccurring in the future. 'Financial markets might be described as returning to traditional standards, where metrics such as loan-to-value and debt-to-income ratios matter again' (Wirtz, 2009). Bobo (2007) stated that, 'credit should be dispensed with care rather than reckless abandon or callous indifference'.

In support of Bobo's statement above, Stoll, Boudette (2008) wrote that GMAC's new credit policies were aimed at selling vehicles at rates consumers can afford. Strutt (2008) added to this argument by writing, 'the objective of a sale is to maximize profits, therefore the sale should not be made until all reasonable efforts have been made to ensure that the potential customer can afford to pay, and will pay promptly'.

According to Stigler (1971), the classical assumption on protecting consumers argues that efficient markets are much more effective than formal regulations. Opponents of this theory states that retail financial services are not efficient. There exist market failures due to:

- The absence of information
- The lack of financial literacy by buyers
- Information asymmetry between provider and purchaser
- Principle/agent problems

It would thus appear as if there exist a case for taking action and introducing statutory regulation in monitoring and governing retail financial services (Richards *et al.* 2007).

Most lenders in the UK are affiliated to voluntary trade associations, for instance the Association for Payment Clearing Services (APACS) and the British Banker's Association (BBA), whereby they committed themselves to follow the associations' code of conduct. Cowton (2002) found that not all lenders are interested in following the prescribed responsible lending practices though. Thus, formal legislation rather than self-regulation should be more desirable (Cowton, 2002).

Those in favour of a higher level of social equality has argued that a less regulated credit environment allows those consumers in lower income brackets to access overdraft and credit card facilities whereby they are able to obtain funds that could be applied towards academic studies, which would improve their employability levels, thus allowing them to break free from the poverty trap (Richards *et al*. 2007). It is also argued that the first principle of social policy should be to treat users of consumer credit as adults, who are entirely capable of managing their own financial affairs, and not to restrict their freedom of access to it in order to protect the relatively small minority who get into difficulties (Crowther Committee report, 1971).

It would thus appear as if there exists a strong case for not limiting consumers' ability to access credit whereby their mobility within a society is also limited. The credit industry needs debt levels to increase if it is to meet its ongoing profit targets. Add to this the impact of the credit crisis on the world economy, it appears as if there definitely exists an even stronger case for government enforced lending practices. Ironfield-Smith *et al.* (2005) found that with the changes taking place in the world economy, the increase in those consumers with real difficulties and who are unable to service their loan payments, suggests that some form of regulation or policy may be required to protect this vulnerable group and prevent it from growing further.

2.3 PRINCIPLES OF CREDIT REGULATION

Falkena, Bamber, Llewellyn & Store (2001) defined the term regulation as a generic term encompassing:

- Regulation (the establishment of specific rules of behaviour)
- Monitoring (observing whether the rules are obeyed)
- Supervision (the more general observation of the behaviour of financial firms)
- Enforcement (ensuring the rules are obeyed)

Regulatory arrangements can be vital to the ongoing existence of certain industries and the development and growth of economies across the globe. For any regulation to be effective as well as cost effective it has to adapt and respond to changes in institutional and market circumstances. This has been highlighted by the structural changes in the banking systems of most developed countries, brought on by the current global financial crisis. Regulations that are not fluid and constantly upgraded as changes in the financial system occur will be inefficient at best. Imperative to the success of any regulation is the ability, therefore, to seek regulatory institutions, structures and mechanisms that maximize the explicit objectives of the regulations whilst minimizing the imposed costs (Falkena *et al.* 2001).

Consumer protection whilst maintaining a high degree of economic efficiency should be the ultimate objective of any financial regulation. Falkena *et al.* (2001) identified three specific objectives of financial regulation:

- Securing systemic stability in the economy
- Ensuring institutional safety and soundness
- Promoting consumer protection

A major argument for financial regulation has been market imperfections and failures. Information problems, externalities, conflicts of interest, agency problems, etcetera, highlights the fact that financial services does not operate in a perfectly competitive market. Consumers often hold inadequate information and are not as well informed as financial service providers, which may result in poor decision making on their part. In addition to this, consumers do not all poses the ability to assess the quality of offerings as most financial products are technical in nature.

The ultimate rationale for the aspect of regulation designed to protect the consumer is to correct for market imperfections or market failures which would compromise consumer welfare in a regulation-free environment (Zeldes, 1989). Falkena *et al.* (2001) identified several additional factors that could motivate consumers to demand financial regulation:

- Decreased transaction costs for consumers (for example, saving costs in investigating the position of financial firms, or costly analysis)
- Consumers' lack of information and inability to utilize information
- A demand for a reasonable degree of assurance in transacting with financial organizations
- Past experience of bad behaviour by financial organizations
- The value of a contract can be influenced by the behaviour and solvency of a financial organization after the contract is signed and product purchased
- The consumer may be making a substantial commitment in financial transactions
- A preference for regulation to prevent hazardous behaviour by financial institutions as an alternative to claiming redress after bad behaviour has occurred
- To secure economies of scale in monitoring

One of the major hazards in the financial services industry has always been the gridlock problem. Many financial institutions know what is expected of them and how they should conduct business from a moral view point. The problem is that they are not always convinced that other competitors in the market will operate along moral lines, thus in order to maintain their market share, moral organizations may be induced into adopting hazardous strategies.

The role of financial regulation in this instance is to set certain minimum standards that all organizations in the sector must adhere to and will be applied equally to all competitors. Thus, 'regulation could have the positive and beneficial effect of breaking the gridlock by offering a guarantee that all participants will behave in accordance with certain standards' (Falkena *et al*. 2001).

Regulation does not have to impact negatively on competition between financial organizations. Falkena *et al.* (2001) found that properly constructed regulation reinforces the efficiency of market mechanisms, for example it does not impede competition but rather enhances it in the following ways:

- Properly constructed regulation has the potential to enhance competition
- Disclosure requirements enhance price competition
- Disclosure in all its various forms widens the dimensions in which competition operates, so there are more areas in which competition operates, for example contract terms and conditions
- Financial organizations are more likely to emphasise the competence of their staff and this is likely to develop as part of a competitive strategy
- Disclosure enables the media and financial advisors to compare the terms in credit agreements offered by the different institutions
- Disclosure is also likely to lead to an unbundling of contracts with the result that there will be increased competition in the various characteristics of contracts
- Given public perceptions, competition could develop in compliance standards

As far as consumer protection goes, additional financial regulatory goals could be to: Firstly, instil a dimension of integrity and fairness with financial institutions in their dealings with customers. Secondly, instil a dimension of competence whereby suitable fit and proper standards are implemented for directors, management and staff and for the compliance office. Thirdly, instil a dimension of transparency and disclosure whereby adequate information is available about financial services and products and the institutions that provide them (Falkena *et al*. 2001).

2.4 CAUSES OF FINANCIAL CRISES

Financial crises can generally be classified into two broad categories: Firstly, macroeconomic causes, for example, macroeconomic volatility, exchange rate regimes, lending booms, contagion across markets and countries and a lack of market liquidity, are some of those causes that are of an external nature and could be managed or manipulated with economic instruments for instance financial and fiscal policies. Secondly, microeconomic causes, such as poor risk analysis by banks, weak internal credit-control systems, loose controls on connected lending, insufficient capital, ineffective regulation, weak monitoring and supervision by regulatory agencies, and weak internal governance, are causes of an internal nature and could normally be managed and contained by financial regulatory measures (Falkena *et al*. 2001).

A close inspection of Figure 2.3 shows clearly that the major contributor to 29 specific bank liquidations were poor or inadequate supervision and regulation. Therefore, for purposes of this research report, focus will be placed on the microeconomic causes of financial crises.

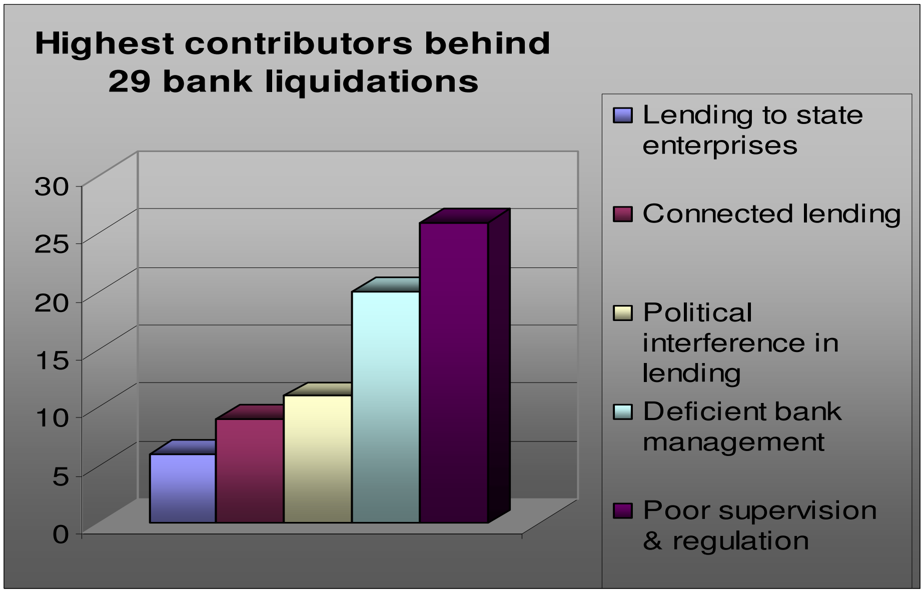


Figure 2.3: Highest contributors behind 29 bank liquidations

Adapted from: G. Caprio and D. Klingebiel "Bank Insolvency: Bad luck, Bad policy, or Bad banking" in Falkena, Bamber, Llewellyn & Store, 2001. Financial regulation in South Africa.

2.5 TYPES OF FINANCIAL REGULATION

In the field of financial regulation one finds prudential regulation on the one side and conduct regulation on the other.

2.5.1 PRUDENTIAL REGULATION

Chavez and Gonzales-Vega (1994), defines prudential regulation as a set of general principles or legal rules that aim to contribute to the stable and efficient performance of financial institutions and markets. These rules represent constraints placed on the actions of financial intermediaries to ensure the safety and soundness of the system. Prudential regulation serves three main purposes. It is to ensure that:

- Financial institutions remain solvent and financially sound
- Consumers are protected from risky behaviour on the part of the financial institution, such as the moral hazard problem for example where an institution holds an asset on behalf of a consumer in such a manner that endangers the value of the asset as the institution does not bear the full consequence of any loss that is incurred
- The efficient performance of institutions and markets and the proper workings of competitive forces are ensured

Consumers are not always in a position to judge the safety and soundness of financial organizations. Prudential regulation is necessary because of imperfect consumer information, agency problems associated with the nature of financial institutions' business, and because the behaviour of financial institutions after consumers have dealt with it affects the value of their stake in the institution. Thus, prudential regulation of financial markets is essential as no amount of information available at the time the agreement is concluded protects consumers against the subsequent behaviour of the financial institution (Falkena *et al*. 2001). Examples of prudential regulation as identified by Chavez and Gonzales-Vega (1994) are as follows:

- Capital adequacy requirements
- Liquidity requirements
- Limits on individual exposures and restrictions on loans made to insiders
- Guidelines on diversification of risk
- Guidelines on the make-up and governance of management and directors
- Reporting, supervision and intervention
- Regulation pertaining to ownership of the institution

A less prudentially regulated credit environment allows those consumers in lower income brackets to access overdraft and credit card facilities whereby they are able to obtain funds that could be applied towards academic studies, which would improve their employability levels, thus allowing them to break free from the poverty trap (Richards *et al*. 2007). It is also argued that the first principle of social policy should be to treat users of consumer credit as adults, who are entirely capable of managing their own financial affairs, and not to restrict their freedom of access to it in order to protect the relatively small minority who get into difficulties (Crowther Committee report, 1971),

By limiting a consumers' ability to access credit, their mobility within a society is also limited. The credit industry needs debt levels to increase if it is to meet its ongoing profit targets. Prudential regulations that are too rigid, for example, excessive reserve requirements and interest rate ceilings, may hinder the normal workings of the economy which could lead to a decline in the overall efficiency of financial markets. It is thus of paramount importance for a balance to be reached between protecting consumers against unscrupulous credit providers and stimulating the normal workings of the economy.

2.5.2 CONDUCT-OF-BUSINESS REGULATION

This type of regulation focuses on how financial institutions conduct business with their various stakeholders, and more specifically their customers/clients. Conduct-of-business regulations are much more focused than prudential regulations as it is more cantered around the dealings of the organisation and the consumer on an individual level. Falkena *et al.* (2001) identified the following focus areas covered by this type of regulation:

- Mandatory information disclosure
- The honesty and integrity of firms and their employees
- The competency of institutions supplying financial services and products
- Fair business practices
- The way in which financial products are marketed

From a South African perspective, the Usury Act of 1968 and the National Credit Act of 2005 are two examples of legislation that has been instituted in the past that has focused on conduct-of-business regulations.

2.6 INTERNATIONAL CREDIT REGULATION

The past five to six years has produced various pieces of credit regulatory legislation introduced across the globe. Some examples are The Consumer Credit Act of 2006 from the UK, the Credit Contracts and Consumer Finance Act of 2003 from New Zealand and the National Credit Act of 2005 from South Africa. Since the deregulation of the USA credit industry in the late 1980s, there has been no single regulatory body controlling the industry in that country. Instead, a series of acts covering various aspects of the industry is charged with regulating consumer credit in the USA (Card, 2005).

2.6.1 CREDIT REGULATION IN THE UNITED KINGDOM

The Consumer Credit Act 2006, which was fully implemented on 1 October 2008, has replaced the Consumer Credit Act 1974, and is the first act to cover all forms of instalment credit in the UK. Card (2005) explains that the new credit act strengthened the regulator's arm and addressed certain weaknesses of the previous act, like for instance the extortionate credit bargaining rules.

The 2006 act's major objectives are (Card, 2005):

- Establish an independent ombudsman service allowing consumers to challenge agreements without having the added burden of going through a lengthy and expensive court battle
- To make it easier to challenge unfair lending practices and loan agreements
- Require lenders to provide better information regarding their credit accounts
- Improve powers of the Office of Fair Trading (OFT) to take action against rogue companies and to institute financial penalties

- Introduce a more targeted licensing system, limiting the burden on reputable businesses and freeing the OFT for more investigations into unscrupulous organizations

A shortcoming of the 2006 act that has been identified is that it does not require of the lender to disclose certain information, like for instance the main contributing factors which lead to the decline of a credit application. By not divulging this information, consumers are unable to improve their credit standing by rectifying the problem. This leads to consumers being forced out of the credit market all together.

2.6.2 CREDIT REGULATION IN THE USA

The USA does not hold a piece of legislation similar to that of the UK. As previously stated, the deregulation of the USA credit industry in the late 1980s, has broad about a situation were there has been no single regulatory body controlling the sector. Instead, a series of acts covering various aspects of the industry is charged with regulating consumer credit in that country. This also does not apply equally to all the states in that country as some states has their own consumer credit legislation (Card, 2005).

Seeing that most of the regulatory acts applied in the USA are more focused on disclosure, privacy, anti-terrorism, anti-money laundering, fraud prevention, anti-usury lending, and promoting credit accessibility to lower income groups, consumers are not truly protected against the exploits of unscrupulous credit providers.

2.6.3 CREDIT REGULATION IN NEW ZEALAND

The Credit Contracts and Consumer Finance Act 2003, which came into full force in April 2005, covers student loans, mortgages, credit cards, personal loans, hire purchase agreements, long-term leases and electronic commerce.

One of the major objectives of the act is to provide consumers with information about the contract they are entering into, thus disclosure provisions are much stronger than before. Its aim is to conclude agreements that are clearer and to provide information that is more useful for consumers.

The key objectives of the act are to:

- Promote efficient credit markets that are conducive to voluntary transactions
- Require effective information disclosure so that consumers can distinguish between different credit products and, as far as possible, make rational choices between those products and cash purchases. This would also ensure that consumers are not deceived in any way
- Allow for innovation in the design of credit products
- Provide adequate incentives for compliance with the law by all parties to a credit transaction
- Discourage oppressive conduct by lenders

2.7 CHAPTER SUMMARY

This chapter highlighted the need for credit regulation. The information required in order to make a sound credit decision were addressed as well as the reasons for declining credit volumes. The principles of credit regulation and the main factors that motivate consumers to demand credit regulation were explored. The chapter then identified the major causes of financial crises and concluded with an examination of the different types of financial regulation and its application in various countries.

CHAPTER 3
THE NATIONAL CREDIT ACT OF SOUTH AFRICA

3.1 INTRODUCTION

This chapter will explore the theoretical aspects of the NCA and conduct regulation. The objectives of the NCA and the challenges which its introduction was to address, as well as general financial regulation objectives will also be discussed.

3.2 WEAKNESSES OF PAST REGULATION

The NCA was borne out of the need for a single system that could regulate the credit industry in South Africa. The act repealed and replaced the previous credit Agreements Act 74 of 1980 and the Usury Act 73 of 1968, in order to regulate the demands of a complex consumer market (Renke, Roestoff, Haupt, 2007).

Following the revision of the Usury Act by the South African Law Reform Commission in 1994, the need for a review of consumer legislation was recognized. The commission found that the South African credit market was dysfunctional and subsequently highlighted the following problem areas (Credit Law Review: Setting the Scene, 2004):

- Fragmented and outdated legislation
- Ineffective consumer protection, particularly in relation to consumers in low-income groups
- High cost of credit and, in some areas, access to credit
- Rising levels of over-indebtedness
- Reckless behaviour by credit providers and exploitation of consumers by micro-lenders, intermediaries, debt collectors and debt administrators

Michelle Kelly-Low (2007) listed the credit market weaknesses identified by the 2004 committee which included the following:

- Inadequate rules on the disclosure of the cost of credit which results in the cost of credit being inflated above the disclosed interest rate through the inclusion of a variety of fees and charges (including excessive credit life insurance). This weakness undermines the consumers' ability to make informed decisions, whether between cash and credit purchases or between different credit providers. It also results in reduced consumer pressure on credit providers to reduce interest rates
- An unrealistically low Usury Act cap caused low-income and high-risk clients to be marginalised
- Weak and incomplete credit bureaux information resulted in bad client selection, ineffectual credit risk management, high bad debts, and a massive increase in the cost of credit
- Inappropriate debt collection and personal insolvency legislation created an incentive for reckless credit provisions and prevents the effective rehabilitation of over-indebted consumers
- Excessive predatory behaviour lead to high levels of debt for certain consumers and unmanageable risk to all credit providers
- Inconsistencies in legislation related to mortgages and property transfers undermined consumers' ability to offer security and locked them into high-cost, unsecured credit
- Certain aspects of the Banks Act 94 of 1990 (the Banks Act) and the National Payment System Act 78 of 1998 (the National Payment System Act) rules undermined competition in the consumer credit markets whilst creating inequitable preferences for certain providers
- Regulatory uncertainty lead to credit behaviour oriented towards short-term profit taking and a resistance among credit providers to providing longer-term finance, including housing and Small to Medium Sized Enterprise (SME) finance

Subsequent to research conducted on consumer credit reforms and regulation in Europe and certain other countries, and upon consultations with various stakeholders, it was concluded that both the Usury Act and the Credit Agreements Act were to be replaced by a single statute overseen by a statutory regulator. A major shift in regulation would be a move from the traditional price control regulations to more detailed consumer protection regulations specifically focusing on the protection against over-indebtedness and undesirable lending practices.

3.3 PURPOSE OF THE ACT

The existing credit legislation review, initiated by the Department of Trade And Industry (DTI), and the shortcomings presented in section 3.2, resulted in the promulgation of the NCA in 2005. The main purpose of the NCA is (Kelly-Louw, 2007):

- The promotion of a fair and non-discriminatory marketplace for access to consumer credit and for that purpose to provide for the general regulation of consumer credit and improved standards of consumer information
- To promote black economic empowerment and ownership within the consumer credit industry
- To prohibit certain unfair credit and credit marketing practices
- To promote responsible credit granting and use, and for that purpose to prohibit reckless credit granting
- To provide for debt reorganisation in case of over-indebtedness
- To regulate credit information
- To provide for registration of credit bureaus, credit providers and debt-counselling services
- To establish national norms and standards relating to consumer credit
- To promote a consistent enforcement framework relating to consumer credit

- To establish the National Credit Regulator and the National Consumer Tribunal
- To repeal the Usury Act and the Credit Agreements Act
- To provide for related incidental matters

The NCA sets out all the specific objectives of the act as follows (National Credit Act, 2005):

‘The purpose of this Act are to promote and advance the social and economic welfare of South Africans, promote a fair, transparent, competitive, sustainable, responsible, efficient, effective and accessible credit market and industry, and to protect consumers, by –

(a) promoting the development of a credit market that is accessible to all South Africans, and in particular to those who have historically been unable to access credit under sustainable market conditions;

(b) ensuring consistent treatment of different credit products and different credit providers;

(c) promoting responsibility in the credit market by –

(i) encouraging responsible borrowing, avoidance of over-indebtedness, and fulfilment of financial obligations by consumers; and

(ii) discouraging reckless credit granting by credit providers, and contractual default by consumers;

(d) promoting equity in the credit market by balancing the respective rights and responsibilities of credit providers and consumers;

(e) addressing and correcting imbalances in negotiating power between consumers and credit providers by –

(i) providing consumers with education about credit and consumer rights;

(ii) providing consumers with adequate disclosure of standardised information in order to make informed choices; and

(iii) providing consumers with protection from deception, and from unfair or fraudulent conduct by credit providers and credit bureaus;

(f) improving consumer credit information and reporting and regulating credit bureaus;

(g) addressing and preventing over-indebtedness of consumers, and providing mechanisms for resolving over-indebtedness based on the principle of satisfaction by the consumer of all responsible financial obligations;

(h) providing for a consistent and harmonized system of debt restructuring, enforcement and judgment, which places priority on the eventual satisfaction of all responsible consumer obligations under credit agreements.'

By creating mechanisms for debt restructuring, the NCA provides consumers with some welcome protection measures that were not available under the Usury Act. The new act thus created an environment with a balance of power between credit lenders and consumers instead of one where the scales tipped heavily in favour of credit lenders.

The fundamental purpose of the NCA, according to Kelly-Louw (2007), is to achieve integrity in the credit market. It was therefore intended to remove unfair practices, inappropriate disclosures, and anti-competitive practices from the market. This should also result in creditworthy consumers from low-income households not being excluded from access to credit.

Goodwin-Groen (2006:32) stated 'on access to credit and the National Credit Act, the issue is foremost a possible policy trade-off between consumer protection (as reflected in usury rates and the provisions against reckless lending) and access to credit that may become limited if consumers reach (subjectively set) limits of creditworthiness. Crucial to the evaluation of alternatives is the use of credit, namely whether credit is used to finance investments (and ultimately economic growth and employment opportunities) or consumption (which reduces savings and thus investments)'.

An investment loan would typically be an equity capital loan for the start-up of a new business venture. The new venture would normally create employment opportunities thereby stimulating economic growth. The financing of a motor vehicle on the other hand would generally be seen as a consumption article due to the fact that the vehicle's value depreciates sharply after five years. Goodwin-Groen (2006) found that motor vehicles used primarily to travel to and from work, could be seen as an investment rather than a consumption article though, as it serves as an income generating enabler. By enabling the consumer to earn income of which a certain portion would generally be consumed through the purchase of various essential and non-essential goods, the purchase of a motor vehicle could be seen as a mode to stimulate economic growth. For purposes of economic growth, it is clear that there exist a definite incentive for regulators to improve access to motor vehicle finance.

3.4 TYPES OF CREDIT AGREEMENTS

For purposes of the Act, the National Credit Regulator (2007) (section 8), defines a credit agreement as: 'an agreement between a credit provider and a consumer in which:

- The credit provider supplies goods or services or lend money to the consumer and;
- the consumer pays for the goods or services or repays the money so borrowed in instalments over a period of time; or
- where the consumer is to make a single payment, this payment is made on a future date agreed upon by the consumer and the credit provider; and
- the consumer has to pay interest, fees or charges on the outstanding balance of the money borrowed or the amount owing on the goods and services supplied by the credit provider;

- The consumer and the credit provider enter into a pawn transaction, discount transaction, instalment sale agreement, mortgage agreement, or lease agreement;
- The credit provider enters into a credit guarantee agreement with one person where this person promises to pay a debt incurred by another consumer upon receiving a demand from the credit provider.'

Agreements which do not fall within the ambit of the NCA are: agreements between parties dealing closer than at arms length, for example, where the credit provider and the consumer are related, that is where a father lends money to his son; agreements where the credit provider is the Reserve Bank, for example, a transaction where a bank borrows funds from the Reserve Bank; agreements that are large agreements in terms of which the consumer is a juristic person with an asset value or a turnover below the threshold value of R1 million at the time of conclusion of the agreement; or, agreements in which the credit provider is situated outside the borders of South Africa (Kelly-Louw, 2007).

In addition to the above exclusions, the act also specifically excludes a policy of insurance, a lease of immovable property, and a transaction between a stokvel and a member of that stokvel, from the definition of a credit agreement. Thereby distinguishing between the following categories (Kelly-Louw, 2007):

- Credit facility, namely a credit card
- Credit transaction, namely an instalment agreement, or mortgage agreement
- Credit guarantee, namely a surety ship
- Any combination of the above three transactions

Otto (2006) describes the NCA's scope of application schematically as presented in Diagram 3.1.

Diagram 3.1: Types of Credit Agreements

CREDIT AGREEMENTS

CREDIT FACILITIES

- Supply of goods or services
- Payments to consumer
- Payment on behalf of or at direction of consumer, i.e. credit cards and overdrawn cheque account

CREDIT GUARANTEES

i.e. suretyships relating to other consumer's credit facility or credit transaction

CREDIT TRANSACTIONS

- Pawn transactions, i.e. goods serve as security for loan
- Discount transactions, i.e. goods or services provided to consumer over period and lower price applies if paid within certain period
- Incidental credit agreements, i.e. goods and services provided to consumer, account tendered, i.e. lower price if paid within certain period or fee, charge or interest payable if not paid before certain date
- Instalment agreements, i.e. sale of movables on instalments with reservation of ownership or right to repossession
- Mortgages, i.e. money loan secured by mortgage over immovable property
- Secured loans, i.e. money loan secured by pledge of movable asset
- Leases, i.e. of movables where ownership passes at the end of the agreement
- Any other credit agreements where payment is deferred, i.e. direct loan

ANY COMBINATION OF A CREDIT FACILITY, CREDIT GUARANTEE, OR CREDIT TRANSACTION

i.e. instalment sale of goods where payments occur by credit card over period of time "on budget"

Adapted from: Otto, J.M. (2006) "The National Credit Act Explained"

The NCA mainly applies where the consumer is a natural person. In addition to this, (Kelly-Louw, 2007), 'it does also apply to a credit agreement where the consumer is a company, close corporation, partnership, or a trust where there are three or more individual trustees or the trustee is itself a juristic person, or any other association or body of persons irrespective of whether or not it is registered in terms of any act, provided its asset value or annual turnover, at the time when the agreement is made, does not equal or exceed R1 million. However where the consumer is one of these businesses, the application of the act will be limited.'

3.5 THE NATIONAL CREDIT REGULATOR

The National Credit Regulator (NCR) was brought into life by section 12 of the NCA, and according to (Vesio, 2008) it was established to act as a supervisory watchdog, administrator, regulator, and finder and keeper of information. As an independent juristic body, and governed by the constitution of South Africa, its basic purpose is to regulate the South African credit industry as a whole.

According to the NCA, the core functions of the NCR are to:

(a) *promote and support the development, where the need exists, of a fair, transparent, competitive, sustainable, responsible, efficient, effective and accessible credit market and industry to serve the needs of –*

(i) *historically disadvantaged persons;*

(ii) *low income persons and communities; and*

(iii) *remote, isolated or low density populations and communities, in a manner consistent with the purpose of this Act;*

(b) *set appropriate conditions for the supplementary registration of credit providers wishing to enter into developmental credit agreements, in order to promote access to credit in the manner, and for the persons, contemplated in paragraph (a);*

(c) *monitor the following matters and report to the Minister annually in respect of :*

- *(i)* *credit availability, price and market conditions, conduct and trends;*
- *(ii)* *market share, market conduct and competition within the consumer credit industry, the credit industry structure, including the extend of ownership, control and participation, within the industry by historically disadvantaged persons;*
- *(iii)* *access to consumer credit by small businesses of persons contemplated in paragraph (a)(i) to (iii);*
- *(iv)* *levels of consumer indebtedness and the incidence and social effects of over-indebtedness; and*
- *(v)* *any other matter relating to the credit industry; and*

(d) *conduct research and propose policies to the Minister in relation to any matter affecting the consumer credit industry, including but not limited to proposals for legislative, regulatory or policy initiatives that would improve access to credit for persons contemplated in paragraph (a)(i) to (iii).*

All credit providers, credit bureaus and debt counsellors are required to register with the NCR, which is tasked to promote the informal resolution of disputes arising between any of the above mentioned parties, without intervening or adjudicating such disputes. The NCR must, in addition to the core functions set out in the NCA, receive, investigate and evaluate complaints with regards to alleged contraventions of the Act; monitor the market and industry to ensure that any conduct that is prohibited is prosecuted, and that national and provincial registrants comply with the Act; issue and enforce compliance notices; refer concerns regarding market share, anti-competitive behaviour or conduct which may be prohibited by the Competition Act. 89 of 1998, to the Competition Commission; and refer relevant matters to the National Consumer Tribunal, which is also an independent body, tasked with the adjudication of matters concerning allegations of prohibited conduct against credit providers, debt counsellors and other persons registered with the NCR (Vessio, 2008).

3.6 OVER-INDEBTEDNESS AND RECKLESS LENDING

The terms over-indebtedness and reckless lending are the key concepts which ultimately determine whether a consumer is creditworthy or not (Goodwin-Groen, 2006).

3.6.1 OVER-INDEBTEDNESS

Highlighted as a major reason for the need to reform existing consumer credit legislation, consumer over-indebtedness arose due to an over-supply of credit to those considered credit worthy, resulting in heavy debt burdens for a large portion of South African consumers. In this regard, the NCA is a groundbreaking piece of consumer legislation as for the first time in the history of South African consumer legislation, specific provisions is made for measures to prevent reckless lending and over-indebtedness (Renke *et al*. 2007). Goodwin-Groen (2006) stated that: 'Ideally, no additional credit should be granted to a person who is already over-indebted.'

Problems brought on by over-indebtedness can be summarized as follows (Goodwin-Groen, 2006:51):

- Over-indebtedness and the debt-servicing burden reduce household disposable income, reduce household consumption, and household welfare
- Over-indebted consumers are less likely to meet municipal service payments, which in turn undermines local authority income and capacity
- Over-indebted borrowers cannot make maintenance payments or meet any other personal social commitments
- Defaulting borrowers get summonsed and receive default judgment. This impairs their credit records and in most cases would mean that they are denied access to conventional finance for many years
- Consumers that have defaulted may not qualify for housing loans or other forms of conventional credit. They may be locked into high

risk/high cost forms of finance, with the high cost of finance further undermining household welfare in the future

- Social welfare payments received by households may well be diverted to serving high-interest loans; to meeting legal expenses related to opposing judgments; or to meeting payments that result from judgments having been granted. In each instance, the social grant had been diverted away from the intended purpose of increasing the income and welfare of the beneficiaries. Rather than the targeted beneficiaries benefiting from such payments, financial institutions increase interest income, lawyers increase fees and debt collectors and debt administrators increase income
- To recover the losses from loans to defaulting borrowers, lenders have to increase interest rates on loans to the client base that do meet their commitments

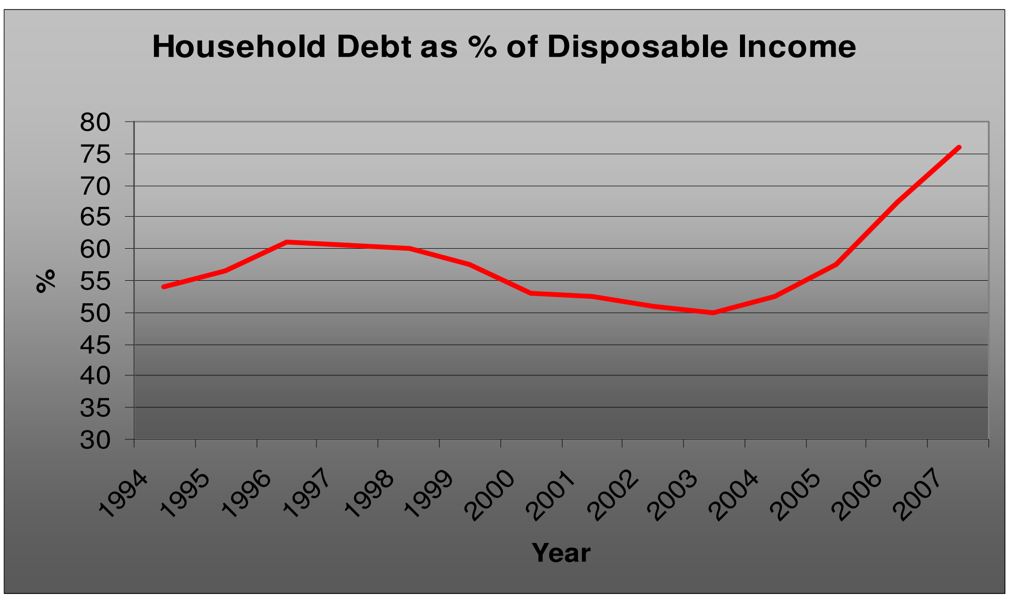


Figure 3.1: Household debt as % of disposable income

Adapted from: Dr. Azar Jamine (2007) "Outlook for the South African & International Economies"

Figure 3.1 clearly indicates the ever increasing debt burden that South African consumers have had to contend with over the past decade. Consumer savings are at a record low. For the third quarter of 2007 a figure of 77.4% was recorded as disposable income consisting of household debt (South African Reserve Bank, 2007).

