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MODERN INTERNATIONAL REGULATORY REQUIREMENTS FOR BANK'S LIQUIDITY

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The article describes new requirements of banking activity regulation to capital and liquidity in the context of the Basel standards. It analyses the state of the Ukrainian banking supervision and readiness of banks to realise renewed standards. It justifies the necessity of introduction of international standards of banking supervision in Ukraine in order to provide financial stability of banking system and integration into the global financial environment. It proposes practical recommendations on reformation of domestic banking regulation in accordance with the Basel III terms.

Key words: *bank, bank capital, capitalization, liquidity, the National Bank of Ukraine, international standards, capital buffer.*
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Крупка І. М., Паньків Х. П. Сучасні міжнародні вимоги регулювання ліквідності банків

Висвітлено нові вимоги регулювання банківської діяльності до банківського капіталу і ліквідності в контексті Базельських стандартів. Проаналізовано стан українського банківського нагляду та готовність банків до виконання оновлених стандартів. Обґрунтовано необхідність запровадження міжнародних стандартів банківського нагляду в Україні з метою забезпечення фінансової стійкості банківської системи та інтеграції у світове фінансове середовище. Запропоновано практичні рекомендації реформування вітчизняного банківського регулювання відповідно до умов Базель III.

Ключові слова: *банк, банківський капітал, капіталізація, ліквідність, Національний банк України, міжнародні стандарти, буфер капіталу.*
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Крупка И. М., Панькив К. П. Современные международные требования регулированию ликвидности банков

Раскрыты новые требования регулирования банковской деятельности к банковскому капиталу и ликвидности в контексте Базельских стандартов. Проанализировано состояние украинского банковского надзора и готовность банков к выполнению обновленных стандартов. Обоснована необходимость введения международных стандартов банковского надзора в Украине с целью обеспечения финансовой устойчивости банковской системы и интеграции в мировую финансовую среду. Предложены практические рекомендации реформирования отечественного банковского регулирования в соответствии с условиями Базель III.

Ключевые слова: *банк, банковский капитал, капитализация, ликвидность, Национальный банк Украины, международные стандарты, буфер капитала.*
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The global financial crisis of 2008 became not only a testing of the regulation and supervision mechanism for banks activities (Basel I, Basel II), but also an impetus for its improvement and coordination of banking supervisors efforts on banking regulation and reformation of the international banking supervision system. Interethnic nature of Ukrainian banks activities becomes more and more important under terms of financial globalization, which provides for an introduction of international supervision standards in addition to The National Bank of Ukraine control. Therefore the process of transition to the modern requirements of the Basel capital standards has begun in the domestic banking system.

Various aspects of improving the banking regulation and supervision and implementation of international standards on the formation and adequate assessment of bank capital are investigated by many domestic and foreign scholars, including O. V. Dzyublyuk, A. O. Epifanov, G. T. Karcheva, V. V. Kovalenko, I. O. Lyutyy, O. I Lavrushin, V. I. Mishchenko, A. M. Moroz, S. V. Naumenkova, L. O. Prymostka, P. S. Rose, M. I. Savluk, J. F. Cinque, V. M. Usoskin, G. Shcherbakova etc. However, in spite of numerous scientific research, the question of reforming the domestic banking regulation in the context of the international banking supervision standards implementation under conditions of financial globalization processes is not revealed enough.

The purpose of the thesis is a theoretical grounding and analysis of problems of international banking supervision standards Basel III implementation in Ukraine, as well as the development of practical recommendations on improvement of domestic banking regulation in the context of the Basel III establishment in order to accelerate the integration of the banking sector into the global financial environment.

It should be noted that the Basel Committee of Banking Supervision and Regulation was established in 1974 by the central bank governors of the Group of Ten countries (G10) in order to develop the recommendations on banking supervision improvement and the financial regulation standards unification in different countries. The main Capital Accords of the Basel Committee are: «International Convergence of Capital Measurement and Capital Standards» (Basel I, 1988), which provides requirements on formation and assessment of regulatory capital and credit risk, «Amendment to the Capital Accord to Incorporate Market Risks» (1996), «Core Principles f or Effective Banking Supervision» (1997), «A new conceptual framework of Capital Accord» (Basel II, 2004), which strengthen requirements on assessment of credit, market and operational risks during minimal capital requirements calculation.

