International Journal of Financial Management (IJFM) ISSN(P): 2319-491X; ISSN(E): 2319-4928

Vol. 7, Issue 6, Oct – Nov 2018, 1-12

© IASET



SAFEGUARDING THE BANKING SYSTEM AGAINST RISKS

MeritaBejtja & Natasha Ahmetaj

Research Scholar, Banka e Shqipërisë, SheshiSkenderbej, Tirane, Albania

ABSTRACT

This paper evaluates the procyclical relations that have emerged in the Albanian economy and the correlation with the Albanian banking sector. Based on the analysis of correlation coefficients and data since 2002, the results show that there is a strong causal two-way correlation between economic growth and credit standing, where the slowdown in the expansion of the deposit base has mitigated the effect from the procyclical deceleration of credit. The assessment of the linear correlation between economic growth as an independent variable and 'capital buffers 'above the minimum regulatory capital (as a dependent variable) shows that, although the positive coefficient shows a positive procyclical relation between the two indicators, where the acceleration of the economy is reflected in a higher level of capital addition, it remains weak and statistically insignificant.

JEL Codes: C31, D53, D62, D81

KEYWORDS: Procyclicality, Countercyclical Capital Buffer, Linear Correlation, Credit Growth, Macro Prudential

Policy

Article History

Received: -08 Sep2018 | Revised: 17 Sep 2018 | Accepted: 22 Sep 2018

INTRODUCTION

Reforms, Resilience and Procyclical Behaviour

The financial system in Europe is currently operating amid a calmer environment compared to the period after the outbreak of the financial crisis in 2008. Against this backdrop, the Albanian financial system is in quest of new development opportunities, having successful passed the stress test during the crisis of the Greek sovereign debt in 2014. This test proved the system's resilience to shocks from spill over effects.

The Financial Systemic Stress Index in Albania, measured on the constant basis, shows that the financial system in Albania is both resilient and capable of building self-protection mechanisms (see Chart 1).

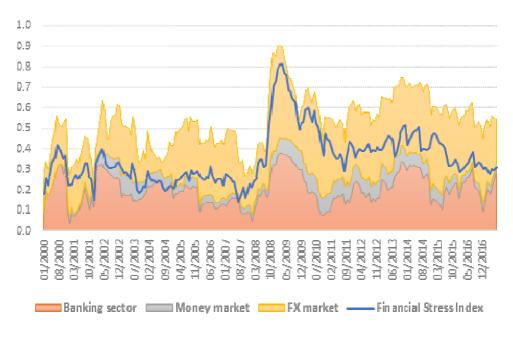


Chart 1: Financial Systemic Stress Index

Source: Bank of Albania.

The overall lower level of stress provides premises for positive expectations of the real economy, attributable to the accommodative monetary policies of the Bank of Albania. The underlying effects of this policy are reinforced and in a similar vein to the positive external impact from ECB's non-conventional accommodative policy, avoiding together the fear of deflation.

Notwithstanding the overall positive sensitivity, a dichotomy between economic and financial indicators is still noted in the view of risk-taking. On the one hand, interest rates in the market have dropped notably and the price of financial assets has increased across most segments; on the other hand, this is not translated into an increase of banking sector's financial leverage or of credit to the private sector. In other words, there is a discrepancy in the behavior towards risk in the real economy compared to that of the financial sector. The risk-free rate and sovereign debt rate have fallen considerably, due to the substantially accommodative monetary policy stance. The ample liquidity in the interbank market due to these policies has mitigated the risk to price stability and has positively affected the growth outlook, but the performance of new lending is still far from expectations.

Literature suggests that developments in the financial assets' prices and the performance of the credit cycle have a significant impact on financial stability. One of the principal lessons learned from the crisis was that the favorable developments in these two markets may not be solely managed by the monetary policy (White, 2012). On the other hand, this crisis showed the strong impact of such stability, particularly against systemic risk. That is why establishing buffer policies and instruments against systemic risk, nowadays, is an organic part in the work of all financial supervisory authorities. All supervisory authorities are committed to maintaining financial stability, through the relevant policies designed and implemented to this end.