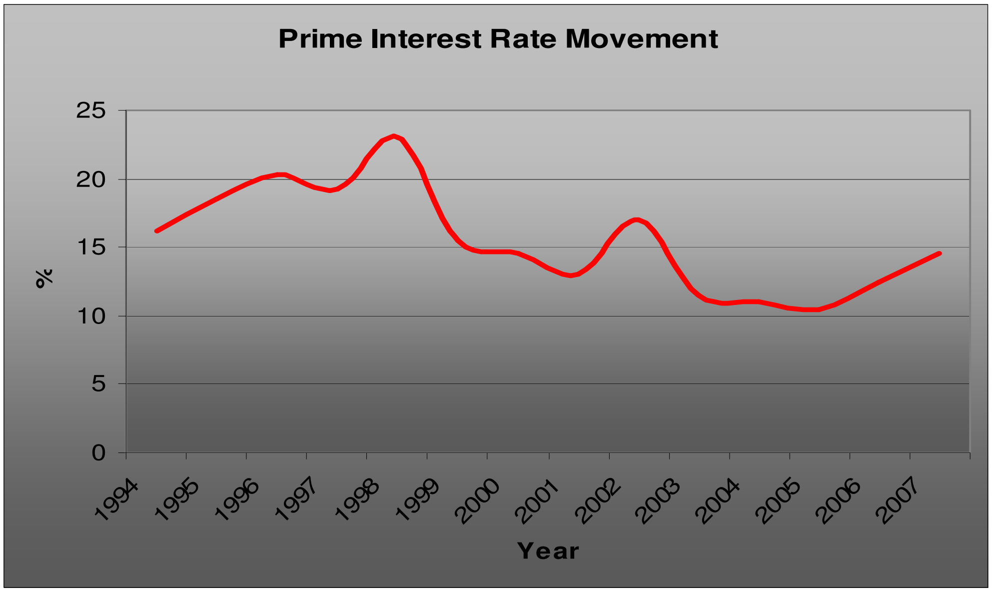


Figure 3.2: Prime interest rate movement

Data Source: South African Reserve Bank

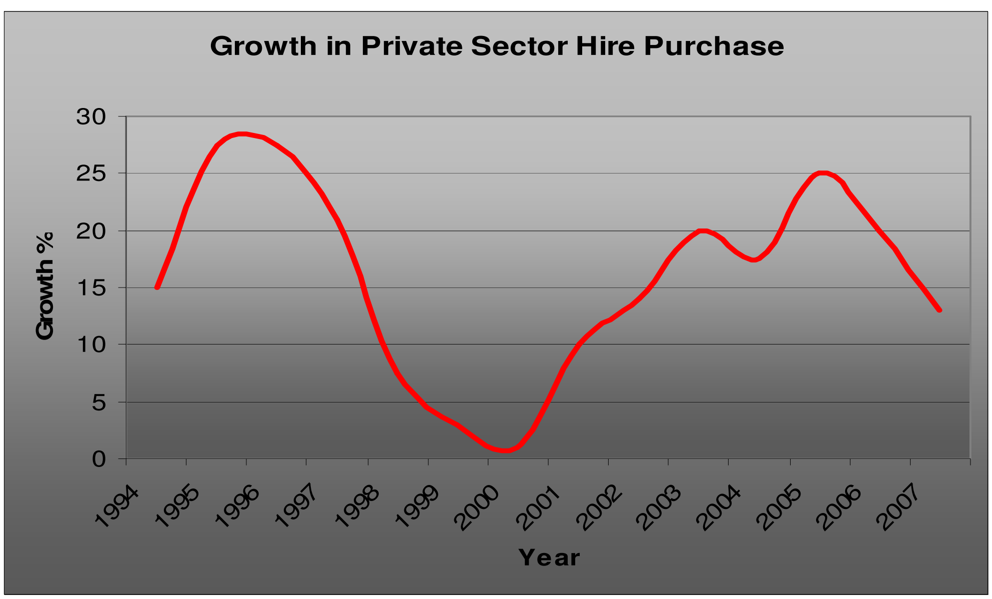


Figure 3.3: Growth in private sector hire purchase

Adapted from: Dr. Azar Jamine (2007) "Outlook for the South African & International Economies"

By examining and comparing Figure 3.2 and 3.3, it appears as if there exist a negative correlation between prime interest rate movements and the growth in private sector hire purchases. The period 1996 to 2000, which were marked by very steep rate hikes, reflected a decrease in the amount of private sector hire purchases. The period between 2000 and 2005 on the other hand reflect just the opposite. Sharp decreases in the prime interest rate were accompanied by a hefty increase in the amount of private sector hire purchases.

A consumer is said to be over-indebted in terms of the NCA if he or she does not have the means to meet all his or her debt obligations, under all the credit agreements to which he or she is a party to, in a timely manner. Over-indebtedness is determined by way of evaluating a consumer’s financial means, future prospects, obligations and debt repayment history. The NCA was therefore instituted to limit the phenomenon of over-indebtedness.

3.6.2 RECKLESS LENDING

The NCA requires a credit provider to ensure that a consumer can afford the credit that is applied for before actually approving the credit application. Section 80 of the NCA determines that an agreement is concluded recklessly if the credit provider does not carry out a proper credit risk assessment in order to establish affordability on the part of the consumer; the credit provider proceeds to grant the loan despite the consumer not being able to afford the loan based on the assessment conducted; and, the consumer does not understand his or her rights and obligations in terms of the agreement or the costs involved (NCR, 2007).

The Credit Agreements Act made provisions for compulsory payment of prescribed deposits and prescribed maximum periods when it came to instalment sale agreements and lease agreements. Some argue that these provisions were aimed at the prevention of over-indebtedness as it prevented consumers from binding themselves to an extended period and the compulsory deposit requirement meant that only those consumers, who could actually afford the credit, received it.

The NCA abolished these provisions by removing the compulsory deposit requirement including the prescribed maximum period provision and instead requires the credit provider to take reasonable steps to assess a proposed consumer's (Renke *et al*. 2007):

- Understanding and appreciation of the risk and costs of the proposed credit, and of the consumer's rights and obligations in terms of the agreement
- The consumer's debt re-payment history under previous and current credit agreements
- Existing financial means, prospects and obligations
- Commercial purpose for applying for credit, and whether there is a reasonable basis to conclude that such purpose may prove to be successful in the future

If a credit provider were to fail to conduct the required affordability and understanding assessments in terms of the act, the credit agreement is reckless and the credit provider is explicitly prohibited from entering into such an agreement. To prevent consumers from abusing the reckless lending provisions in the Act, the following sections were added (Goodwin-Groen, 2006):

- Section 81(1) stipulates that when a consumer applies for a credit agreement, and while that application is being considered for approval by the credit provider, the consumer is obliged to truthfully answer any requests for information made by the credit provider
- Section 81(4) reads that 'For all purposes of this Act, it is a complete defence to an allegation that a credit agreement is reckless if:
    - The credit provider establishes that the consumer failed to fully and truthfully answer any requests for information made by the credit provider as part of the assessment required by this section

- A court or Tribunal determines that the consumer's failure to do so materially affected the ability of the credit provider to make a proper assessment.'

In the instance where a credit provider had done a proper affordability assessment relating to the provided information, the consumer will not be able to benefit from the reckless lending provisions if the provided information was not provided fully and truthfully. That credit agreement would thus not be considered to have been granted recklessly (Goodwin-Groen, 2006).

3.6.3 SUSPENSION OF RECKLESS CREDIT

A court may declare a credit agreement reckless in any court proceedings where the validity of a credit agreement is being assessed. If the credit agreement is indeed found to have been conducted recklessly, the court could make a ruling by:

- Setting aside all or part of the consumer's rights and obligations in terms of the agreement as the court may find to be a reasonable measure in the circumstances
- Suspending the force and effect of the credit agreement in its entirety. Although, as per the South African Consumer Tribunal, no such ruling has as yet been made by the courts as far as motor finance is concerned.

If a court were to find that an agreement is reckless because there were sufficient indications that the conclusion thereof would result in the consumer becoming over-indebted, the court must further consider whether the consumer was over-indebted at the time of the court proceedings. Should the court find that the consumer was over-indebted at the time of the court proceedings, it may make an order suspending the force and effect of that agreement and restructure the consumers' obligations on other credit agreements.

Was a credit agreement to be suspended: the consumer is not required to make any payments in terms of the agreement, nor is any interest, fee or other charge allowed to be charged under the agreement. The credit provider may also not enforce any of his rights in terms of the agreement or under any law. Once the suspension of the credit agreement has been lifted, all rights and obligations of the credit provider and the consumer in terms of the agreement are revived and are completely enforceable (NCA, 2005).

The possibility of a credit agreement being suspended, as explained above, requires lenders to be far more discriminating under the NCA than what they were under the Credit Agreements Act or the Usury Act. Making hidden charges transparent, applying stricter affordability criteria and giving borrowers a five day cooling off period, after the offer of a loan has been made, has stemmed growth in private-sector credit extension, especially to households.

The EIU (2008) found that the above mentioned requirements has made it far more difficult to obtain mortgages and vehicle financing, as credit applicants have to prove that they earn sufficient income to cover the new instalment in addition to all their existing monthly expenses. In the past, too much credit was granted to those who could not actually afford it (Temkin 2006:1). The rate of approvals for such loans is reported to have fallen considerably as a result (EIU, 2008).

This development seems to be contradictory to one of the major aims of the NCA, which is to make credit more accessible to the lower-income groups, as they are the affected parties currently being driven out of the credit market all together. Megan Whittaker, (2008) found that banks and finance institutions that reacted early to the new regulatory requirements of the NCA have created an advantage over competitors who were not as quick to implement the appropriate changes though.

3.7 CHAPTER SUMMARY

This chapter explored the weaknesses of past regulation, including weaknesses in the South African credit market. The purpose of the NCA and the different types of credit agreements were discussed. The NCR, its functions, and its purpose were addressed. The terminology, over-indebtedness and reckless lending were explored whereby the problems brought on by over-indebtedness were articulated. The chapter concluded with a discussion on the possible suspension of reckless credit agreements and other implications of reckless credit granting.

CHAPTER 4
MOTOR VEHICLE FINANCE IN SOUTH AFRICA

4.1 INTRODUCTION

This chapter will explore the motor finance sector in South Africa as it currently stands post NCA application. Various finance options as well as the various motor finance products available to the South African consumer will be discussed.

Motor finance in South Africa is a very competitive industry and is dominated by four leading finance houses, namely:

- Wesbank, a division of First Rand Bank
- Absa Vehicle and Asset Finance Division, a division of Absa Bank
- Stannic, a division of Standard Bank
- NedCredit, a division of Nedbank

Apart from the four finance houses mentioned above, another market player that has shown to be very competitive in current market conditions is the Motor Finance Corporation (MFC), a subsidiary of Nedbank.

According to Econometrix (2008), South Africa's automotive industry contributed around 7.5% to the countries Gross Domestic Product (GDP) in 2006, and 6.9% for 2007. With roughly fifty percent of all vehicles bought in South Africa being financed, it is clear to see why the financial services industry is such a pivotal spoke in the countries economy. If it was not for the corporate sector being responsible for nearly eighty five percent of vehicles bought, this percentage would be much higher, as many large companies prefer to make cash purchases rather than to conclude motor finance transactions.

4.2 FINANCE OPTIONS

Under the NCA, consumers can choose between several finance options when purchasing a motor vehicle, namely, instalment sale agreements, lease agreements, and rental agreements (Campbell & Logan, 2008).

4.2.1 INSTALMENT SALE AGREEMENTS

The most frequently used motor finance option is the instalment sale agreement. This type of credit agreement allows consumers to spread the capital amount plus interest over a set period. The NCA has made it possible for an instalment sale agreement to be concluded over a period of 72 months, or longer, instead of 54 months as prescribed by the Credit Agreements Act.

Ownership of the vehicle will pass to the consumer once the final instalment has been paid, thus if ownership of the vehicle at the end of the agreement is required by the consumer, this type of agreement will be the preferred choice (Campbell and Logan, 2008). This type of agreement could also include a balloon payment which means that the final instalment is much larger than the preceding instalments. Ownership of the vehicle will pass to the consumer once the balloon payment and all preceding instalments have been paid in terms of the agreement.

4.2.2 LEASE AGREEMENTS

Consumers that favour a hire arrangement over an ownership arrangement would most likely lean towards the conclusion of a lease agreement. In terms of the lease agreement, the consumer (lessee) would pay monthly instalments to the finance house or bank (lessor) of a motor vehicle for a period of time as agreed upon by the parties involved. Payment of the lease instalments gives the lessee full and exclusive use of the motor vehicle for the lease period, subject to an upper limit regarding mileage travelled and the return of the vehicle in a good state, reasonable wear and tear excluded.

Campbell and Logan (2008) listed the lessee's options at the expiry date of the lease agreement as being:

- To return the motor vehicle to the lessor
- To purchase the motor vehicle from the lessor, perhaps at a reduced price, considering the monthly instalments paid by the lessee and the terms of the lease agreement
- To renew the lease by concluding a new lease agreement

An advantage of a lease agreement for the lessee might be that the lease instalments may be tax deductible, depending on how the agreement is structured. Large segments of the public are altering their basic views of what having a motor vehicle represents. ABA, (1997) found that rather than having the view of a personal vehicle as an asset to be financed and then owned, the outlook is gaining that a vehicle is a transportation service. In other words, it is an asset to be held for a period of time, and then to be released. 'The leasing of cars has advanced rapidly from a very small sideline to a solid position near centre stage in the world of automotive finance' (ABA, 1997).

4.2.3 RENTAL AGREEMENTS

The main issue with a rental agreement is that ownership of the motor vehicle never passes to the consumer. The consumer in essence pays for the use of the motor vehicle for the term as agreed upon in the rental agreement and must return it to the owner on the expiry date.

The amount of mileage travelled would normally be limited and any mileage over and above the set limit would be subject to an excess mileage cost or penalty at the end of the rental agreement. The benefits of this sort of agreement for a consumer are that the monthly rental payable could be structured to suit the consumer's needs and the monthly rental instalments are tax-deductible.

Rental agreements are excluded from the ambit of the NCA, and for purposes of this research project does not require any further elaboration.

4.3 MOTOR FINANCE PRODUCTS

In addition to the different motor finance options discussed in the previous section, various finance products exist that a consumer may encounter when applying for the finance of a motor vehicle. The aim of these products is mainly to protect the consumer against possible negative effects of changes in their personal circumstances as well as unforeseen changes in economic factors, namely, prime interest rate changes, which may result in them being unable to service their obligations towards a bank or financial institution.

4.3.1 FINANCIAL SHOCK ABSORBER

A financial shock absorber option basically means that an interest rate linked to the prime rate (the variable interest rate at which a bank borrows from another bank) is combined with a fixed or capped monthly instalment. The impact of any prime rate variation is postponed until the very last instalment that becomes due at the end of the agreement.

Were the prime rate to be increased, the consumers' monthly instalments will remain unchanged but the final instalment will be inflated in order to compensate for the rate change. Conversely, were the prime rate to be decreased, the final instalment will be decreased by the appropriate amount, which could result in a very minor or even a zero final instalment becoming due at the end of the finance agreement (Campbell and Logan, 2008).

The financial shock absorber option results in the following two benefits for the consumer:

- The consumer benefits from decreasing interest rates as the interest rate applicable to the credit agreement is adjusted accordingly
- Unexpected prime rate increases can be budgeted for, thus resulting in an improved cash flow position for the consumer

4.3.2 PAYMENT HOLIDAY OPTION

The payment holiday option allows a consumer to specify a month in the year where no instalment would become due. The instalment that would normally have been due in that specific month is spread evenly over the remaining period left on the credit agreement (Campbell and Logan, 2008).

This allows the consumer to take a breather in cash strapped periods or to apply the funds that would normally have been used for the instalment towards any other obligation the consumer may see fit. Whether it is applied towards the maintenance of the financed motor vehicle or just to fund a holiday is immaterial.

4.3.3 BALLOON PAYMENT

The balloon payment option allows for reduced monthly instalments for the duration of the credit agreement with the final instalment inflated in order to compensate for the capital amounts not settled. This option gives the consumer a certain amount of breathing space with regards to the monthly cash flow required to service the instalment.

The balloon payment is calculated by taking the following into consideration (Campbell and Logan, 2008):

- The estimated future value of the motor vehicle as at the expiry date of the credit agreement. The most important consideration here is to establish whether the vehicle will be worth more than the amount of the balloon payment were the consumer to default on the balloon payment and the vehicle had to be repossessed or sold as a result
- The market sentiment towards the vehicle that is financed in terms of the credit agreement. The amount of effort it would take to sell the motor vehicle in order to recover the outstanding balloon payment is an important consideration when the balloon payment is calculated. Some vehicles are less popular than others and would consequently require a more involved resale procedure which means more man hours and costs

As per Campbell and Logan (2008), the following options are open to a consumer once a credit agreement reaches the balloon payment stage:

- The consumer may apply to have the balloon payment refinanced for an additional period
- The motor vehicle can be traded in or sold, which means that a third party will settle the balloon payment
- The consumer may settle the balloon payment that is due, thereby obtaining ownership of the motor vehicle

Were the consumer not to budget properly for the balloon payment that is due at the end of the term, this option may come back to haunt him/her as paying the balloon payment may necessitate the sale of the motor vehicle in order to raise the needed funds. This could result in the consumer never obtaining ownership of the said vehicle. The consumer would be forced to enter into another credit agreement which means that he/she will almost never be released from the debt trap.

4.3.4 RESIDUAL PACKAGES

Residual values are very commonly included in lease agreements and are often confused with balloon payments. Where a balloon payment places the risk of paying the final balloon payment on the consumer, a residual value on a lease agreement places the responsibility for the residual value on the bank or finance house. At the end of the lease agreement term the consumer has the option to either return the vehicle to the finance house or tender payment of the residual amount whereby ownership could be obtained. Campbell and Logan (2008:167) found that: 'In practice, consumers tend to refinance the residual value at the end of the lease term.'

4.3.5 LINKED RATE/FIXED RATE OPTION

A linked rate credit agreement is linked to the prime interest rate. Any movements in the prime interest rate whether up or down, will similarly affect a consumers' monthly repayments. In order to protect the consumer from increases in the prime interest rate, the option is available to fix the credit agreement at a set interest rate. This rate would normally be higher than that of a linked rate agreement but would shield the consumer from instalment increases as a result of rate changes.

4.4 CHAPTER SUMMARY

This chapter explored the motor finance sector in South Africa as it currently stands post NCA application. Various finance options were discussed and it concluded with a discussion on the range of motor finance products available to the South African consumer which were engineered to offer protection against unforeseen circumstances.

CHAPTER 5
IMPACT OF THE NCA, INTEREST RATES AND NEW CAR PRICES ON MOTOR VEHICLE FINANCE

5.1 INTRODUCTION

This chapter includes a discussion on the 2009 consumer credit report published by the NCR. It furthermore explores the views of various experts regarding the individual impact of the NCA, prime interest rates and motor vehicle retail prices on the amount of motor finance granted in the South African market.

5.2 THE CONSUMER CREDIT REPORT

Global economic volatility, high levels of indebtedness, restrictive regulatory interventions, high interest rates, and excessive motor vehicle retail prices has subdued the consumers' appetite for spending, especially expenditure on big ticket items such as motor vehicles. In March 2009, the NCR released certain statistics received from the largest amongst the reporting credit providers in South Africa. This Consumer Credit Report is the first report by the NCR and is based upon returns that credit providers are required to submit in terms of the NCA.

For purposes of this dissertation, emphasis will be placed on the agreement type Other Credit Agreements (Table 5.1), as more than 80% of this segment consists of motor vehicle finance. The balance of the Other Credit Agreements section is made up of items such as furniture finance and loans secured against a pension fund, provident fund or insurance policy (NCR, 2009). The agreement type Other Credit Transactions will therefore be referred to as motor finance.

A steady decline in the amount of motor finance granted is noticeable from Table 5.1, with a 12.09% drop from the fourth quarter of 2007 to the first quarter of 2008. A further 8.38% decline was recorded for the period between quarter one and two of 2008.

Table 5.1: Credit granted per Agreement type

Agreement	2007- Q4 R'000	2008-Q1 R'000	2008-Q2 R'000	2008-Q2 Distribution	% Change Q4/Q1	%Change Q1-Q2
Mortgages	53,139,517	44,618,899	42,692,789	55.46%	-16.03%	-4.32%
Other Credit Agreements (Motor Finance)	***32,013,865***	***28,142,296***	***25,783,112***	***33.49%***	***-12.09%***	***-8.38%***
Unsecured Credit	7,938,239	7,158,456	7,595,574	9.87%	-9.82%	6.11%
Short-term	883,197	792,363	912,558	1.19%	-10.28%	15.17%
Total	**93,974,818**	**80,712,015**	**76,984,032**	**100%**	**-14.11%**	**-4.62%**

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

In terms of the total amount of credit granted for the three quarters under review, motor finance has remained relatively steady with a minor decline in its total contribution towards the total portfolio. In quarter four of 2007, motor finance's contribution was 34.1% of the total amount of credit granted, in quarter one of 2008 it was 34.9%, and in quarter two of 2008, this figure decreased to 33.49%.

The amount of motor finance granted, in Rand value, has shown a significant decrease from quarter to quarter, as indicated by Figure 5.1, with the percentage change from quarter four of 2007 to quarter one of 2008 being recorded at -12.09%. Quarter one to quarter two of 2008 has shown a slightly smaller deviance with a figure of -8.38%. The significance of this data is that a clear trend is visible, showing a definite slowdown in the amount of motor finance extended to consumers.

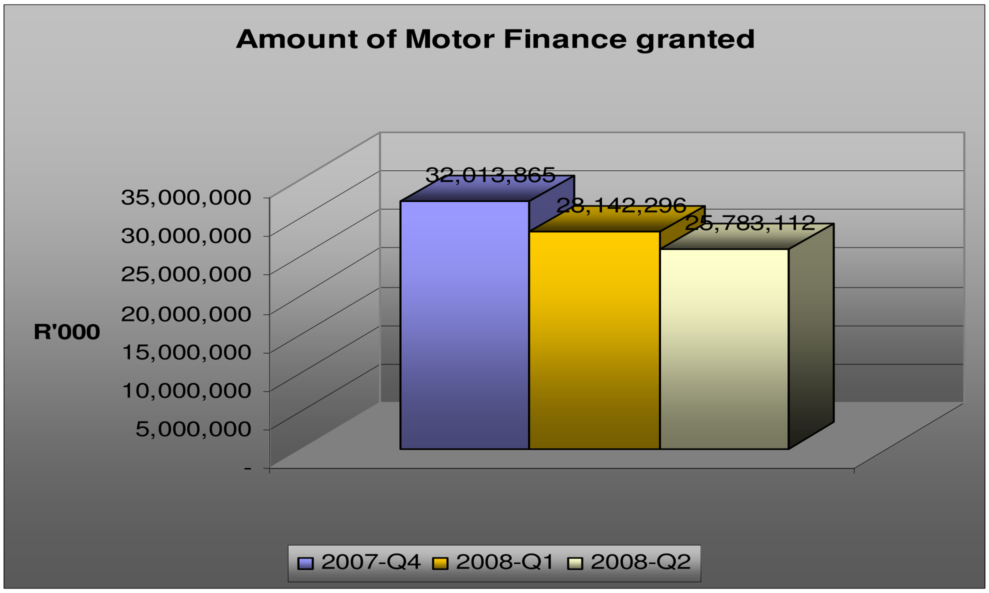


Figure 5.1: Amount of motor finance granted

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

Table 5.2 shows that as far as the gross value of the debtors book per agreement type is concerned, motor finance has shown a steady decrease per quarter with quarter four of 2007 recording a 21.36% contribution to the total credit portfolio, quarter one of 2008 a 21.17% contribution and quarter two of 2008 a 20.70% contribution.

Table 5.2: Gross value of debtors book per Agreement type

Agreement	2007- Q4 R'000	2008-Q1 R'000	2008-Q2 R'000	2008-Q2 Distribution	% Change Q4/Q1	%Change Q1-Q2
Mortgages	657,592,025	682,132,192	706,464,782	63.26%	3.73%	3.57%
Motor Finance	***224,167,486***	***229,565,078***	***231,152,871***	***20.70%***	***2.41%***	***0.69%***
Credit Facilities	125,958,625	130,044,672	133,196,005	11.93%	3.24%	2.42%
Unsecured Credit	40,947,493	41,928,813	45,232,372	4.05%	2.40%	7.88%
Short-term	682,144	667,055	660,539	0.06%	-2.21%	-0.98%
Total	**93,974,818**	**1,084,337,810**	**1,116,706,569**	**100%**	**3.33%**	**2.99%**

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

The 0.69% increase in the total motor finance debtor's book for the period between quarter one and two of 2008 indicates that the book is hardly growing. The amount of new motor finance agreements concluded, were almost totally offset by the amount of agreements reaching maturity or being settled earlier than the agreed contract term.

Table 5.3 supports the notion that the total motor finance book is contracting. The number of accounts on the book has shown a marginal decrease from quarter to quarter which indicates that those consumers who's motor finance agreements are reaching maturity, are not replacing their vehicles by way of concluding new motor finance agreements.

Table 5.3: Gross value of debtors book – Number of accounts

Agreement	2007- Q4 '000	2008-Q1 '000	2008-Q2 '000	2008-Q2 Distribution	% Change Q4/Q1	%Change Q1-Q2
Mortgages	1,814	1,824	1,837	5.12%	0.56%	0.66%
Motor Finance	***5,917***	***5,894***	***5,845***	***16.30%***	***-0.40%***	***-0.82%***
Credit Facilities	22,137	22,029	22,853	63.74%	-0.49%	3.74%
Unsecured Credit	4,907	4,839	4,896	13.66%	-1.40%	1.19%
Short-term	444	428	421	1.17%	-3.51%	-1.65%
Total	**35,220**	**35,014**	**35,852**	**100%**	**-0.58%**	**2.39%**

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

It appears as though consumers are more content with driving their vehicles for more extended periods than what might have been the case in the past. Whether this phenomenon is a result of the application of the NCA or other more subtle economic or social factors has not been established as yet. Figure 5.2 is a graphical presentation of the trend line created by the decreasing number of motor finance accounts on the total book.

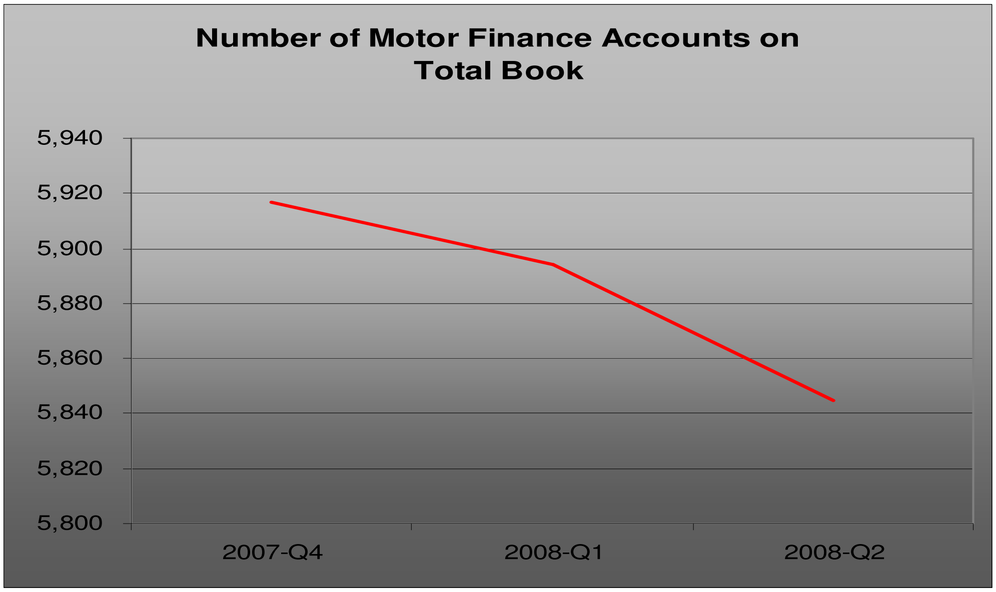


Figure 5.2: Number of motor finance accounts on total book

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

Table 5.4 together with Figure 5.3 indicates the Rand value disbursement of motor finance granted according to deal size, with the largest proportion residing within the R101K–R150K and R201K–R400K categories. With the exception of the >R400K category, all categories are showing a steady decline in the Rand value of motor finance been taken up by the consumer. The R101K–R150K and R201K–R400K categories are the ones that recorded the highest proportion of the total motor finance taken up, and are incidentally also the categories that recorded the largest quarter to quarter variance.

Table 5.4: Motor Finance – Disbursements by size

Agreement	2007- Q4 R'000	2008-Q1 R'000	2008-Q2 R'000	2008-Q2 Distribution
R40.1K-R6OK	1,093,226	950,907	866,219	3.62%
R60.1K-R100K	4,508,486	4,012,209	3,656,206	15.28%
R101K-R150K	6,846,000	6,080,030	5,327,329	22.27%
R151K-R200K	4,173,971	4,036,077	3,765,828	15.74%
R201K-R400K	7,884,398	7,171,013	6,376,659	26.65%
>R400K	4,033,967	3,792,020	3,932,923	16.44%
Total	**28,540,048**	**26,042,256**	**23,925,164**	**100%**

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

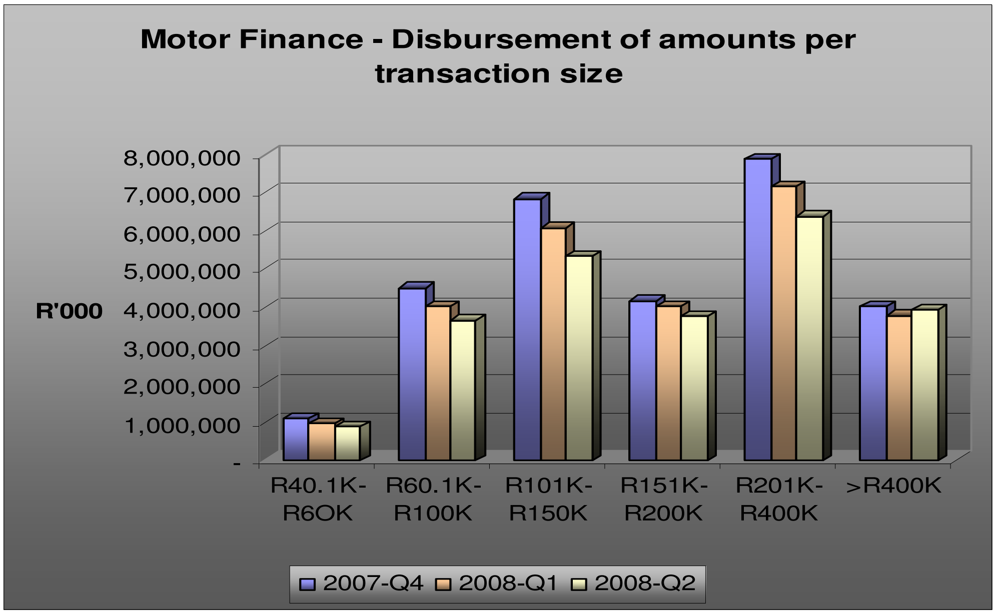


Figure 5.3: Motor finance – Disbursement of amounts per transaction size

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

The number of transactions concluded per transaction size sketches a slightly different picture. Table 5.5 and Figure 5.4 indicate that the largest number of motor finance transactions is being concluded in the R60.1K-R100K and the R101K-R150K ranges.

Table 5.5: Motor Finance – Number of agreements by size

Agreement	2007- Q4	2008-Q1	2008-Q2	2008-Q2 Distribution
R40.1K-R6OK	21,588	18,788	17,043	10.86%
R60.1K-R100K	56,283	50,109	45,603	29.06%
R101K-R150K	55,658	49,558	43,443	27.69%
R151K-R200K	24,469	23,592	22,009	14.03%
R201K-R400K	29,700	27,174	24,051	15.33%
>R400K	5,122	4,656	4,757	3.03%
Total	**192,820**	**173,877**	**156,906**	**100%**

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

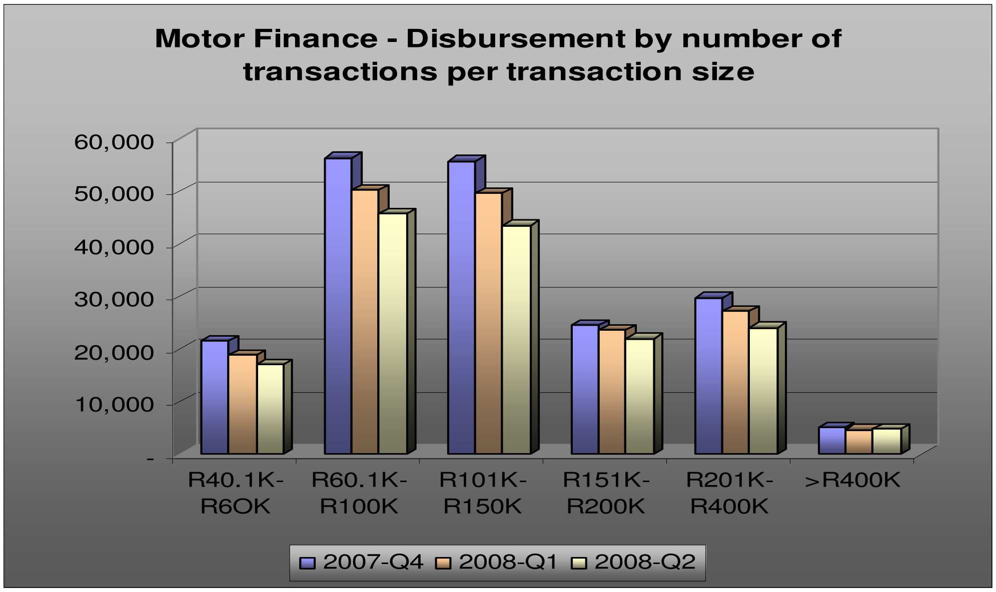


Figure 5.4: Motor Finance – Disbursement by number of transactions per transaction size

Adapted from: National Credit Regulator: "Consumer Credit Report: Second Quarter, June 2008"

Comparable though is the negative trend within all categories, recording quarter to quarter decreases in the amount of motor finance transactions being concluded, except for the >R400K range. Once again the largest quarter to quarter variances were recorded in the two quarters with the largest number of transactions.

Figure 5.5, 5.6, 5.7 and 5.8 reflects a sharp decrease in new vehicle sales in the South African market, and according to KPMG's Global Automotive Executive Survey (2008) this trend is expected to continue right through 2009.

Table 5.6: New vehicle sales figures 2005-2008

Sector	2005	2006	2007	2008	2008/2007 Change
New Passenger Vehicles	376,845	426,822	384,431	294,985	-23.30%
Light Commercials	160,723	186,664	191,218	159,302	-16.70%
Medium Commercials	12,243	14,246	15,164	12,143	-19.90%
Heavy Commercials/Busses	15,163	18,834	21,895	22,521	2.90%
Total Vehicles	**564,974**	**646,566**	**612,708**	**533,327**	**-20.30%**

Adapted from: NAAMSA media release: "Comment on the December 2008 new vehicle sales statistics"

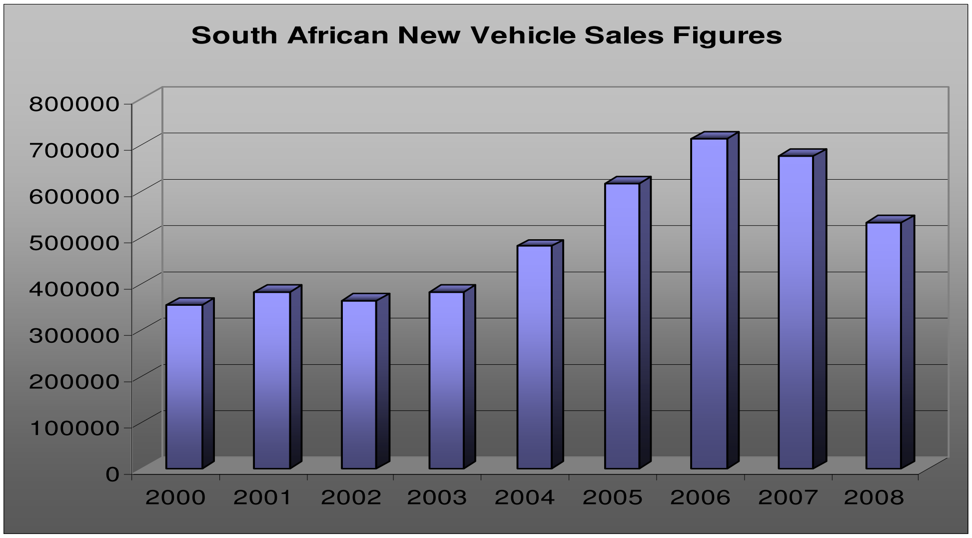


Figure 5.5: South African new vehicle sales figures

Adapted from: KPMG (2008) "Global Automotive Executive Survey South Africa"

Table 5.6 is a summary of new vehicle sales figures for the periods 2005 up to the end of 2008, and Figure 5.5 and 5.6 are graphical presentations of the trend in new vehicle sales from the year 2000 to the present.

