

Proposal for "Rationalizing" The Rate of Profit of Bank Loans: A Critique

Abdollah S. Soofi*

Received: 1 Jul 2009

Accept: 5 Sep 2009

Abstract

In winter 1383, the center for Research of Majlis Shura Islamic of Iran (CRMSII) published a proposal on the logic of the prevailing profit rate that the commercial banks pay/charge on long-term bank loans requiring the executive branch of Islamic Republic to lower the average rate of profit by 4.5 percent within 18 months of passage of the bill by Majlis, to reduce government budget deficit by 20 billion rials, to reduce another 4% in the profit rates all within two years after passage of the bill and to provide quarterly report to the Majlis on implementation of the law by the executive branch. In what follows, I would state and examine both empirically and theoretically, the validity of the arguments in support of legislative action on defending the rates of profits charged and paid by the banks.

Keywords: Profit, Bank Loans, Interest rates, Rationalization.

JEL: G21; G28, G24; H81.

* Professor of Economics University of Wisconsin-Platteville.

1. Introduction

In winter of 1383, the Center for Research of Majlis Shura Islamic of Iran (CRMSII) published a collection of essays and commentaries, from hereon referred to as the Proposal, on the "logic" of the prevailing interest rates¹, euphemistically called the profit rate that the commercial banks pay/charge on long-term bank loans. This document was intended to provide rationale for a Majlis' legislation requiring the executive branch of the Islamic Republic to lower the average rate of profit charged by banks by 4.5 percent within 18 months of passage of the bill by Majlis. Moreover, there were three amendments to the bill. The first amendment required the executive branch to reduce government's budget deficit by 20.000 billion rials within two years of passage of the bill. The second amendment required the executive branch to prepare conditions for another 4% reduction in the profit rate on long-term loans also within two years after passage of the bill. Finally, Ministry of Economics was required to provide quarterly report to the Majlis on implementation of the law by the executive branch.

In the Introduction to the volume, the CRMSII, graciously states that "... The Center for Research in no way considers itself to be free of errors; and accordingly, welcomes all points of views and criticisms pertaining to this collection". Given the pivotal role profit rates play in optimal management of macroeconomic systems, the following comments which are supported with empirical/statistical analysis, are prepared in the hope that some additional light be shed on this eminently important issue. For "rationalizing" the rate of profits the banks charge on long-term loans, should be based on economic logic rather than on legislative mandate emerging from the ideological preferences of the law-makers who are benevolently motivated to safeguarding the interests of their constituencies.

¹- Proposal for Rationalizing the Rate of Profit on the Bank Loans.

In what follows, I would first state and then critically examine-both empirically and theoretically-the validity of the arguments provided in the volume in support of legislative action on defining the rates of profit charged and paid by the banks. The results should enable us to pass informed judgments about the correctness of the claims and the prudence of profit rate legislative decree.

2. Problems with the Existing Profit Rate Structure According to the CRMSII

Based on the complaints of investors and producers in Iran about the high profit rate charged by the commercial bank, the proposal enunciated, albeit without empirical or theoretical support, a number of reasons in support of legislative action that mandated the profit rate on banks' long-term loans.

Among the many reasons stated in the Proposal, I examine the following main claims:

- a) The age of double digit inflation and interest rates in the world economy is over accordingly, the Third World producers as well as regional and global competitors of Iran pay single digit profit rates on investment loans, making Iranian producers less competitive in international trade.
- b) The competitive pressure on Iranian producers is compounded by the government's reduction of trade barriers in recent years.
- c) In spite of negative real profit rates in Iran, the volume of deposits at the banks has been on the rise. The author(s) of the Proposal claim that volume of banks deposits in Iran is a function of risk, and guaranteed non-taxable returns on the deposits.

- d) Commercial banks' "unnecessary" spending on new buildings and luxurious office spaces.
- e) The profit rates on loans charged by the banks are an important determinant of the free money-market interest rate, approximately 60%¹, which are historically charged in the secondary money markets. Further, it is argued that the high rate in the free money market has misallocated investment funds by having owners of financial capital to lend money in the secondary money market rather than invest the funds in the real sector of the economy.
- f) One of the factors that would attain the "suitable" profit rate is low bank spread, that is, the difference between the rate banks charge on loans and the rate banks pay on deposits. To lower the margin, the banks should lower interest rates on loans between 2 to 3 percent.