The main causes of systemic risk consist of three banking activities: a) financial intermediation, b) maturities transformation and c) leverage (Blundell-Wagnall, 2014). These activities extend beyond the banking sector, to what is known as shadow banking.

Impact Factor (JCC): 3.9021 NAAS Rating 2.38

Consequently, the macroprudential policy appears rather complex, in the effort to fulfill three main goals:

- Identification of imbalances in the financial system, which serve as sources for the accumulation of systemic risk, before it materializes:
- Selection of the appropriate tools for systemic risk mitigation;
- Coordination of microprudential and monetary instruments and policies, to lower the pro-cyclicality in the economy.

Given the substantial share of the banking sector in the financial system, its contribution is essential to the overall financial stability. Therefore, acknowledging systemic risks from this sector and the timely build-up of cushions against them is a matter of priority.

To accomplish this mission, it is crucial to understand the procyclical relationships established by banking activities and emerging factors constituting causes of systemic risk.

Overall, economists agree on two main elements as sources of banking sector pro-cyclicality. The first element is related to the capital buffer. Risk management policies determine that banks hold regulatory capital above the level required by the Supervisory Authority (Isepy, 2008). Maintaining higher regulatory capital levels, enables banks to absorb possible financial losses, without having to fall below the minimum requirements by the regulator. In this light, the size of this "capital buffer" is correlated to the diversification of the credit portfolio, which constitutes one of the main sources of losses, and depends on its quality. Linquist K. G, (2004) argues that the more diversified the credit portfolio is, the lower is the capital buffer to be held by the banking sector.

On the other hand, the literature suggests also a negative correlation between a capital buffer and the business cycle. When the economy contracts the relationship between the two indicators becomes procyclical and stronger (Suyeter, 2004). In emerging economies, like Albania, having a low rate of financial intermediation (credit/GDP ratio), the correlation is shown in Chart 2.

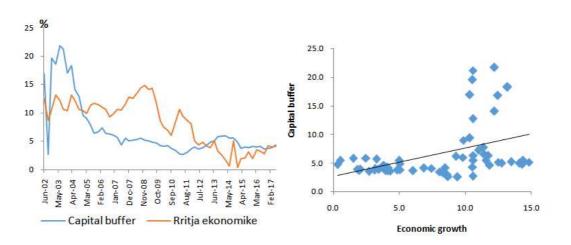


Chart 2: "Capital Buffer" and Economic Groth Pro-Cyclicality

Source: Bank of Albania, author's estimation.

The developments in both indicators show a negative procyclical correlation between them, where the coefficient between the capital buffer (capital increase above the regulatory capital) and economic growth is positive, albeit not high, at 0.23. However, the economic downturn in the post-crisis period is reflected in the strengthening of the mutual relationship, as the banking sector has increased the capital buffering, as a hedge against the increasing exposure.

The second element of procyclicality is related to the growth of credit. The theoretical approach suggests there is a mutual dependence between the expansion of credit and the economic growth. The reason-consequence assessment reveals that credit affects the business cycle of the economy, but the reverse relationship is also important. The close procyclical correlation of credit and economic growth is very clear in the case of Albania.

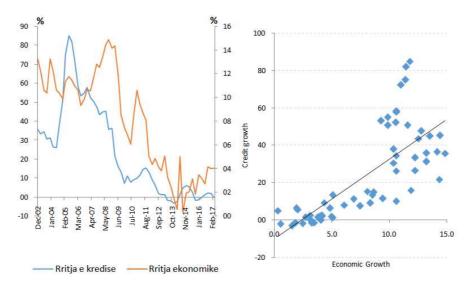


Chart 3: Procyclicality of Credit and Economic Growth

Source: Bank of Albania, author's estimation

The correlation coefficient between economic and credit growth is 0.74 and statistically significant at 5%. The slowdown of economic growth, at around 3% in annual terms, is followed by a considerable slowdown of credit expansion.

