ECONOMIC ASSESSMENT OF INTEREST RATE CAPPING ON THE SOUTH AFRICAN ECONOMY – AN INFORUM APPROACH

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Introduction

The National Credit Act (NCA, 2005) of South Africa was introduced to "promote and advance the social and economic welfare of South Africans; to promote a fair, transparent, competitive, sustainable, responsible, efficient, effective and accessible credit market and industry; and to protect consumers". Within this context, the Department of Trade and Industry (DTI) introduced the capping of fees and interest rates of different categories of credit in 2007. In 2015, the DTI proposed further changes to the capping of fees and interest rates, i.e. a decrease of 7.5 percentage points (from 32.7 % to 25.2 %) was proposed for unsecured lending, and a decrease of 2.5 percentage points (from 22.7 % to 20.2 %) for credit facilities. These proposed changes form the subject of this report.

The point of departure for the analysis undertaken in this study is that some customers will benefit from the proposed lower interest rates; however, others would henceforth be excluded from the formal lending market by virtue of the fact that financing institutions will no longer be able to supply unsecured credit to certain high-risk customers at these lower interest rates.

In practice, this implies that there will be a positive impact on the economy resulting from the fact that a category of customers will be paying a lower interest rate on credit, which means that such customers will have more money to spend on other goods and services. However, there is a conversely negative impact, in that there will be less credit available for consumer spending by a category of customers who no

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longer qualify for credit in the formal lending market. It is anticipated that some of these disqualified customers will turn to informal lenders for credit. The role of these informal lenders in catering for some of the credit rejected by the formal lending sector forms a critical element of this study, and it is assumed that informal lenders will charge substantially higher interest rates as compared to formal lenders.

The main output of the analysis undertaken in this study is the impact that the proposed interest rate changes for unsecured credit and credit facilities will have in terms of the gross domestic product (GDP), employment, household income, and government revenue.

1. The principle of capping – a brief literature overview

1.1. Arguments in favor of interest rate caps

According to a Harvard University study (Staten, 2008), "legislators have, for centuries, advocated caps on loan interest rates (rate ceilings) as a form of consumer protection in otherwise free market economies. More recently, restrictions on creditor collection practices and loan contract features have been added to the regulators' list of tools for protecting consumers from abusive lenders and credit."

In the South African context, legislators are of the opinion that overindebtedness and financial exclusion are problems that tend to affect poorer consumers the most. Financially excluded consumers have been known to turn to high-cost categories of credit to finance relatively large single-product purchases, or even to finance some of their day-to-day living expenses.

Legislators tend to view interest rate caps or ceilings as a means of "saving consumers from themselves" (Staten, 2008) and as a means to limit over-indebtedness; and the extent to which consumers could face being blacklisted, prosecuted for bad debts, or declared insolvent – all of which are seen as having undesirable socio-economic effects.

1.2. Negative aspects of interest rate caps

Despite the seemingly laudable intentions of regulators, various studies have pointed out that interest rate caps may not have all of the benefits that regulators ascribe to them, whilst a number of unintended consequences may result from a rigid application of interest rate caps.

A 2013 University of Bristol study found that interest rate caps may result in a situation, where "lenders who do not exit the market may tighten their lending criteria and improve their risk assessment practices." This will restrict credit access for some types of consumers, particularly on low-income earners. In addition, "the diversity of

short-term credit products that are available may reduce, resulting in less choice for consumers", and "access to credit may reduce particularly for low income or other vulnerable consumers".

A study conducted by the World Bank in 2014 (Maimbo & Claudia, 2014), reveals the following on interest rate capping.

- Caps on interest rates have been declining over the past several decades in most industrialized countries and a rising number of developing countries. The rationale for these changes is to make financial markets more accessible, and this has a positive impact on growth, productivity, and poverty reduction.
- Much of the evidence argues against the use of interest rate caps since they are an inefficient tool for lowering interest rates, especially in the long run. They also limit access to credit, reduce transparency, and decrease product diversity and competition. In addition, they could undercut the demand for formal credit and affect firms' productivity.
- Because interest rate caps distort the market and generate adverse selection, financial entities tend to lend to clients with higher collateral or better risk profiles. Consequently, financial institutions curtail their lending to those who need it most and who have little access to alternative sources of credit.
- Where interest rate ceilings or caps are set at unprofitable levels, financing institutions and microfinance institutions may withdraw from certain locales such as rural areas or from expensive market segments because they cannot cover their costs.
- Low-income customers with few options for borrowing in the formal market could turn to unlicensed moneylenders, probably at much higher interest rates and less protection.
- Evidence has shown that interest rate caps on credit discourage unlicensed (and hence unregulated) microfinance enterprises and other sources of finance for the poor from converting into licensed financial institutions.