3. Are the claims by the CRMSII valid?

We now critically examine the validity of the claims that appear in part II above.

- a) The age of double digit inflation and interest rates in the world economy is over. Accordingly, the Third World producers as well as regional and global competitors of Iran pay single digit profit rates on investment loans, making Iranian producers less competitive in international trade.

¹- See Proposal for Rationalizing the Rate of Profit on the Bank Loans page 47.

Table (1): Deposit, lending interest rates, and Spreads in the Top 24 Exporters to Iran: 2004

Country	Lending Rate	Deposit Rate	Spread	Rank: Spread
U.A. E	19.000	9.213	10.687	23
Germany	5.410	1.940	3.470	11
France	6.60	2.250	4.350	14
Italy	5.500	0.670	4.830	17
China	5.580	2.250	3.330	10
S. Korea	5.904	3.874	2.030	6
Russia	11.400	3.792	7.608	21
Japan	1.767	0.080	1.687	4
England	4.396	3.010	1.386	2
India	10.917	6.000	4.917	19
Swiss	3.195	0.390	2.805	8
Brazil	54.925	15.416	39.509	25
Turkey	38.000	21.415	16.585	24
Belgium	6.700	1.973	4.727	16
Singapore	5.300	0.408	4.892	18
Netherland	2.750	2.309	0.441	1
S. Arabia	3.750	1.734	2.016	5
Austria	5.580	3.930	1.650	3
Spain	8.360	2.040	6.320	20
Ukraine	17.401	7.796	9.605	22
Kazakhstan	7.000	3.280	3.720	12
Malaysia	6.046	3.000	3.046	9
Taiwan	3.470	1.170	2.300	7
Thailand	5.500	1.000	4.500	15
Iran	16.00	11.770	4.230	13

Source: International Financial Statistics, IMF, and the Central Bank of the I.R. of Iran.

In determining the validity of this claim, let us take a close look at Table 1 below. Table 1 shows the loan and deposit rates as well as the spreads for the top 24 leading exporters to Iran. According to the Central

Bank of the Islamic Republic of Iran¹, the Countries listed in Table 1 below were the top 24 leading exporters to Iran in 1382.

Clearly the first assertion that "the age of double digit interest rates in over" appears to be true, at least for a large number of Iran's Leading trading partners. According to Table 1, the U.A. E, Russia, India, Brazil, Turkey, and Ukraine (lending rate) are the countries that have double digit interest rates. This implies that the inflation rates in these countries are double digit also.

Is the related claim that as a result of low interest rate abroad, Iranian producers are less competitive true? To answer this question we first need to define what is meant by international competitiveness.

International competitiveness may be defined in a variety of ways, however, let us define the ratio of foreign price and domestic price levels, when the foreign price level measured in domestic monetary unit as a measure of competitiveness. This ratio is called real exchange rate.

Symbolically, let's express the real exchange rate, ξ as

$$\xi = \varepsilon \frac{P^f}{P} \quad (1)$$

Where ε is the nominal exchange rate (the number of domestic currency per unit of a foreign currency), P^f and P are foreign price index and domestic price index, respectively.

If $\xi > 1$, the foreign price level in terms of domestic monetary unit is higher than the domestic price level, implying that the domestic economy is more competitive than the foreign economy. Clearly, if $\xi > 1$, then the foreign economy is more competitive than the domestic economy.

The real exchange rates with respect to Iran's leading trading partners' currencies and their ranking appear in Table 2 below.

¹ Central Bank of the Islamic Republic of Iran, Economic Report and Balance Sheet, 1382.

