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Waiting for the Capital Market Union: the Position of Latvian Corporate Bond Market

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Abstract

Baltic region is traditionally treated as similar and comparable when analysed on the macroeconomic level. The major difference is faced when the analysis is performed for the corporate bond market – the weight of Latvian publically traded corporate bonds among the three countries- Latvia, Lithuania and Estonia- reached 94% by the number of issues quoted. With 47 corporate bonds listed in Nasdaq Riga, Latvian corporate bond market demonstrated the rapid growth and recognition of corporate bonds as the source of alternative to bank lending financing method (Nasdaq Baltic, 2017). There are no obvious macro or microeconomic evidence for Latvia meeting more favourable conditions for corporate bond market development than Lithuania and Estonia

The increasing role of the capital market as the alternative to the traditional to Europe banking sector is strongly supported by the European Commission (EC). In 2015 the EC announced the Capital Market Union (CMU) initiative and respective action plan as the reaction to the challenges faced by both banking sector and small and medium enterprise (SME) segment in Europe. As integrated and more diverse capital markets will decrease the cost of funding for companies, the objective of the CMU is to make the financial system more resilient in all 28 Member States including Latvia, Lithuania and Estonia (European Commission, 2017). While several steps like proposal to modernise the Prospectus Directive have been made, further actions based on the review of regulatory barriers to SME admission on public markets and SME growth markets and review of European Union corporate bond markets, focusing on how market liquidity can be improved made in 2017 will follow (European Commission, 2015).

The aim of this article is to analyse the level of development of the biggest Baltic corporate bond market- Latvian corporate bond segment and to reveal the areas of potential focus of CMU introduction. The paper applies Financial Sector Development Indicators (FSDI) framework developed by The World Bank (World Bank, 2004) to the country cluster as defined by Bending et al (2014). The paper relates the results to CMU action plan developed by the European Commission. The article estimates that Latvian corporate bond market is highly developed compared to the peers selected where the only lagging area is size. The article concludes that actions targeted to increase directly or indirectly the size of the market should be prioritised for Latvian corporate bond market within CMU framework.

KEYWORDS: corporate bond market, capital market union, bank-based economy, Latvia, development.



Introduction

Before the financial crisis of 2008-2013 the traditional bank-based European economy has rarely been challenged. The total assets of banks in the EU amounted EUR 42 trillion or 334 % of European Union (EU) GDP in 2013 while US banks' assets were worth EUR 11 trillion of 88 % of US GDP (Langfield and Pagano, 2016). The recovery, which took place afterwards created the change both in academic perception of the bank-based economy of EU and political view. In the result, the economy, which for centuries has been relying on banking financing is in the process of being turned towards a more market oriented financing. The banking sector is facing a vast wave of regulations requiring the core structural changes and often business restructuring. Moreover the development of alternative financing solutions is providing parallel competitive challenge. In order to structure its steps towards market-based economy, the action plan called Capital Market Union was announced by the European Commission in 2015 (European Commission, 2017).

Latvia while being the bank-based economy is experiencing the strong development of its corporate bond market where the number of public issues outstanding has reached 47 corporate bonds (Nasdaq Baltic, 2017). The growth of the alternative financing is experienced while unclear in its sustainability of corporate bond segment. In order to identify the level of developed of Latvian corporate bond segment the study of Tocolovska (May 2016) selected the Financial Sector Development Indicator (FSDI) framework developed by The World Bank and applied it to Latvia. The performed comparison to the benchmark markets: Germany, USA and Sweden, indicated the need for additional selection of efficiency area indicators for analysis (provided by the study of Tocolovska (September 2016)) and additional peer countries for the comparison. The research by Tocolovska (October 2016) run expert panel to discover the relevant peer countries and identified Poland, Croatia, Hungary, Slovakia and Slovenia as the peer countries. The analysis revealed that Latvia had a comparatively developed bond market and its corporate segment. The increased focus on the CMU creation and actions planned and the strong focus on the corporate bond market development as part of the CMU action plan, besides to the increasing number of academic studies on CMU develop the need for analysis of Latvian corporate bond market development within CMU perspective.

The aim of this article is to analyse the level of development of Latvian corporate bond segment and to reveal the areas of potential focus of CMU introduction. The article employs scientific publication analysis, document analysis, data evaluation, and case study research methods.