The authors have to a large extent taken into consideration the views of the aforementioned study by the World Bank in calculating the economic impact of interest rate capping.

1.3. The determination of credit prices and consequences of capped interest rates

An often-held view by certain observers is that lenders will promote lending products with the largest profit potential, and that such products are short-term credit with high interest rates. However, each credit agreement category has specific characteristics relating to charges, origination and administration costs, repayment periods and conditions,

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and risk profiles. Specifically, with regard to risk, it is particularly difficult to compare secured credit products (such as mortgage credit) with unsecured credit products as the risks attached to these types of credit products are vastly different. Financing institutions have rather involved processes related to managing the gaps in terms of the maturities of their liabilities (deposits) and assets (credit) as this could have a crucial impact on aspects such as solvency and liquidity.

In view of the fact that the risk premium associated with the cost of a particular credit product will differ from customer to customer and from credit product type to credit product type, any reduction in the maximum interest rate that may be charged on a credit product will make a certain proportion of credit unaffordable from the lender's perspective. Consequently, a reduction in capped interest rates will lead to an increase in the number of credit applications that are declined, and customers who would previously have been able to secure credit at relatively higher interest rates will then not have access to finance in the formal, regulated market. Some portion of such customers may approach the unregulated market for assistance where they would be charged considerably higher rates of interest and be less protected.

2. Impact of the proposed changes to fees and interest rates on household income and expenditure

2.1. Introduction

Broadly speaking, the methodology employed to estimate the possible impact of changes in interest rate caps on unsecured credit and credit facilities¹⁰ on the macro-economy, consists of two phases:

- the first phase calculates the likely impact on disposable income and consumption expenditure of the proposed interest rate changes on both unsecured credit and credit facilities, and
- the results of the first phase are then used in the second phase as an input to "shock" the South African INFORUM Model (SAFRIM).

Data utilized in the first phase of this study were sourced from the March 2015 Consumer Credit Market Report published by the National Credit Regulator (NCR), and the Banking Association of South Africa. Where data were not available, assumptions have been made that reflect a reasonable approximation of the magnitudes required by the modeling approach.

¹⁰ Types of Credit Facilities include: credit and / or garage cards, bank overdrafts, store cards, services, and other facilities.

In calculating the impact on disposable income and consumption expenditures, the assumption is made that a segment of consumers seeking unsecured credit (between the current maximum interest rate of 32.65 % and the proposed cap of 25.2 %) will be unable to qualify for credit in the formal financial sector. The inability to source credit will negatively impact the spending ability of such households. It was further assumed that a segment of the non-qualifying customers in the formal financial sector at higher interest rates than those charged in the formal sector.

Since the short-term impact differs from the long-term impact, and to introduce a dynamic element to the analysis, the investigation has been undertaken over the 10-year period from 2015 to 2025. In addition, it was assumed that growth forecasts of real GDP (constant 2015 prices) as calculated by SAFRIM served as an adequate proxy of the projected growth in credit extended over the analysis period.

2.2. Impact on unsecured credit

The total debtors' book of credit extended to the household sector amounted to more than R1.6 trillion at the end of March 2015. Of this amount, R166.6 billion was in the category "unsecured loans". In undertaking this study, it was assumed that 50 % of the value of the debtors' book of unsecured credit is subject to interest rates above the new proposed cap of 25.2 %, but below the current cap of 32.65 %.

This study foresees that there will be a 32 % reduction in total unsecured credit by formally regulated financial institutions if interest rates were to be capped at the proposed new lower interest rate on unsecured credit. Furthermore, the assumption is made that 64 % of existing credit amounts that would normally have been rolled over after their current terms have ended will not be renewed by formally regulated financial institutions.