The procyclicality of credit and economic growth is closely related to developments in its quality. The slowdown of economic growth following the global financial crisis was reflected in a rapid deterioration of the Non-Performing Loans ratio.

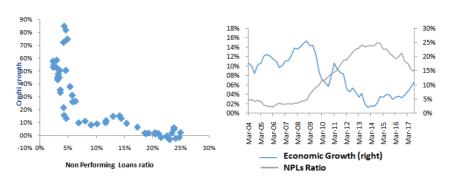


Chart 4: Procyclicality of Non-Performing Loans

Source: Bank of Albania, author's estimation.

Impact Factor (JCC): 3.9021 NAAS Rating 2.38

Materialization of credit risk through the increase of this ratio is reflected in the rapid growth of provisioning expenses, which, similar to other countries, overall increase in periods of economic downturn (Borio et.al 2001, Laeven et.al, 2003). This assessment is accurate, in particular for countries like Albania, which recognize banking system's losses as provisioning expenses only for the materialized credit risk, and does not address the concept of "expected losses" (Li, 2009).

In addition to these two sources of procyclicality, a number of other recent factors pose a possible risk to the financial stability but should be mitigated through macro-prudential policies. The first factor is the prospect of the contracting profitability of the sector, is which is more pronounced in a low economic growth environment. Banks find it difficult to increase profits due to the low-interest rate environment. They should either increase the credit volume or decrease the credit risk. While banking sector data show capital improvement or reduction or slowdown of Non-Performing Loans ratio and, so far, growth of marginal profit, yet the banking system profit remains low and the average return on equity (ROE) over the last years, has been lower than the cost of equity.

Overall, the cost of equity (COE) for the banking industry depends on the rate of risk-free investment options (such as the interest on 10-year bonds), the specific risk coefficient of the banking industry (found in Bloomberg data) and the average risk premium (around 3.2%). The COE of the banking system results in around 10%, considerably higher than the average Ro Eat 5.5%, for the last six years. Impacting on the same direction, the Non-Performing Loans ratio causes the lending potential to shrink and, in parallel, weakens the ability to build up buffers.

The importance of the increase in credit risk in countries that considerably rely on bank lending is more evident, as the weakening of the banking sector's balance sheet may affect its financial intermediation. Banks with high non-performing loans ratio have a lower return from the lending activity, which is balanced in turn by the decrease of the financing cost.

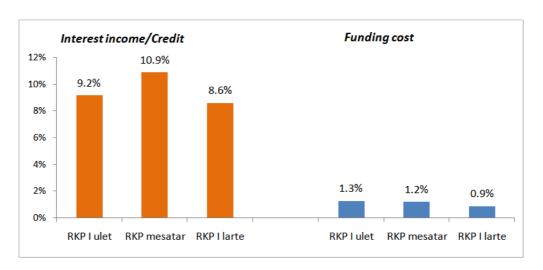


Chart 5: Interest Income and Financing Cost, According to the NPL Ratio

Source: Bank of Albania, author's estimation

Banks with a higher non-performing loans ratio have a lower level of core capital and deeper contraction of lending.

