

AN OVERVIEW AT MACROECONOMIC LEVEL THROUGH ACCOUNTING FIGURES PROVIDED BY THE ECB ASSESSMENT ON EUROZONE BANKING SYSTEM

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Abstract

Along with the main macroeconomic indicators, the credit risk indicators became an important leverage in monitoring and evaluating the standard of living at a national level and the country's economic evolution. These two types of indicators show a strong interconnection, and the correct assessment of the credit risk indicators becomes a must.

As a consequence, the central banks and the main regulators in the Europe area provided for a strict monitoring of such indicators and further on, for constant update of the banking supervisory regulations.

In October 2013, the European Central bank (ECB) issued the Note of Comprehensive Assessment that will be carried out during 2014, on the Euro-zone¹ banking system.

The outcome of the assessment will impact not only the accounting figures of the banking system, but also might change the macroeconomic overview of Euro-zone and the IASB's Conceptual Framework for Financial Reporting.

Keywords: *macroeconomic indicators, credit risk indicators, asset quality, non-performing exposure, provisions.*

1. Introduction

Traditionally, the economic overview of a country is offered by the main macroeconomic indicators: gross domestic product², final consumption³, gross fixed capital formation⁴, external balance sheet of goods and services⁵.

At the same time, there are specific indicators that show the fair image of the country's banking system, offering not only a realistic picture of the financial system, but also on the

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¹ Officially called the euro area, is an economic and monetary union (EMU) of 18 European Union (EU) member states that have adopted the euro as their common currency and sole legal tender.

² The monetary value of all the finished goods and services produced within a country's borders in a specific time period. It includes all of private and public consumption, government outlays, investments and exports less imports that occur within a defined territory.

³ Final consumption consists of goods and services used up by individual households or the community to satisfy their individual or collective needs or wants.

⁴ Statistically it measures the value of acquisitions of new or existing fixed assets by the business sector, governments and "pure" households less disposals of fixed assets.

⁵ Is the difference between the monetary value of exports and imports of output in an economy over a certain period, measured in the currency of that economy. It is the relationship between a nation's imports and exports.

financial burden of the population and the legal entities acting in the territory of the said country: solvency ratio, impaired loans ratio, credit risk ratio⁶, liquidity ratio.

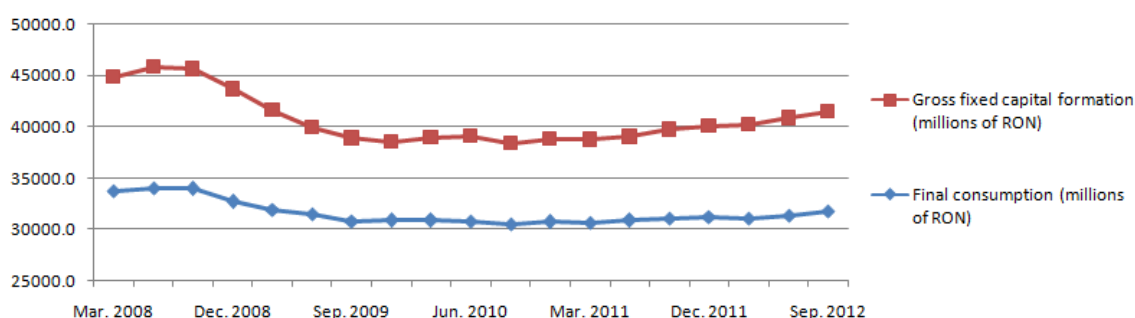
These two types of indicators show a strong correlation, making the banking system indicators relevant for the real economy of a country. This being said, the assessment that ECB will conduct on the Euro-zone banking system might change the macroeconomic overview by affecting the accounting figures of the banking system.