Table (2): Rial Real Exchange Rate with Respect of the Currencies of Iran's Leading Trading partners: 2004

Country	Real Rial Exchange Rate	Iran's Competitiveness	Rank
U.A. E	5097.1	59.172	16
Germany	4667.0	54.179	5
France	4825.1	56.015	8
Italy	5038.0	58.486	14
China	5060.8	58.751	15
S. Korea	5010.7	58.169	12
Russia	7909.5	91.822	23
Japan	4220.6	48.997	1
England	4972.7	57.728	11
India	5136.7	59.632	17
Swiss	4641.5	53.883	4
Brazil	6569.4	76.264	21
Turkey	13372.8	155.245	25
Belgium	4915.6	57.065	9
Singapore	4458.1	51.754	2
Netherlands	5011.5	58.178	13
S. Arabia	5195.0	60.308	18
Austria	4748.7	55.127	6
Spain	5251.4	60.964	19
Ukraine	5664.7	65.762	20
Kazakhstan	6785.5	78.773	22
Malaysia	4942.2	57.374	10
Taiwan	4510.8	52.366	3
Thailand	4820.7	55.963	7

Source: Computed by the author.

According to the data in Table 2, the only trading partner that Iran enjoys a competitive advantage with is Turkey; Note that the top 5 most competitive countries are Japan, Singapore, Taiwan, Switzerland, and Germany.

What are the sources of the competitive advantages of Iranian trading

partners compared to Iran? Is the interest rate differential between Iran and her trading partners a variable that may explain why Iranian producers are not competitive? To answer this question, we test the following model which is based on the assertion that appears in the Proposal:

$$\xi = f(d_i) \quad (2)$$

$$d_j = r_i^* - r_j^* \quad (3)$$

Where d_j is the real profit rate differential between the real profit rate in Iran, r_i^* , and the real interest rate for Iran's j^{th} trading partner. Please note that the real profit (interest) rate is the bank's leading rate less the inflation rate in the j^{th} country.

According to model (2), Iran's competitiveness, as measured by Iran's real exchange rate, is a function of Iran's real interest rate differential with respect to her trading partners.

The cross-section regression output of model (2) appears below:

Regression Analysis: Competitiveness versus d

The regression equation is

Comp Index = 0.6619 + 0.000246 d

S = 0.227784 R-sq = 0.08 R-sq(adj) = 0.08

Analysis of Variance

Source	DF	SS	MS	F	P
Regression	1	0.00019	0.0001889	0.00	0.952
Error	23	1.19337	0.0518858		
Total	24	1.19356			

According to the statistical results above ($R^2=0$ and $P=0.952$), we can confidently rule out that the interest rate differentials and competitiveness have any correlation, and as a result, we can also rule out that interest rate differentials between Iran and her trading partners have any impact on Iran's international competitiveness.

b. The competitive pressure on Iranian producers is compounded by

the government's reduction of trade barriers in recent years.

It is not clear why the authors of the Proposal have set forth this argument in favor of profit rate reduction. I presume this argument is a reflection of concerns and misgivings of Iranian producers with respect to Iranian government's free-trade policies.

The debate between free-traders and protectionists that started with David Ricardo in England over two centuries ago is well known. However, a brief discussion of the benefits of free trade and the costs of protecting inefficient domestic industries are in order.

The opponents of free-trade policy contend that liberalized trade often results in exports of jobs abroad and decline in economic activities at home. The proponents of liberalized international trade policy reject the static view of open-door policy that is presented by the critics, arguing that the beneficial effects of liberalized trade outweigh its negative effects, and cite, for example, the low inflationary pressures resulting from international competition, as a benefit of liberalized trade.

Additionally, the supporters of free-trade argue that the opponents of liberalized trade policy totally neglect the dynamic gains from trade. Moreover, in support of free trade, they point out that the dynamic gains of trade consist of increased competition and innovation resulting from international trade that are not immediately apparent, but take time to emerge. Finally, they assert that free-trade tends to make wide varieties of goods available to the consumers who, in absence of free trade, could not have access to these traded goods. Hence, they concluded that, free trade would enhance the welfare of the society as a whole¹.

¹- A detailed discussion of the experiences of East Asian economies in adopting open-door trade policy and export-led industrialization is out of the scope of the present work. I refer the interested reader to "Is Export Promotion a Prudent Trade policy for Iran?", that was presented by this author at the First Annual Conference on Trade Policy by Ministry of Commerce in Tehran in summer of 1998. This paper is available upon request from author.