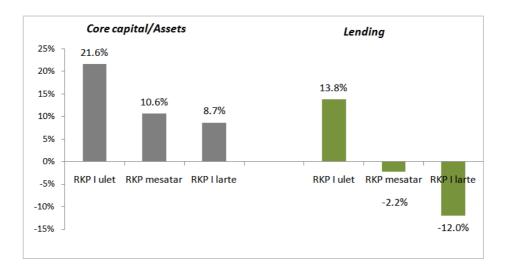


Chart 6: Core Capital and Lending Activity, According to the NPL Ratio

Source: Bank of Albania, author's estimation

This development is noted when the investment in banks remains non-attractive, compared to the pre-crisis period, and profitability from the activity remains the main source of the capital increase. Several types of ambiguities of this sector strengthen this behavior:

- -unclear future regarding banks cash flow
- -possible judicial litigation costs that are still unknown;
- -limited possibility for banks to afford costs arising from additional rules introduced in the post-crisis period
- a difficulty for banks to find new capital attributable to the COE lower than the ROE as claimed by investors, making the increase of credit difficult, due to the regulatory requirement of capital adequacy.
- -the inherited relationship with the high government debt or with the euro-crisis of sovereign debt is another reason for a possible increase of Non-Performing Loans ratio or a source of liquidity.
- -The resolution of Non-Performing Loans ratio needs adequate decisions and in particular caution against the moral hazard.
 - To face this situation, banks should:
 - -pass the assessment test and ensure adequate capital levels;
 - -re-establish steady profitability by adopting the business model, accordingly;
- -refocus on the activity, which ensures the economy of scale, adequate capitalization, and profitability. Consolidation would be a good possibility for the latter.

The second factor relates to "shadow banking". The concept of shadow banking has been growing, thus becoming an important supplier of financing the real economy, especially with the expansion of Fin Tech's influence, thus increasing its systemic importance. Being a less regulated sector and having low operational costs, it is increasingly becoming a preferred investment in the financial sector.

Impact Factor (JCC): 3.9021 NAAS Rating 2.38

A third risk factor stems from the change of the relationship between the banking sector and the government. The increase in corporate bonds and decrease of government's exposure to the domestic banking sector in favour of the external one weakens the relationship between the banking sector and sovereign, against the so far relationship, and increases the public sentiment, in particular with the entry into force of the Bank Recovery and Resolution Directive (BRRD). On the other hand, it increases the responsibility for fiscal and structural reforms to manage this new structure of public debt. The analysis of the exposure of banking system since the end of 2011 shows a continuing fall of the banking sector's share in holding the public debt. At the end of 2016 Q1, banking sector's shares in the domestic debt are 58.25%, financial and non-financial institutions' share is 16.71%, households' share is 15.18% and Bank of Albania's share is 9.86%. The banking sector share in the domestic debt has dropped by 10.8 percentage points within five years.

The structural reform is not important only to the fiscal result. It is equally important to the effectiveness of the monetary policy and the stability of prices. By definition, structural reform means the policies that positively and permanently change the supply side of the economy. It means they bring about two crucial effects: the upward shift in the curve of the aggregate supply and consequently the trajectory of the potential output, and strengthens the resilience of the economy to shocks. Both are objectives of the Bank of Albania.

A higher resilience increases the flexibility of prices adaptation by decreasing the effect of hysteresis after the shock is by gone, thus improving the stability, which is yet another objective of a central bank. Researchers explain a stronger inflation-unemployment correlation, attributable to the broadly implemented reforms in European Union countries, and a consequent sloppier Philips curve.

On the other hand, a higher growth potential would close the output gap at a higher nominal interest rate and a lower natural unemployment rate, by providing more space to the conventional monetary policies prior to reaching the lower bound of inflation. Also, a potential low GDP turns into a constraint to new investments by limiting a rapid further increase. Against this backdrop, the low nominal growth remains a challenge to financial stability. This growth, while sustained by the accommodative monetary policy, is undermined by other macro-prudential policies, in particular, structural reforms. As the monetary policy is mainly focused on price stability, it is the macro-prudential policy that assumes the management of risks to financial stability. The coordination of these policies for a synergy instead of overlapping becomes indispensable.

As mentioned above, the latter's mission is to reduce systemic risk from the pronounced procyclicality and the mutual relationship. Procyclicality and systemic risk mostly derive from errors of macro-prudential or monetary policies.