2. Content

For this specific analysis, it was considered that the most representative variables of the macroeconomic and banking system are:

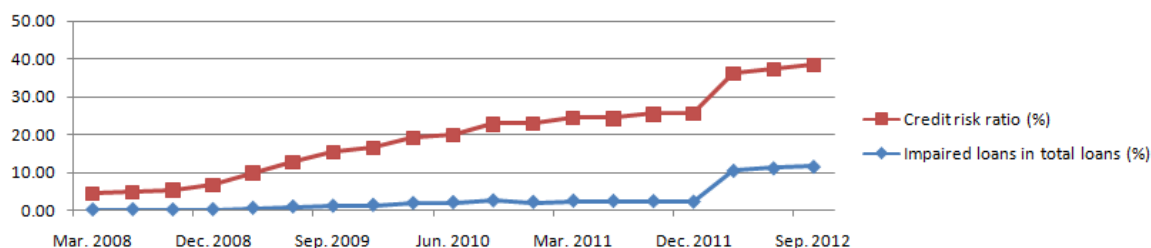
- final consumption and the gross fixed capital formation for the real macroeconomic overview as they provide a fair image of the standard of living and production. The below picture shows a decreased evolution of the final consumption and gross fixed capital formation at Romanian macroeconomic level.

Evolution of the Romanian macroeconomic indicators



- impaired loans ratio and the credit risk ratio for the credit risk and banking overview, that show an increasing risk in the Romanian banking system, and also an increase of the impaired loans of the country.

Evolution of the Romanian banking system indicators



Note: The sudden increase of the indicators starting 2012 is due to the methodological changes in the definition of the impaired loans, linked to the application of the IFRS

The interconnection between the two sets of indicators, the macroeconomic one and the credit risk one, specific to the banking system, can be easily demonstrated using statistical leverages, such as covariance and correlation.

Using covariance⁷, one can determine whether units were increasing or decreasing, but it is impossible to measure the degree to which the variables moved together because covariance does not use one standard unit of measurement. To measure the degree to which

⁶ Gross exposure relative to loans and interest under “doubtful” and “loss”/Total loans and interest, less off-balance sheet items.

⁷ The sign of the covariance shows the tendency in the linear relationship between the variables.

variables move together, one must use also correlation. Correlation⁸ shows the simultaneous change in value of two numerically valued random variables. In addition to telling you whether variables are positively or inversely related, correlation also tells you the degree to which the variables tend to move together.

Both covariance and correlation identified that the analyzed variables mentioned above are negatively related, as shown in the below tables. The statistical analysis was conducted on a time series between March 2008 until September 2012.

CORRELATION	Final consumption	Gross fixed capital formation
Impaired loans ratio / total loans	-0.860	-0.825
Credit risk ratio	-0.760	-0.638

COVARIANCE	Final consumption	Gross fixed capital formation
Impaired loans ratio / total loans	-955.131	-1064.768
Credit risk ratio	-6332.591	-6166.056

The results of the analysis show that there is a strong negative correlation between the macroeconomic indicators, final consumption and gross fixed capital formation, and the credit risk ones, impaired loans ratio and credit risk ratio.

In this view, the credit risk indicators of the banking system offer a fair image of the macroeconomics of a country. As a consequence the accounting and risk figures disclosed by the banks become of crucial importance.

By the end of year 2014 the banking system figures might change as a consequence of the ECB assessment, offering an even more realistic overview of the financial and economic stage of the EU countries.

The European Central Bank, which assumes a new role as single supervisor of euro-zone banks at the end of next year, said the asset review will include on-balance sheet and off-balance sheet exposures such as credit derivatives. The ECB will examine the banking and trading books of financial institutions of the euro bloc consisting of 17 countries, rising to 18 in January when Latvia adopts the euro.

The exercise has three main goals: *transparency* – to enhance the quality of information available on the condition of banks; *repair* – to identify and implement necessary corrective actions, if and where needed; and *confidence building* – to assure all stakeholders that banks are fundamentally sound and trustworthy.