C. In spite of negative real profit rates in Iran, the volume of deposits at the banks has been on the rise. The authors(s) of the Proposal claim that volume of bank deposits in Iran is a function of risk, and guaranteed non-taxable returns on the deposits.

I ran a regression of bank deposits versus the real profit rate and found no correlation between the variables. The results are not reported here. However, I used the following model in testing the hypothesis of the Proposal.

$$D = f(T, R) \quad (4)$$

Where D is the bank deposit, T is the tax variable, and R is a measure of risk. I use wealth tax as measure of taxation on interest income, and the standard deviation of stock price index for Tehran Stock Exchange as a measure of risk in Iranian economy.

Given the limited number of observations (I have 10 observations for each series for the period form 1994 to 2004), the results may not be robust. Moreover, I am using the wealth tax revenues as a proxy for non-taxable interest income of depositors. Nevertheless, the results of regression appear below¹.

The data support the hypothesis that bank deposits in Iran are correlated to the degree of risk in the economy and a measure of (but not directly) guaranteed non-taxable returns on the deposits. The positive regression coefficients indicate that as both risk and taxes increase, the size of bank deposit rises also.

¹ I note that high R² maybe due to the dependence of all variables of the model on time, making this a spurious regression.

Regression Analysis: Deposits versus Wealth Tax, Risk

The regression equation is:

$$\text{Deposits} = -7233 + 70.2 \text{ Wealth Tax} + 35.2 \text{ Risk}$$

Predictor	Coef	SE	Coef	T	P
Constant	-7233		3805	-1.90	0.099
Wealth Tax	70.227		3.214	21.85	0.000
Risk	35.192		4.739	7.43	0.000

$$S = 6290.11 \quad R\text{-Sq} = 99.58 \quad R\text{-sq(adj)} = 99.38$$

d. Commercial banks' "unnecessary" spending on new buildings and luxurious office space.

This Statement reflects the preference of the authors of the Proposal, therefore, can not be empirically tested.

e. The profit rates on loans charged by the banks are an important determinant of the free money-market interest rate, approximately 60% which are historically charged in the secondary money markets. Further, it is argued that the high rate in the free money market has misallocated investment funds by having owners of financial capital to lend money in the secondary money market rather than invest the funds in the real sector of the economy.

To examine this argument, one should start with a definition of the interest (in Iran profit) rate. A common definition one sees in the financial literature¹, defines the nominal, or quoted rate as follows:

$$r = r_{RF} + DRP + LP + MRP \quad (5)$$

¹- See, for example, Brigham, E. F. and M. C. Ehrhardt Financial Management: Theory and Practice, 11th edition, Thomson-South-Western, 2005.

Where r_{RF} is risk-free rate of interest (rates on the government securities) DRP is default risk premium, LP is Liquidity premium, and MRP is maturity risk premium.

Note that $r_{RF} = r^* + IP$,

Where r^* is real risk-free rate of interest, and IP is the inflation premium.

Therefore, we can write the nominal rate as follows:

$$R = R^* + IP + DRP + LP + MRP \quad (6)$$

For a bank loan and a secondary market loan with similar features, the large gap between the market rate (60%) and the bank rate (Currently 16%) in Iran, is the default risk premium (DRP) that investors require to take the risk of lending money in the secondary markets. In the absence of financial repression (freedom to lend and borrow at any interest rate) in the secondary money markets, the equilibrium rate, that is the rate at which the quantity of loanable funds demanded equals the quantity of loanable funds supplied, is approximately 60%. Given the conditions for the primary Iranian money market, where the official rate is substantially below the equilibrium market rate, the prevailing shortage in the money market is perfectly understandable.

Next, the empirical works in support of the argument that higher free market profit rate tends to divert resources from investment in real sector on the economy is lacking. Nevertheless, this argument contradicts and earlier statement by the authors of the Proposal that "... small and medium sized firms procure their required investment funds from official and unofficial money markets" (page 9).

f. One of the factors that would attain the "suitable" profit rate is a low bank spread, that is, the difference between the rate banks charge on loans and the rate banks pay on deposits. To lower the margin, the banks should lower interest rates on loans between 2 to 3 percent.