The main purposes of new capital and liquidity banking standards (Basel III), which were adopted in November 2010 at the G20 summit in Seoul, were to increase quality and transparency, to improve bank capital structure and to expand the practice of risk coverage by capital and stimulation of measures on creating buffers. These requirements include: a general increase of the banks capitalization level, capital buffers, short- and medium-term liquidity indicators and leverage ratio, countercyclical regulation. Basel III is an addition to previous documents and it improves, but does not abolish them.

These standards will be gradually implemented during 2013 – 2019 years (*table 1*). It is primarily planned to conduct the reformation of the banking assets and capital structure requirements by the end of 2014 and the share of equity capital in the structure of total regulatory capital by January 2019. It is planned, that the increase of capital quality will occur from January 2014 by January 2018, and the introduction of capital conservation buffer – from January 2016 by January 2019. Therefore, substantially improved banking supervision mechanism should be formed during these years.

Table 1

Introduction terms of Basel III requirements

in % of risk-weighted assets

Indicators	2011	2012	2013	2014	2015	2016	2017	2018	As of 1 Jan 2019
Leverage Ratio	**Supervisory monitoring**		**Parallel run 1 Jan 2013 – 1 Jan 2017 Disclosure starts 1 Jan 2015**					**Migration to Pillar 1**	
Minimum Common Equity Capital Ratio			3.5%	4%	4.5%	4.5%	4.5%	4.5%	4.5%
Capital Conservation Buffer						0.625%	1.25%	1.875%	2.5%
Minimum common equity plus capital conservation buffer			3.5%	4%	4.5%	5.125%	5.75%	6.375%	7%
Phase-in of deductions from CET1 (including amounts exceeding the limit for DTAs, MSRs and financials)				20%	40%	60%	80%	100%	100%
Minimum Tier 1 Capital			4.5%	5.5%	6%	6%	6%	6%	6%
Minimum Total Capital			8%	8%	8%	8%	8%	8%	8%
Minimum Total Capital plus conservation buffer			8%	8%	8%	8.625%	9.25%	9.875%	10.5%
Capital instruments that no longer qualify as non-core Tier 1 capital or Tier 2 capital	Phased out over 10 year horizon beginning 2013								
Liquidity coverage ratio	Observation period begins				Introduce minimum standard				
Net stable funding ratio		Observation period begins						Introduce minimum standard	

Source: Basel III: A global regulatory framework for more resilient banks and banking systems. [Electronic resource]. – Access mode: http://www.bis.org/publ/bcbs189.pdf

It should be underlined that one of the key differences of Basel III is a transition from recommendatory character of previous standards to the stricter requirements, which are obligatory for performance. If the banking indicators does not meet updated requirements, central banks will be authorized (even obliged) to impose sanctions on banking institutions in the form of deprivation of right to pay dividends to shareholders, bonuses and other premiums to managers etc. [4, p. 19].

The increase of requirements to Tier 1 capital (core capital), to which only stocks and retained earnings should be included, is an innovation. Indicator Tier 1 capital should rise from 4 to 6% by 2015, as a result, the share of other Tier 1 capital instruments (deferred tax assets, investments in other financial firms) can reach up to 1.5% of the total amount of capital on this level. Size of Tier 2 capital (supplementary capital) should not exceed 2%, which is three times less than the core capital size. Tier 3 capital is abolished.

An increase of minimal requirement on the level of equity capital to 4.5% of risk-weighted assets by 2015 is set for all banks. In the case of substantial increase of credit risk due to a significant increase of credit operations number, banks will be required to create countercyclical capital buffer based on the model of expected, not actual losses ranging from 0 to 2.5%, depending on national characteristics. The purpose of this reserve is to reduce the capital loss from cyclical fluctuations in credit markets. Simultaneously, a capital conservation buffer will be made up of equal shares, each of 0.625% from the year 2016. During the recession the minimum common equity capital ratio (4.5%) and capital buffer (2.5%) will perform a protection function. As a whole, they will constitute 7% of bank capital. Hence, the requirements to Tier 1 capital strengthen more than three times comparatively to previous requirements (2%) [3, p. 226]. In addition, the minimal requirements to total capital remain unchanged – 8%, but taking into account the capital buffer they will constitute 10.5% of risk-weighted assets.

It should be mentioned that the activities of strategically important banks will be under the special macro-prudential supervision, which will be determined by 41 primary and secondary indicators (according to the «Guidance to Assess the Systemic Importance of Financial Institutions, Markets and Instruments», issued by the Bank for International Settlements, the Financial Stability Board and IMF), for example by such criteria as bank size, risk management, market relationships etc. Thus, the higher capital requirements (particularly in Switzerland [14]) or measures of supplementary supervision will be applied to them.