The ECB estimates that it will scrutinize around 130 financial institutions, which together are responsible for almost 85% of bank assets in the Euro-zone. It released a provisional list of these institutions, although the "full and final list of significant banks" will only be compiled when "up-to-date statistics have become available". A bank will be considered "significant" if its assets are worth in excess of €30 billion, or more than 20% of its country's GDP⁹. Banks that are within the three largest credit institutions in any given member state will also be included.

⁸ Correlation standardizes the measure of interdependence between two variables and, consequently, tells you how closely the two variables move. The correlation measurement, called a correlation coefficient, will always take on a value between 1 and -1:

If the correlation coefficient is one, the variables have a perfect positive correlation. A positive correlation coefficient less than one indicates a less than perfect positive correlation, with the strength of the correlation growing as the number approaches one.

If correlation coefficient is zero, no relationship exists between the variables.

If correlation coefficient is -1, the variables are perfectly negatively correlated (or inversely correlated) and move in opposition to each other. A negative correlation coefficient greater than -1 indicates a less than perfect negative correlation, with the strength of the correlation growing as the number approaches -1.

⁹ Gross Domestic Product.

Of the 18 member states, Germany has the most banks earmarked for assessment with 24, while Malta has the least with two – the third of its systemic banks being a subsidiary of another group, Deutsche Bank, which is already being assessed.

The assessment will cover three pillars: supervisory risk assessment on key risk factors, asset quality review with focus on the classification of non-performing exposures, and stress test as a forward looking view of the banks' capacity to face a potential crisis. When these have been completed, the ECB could then impose a range of remedial actions on banks, including forcing them to hold additional capital.

Supervisory risk management will be performed a supervisory judgment on key risk factors such as liquidity, leverage and funding. The assessment will imply a qualitative and quantitative analysis.

The *asset quality review* will focus on the assessment of data quality of the banks' balance sheet and financial statement, asset valuation, classification of non-performing exposures, collateral valuation and last, but not least, provisions amount. The review will cover credit and market exposures, following a risk based, targeted approach.

The purpose of the *stress test* is to provide a forward looking view of banks' shock-absorption capacity under stress conditions. The test will be conducted in collaboration with European Banking Authority (EBA) based on specific banking risk approach. The ultimate impact of this stress test is to challenge the capitalization of the banks, challenge that will be transferred directly to the investors in case of additional capital need.

The *stress test* will be conducted in collaboration with EBA, which will also cover other countries that the ECB assessment is not covering. Full details of how the stress test will be conducted

When the ECB and European Banking Authority (EBA) conduct their stress test, at a later stage in 2014, they will also examine banks' leverage ratios to glean "supplementary information" on their capital adequacies.

If the ECB finds any holes in a bank's capital, it will issue instructions on how and when it should be patched up. It stressed that if the exercise is to be a success, backstops must be established before they are needed. In the view of ECB it is essential to ensure that any banks that have viable business models, but are required to build additional capital for prudential reasons, will be able to obtain such additional resources within an appropriate time frame.

First and foremost, the ECB wants banks to make up any shortfalls with privately sourced capital, but it accepts that public backstops "might need to be drawn upon".

The ECB is yet to gain any powers for the direct recapitalization of banks, and the Single Resolution Mechanism (SRM) remains a work in progress. Therefore, the central bank stressed, member states taking part in the SSM must have established their own national backstops ahead of the completion of the exercise.

There are close inter-linkages between the three elements and together they provide a wide ranging, yet in-depth view of banks' balance sheets, bringing together both quantitative and qualitative aspects of banks' risks, and in addition, both point-in-time and forward-looking elements. The comprehensive assessment will conclude with a single disclosure of the outcomes, which will be published prior to the ECB assuming its supervisory role in November 2014.

In case of any gaps between the ECB results and the banks' ones, adjustments will be imposed. The ECB will demand that all banks meet, after the assessment, a minimum Common Equity Tier I ratio of 8% of their risk-weighted assets when they are assessed. This

8% comprises the minimum 4.5% specified in Basel III¹⁰, an additional 2.5% capital conversation buffer, and another 1% on top to account for the banks' "systemic relevance".