The authors of the proposal neither define what they consider as "suitable" profit rate, nor do they provide reasons for suggesting a 2 to 3

percent reduction in the profit rate. However, based on existing large profit rate spread between the bank loan rate and the prevailing free market rate, economic logic dictates that the bank loans rate should be increased to reduce the disequilibrium (excess demand) in the money market.

IV. Discussions and Policy Recommendations

The concerns of the authors of the Proposal for high loan rate charged by banks in Iran are legitimate. However, mandating a lower interest rate by legislative mean could have devastating economic consequences, particularly, could create higher inflationary pressure in the economy. Higher inflation, induced by an artificially determined profit rate can not and would not address the concerns of the authors of the Proposal.

A cursory look at the inflation, interest, and exchange rates of Iran and her trading partners, as shown in Tables 1 and 2, clearly shows that interest rate is not the cause of Iranian competitive disadvantage. High profit rate in Iran is not a cause but is an effect. Inflation is the culprit and the cause of high profit rate. This can readily be seen by equation (6) above. To lower the profit rate one should lower the inflation rate, which is a quite a challenging task compared to passing a law mandating a lower profit rate.

Lowering the official profit rate would compound the money market shortage by increasing the quantity of funds demanded in the official money market as well as lowering the quantities of money supplied, thus exasperating the very conditions the supporters of the proposal aim to remedy. The additional shortage resulting from a lowering of profit rate in the primary market would increase the demand for money in the secondary market which would put upward pressure in the rate in the secondary market. Moreover, additional lowering of the rate would further repress the financial markets and misallocate scarce resources.

In the final analysis, the present author makes the following policy recommendations:

- 1- Conduct a survey, based on a representative sample, of the participants in the secondary money market in Iran. This survey should define the number of the actors in the market (how many lenders and borrowers) and the size of the average loan, term to maturity of the loan, and the prevailing profit rate(s) charged, and gather other information of interest to the policy makers.
- 2- Repeal laws requiring banks to pay a mandated profit rate on the loans.
- 3- Pass laws to establish competitive structure in the banking sector and establish a regulatory agency to monitor structure (market segmentation, geographic distribution of the branches, barriers to entry, ownership, and cost structure), conduct (strategies, product promotion, sales, discriminatory lending practices, marketing, collusions, and banking innovations), and performance (the elasticity of loan demand, the interest rates on business loans and on time deposits, and the ratio of net income and total value of assets) of the banking industry. Implementation of this suggestion would ensure efficient operations of the banks, resulting in provision of better services to the public and lowering of the profit rate. Keeping in mind that studies have shown close correlation between the degree of bank concentration and market interest rates.
- 4- Pass budget laws that would ensure fiscal discipline and balanced budget for the governments at the national and provincial levels.
- 5- Lower the inflation rate, by implementing tight fiscal and monetary policies, so that the real profit rate is positive. Positive real profit rate would attract additional saving for the purpose of investment and capital accumulation.

References

- 1- Heydebrand, Wolf & Seron, Carroll. (1990). *Rationalizing Justice: The Political Economy of Federal District Courts*. New York: SUNY Press.
- 2- Kevin, J, Lis_s. (2008). Rationalizing the Taxation of Options in the Age of Derivatives *The Tax Lawyer*, 61, (3). 855, 906
- 3- Knell, M., Köhler-Töglhofer, W. & Prammer, D. (2006). The Austrian Pension System – How Recent Reforms Have Changed Fiscal Sustainability and Pension Benefits. *Monetary Policy and The Economy*, Q2/06,
- 4- OECD Economic Surveys: Austria. (2007). *Rationalizing fiscal policy and strengthening public expenditure management*. From www.oecd.org
- 5- Schick, A. (2007). Performance Budgeting and Accrual Budgeting: Decision Rules or Analytical Tools? *OECD Public Governance and Territorial Development Directorate Working Papers*, 1.
- 6- Yosoufi, Mohammad Reza. (2005). Examining the Draft to Rationalize the Profit Rates in Bank. *Eghtesade-E-Islami*, 19, 6-7