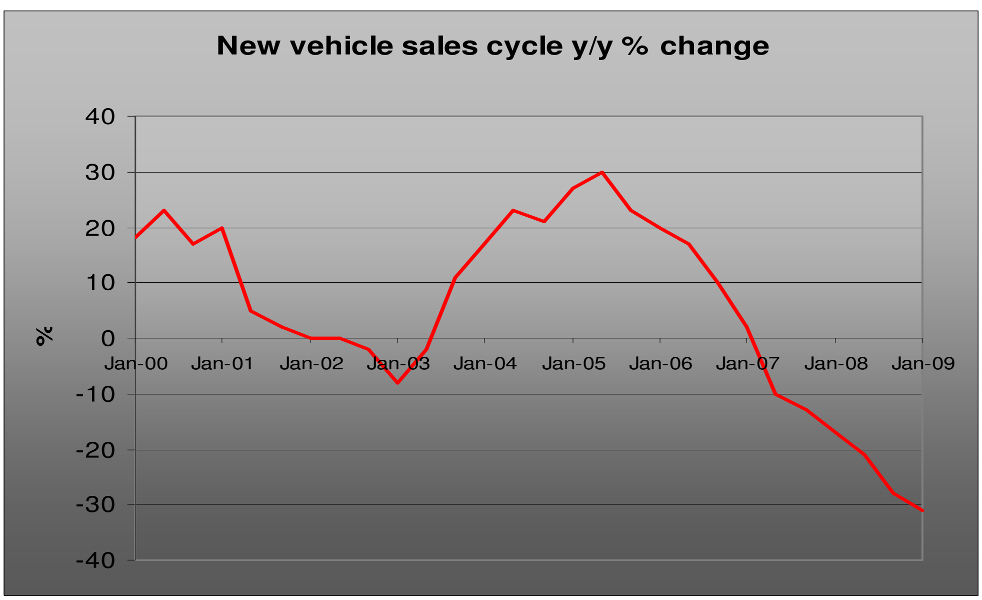


Figure 5.6: New vehicle sales cycle y/y % change

Adapted from: NAAMSA media release: "Comment on the February 2009 new vehicle sales statistics"

A sharp downturn in total new vehicle sales from the year 2006 to the end of 2008 is apparent from figure 5.5 and 5.6. For purposes of this research report though, emphasis will be placed on the figures relating to New Passenger Vehicles, as this is the sector most likely to be impacted upon by the NCA.

From figure 5.7 a rapid increase is noticeable for the period between 2005 and 2006. Furlonger (2008) found that this sharp increase could have been attributed to financial institutions aggressively pushing for turnover in anticipation of the possible downturn as a result of the stricter credit requirements prescribed by the NCA. From 2007 onwards, when the NCA was introduced, the number of new passenger vehicle sales decreased significantly with a 23.3% decrease for the period 2007 to the end of 2008.

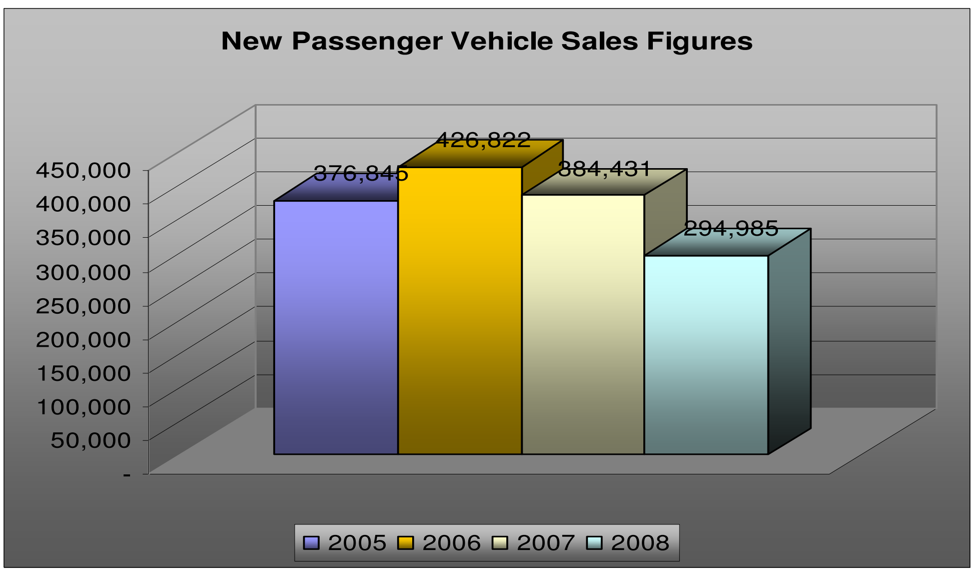


Figure 5.7: New passenger vehicle sales figure

Adapted from: NAAMSA media release: "Comment on the December 2008 new vehicle sales statistics"

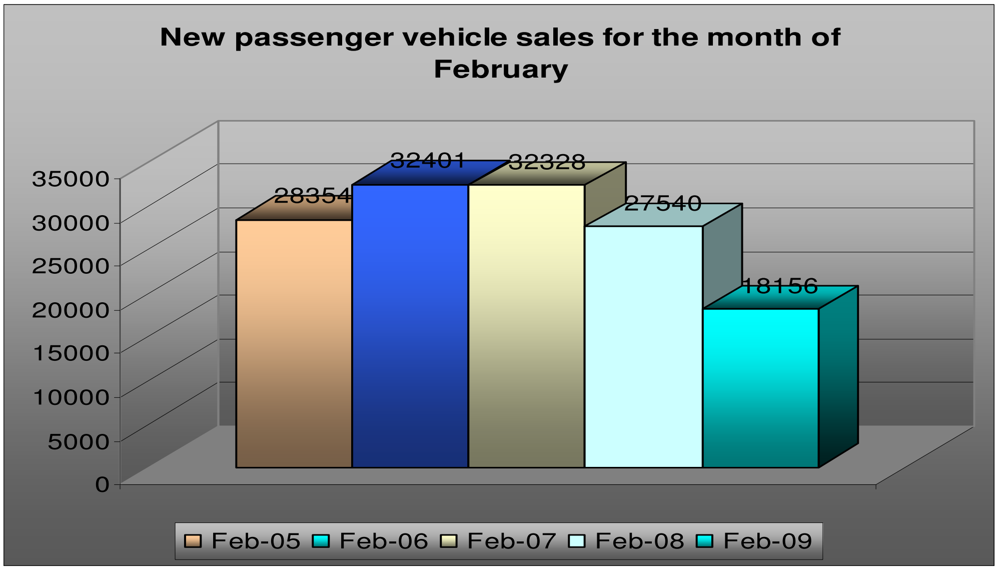


Figure 5.8: New passenger vehicle sales for the month of February

Adapted from: NAAMSA media release: "Comment on the February 2009 new vehicle sales statistics"

The negative trend indicated by Figure 5.7 is even more visible if one compares the year on year passenger vehicle sales for the month of February over the past five years. Figure 5.8 follows a very similar trend to those before but the downturn seems even more abrupt with a 34% lower sales figure recorded for February 2009 than for the corresponding period in 2008.

5.3 THE NCA AND MOTOR FINANCE

'The sharp decline in consumer and business spending on new vehicles in South Africa is a reflection of the high interest rate environment compounded by the inability of many customers currently to obtain vehicle finance' Naamsa media release (2009:2).

The implementation of the NCA in June 2007 changed the motor finance sector landscape significantly. Cokayne (2007), in a news article published by Business Report on July 3, 2007, stated that the NCA is achieving what South Africa's former finance minister Trevor Manuel and Reserve Bank governor Tito Mboweni have failed to achieve since 2006, which is to control the amount of debt consumers take on.

Cokayne reported that motor industry analysts, motor manufacturers and retailers, and finance providers all attributed the decline in new vehicle sales to the impact of the NCA. Director of Econometrix and motor industry analyst Tony Twine regards the NCA as a more effective tool for the control of credit demand than interest rate increases because the law only affects new credit applicants and does not influence the average or marginal cost of credit. He attributed the unexpected slump in sales figures to the impact of the NCA which disqualified a large number of marginal credit applicants.

Chris de Kock, executive head of sales and marketing at WesBank stated that his institution has noted a distinct decline in the number of applications being made for motor finance. WesBank, which uses an index to report on the number of applications received, reported that as at June 2006 the index figure was 100 and in March 2007 it had gone as high as 110. Since inception of the NCA in June 2007 the index figure has dropped significantly and as at July 2008 was recorded around the 90 mark (Houghton, 2008).

On the contrary, Marcel de Klerk from Absa Vehicle & Asset Finance stated that certain sections of the NCA makes motor finance easier to come by because it allows motor finance agreements to be concluded over longer terms, namely 72 months or even 82 months, instead of the maximum 54 months as previously allowed by the Credit Agreements Act.

De Klerk is of the view that the act does not necessarily do enough to educate the consumer as to the implications of stretching the motor finance agreement to its maximum term though. As less capital is settled with each instalment, the longer the motor vehicle repayment period, the higher the cost of the vehicle is ultimately going to be (Summet TV, 2007). Consumer education can be a particularly valuable strategy in relation to the marketing of complex services and in the context of particular groups of consumers (Burton, 2002a; 2002b). In the UK, many educational initiatives have been directed at young people in formal education environments (Knights, Sturdy, & Morgan, 1994).

The consumers that are making use of the option to finance a motor vehicle over these extended periods are mostly marginal applicants for whom the only way to obtain the required motor finance and to qualify for the vehicle applied for, is to conclude the finance over a contract term of 82 months or even longer. De Klerk's view is that 'People are taking out long-term loans to pay for short-term, depreciating assets. This is not a good idea. When customers use their housing bond accounts to pay for vehicles, it gets even sillier' (Furlonger, 2008:2).

A positive for banks and finance houses is the fact that this situation is more profitable because the consumer pays more interest over the longer credit period and the longer the contract term, the lower the costs as a percentage of the facility is for the bank, as the expenses are spread over more months. Figure 5.9 indicates how the cost as a percentage of the transaction declines as the contract term is extended. Over a 54 month period a cost of R10,000 per transaction with an average deal size of R60,000 will be equal to 0.31%, 60 months equal to 0.27%, 72 months equal to 0.23%, and 84 months equal to 0.20%.

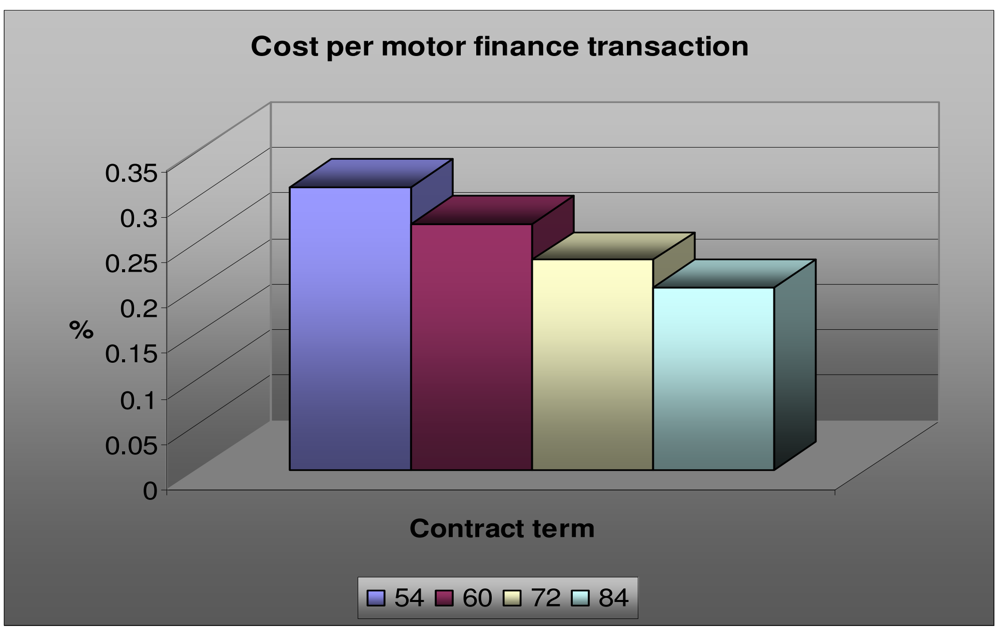


Figure 5.9: Cost per motor finance transaction

Source: Self developed

In addition to the obvious interest implications that the longer repayment term has for the consumer, another more subtle issue arises. Many consumers prefer to replace their vehicles every two years. The stretched agreement term may result in very little capital being settled during the first two years since inception of the finance agreement. This may cause difficulties for the consumer when it comes to trade-in or resale of the motor vehicle, as the value of the vehicle would have depreciated more rapidly than the outstanding capital amount on the transaction.

From a consumer protection point of view, which is ultimately the main aim of the NCA, these extended finance terms do not match up with the optimal economic life of the asset. De Klerk stated that ‘at an average annual rate of 25,000 km it means that in six years the vehicle would have done 150,000km – would be well outside the warranty, be costing money to maintain and invariably will still have an outstanding balloon payment due by the customer’ (Furlonger, 2008:2). The tipping point, which is the stage where the value of the motor vehicle would cover the outstanding balance on the motor finance agreement, is at 31 months for a 48-month contract term and at month 57 for a 72-month agreement (Houghton, 2008).

This effect would not only impact on the consumer but would have a profound impact on the motor industry as a whole as it would result in the average replacement frequency of passenger vehicles declining. Chris de Kock, executive head of sales and marketing at WesBank, in an interview with Mail & Gardian, stated that in February 2006, on average, consumers replaced their vehicles every 28 months. At the end of February 2009 however, this figure had increased to over 36 months, ‘a trend that was set to continue’ (No drive for new cars, says Wesbank, 2009:1).

Trevor Browse, Executive Head of MFC, indicated in a news article published by The Banking Association South Africa on 19/01/2009, that one in four vehicle finance applications were being approved as banks tighten credit extension. This view was shared by Patrice de Marigny, director of Vehicle and Asset Finance at Standard Bank, when he said that ‘Banks don’t want to lend to people who have a reasonable possibility of defaulting on their loans.’ He added that Standard Bank applied prudent lending practices in an effort to protect both the bank from the negative effects of bad debts, as well as the consumer from piling up too much debt. De Marigny attributed this to the application of the NCA as it enforced good lending practices (Banks slow vehicle finance, 2009:1).

Prior to application of the NCA, banks and finance houses were aggressive in their credit lending as the motor finance sector is very competitive. Consumers demanded an on-the-spot result to their motor finance application, and if the institution were not able to provide the required result, they would simply move on to the next finance house. As a result of this attitude by consumers, banks were very market share conscious (Furlonger, 2008). Marcel de Klerk from Absa Vehicle and Asset Finance stated that 'now, because of the act, we are more scientific. We have to demand more information. If you look at the way the banks assessed credit then, and how they do it now, it's chalk and cheese' (Furlonger, 2008:1).

Apart from the possibility of decreased bad debts, banks and financial institutions are also motivated and inspired to comply with the provisions of the NCA as the implications of not complying are serious. In addition to those finance transactions that does not comply being terminated and the bank being issued a fine of up to R1 million, the finance institution also runs the risk of being deregistered as a credit provider, which would almost certainly lead to closure of the business as a whole.

Karl Bauermeister, director of Origination and Sales at Standard Bank Vehicle and Asset Finance, stated that 'The fact that the number of applicants for vehicle finance that do not qualify for financing is 15 percent higher than before the introduction of the NCA shows prudent lending by financing institutions, a clear signal that it is protecting consumers' (Van Vuuren, 2008:1).

Another benefit of the NCA, highlighted by Bauermeister was that it has resulted in increased competition between banks and finance houses. This increased competition also favours the consumer as the finance institutions are now differentiated from one another by the structure of their financial offerings and, most importantly, their service levels. The NCA is also creating an opportunity for consumers who previously could not buy a vehicle because they did not have the minimum 10 percent deposit, as prescribed by the Credit Agreements Act, despite being able to afford the monthly instalments, to now enter the motor finance market. This option was previously only open to those consumers that received a car allowance and not to the normal man on the street (Cokayne, 2007).

From the above it seems as though the NCA is achieving what it aims to do, which is to provide increased protection for consumers and to ensure that they don't over-extend themselves (Van Vuuren, 2008).

5.4 THE PRIME INTEREST RATE AND MOTOR FINANCE

Bannock, Baxter, and Davis (1998) defined interest as the price a borrower pays to enjoy the use of cash which he or she does not own, and the return a lender enjoys for deferring consumption or parting with liquidity.

The market for lending and borrowing short-term financial instruments, in the South African context, is called the money market. These short-term financial instruments include instruments with a maturity of one year or less. The interbank market, which is the market for bank loans and deposits among the various banks, and the operations of the South African Reserve Bank (SARB), is included in this grouping. The SARB intervenes via the interbank market to establish a certain desired money market shortage, or level of borrowed reserves. The SARB provides these borrowed reserves at a cost termed the Bank's accommodation rate, also more commonly known as the repo rate. The SARB's repo rate is intended to manipulate other short-term interest rates. 'They have a powerful influence on them (money market rates), bordering on control' (Faure, 2002:18).

One of the key short-term interest rates is the prime overdraft rate (prime rate), defined by Eatwell, Milgat, & Newman (1987) as 'the lowest rate at which a clearing bank will lend money to its clients on overdraft.' Although the formal connection between the repo rate and the prime rate was discarded in South Africa in 1982, the prime rate at present tends to be in the order of 3.5 percentage points higher than the repo rate.

By increasing the repo rate, the SARB directly influences the marginal cost of funding of commercial banks. In order to remain profitable, the commercial banks increase their prime rate in proportion to the repo rate increase. By doing so, the SARB uses interest rates to combat high consumer spending and inflation, whereby it influences the demand for money, which in turn affects the supply of money ultimately leading to a restraining effect on consumer spending and inflation.

Ahern (1968) found that rising interest rates and a high proportion of new vehicle purchases (65-70%) being made on credit combine to make this an important area for consideration. Figure 5.10 and 5.6 (section 5.2) indicates that a possible negative correlation exists between prime interest rate movements and new vehicle sales. The period between 2001 and 2003, and again since 2005 to the end of 2008, were marked by steady increases in the prime rate. The corresponding periods recorded a dramatic decline in year on year new vehicle sales growth. On the other hand, from 2002 to 2005, the prime rate took a downwards turn. In contrast, the year on year new vehicle sales growth figures recorded for the corresponding period showed positive growth.

Cokayne (2007) reported that the six consecutive prime rate increases since 2005, had a dramatic negative impact in new vehicle sales. What this means for the motor finance sector is that higher interest rates should ultimately lead to a smaller demand for motor vehicles and therefore fewer applications for motor finance being received by the South African Banks. Ludvigson (1998) supports this notion with his findings that restrictive monetary policy leads to a statistically significant reduction in the relative supply of consumer bank loans, and that this change in the composition of motor finance produces a statistically significant decline in real expenditure by the consumer.

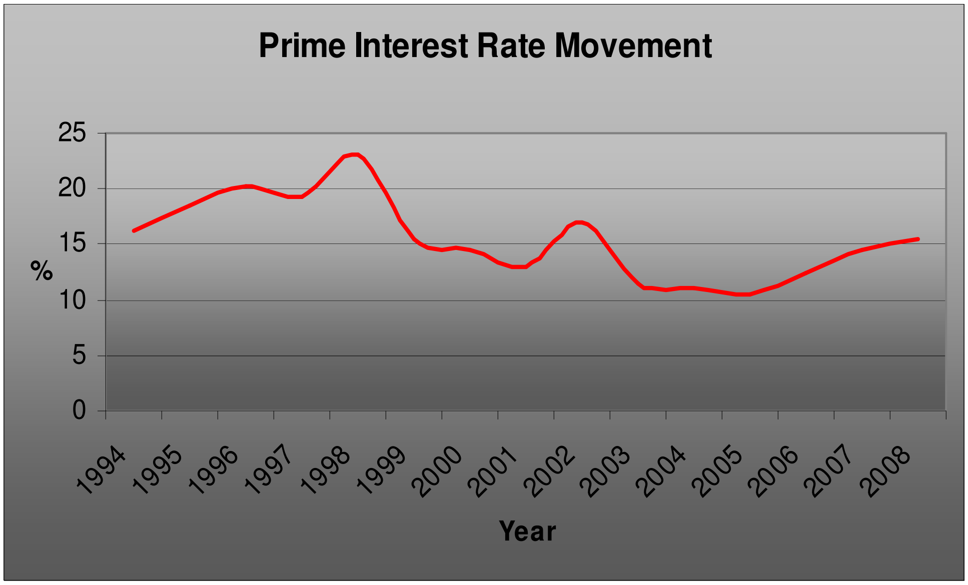


Figure 5.10: Prime interest rate movement

Data Source: South African Reserve Bank

5.5 MOTOR VEHICLE RETAIL PRICES AND MOTOR FINANCE

'Cars will cost as much as 20% to 25% more by the end of the year than they did in December' (Robertson, 2009:1).

The Vehicle Pricing Index (VPI) developed by TransUnion Auto South Africa measures how the price level of new or used motor vehicles purchased by the consumer has changed between two periods of time. The VPI is an extremely valuable instrument that enables the South African motor industry to observe the impact of interest rate changes, changes in demand and supply of motor vehicles and other variables affecting motor vehicle retail prices.

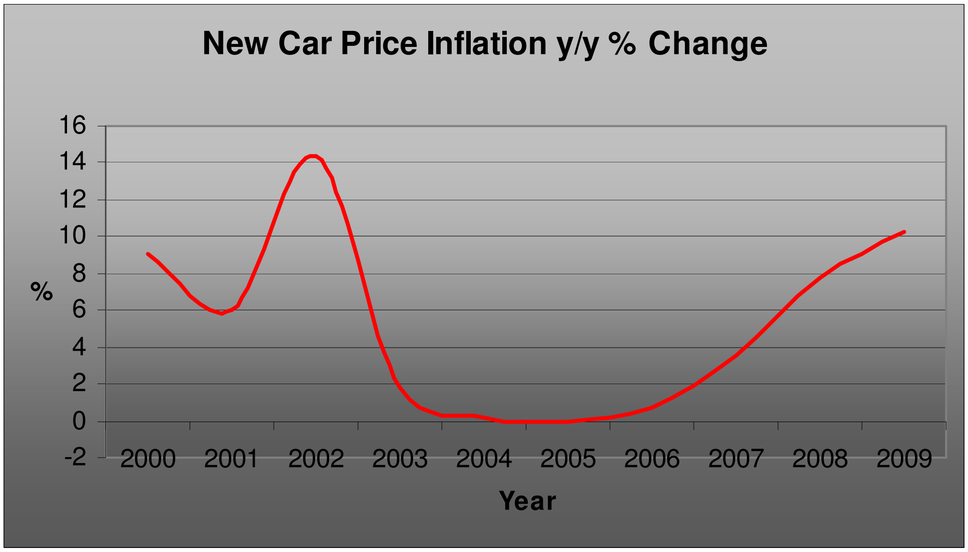


Figure 5.11: New car price inflation y/y % change

Adapted from: Trans Union Media Release:
"Vehicle Pricing Index (VPI) Edition 1"

Figure 5.11 indicates that new car price inflation for 2008 reached a level of 7.82%, up from 3.53% in 2007. When compared to January 2008, the VPI indicates that new car price inflation increased to a high of 10.29% in January 2009. The main contributing factors in the growth of new car price inflation, identified by TransUnion in the first edition of their VPI, are the weakness of the Rand and rising domestic production costs due to a dramatic increase in commodity prices such as steel and Platinum Group Metals (Cokayne, 2009).

Seeing that the largest portion of motor vehicle components used by South African motor manufacturers are imported, the motor manufacturing sector is very sensitive to changes in the value of the Rand. Despite the decrease in demand for new cars, manufacturers have been forced to increase prices in order to claw back some of their losses as a result of the depreciating Rand.

A comparison between Figure 5.11 and 5.12 reflects the possibility of a positive correlation between changes in the exchange rate and new vehicle prices. The two graphs show a very similar pattern with increases for the period 2001 to 2002 and again from round about 2005 to 2009.

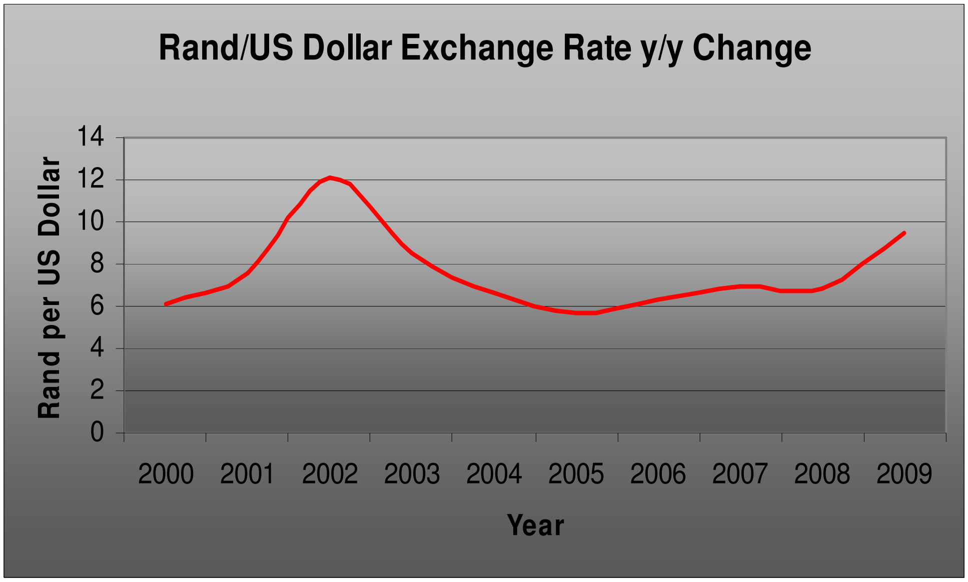


Figure 5.12: Rand/US Dollar exchange rate y/y change

Data Source: South African Reserve Bank

In contrast, Figure 5.11 and 5.6 (section 5.2) indicates that a possible negative correlation exists between new car price inflation changes and new vehicle sales. The period between 2001 and 2003, and again since 2005 to 2009 was marked by steady increases in new car price inflation. The corresponding periods recorded a dramatic decline in year on year new vehicle sales growth. On the other hand, from 2002 to 2005, new car price inflation slowed down, and on the contrary, the year on year new vehicle sales growth figures recorded for the corresponding period showed positive growth.

'This high inflation on top of already reduced consumer purchasing power and current negative sentiment was undoubtedly a factor in the 36% year-on-year decrease in new car sales in January 2009' (TansUnion, 2009:1).

5.6 CHAPTER SUMMARY

This chapter addressed the 2009 consumer credit report published by the NCR, specifically highlighting the movement in the amount of motor finance granted in the South African market. It concluded by addressing the individual impact of the NCA, prime interest rates and motor vehicle retail prices on the amount of motor finance granted in the South African market place.

CHAPTER 6
RESEARCH DESIGN AND METHODOLOGY

6.1 INTRODUCTION

The main aim of any research project is to learn what has never been known before; to ask a significant question for which no conclusive answer has previously been found; and, through the means of appropriate data and their interpretation, to find an answer to that question. '*Research has one end: the ultimate discovery of truth*' (Leedy & Omrod, 2005:xxii).

Chapter one of this research report endeavoured to introduce the problem with regards to the topic. It also provided a rationale for the study and explained the research question. Chapter two, three, four and five provided a theoretical framework in support of the empirical research and also provided an interpretation of the relevant current available literature. This chapter aims to explain the methodological approach implemented in conducting the empirical component of this study.

6.2 RESEARCH DESIGN

Science is an activity dedicated to finding out (Babbie & Mouton, 2004). Research design addresses the planning of scientific enquiry and the designing of a strategy for finding out something specific. The design of the research is the complete strategy of addressing the central problem. Leedy & Omrod (2005) defines the method of research as the framework to extract meaning from the data. In this section the research plan is described in terms of the goals set, the approach to be followed and the specific research design to be utilised.

6.2.1 QUALITATIVE AND QUANTITATIVE RESEARCH APPROACHES

There exist mainly three paradigms within which research can be conducted. These are the quantitative, qualitative and critical social science paradigms (Bryman, 2004; Neuman, 2000). The quantitative and qualitative paradigms are the most frequently applied research approaches as the critical social science paradigm tends to be more of a philosophy about the purpose of research than a methodology. The critical social science paradigm philosophy ascribes that any research approach, whether quantitative or qualitative of nature, is acceptable so long as it makes a contribution to the ideal of improving the quality of society (Bryman, 2004; Neuman, 2000).

Often described as two different sides of a coin and apposing research approaches, researchers normally apply one of the two, although there is no concrete rule that prescribes that only one approach may be applied in research. The rest of this section is dedicated to accentuate the differences between the two approaches and the selection of a research approach to be followed in this research study.

The research paradigms driving qualitative and quantitative research are as follows (Schurink, 1998:24)

- The qualitative paradigm originated from an antipositivistic, interpretative approach, is idiographic and holistic in nature, and its key objective is to understand social life and the meaning that individuals attach to everyday life
- The quantitative paradigm, on the other hand, is premised upon positivism, which takes scientific explanation to be nomothetic (that is based on universal laws). Its key objectives are to objectively measure the social world, to test hypotheses and to predict and control human behaviour.

Table 6.1 describes the differences in approach by qualitative and quantitative researchers with regards to three different research approaches, namely, ontology, epistemology and methodology. Table 6.1 also describes the qualitative research design as being language driven and conceptualised through observations of social reality. It is often used to answer the questions about the complex nature of phenomena (Leedy & Omrod, 2005). This type of research design would generally kick off with a general research question or open agenda and is led by the evidence in order to reach a conclusion.

Table 6.1: Differences between the qualitative and quantitative research paradigms

	Research perspective	Qualitative paradigm	Quantitative paradigm
Ontology	The nature of reality and human behaviour	• Discards the external objective reality • Tries to understand reality by discovering meaning that people in specific settings attach to it • Behaviour is intentional and creative and it can be explained, but not predicted	• Believes in an objective reality that can be explained, controlled and predicted by natural causal effect laws • Human behaviour can be explained in causal, deterministic ways
Epistemology	The relationship of researchers to reality and the road that they will follow in the search of truth	• The researcher is subjective because he/she interacts with the subject	• The researcher sees himself/herself as detached from the study • The researcher is therefore objective • He/she does not influence the object of the study and is not influenced by it
Methodology	Knowing how scientific methods and techniques employed obtain valid knowledge	• Research is dialectical and interpretative; • Qualitative methods are used to uncover the world of the subject	• Emulates natural science • Hypotheses are postulated and tested in order to verify them

Sources: Leedy & Omrod (2005); Schurink (1998); Mouton & Marais (1994)

Quantitative research on the other hand is initiated with the formulation of research hypotheses, which are propositions that can either be supported or not be supported by the empirical evidence that is gathered during the course of the research project. It is most often used to answer questions about relationships among measured variables with the purpose of explaining, predicting, and controlling phenomena (Leedy & Omrod, 2005). Table 6.2 lists the main differences between the two approaches as described by Schurink (1998).

Table 6.2: Differences between qualitative and quantitative research designs

Qualitative	Quantitative
Uses an inductive form of reasoning: develops concepts, insights and understanding from patterns in the data	Uses a deductive form of reasoning: collects data to assess preconceived models, hypotheses and theories
Uses an emic perspective of inquiry: meaning is derived from subject's perspective	Uses an etic perspective of inquiry: the researcher determines meaning
Idiographic: aims to understand the meaning that people attach to everyday life	Nomothetic: aims to objectively measure the social world, to test hypotheses, and to predict and control human behaviour
Regards reality as subjective	Sees reality as objective
Captures and discovers meaning once the researcher has become immersed in the data	Tests hypotheses with which the researcher starts off
Concepts are in the form of themes, motives and categories	Concepts are in the form of distinct variables
Seeks to understand phenomena	Seeks to control and predict phenomena
Observations are determined by the information richness of the settings. Different types of observations are used to modify and enrich understanding	Observations are systematically undertaken in a standardised manner
Data are presented in the form of words, quotes from documents, and transcripts	Data are presented by means of extracted figures gained from precise measurement
The research design is flexible and unique and evolves throughout the research process There are no fixed steps that should be followed and the research design cannot be replicated exactly	The research design is standardised according to fixed procedure and can be replicated
Data are analysed by extracting themes through content analysis	Data analysis is undertaken by means of statistical procedures
The unit of analysis is holistic, concentrating on the relationships between elements and contexts. The whole is always more that the sum	The unit of analysis is variables, which are atomistic, i.e. the elements that form part of the whole

Source: Schurink (1998:241)

In order to clearly appreciate the two different research processes, the different methodologies followed need to be understood. The differences in methodology followed by qualitative and quantitative research approaches are described in Table 6.3.

Table 6.3: Differences between qualitative and quantitative research processes

Steps	Qualitative approach	Quantitative approach
1	Choose a research problem/topic/theme	Choose a research problem/topic/theme
2	Consider the underlying assumptions in order to decide whether they will be the researchers' choice	Identify the problem
3	Select the specific qualitative design to be used	Review the relevant literature and related research
4	Plan qualitative sampling.	Formulate the problem formally.
5	Delineate the researcher's role (for example: how entry to the research site will be gained and consideration of ethical issues?)	Write out a research proposal
6	Establish the protocol for recording information	Define each of the central concepts theoretically and operationally
7	Write out a research proposal	Reformulate the research problem in the form of testable hypotheses
8	Collect the information through observation, interviews, documents and visual material. Record immediately	Select a research design
9	Process the data (preparing for analysis), for example: reduce the data to themes and categories with the aid of coding procedures	Select the data-collection methods and measuring instruments
10	Analyse and interpret, i.e. put it all together and draw conclusions	Conduct a pilot study
11	Ensure internal validity, for example by assessment criteria	Draw the sample(s)
12	Write the research report: plan the narratives; compare with theories and literature (literature control)	Collect the data (that is, execute the selected research design)
13	--------	Process, analyse and interpret the data
14	--------	Write the research report

Source: De Vos (1998:40)

6.2.2 SELECTED RESEARCH APPROACH

The purpose of this research is to examine the dynamic effect that various economic variables have on South Africa's motor finance sector. It is argued that the NCA is the most influential factor, and that application of the NCA, since 1 June 2007, is negatively correlated with the amount of motor finance granted to the consumer since that time, and that it can largely be blamed for the bad state that the countries motor industry finds itself in. Although some research has been done on the impact of the NCA on certain other industries in South Africa, no systematic research has examined the hypothesized relationships as described above.

In light of the general research question, this dissertation is encapsulated within the positivist research paradigm, thus a quantitative approach was selected to achieve the aims of this study with the goal of exploring, describing and correlating. Exploratory research is typically applied when a researcher is examining a new interest or when the subject of study is itself relatively new and unexplored (Kotler, Adams, Brown, & Armstrong, 2006). The aim of descriptive research is therefore to describe the characteristics of a selected occurrence (Kotler *et al.* 2006).

A quantitative research approach was considered appropriate for this study as it involves the systematic collection of observable, measurable data, the statistical analysis of the data and the development of a statistical model. The aim is to empirically examine the relationship among variables that are measurable and that have accepted validated measurement instruments. In addition to this, the study attempts to quantitatively link the relationship among a specified set of variables. All of the relevant concepts in the study have accepted measures and cannot be described as underdeveloped phenomenon.

The principles of a scientific approach are employed in this research study. Kerlinger & Lee (2000:14) defines a scientific approach as 'the systematic, controlled, empirical, amoral, public and critical investigation of natural phenomena. It is guided by theory and hypotheses about the presumed relationships amongst such phenomena.' The basic purpose of science is to build theory. 'A Theory is a set of interrelated constructs, definitions and propositions that present a systematic view of phenomena by specifying relations among variables, with the purpose of explaining and predicting the phenomena' (Kerlinger & Lee, 2000:11). Theories can also be described as tentative explanations for observable phenomena and in general applies to many people and places (Mouton & Marais, 1994). Social theory in particular, is a system of interrelated abstractions or ideas that condenses and organises understanding about the social world at large.