This paper contributes in two fundamental ways to the current research on the corporate bond market development in Latvia and CMU introduction. Firstly, the author provides in-depth analysis of the academic development of market-based concept in Europe including CMU introduction. Secondly, the author further extends the development of Financial Sector Development Indicators (FSDI) model by The World Bank (2004) by adding the peer countries as provided by Bending et al (2014) as the result of the cluster analysis of the European Union economies and identifies the comparative level of development of the corporate bond market in Latvia within the cluster selected.

The structure of this paper commences with the review of the academic research on the financial system specifics of bank-based and market-based systems and the justification for the preferred arrangement of the European market. The CMU initiative is reviewed within the shift to the market-based economy. While classified as the country with underdeveloped both banking sectors and capital underdeveloped by the study of Bending et al (2014), Latvia is analysed for its comparative development for corporate bond segment within FSDI framework by applying identified by Bending et al (2014) peer countries. Finally, the results of the FSDI framework applied are presented within the CMU introduction perspective, the expected outcomes are described as well as future areas of research are proposed.

Literature Review

An academic discussion on whether financing on both corporate and sovereign level should be bank-based or market-based has taken place for a long period of time where the academic research on the topic concentrates in the period mid-1990s early 2000s. Langfield and Pagano (2016) explain that since the early 1990s, Europe's banking system has expanded rapidly, where Europe's capital market experienced moderate changes. In the result Europe's financial structure has become strongly bank-based. The second wave of academic interest to the topic could be observe in mid-2010, where the reflections from the financial crisis and proximity of Capital Market Union initiative by the European Commission stimulated the discussion.

Financial system of the country brings together lenders, borrowers, financial markets and financial intermediaries with the aim to channel financial resources from the financial market participants with the excess to other financial market participants, who have shortage. Mishkin (2009) defines two flows of the financial resources between the borrowers and lenders: through the financial markets or direct finance and through the financial intermediaries or indirect finance. The practice of dividing market and bank financing is used also to characterize the entire economy. In the bank-based financial system the role of the banks is central in redistributing financial resources. On the contrary, in the market-based financial system, securities market shares the stage with the banks in getting private savings to companies, applying corporate control, and easing risk management (Demirguc-Kunt and Levine, 1999). While corporate sector forms the base of the country economy, an influence of the corporate financing into the entire economy is studied by dividing the economies into being based on bank financing and market financing. Studies by Levine (1997, 2002) summarize academic views by dividing market-based and bank-based approach:

a bank-based view: the studies of Gerschenkron (1962), Boot and Thakor (1997), Boyd and Smith (1998), Rajan and Zingales (1999) support the view that bank contribute more efficiently to the financial market of the developing countries. Diamond (1984) points to the monitoring function of banks thus smoothening the risk; while Benston and Smith (1976) to lowering of transaction costs of funds. Moreover the state-owned banks will route the money flow to the vital project thus developing the economy. The study of Allen and Gale (2001) further highlights the role of banks in the early stage of economic development while the sufficient legal and financial frameworks are not in place. Fecht et al (2012) stresses that banks remain at the core of financial system and tend to be linked among each other via interbank and other relevant tools. Fecht et al (2012) finds that an enhanced concentration in lending does not necessary increase risk since a well-functioning interbank market allows to achieve the necessary diversification.

b market-based view: the studies by Allen and Gale (2001), Fujita (2000) and Levine (2002) reveal that market fund gathering adds competition and thus efficiency and diversification to the process. Moreover the study of La Porta et al (2001) shows that that state-owned banks are more oriented on achieving political goals thus resulting in inefficient resource allocation. Peterson (2003) stresses that bonds have more ways to tap institutional and household long-term savings.

Additionally Levine (2002) adds financial services and legal-based views, which reveal the importance of financial sector as such- not stressing the dominating role of banks or financial markets but their cooperation; and the importance of legal framework respectively. The study supports no direct evidence of either market or bank based economy being more efficient, while stressing the dependence of the financial sector development on the level of development of the legal system. Moreover the better developed financial sector influence the economic growth while the source of financing bank or market is relatively unimportant. The importance of the legal base and law protection as the central in the choice for source of financing is also stressed by Ergunor (2003). Bank as the source of financing is the choice for civil-law applied countries, where courts

have less flexibility in interpreting the laws and creating new rules. Whereas common-law courts enforce laws effectively, providing them with more detailed creditor and shareholder protection laws has a greater impact on the development of financial markets compared with civil-law systems. The findings were extended by the research of Beck and Levine (2002), which showed that the reliance on the bank-based or market-based capital system does not make much difference, while the efficient legal system and financial development improve industry growth, new establishment formation, and efficient capital allocation. Peterson (2003) finds that there is no one “right” way to handle financing on the sample of sovereign bonds observed, while stressing that the local bond market is a more preferred way since the public monitoring and public disclosure required for efficient bond market operation is higher.