This study also foresees that some of the customers that do not qualify for credit from the formal financial sector will turn to the informal, unregulated financial sector, where interest rates are extremely difficult to regulate. The assumption is made that 50 % of the rejected loan applications in the formal sector will be serviced by the informal sector at an average annual interest rate of 60 %.

Together, these assumptions will affect household disposable income in the following ways:

- those households that are granted credit at the lower interest rate cap will experience an increase in disposable income;
- those households that no longer qualify for new credit will not be paying interest on credit anymore, which will increase their disposable income;

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- the credit provided by the informal financial sector to customers that turn to this sector will have a positive effect on household disposable income; and
- the rejected credit in the formal financial sector, and a decision not to take up credit in the informal lending sector will have a negative effect on household disposable income.

The total impact on disposable income and household expenditure is thus the net sum of these impacts.

2.3. Impact on credit facilities

A similar type of analysis was performed to measure the impact of the proposed cap on interest rates on the credit facilities category, which represented 12.9 % of the total debtors' book at the end of the first quarter of 2015 as reported by the NCR. The major differences between assumptions made with regard to credit facilities and unsecured credit are the following.

- The terms of credit facilities' agreements differ from those of unsecured credit. The assumption is made that credit facilities have shorter term agreements as compared with unsecured credit.
- It is assumed that 40 % of credit facilities above the proposed cap of 20.2 % will be affected, whilst in the case of unsecured credit, the percentage is 50 %.

2.4. Impacts on consumer expenditure

Tables 1 and 2 below provide a summary of the impact of interest rate caps on unsecured credit and credit facilities.

The tables show that for both types of credit the impact of lower interest rate caps will be negative on consumption expenditure. This

Table 1

Net interest paid (negative value indicates positive impact on disposable income)		Net credit effect (credit from informal lending (positive) and rejected credit (negative))	Net effect on consumption expenditure	
2016	400	-5 012	-4 612	
2017	850	-5 644	-4 793	
2018	1 429	-7 259	-5 829	
2019	2 271	-10 551	-8 280	

Unsecured Credit – Summary of Impacts on Consumer Expenditure (R million, 2015 Prices)

	Net interest paid (negative value indicates positive impact on disposable income)	Net credit effect (credit from informal lending (positive) and rejected credit (negative))	Net effect on consumption expenditure
2020	3 117	-10 595	-7 478
2021	3 377	-3 260	117
2022	3 491	-1 439	2 053
2023	3 610	-1 488	2 122
2024	3 733	-1 538	2 194
2025	3 860	-1 591	2 269

implies that the reduction in credit granted dominates the savings emanating from the lower interest rates. In the case of unsecured credit, this outcome lasts for 5 years. In the case of credit facilities, the negative effect lasts for the whole analysis period.

Table 2

Credit Facilities – Summary of Impacts on Consumer Expenditure
(R Million, 2015 Prices)

	Net interest paid (negative value reflects positive impact on disposable income	Net credit effect (credit from informal lending (positive) and rejected credit (negative))	Net effect on consumer expenditure
2016	59	-17 569	-17 629
2017	80	-6 094	-6 174
2018	101	-6 126	-6 227
2019	104	-1 013	-1 117
2020	108	-1 047	-1 155
2021	111	-1 083	-1 194
2022	115	-1 120	-1 235
2023	119	-1 158	-1 277
2024	123	-1 197	-1 320
2025	127	-1 238	-1 365

(Source: Conningarth Economists)

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The impacts listed in Tables 1 and 2 form the inputs to the modeling system in order to calculate economy-wide impacts. The modeling system is "shocked" separately by the consumer expenditure effect of the two different types of credit. The reason for doing this is that the sectoral impacts of the two types of credit differ from one another.

3. Modeling the macroeconomic impacts of proposed changes in interest rate caps

3.1. Modeling System

In order to calculate the impact of the "Draft Regulations on Review of Limitations of Fees and Interest Rates" proposed by the DTI on the South African economy, the South African INFORUM Model (SAFRIM) has been employed. The SAFRIM is primarily based on the so-called INFORUM model developed by Clopper Almon of the University of Maryland in 1967, and has been adapted for South African conditions (Almon, 1991). Currently, the INFORUM Model is used by several countries for forecasting and macroeconomic impact studies, and is supported by a satellite of the International Input-Output Association called the INFORUM group.