Until such time that a theory has been tested and reviewed by empirical research, that theory will be regarded as the working truth. In the research process each theory is evaluated empirically to establish to what degree it predicts new findings. Theories can be seen as the building blocks for the research plan, whereby testable hypotheses are developed and facts are structured from the testing of the hypotheses.

Ultimately the aim of research is scientific explanation. Scientific research is methodical and controlled and is therefore believed to have fewer errors (Neuman, 2000). Due to its empirical nature, people have confidence in scientific research. Empirical refers to the manner in which scientific information is gathered through specialised scientific techniques. It implies that the personal beliefs and feelings of the researcher are put aside whilst the ideal of objectivity is pursued. Science is a social construct and a way of producing knowledge. According to Neuman (2000), this would include both the systems for producing knowledge and the knowledge produced from the system itself. The norms of the scientific community include the following (Neumann, 2000):

- Universalism: Research conducted anywhere by any institution is judged on its scientific merit
- Organised scepticism: Scientist does not accept new ideas in a carefree or uncritical way
- Disinterestedness: Scientist must be neutral, impartial, receptive and open to unexpected observations and new ideas

- Communalism: Scientific knowledge must be shared with others
- Honesty: Scientific research requires honesty. Dishonesty is a major taboo

This research study makes a contribution to the body of knowledge about the relationship amongst various variables, namely the prime interest rate, motor vehicle retail prices, application of the NCA, and the amount of motor finance granted to the consumer. It follows the standards of the scientific approach and is subject to all the norms followed by the scientific community in pursuing a quantitative research approach.

6.3 RESEARCH OBJECTIVES, RESEARCH QUESTIONS, VARIABLES, HYPOTHESES, CONSTRUCTS, AND EMPIRICAL RESEARCH QUESTIONS

6.3.1 RESEARCH OBJECTIVES

The purpose of this research is to examine the dynamic effect of various economic variables on South Africa's motor finance sector and specifically the amount of motor finance granted.

Despite the possible influences of the high prime interest rate and possible inflated motor vehicle retail prices, the related literature indicates that the NCA is the most influential factor, and that application of the NCA, since 1 June 2007, is negatively correlated with the amount of motor finance granted to the consumer since that time. It is thus also held liable for the predicament that the countries motor industry has found itself in since the latter parts of 2008.

6.3.2 GENERAL RESEARCH QUESTION

The general research question that requires further exploration is as follows:

- Is there a relationship between the introduction of the NCA, the prime interest rate, motor vehicle retail prices and the amount of motor finance granted in the South African motor finance sector?

6.3.3 SPECIFIC RESEARCH QUESTIONS

In terms of the literature study, the following specific research questions should be addressed in this research project:

- How can credit regulation be conceptualised and what are its key aspects?
- How can The National Credit Act be conceptualised and what are its key aspects?
- How can motor vehicle finance in South Africa be conceptualised and what are its key aspects?
- How can the effect of The National Credit Act on motor finance be conceptualised and what are its key aspects?
- How can the effect of the prime interest rate on motor finance be conceptualised and what are its key aspects?
- How can the effect of motor vehicle retail prices on motor finance be conceptualised and what are its key aspects?

In terms of the empirical study, the following specific research questions should be addressed in this research project:

- What are the results regarding new applications for motor finance in a South African motor finance institution, pre- and post NCA application?
- Does a relationship exist between the prime interest rate, motor vehicle retail prices and the results regarding new applications for motor finance in a South African motor finance institution?
- Does the South African consumer and motor finance credit analysts share the same view regarding the impact of the NCA as the main impediment preventing the consumer from applying for motor finance?
- Is there a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance?
- In the view of motor finance credit analysts, is the NCA regarded as being the major reason for motor finance applications being declined?

6.3.4 AIMS OF THE RESEARCH

The aims of the research study is to conduct a thorough empirical evaluation of credit conditions in the motor finance sector pre- and post NCA application, determine outcomes and process measures instituted by the major players in the South African motor finance sector, and to formulate measures to minimise the negative effect that credit regulation or other economic variables may have on the motor finance provider.

In terms of the questions that originated in order to solve the identified problems, the general aim of this research study is to examine whether a relationship exist between application of the NCA, the prime interest rate, motor vehicle retail prices and the amount of motor finance granted in the South African motor finance sector.

6.3.5 RESEARCH CONTRIBUTION

The most significant contribution of this study is that it is the first empirical test of the relationships among the NCA, the prime interest rate, motor vehicle retail prices and the amount of motor finance granted in the South African motor finance sector. Whilst the impact of the NCA on other sectors of the South African credit market has previously been tested, there is no research that has attempted to establish the linkages between the above mentioned dependent and independent variables, or the effect it has on the motor finance sector in particular.

6.3.6 RESEARCH HYPOTHESIS

Hypotheses are statements that describe the relationship or difference between two or more variables related to the research problem or question. Hypotheses are generally created in one of two ways. Firstly, they are deducted from the existing theories and models within a discipline. Secondly, they are inductively derived from the observations, experience and visualizations (Mouton & Marais, 1994). Hypotheses are usually formulated as relationships between variables that need to be tested. A hypothesis can thus also be described as a conjectural statement of the relationship that exists between two or more variables.

Hypotheses are predictions of some specific event with a probability greater than pure chance. According to Goodwin (2000) the prediction is based on theory, and the study is guided by the hypothesis in order to prove its accuracy. The concept of a null hypothesis in quantitative research refers to the relationship where it is postulated that no relationship exists between the variables being tested. The objective of the quantitative research procedure is to disprove the null hypothesis or to prove that the relationship between variables is not coincidental and cannot be assigned to chance.

The central hypothesis of this study can be described as follows:

There is a relationship between Application of the NCA and the rate of credit application approval in the South African motor finance sector. In addition to this, other economic factors, namely, the prime interest rate and motor vehicle retail prices has an even greater effect than the NCA on the amount of motor finance being extended in the South African motor finance sector.

In terms of the specific research questions the sub-hypotheses can be identified as:

$H0_1$: There is no significant difference between approval ratio means for periods pre- and post NCA application.

$H1_1$: There is a significant difference between approval ratio means for periods pre- and post NCA application.

$H0_2$: There is no relationship between the prime interest rate and the approval ratio of new motor finance applications.

$H1_2$: There is a relationship between the prime interest rate and the approval ratio of new motor finance applications.

$H0_3$: There is no relationship between motor vehicle retail prices and the approval ratio of new motor finance applications.

$H1_3$: There is a relationship between motor vehicle retail prices and the approval ratio of new motor finance applications.

$H0_4$: There is not a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance.

$H1_4$: There is a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance.

$H0_5$: There is not a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance.

$H1_5$ There is a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance.

$H0_6$: There is not a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance.

$H1_6$: There is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance.

$H0_7$: There is no relationship between Total Household Income and the consumers' opinion regarding the NCA as the main consideration in their decision to apply or not apply for motor finance.

$H1_7$: There is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main consideration in their decision to apply or not apply for motor finance.

$H0_8$: There is not a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined.

$H1_8$: There is a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined.

6.3.7 RESEARCH CONCEPTS AND CONSTRUCTS

A concept is a generalised name/expression used prior to the conceptualization of a construct. As per Mouton & Marais (1994), a concept consists of two parts. It firstly consists of a symbol (word or term), and secondly, a definition. A concept is the most basic linguistic constructions with which an individual describes and understands reality. Mouton & Marais (1994) explained that a concept consists of two fundamental elements, namely, connotations (or sense) of the concept and reference. Connotations, as per Mouton & Marais (1994), refer to the meaning that an individual associate with a concept whilst reference refers to the collection of events, characteristics, actions and processes that are included when a concept is used.

In the conceptualisation phase of this research study, the concepts relevant to the theoretical study are refined and specified to explain their meaning prior to their becoming constructs. Constructs are then operationally defined. The detailed items that form factors produce constructs and multiple items are requisite to form a construct. Constructs are intentionally developed for an unambiguous scientific meaning (Mouton & Marais, 1994). In this research study the key constructs are The National Credit Act, the prime interest rate, motor vehicle retail prices and motor vehicle finance.

6.3.8 UNIT OF ANALYSIS

A medium sized motor finance house, affiliated to one of the major banks and competing in the South African motor finance sector, was the primary unit of analysis. In addition to this, the views of the major banks, including the consumer were recorded. These were termed the secondary units of analysis.

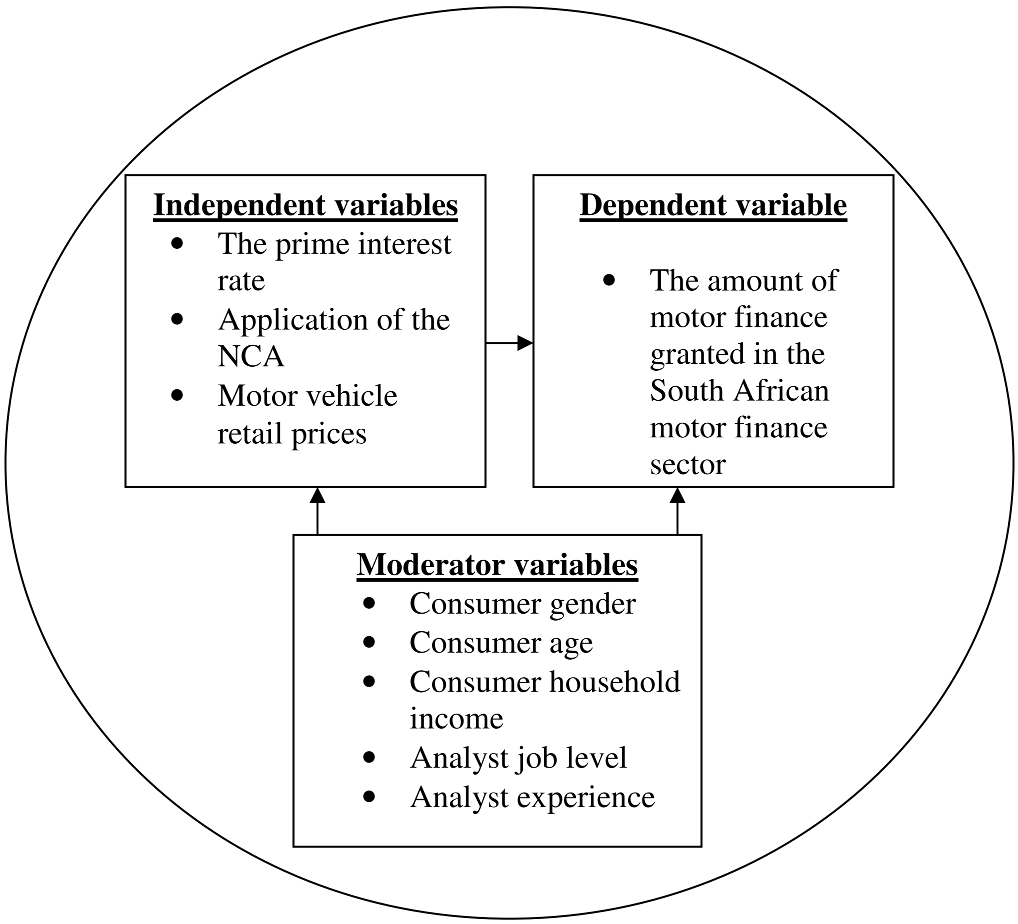
6.3.9 RESEARCH VARIABLES

Variables are constructs, formulated from multiple items identified as empirical factors that meet minimum reliability criteria, used during the research process. 'A variable that a researcher studies as a possible cause of something else, in many cases this is one that the researcher directly manipulates, is called an independent variable. A variable that is potentially influenced by the independent variable, that something else we just mentioned, is called a dependent variable, because it is influenced by, and so to some extend depends on, the independent variable' (Leedy & Ormrod, 2005:218). For example, a value can be attached to a construct that relates to the predictability of the influence that the construct has on the outcome of motor finance granted in the South African motor finance sector. This predictability enables a researcher to assign cause (independent variables) and affect (dependent variables) status to variables.

A researcher applies the independent variables to ultimately predict its relationship with the dependent variable. The dependent variable in this research study is the amount of motor finance granted and the independent variables are application of the NCA, the prime interest rate and motor vehicle retail prices. The aim of the research is to establish whether application of the NCA, the prime interest rate and motor vehicle retail prices (independent variables) has an effect, as well as the extend of the effect, on the amount of motor finance granted in the South African motor finance sector (dependent variable).

The independent variables are constructs formulated during the review of the related literature. The dependent variable is the extend to which the variable, the amount of motor finance granted to the consumer, is affected by the application of the NCA, the prime interest rate and motor vehicle retail prices. The amount of motor finance granted to the consumer was sourced from historical financial data obtained from the primary unit of analysis as well data obtained from the secondary units of analysis by way of two self administered questionnaires.

Diagram 6.1: The research variables



Moderator variables are variables that exist in the background. They are not deliberately created as in the case with independent variables. These moderator variables are constantly present and they may have an effect on the dependent variable. During the research process the relationship between the three categories of factors was investigated and the following five moderator variables were identified that may influence the dependent and independent variables: Gender of the consumer; age of the consumer; household income of the consumer; job level of the credit analyst; and the credit assessment experience of the credit analyst. Gender, age and household income of the consumer was collected as part of the standard demographic data obtained from a self-administered questionnaire termed the consumer questionnaire. Job level and credit assessment experience of the credit analyst was collected as part of the standard demographic data obtained from a self-administered questionnaire termed the credit provider questionnaire.

6.4 RESEARCH METHODS

6.4.1 RESEARCH STUDY SAMPLE

Christensen (1997) defines a population as all the events, things or individuals that are represented in a research project, whilst a sample refers to any number of individuals less than the population. As the research design required access to performance data that might be viewed as sensitive, locating an organisation willing to provide the required data proved to be very challenging. The researcher was able to obtain full permission to collect the data required within the sample organisation though. The sample for the research comprised quantitative financial information obtained from the primary unit of analysis covering a period of twenty four months prior and post application of the NCA, up to February 2009.

Simple random sampling is often impractical, however researchers should randomise whenever possible (Leedy & Ormrod, 2005). As the data collected from the primary unit of analysis included every single period during the mentioned time frame, which included the total population of periods after 1 June 2007 when the NCA was first instituted, a certain level of randomisation was present as far as the relevant historical financial information goes.

As far as the secondary units of analysis are concerned, nonprobability convenience sampling was applied in order to record the views of various consumers and credit assessment specialists in the Gauteng region. The sample chosen was a non-probability sample as there was no reasonable way of forecasting or guaranteeing that each element of the population was represented in the sample (Leedy & Ormrod, 2005).

Of the 80 credit analyst questionnaires distributed to the four major motor finance institutions, including the one medium sized institution, 42 credit analysts submitted their completed questionnaires. The response rate for the credit provider survey was therefore 53%. Of the 400 consumer questionnaires distributed, 153 completed questionnaires were received. The response rate for the consumer survey was therefore 38%.

6.4.2 DATA COLLECTION PROCEDURES

The process of obtaining data for analysis is called data collection. In this research study, data was recorded for the independent and moderator variables by way of historic financial information collected from the primary unit of analysis. Additionally, the views of the secondary units of analysis were recorded by way of two self administered questionnaires.

The historical financial data obtained from the primary unit of analysis consisted of several years' worth of monthly information pertaining to the amount of applications for motor finance received and the approval ratios. The self administered questionnaires recorded certain biographical information of the participants as well as their views on the topic.

The data collected via a survey approach was deemed appropriate as it allows the researcher to study a population sample in order to infer characteristics about the population. It is also a very rigorous and versatile form of non-experimental research and data collecting (Leedy & Omrod, 2005). In the case of the credit analyst questionnaire, the respondents were uniquely qualified to provide the desired information by virtue of their past work experience. The survey was administered over a period of four weeks, from 12 June 2009 through to 13 July 2009.

All respondents received an invitation to participate in the research study. A copy of this invitation is attached as Appendix A & B. Invitations directed at the various credit analysts were sent directly to the respondent's e-mail addresses and in some cases sent to the heads of the credit departments who then distributed and collected the completed questionnaires on the researchers' behalf. The wording and content of the invitation to participate was of particular importance to the response rate. As this was the first point of contact with the respondent in many cases, it formed the basis of the overall impression of the study and influenced the respondent's participation decision.

The invitation contained the following information:

- The purpose of the study including information stating that the study was in partial fulfilment of a Masters Degree as well as the phenomenon under investigation
- Affiliation and personal details of the researcher
- The issue of confidentiality and anonymity
- Clear instructions on how to participate in the survey as well as an indication of the time required to complete the survey

6.4.3 MEASUREMENT INSTRUMENT

The secondary data was acquired by means of self administered structured questionnaires. The questionnaires were designed with three goals in mind: Firstly, to maximise the relevance and accuracy of the data; secondly, to maximise the participation and cooperation of target respondents; and lastly to facilitate the collection and analysis of the data.

Seeing that internal validity and reliability of the data and the response rate to a large extend rely on the design and layout of the questions, the appearance and structure of the questionnaire was of particular importance. The questionnaires were structured in a manner that made reading questions and completing responses straightforward.

The questionnaires aimed to obtain information regarding consumers' and credit analysts' opinions on certain motor finance related issues as well as certain demographic data including the respondents gender, age, household income, job level, and experience level. Each section was introduced with clear instructions on how to answer the subsequent questions.

Questions were mostly closed-ended and provided a number of alternatives from which the respondent was instructed to choose. The types of questions that were included in the questionnaires were:

- Category: Where one response could be selected from a given set of categories (gender, age, job level, experience level and income)
- Rating: Where a rating scale was used to record responses
- Open-ended: Where respondents could list their opinion or make recommendations

Rating questions were used to collect opinion data. Likert rating scales in which the respondent was asked to what extend he/she agrees or disagree with a series of statements on a six-point rating scale was used. An even number was used in order to force the respondent to commit to an opinion and not be allowed to sit on the fence. The questionnaires were furthermore pilot tested by five consumers and two credit analysts in order to ensure that the questions were representative and elicited the information it had been designed to obtain.

6.4.4 RELIABILITY AND VALIDITY

A questionnaire is deemed valid if it allows for accurate data to be collected and reliable if it is collected consistently. Validity refers to the extent to which a test measures what it was intended to measure. Reliability is concerned with the accuracy and precision of a measurement procedure (Leedy & Omrod, 2005). Both reliability and validity contributes to the quality of data gathered.

The reliability of a measure is simply its consistency. The reliability of this research project was ensured by stating the literature sources on which the theoretical views are based. Therefore chapter two, three, four and five of the research report includes a detailed conceptualisation of the concepts credit regulation, the NCA, the prime interest rate and motor vehicle retail prices in particular. These conceptualisations were mined from relevant former and current literature. A number of classical sources were used as references as these concepts are particularly noteworthy and offer a historical perspective on the evolution of the concepts. Additionally, measuring instruments of which the reliability has been demonstrated through prior research was chosen.

Only measurement instruments with a high score for construct reliability were considered for inclusion within the questionnaire. Structured questionnaires were used with clear instructions. The measurement instruments used were informed through pilot testing and established measures. A great deal of care was taken in the design of the questionnaires as far as space to record responses was concerned.

Internal validity on a contextual level was ensured through the application of the chosen theories, models and measuring instruments in a representative mode and presented in a standardised manner. In order to ascertain that the conclusions drawn from the research study are warranted from the data collected, multiple sources of data collection were applied in order to ensure triangulation.

External validity was ensured through the inclusion of the four leading motor finance institutions in South Africa as well as one medium sized finance house in the research study, thus ensuring that the sample is representative of the total population. The historical financial data obtained from the primary unit of analysis consisted of several years worth of monthly information pertaining to the approval ratio of new motor finance applications received. The trends identified in the data were confirmed through the data collected from credit analysts representing the four leading motor finance institutions in South Africa.

6.5 DATA ANALYSIS

On its own, raw data is without meaning, and provides no tangible information until such time that it has been reworked and processed into significant information. This segment of the dissertation illustrates the actions taken to manage and analyse the data obtained. An overview of the data preparation, preliminary analysis, and hypothesis testing is to be provided. The statistical analysis and protocol to be followed in the next chapter will also be outlined.

6.5.1 DATA PREPARATION AND PRELIMINARY ANALYSIS

The historical data obtained from the primary unit of analyses was classified as ratio quantitative data and was applied to measure the differences in the means and associations between the variables. As the data was already presented in a workable format no additional coding was required.

The survey was designed to provide simplicity of use when coding and editing the data. Each question permitted for a variable code value to be allocated to each reply. All codes allocated were mutually exclusive and independent. The information obtained from the completed questionnaires were exported to an excel data template which in turn got exported into SPSS 0.17 in order for certain statistical tests to be performed.

A large portion of the data obtained was classified as ordinal qualitative data (Pellisier, 2007). Ordinal data can be applied to signify less than or greater than information and provides qualitative disparities between categories, and a degree of order to the intensity/strength of the variable being measured. Respondents were thus able to grade preferences by allocating a numeral representing the degree of agreement/disagreement based on a 6 point Likert scale related to a particular set of statements. The scale interval ranged from 1 to 6 (strongly disagree; disagree; somewhat disagree; somewhat agree; agree; strongly agree).

Descriptive measures that describe the data sets according to their shapes were provided (Pellisier, 2007). The data was summarised for each independent variable by way of frequency tables, and where applicable, graphs (bar charts) were presented for visual purposes. Descriptive statistics were also applied to illustrate and evaluate differences in the independent variables numerically.

6.5.2 HYPOTHESES TESTING

Hypotheses are tested in order to establish their precision and to determine the probability that the data reveals true disparities and not a random sampling error. The two universal hypothesis applied are the null (H0) and alternative (H1) hypothesis. H1 commonly explain the specific research hypothesis while H0 assume that the research hypothesis is incorrect. The main rationale for hypotheses testing is thus to establish which of the two hypotheses is best supported by the data at hand. Were the likelihood of obtaining the data under the null hypothesis to be small, it is to be rejected and the alternative hypothesis should be accepted as the most probable outcome.

Leedy & Ormrod (2005) described that statistical hypothesis testing is a matter of probabilities, and that there is always the possibility of an error occurring. The two most common errors associated with hypothesis testing are:

- Type l error, which occurs if a true null hypothesis is rejected
- Type ll error, which occurs when a false null hypothesis is accepted

Hypothesis testing accentuates Type l errors more than Type ll errors, and in order to eliminate the occurrence of these errors, hypotheses are tested for statistical significance. The correctness of a given hypothesis is thus assessed by determining the statistical probability that the data reveal true disparities and that the differences are not purely due to random sampling errors (Leedy & Ormrod, 2005). Seeing that any sample will to a certain degree vary from its population of origin, and hypotheses are accepted or rejected on the basis of sampling information exclusively, it is of paramount importance to adjudicate whether the disparities are statistically significant or not. If differences between variables are unlikely to represent random sampling fluctuations, the differences are believed to be of statistical significance.

The process of testing the statistical significance can be described in several well defined stages, namely:

- Stating the null and alternative hypotheses
- Choosing the statistical test
- Selecting the desired level of significance
- Computing the calculated difference value
- Obtaining the critical test value, and interpreting the test

The first three stages are considered in this section and the last two stages will be dealt with in chapter 7 (Research results).

6.5.2.1 Stating the null and alternative hypothesis

In this dissertation the researcher formulated relational hypotheses as presented in section 6.3.6. The hypotheses listed are statements portraying the association between two identified variables and were one-tailed/directional, which positioned the entire likelihood on an improbable outcome into the tail specified by the alternative hypothesis. Of importance in this instance is to note that, although two samples were conducted, the hypotheses were tested against only one sample at a time.

6.5.2.2 Choosing the statistical test

Of paramount importance in hypothesis testing is the selection of an appropriate statistical test. Statistical tests are classified into parametric and non-parametric tests. Parametric tests are suitable for use when the data are interval or ratio in nature and non-parametric tests are more suited for hypothesis testing with nominal and ordinal data.

For parametric testing to be suitable, the data must comply with certain assumptions, namely (Coakes, 2005):

- The observations must be independent
- The observations should be drawn from normally distributed populations with equal variances
- The measurement scales should at least be interval in order for arithmetic operations to be applied to them

In certain instances, (Hypotheses 1, 2, & 3), the historical operational data obtained from the primary unit of analysis satisfied these assumptions, thus in the case of Hypothesis 1 Total Approval Ratio for Target Period is considered to be the dependent variable and NCA Not Effective / NCA Effective the independent variable. An Independent Sample t-Test was performed on the total approval ratio for the periods pre- and post NCA application in order to determine whether the difference between the means of the two sets of scores are significant.

In the case of Hypothesis 2 and 3 respectively, the correlation between Prime Interest Rate Movement and Total Approval Ratio for Target Period was firstly determined, and secondly between New Car Price Inflation and Total Approval Ratio for Target Period. The correlation coefficient is a statistic that is used to measure the strength of a linear association between two variables. Correlation testing also has a number of underlying assumptions that has to be satisfied (Coakes, 2005), namely:

- Related pairs: Data used must be collected from related pairs, thus if you obtain a score on an X variable, there must also be a score on the Y variable from the same period
- Scale of measurement: Data should be interval or ratio in nature
- Normality: The scores for each variable should be normally distributed
- Linearity: The relationship between the two variables must be linear
- Homoscedasticity: The variability in scores for one variable is roughly the same at all values of the other variable

With all the assumptions for a simple bivariate correlation test satisfied, a Pearson product-moment correlation test was performed on both hypothesis 2 and 3.

Conversely, tests that make no assumptions about the population distribution are referred to as non-parametric tests (Leedy & Ormrod, 2005). This category of statistical testing ranks the specific variables from low to high and then analyses the ranks instead of the original data.

In addition to establishing whether the difference between the means of the two sets of scores used in Hypothesis 1 was significant, the correlation between NCA Application and Total Approval Ratio for Target Period was also determined. Seeing that NCA Application is a categorical variable and the fact that it's relationship with Total Approval Ratio for Target Period is non-linear in nature, a non-parametric analysis procedure, namely the Spearman rank-order correlation coefficient (Spearman's rho) was used instead of the parametric bivariate correlation, which is the Pearson-product-moment correlation. Spearman's rho measures the strength of an increasing or decreasing relationship between two variables and is computationally equal to Pearson's correlation, calculated on ranks instead of the original data. It sorts the values being correlated and replaces it by their rank in the sorted list. Thus the smallest value is replaced by 1, the second smallest by 2, etcetera.

With regards to the survey data collected from the secondary units of analysis, and with specific reference to Hypothesis 4, 5, & 8, the difference in the means of certain variables were established. Firstly, in the testing of Hypothesis 4, the two variables under scope were Prime Interest Rate Movement and the NCA. Secondly, Hypothesis 5 investigated the variables Motor Vehicle Retail Prices and the NCA. Thirdly, the difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus, which were identified as the main reasons for motor finance applications being declined, is tested. Seeing that the same participants performed under each level of the independent variable and not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Wilcoxon signed-rank test, was chosen instead of the paired t-test.

The Wilcoxon signed-rank test uses information about the magnitude of the differences between two variables. The absolute values of the differences are ranked from smallest to largest, and then the sum of the ranks associated with the positive differences is compared to the sum of the negative differences. Two important assumptions of the Wilcoxon signed-rank test are that the differenced data are quantitative and the distribution of the differences is symmetric.

In the case of Hypothesis 6, the difference in the views of the consumer versus those of credit analysts regarding the three variables, the NCA, Prime Interest Rates and Motor Vehicle Retail Prices, as the main impediment preventing the consumer from applying for motor finance is tested. Seeing that not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Mann-Whitney test, also referred to as the Mann-Whitney U was chosen instead of the Independent Sample t-test. The Mann-Whitney test is designed to test whether observations in one population tend to have higher values/ranks than those from the other population. The Mann-Whitney test is also performed on the ranked data, rather than on the actual values, which means that the mean ranks are compared instead of the actual mean values.

Hypothesis 7 tested the correlation between Total Household Income and the consumers' opinion regarding the NCA as the main consideration in their decision to apply or not apply for motor finance. Seeing that not all the assumptions for parametric techniques could be satisfied, a nonparametric analysis procedure, namely the Spearman rank-order correlation coefficient (Spearman's rho) was again used instead of the parametric bivariate correlation, which is the Pearson-product-moment correlation.

6.5.2.3 Selecting the desired level of significance

The implications of making a Type l error and the importance of the issue at hand will dictate the acceptable level to be set for a P-value cut-off point. Generally in management research a 90 percent confidence level is acceptable, but when a wrong decision could be very costly, a much greater confidence level is required. The accuracy or validity of the data at hand is another factor that requires consideration in the setting of a level of significance. Due to the quality of the data, this research study used a 95 percent confidence level which allows a five percent chance of a Type l error to occur. Thus, 0.05 was used as a p-value.

6.6 ETHICAL CONSIDERATIONS

'Ethics in research is involved with what is right and what is not right to do when conducting research, and forms an integrated part of any research study' (Neuman, 2000:90). As is the case in this research study, the issue of ethics especially comes to the fore when human beings form part of the research subject.

The entire research process from start to finish is encapsulated by the issue of ethics. From the nature of the problem being investigated, the reporting of the theoretical framework thereof, the context within which the research is conducted, the data collection instruments utilised, the data collection methods utilised, the research subjects, the procedure utilised to analyse the data and the way in which the data is reported (Neuman, 2000).

In particular, the research should be conducted ethically, therefore:

- The research question should be framed objectively within the theoretical framework in order to ensure confidence in the research process
- The rights and privacy of research subjects should be respected and protected
- The researcher should be sensitive to cultural and social differences of the research subjects
- All research findings should be reported objectively with full disclosure of the research methodology and the limitations of the research process (Neuman, 2000)

All respondents who agreed to participate in the current study were promised anonymity. Ethical considerations pertaining to the development phase of this study involved in particular, not posing questions that may strip the respondent of their dignity or be perceived to be discriminatory (Neuman, 2000).

With regards to the research methodology and in terms of studies that involve human beings, the issue of ethics pertains in particular to the research subjects, namely the people the study targeted. Although a researcher has the right to search for new knowledge, this cannot be done at the expense of those being studied (Neuman, 2000). In terms of the current research study, the following guidelines were applied (Neuman, 2000):

- The aims of the research was clearly communicated to all research subjects
- Participation in the research study was voluntary
- Research subjects provided written consent
- All information provided by the participants was treated as confidential and no information about any particular subject was released

6.7 CHAPTER SUMMARY

This chapter of the research study described the particular research process followed by the researcher. Different research paradigms were discussed and a positivistic, quantitative approach to the study was motivated. The application of the critical social science approach as a vantage point to improve society was stated.

The research process followed started with the stated problem to be investigated (chapter1), followed by the study of theoretical concepts and theories (chapters 2, 3, 4, and 5), and the formulation of the hypotheses to be tested during the study. The instruments and the data sources were also identified for the dependent and independent variables. The data collection instruments identified during the theoretical research (independent variables) was described as well as the data collection process and the sample design. The instruments used to collect the data, including the data collection processes was described. The analysis of the results will be reported in chapter 7 of the research study.

CHAPTER 7
RESEARCH RESULTS

7. 1 INTRODUCTION

This chapter will report on the results obtained from the empirical study. It will present historical motor finance application data collected from the primary unit of analysis, which includes 48 monthly periods, as well as certain biographical information and views on the topic recorded from the 194 respondents who participated in the two separate surveys (152 consumers and 42 motor finance credit analysts). It will focus on testing the hypothesis formulated in chapter 6 and will be dedicated to the impact assessment of the NCA, Prime Interest Rate, and Motor Vehicle Retail Prices on the South African motor finance sector.

Firstly, the historical motor finance application data collected from the primary unit of analysis was analysed using certain statistical procedures, which includes an Independent-Sample t-Test, whereby the mean difference between the approval ratios of period's pre- and post NCA application is compared. In addition to this, the Pearson product-moment correlation between each pair of variables, that is, the prime interest rate movement, new vehicle price inflation and the approval ratio, is measured in order to test the correlation between the variables in the population from which the sample was drawn. This was followed by hypothesis testing, in order to accept or reject the hypotheses stated in chapter 6.

Secondly, the survey data was analysed using descriptive statistics in order to profile respondents and to provide insight into their decision making practices with regard to motor vehicle finance. Variables/impediments that persuade the consumer not to apply for motor finance as well as those variables identified as the main reasons for motor finance applications being declined are empirically tested in order to present a consideration set for motor finance applications in the South African Motor finance sector. The information acquired from these empirical tests would be helpful in order to answer the research objectives and questions posed in previous chapters.

7.2 SECTION 1 – HISTORICAL MOTOR FINANCE DATA FROM PRIMARY UNIT OF ANALYSIS

This section considers the historical motor finance application data obtained from the primary unit of analysis and tests the relationship between the NCA, New Vehicle Price Inflation, the Prime Interest Rate, and the Approval Ratio of a medium sized motor finance institution.

7.2.1 HYPOTHESIS 1

$H0_1$:	There is no significant difference between approval ratio means for periods pre- and post NCA application
$H1_1$:	There is a significant difference between approval ratio means for periods pre- and post NCA application

In the testing of Hypothesis 1 Total Approval Ratio for Target Period is considered to be the dependent variable and NCA Not Effective / NCA Effective the independent variable. An Independent Sample t-Test was performed on the total approval ratio for the periods pre- and post NCA application in order to determine whether the difference between the means for the two sets of scores is significant.

The Independent Sample t-Test has five assumptions that were met in this instance, namely (Coakes, 2005):

- Scale of measurement: The data used for this test are at the ratio level of measurement

- Random Sampling: The scores were randomly sampled from the population of interest as every period within a twenty-four month period pre- and post NCA application was included in the test
- Normality: A box plot confirming that the sample scores are normally distributed around the mean is presented
- Independence of groups: The periods included in the test appear in only one group and the groups are unrelated
- Homogeneity of variance: Levene's test for equality of variances was used in order to confirm that the groups come from populations with equal variances

A box plot which represents information about the distribution of the approval ratio per period for the two groups namely: NCA Not Effective and NCA Effective are provided in Appendix E. In determining whether the distribution is normal, the median, which is represented by the horizontal line that runs through each box, should be positioned close to the centre of the box. In this instance it was concluded that the two distributions are normally distributed with the distribution for both groups being marginally negatively skewed with a tight spread or variability of the applicable approval ratio scores.

The group statistics shown in Table 7.1 indicate the number of months, means, standard deviations and standard errors on the Approval ratio for the target period. For the forty eight months under scope, the NCA Not Effective group recorded a mean of 40.09% versus a figure of 34.48% for the NCA Effective group. It would thus appear as if an application received prior to the NCA being effective would have had a higher probability of being approved than those received post NCA application. To determine whether the difference in mean is statistically significant though, an Independent Sample t-Test is performed as presented in Table 7.2.

Table 7.1: Group Statistics

	NCA Application	N	Mean	Std. Deviation	Std. Error Mean
Total Approval Ratio For Target Period	NCA Not Effective	24	40.0904	2.34672	.47902
	NCA Effective	24	34.4754	3.10911	.63464

Table 7.2: Independent Samples Test

		Levene's Test for Equality of Variances		t-test for Equality of Means						
									95% Confidence Interval of the Difference	
		F	Sig.	t	df	Sig. (2-tailed)	Mean Difference	Std. Error Difference	Lower	Upper
Total Approval Ratio For Target Period	Equal variances assumed	.413	.524	7.062	46	.000	5.61500	.79513	4.01448	7.21552
	Equal variances not assumed			7.062	42.785	.000	5.61500	.79513	4.01123	7.21877

To test for the homogeneity of variance, Levene's test for equality of variance is applied. In this instance the null and alternative hypothesis are as follows:

- H0: There is no significant difference between the variances of the groups
- H1: There is a significant difference between the variances of the groups

With a significance level of .524 (p>.05), H0 cannot be rejected, thus there are no significant difference between the variances of the groups, indicating that equal variances are assumed. The corresponding t-Test yielded a two-tailed significance level of .000 (p<.05). Considering the outcome of the analysis, and with specific reference to the primary unit of analysis, it would appear as if there is a significant difference in the approval ratio means of the periods pre- and post NCA application. Thus, the null hypothesis is rejected.