Most of the European economies including Germany are traditionally bank-based, where USA and Canada markets are market based (Levine, 2002). The role of banks is overemphasized in most of the European economies thus leaving bond markets as less developed. The financial crisis, which started in summer 2007 in the US as the first wave and continued in Europe in mid-2010 as the second wave, has revealed the scope of the bank influence on the economy (Zaghini, 2015). While starting on the bank and interbank level initially, the crisis through sovereign guarantees provided to the banks and ECB interventions, have shifted the risks on the whole economy: e.g. Latvia (European Commission, 2012).

While pre-crisis academic studies emphasize the cost-effectiveness and safety of bank-based financing due to higher monitoring and control function performed by the banking sector versus lower control from the investor society, the shift in the research paradigm could be observed in later studies with the effectiveness focus shifting towards US-employed market based system. Allen and Gale (2001) explained the shift by the failure of government interventions and over-stressed effectiveness of the financial markets- both left no doubts that market financing is more efficient. The post-crisis academic research instead of traditional bank-based versus market-based division of financial systems concentrate on finding:

1 the relationship between the crisis effect and economic growth and the type of financial system. When looking to the bank-based financial systems, the research by Langfield and Pagan (2016) discovers that bank-based financial structures are associated with lower economic growth, particularly when real house prices drop substantially. Bending et al (2014) states that while banking crises causes a similar initial drop in investment on both bank-based and market-based systems, the recovery is much slower in the bank-based economies. The latter is supported by Allard and Blavy (2011);

2 quantitative easing (QE) effect and financial system. QE as performed by the Central Banks increase the importance and activity of the capital markets. Duca et al (2015) highlights that issuance in emerging markets without QE would have been broadly half of the actual issuance since 2009, where Steeley (2014) finds that QE resulted in a substantial and statistically significant drop in the costs of trading UK gilts;

3 an alternative classification of the financial system of a country. While banking and market as the sources of financing are viewed as substitutes by the majority of authors, Hardie et al (2013) view market –based economy as the way to disseminate loans or market-based banking. The latter is characterised by four elements: 1) assets are valued at market price (“marked to market”); 2) bank lending is securitized or traded; 3) bank assets are sold to “shadow banks”; 4) assets retained on balance sheets are financed market sources. The shift in bank-based and market-based paradigm is stressed by Sawyer (2014), where the banks are changing their role from “originate and retain” to “originate and distribute” with more involvement in the securities market.

While stressing the importance of market-based economy, academic studies rarely provide solutions different from the ones already in focus of the CMU: increased regulation, securitisation, cheaper SME access to capital markets ((Langfield and Pagano, 2016), (Bending et al, 2014)). The existing focus on capital market development should not shrink the importance of symbiosis of both banking sector and capital markets, where the financing for some groups of the potential borrowers such as small size companies can be limited by the scope, for new companies –limited by the lack of credit and cash flow history, etc. The presence of both banking sector and capital market is vital for the country. CMU seeks to develop wide range of small and medium enterprise (SME) capital needs by the action plan introduced.

CMU introduction is scheduled as an action plan with short and medium term focus and ambition of regular revision and correction when needed. The Green Paper (European Commission, 2015) summarizes the early priorities of the CMU as: 1) develop proposals to encourage high quality securitisation and free up bank balance sheets to lend; 2) review the Prospectus Directive to make it easier for firms, particularly smaller ones, to raise funding and reach investors cross border; 3) start work on improving the availability of credit information on SMEs so that it is easier for investors to invest in them; 4) work with the industry to put into place a pan European private placement regime to encourage direct investment into smaller businesses; and 5) support the take up of new European long term investment funds to channel investment in infrastructure and other long term projects.

The scope of the CMU action plan on the money demand side includes wide range of corporates from the start-up phase to large and stable government institutions. The role of the corporate bond market is stated as one of the key objective. While Latvian corporate bond market is the biggest on the Baltic level, its perspective and area of development within CMU should be identified.