These Sources May be:

- <u>Strategic complementarily of financial institutions</u>, through which weaknesses are determined. For example, the aggressive lending at the same time and for the same purposes amid increased competitiveness reduces the level of risk analysis. On the other hand, the policy "bonus today risk tomorrow" is a higher reason for excessive structural encouragement. Coupled with the benchmark for the individual performance assessment, it turns into a trap for quality.
- The so-called *fire-sales* and the simultaneous contraction of credit, which turns into a reason for the fall in assets prices shrinking of balance sheets draining of financing contraction of the business cycle. From this simultaneous sale and the increased supply that accepts also the sale resulting in the loss, the balance sheets of all

do lose value.

• <u>Interconnectivity within the network</u> causes contagion due to the *spillover* effect through the interbank market, other exposures to each other, change in asset prices that affect the whole market, incurrence of the same *feedback* to the real economy. The interconnectivity relationship plays a role in absorbing small shocks to the market, while it amplifies the large shocks. It makes more evident the risk of systemically important institutions such as "too big to fail", that was the reason for accelerating the "bailout" action.

Mitigation of Procyclicality- Bank of Albania'sway Ahead

Financial system stability is a crucial condition for the financial system to increase its efficiency in the intermediation process. Over time, decisions of the Bank of Albania have responded to the economic developments and financial cycle at home. Until 2008, they were oriented to control credit growth amid the financial cycle expansion, whereas after the crisis, the policies aimed to support the expansion of credit to mitigate the financial cycle. In 2006, the central bank requested a capital increase in the event the increase in the credit portfolio amounted to above 30% in general terms. The intervention of the Bank of Albania in credit lending did not aim to stop it but to discourage its rapid growth.

After the financial crisis of 2008, the banking environment at home has changed, reflecting both international developments, and restrictions posed by parent banks and the regulators in home countries. Banks encountered liquidity problems due to the withdrawal of deposits from the end of 2008 to June 2009. Nevertheless, till the end of 2009, deposits returned to their level in 2008. Meanwhile, lending pace fell considerably, due to the slowdown of economic growth, which affected credit demand and the increase in non-performing loans.

During 2013, the Bank of Albania presented some new macro-prudential measures that directly addressed the procyclicality of lending in the economy. The promotion of credit growth is the core of this package. The package established incentives to channel the funds of banks to the Albanian economy, by easing the demand for capital for lending and strengthening the requirements for investments abroad. The stimulation of credit through these measures is projected to remain in force till the end of 2016.

Particular elements of this structure assess the downward cycle of financial intermediation in Albania. The credit/deposits ratio contracted at 53%. Nevertheless, the assessment of the expansion of deposits' share in the banking system, which is transmitted to the expansion of credit from the banking sector, shows that adjusted for the written off loans, the banking system continues to credit the economy following its financing sources. The slowdown in the expansion of deposits' base has mitigated the effects from the procyclical slowdown in lending.

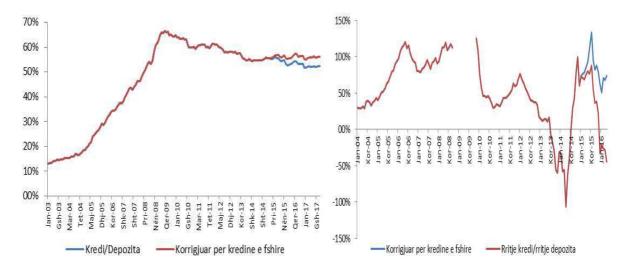


Chart 7: Credit/Deposits Ratio in Stock and Flow Terms ¹ (right)

Source: Bank of Albania(Loan to deposit; Corrected for write off loans)

The financial intermediation slowed down at around 40% of GDP, at a strong interdependence of the growth of credit to enterprises with the development of the economy. As a result, procyclical policies to support the business sector with credit would accelerate the deepening of financial intermediation in Albania.