$H0_1$:	There is no significant difference between approval ratio means for periods pre- and post NCA application.	**REJECTED**
$H1_1$:	There is a significant difference between approval ratio means for periods pre- and post NCA application.	**ACCEPTED**

Table 7.3 and 7.4, together with Figure 7.1 represents frequency statistics provided in an attempt to validate the results obtained from the data analysis of the historical information received from the primary unit of analysis. It includes data gathered by way of self administered questionnaires completed by credit analysts from three of the four major motor finance institutions in South Africa as well as one of the leading medium sized motor finance institutions. The possible response categories were each allocated with a number ranging from 1 to 7, with the categories listed as:

(1) Increased more than 20%
(2) Increased by 10% - 19%
(3) Increased by 0% - 9%
(4) No change
(5) Decreased by 0% - 9%
(6) Decreased by 10% - 19%
(7) Decreased more than 20%

Table 7.3: Statistics Approval Ration

N	Valid	41
	Missing	1
Mean		4.95
Mode		5
Std. Deviation		.805

Table 7.3 indicates that the 41 respondents (One respondent did not complete this section of the questionnaire) scored a mean (average) of 4.95 with a mode of 5. The standard deviation figure of 0.805 indicates that the responses were clustered tightly around the mean with a relatively minor variance.

Table 7.4: Approval Ratio

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	(3) Incr. by 0% - 10%	1	2.4	2.4	2.4
	(4) No change	11	26.8	26.8	29.3
	(5) Decr. by 0% - 9%	18	43.9	43.9	73.2
	(6) Decr. by 10 - 19%	11	26.8	26.8	100.0
	Total	41	100.0	100.0	

Of the 41 respondents listed in Table 7.4, 18 (43.9%) indicated that their approval ratio declined by between 0% and 9,0% and 11 (26.8%) indicated that they've experienced no change whilst the same number of respondents 26.8% indicated a decrease of between 10,0% and 19,0%. These results are visually presented in Figure 7.1 from where it is clear that on average the approval ratios decreased by between 0% and 9,0%. These results are in line with the findings obtained from the historical data obtained from the primary unit of analysis where a mean difference of -5.6% were scored for period post NCA application compared to periods pre NCA application.

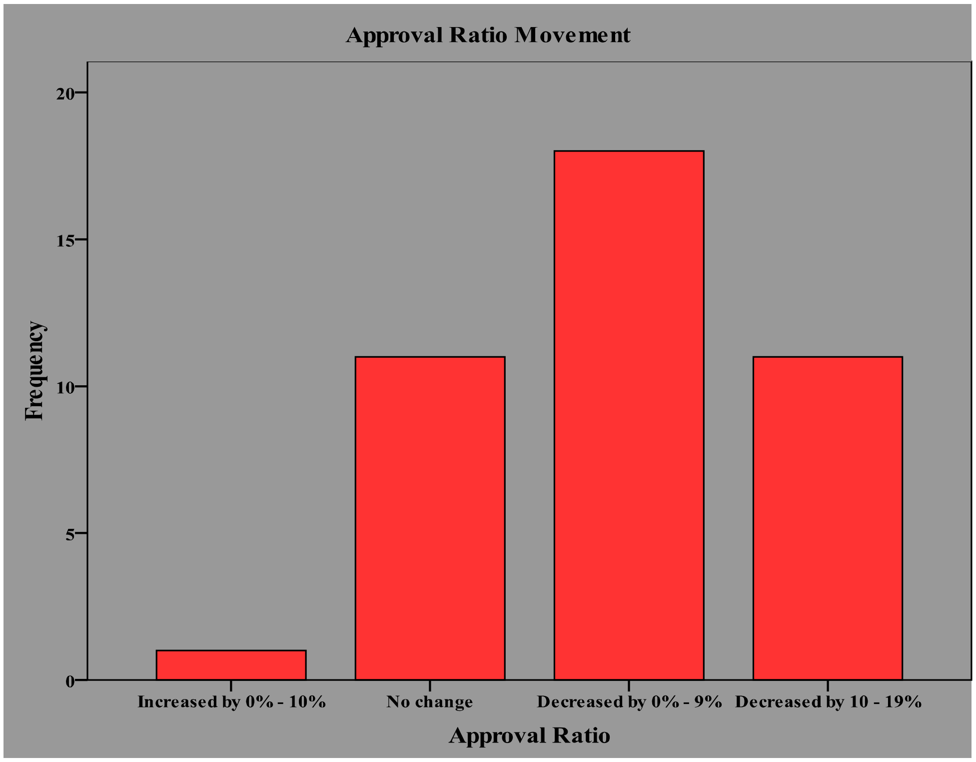


Figure 7.1: Approval Ratio Movement

The correlation between NCA Application and Total Approval Ratio for Target Period was also determined. The correlation coefficient is a statistic that is used to measure the strength of a linear association between two variables.

Correlation testing has a number of underlying assumptions that has to be satisfied (Coakes, 2005) such as:

- Related pairs: Data used must be collected from related pairs, thus if you obtain a score on an X variable, there should also be a score on the Y variable from the same period
- Scale of measurement: Data should be interval or ratio in nature
- Normality: The scores for each variable should be normally distributed
- Linearity: The relationship between the two variables must be linear
- Homoscedasticity: The variability in scores for one variable is roughly the same at all values of the other variable

Seeing that NCA Application is a categorical variable and the fact that it's relationship with Total Approval Ratio for Target Period is non-linear in nature, a non-parametric analysis procedure, namely the Spearman rank-order correlation coefficient (Spearman's rho), is used instead of the parametric bivariate correlation, which is the Pearson-product-moment correlation. Spearman's rho measures the strength of an increasing or decreasing relationship between two variables and is computationally equal to Pearson's correlation, calculated on ranks instead of the original data. It sorts the values being correlated and replaces it by their rank in the sorted list. Thus the smallest value is replaced by 1, the second smallest by 2, etcetera.

The scatterplot attached hereto in Appendix E provides a visual presentation of the relationship between the two variables in question. An analysis of the graph indicates that there appears to be a negative correlation between NCA Application and Total Approval Ratio for Target Period as the periods in which the NCA was applied, scored lower approval ratios than those periods pre NCA application.

Table 7.5: Spearman's Rank Correlation

			Total Approval Ratio For Target Period	NCA Application
Spearman's rho	Total Approval Ratio For Target Period	Correlation Coefficient	1.000	-.782**
		Sig. (1-tailed)	.	.000
		N	48	48
	NCA Application	Correlation Coefficient	-.782**	1.000
		Sig. (1-tailed)	.000	.
		N	48	48

Table 7.5 represents the Spearman's rank correlation and from the information gathered from the test, and with specific reference to the primary unit of analysis, there appear to be a strong negative correlation between NCA Application and Total Approval Ratio for Target Period, $\underline{r}(48) = -.782$, $p < .05$. Thus NCA application is associated with lower approval ratios.

7.2.2 HYPOTHESIS 2

In the case of Hypothesis 2, the correlation between Prime Interest Rate Movement and Total Approval Ratio for Target Period is determined. For a simple bivariate correlation to be tested, the variables tested have to comply with the underlying assumptions as stated in section 7.2.1.

$H0_2$:	There is no relationship between the prime interest rate and the approval ratio of new motor finance applications
$H1_2$:	There is a relationship between the prime interest rate and the approval ratio of new motor finance applications

The two variables under scope comply with the first two assumptions as the data is collected from related pairs and is ratio in nature. As far as normality is concerned, Boxplots and Normal Q-Q plots are provided in Appendix F. The Box plot indicates that the distribution for Total Approval Ratio for Target Period is normally distributed around the mean, marginally positively skewed with a tight spread or variability of the applicable approval ratio scores. This observation for normality is confirmed by the Normal Q-Q plot as all the cases falls more or less in a straight line.

As far as Prime Interest Rate Changes are concerned, the boxplot indicates that the distribution is normal around the mean, marginally positively skewed with a wide spread or variability of the applicable Prime Interest Rate scores. This observation for normality is again confirmed by the Normal Q-Q plot as all the cases falls more or less in a straight line.

The assumptions regarding linearity and homoscedasticity are satisfied by way of a scatterplot also presented in Appendix F. It is important to confirm the linear nature of the correlation with a scatterplot as it is possible for a correlation coefficient to appear important although an examination of the data may indicate otherwise. An analysis of the scatterplot indicates that there is a linear relationship between the two variables. Given that the points cluster uniformly around the regression line, the assumption of homoscedasticity has also not been violated. With all the assumptions for a simple bivariate correlation test satisfied, a Pearson product-moment correlation test was performed.

Table 7.6: Correlations

		Total Approval Ratio For Target Period	Prime Rate Changes
Total Approval Ratio For Target Period	Pearson Correlation	1	-.742
	Sig. (1-tailed)		.000
	N	48	48
Prime Rate Changes	Pearson Correlation	-.742	1
	Sig. (1-tailed)	.000	
	N	48	48

By examining the correlation coefficient in Table 7.6 and its associated significance value (p), the results of the scatterplot is confirmed as, with specific reference to the primary unit of analysis, it appears as though a strong negative correlation exist between Total Approval Ratio for Target Period and Prime Interest Rate Changes, seeing that ($r = -.742$, $p < .05$). Thus, higher prime interest rates are associated with lower approval ratios.

$H0_2$:	There is no relationship between the prime interest rate and the approval ratio of new motor finance applications	**REJECTED**
$H1_2$:	There is a relationship between the prime interest rate and the approval ratio of new motor finance applications	**ACCEPTED**

7.2.3 HYPOTHESIS 3

In the case of Hypothesis 3, the correlation between New Car Price Inflation and Total Approval Ratio for Target Period is determined. As stated previously, for a simple bivariate correlation to be tested, the variables tested have to comply with the underlying assumptions as stated in section 7.2.1.

$H0_3$:	There is no relationship between motor vehicle retail prices and the approval ratio of new motor finance applications
$H1_3$:	There is a relationship between motor vehicle retail prices and the approval ratio of new motor finance applications

The two variables under scope comply with the first two assumptions as the data is collected from related pairs and is ratio in nature. As far as normality is concerned, Boxplots and Normal Q-Q plots are provided in Appendix G.

As proved in section 7.2.1, the distribution for Total Approval Ratio for Target Period is normally distributed around the mean, and marginally positively skewed with a tight spread or variability of the applicable approval ratio scores. This observation for normality was also previously confirmed by the Normal Q-Q plot as presented in Appendix F as all the cases fell more or less in a straight line.

As far as New Car Price Inflation is concerned, the box plot indicates that the distribution is normal around the mean, marginally positively skewed with a wide spread or variability of the applicable New Car Price Inflation scores. This observation for normality is confirmed by the Normal Q-Q plot as all the cases falls more or less in a straight line.

The assumptions regarding linearity and homoscedasticity are satisfied by way of a scatterplot also presented in Appendix G. As indicated earlier in section 7.2.1, it is important to confirm the linear nature of the correlation with a scatterplot as it is possible for a correlation coefficient to appear important although an examination of the data may indicate otherwise. An analysis of the Scatterplot indicates that there is a linear relationship between the two variables. Given that the points cluster uniformly around the regression line, the assumption of homoscedasticity has also not been violated. With all the assumptions for a simple bivariate correlation test satisfied, a Pearson product-moment correlation test was performed.

Table 7.7: Correlations

		Total Approval Ratio For Target Period	New Car Price Inflation
Total Approval Ratio For Target Period	Pearson Correlation	1	-.835
	Sig. (1-tailed)		.000
	N	48	48
New Car Price Inflation	Pearson Correlation	-.835	1
	Sig. (1-tailed)	.000	
	N	48	48

By examining the correlation coefficient in Table 7.7 and its associated significance value (p), the results of the scatterplot presented in Appendix G is confirmed as there, with specific reference to the primary unit of analysis, appears as though a strong negative correlation exist between Total Approval Ratio for Target Period and New Car Price Inflation ($r = -.835$, $p < .05$). Thus, higher new car price inflation is associated with lower approval ratios.

$H0_3$:	There is no relationship between motor vehicle retail prices and the approval ratio of new motor finance applications	**REJECTED**
$H1_3$:	There is a relationship between motor vehicle retail prices and the approval ratio of new motor finance applications	**ACCEPTED**

7.2.4 SUMMARY OF SECTION 1

This section of the analysis was based on the historical motor finance application data collected from the primary unit of analysis which were analysed using certain statistical procedures, which included an Independent-Sample t-Test, whereby the mean difference between the approval ratios of period's pre- and post NCA application were compared. In addition to this, the Pearson product-moment correlation between each pair of variables, for example Prime Interest Rate Movement, New Vehicle Price Inflation and the Approval Ratio, was measured in order to test the correlation between the variables in the population from which the sample was drawn. This was followed by hypothesis testing, in order to accept or reject the hypotheses stated earlier.

The hypothesis testing results, with specific reference to the primary unit of analysis, can be summarised as follows:

- A statistically significant difference exists between the approval ratio means for periods pre- and post NCA application
- There is a relationship between application of the NCA and the amount of motor finance granted in that NCA application is associated with lower approval ratios
- There is a relationship between the prime interest rate and the amount of motor finance granted in that higher prime interest rates are associated with lower approval ratios
- There is a relationship between motor vehicle retail prices and the amount of motor finance granted in that higher new car price inflation is associated with lower approval ratios

- Although the strength of the three correlations were very similar, it was determined that motor vehicle retail prices attained the strongest correlation score, followed by the NCA and the prime interest rate respectively

7.3 SECTION 2 – SURVEY DATA ANALYSIS

This section considered the survey data collected from the secondary units of analysis and tested for variables viewed as having a major impact on the amount of motor finance granted in the South African motor finance sector. The data is firstly explored using descriptive statistics and certain general observations are made. Frequency Tables presenting statistical information, for instance, the amount of valid and missing cases, the mean, the median, the standard deviation, and the total number of cases falling within a specific section is provided. The information is also presented visually by way of bar charts.

7.3.1 SUMMARY OF VARIABLES IMPACTING ON THE AMOUNT OF MOTOR FINANCE GRANTED

Frequency statistics on those variables identified as having an influence over the amount of motor finance granted in South Africa is presented in Table 7.8 through 7.13. The data obtained from the 194 valid cases, which includes the 42 credit analysts as they are also ultimately consumers, indicated that Living Costs had the highest mean (average), with a figure of 4.62. Next were Motor Vehicle Retail Prices, the Prime Interest Rate, the NCA, and finally Fuel Prices.

Table 7.8: Measures of Central Tendency and Variability

		Prime Interest Rate	Motor Vehicle Retail Prices	NCA	Fuel Price	Living Costs
N	Valid	194	194	194	194	194
	Missing	0	0	0	0	0
Mean		4.36	4.57	4.16	3.26	4.62
Mode		6	5	5	2	5
Std. Deviation		1.588	1.410	1.520	1.525	1.338

The Standard Deviation, which is an indication of the average distance from the mean, reflects that the respondents had the highest degree of concurrence regarding the impact of Living Costs on the consumers' ability to secure motor finance. The smaller the Standard Deviation, the closer the data lies to the mean, thus the tighter the spread of the data is. The data for the remaining four variables were very similar, with Prime Interest Rates scoring the highest Standard Deviation, followed by Fuel Prices, the NCA, and finally Motor Vehicle Retail Prices.

Table 7.9: Prime Interest Rate

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	12	6.2	6.2	6.2
	Disagree	23	11.9	11.9	18.0
	Somewhat Disagree	16	8.2	8.2	26.3
	Somewhat Agree	39	20.1	20.1	46.4
	Agree	40	20.6	20.6	67.0
	Strongly Agree	64	33.0	33.0	100.0
	Total	194	100.0	100.0	

From Table 7.9 and Figure 7.2, which present a frequency table and bar chart, it is clear that out of the 194 valid cases, 64 (33%) strongly agreed that the prime interest rate was the main impediment in the consumers' decision to apply or not apply for motor finance. Those that agreed came to 40 (20.6%), with 39 (20.1%) indicating that they somewhat agreed with the statement. Therefore almost three quarters (73.7%) shared the view that the prime Interest rate was the main impediment in the consumer's decision to apply for motor finance.

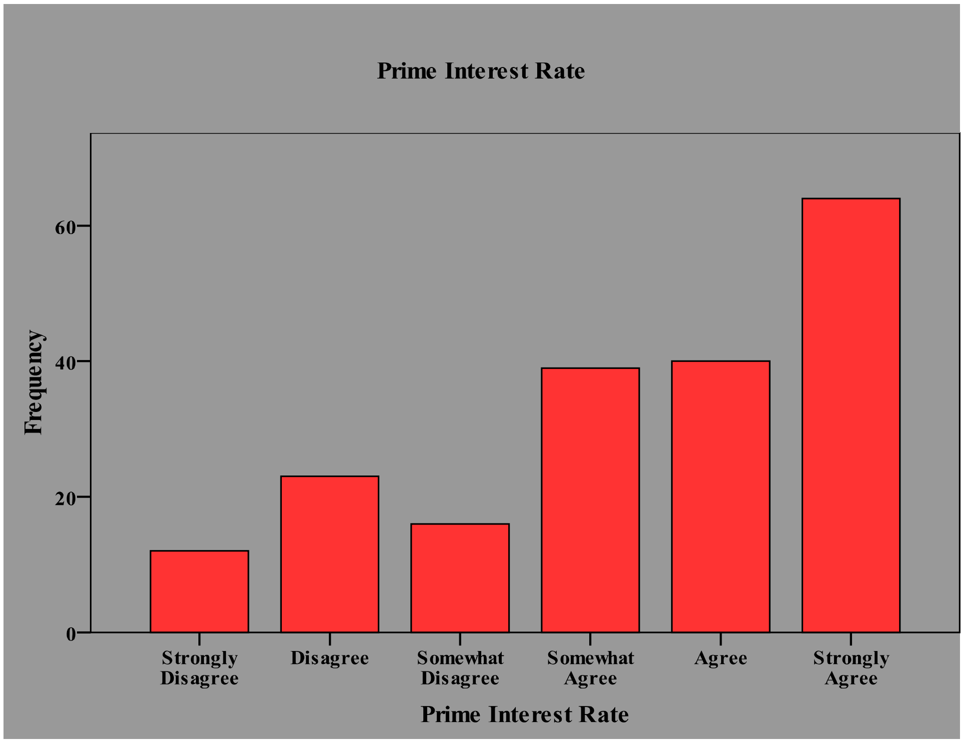


Figure 7.2: Prime Interest Rate

Table 7.10: Motor Vehicle Retail Prices

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	10	5.2	5.2	5.2
	Disagree	9	4.6	4.6	9.8
	Somewhat Disagree	22	11.3	11.3	21.1
	Somewhat Agree	32	16.5	16.5	37.6
	Agree	62	32.0	32.0	69.6
	Strongly Agree	59	30.4	30.4	100.0
	Total	194	100.0	100.0	

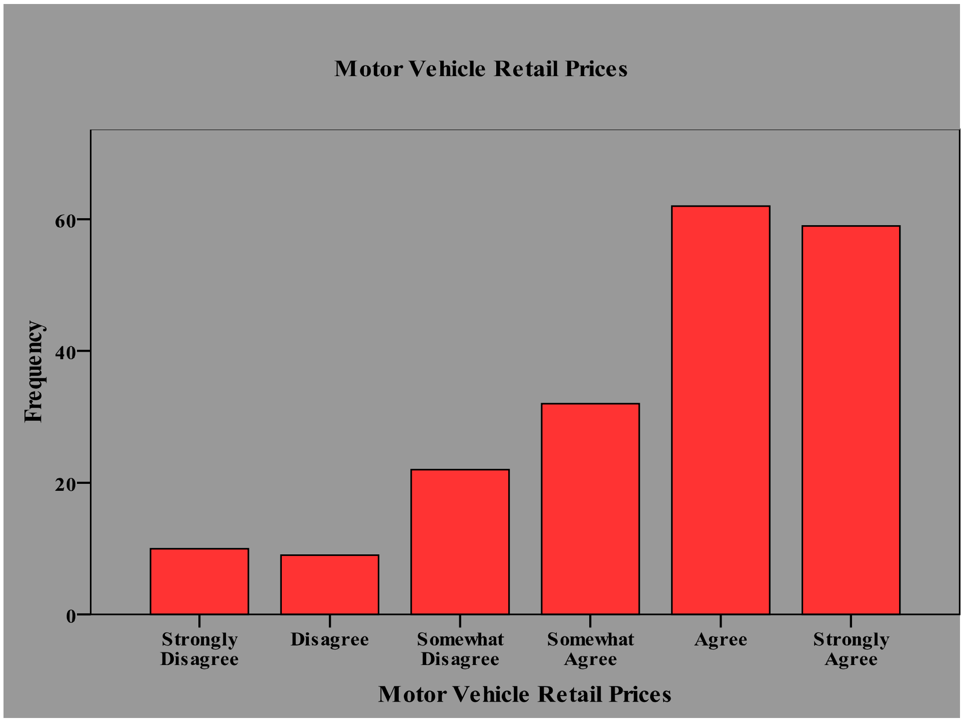


Figure 7.3: Motor Vehicle Retail Prices

From Table 7.10 and Figure 7.3, it is derived that of the 194 valid cases, almost two thirds (62.4%) shared the opinion that motor vehicle retail prices were the main impediment in the consumers' decision to apply or not apply for motor finance.

Table 7.11: NCA

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	16	8.2	8.2	8.2
	Disagree	16	8.2	8.2	16.5
	Somewhat Disagree	24	12.4	12.4	28.9
	Somewhat Agree	45	23.2	23.2	52.1
	Agree	51	26.3	26.3	78.4
	Strongly Agree	42	21.6	21.6	100.0
	Total	194	100.0	100.0	

From Table 7.11 and Figure 7.4, it is concluded that of the 194 valid cases, almost three quarters (71.1%) shared the opinion that the NCA was the main impediment in the consumers' decision to apply or not apply for motor finance.

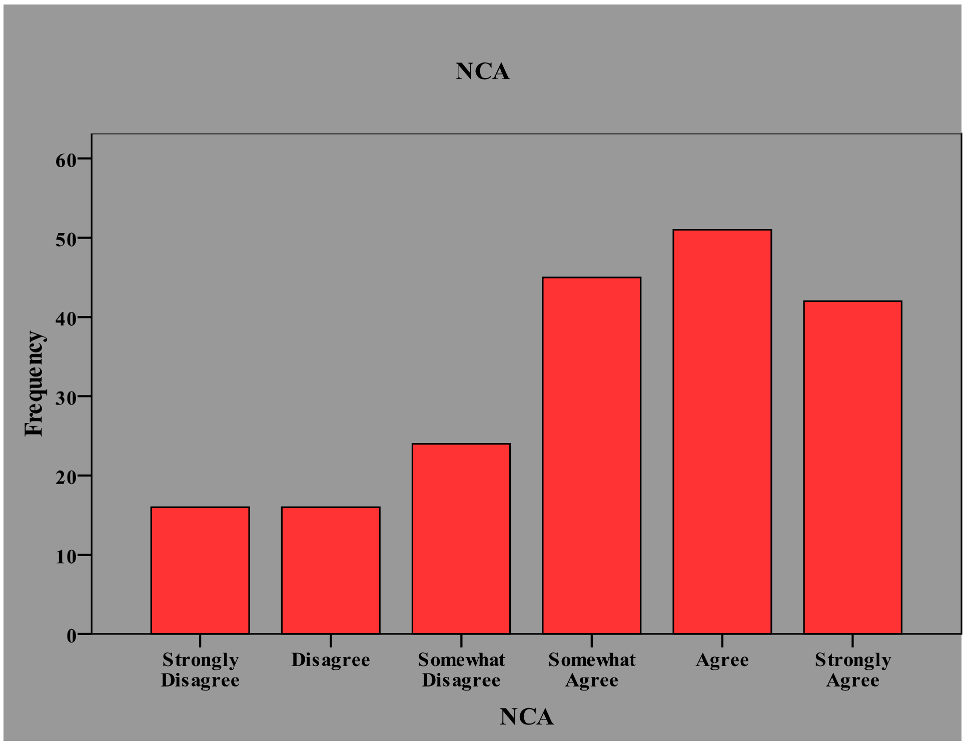


Figure 7.4: NCA

Table 7.12: Fuel Price

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	22	11.3	11.3	11.3
	Disagree	53	27.3	27.3	38.7
	Somewhat Disagree	39	20.1	20.1	58.8
	Somewhat Agree	33	17.0	17.0	75.8
	Agree	27	13.9	13.9	89.7
	Strongly Agree	20	10.3	10.3	100.0
	Total	194	100.0	100.0	

From Table 7.12 and Figure 7.5, it is derived that of the 194 valid cases, almost two thirds (58.7%) shared the opinion that the fuel price was not the main impediment in the consumers' decision to apply or not apply for motor finance.

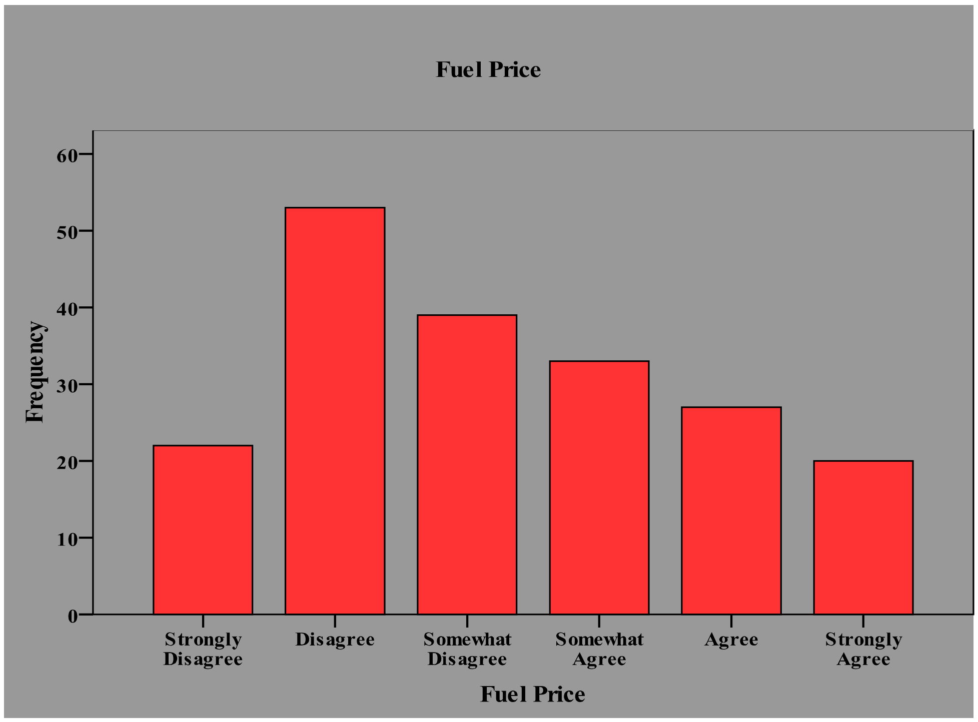


Figure 7.5: Fuel Price

Table 7.13: Living Costs

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	8	4.1	4.1	4.1
	Disagree	10	5.2	5.2	9.3
	Somewhat Disagree	14	7.2	7.2	16.5
	Somewhat Agree	41	21.1	21.1	37.6
	Agree	63	32.5	32.5	70.1
	Strongly Agree	58	29.9	29.9	100.0
	Total	194	100.0	100.0	

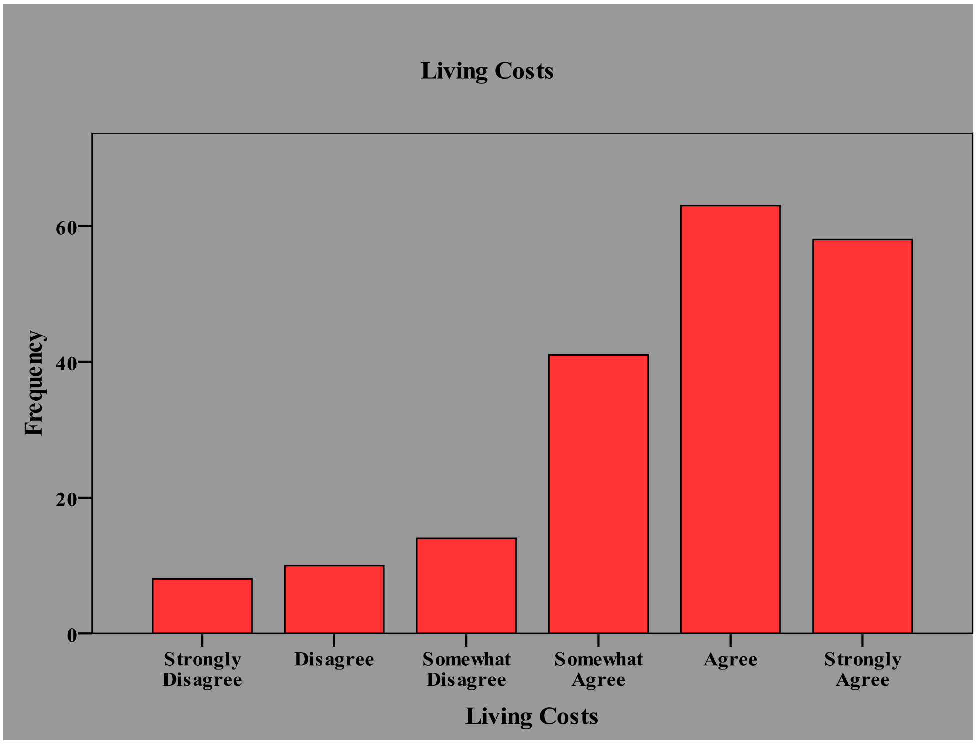


Figure 7.6: Living Cost

From Table 7.13 and Figure 7.6, it is concluded that of the 194 valid cases, 83.5% shared the view that living costs were the main impediment in the consumers' decision to apply or not apply for motor finance.

7.3.2 HYPOTHESIS 4

In the case of Hypothesis 4, the difference in the means of the variables Prime Interest Rate Movement and the NCA is determined. Seeing that the same participants performed under each level of the independent variable and not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Wilcoxon signed-rank test, was opted for instead of the paired t-test.

$H0_4$:	There is not a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance
$H1_4$:	There is a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance

The Wilcoxon signed-rank test uses information about the magnitude of the differences between two variables. The absolute values of the differences are ranked from smallest to largest, and then the sum of the ranks associated with the positive differences is compared to the sum of the negative differences. Two important assumptions of the Wilcoxon signed-rank test are that the differenced data are quantitative and the distribution of the differences is symmetric.

The data being captured as Likert scale items, ranging from 1 to 6 satisfies the first assumption. The symmetry of the distribution difference is demonstrated through a box plot and a normal Q-Q plot presented in Appendix H. The Q-Q plot indicates that the distribution is symmetric and linear in the middle of the distribution. The box plot also indicates that the distribution is almost perfectly symmetrical, with zero skewness being observed.

Table 7.14: Descriptive Statistics

	N	Mean	Std. Deviation	Minimum	Maximum
Prime Interest Rate	194	4.36	1.588	1	6
NCA	194	4.16	1.520	1	6

Table 7.14 is an extract of Table 7.8 presented in section 7.3.1 and represents certain descriptive statistics used in the analysis of the Wilcoxon signed-rank test. What is clear from Table 7.14 is that the mean for Prime Interest Rate is marginally higher than

that of the NCA. Thus it appears as if the prime interest rate is regarded as having a larger influence over the consumer's decision whether to finance a motor vehicle or not. From Table 7.15 it is clear that the prime interest rate measured a higher score than the NCA on 74 occasions and the reverse was true on only 55 occasions. The significance of this difference still needs to be tested though.

Table 7.15: Ranks

		N	Mean Rank	Sum of Ranks
NCA – Prime Interest Rate	Negative Ranks	74[a]	66.55	4925.00
	Positive Ranks	55[b]	62.91	3460.00
	Ties	65[c]		
	Total	194		

a. NCA < Prime Interest Rate

b. NCA > Prime Interest Rate

c. NCA = Prime Interest Rate

The result of the Wilcoxon signed-rank test produced in Table 7.16 turned out not to be significant at the 0.05 level with a figure of .078. Thus it can be stated that there is not a statistically significant difference in the means of the variables Prime Interest Rate Movement and the NCA.

Table 7.16: Test Statistics[b]

	NCA – Prime Interest Rate
Z	-1.765[a]
Asymp. Sig. (2-tailed)	.078

a. Based on positive ranks.

b. Wilcoxon Signed Ranks Test

$H0_4$:	There is not a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance **ACCEPTED**
$H1_4$:	There is a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance **REJECTED**

7.3.3 HYPOTHESIS 5

In the case of Hypothesis 5, the difference in the means of the variables Vehicle Retail Prices and the NCA is determined. Seeing that the same participants, similar to hypothesis 4 earlier on, performed under each level of the independent variable and not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Wilcoxon signed-rank test, was again opted for instead of the paired t-test.

Two important assumptions of the Wilcoxon signed-rank test, as stated earlier, are that the differenced data are quantitative and the distribution of the differences is symmetric.

$H0_5$:	There is not a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance
$H1_5$	There is a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance

The data being captured as Likert scale items, ranging from 1 to 6 satisfies the first assumption. The symmetry of the distribution difference is again demonstrated through a box plot and a normal Q-Q plot presented in Appendix I. The Q-Q plot indicates that the distribution is symmetric and linear in the middle of the distribution. The box plot also indicates that the distribution is almost perfectly symmetrical, with zero skewness being observed.

Table 7.17: Descriptive Statistics

	N	Mean	Std. Deviation	Minimum	Maximum
Motor Vehicle Retail Prices	194	4.57	1.410	1	6
NCA	194	4.16	1.520	1	6

What is clear from Table 7.17 is that the mean for Motor Vehicle Retail Prices is marginally higher than that of the NCA. Thus it appears as if Motor Vehicle Retail Prices are regarded as having a larger influence over the consumer's decision whether to finance a motor vehicle or not. From Table 7.18 it is evident that Motor Vehicle Retail Prices measured a higher score than the NCA on 85 occasions and the reverse was true on only 50 occasions. The significance of this difference still needs to be tested though.

Table 7.18: Ranks

		N	Mean Rank	Sum of Ranks
NCA - Motor Vehicle Retail Prices	Negative Ranks	85[a]	70.06	5955.50
	Positive Ranks	50[b]	64.49	3224.50
	Ties	59[c]		
	Total	194		

a. NCA < Motor Vehicle Retail Prices

b. NCA > Motor Vehicle Retail Prices

c. NCA = Motor Vehicle Retail Prices

Table 7.19: Test Statistics[b]

	NCA – Motor Vehicle Retail Prices
Z	-3.047[a]
Asymp. Sig. (2-tailed)	.002

a. Based on positive ranks.

b. Wilcoxon Signed Ranks Test

The result of the Wilcoxon signed-rank test produced in Table 7.19 turned out to be significant at the 0.05 level with a figure of .002. Thus it can be stated that there is a statistically significant difference in the means of the variables Motor Vehicle Retail Prices and the NCA, with motor vehicle retail prices being considered to have a larger influence than the NCA when it comes to the consumers' decision to finance a motor vehicle or not.

$H0_5$:	There is not a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance **REJECTED**
$H1_5$	There is a statistically significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance **ACCEPTED**

7.3.4 HYPOTHESIS 6

In the case of Hypothesis 6, the difference in the views of the consumer versus those of credit analysts regarding the three variables, the NCA, Prime Interest Rates and Motor Vehicle Retail Prices, as the main impediment preventing the consumer from applying for motor finance is tested.