The SAFRIM modeling system is macroeconomic, dynamic, and multisectoral, and is part of the family of general equilibrium models used around the world. It depicts the behavior of the economy in its dynamic sense, i.e. the workings of all of the major markets in their inter-related, dynamic existence are accommodated in the model.

The system is multi-sectoral and includes an input-output (I-O) table and national accounts that also depicts the magnitude and diversity of intermediate consumption (i.e. inputs into production processes) within the context of the current economic structure. This allows the system to integrate intermediate input prices with sectoral price formation that ultimately determines overall price levels in the economy. This is achieved through the use of behavioral equations for final demand that depend on prices and output; and functions for income that depend on production, employment, and other economic variables.

An important feature of this macroeconomic multi-sectoral model is its bottom-up approach in terms of which the model mimics the actual workings of the economy in that macroeconomic aggregates are built up from detailed activities at the industry or product level rather than first being estimated at the macroeconomic level, and then simply "distributed" across economic sectors.

3.2. Assumptions and methodology for activating the model

The macroeconomic impact of a specific policy intervention, as in the case of capping interest rates, is defined by the difference of the level of the economy before and after such intervention has occurred. As such, it is necessary to forecast the trajectory of the South African economy before the introduction of interest rate capping, which is then known as the baseline scenario.

Analysis has been undertaken over a period of ten years, using 2015 as the base year stretching up to 2025. The analysis has been undertaken in constant 2015 prices in order to provide an indication of the impact of capping interest rates in real / volume terms (i.e. without inflationary price distortions).

3.3. Forecasting the baseline scenario

It is important to note that, for the purpose of this study, the projection of the economy was done over a relatively long period, i.e. ten years. The assumptions that are usually applied to modeling, such as monetary variables (i.e. interest rates and money supply) and short term price fluctuations, which are normally imperative for short- and medium-term forecasting, are deemed not that important for this analysis. The long-term forecast is much more driven by expected structural developments in the South African economy, specifically regarding the potential of certain sectors to be able to export over the longer-term, i.e. the long-term sustainable exports of a wide array of basic commodities in various states of beneficiation (iron ore, magnetite, chrome, coal, metal products, motor cars, etc.).

Another assumption for forecasting purposes was that South Africa will play a much larger role in the economies of countries on the African continent, and will be less dependent on its traditional trading partners such as Europe and the United States of America. This assumption changes the structure of international trade, where South Africa will become more dependent on exports of manufactured goods and services, and less dependent on exports of primary and lessprocessed commodities. Furthermore, the diminishing role of gold and diamonds in the future development of the South African economy has also been taken into account; and a number of fundamental economic imperatives / rules have been built into the forecasting scenario, including that:

- there should be an acceptable current account balance in the balance of payments (not exceeding ±4 % of the GDP);
- no major obstructions will exist in obtaining foreign direct investment;
- positive growth of the world economy; and

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• future South African population growth will be negatively affected by HIV / Aids.

It is important to note that, since the advent of democracy in 1994, the South African economy has only grown in the order of 3 % to 3.5 %, which is well below the medium growth target of $\pm 4 \%$. Conningarth Economists produces medium- to long-term forecasts of the South African economy that reflect the demand for commodities on a detailed basis. The current forecasts for the next ten years are as follows:

- likely growth scenario: 3.3 %
- high growth scenario: 4.5 %
- low growth scenario: 2.5%

The likely growth scenario has been used as the base scenario for this study.

3.4. Methodology employed to activate the model

The model has been activated using the following final demand identity (constant prices):

 $fdc = pcec + invc + govc + exc - imc + fdrc + trcc + \Delta pcec$ (1)

where

fdc – total final demand;

pcec – private consumption expenditures;

invc – investment (investment excluding investment in the mitigation measures);

govc – government;

exc – exports;

imc – imports;

fdrc - residual;

trcc - transfer costs;

 $\triangle pcec$ – change in private consumption expenditures – amount used to "shock" the model.

The change in private consumption expenditure results from the lowering of interest payments on credit, as well as changes to consumer spending due to reduced credit availability and higher interest payments on credit sourced through the informal unregulated lending sector not catered for by the formal financial sector.