Methodology

Latvian financial system is characterised as bank-based by Bending et al (2014). The study looks for both presence of loans available for non-financial companies (NFC) and capital market size indicators and as the result clusters the EU countries into 4 group:

- 1) countries with both large banking sectors and well-developed capital markets: Austria, Denmark, Luxembourg, Spain, Sweden, the United Kingdom;
- 2) countries in which banking plays a large role, and capital markets a lesser role: Cyprus, Estonia, Greece, Ireland, Italy, Malta, Portugal;
- 3) countries with well-developed capital markets in which bank lending, as measured by the stock of NFC loans, plays a comparatively smaller role: Belgium, Czech Republic, Finland, France, Germany;
- 4) countries in which both banking sectors and capital markets appear underdeveloped: Bulgaria, Hungary, Latvia, Lithuania, Poland, Romania, Slovakia and Slovenia

Latvia is found to be in the fourth cluster together with seven other peers. While the peer group is found to share the same cluster for financial system comparison and partially contains the countries selected by the expert panel by the study of Tocolovska (October 2016) the FSDI framework is run for the whole fourth cluster as grouped by Bending et al (2014) to identify the comparative development of Latvia within the peer group and potential for further development within CMU action presence.

FSDI framework is selected by Tocolovska (January 2016) as the comparative factor framework for the analysis of development of Latvian corporate bond market. The framework does not provide the desirable level or the threshold values suggested but the framework for comparison of the countries selected. The framework groups all the metrics into 4 groups: size, access, efficiency and stability and summarizes the results of the comparative analysis. The FSDI study

provides the sub-indicators for each of the four groups. The study of Tocelovska (May 2016) revealed the need to develop additional efficiency area sub-indicators, which were successfully developed and tested by Tocelovska (September 2016). In the result, the groups and sub-indicators are: 1) size: ratio of private sector bonds to GDP, ratio of public sector bonds to GDP, ratio of international bonds to GDP, dummy variable: existence of bond market and dummy variable: existence of corporate bond market; 2) access: government bond yield (3 months and 10 years), ratio of domestic to total debt securities, ratio of private to total debt securities (domestic), ratio of new corporate bond issues to GDP and new corporate bond issues (\$ billion); 3) efficiency: quoted bid-ask spreads (10-yr government bond yield), quote size, number of the counterparties providing bid/ask quote; 4) stability: volatility of sovereign bond index, skewness of sovereign bond index, ratio of short-term to total bonds (domestic), ratio of short-term bond to total bonds (international), correlation with German bond returns and correlation with US bond returns. Size, access and stability area indicators are calculated as average numbers over the period 2008-2015 with subsequent standardisation of the scores. Efficiency area indicators are based on the market situation at the moment of analysis.

The data from The World Bank, the Bank for International Settlement database, Eurostat and Bloomberg information system is used for the analysis.

The results of the FSDI framework indicate the comparatively high level of development of Latvian bonds market and its corporate segment in stability, access and efficiency areas (Figure 1). While the summarised data is comparatively similar for the whole cluster observed, more detailed analysis should be performed to find the relative position of Latvia.

Size area is measured by three ratios as applied by the study of The World Bank (2004): ratio of public (government) sector bonds to GDP, ratio of private (corporate) sector bonds to GDP and the ratio of international bonds to GDP.

For the sovereign debt sector the analysis of six peer countries selected indicates that public debt varies within the range of 11%-71%, where Slovenia and Hungary overcome 50% level. The results are contradicting previous FSDI analysis finding that the relative size of bond markets in middle income countries is generally indistinguishable from the one in low income countries. The weights of the public bonds from GDP of the countries observed are different by as much as 60% within the sample observed. While the framework treats the higher level of debt as more positive one, the study of Artis (2002) indicates that public debt benchmark established by the Maastricht criteria provides the reasonable target. Buiters et al. (1992) argue that fiscal convergence criteria can lead to unnecessary hardship if pursued mechanically stressing the lack of case to restricting the debt/GDP ratio to lie below a particular value. Latvia is indicating 30% level of public debt outstanding as the percentage of GDP. The level is gradually increasing starting from 11% in 2008. The average level of Latvian sovereign debt in the period 2008-2015 reached 18% while the average level for all cluster countries in the period observed reached 32%.

Private sector indicators share more homogeneity- the ratio of corporate bonds as the percentage of GDP for the cluster countries observed stays below 13%, with average cluster level in the period 2008-2015 staying at 7% and not showing the signs of increase. All countries share similar dynamics of the indicator observed except of Hungary- the dynamics of Hungary can be described as a steep decrease in the period of 2013-2014. The decrease in the corporate debt was relatively higher when compared to the growing GDP base. The results are comparable with FSDI findings by the World Bank in 2004, where the proportion of the corporate bonds outstanding as the proportion of GDP of the country was found to be a 40% ratio of High income OECD countries and 4% Low Income. (The World Bank, 2004).