$H0_6$:	There is not a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, prime interest rates and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance
$H1_6$:	There is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, prime interest rates and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance

The data is firstly explored using descriptive statistics and certain general observations are made. Frequency Tables presenting statistical information, for instance, the amount of valid and missing cases, the mean, the mode, the standard deviation, and the total number of cases falling within a specific section is provided. The information is also presented visually by way of bar charts. Frequency statistics on those variables identified as having an influence over the amount of motor finance granted in South Africa is presented in Table 7.20 through 7.30.

Secondly, seeing that not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Mann-Whitney test, also referred to as the Mann-Whitney U was chosen instead of the Independent Sample t-test. The Mann-Whitney test is designed to test whether observations in one population tend to have higher values/ranks than those from the other population.

With reference to Table 7.20, the data obtained from the 152 consumer cases scored a mean of 4.80 for the Prime Interest Rate versus a mean of 2.76 scored by the 42 credit analysts. As far as Motor Vehicle Retail Prices are concerned, the consumer scored a mean of 4.84 compared to the 3.60 scored by the credit analysts. On the subject of the NCA, the consumer scored a mean of 4.55 versus a mean of 2.76 scored by the credit analysts. From the statistics summarised in Table 7.20 it is clear that a difference do exist between the views of consumers versus those of credit analysts, but whether the difference is statistically significant still needs to be established though.

Table 7.20: Group Statistics

	Designation	N	Mean	Std. Deviation	Std. Error Mean
Prime Interest Rate	Consumer	152	4.80	1.372	.111
	Credit Analyst	42	2.76	1.265	.195
Motor Vehicle Retail Prices	Consumer	152	4.84	1.299	.105
	Credit Analyst	42	3.60	1.380	.213
NCA	Consumer	152	4.55	1.366	.111
	Credit Analyst	42	2.76	1.206	.186

As explained in section 7.2.1, the Standard Deviation is an indication of the average distance from the mean. The smaller the Standard Deviation, the closer the data clusters around the mean. Both groups scored small standard deviations on all three areas, thus indicating that there was a very small margin of variance between the responses of the participants from the different groups. Table 7.21 through 7.24, together with Figure 7.7 through 7.9, presents the frequency statistics and bar charts of the consumer responses for the three variables under review.

Table 7.21: Consumer Statistics

		Prime Interest Rate	Motor Vehicle Retail Prices	NCA
N	Valid	152	152	152
	Missing	0	0	0
Mean		4.80	4.84	4.55
Mode		6	6	5
Std. Deviation		1.372	1.299	1.366

Table 7.21 indicates that according to the consumer's view, Motor Vehicle Retail Prices, with a mean of 4.84 has the biggest influence over their decision whether to finance a motor vehicle or not, followed by the Prime Interest Rate and then the NCA. The mode, which is the option most frequently selected in the survey, was 6 (Strongly Agree) for both the Prime Interest Rate and Motor Vehicle Retail Prices, and 5 (Agree) for the NCA.

From Table 7.22 and Figure 7.7, which present a frequency table and bar chart, it is clear that out of the 152 valid consumer cases, 84.5% shared the opinion that the Prime Interest Rate was the main impediment in the consumers' decision to apply or not apply for motor finance.

Table 7.22: Consumer's view regarding Prime Interest Rate

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	6	3.9	3.9	3.9
	Disagree	7	4.6	4.6	8.6
	Somewhat Disagree	10	6.6	6.6	15.1
	Somewhat Agree	28	18.4	18.4	33.6
	Agree	38	25.0	25.0	58.6
	Strongly Agree	63	41.4	41.4	100.0
	Total	152	100.0	100.0	

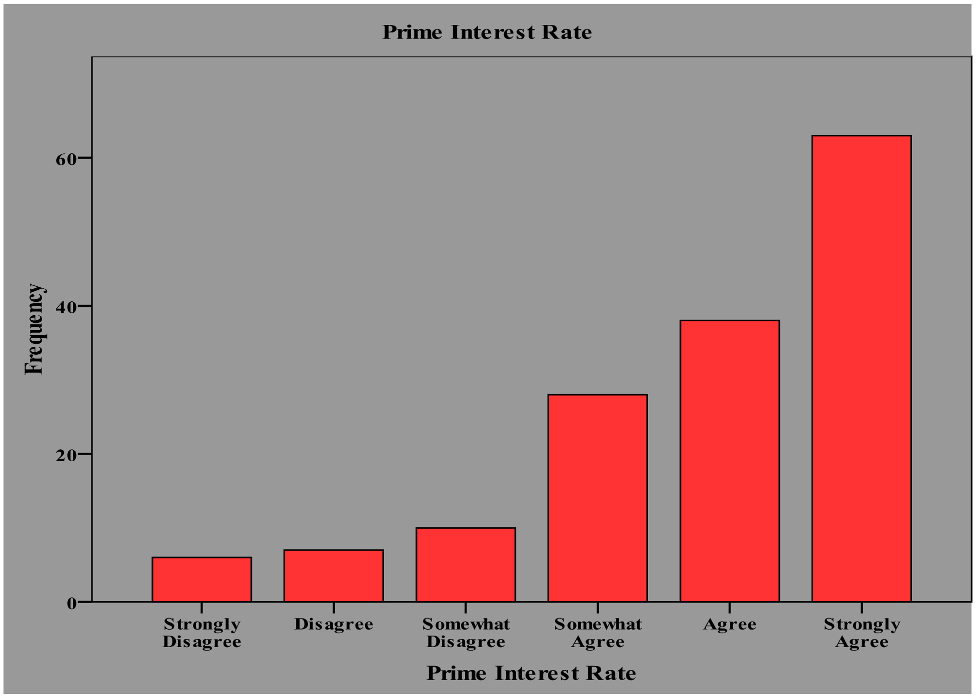


Figure 7.7: Consumer's view regarding Prime interest rate

From Table 7.23 and Figure 7.8, which present a frequency table and bar chart, it is clear that out of the 152 valid consumer cases, 85.6% shared the view that Motor Vehicle Retail Prices were the main impediment in the consumers' decision to apply or not apply for motor finance.

Table 7.23: Consumer's view regarding Motor Vehicle Retail Prices

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	6	3.9	3.9	3.9
	Disagree	4	2.6	2.6	6.6
	Somewhat Disagree	12	7.9	7.9	14.5
	Somewhat Agree	22	14.5	14.5	28.9
	Agree	51	33.6	33.6	62.5
	Strongly Agree	57	37.5	37.5	100.0
	Total	152	100.0	100.0	

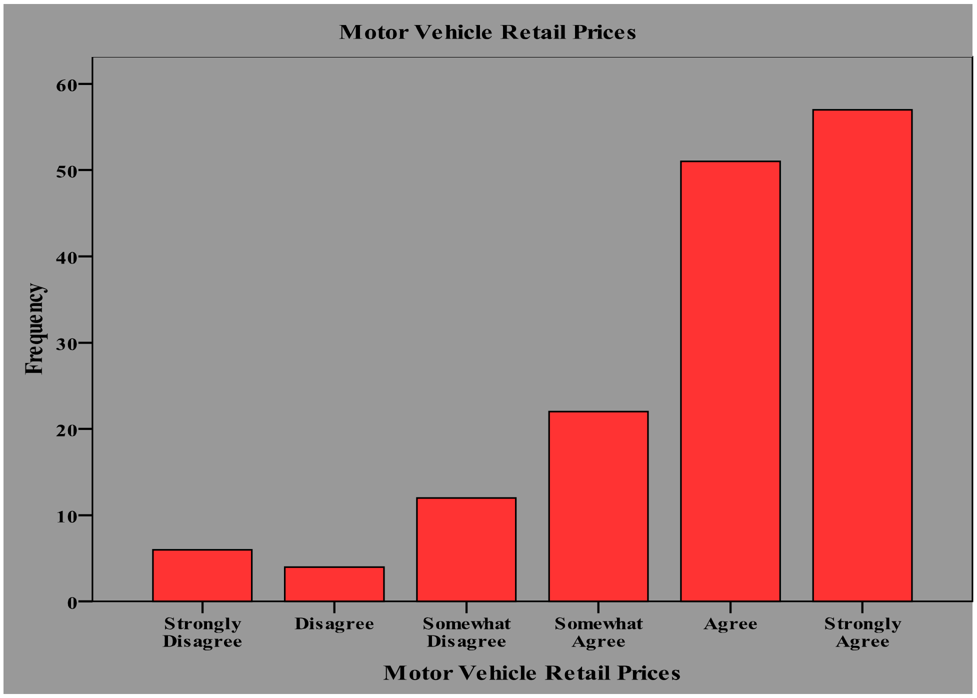


Figure 7.8: Consumer's view regarding Motor vehicle retail prices

From Table 7.24 and Figure 7.9, which present a frequency table and bar chart, it is clear that out of the 152 valid consumer cases, 83.6% shared the opinion that the NCA was the main impediment in the consumers' decision to apply or not apply for motor finance.

Table 7.24: Consumer's view regarding the NCA

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	8	5.3	5.3	5.3
	Disagree	8	5.3	5.3	10.5
	Somewhat Disagree	9	5.9	5.9	16.4
	Somewhat Agree	36	23.7	23.7	40.1
	Agree	50	32.9	32.9	73.0
	Strongly Agree	41	27.0	27.0	100.0
	Total	152	100.0	100.0	

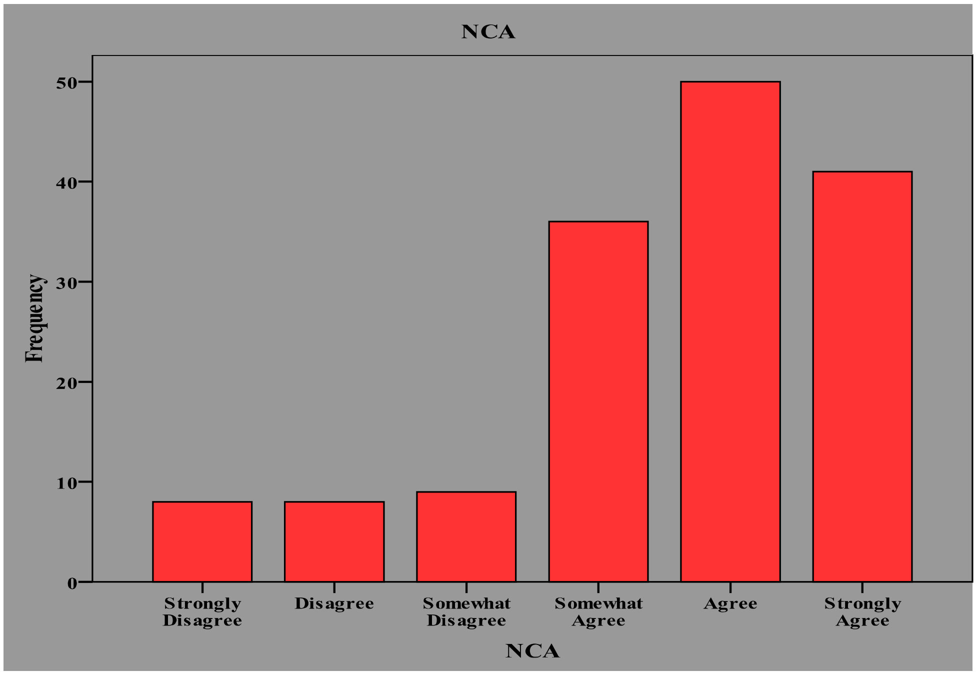


Figure 7.9: Consumer's view regarding the NCA

Table 7.25 through 7.28, together with Figure 7.10 through 7.12, presents the frequency statistics and bar charts of the credit analyst responses for the three variables under review.

Table 7.25: Credit Analyst Statistics

		Prime Interest Rate	Motor Vehicle Retail Prices	NCA
N	Valid	42	42	42
	Missing	0	0	0
Mean		2.76	3.60	2.76
Mode		2	5	3
Std. Deviation		1.265	1.380	1.206

Table 7.25 indicates that according to the 42 credit analysts who participated in the survey, Motor Vehicle Retail Prices, with a mean of 3.6 is the main impediment in the consumer's decision whether to finance a motor vehicle or not, followed by the Prime Interest Rate and the NCA both with a mean score of 2.76. The mode, which is the

option most frequently selected in the survey, was 5 (Agree) for Motor Vehicle Retail Prices, 3 (Somewhat disagree) for the NCA, and 2 (Disagree) for the Prime Interest Rate.

Table 7.26: Credit Analyst's view regarding the Prime Interest Rate

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	6	14.3	14.3	14.3
	Disagree	16	38.1	38.1	52.4
	Somewhat Disagree	6	14.3	14.3	66.7
	Somewhat Agree	11	26.2	26.2	92.9
	Agree	2	4.8	4.8	97.6
	Strongly Agree	1	2.4	2.4	100.0
	Total	42	100.0	100.0	

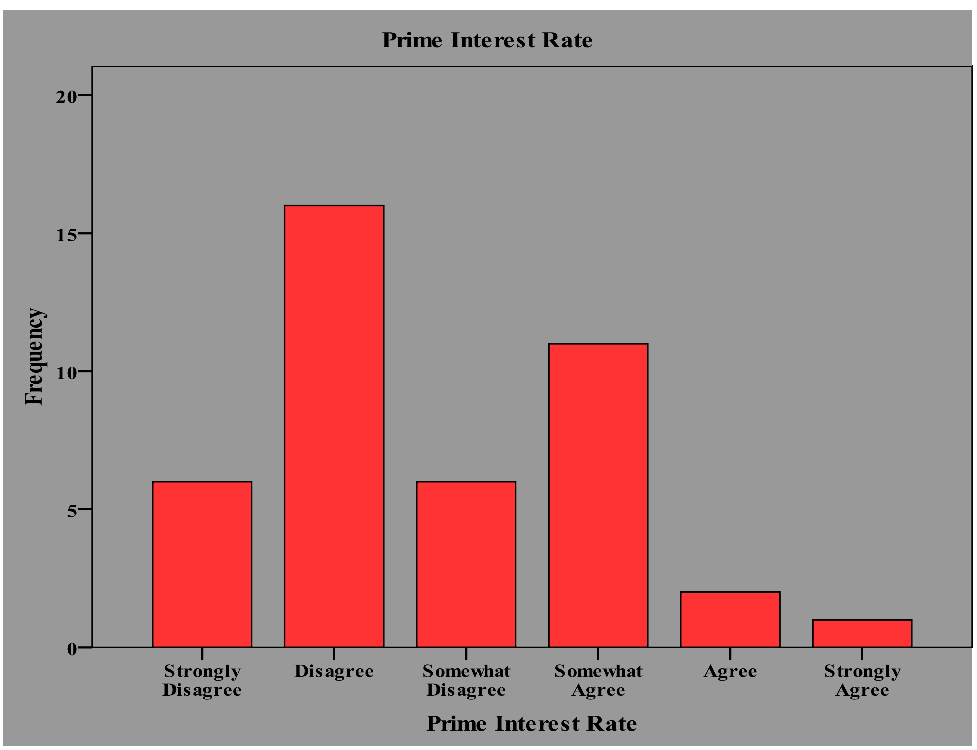


Figure 7.10: Credit Analyst's view regarding the Prime Interest Rate

From Table 7.26 and Figure 7.10, which present a frequency table and bar chart, it is clear that out of the 42 valid credit analyst cases, two thirds disagreed (66.7%) that the Prime Interest Rate was the main impediment in the consumers' decision to apply or not apply for motor finance.

From Table 7.27 and Figure 7.11 it is clear that out of the 42 valid credit analyst cases, the percentage agreeing and disagreeing reflect an opinion that is marginally leaning toward agreeing. This reveals somewhat a divided opinion.

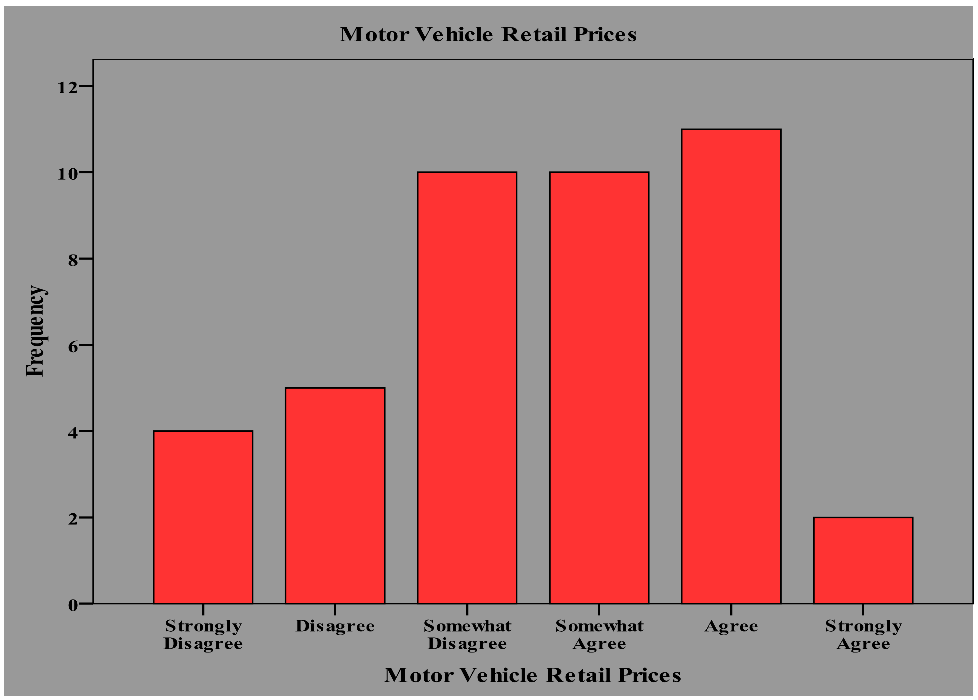


Figure 7.11: Credit Analyst's view regarding Motor Vehicle Retail Prices

Table 7.27: Credit Analyst's view regarding Motor Vehicle Retail Prices

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	4	9.5	9.5	9.5
	Disagree	5	11.9	11.9	21.4
	Somewhat Disagree	10	23.8	23.8	45.2
	Somewhat Agree	10	23.8	23.8	69.0
	Agree	11	26.2	26.2	95.2
	Strongly Agree	2	4.8	4.8	100.0
	Total	42	100.0	100.0	

From Table 7.28 and Figure 7.12, it is clear that out of the 42 valid credit analyst cases, almost three quarters (73.7%) shared the view that the NCA was not the main impediment in the consumers' decision to apply or not apply for motor finance.

Table 7.28: Credit Analyst's view regarding the NCA

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	Strongly Disagree	8	19.0	19.0	19.0
	Disagree	8	19.0	19.0	38.1
	Somewhat Disagree	15	35.7	35.7	73.8
	Somewhat Agree	9	21.4	21.4	95.2
	Agree	1	2.4	2.4	97.6
	Strongly Agree	1	2.4	2.4	100.0
	Total	42	100.0	100.0	

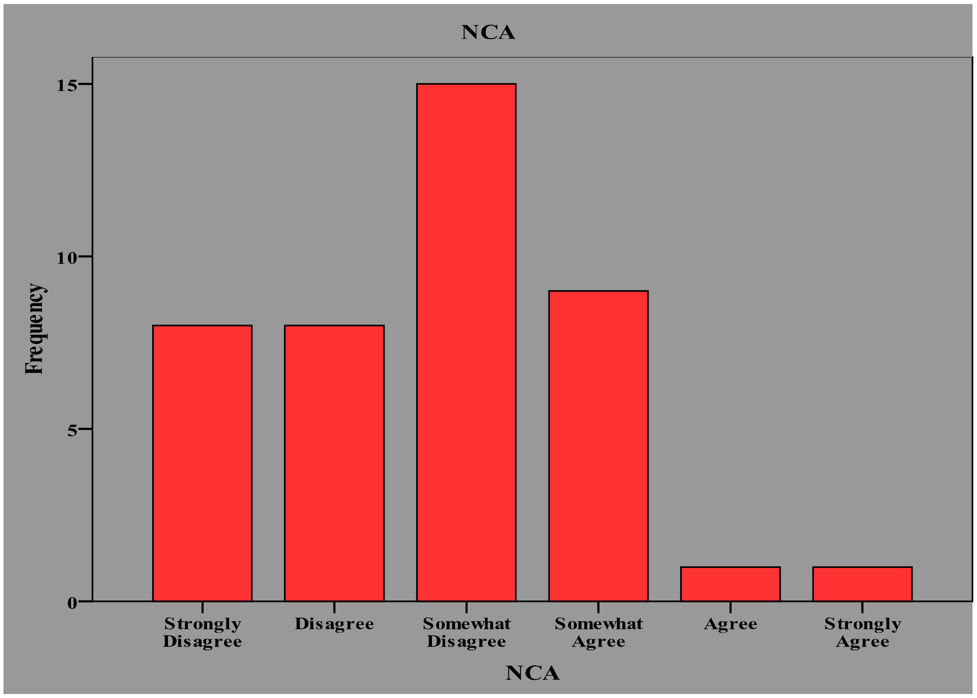


Figure 7.12: Credit Analyst's view regarding the NCA

The Mann-Whitney test is performed on the ranked data (Table 7.29), rather than on the actual values, which means that the mean ranks are compared instead of the actual mean values.

Table 7.29: Ranks

	Designation	N	Mean Rank	Sum of Ranks
Prime Interest Rate	Consumer	152	112.28	17066.50
	Credit Analyst	42	44.01	1848.50
	Total	194		
Motor Vehicle Retail Prices	Consumer	152	108.28	16458.50
	Credit Analyst	42	58.49	2456.50
	Total	194		
NCA	Consumer	152	111.66	16972.00
	Credit Analyst	42	46.26	1943.00
	Total	194		

Table 7.30: Mann-Whitney U Test Statistics

	Prime Interest Rate	Motor Vehicle Retail Prices	NCA
Mann-Whitney U	945.500	1553.500	1040.000
Wilcoxon W	1848.500	2456.500	1943.000
Z	-7.176	-5.266	-6.833
Asymp. Sig. (2-tailed)	.000	.000	.000

From the Mann-Whitney test presented in Table 7.30 it can be derived that firstly, with a number of: $z = -7.176$, $p < 0.05$, secondly, with a number of $z = -5.266$, $p < 0.05$, and thirdly, with a number of $z = -6.833$, $p < 0.05$, there is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the Prime Interest Rate and Motor Vehicle Retail Prices respectively, as the main impediment preventing the consumer from applying for motor finance.

$H0_6$: There is not a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance

REJECTED

$H1_6$: There is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the prime interest rate and motor-vehicle retail prices as the main impediment preventing the consumer from applying for motor finance

ACCEPTED

7.3.5 HYPOTHESIS 7

In the case of Hypothesis 7, the correlation between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance is determined. As not all the assumptions for parametric techniques could be satisfied a non-parametric test namely the Spearman rank-order correlation coefficient (Spearman's rho), is used instead of the parametric bivariate correlation, which is the Pearson-product-moment correlation.

$H0_7$:	There is no relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance
$H1_7$:	There is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance

Table 7.31: Household Income Frequencies

		Frequency	Percent	Valid Percent	Cumulative Percent
Valid	R0 - R5,000	83	54.6	54.6	54.6
	R5,001 - R10,000	17	11.2	11.2	65.8
	R10,001 - R15,000	8	5.3	5.3	71.1
	R15,001 - R20,000	10	6.6	6.6	77.6
	R20,001 or more	34	22.4	22.4	100.0
	Total	152	100.0	100.0	

From Table 7.31 it can be concluded that of the 152 consumers who participated in the survey, 83 (54.6%) fell into the lowest household income category of between R0 – R5,000. The highest income category of R20 001 or more, recorded the second highest score with 34 (22.4%) of the respondents falling within this category.

Table 7.32: Household Income and NCA Cross Tabulation Frequencies

		NCA						Total
		1	2	3	4	5	6	
Household Income	R0 - R5,000	3	1	3	18	32	26	83
	R5,001 - R10,000	0	0	2	3	7	5	17
	R10,001 - R15,000	0	0	0	3	5	0	8
	R15,001 - R20,000	0	0	2	3	2	3	10
	R20,001 or more	5	7	2	9	4	7	34
Total		8	8	9	36	50	41	152

A cross-tabulation of the two variables, as presented in Table 7.32, indicates that of the 83 consumers from the lowest income category, 58 (69.9%) indicated that they either agreed or strongly agreed with the statement that the NCA was the main reason for them not applying for motor finance. On the other hand, of the 34 consumers categorized in the highest total household income bracket, only 11 (32.4%) indicated that they either agreed or strongly agreed with the statement.

Table 7.33: Spearman's Rank Order Correlation

		Value	Asymp. Std. Error[a]	Approx. T[b]	Approx. Sig.
Interval by Interval	Pearson's R	-.341	.086	-4.444	.000[c]
Ordinal by Ordinal	Spearman Correlation	-.279	.083	-3.557	.001[c]
N of Valid Cases		152			

a. Not assuming the null hypothesis.

b. Using the asymptotic standard error assuming the null hypothesis.

c. Based on normal approximation.

From Table 7.33 it could be stated that Spearman's rho for Total Household Income and the consumers' opinion regarding the NCA was rho = -.279, $p < 0.05$. This indicates that consumers with lower total household incomes view the influence of the

NCA in their decision to apply or not apply for motor finance as more significant than those from higher income groups.

$H0_7$:	There is no relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance **REJECTED**
$H1_7$:	There is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance **ACCEPTED**

7.3.6 HYPOTHESIS 8

In the case of Hypothesis 8, the difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus, identified as being the main reasons for motor finance applications being declined is determined. Seeing that the same participants, similar to hypothesis 4 and 5 earlier, performed under each level of the independent variable and not all the assumptions under parametric testing could be guaranteed, a non-parametric test, the Wilcoxon signed-rank test, was again chosen instead of the paired t-test. (One respondent did not complete this section of the questionnaire, therefore N = 41).

$H0_8$:	There is not a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined
$H1_8$:	There is a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined

The data being captured as Likert scale items, ranging from 1 to 6 satisfies the first assumption. The symmetry of the distribution difference is again demonstrated through a boxplot and a normal Q-Q plot presented in Appendix J. The Q-Q plot indicates that the distribution is symmetric and linear in the middle of the distribution.

Two important assumptions of the Wilcoxon signed-rank test, as stated earlier, is that the difference in data is quantitative and the distribution of the differences is symmetrical. The boxplot indicates that the distribution is almost perfectly symmetrical, with zero skewness being observed.

Table 7.34

Descriptive Statistics

	N	Mean	Std. Deviation	Minimum	Maximum
Affordability In Terms Of The NCA	41	4.3171	1.14976	2.00	6.00
Adverse Info On Credit Bureaus	41	4.8780	.97967	3.00	6.00

What is clear from Table 7.34 is that the mean for Adverse Information listed on Credit Bureaus is marginally higher than that of Affordability in Terms of the NCA. Thus it appears as if adverse information listed on the credit bureaus is regarded as being a more frequent reason for motor finance applications being declined than affordability issues in terms of the NCA. From Table 7.35 it is clear that Adverse Information listed on Credit Bureaus measured a higher score than Affordability in Terms of the NCA on 20 occasions and the reverse was true on only 7 occasions. The significance of this difference still needs to be tested though.

Table 7.35: Ranks

		N	Mean Rank	Sum of Ranks
Adverse Info On Credit Bureaus - Affordability In Terms Of The NCA	Negative Ranks	7[a]	12.29	86.00
	Positive Ranks	20[b]	14.60	292.00
	Ties	14[c]		
	Total	41		

a. Adverse Info On Credit Bureaus < Affordability In Terms Of The NCA

b. Adverse Info On Credit Bureaus > Affordability In Terms Of The NCA

c. Adverse Info On Credit Bureaus = Affordability In Terms Of The NCA

Table 7.36: Test Statistics[b]

	Adverse Info On Credit Bureaus - Affordability In Terms Of The NCA
Z	-2.555[a]
Asymp. Sig. (2-tailed)	.011

a. Based on negative ranks.

b. Wilcoxon Signed Ranks Test

The result of the Wilcoxon signed-rank test produced in Table 7.36 turned out to be significant at the 0.05 level with a figure of .011. Thus it can be stated that there is a significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus, with adverse information listed on the credit bureaus being considered the main reason for motor finance applications being declined.

$H0_8$:	There is not a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined **REJECTED**
$H1_8$:	There is a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined **ACCEPTED**

7.3.7 SUMMARY OF SECTION 2

This section considered the survey data collected from the secondary units of analysis and tested for variables viewed as having a major impact on the amount of motor finance granted in the South African motor finance sector. The data was firstly explored using descriptive statistics and certain general observations were made. Frequency Tables presenting statistical information, for instance, the amount of valid and missing cases, the mean, the median, the standard deviation, and the total number of cases falling within a specific section was provided. The information was also presented visually by way of bar charts.

The hypotheses testing results, and without making any inferences about the total population, can be summarised as follows:

- There is no statistical significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance
- There is a statistical significant difference in the means of the independent variables, Motor Vehicle Retail Prices and the NCA as

being the main impediments preventing the consumer from applying for motor finance

- The findings from section 1 was confirmed as the difference in means between Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance was found to be statistically insignificant, whereas the difference in the means for Motor Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance was found to be statistically significant. Motor Vehicle Retail Prices were thus found to be the dominating factor in the consumers' decision to apply or not apply for motor finance
- There is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the Prime Interest Rate and Motor Vehicle Retail Prices as the main impediment preventing them from applying for motor finance. Consumers regard the Prime Interest Rate as the most influential variable preventing them from applying for motor finance; whist credit analysts regard Motor Vehicle Retail Prices as the dominant factor
- There is a statistically significant difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus identified as being the main reasons for motor finance applications being declined. It can therefore be stated that poor credit records are regarded as being the overwhelming reason for motor finance applications being declined, and not affordability in Terms of the NCA
- There is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance. Consumers with lower total household incomes view the influence of the NCA in their decision to apply or not apply for motor finance as more significant than those from higher income groups.

7.4 CHAPTER SUMMARY

This chapter reported on the results obtained during the empirical study. It presented historical motor finance application data collected from the primary unit of analysis, which included 48 monthly periods, as well as certain biographical information and views on the topic of motor finance recorded from the 194 respondents who participated in the two separate surveys (152 consumers and 42 motor finance credit analysts).

It focused on testing the hypotheses formulated in chapter six and was dedicated to the impact assessment of the NCA, Prime Interest Rate, and Motor Vehicle Retail Prices on the South African motor finance sector. The hypotheses were tested to determine the statistical likelihood that the data reveal true differences and not a random sampling error. The next section of this dissertation will apply the results obtained from the quantitative data analysis, as well as certain qualitative data collected, in order to present the research conclusions, limitations and recommendations.

CHAPTER 8
CONCLUSIONS, LIMITATIONS AND RECOMMENDATIONS

8.1 INTRODUCTION

The aim of this chapter is to focus on phase 3 of the empirical investigation, as described in chapter 1. It will involve formulating conclusions from the results explained in chapter 7. Furthermore it will offer a summary of the research and will present the key findings. The limitations for the study and recommendations to mitigate the negative effect that the NCA, the Prime Interest Rate, and Motor Vehicle Retail prices may have on the South African motor finance sector will be provided.

8.2 CONCLUSIONS

In this section of the dissertation conclusions will be drawn from the literature review and the empirical research in accordance with the specific research questions that were formulated in an endeavour to answer the general research question and to achieve the main aims of the research study.

The general research question that required further exploration was as follows:

- ➢ Is there a relationship between the introduction of the NCA, the Prime Interest Rate, Motor Vehicle Retail Prices and the amount of motor finance granted to the South African consumer?

In terms of the literature study, the following specific research questions were addressed in this research project:

- ➢ How can credit regulation be conceptualised and what are its key aspects?

- How can the NCA be conceptualised and what are its key aspects?
- How can motor vehicle finance in South Africa be conceptualised and what are its key aspects?
- How can the effect of the NCA on motor vehicle finance be conceptualised and what are its key aspects?
- How can the effect of the Prime Interest Rate on motor finance be conceptualised and what are its key aspects?
- How can the effect of Motor Vehicle Retail Prices on motor finance be conceptualised and what are its key aspects?

In terms of the empirical study, the following specific research questions were addressed in this research project:

- What are the results regarding new applications for motor finance in a South African motor finance institution, pre- and post NCA application?
- Does a relationship exist between the prime interest rate, motor vehicle retail prices and the outcome of new motor finance applications in a South African motor finance institution?
- Does the South African consumer and motor finance credit analysts share the same view regarding the impact of the NCA as the main impediment preventing the consumer from applying for motor finance?
- Is there a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance?
- In the view of motor finance credit analysts, is the NCA regarded as being the major reason for motor finance applications being declined?

8.2.1 RESEARCH QUESTION 1

The first research question was answered in chapter 2 and dealt with the conceptualisation and key aspects of credit regulation. It can be concluded that a strong case can be made for not limiting the consumers' ability to access credit, whereby their mobility within a society is not limited. Contrary to this, the impact of the credit crisis on the world economy has highlighted the fact that there definitely exists an even stronger case for government enforced lending practices. It was found that with the changes taking place in the world economy and the increase in those consumers with real difficulties and who are unable to service their loan repayments, would suggest that some form of regulation or policy may be required to protect this vulnerable group and prevent it from growing further.

Regulation does not have to impact negatively on competition between financial organizations though. Properly constructed regulation reinforces the efficiency of market mechanisms, namely, it does not impede competition but rather enhances it.

8.2.2 RESEARCH QUESTION 2

The second research question was answered in chapter 3 and dealt with the conceptualisation and key aspects of the NCA. A revision of the Usury Act by the South African Law Reform Commission found that the South African credit market was dysfunctional. Subsequent to research conducted on consumer credit reforms and regulation in Europe and certain other countries, and upon consultations with various stakeholders, it was concluded that both the Usury Act and the Credit Agreements Act were to be replaced by a single statute overseen by a statutory regulator. A major shift in regulation would be a move from the traditional price control regulations to more detailed consumer protection regulations specifically focusing on the protection against over-indebtedness and undesirable lending practices.

The NCA provides consumers with some welcome protection measures that were not available under the Usury Act. The new act thus created an environment with a balance of power between credit lenders and consumers instead of one where the scales tipped heavily in favour of credit lenders.

Highlighted as a major reason for the need to reform existing consumer credit legislation, consumer over-indebtedness arose due to an over-supply of credit to those considered credit worthy, resulting in heavy debt burdens for a large portion of South African consumers. In this regard, the NCA is a groundbreaking piece of consumer legislation as for the first time in the history of South African consumer legislation, specific provisions is made for measures to prevent reckless lending and over-indebtedness. Ideally, no additional credit should be granted to a person who is already over-indebted.

The possibility of a credit agreement being suspended requires lenders to be far more discriminating under the NCA than what they were under the Credit Agreements Act or the Usury Act. Making hidden charges transparent, applying stricter affordability criteria and giving borrowers a five day cooling off period following the offer of a loan, has stemmed growth in private-sector credit extension, especially to households.

It was found that under the application of the NCA, the act of obtaining mortgages and vehicle financing is much harder, as credit applicants have to prove that they earn sufficient income to cover the new instalment in addition to all their existing monthly expenses. In the past, too much credit was granted to those who could not actually afford it. The rate of approvals for such loans is reported to have fallen considerably as a result. This development seems to be contradictory to one of the major aims of the NCA, which is to make credit more accessible to the lower-income groups, as they are the affected parties currently being driven out of the motor finance market all together.

Banks and finance institutions that were found to have reacted early to the new regulatory requirements of the NCA have created an advantage over competitors who were not as quick to implement the appropriate changes. The early formulation of new policies and procedures, including certain systems changes, has allowed those proactive banks and financial institutions the opportunity to provide their clients with a more efficient service.