The change in the magnitude of private consumption expenditure related to the capping of interest rates has been incorporated into the Δ pcec variable on an annual basis over the 2015–2025 period. The change in private consumption expenditure has been categorized into two groups, namely, unsecured credit and credit facilities. The latter was further differentiated into two elements, namely, increased private consumption expenditure due to lower interest rate payments; and lower private consumption expenditure resulting from a reduction in

credit approvals. For an exposition of how these aspects were calculated, refer to the previous section.

A further requirement for activating the model is that the impact on private consumption expenditure calculated above is apportioned across the current spread of commodities that is representative of private consumption expenditure. This procedure is described further.

3.5. Methodology for estimating changes in spending patterns

The initial effect of capping interest rates is that consumers that receive credit from the formal financial sector will have more disposable income to spend. This money will probably be spent in accordance with current spending patterns on various commodities and services. Use was made of the RSA Social Accounting Matrix (SAM), where the SAM provides detailed spending patterns on various commodities of the different household income groups to determine current spending patterns. It was also assumed that the most affected households are mainly the lower to middle-income groups as opposed to the very low-income or very high-income groups; low-income households do not normally qualify for credit, whilst rich people do not require these types of credit – they are more active in the mortgage and secured credit groups.

Similarly, as in the previous case, SAM data were also used to estimate changes due to the unsecured credit, except that the information regarding unsecured credit was available in terms of level of income. In this case, the spending patterns on commodities of the various income groups were weighted by the value of the magnitude of credit given to each income group.

A similar approach was used to estimate changes related to credit facilities, except that the spending on certain commodities was excluded or curtailed in the spending patterns of the various groups. Examples of this include motor vehicles and furniture, where these are covered under secured credit, which is not profoundly impacted by the capping of interest rates.

3.6. Results of the macroeconomic impact of proposed interest rate and credit cost capping on GDP and labor

This section presents the macroeconomic impact of the proposed changes to interest rate caps. As already indicated, the impact on only two macroeconomic variables was modeled, i.e. gross domestic product (GDP) and employment.

The impact on GDP reflects the magnitude on value added in the economy, where value added is a measure of economic growth. Value added is made up of three elements, namely:

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- remuneration of employees;
- gross operating surplus (which includes profit and depreciation); and
- net indirect taxes on production.

Labor is a key element of the production process. The study has determined the number of employment opportunities that will be lost or created by the proposed changes to interest rate caps by the financial sector. Whereas GDP is a reflection of economic growth, labor can be seen as a reflection of income distribution in the economy. The more people are employed, the more people take part in the economic production process.

The results of the macroeconomic impact analysis are presented for three scenarios. All three scenarios assume that both the formal and informal banking sectors will be affected by the proposed interest rate and credit cost capping in that a portion of customers (i.e. 35 %) will be redirected into the informal unregulated lending sector, where it is assumed that the interest rate charged to customers will be greater than the rate charged to customers in the formal sector, i.e:

- Scenario 1 assumes that the informal unregulated lending sector interest rate will be 60 % p. a.;
- Scenario 2 assumes that the informal unregulated lending sector interest rate will be 70 %; and
- Scenario 3 assumes that the informal unregulated lending sector interest rate will be 80 %.

3.7. Scenario 1 results

In considering Table 3, the following aspects are of importance.

- The net effect in terms of GDP and employment is negative, which means that the economy will lose out in terms of economic growth (GDP) and employment creation if interest rates on credit facilities and unsecured credit are capped at the proposed rates over the analysis period. Specifically, GDP will decrease by R 4 073 million, and about 40 601 potential jobs would be lost (see column 7). It is important to note that the GDP and potential job losses are average values / numbers over the period 2016–2025, i.e. potential job losses will amount to 40 601 on average per year over the programming period if interest rates are capped (see Table 4).
- The impact of capping the interest rate on unsecured credit on the economy is smaller than the impact of interest rate capping on credit facilities.