Results

In its article from 2004 The World Bank indicates that the developing countries experience difficulties utilizing international markets (The World Bank, 2004). All of the six countries observed except Hungary have gone from 2-24% ratio of international debt to GDP in 2008 to 11-37% in 2015 thus proving their positive dynamics and development of the capacity to attract funds internationally. Latvia shares the third highest level of the international debt as the proportion of GDP within the cluster observed thus proving presence of the international demand.

According to FSDI, the *access* is useful and effective only when the cost of capital is low and process to acquire capital is easy (The World Bank, 2004). While 3 month and 10 year maturities bonds of the sample countries selected are issued in different countries, all the relevant cash flows need to be swapped to EUR currency in order to compare the cost of capital of the sovereign debt for 3 month and 10 year maturities. All the cash flows were first swapped to EUR currency with the help of Bloomberg system and then analysed. The analysis of 3 month and 10 year public bonds of Poland, Latvia, Hungary, Slovakia, Slovenia Bulgaria, Lithuania and Romania indicates the difference in yields both in short-term and long-term segment. The high volatility of short-term bond segment is stimulated by the low interest rate environment as well as the proximity to maturity.

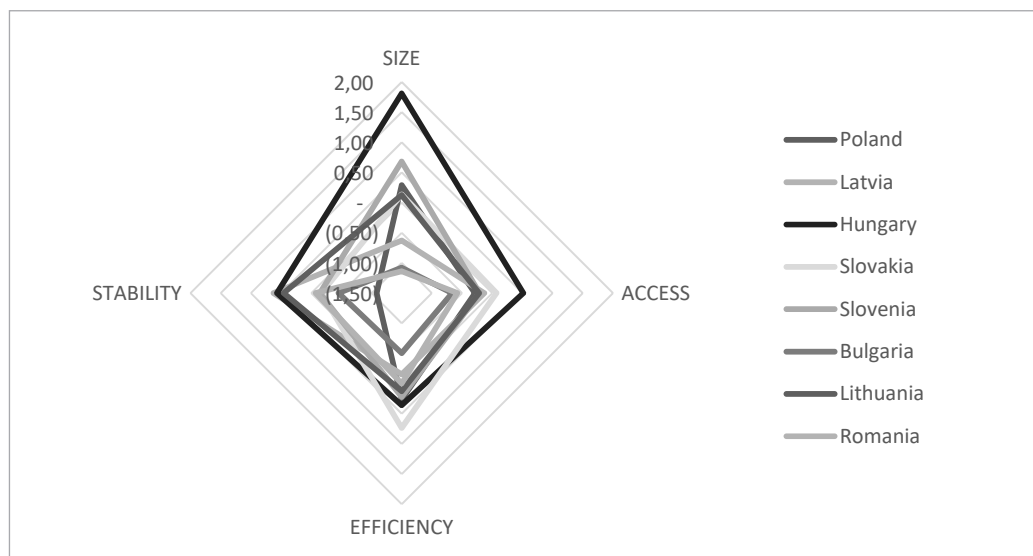
The study of the World Bank (2004) states that measurement of domestic bonds to total bonds outstanding indicates the capacity of local market to provide capital. The ratio of domestic bonds to total bonds outstanding in the cluster observed fluctuates substantially reaching 76% in Poland and exceeding 50% in Hungary, Slovenia and Slovakia. The latter could be partially explained by the presence of the local currency, which stimulates the selection of the local instruments by the local investors.

The study of the World Bank states that measurement of domestic private bonds to total domestic bonds outstanding indicates the degree of accessibility of the resources locally for the companies thus affecting their financing decision (The World Bank, 2004). Latvia is leading the sample with its 50% of domestic corporate debt as the percentage of the total domestic debt. The average level of the sample observed is reaching only 12% in 2015 indicating the low level of development of the local capital market. This indicator reveals the very strong position of Latvia in the domestic corporate debt market.

The study of the World Bank stresses the importance of the *efficiency* of the bond market stating that more than 130 countries have some form of organised bond market, but only 50 have

Figure 1

Composite Bond Market Indicators (Author's construction based on The World Bank, Bloomberg and Bank for International Settlement data, 2071)



become substantial in size and even smaller number are efficient by international standards (The World Bank, 2004). Despite the existing difference in both size and access area indicators observed before, the efficiency area metrics: bid-ask spread, quote size and the number of the counterparties providing bid/ask quotes for the bonds, are comparatively similar.