8.2.3 RESEARCH QUESTION 3

The third research question was answered in chapter 4 and dealt with the conceptualisation and key aspects of motor finance in South Africa. South Africa's automotive industry contributed around 7.5% to the countries Gross Domestic Product (GDP) in 2006, and 6.9% for 2007. With roughly fifty percent of all vehicles bought in South Africa being financed, it is apparent to see why the financial services industry is such a pivotal spoke in the countries economy. If it was not for the corporate sector being responsible for nearly eighty five percent of vehicles bought, this percentage would be much higher, as many large companies prefer to make cash purchases rather than to conclude motor finance transactions.

Under the NCA, consumers can choose between several finance options when purchasing a motor vehicle, namely, instalment sale agreements, lease agreements, and rental agreements. In addition to the different motor finance options, various finance products exist that a consumer may encounter when applying for the finance of a motor vehicle. The aim of these products is mainly to protect the consumer against possible negative effects of changes in their personal circumstances as well as unforeseen changes in economic factors, namely prime interest rate changes, which may result in them being unable to service their obligations towards a bank or financial institution. Some of the different options are: financial shock absorber; payment holiday; balloon payment; residual packages; and a linked rate/ fixed rate options.

8.2.4 RESEARCH QUESTION 4

The fourth research question was answered in section 5.3 of this dissertation and dealt with the conceptualisation and key aspects of the NCA's effect on motor finance in South Africa.

Motor industry analysts, motor manufacturers and retailers, and finance providers all attributed the decline in new vehicle sales to the impact of the NCA. It was also determined that the NCA is a more effective tool for the control of credit demand than interest rate increases as the law only affects new credit applicants and do not influence the average or marginal cost of credit. The slump in new vehicle sales figures since June 2007 has been attributed to the impact of the NCA as it disqualifies a large number of marginal credit applicants and in light of this development WesBank has noted a distinct decline in the number of applications being made for motor finance since inception of the NCA.

The option to finance a motor vehicle over more extended periods than what was possible under previous legislation has a distinct negative interest implication for the consumer. A more subtle issue that arises is that despite the fact that many consumers prefer to replace their vehicles every two years, the extended agreement term may result in very little capital being settled during the first two years since inception of the finance agreement. This may cause difficulties for the consumer when it comes to trade-in or resale of the motor vehicle, as the value of the vehicle would have depreciated more rapidly than the outstanding capital amount on the transaction. This phenomenon not only impact on the consumer but has a profound impact on the motor industry as a whole as it results in the average replacement frequency of passenger vehicles declining.

It was found that on average, one in four vehicle finance applications were being approved as banks tightened credit extension in line with the prescriptions of the NCA. Because of the act, banks are more scientific and have to demand more information which results in the way the banks assess credit currently being very different from the way they used to do prior to the application of the NCA. Apart from the possibility of decreased bad debts, banks and financial institutions are also motivated and inspired to comply with the provisions of the NCA as the implications of not complying are serious. In addition to those finance transactions that does not comply being terminated and the bank being issued a fine of up to R1 million, the finance institution also runs the risk of being deregistered as a credit provider, which would almost certainly lead to closure of the business as a whole.

The fact that the number of applicants for vehicle finance that do not qualify is 15 percent higher than before the introduction of the NCA shows prudent lending by financing institutions. This is a clear signal that the NCA is protecting consumers. The NCA has also resulted in increased competition between banks and finance houses. This increased competition also favours the consumer as the finance institutions are now differentiated from one another by the structure of their financial offerings and, most importantly, their service levels. The NCA is also creating an opportunity for consumers who previously could not purchase a vehicle because they did not have the minimum 10 percent deposit available, as prescribed by the Credit Agreements Act, despite being able to afford the monthly instalments, to now enter the motor finance market. It thus seems as though the NCA is achieving what it aims to do, which is to provide increased protection for consumers and to ensure that they don't over-extend themselves.

8.2.5 RESEARCH QUESTION 5

The fifth research question was answered in section 5.4 of this dissertation and dealt with the conceptualisation and key aspects of the prime interest rate's effect on motor finance in South Africa.

The SARB uses interest rates to combat high consumer spending and inflation, whereby it influences the demand for money, which in turn affects the supply of money ultimately leading to a restraining effect on consumer spending and inflation. A review of the related literature indicated that a possible negative correlation exists between prime interest rate movements and new vehicle sales. What this means for the motor finance sector is that higher interest rates ultimately result in a smaller demand for motor vehicles and therefore fewer applications for motor finance. The six consecutive prime rate increases since 2005 thus had a dramatic negative impact in new vehicle sales.

8.2.6 RESEARCH QUESTION 6

The sixth research question was answered in section 5.5 of this dissertation and dealt with the conceptualisation and key aspects of the effect that motor vehicle retail prices has on motor finance in South Africa.

Two of the main contributing factors in the growth of new car price inflation are the weakness of the Rand and rising domestic production costs due to a dramatic increase in commodity prices such as steel and Platinum Group Metals. Seeing that the largest portion of motor vehicle components used by South African motor manufacturers are imported, the motor manufacturing sector is very sensitive to changes in the value of the Rand. Despite the decrease in demand for new cars, manufacturers have been forced to increase prices in order to claw back some of their losses as a result of the depreciating Rand. A review of the related literature confirmed this phenomenon as it was indicated that a likely positive correlation exists between changes in the exchange rate and new vehicle prices.

A review of the related literature furthermore highlighted that a likely negative correlation exists between new car price inflation changes and new vehicle sales. Higher new car price inflation was ultimately shown to be associated with a smaller demand for motor vehicles and therefore fewer applications for motor finance.

8.2.7 RESEARCH QUESTION 7

The seventh research question was answered in section 7.2.1, (Hypothesis 1), of this dissertation and dealt with the results regarding new applications for motor finance in a South African motor finance institution. This section of the analysis was based on the historical motor finance application data collected from the primary unit of analysis which were analysed using certain statistical procedures, which included an Independent-Sample t-Test, whereby the mean difference between the approval ratios of period’s pre- and post NCA application was compared. More specifically it was tested whether a significant difference exists between approval ratio means for periods pre- and post NCA application.

Considering the outcome of the analysis, it would appear as if, in the case of the primary unit of analysis at least, a significant difference exists in the approval ratio means of periods pre- and post NCA application. The periods pre NCA application scored significantly higher approval ratio's than those periods post NCA application. Future studies on this topic are awaited in order to confirm these findings though.

This section of the empirical testing also dealt with the results regarding whether a relationship exist between application of the NCA and the results regarding new applications for motor finance in a South African motor finance institution.

In this instance the Spearman rank-order correlation coefficient (Spearman's rho) was applied. Spearman's rho measures the strength of an increasing or decreasing relationship between two variables. From the information gathered from the test, it appears as though a strong negative correlation exist between NCA Application and Total Approval Ratio for Target Period. Thus, NCA application is associated with lower approval ratios.

8.2.8 RESEARCH QUESTION 8

The eighth research question was answered in section 7.2.2 and 7.2.3, (Hypothesis 2 and 3), of this dissertation and dealt with the results regarding whether a relationship exists between the prime interest rate, motor vehicle retail prices and the outcome of new motor finance applications in a South African motor finance institution.

This section of the analysis was also based on the historical motor finance application data collected from the primary unit of analysis which were analysed using certain statistical procedures that included a Pearson product-moment correlation test. An examination of the correlation coefficient and its associated significance value (p), obtained in the testing of Hypothesis 2, showed that there exist a strong negative correlation between Total Approval Ratio for Target Period and Prime Interest Rate Changes. Thus, higher prime interest rates are associated with lower approval ratios.

An examination of the correlation coefficient and its associated significance value (p), obtained in the testing of Hypothesis 3, showed that there exist a strong negative correlation between Total Approval Ratio for Target Period and New Car Price Inflation. Thus, higher new car price inflation is associated with lower approval ratios. Although the strength of the three correlations were very similar, it was determined that motor vehicle retail prices attained the strongest correlation score, followed by the NCA and the prime interest rate respectively.

8.2.9 RESEARCH QUESTION 9

The ninth research question was answered in section 7.3.2, 7.3.3 and 7.3.4, (Hypothesis 4, 5 and 6), of this dissertation and dealt with the results regarding the views of the South African consumer and motor finance credit analysts regarding the impact of the NCA as the main impediment preventing the consumer from applying for motor finance. This section considered the survey data collected from the secondary units of analysis. As a non-probability sampling method was used in selection of the participants, any inferences made are limited to the specific sample and thus not necessarily true for the total population.

In the testing of Hypothesis 4 the survey data collected were analysed using certain statistical procedures that included a nonparametric test, the Wilcoxon signed-rank test. The hypothesis tested related to whether there is a statistically significant difference in the means of the independent variables, Prime Interest Rate Movement and the NCA as being the main impediments preventing the consumer from applying for motor finance. The result of the Wilcoxon signed-rank test turned out not to be significant. Thus it can be stated that, although prime interest rate movement was viewed as having a slightly larger influence over the consumer’s decision whether to apply for motor finance or not, than that of the NCA, the difference in the means of the two variables were deemed not to be statistically significant.

In the testing of Hypothesis 5 the Wilcoxon signed-rank test were again applied. The hypothesis tested related to whether there is a statistically significant difference in the means of the independent variables, Vehicle Retail Prices and the NCA as being the main impediments preventing the consumer from applying for motor finance. The result of the Wilcoxon signed-rank test turned out to be statistically significant. Thus it can be stated that there is a significant difference in the means of the variables Motor Vehicle Retail Prices and the NCA, with motor vehicle retail prices being considered to have a larger influence than the NCA when it comes to the consumers' decision to finance a motor vehicle or not.

In the case of Hypothesis 6, the difference in the views of the consumer versus those of credit analysts regarding the three variables, the NCA, Prime Interest Rates and Motor Vehicle Retail Prices, as the main impediment preventing the consumer from applying for motor finance was tested. A nonparametric test, the Mann-Whitney test, also referred to as the Mann-Whitney U was applied in this instance. The Mann-Whitney test is designed to test whether observations in one population tend to have higher values/ranks than those from the other population. From the Mann-Whitney test results it can be derived that there is a statistically significant difference in the views of the consumer versus those of credit analysts regarding the NCA, the Prime Interest Rate and Motor Vehicle Retail Prices respectively, as the main impediment preventing the consumer from applying for motor finance.

Consumers regard the Prime Interest Rate as the main impediment preventing them from applying for motor finance whist credit analysts regard Motor Vehicle Retail Prices as the dominant factor. As a non-probability sampling method was used in selection of the participants, any inferences made are limited to the specific sample and thus not necessarily true for the total population. Future studies on this topic are awaited in order to confirm these findings.

8.2.10 RESEARCH QUESTION 10

The tenth research question was answered in section 7.3.5, (Hypothesis 7), of this dissertation and dealt with whether there is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance. This section also considered the survey data collected from the secondary units of analysis and the Spearman rank-order correlation coefficient (Spearman's rho) was applied for statistical testing.

Spearman's rho indicated that there is a relationship between Total Household Income and the consumers' opinion regarding the NCA as the main impediment in their decision to apply for motor finance. Consumers with lower total household incomes viewed the influence of the NCA in their decision to apply or not apply for motor finance as more significant than those from higher income groups. This result indicates that the higher a consumer's total household income is, the less concerned they are about being disqualified as a result of credit criteria prescribed by the NCA. As a result, those consumers from lower income groups appear to be more affected by the application of the NCA than those from higher income groups. As a non-probability sampling method was used in selection of the participants, any inferences made are limited to the specific sample and thus not necessarily true for the total population. Future studies on this topic are awaited in order to confirm these findings.

8.2.12 RESEARCH QUESTION 11

The eleventh research question was answered in section 7.3.6, (Hypothesis 8), of this dissertation and dealt with whether in the view of motor finance credit analysts the NCA is regarded as being the major reason for motor finance applications being declined. In this instance the Wilcoxon signed-rank test was again applied for statistical testing.

For purposes of this test the difference in the means of the variables Affordability in Terms of the NCA and Adverse Information listed on Credit Bureaus, which were identified as being the main reasons for motor finance applications being declined, is determined. The result of the Wilcoxon signed-rank test turned out to be statistically significant in this instance. Thus it can be stated that adverse information listed with credit bureaus were identified as being the major reason for motor finance applications being declined, and not the more stringent credit requirements prescribed by the NCA. As a non-probability sampling method was used in selection of the participants, any inferences made are limited to the specific sample and thus not necessarily true for the total population. Future studies on this topic are awaited in order to confirm these findings.

8.3 LIMITATIONS OF THE RESEARCH

This section of the dissertation outlines the limitations of the literature study and the empirical investigation respectively.

8.3.1 LIMITATIONS OF THE LITERATURE REVIEW

With the NCA being a relatively new piece of legislation, limited literature sources were available that investigated the relationships between the variables addressed in this specific research study. The related literature would for the largest part focus primarily on one of the identified variables and not all of them in conjunction. In certain instances it was therefore challenging to obtain published literature to support or debunk the current findings.

8.3.2 LIMITATIONS OF THE EMPIRICAL INVESTIGATION

The data obtained from the secondary units of analysis was not collected from a sample of which every unit of the population had an equal probability to be included in the study. Seeing that a convenience sampling method was applied in this instance, the selection process could not be considered as random. Therefore, only non-parametric statistical testing techniques were applied to the data, instead of the more powerful parametric techniques.

Data collection was limited by the relatively poor response rate. Possible explanations for this could be that questionnaires forwarded via e-mail may not have reached their targeted recipients due to either system failures or the application of faulty e-mail addresses.

8.4 RECOMMENDATIONS

This segment of the dissertation deals with the formulation of recommendations for the motor finance sector based on the findings of this research study, as well as recommendations for future research. The section is divided into five subsections with suggestions made to four different stakeholders in the motor finance sector, namely: motor finance providers/banks; motor vehicle retailers; the national government; and the consumer; and finally, several recommendations for future research are made.

8.4.1 RECOMMENDATIONS AIMED AT THE MOTOR FINANCE PROVIDER/BANK

In the purchase and finance of a motor vehicle, the finance provider is ultimately the party that bears most of the risk. Various circumstances over which the bank has very little or no control, and that could result in a loss for the institution could occur. Seeing that it may be unreasonable to expect finance providers to be less risk averse in the midst of a deep recession, the following recommendations are provided that may result in more motor finance applications being received and approved, without necessarily taking on undue risks.

The gap between the repo rate and the prime lending rate charged by motor finance providers is currently at 3.5%. Given that the funding received from the Reserve Bank makes up a relatively minor portion of most banks' funding, these institutions could be more inclined to reduce this gap as it should enhance competition in the market and may ultimately result in more motor finance applications being received from the consumer.

Banks could increase their visibility in the market place through effective informative marketing or advertising. Educate the consumer by making information available that explains the whole process of purchasing a motor vehicle, as well as the consequences of signing an instalment sale or lease agreement. This information should be available in laymen's terms, thus limiting the possibility of a consumer being enticed into the purchase of a motor vehicle through unscrupulous methods often employed by sales people whereby inaccurate information is provided or certain critical details are omitted.

Build strong relations with motor dealers, thus ensuring that the motor dealer is one hundred percent aware of the bank's credit criteria and application requirements. It is thus important for the finance house to educate the motor dealer. This education should result in savings for the bank whereby fewer applications would be submitted that do not comply with the necessary requirements.

A zero tolerance attitude when it comes to vehicles being sold for more than their retail value should be maintained. Motor finance providers should limit the amount of extras and value added products that are allowed, thereby financing a vehicle that has a realistic value versus the monthly instalment. Extras do not increase the vehicle's trade and retail value. It should therefore be determined whether the extras are a necessity or not. This will stop the vicious cycle in the used car market of building/loading a motor vehicle's selling price in order to settle the applicant's current vehicle of which the outstanding capital balance is out of proportion due to the exhausted list of extras provided with the original transaction. Putting an end to this cycle will lead to more affordable instalments, financial ratios will be more in line and applications for motor finance will be more regularly approved.

DIC's, (dealer incentive commission), should as far as possible be standardized. This will improve service delivery as standardized DIC's will mean that the bank with the fastest turnaround time and highest service levels will be the preferred supplier.

The consumer should be educated regarding responsible spending and ways to increase their creditworthiness. By providing affordability calculators on their websites or by providing this service via a call centre, banks would enable the consumer to know exactly what the maximum amount would be that they could possibly qualify for. This will make the exercise of shopping for a vehicle that much more efficient and purposeful and save the consumer the embarrassment of being declined unnecessarily. This should save the bank some precious time and it should also decrease the amount of money wasted on administering applications where the affordability is an issue, as the consumer would more regularly apply for finance that is within their means in terms of the NCA.

When assessing the application for motor finance, banks should focus on the information that actually impacts on the client's affordability and not loose focus of the bigger picture through trivial queries that merely hinders the process. The payment history on bond and vehicle accounts should weigh heavier in the decision process than the payment history on retail accounts (for example: Edgars). These accounts are often not paid via debit order and as the amounts are often minor in size, the consumer may from time to time miss a payment. This is not to say that they would ever miss a payment on a vehicle account. Banks should therefore constantly review credit assessment criteria/methods in order to make sure that it matches changing market conditions.

Motor finance providers should provide a service whereby the best deal is sourced according to the client's specific requirements and they should be more involved in the price negotiation process. They could also be more flexible with the structure of the transaction to fit the applicant's repayment ability and be more open to different finance schemes (for example: seasonal payments; holiday/birthday moratoriums; full maintenance leasing or rentals) instead of the traditional instalment sale agreement. Some of these repayment structures enhance the consumer's cash flow situation thus making the transaction more attractive.

Motor finance institutions could more regularly propose additional security as a measure to limit the risk profile on a specific transaction. By increasing the amount of security held, a more favourable finance structure could be negotiated that would suit both parties involved.

Instead of concluding an agreement that includes a balloon payment, which could lock the consumer in for an extended period, and in the light of the finance institutions relationship with certain respectable motor dealers, they could be more inclined to do lease agreements with residual values, whereby the dealer commits via a guaranteed buyback agreement to purchase the vehicle back from the bank at a certain pre-agreed price, once the lease agreement has reached maturity.

Instead of rigid upfront deposit requirements in order to increase the equity in the asset, banks could rather encourage the consumer to consider the purchase of a demonstration model, or less than two years old used vehicle. The prices on these vehicles have already corrected, contrary to that of a new vehicle. This will force motor manufacturers to reconsider their pricing strategies.

Motor finance providers could consider a motor finance product with mechanisms similar to an access bond, whereby the consumer can access or withdraw funds form the account that has been paid over and above the normal instalments. This could result in consumers being inclined to pay more than just the minimum required monthly instalment which should result in the debt being settled sooner than the agreed contract term. This should ultimately result in repeat business as the consumer would be in a position to replace their current vehicle more regularly.

The bank could do affordability calculations on certain selected existing customers with motor cars of which the outstanding balance on the account is less than its trade value. These clients, with positive equity in the vehicle, can be advised via their monthly statements of the amount that they actually qualify for. This could result in more existing customers replacing their vehicles earlier than what they originally would have done.

Motor finance providers could monitor transactions on their books whereby the outstanding balance is constantly compared to the trade and retail value of the vehicle. Once the outstanding balance is higher than the market value of the vehicle, the client should be advised to take out add-cover/top-up in order to prevent hefty shortfalls in case of an insurance claim of some sorts. Bad experiences of the likes of large shortfalls on insurance claims put the consumer off future purchases and make them hesitant to deal with that specific financial institution ever again.

Banks should constantly negotiate for affordable sources of funding. A reduced cost of capital would result on the finance house being more open to rate negotiations with the consumer. They could also consider a review of the amount of admin fees charged per transaction. Lowering of these additional costs may result in consumers being more inclined to enter into a motor finance transaction with that specific motor finance provider.

Finally, banks should simplify the application process as far as possible and be accessible at all times. A transparent and uncomplicated procedure is paramount to success in the industry. Motor finance providers should also focus more on competing with their service levels and less on attempting to out-price each other. Efficient and quick turnaround times are always appreciated. Where a credit scoring system is in place, care should be taken to ensure that all information is transferred accurately from the application document to the front-end system as inaccurate information may negatively impact on the applicants' credit score and subsequent affordability profile. As with any so called big ticket transaction, information brings about calmness. The importance of communication and keeping the consumer informed on the status of their application can therefore not be stressed enough.

8.4.2 RECOMMENDATIONS AIMED AT MOTOR VEHICLE RETAILERS

The motor dealer is the face of motor finance. They are the first and last contact with the consumer and could ultimately make or break a transaction. Selling a motor vehicle involves more than just convincing the client to sign a finance contract. The consumer requires and expects accurate information to any queries they may have. It is therefore important for the dealer to employ skilled and well informed personnel.

The applicant should at all times be encouraged to provide accurate information on the application form. This limits the number of queries from the finance provider. A process of pre-approval or credit evaluation prior to submitting the application to the finance provider could also save precious time and limit unnecessary expenses. In order for these additional services to be provided effectively, proper training should be provided to sales personnel and F&I's (finance and insurance consultants) with regard to assessing affordability and the completion of application forms.

Motor dealers should ensure that the vehicles' selling price is in line with the listed trade and retail values. They should also refrain from trying to sell every possible extra that can be fitted to the vehicle. As things stand currently, it would appear as though the profits made by motor dealers are no longer in the sale of the vehicle, but rather in the secondary gross income earned from the sale of all the extras. This short-sightedness leads to settlements being inflated and ultimately resulting in consumers not being able to buy new vehicles as their current vehicle cannot be settled in full.

Poor trade-in offers made by motor vehicle retailers regularly result in lost sales. The same dealer that loaded the vehicle's price with an extensive list of extras in the first place is often not prepared to offer the applicant a decent trade in value when it comes to replacing the vehicle. Consumers nowadays are more informed than might have been the case previously and as a result would often rather drive an older vehicle than having to give it away at a ridiculous price.

Extended warranties could be very effective products that, if applied correctly, may well convince many consumers to purchase a motor vehicle. In order for an extended warranty to be effective though, the motor dealer must build a good track record of being able to negotiate the settlement of warranty claims on a regular basis. Very often it happens that a motor dealer is in partnership with a vehicle warranty provider that is unable to perform in terms of the warranty agreement and as a result declines the majority of the claims received for what ever reason. This practice negatively affects consumer confidence in the industry and as a result leads to fewer motor vehicle sales.

8.4.3 RECOMMENDATIONS AIMED AT THE NATIONAL GOVERNMENT

The South African National Government is a very important stakeholder in the motor finance sector. With the local economy contracting and consumer spending decreasing at a swift rate, several motor vehicle manufacturers and retailers have been forced to downsize or close down altogether. This has a major impact on the government's ability to collect the taxes so desperately needed for the ongoing infrastructure development projects currently on the way ahead of the 2010 soccer world cup. It is thus in governments best interest to stimulate consumer spending through mechanisms that can free up the necessary cash flow in order for the consumer to again be interested in financing of motor vehicles.

A revision of South Africa's tax regime may enhance the consumers' apatite for spending. This research study has shown that high motor vehicle retail prices have a major influence on the consumers' attitude towards motor finance. Government could consider different options that may stabilize retail prices thus bringing it more in line with what is paid in other countries. A review of import taxes levied on motor vehicle parts would provide motor manufacturers with some room to decrease the price at which they provide their vehicles to the retailers. The lower price will then in turn be passed on to the consumer. As the consumer has witnessed very few price decreases over the past few years, any decrease, no matter how small, may prompt the consumer to make a purchase as it would help restore confidence in the industry.

Despite Trevor Manuel's (former Minister of Finance) 2009 budget providing some much needed tax relieve to the average consumer, more may be required in order to stimulate actual spending. Since 2007, when the NCA came into force, government pronounced the need for consumers to save more and spend less. These broadcasts have not fallen on deaf ears as the consumer is currently much more reluctant to make big ticket purchases. Impulse buying in certain sectors has all but disappeared and efforts to now change this mindset will take some clever footwork on government's part. In this regard government could explore a tax-relax/advantage structure for students and selective first time buyers based on certain qualification criteria. These actions should increase the amount of vehicles sold and therefore also benefit the motor finance sector.

Government could initiate a probe into the value of so called value adding products in order to determine if these products really provide what is paid for by the consumer. Certain mechanical warranties that are sold to the client with exorbitant service requirements and prescriptions result in the consumer not receiving any value out of it. What often happens is that when the vehicle is taken in for repairs under the warranty, the warranty provider has some explanation or escape for why the repairs are not covered by the warranty. Manufacturers' warranties and optional extended warranties are often pivotal in the consumer's decision whether to finance a motor vehicle or not. Through governments efforts in this regard, consumer confidence in these products could be restored, which then should stimulate additional spending in the motor finance sector.

Although unstable fuel prices were shown to have a relatively minimal impact on the consumers' decision to finance a motor vehicle or not, a revision of the taxes levied on fuel sales may have a similar effect, as lower fuel prices would result in more free cash flow for the consumer which may make the monthly instalment on a motor vehicle a viable option.

Increased assistance to SME's that will allow them to be more active in the motor finance market would offer a significant fiscal boost. Through the revision of the Industrial Development Corporations' criteria for providing venture capital to entrepreneurs and small businesses engaged in competitive industries, these businesses would be able to finance the vehicles required for their daily operations which could allow them to operate efficiently.

With the death toll on South Africa's roads soaring and a lot of the blame being placed on vehicles not being roadworthy, government could provide some form of incentive to the consumer to replace older motor vehicles sooner. These actions should stimulate spending in the motor finance sector and by reducing the number of motor vehicles that are not sufficiently roadworthy, lives could be saved in the process as well.

With the NCA being in force now for more than two years, perhaps the time has come for government to review its effectiveness and make the necessary adjustments where needed. By providing a more balanced position between the rights of the consumer and those of the credit provider, finance houses may be less risk averse, resulting in a higher approval ratio.

8.4.4 RECOMMENDATIONS AIMED AT THE CONSUMER

The South African consumer is ultimately in control of their own destinies. A change in behaviour that may appear minor to most may be the difference between an application for motor finance being approved or declined. The decision to finance a motor vehicle is a major purchase that could place a profound strain on the consumers' cash flow situation. It is therefore imperative that a great deal of thought be put into it.

Knowing exactly what amount you can buy for or what monthly instalment you would be able to service comfortably is the obvious starting point. It is therefore important that the consumer draw up a detailed budget that reflects all monthly income and expenditures. This process will indicate whether there is sufficient free cash flow available to accommodate the additional monthly instalment. The consumer should refrain from applying for motor finance in instances where their personal budget does not at least indicate that an amount in excess of the instalment can actually be saved on a monthly basis.

The consumer should always attempt to leave room in their personal budgets for ad hoc expenses, or they should force themselves to save in order to cater for those unexpected everyday expenditures. Bank charges vary widely from one commercial bank to the next and a simple assessment of those charges could result in substantial monthly savings. Debt consolidation may also result in more disposable income or cash flow being freed up. Saving money to put down a deposit on the purchase of a vehicle is also important as the amount of equity that is available in the asset carries a lot of weight in the credit decision process.

Being prepared and doing the necessary homework prior to entering the motor dealer's show room will more often than not boost the consumer's likelihood of actually securing the required finance. The sales consultant on the dealer floor will habitually attempt to sell you a motor vehicle of which the selling price is higher than what you can actually afford. If the consumer then looks at a motor vehicle that actually falls within his/her price range, he/she may not prefer it anymore as it does not have the equivalent specification levels as the more expensive one. It is therefore important to only consider motor vehicles that fall within the specific price range as indicated by the consumer's personal budget.

When an application for motor finance is made, it is not necessarily the major expenses that are the overriding factor in the credit decision, but rather the consumer's payment record on minor expenses that is the determining factor. It is therefore vital for the consumer to manage household debt in a responsible manner. This can be achieved by limiting the number of retail accounts, for example, clothing and jewellery accounts, and always attempting to keep these accounts in the clear as it does impact on the credit decision. Seeing that the majority of the consumers' retail, instalment sale and bond accounts are reflected on their credit bureaux profiles, knowledge of the status of these accounts are important as the consumer should constantly attempt to improve their payment profiles.

When completing the motor finance application document, the consumer should ensure that the information provided is accurate in order for the credit analysts to make a correct assessment of their current debt and affordability position. If, for instance, the consumer has a current minimum monthly bond repayment of R5,000 but is paying more, for instance R6,000, the amount that should be declared on the application document should be R5,000. Truthfulness and honesty must be a strong requirement. Should the finance house be able to prove that the information provided on the application document is false, the consumer will not be allowed to rely on the protection provided by the NCA. The consumer should always attach as much original documentation as possible to support the application, such as proof of previous hire purchase agreements successfully paid up, and be prepared to offer additional security.

8.4.5 RECOMMENDATIONS FOR FURTHER RESEARCH

This research can be extended to other sectors in the financial services industry whereby the effect of the NCA and other variables on those sectors are explored. Those findings could then be compared to the findings in this research project, whereby it would be determined whether the viability of the different sectors is driven by similar variables.

From the empirical study it was determined that increased living costs (cost of basic food products) had a significant influence over the consumers' decision whether to finance a motor vehicle or not. It may be enlightening to know precisely which costs are the ones placing the most strain on the consumers' spending ability and precisely what the drivers of those costs are.

8.5 INTEGRATION OF THE RESEARCH

This dissertation focused on the development of the motor finance sector in South Africa, and more specifically the amount of motor finance extended since the inception of the NCA. The main objective of this research project was to explore whether the act of obtaining vehicle finance has become more onerous since the implementation of the NCA. The sub-objectives of the research study was firstly to determine whether other economic variables, more specifically, the prime interest rate level or motor vehicle retail prices, could be responsible for, or contributing to the developments currently taking place in the motor finance sector. Secondly, to formulate strategies that could be employed by stakeholders in the motor finance sector in order to minimize the effect of these variables, and possible future restrictive regulations, in order to continually grow the sector thereby stimulating the South African economy. A study of the related literature determined that there exists a strong case for not limiting consumers' ability to access credit whereby their mobility within a society is not restricted. Conversely, the current world economic difficulties brought on by the credit crisis highlighted a definite need for government enforced lending practices, thereby justifying the NCA's existence.

The results of this dissertation indicate that the act of obtaining motor finance has indeed become more complex since the inception of the NCA as a negative correlation was identified between application of the NCA and motor finance application approval ratios. It was also determined that the Prime Interest Rate and Motor Vehicle Retail Prices have a profound effect on the amount of motor finance granted, as these factors deter the consumer from applying for the finance in the first place. Motor Vehicle Retail Prices were in fact identified as the variable that has the strongest influence over the amount of motor finance granted, and not application of the NCA. It was further established that the negative impact that any new credit regulation may have on the motor finance sector, or the economy as a whole, could be limited through the knowledge of exactly which variables are the main drivers that influences the amount of motor finance being extended.

With this knowledge to their disposal and through innovative thinking and pro-active measures, all stakeholders of the South African motor finance sector should be able to adapt to any new regulation, or changes in the variables identified as being the main drivers of the sector, more effectively. They should also be able to formulate effective strategies to exploit these new regulations to their benefit which could result in a competitive advantage that is tough to imitate. In addition to this, the recommendations for further research that was provided in the preceding section should be viewed as the foundation of a stream of research which should produce extremely rewarding results.

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APPENDIX A

SBL
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2009-06-10

TO WHOM IT MAY CONCERN

This letter serves to confirm that Mr H.C. Pieterse student number 71358838, is a registered final year student at the Graduate School of Business Leadership (UNISA) for 2009. The student will be doing a Research Report **(MBLREP-P)** as part of the requirements to obtain the MBL postgraduate degree.

The Business School will observe any confidentiality requirements regarding information availed to the student in assisting with this study. The content of research reports may not be used by the author, the SBL, or any other person without the permission of the Research Report Provider. Further the disclosure of the Company Names being researched will be kept anonymous in order to protect the confidentiality clause of your organisation.

On behalf of the Business School and Mr Hendrik Christoffel Pieterse, we thank you for your cooperation.

Yours sincerely

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APPENDIX B

Dear Respondent,

I am inviting you to participate in a research project to study the motor finance sector in South Africa. Along with this letter is a short questionnaire that asks a variety of questions about motor finance in general. I am asking you to look over the questionnaire and, if you choose to do so, complete it and send it back to me via hpieterse@nrb.co.za or fax: (011) 275-4074. It should take you about five minutes to complete.

Your participation in this survey holds no risk for you and I guarantee that your responses will not be identified with you personally and will thus be 100% confidential. If you choose to participate, please do not put your name on the completed questionnaire.

Your participation is voluntary and there is no penalty if you do not participate. Regardless of whether you choose to participate, please let me know if you would like a summary of my findings. To receive a summary, please request same by e-mailing me at hpieterse@nrb.co.za.

If you have any questions or concerns about completing the questionnaire or about being in this study, you may contact me at 0833271606. The Graduate School of Business Leadership at the University of South Africa has approved this study. If you have any concerns about your rights as a participant in this study you may also contact Beverley Chetty at bchetty@sbleds.ac.za or by telephone (011) 652-0352.

Yours sincerely
Hendrik Pieterse
0833271606
hpieterse@nrb.co.za

APPENDIX C

CONSUMER QUESTIONNAIRE

A. MOTOR VEHICLE FINANCE – *Please answer all questions in this section*

1. Have you applied for motor vehicle finance since 1 June 2007?

	Circle one option only	
Yes	1	If yes, go directly to question 3
No	2	If no, go to question 2

2. Have you considered financing a motor vehicle since 1 June 2007 but then decided against it?

	Circle one option only	
Yes	1	Go to question 3
No	2	Go to question 3

Please indicate your level of agreement with the provided statements by circling the appropriate options in question 3. (Make only one selection per sub question)

3. The main impediment preventing the consumer from applying for motor vehicle finance since 1 June 2007 is related to:

3.1 Interest rate instability.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

3.2 Motor vehicle retail prices.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

3.3 Stringent credit requirements in terms of the NCA.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

3.4 Fuel price fluctuations.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

3.5 Increased living costs, i.e. cost of basic food products.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

3.6 Other (Specify): ____

____

____

4. What, in your view, can credit providers do to assist you, the consumer, with the process of obtaining motor vehicle finance?

____

____

____

B. DEMOGRAPHIC PROFILE – *Please answer all questions in this section*

5. Please indicate your gender.

	Circle one option only
Male	1
Female	2

5. How old are you?

Age group	Circle one option only
Younger than 20 years	1
20-29 years	2
30-39 years	3
40-49 years	4
50 years or older	5

6. Please indicate your gross monthly household income category.

	Circle one option only
R0-R5 000	1
R5 001-R10 000	2
R10 001-R15 000	3
R15 001-R20 000	4
R20 001 or more	5

APPENDIX D

CREDIT PROVIDER QUESTIONNAIRE

A. DEMOGRAPHIC PROFILE – ***Please answer all questions in this section***

1. Please indicate your gender

	Circle one option only
Male	1
Female	2

2. Please indicate your job level

	Circle one option only
Staff	1
First level supervision	2
Middle management	3
Senior management	4

3. Please indicate your credit assessment experience level

	Circle one option only
Less than 1 year	1
1-2 years	2
2-3 years	3
3-5 years	4
5 years or more	5

B. MOTOR VEHICLE FINANCE – *Please answer all questions in this section*

With reference to questions 4 and 5, please indicate your level of agreement with the provided statements by circling the appropriate options. (Make only one selection per sub question)

4. The main impediment preventing the consumer from applying for motor finance since 1 June 2007 is related to:

4.1 Interest rate instability.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

4.2 Motor vehicle retail prices.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

4.3 Stringent credit requirements in terms of the NCA.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

4.4 Fuel price fluctuations.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

4.5 Increased living costs, i.e. cost of basic food products.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

4.6 Other (Specify): ____

____

____

5. The main reason for applications for motor finance being declined since 1 June 2007 has been related to:

5.1 Poorly conducted bank account.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.2 New venture.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.3 Lack of affordability in terms of the NCA.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.3 Adverse info as per credit bureaus.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.4 Inconsistent info provided by consumer, i.e. take home pay on bank statement do not match payslip.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.5 Insufficient traceability, i.e. employer not listed.