The only difference between Tables 3 and 4 is that the latter provides the same information on an annual basis. It is evident from

Summarized Results of Scenario 1 of the Economic Impact. GDP (R Million, 2015 Constant Prices) and Employment (Numbers) for Unsecured Lending and Credit Facilities (Average Over the Period 2016 to 2025)

	Unsecured credit Impact on consumption expenditures			Credit facilities		es	pu	
enario 1			ml ct q expo expo		ict on mption ditures	edit faciliti npact	mpact on ed credit a t facilities	
ů	Net interest paid	Change in credit	Total cred	Net interest paid	Change in credit	Total cr ir	Net unsecur credi	
Column No.	1	2	3	4	5	6	7	
GDP – total	2 307	2 301		2 305	2 302			
economy	241	928		463	722			
Baseline	2 305	2 305		2 305	2 305			
Dusenne	357	357		357	357			
Difference	1884	-3 429	-1 544	106	-2 635	-2 529	-4 073	
Employment –	15 155	15 106		15 138	15 110			
total economy	220	900		941	196			
Pacalina	15 137	15 137		15 137	15 137			
Baseline	965	965		965	965			
Difference	17 256	-31 064	-13 809	977	-27 769	-26 793	-40 601	

Table 4 that the impact of capping is significantly negative for the first six years, thereafter, the impact turns positive. This initial negative effect should be attributed to the "bringing forward" of creditaffecting disposable income because the credit that would have been granted before capping will now not be granted. The positive effect starts in year 2019 due to the fact that people would, by then, benefit from lower credit repayments resulting from lower interest rates. This is in regards to paying less on credit, which is granted, as well as the fact that they don't have to pay interest on credit that was rejected by the formal sector.

Figure 1 indicates that the impact will mostly be on the services sector with nearly 40 %. The manufacturing sector will also be substantially negatively affected on average over the forecasting period.

Table 4

	Unsecured credit Impact on consumption expenditures		_	Credit facilities Impact on consumption expenditures		es	pu	
enario 1			unsecured it impact			edit facilit npact	mpact on ed credit a facilities	
S	Net interest paid	Change in credit	Total	Net interest paid	Change in credit	Total cre in	Net ir unsecure credit	
Column No.	1	2	3	4	5	6	7	
			GDI	5				
2016	293	-3 561	-3 268	43	-12 693	-12 650	-15 918	
2017	619	-3 986	-3 368	57	-4 367	-4 310	-7 678	
2018	1 034	-5 094	-4 061	72	-4 350	-4 278	-8 338	
2019	1633	-7 363	-5 730	74	-692	-617	-6 347	
2020	2 215	-7 334	-5 119	76	-703	-627	-5 747	
2021	2 401	-2 238	163	78	-731	-653	-490	
2022	2 548	-1 619	929	157	-675	-518	411	
2023	2 695	-1000	1 695	237	-620	-383	1 312	
2024	2 664	-1 030	1633	131	-749	-617	1 016	
2025	2 744	-1 061	1683	135	-770	-635	1048	
Average	1884	-3 429	-1 544	106	-2 635	-2 529	-4 073	
			Employi	ment				
2016	2 959	-34 189	-31 231	424	-137 801	-137 377	-168 608	
2017	6 126	-37 557	-31 431	559	-46 417	-45 858	-77 289	
2018	10 055	-47 158	-37 103	695	-45 498	-44 803	-81906	
2019	15 611	-67 032	-51 421	704	-6 927	-6 223	-57 644	
2020	20 849	-65 668	-44 819	711	-6 991	-6 281	-51 100	
2021	22 177	-19 533	2 644	720	-7 149	-6 429	-3 785	
2022	23 086	-13 939	9 147	1369	-6 628	-5 259	3 888	

Annual Results of Scenario 1 of the Economic Impact: GDP (R Million, 2014 Constant Prices) and Employment (Numbers) for Unsecured Lending and Credit Facilities

	Unsecured credit Impact on consumption expenditures		_	Credit facilities		ies	pui	
enario 1			unsecured it impact	Impo consu expend	ct on nption ditures	edit facilit npact	mpact on ed credit a t facilities	
Š	Net interest paid	Change in credit	Total cred	Net interest paid	Change in credit	Total cr	Net i unsecur credi	
Column No.	1	2	3	4	5	6	7	
2023	23 996	-8 345	15 650	2 018	-6 108	-4 090	11 561	
2024	23 647	-8 523	15 123	1288	-7 000	-5 712	9 411	
2025	24 050	-8 699	15 351	1 278	-7 171	-5 892	9 459	
Average	17 256	-31 064	-13 809	977	-27 769	-26 793	-40 601	



Fig. 1. Sectoral GDP impact of capping interest rates on unsecured lending and credit facilities, %.