Latvia demonstrates the lowest bid-ask spread from all the six countries while sharing the average quote size and counterparties providing bid/ask quotes thus indicating the comparatively efficient market.

Stability is the last area of indicators suggested by FSDI for the analysis of the development of the corporate bond market. FSDI groups stability indicators into 4 areas: volatility, skewness, maturity and correlation, thus providing 6 ratios: volatility of sovereign bond index, skewness of sovereign bond index, ratio of short-term to total bonds (domestic), ratio of short-term bond to total bonds (international), correlation with German bond returns, correlation with US bond returns. (The World Bank, 2004).

The study of the World Bank states that stability of the bond market is influencing the cost of capital and thus the motivation of the investors to enter the market. (The World Bank, 2004). This study analyses the stability of the cluster countries applying 3 groups of ratios: volatility, skewness and maturity for public bond segment only. Latvia demonstrates the highest level of the stability area indicators in the cluster observed with the comparatively low level of short-term bonds issues and presence of longer-term financing possibilities open for both sovereign and corporate segment in the country.

- Despite the current strong focus towards market-based economy, the academic research defines market-based, bank-based, financial services and legal-based views. The apparent skewness to bank-based view domination can be observed in the early research in the period mid-1990s early 2000s. Pre-crisis studies emphasize the cost-effectiveness and safety of bank-based financing due to higher monitoring and control function performed by the banking sector versus lower control from the investor society.
- While skewed to bank-based economy efficiency before crisis, the researchers have turned to more market-based approach in post- crisis period. Post-crisis academic research concentrate on finding: the relationship between the crisis effect and economic growth and the type of financial system; QE effect and financial system; an alternative view on the classification of the financial system of a country. Moreover the focus of the EC towards CMU has left very scares research on bank-based economy efficiency.
- The shift in bank-based and market-based economy paradigm is taking place by observing both not as substitutes any more but as complements. Gradually the border between the market and financial institution is becoming more blurred and banks are viewed from the perspective of the financial market participants and originators of the bond issues. Additionally the significance of legal practice in the country as the one influencing the economy is stressed by the academic studies.
- To identify the development of Latvian corporate bond market prior to CMU action plan introduction the FSDI framework is selected. The peer country selection is based on the study of Bending et al (2014), where the countries of the European Union are group according to the presence of loans available for non-financial companies and capital market size indicators. In the result 4 clusters are formed. Latvia is sharing the cluster where both banking sectors and capital markets appear underdeveloped. The countries in the sample are Bulgaria, Hungary, Latvia, Lithuania, Poland, Romania, Slovakia and Slovenia. FSDI framework is run for the whole cluster to identify the comparative development of Latvia within the peer group and potential for further development within CMU action presence

Conclusions

- Size area is the comparatively weakest area for Latvia- comparatively low level of sovereign debt outstanding and low level of the size of the corporate bond market when related to the GDP of the country place Latvia in the lower end with Romania and Bulgaria behind. Lithuania, Slovakia and Poland represent the average level in the cluster observed.
- Measurement of domestic private bonds to total domestic bonds outstanding indicates the degree of accessibility of the resources locally for the companies. Latvia has the highest ratio within the cluster observed with its 50% of domestic corporate debt as the percentage of the total domestic debt. This indicator reveals relatively very strong position of Latvia in the domestic corporate debt market as well as being the metric of access area.
- Latvia demonstrates the lowest bid-ask spread from all the six countries while sharing the average quote size and counterparties providing bid/ask quotes thus indicating the comparatively efficient market.
- Stability is the strongest area for Latvian bond market and its corporate segment where the comparatively low level of short-term bonds issues and presence of longer-term financing possibilities are open for both sovereign and corporate segment in the country.
- CMU represents an action plan with short and medium term focus. The early priorities of EC are reviewing company documentation; developing standardised methodologies to assess the creditworthiness of SMEs; reviving high quality securitisation; development of European Long Term Investment Funds; developing European private placement market.
- Latvian bond market and its corporate segment from four areas analysed: size, access, efficiency and stability; is facing the challenge only on the size metrics. The actions of CMU targeted to increase directly or indirectly the size of the market should be prioritised for Latvian corporate bond market. CMU actions related to increase the size of the corporate bond market are reviving securitisation, participation in European Long Term Investment Funds and developing European private placement market.
- Recommendation for the future studies include to perform in-depth analysis of CMU introduction application to Latvia with detailed effect on Latvian corporate bond market and further development of the focus of the FSDI model on the corporate bond sector by adding more corporate bond specific metrics to all four areas observed in the framework.

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