Strongly disagree	Disagree	Somewhat disagree	Somewhat agree	Agree	Strongly agree
1	2	3	4	5	6

5.7 Other (Specify): ____

____

____

6. Since inception of the NCA, how has your approval ratio changed?

	Circle one option
Increased more than 20%	1
Increased by 10% – 19%	2
Increased by 0% - 9%	3
No change	4
Decreased by 0% - 9%	5
Decreased by 10% - 19%	6
Decreased more than 20%	7

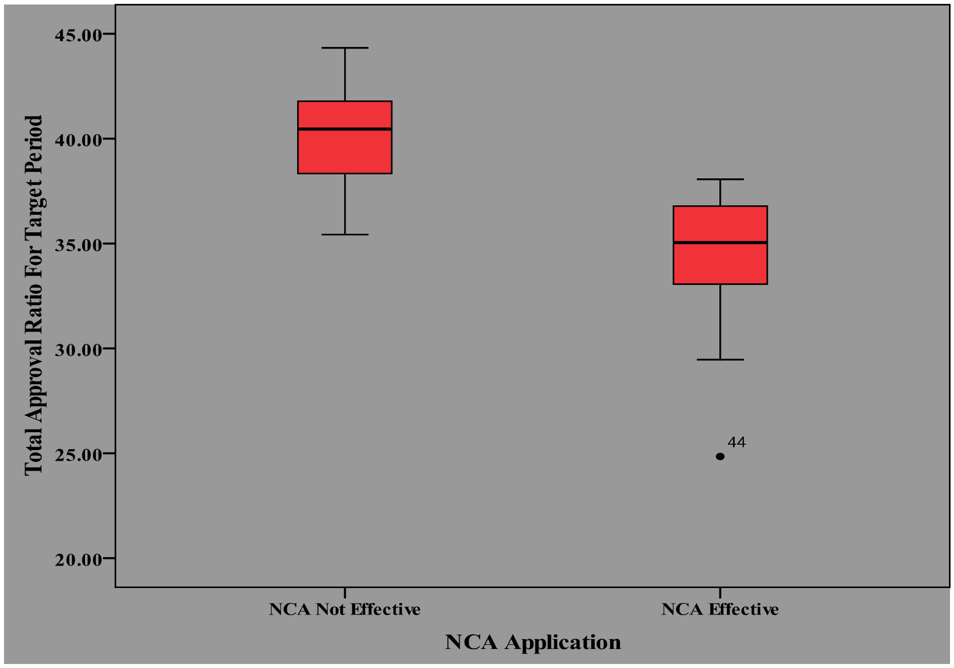
7. **What can *motor finance providers* do to increase the amount of finance provided to the consumer?**

8. **What can *motor dealers* do to increase the amount of finance provided to the consumer?**

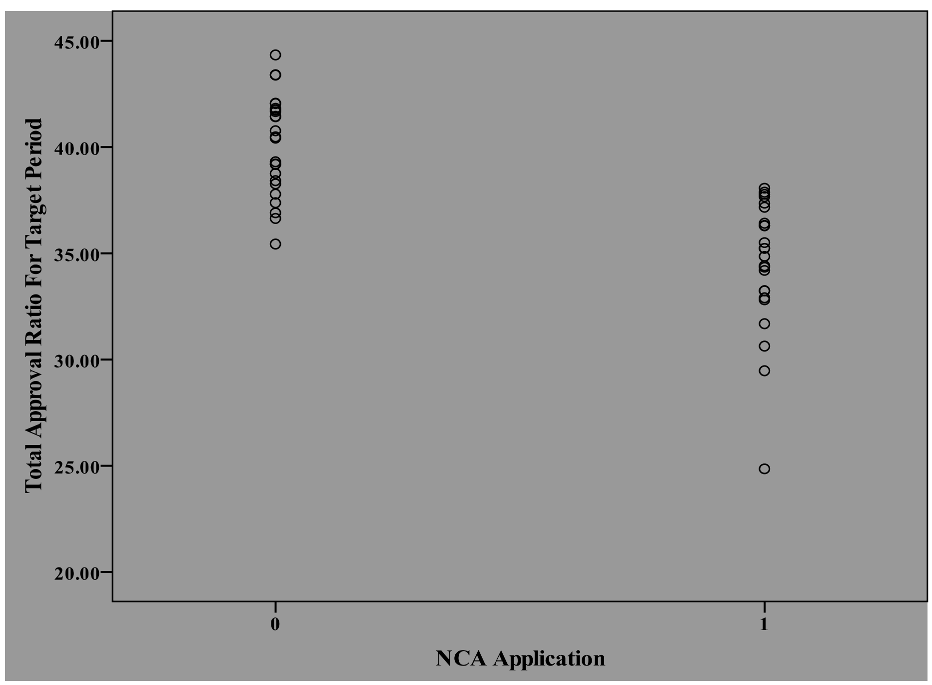
9. **What can *the consumer* do to increase their likelihood of obtaining motor finance?**

10. What can *government* do to increase the amount of finance provided to the consumer?

APPENDIX E

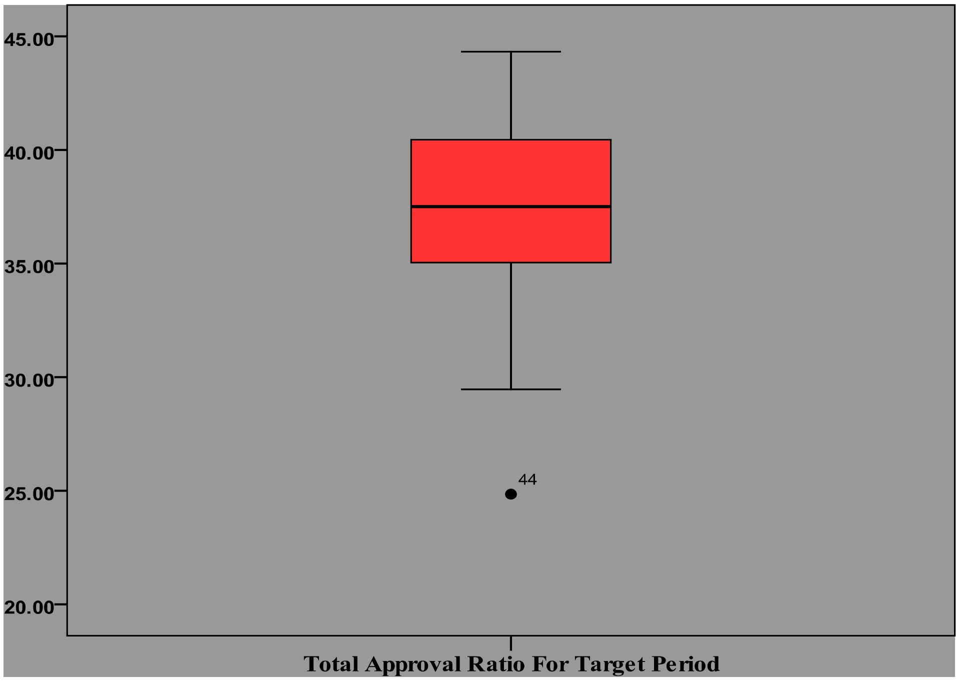


1. **Box plot for groups: NCA Not Effective/NCA Effective**

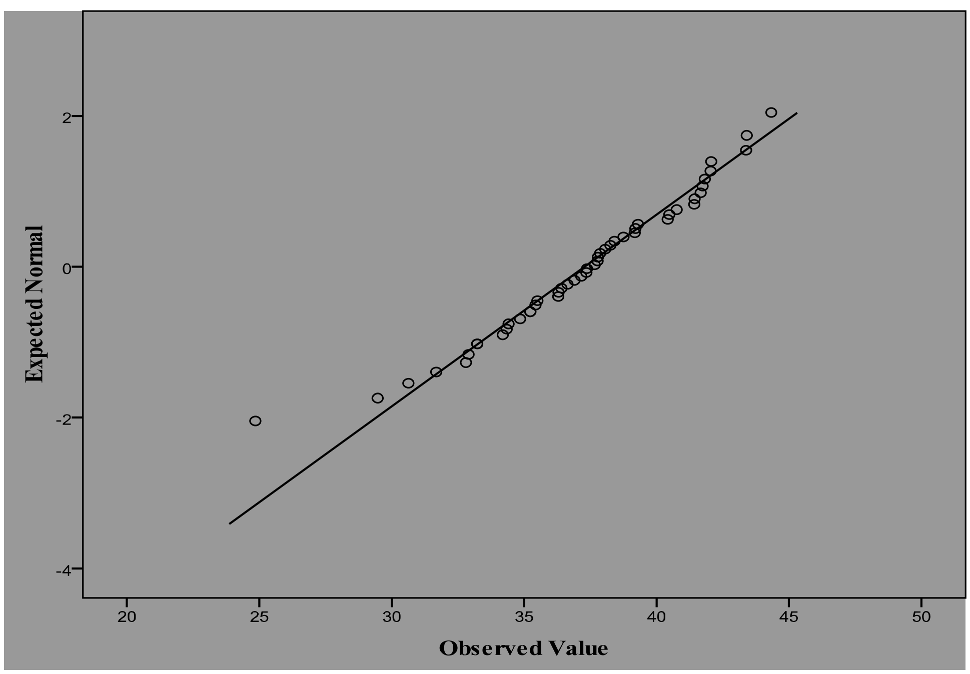


2. **Scatterplot of NCA Application versus Total Approval Ratio for Target Period**

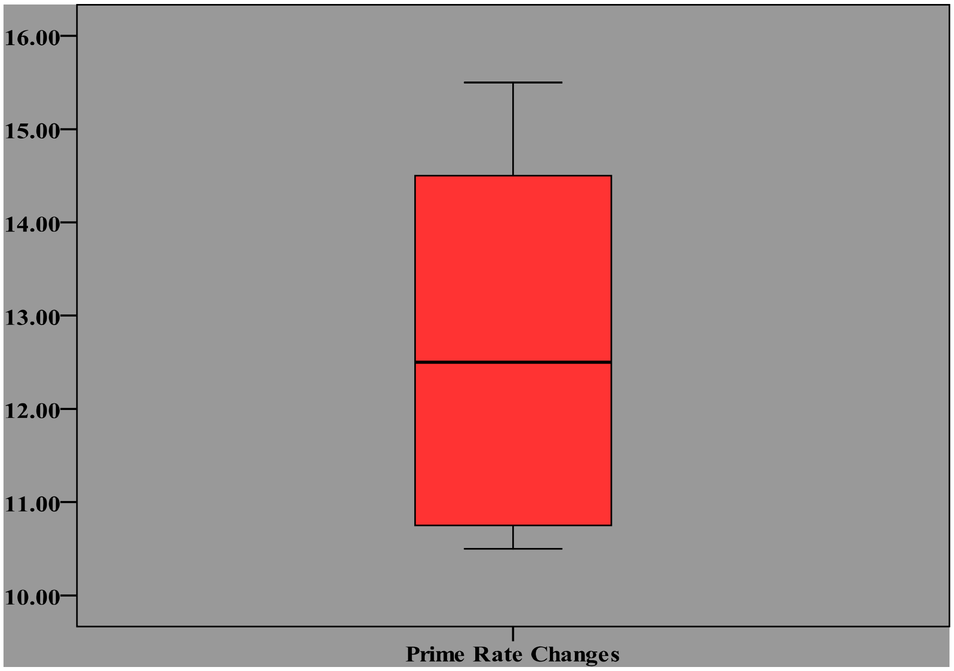
APPENDIX F



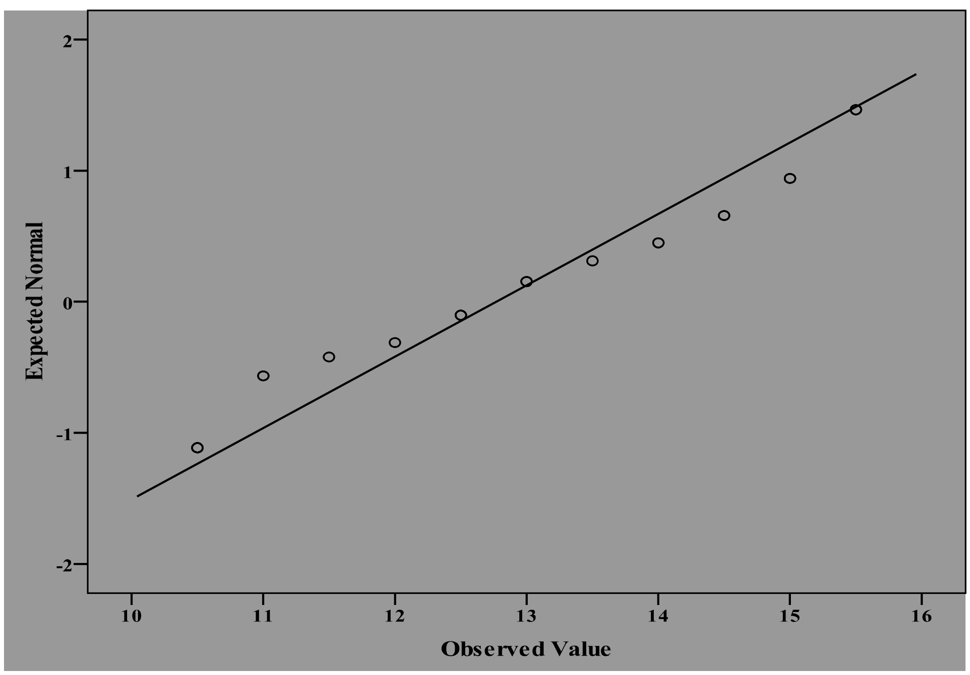
1. **Box plot for Total Approval Ratio for Target Period**



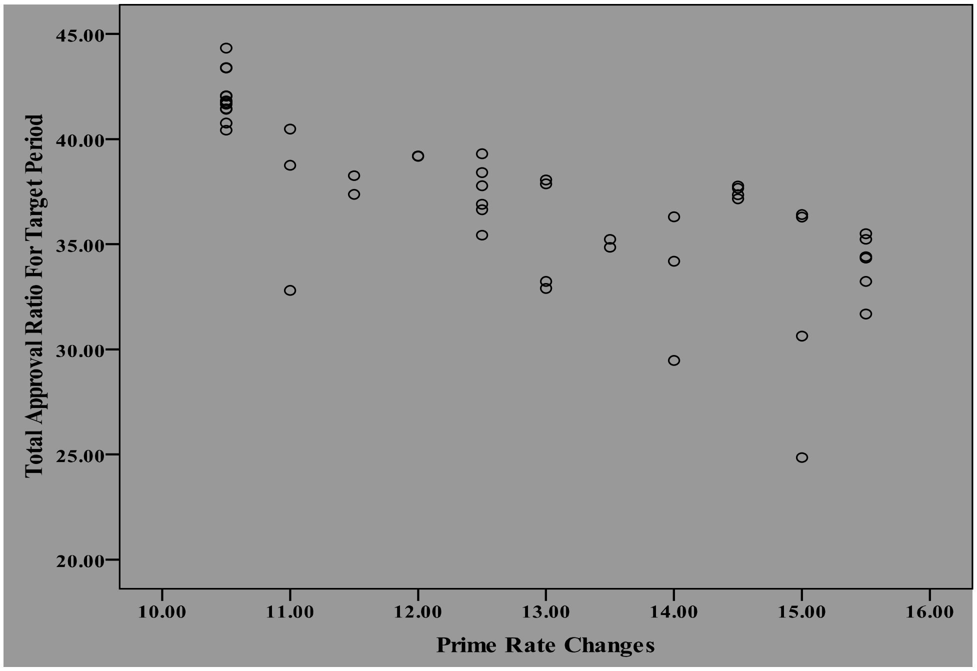
2. **Normal Q-Q plot for Total Approval Ratio for Target Period**



3. **Box plot for Prime Rate Changes**

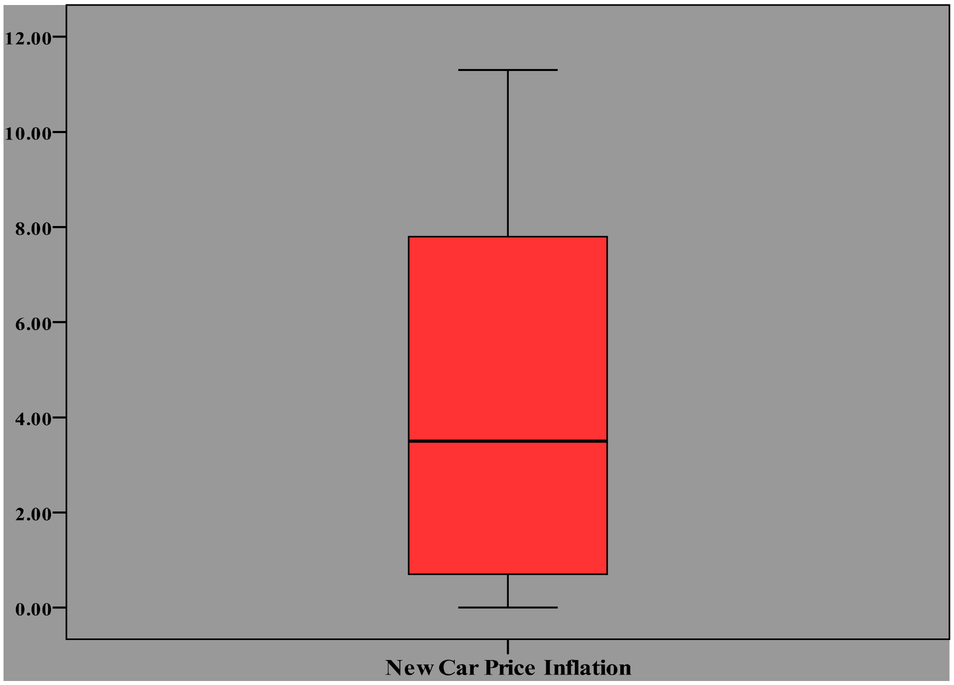


4. **Normal Q-Q plot for Prime Rate Changes**

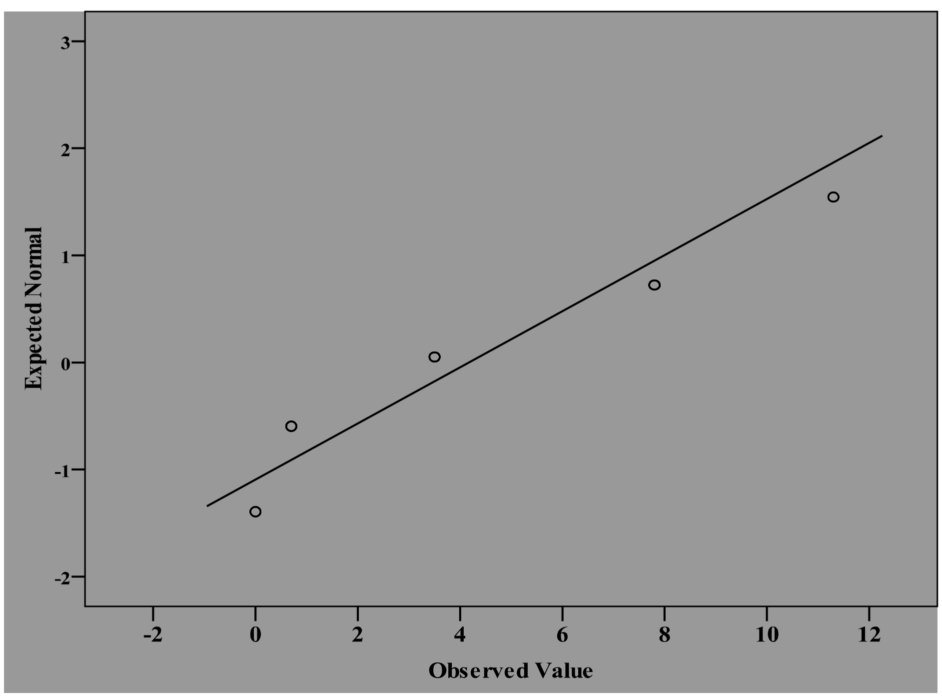


5. Scatterplot for Total Approval Ratio for Target Period versus Prime Interest Rate Movement

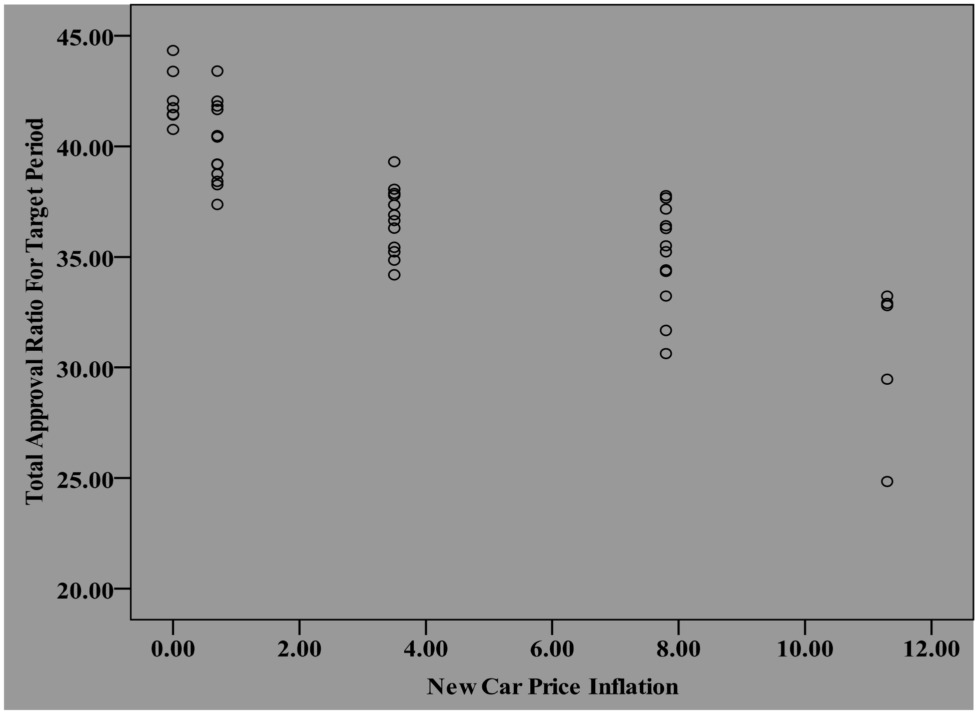
APPENDIX G



1. Box plot for New Car Price Inflation

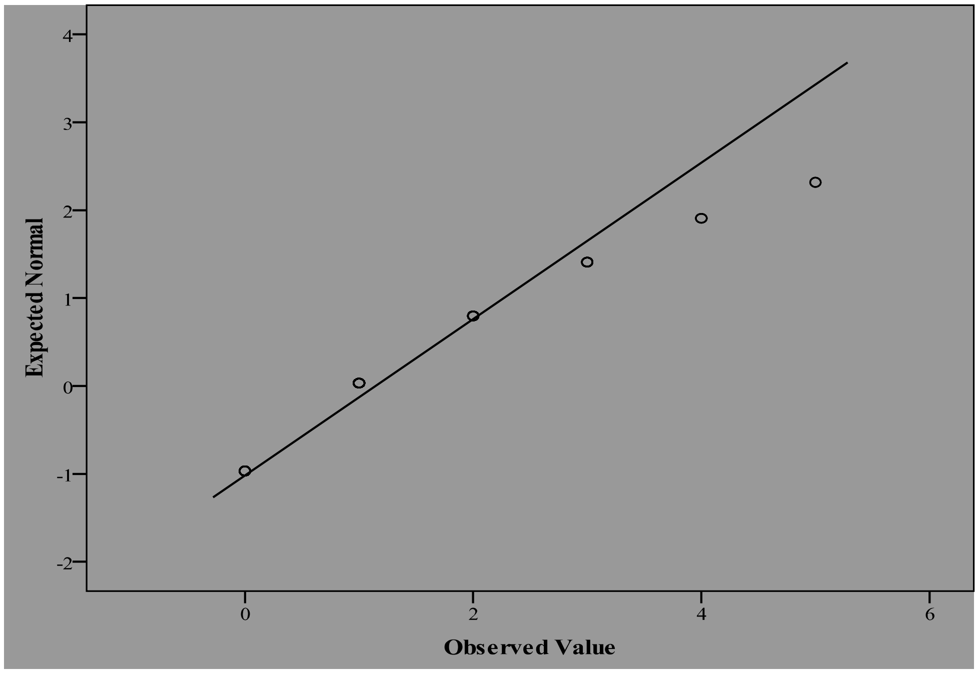


2. Normal Q-Q plot for New Car Price Inflation

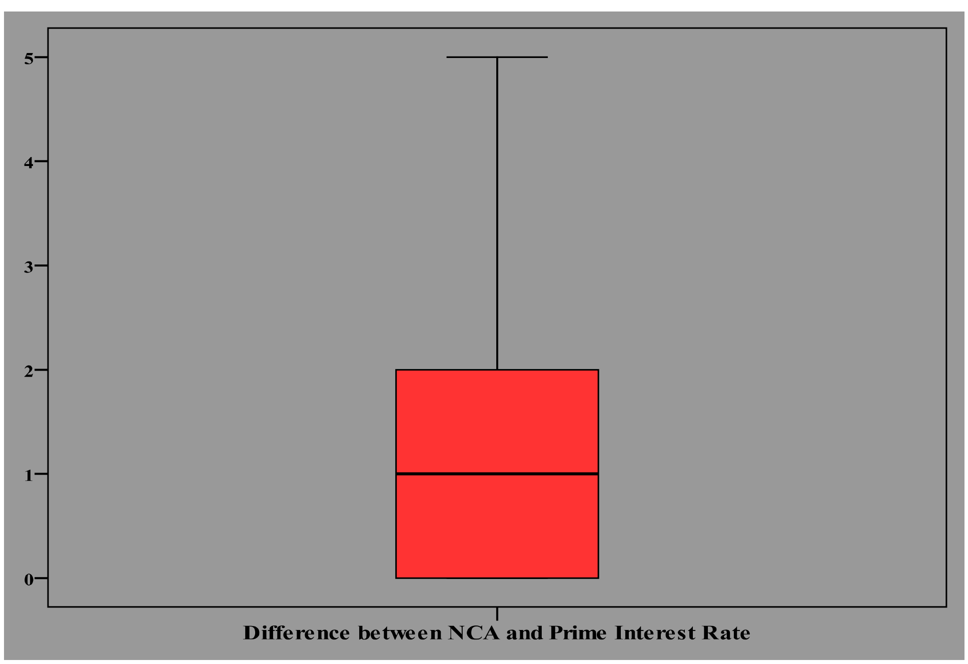


3. **Scatterplot for Total Approval Ratio for Target Period versus New Car Price Inflation**

APPENDIX H

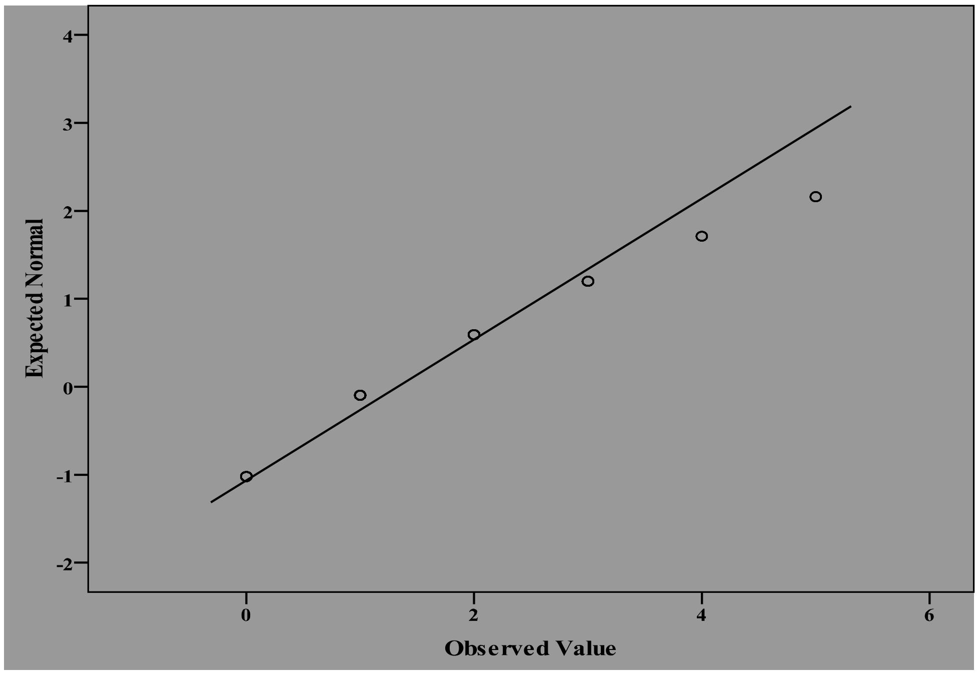


1. **Normal Q-Q plot for Differences between 'Prime Interest Rate Movement' and 'the NCA'**

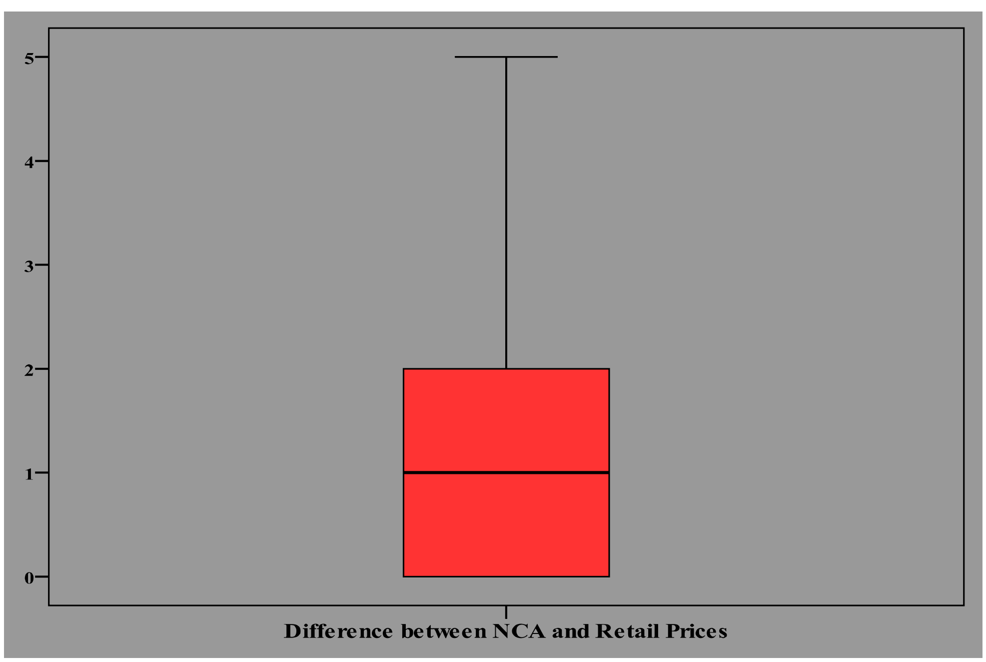


2. **Box plot for Differences between 'Prime Interest Rate Movement' and 'the NCA'**

APPENDIX I

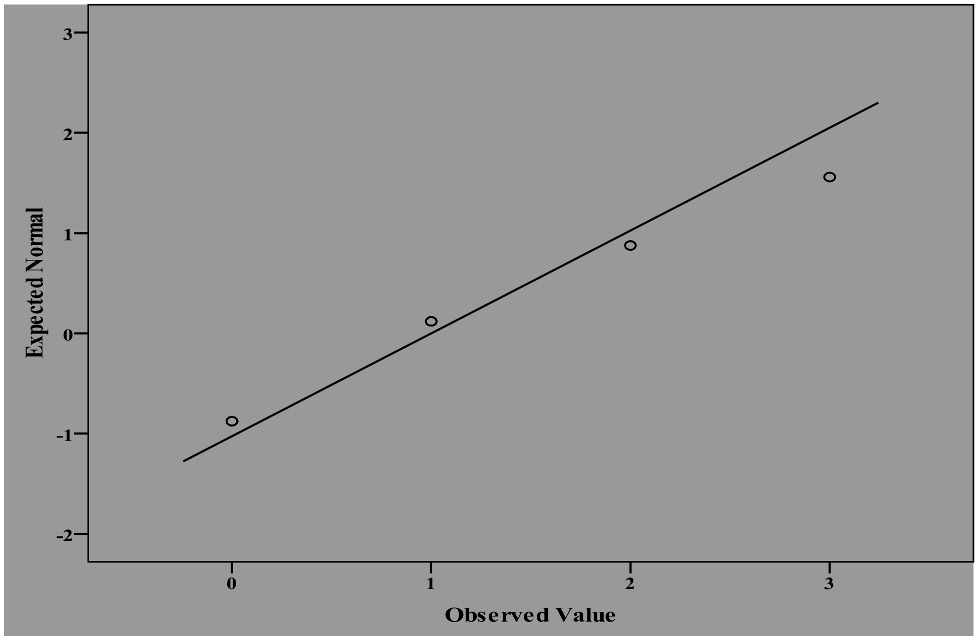


1. **Normal Q-Q plot for Differences between 'Motor Vehicle Retail Prices' and 'the NCA'**

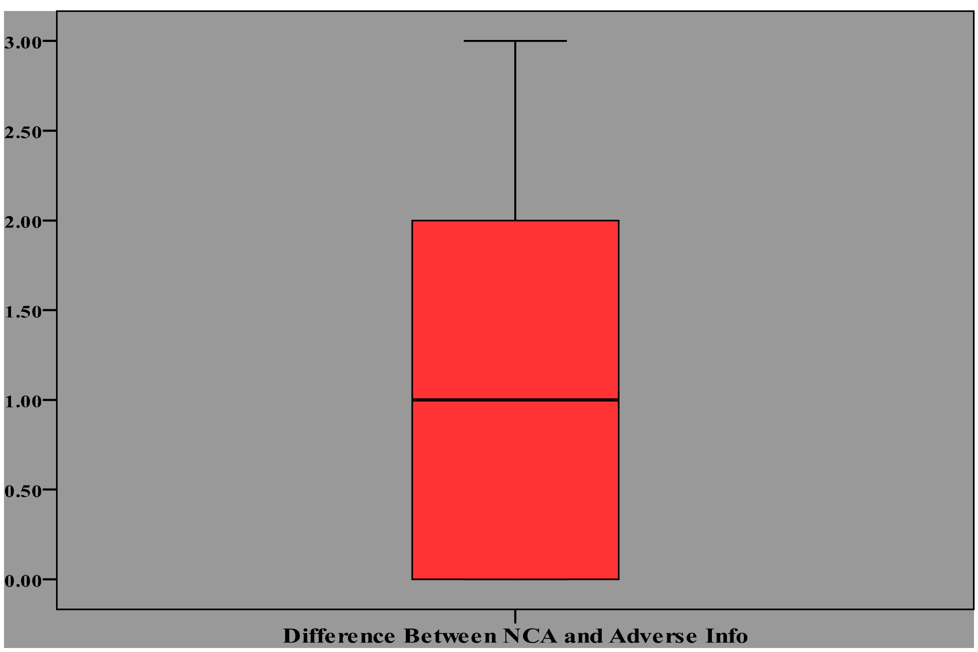


2. **Box plot for Differences between 'Motor Vehicle Retail Prices' and 'the NCA'**

APPENDIX J



1. **Normal Q-Q plot for Differences between 'Affordability in Terms of the NCA' and 'Adverse Information listed on Credit Bureaus'**



2. **Box plot for Differences between 'Affordability in Terms of the NCA' and 'Adverse Information listed on Credit Bureaus'**