3.8. Sensitivity analysis – results of Scenario 2 and Scenario 3

As indicated above, three levels of informal lending interest rates have been tested, namely 60 %, 70 %, and 80 % for Scenario 1, Scenario 2, and Scenario 3, respectively.

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Table 5

Macroeconomic Impact of Different Interest Rate Levels in the Informal Lending Sector								
	Scenario 1	Scenario 2	Scenario 3	Scenario 2 - Scenario 1 % change	Scenario 3 - Scenario 1 % change			
Interest rate p.a.	60 %	70 %	80 %					
GDP (R million, 2014 prices)	-4 073	-7 927	-9 978	94.6 %	145.0 %			
Employment (numbers)	-40 601	-76 031	-93 302	87.3 %	129.8 %			

Currently, much higher rates are charged in the informal unregulated lending sector – there is overwhelming evidence that people are paying up to 20 % per month, which translates to a compounded interest rate of over 240 % per annum. However, it must be noted that the level of interest is inversely related to the volume of money that will be taken up in the informal lending sector. Further, it should also be noted that the additional customers in the informal lending sector are people that have been rejected by the formal lending sector where they were previously accommodated at interest rates in the range not higher than 33 %. They will therefore be reluctant to pay extreme interest rates that are common in the informal unregulated lending sector of 100 % plus per annum.

Table 5 presents the impact on GDP and employment for the different levels of interest rates charged in the informal lending sector, with the assumption that the same volume of credit would be taken up at the different interest rate levels. This assumption is only to a certain extent acceptable due to the fact that the assumed changes in levels are not that drastic. It is evident that there are major impact differences between the interest rate scenarios. For instance, the impact is more than doubled between Scenario 3 and Scenario 1, although the interest rate is only 20 percentage points higher.

The purpose of this exercise is to demonstrate that the impact given in the standard scenario (i.e. Scenario 1, 60 % interest rate charged in the informal lending sector) is not that unrealistic in view of the fact that currently up to 240 % per annum is charged for credit by the informal lending sector.

Conclusions and recommendations

The macroeconomic impact analysis of the proposed changes to the limitation of interest rates charged demonstrates very clearly that GDP and employment will be demonstrably negatively affected by the proposed changes. For example, on average over the period, GDP will decline by about R 4.1 billion, and employment losses will be 40 600 jobs over the 10-year analysis period. The main reason for this is that there is an inverse relationship between capping interest rates at lower levels and the willingness of financing institutions to accommodate credit resulting from the additional risks that financing institutions would carry at lower administered interest rates. The advantages of lower interest rates to customers are also to a great extent nullified by the fact that a certain number of customers who are rejected by the formal banking sector would be obtaining credit from the informal unregulated lending sector, but at significantly higher interest rate regimes.

It is of critical importance to note that only a portion of the customers that were in the past accommodated in the formal banking sector will be redirected into the informal lending sector – in the analysis undertaken, it has been assumed that, on average, 64 % of unsecured credit customers and 50 % of credit facilities customers that will not be serviced by the formal lending sector would be accommodated in the informal lending sector. The reason for this is that these groups of customers have always been accommodated in the formal lending sector at the maximum interest rates of 32.65 % for unsecured credit and 22.65 % for credit facilities. These rates are much lower than the rate currently charged by the informal unregulated lending sector, and it is foreseen that most of the customers that are declined in the formal banking sector will therefore not be willing to pay excessively high interest rates in the informal unregulated lending market, and rather refrain from further borrowing.

South Africa's lending sector is generally quite competitive and efficient, suggesting that major changes in the policy environment are not warranted. If lower interest rate caps were to be introduced, this should happen gradually with full cognizance of the consequences to the economy as a whole, as well as the potential unintended consequences. Any policy actions should not reduce the availability of credit in the economy.

Credit fees charged by formal financial institutions that have remained unchanged since 2007 are in need of adjustment. It is recommended that these fees (service and initiation fees) should be linked to an index such as the Consumer Price Index.

Where the regulation of fees and the implementation of changes to interest rate caps are deemed necessary by regulators, these should be

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implemented with caution and should, ideally, be phased in gradually. Interest rate caps should also be regularly reviewed to ensure that the negative effects associated with interest rate capping remain contained.

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