EBA has also asked national supervisors in other countries in the EEA to carry out asset quality reviews that will feed into stress tests on other major banks outside the Euro--zone. The national supervisors embraced the initiative and have started to perform dedicated assessments at national level. Only by knowing the regulatory environment can one really know what a bank is or what a bank does in deferent countries¹¹.

The National Bank of Romania, at its turn, has started to assess the forborne portfolio of the local banks, considered the less transparent one. The action was started on October 2013 and will continue on 2014, in order to cover the entire Romanian banking system.

This local review has a direct consequence in the accounting and risk figures of the banks every time an asset or a portfolio is challenged in terms of evaluation, classification and provisions. At their turn, the provisions will impact the profit and loss account of the banks, which was already under pressure in the last years.

It is known that higher reporting quality improves the effectiveness of regulatory intervention and a 'weaker reporting quality reduces the effectiveness of monitoring and leads to lower quality loan portfolios, which results in more non-performing loans and lower profitability'.¹²

From the three mentioned pillars of the ECB assessment, the asset quality review will have the strongest impact on the accounting figures and therefore on the financial statements of the assessed banks.

The asset quality review has formally begin on December 31, 2013, and concentrate on the elements of banks' balance sheets that the ECB believes are most risky or non-transparent. The specific objective of the asset quality review will be:

- assessment of adequate provisions for credit exposures
- determination of the appropriate valuations of collateral for credit exposure
- assessment of the valuations of the complex instruments and high-risk assets.

The rules governing banks' credit provisioning and reserves require a trade-off between the goals of bank regulators, who emphasize safety and soundness, and the goals of accounting standard setters, who emphasize the transparency of financial statements¹³. According to IASB, a bank should increase their loan loss reserves when it becomes highly probable that a loss is imminent, and if the amount of that loss can be reasonably estimated. According to the prudential considerations of the regulators, higher reserves should be created, in order to enable the bank to absorb greater unexpected losses without failing.

Still, the asset quality review is a different exercise from a pure review of auditors.

The methodology will be intrusive with risk-based individual file reviews and harmonized procedures across the different jurisdictions. A yearly audit may verify the accuracy of records, the accounting standards compliance and the soundness of internal controls. This assessment is more invasive by taking into account:

- accounting prudential requirements (e.g. risk considerations for individual banks, definitions according to prudential Union law);
- harmonized definitions for variables (e.g. non-performing loans, forbearance, loans classifications etc.);

¹⁰Directive 2013/36/EU of the European Parliament and of the Council of 26 June 2013 on access to the activity of credit institutions and the prudential supervision of credit institutions and investment firms and Regulation (EU) No 575/2013 of the European Parliament and of the Council of 26 June 2013 on prudential requirements for credit institutions and investment firms and amending Regulation (EU) No 648/201.

¹¹ James R. Barth, Gerard Caprio Jr., Ross Levine, *Banking Systems around the Globe Do Regulation and Ownership Affect Performance and Stability?*, 2001.

¹² Jeffrey Ng Tjomme, O. Rusticus, *Banks' Survival during the Financial Crisis: The Role of Regulatory Reporting Quality*.

¹³ By Eliana Balla, Morgan J. Rose, Jessie Romero, *Loan Loss Reserve Accounting and Bank Behavior*, 2012.

- individual re-evaluations of files and data integrity validation (bottom-up detailed analysis of loan and securities data, review of credit risk monitoring and IT systems, full balance sheet reconciliations).

The third parties (i.e. auditors, specialized appraisal companies) involved in such reviews would be different from the ones employed by the banks on a regular basis in order to avoid conflicts of interest. The comprehensive assessment will have both a quantitative and a qualitative output. Apart from the capital shortfall, the exercise will also lead to specific recommendations in areas such as improvement of risk management or governance for specific banks. Nonetheless, qualitative shortcoming can also feed in the capital gap if certain process or controls of banks are found as insufficient.