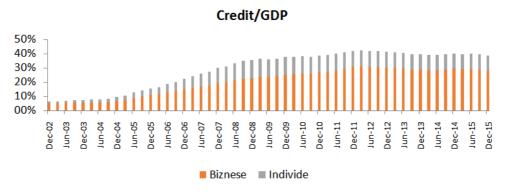


Chart 8: Credit to GDP Per Year

www.iaset.us editor@iaset.us

¹ The chart does not include the period of deposits' withdrawal during 2009.

10 Merita Bejtja & Natasha



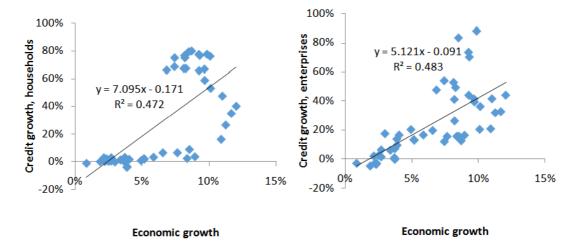


Chart 9: Credit Growth and Economic Growth

Other procyclicality elements are similar to those noted internationally.

For emerging economies, such as Albania, with a low financial intermediation level, (credit/GDP ratio), results are shown in Chart 3.

CONCLUSIONS

Local financial market characteristics play a significant role for the contribution of the specific element in procyclicality. Interventions through countercyclical instruments by the Bank of Albania have been clear, in an appropriate time of the cycle, and in harmony with the message that they aimed to transmit to both the banking sector and the economy in Albania. Constantly enriching and calibrating the matrix of these instruments remains subject of the future activity of the Bank of Albania.

However, the elements addressed above are not the only ones that generate procyclicality effects on financial stability in Albania.

Prolonged periods of low-interest rates may be accompanied by premises for affecting stability due to their eventual changes in the long term. This makes it necessary to monitor developments in these markets and act in advance with appropriate and timely interventions through supervision and macropudential instruments. The application in practice of countercyclical instruments requires a determination by the regulatory authority, being overall not in line with short-term interests of the banking sector. The actual macroprudential policy addresses mainly the banking sector. But, it is time now for a similar policy to be projected also for the so-called "shadow banking", which is becoming increasingly important, especially in the sector of investment funds.

REFERENCES

- 1. Blundell-Wignall, A. and C. Roulet (2012), "Business Models of Banks, Leverage and the Distance to Default", OECD Journal: Financial Market Trends, Vol. 2012, Issue No. 2.
- 2. Borio, c., Furfine, c., Lowe, p. (2001) Procyclicality of the financial system and financial stability: issue and policy options. BIS Working Papers, 1, 1-57.

- 3. IsépyTamás, (2008), Banking regulation and procyclicality cross-country analysis in EMU, Banks and Bank Systems, Volume 3, Issue 2, 2008
- 4. Laeven, L. and G. Majnoni (2003). Loan loss provisioning and economic slowdowns: Toomuch, too late? Journal of Financial Intermediation 12, 178-197.
- 5. Li, Grace (2009): "A comparison of loan loss allowance practices in Asia", Asia Focus, Federal Reserve Bank of San Francisco, June.
- 6. Pankaj Jahuri & Vikram Bisen, Menace Management and Safeguarding Issues of E-Banking, International Journal of Business Management & Research (IJBMR), Volume 2, Issue 4, November-December 2012, pp. 41-52
- 7. Lindquist, K.-G. (2004) Banks' buffer capital: how important is risk. Journal of International Money and Finance, 23.
- 8. Reserve Bank of Dallas, Globalisation and Monetary Policy Institute, Working Paper, No. 126(September).
- 9. Suyter, A. (2004) RisikomanagementAktuelleEntwicklungen und Auswirkungen auf Banken und Unternehmen. Fritz Knapp Verlag.
- 10. White, W. (2012), "Ultra Easy Monetary Policy and the Law of Unintended Consequences", Federal