The note of the ECB assessment states that all types of financial instruments will be subject to revision, according to a “conservative” interpretation of current IFRS, where necessary taking national GAAP into account and that the review will be conducted with reference to harmonized definitions, including those of “forbearance” and “non-performing” exposures proposed recently by EBA.

First of all, the phrase “revision, according to a “conservative” interpretation of current IFRS” was not fully explained.

The IASB's¹⁴ *Conceptual Framework for Financial Reporting* states that the fundamental qualitative characteristics of useful financial information include faithful representation, meaning clearly that financial information should be neutral and free from bias. From this point of view, conservative is not defined in the IASB's framework.

However the judgments exercised by banks' management in respect asset classification, impairment and valuation will probably be subject to additional scrutiny or challenge for regulatory purposes.

Also, the IFRS does not define the terms “forbearance” and “non-performing” exposures. However banks increasingly use such terminology for the purpose of disclosures, encouraged by regulators and users.

EBA, instead, has proposed definitions for regulatory purposes, which include forbearance (forborne exposures) and non-performing exposures. In October 2013 EBA has published the final implementing technical standards (ITS) on the definitions of “forbearance” and “non-performing exposures” under the Capital Requirements Regulation (CRR). Together with the corresponding supervisory reporting templates, these definitions will make it possible to capture and compare asset quality across EU financial institutions. These definitions rely on, and do not supersede, those on impairment and default, so they will have no direct impact on reporting institutions' profitability or capital ratios. In particular, the definition of non performing exposures focuses on a 90-day past due threshold, while the definition of forbearance focuses on concessions extended to debtors who face, or may face, difficulties in meeting payments. Forborne exposures can be identified in both the non-performing and the performing portfolios. These definitions apply to all loans and debt securities that are on balance sheets, except for those held for trading, as well as to some off-balance sheet exposures.

The IASB has, at its turn, published for public comment a Discussion Paper exploring possible changes to the IASB's *Conceptual Framework for Financial Reporting*. The Discussion Paper is the first step towards issuing a revised *Conceptual Framework*.

The *Conceptual Framework* sets out the concepts that underlie the preparation and presentation of financial statements. It identifies principles for the IASB to use when it develops and revises its IFRS. The existing *Conceptual Framework* has enabled the IASB to

¹⁴International Accounting Standards Board.

develop high quality IFRS that have improved financial reporting. However, it does not cover some important areas and some guidance needs updating.

The Discussion Paper is designed to obtain initial views and comments on important issues that the IASB will consider as it develops an Exposure Draft of a revised Conceptual Framework. The issues include:

- definitions of assets and liabilities;
- recognition and de-recognition;
- the distinction between equity and liabilities;
- measurement of the assets and liabilities;
- presentation and disclosure; and other comprehensive income.

3. Conclusions

By the autumn of 2014, the comprehensive assessment will conclude with an aggregate disclosure of the outcomes, at country and bank level, together with any recommendations for supervisory measures. This comprehensive outcome will be published prior to the ECB assuming its supervisory role in November 2014, and will include the findings of the three pillars of the comprehensive assessment.

Should the ECB find capital shortfalls, banks will be required to undertake corrective measures, such as recapitalization and other means, and the time lines for implementing the measures will come as part of the review's outcome.

The euro zone emerged from a lengthy recession during the spring 2013. But the pick-up has been weak and uneven, with growth, in annualized terms, of only around 1% and unemployment still near record highs. For the region to rebound on a sustained basis, its banks need to extend additional loans to households and businesses in order to finance new spending, investment and hiring.

Despite record-low ECB interest rates and abundant cash in the banking system, lending to the private sector continues to shrink in the euro zone. Small businesses in recession-ravaged southern Europe pay far higher interest rates on loans than their German counterparts.

This assessment will strengthen private sector confidence in the soundness of euro area banks and in the quality of their balance sheets, and, it might change the macroeconomic overview of Euro-zone.

Also, the outcome of the assessment will impact not only the accounting figures of the banking system, but, it could influence the IASB's Conceptual Framework for Financial Reporting.

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