In the updated requirements of the Basel Committee, bank protection from excessive risk is provided by setting new leverage ratio, which is calculated as the relationship between an amount of borrowed fund and an amount of own fund, at the level of 3% [7, p. 6].

The financial crisis has led to significant losses of liquid funds and insolvency to adequately perform function of intermediary in the financial market by banking institutions. Therefore, in new Basel Accord an international conceptual framework for assessment, standardization and monitoring of liquidity risk is created. In particular, the Basel Committee implemented two indicators for regulation of short- and long-term liquidity: 1) liquidity coverage ratio, which will be introduced from 2015, and 2) net stable funding ratio, which will enter into force from 2018. Values of these parameters should be more than 100% [6, p. 119], and their implementation should lead to an increase of liquidity risk management level that will make banks more reliable and resistant to stress on the global and domestic financial markets. Thus, the updated Basel III requirements fundamentally strengthen international banking standards and have a number of advantages over Basel II, concerning requirements intensification on: quantity and quality of equity capital, regulation mechanism; sufficient time frame for the transition into the new standards (*table 2*).

Table 2

Comparison of the main provisions Basel II and Basel III

Indicators	Basel II	Basel III
Minimum Common Equity Capital Ratio, %	2	4.5 7 (with consideration of buffer)
Capital Conservation Buffer, %	absent	2.5
Countercyclical Capital Buffer, %	absent	0 – 2.5
Capital for systematically important banks	absent	amount of capital is greater than the generally accepted standards
Minimum Tier 1 Capital, %	4	6
Tier 3 Capital	absent	canceled
Minimum Total Capital, %	8	10,5 (with consideration of buffer)
Leverage Ratio, %	absent	3
Liquidity coverage ratio, %	absent	> 100
Net stable funding ratio, %	absent	> 100
Consideration of risk	credit, market, operational	credit, market, operational + + liquidity risk

Source: is based on [7, p. 7; 15].

An implementation of new banking capital and liquidity standards (Basel III) in the world has begun since the 1st of January 2013. However, it is difficult to predict the process of formation of sufficient capital and strict standards requirements compliance by domestic banks, because Ukrainian banks are still using the principles of Basel I, which are supplemented by increased requirements of The National Bank of Ukraine. Basel II requirements appliance could be observed only in financial institutions with foreign capital, share of which in total authorized capital of banks equaled 39.5% at the beginning of 2013.

Analysis of Basel II requirements usage conducted by the central bank of Ukraine has shown that only 22 principles of 30 are currently performed in the state. Experts of banking regulation and supervision of The National Bank of Ukraine believe that domestic banks will be able to completely adopt the risk assessment system Basel II by 2016 [9].

According to analysts' estimation of Swiss bank UBS, banks need to attract 375 billion dollars of additional capital during the period of Basel III implementation in the world, which means that banking institutions should attract about 40 billion dollars annually until 2019 [7, p. 7]. Simultaneously, the Institute of International Finance (IIF) believes that banks ought to attract about 1.3 trillion dollars of additional capital over the capital, which they had had at the end of 2010 [16]. Moreover, in international practice, for example in such banking institutions of the USA as Bank of America Corp, Citigroup Inc, JPMorgan Chase & Co etc. [13], a variety of stress tests are always carried out in order to determine the stability of banks and their capital adequacy in the case of financial crisis.

Requirements intensification of international banking supervision standards (Basel III) had an ambiguous assessment of the national regulators and financial institutions of different countries. For example, banking institutions in such countries as the USA, Canada, Belgium, the United Kingdom, Luxembourg, the Netherlands, Switzerland, fully meet new requirements, because existing requirements in these countries are even stricter. However, Germany and France critically assess Basel Accord since it forces banks to reduce the amount of lending due to their inability to replenish capital. For instance, there are a lot of savings or cashier's offices (22% of the total amount) and cooperative banks (61% of the total amount) in Germany, which finance small and medium businesses. They are unable to carry out operations on the debt market and depend, mainly, on government loans and therefore these requirements can have a negative influence on the activities of these institutions. According to assessment of The Federal Association of German Banks, ten largest banks in the country should increase the amount of equity capital from 105 to 140 billion euro in order to make German national standards appropriate to Basel III [14]. Thus, its introduction can cause a reduction of lending and economic growth rate. Furthermore, according to the Basel Committee assessment, the world average growth rate of gross domestic product will be lower on 0.04% during 4.5 years because of introduction of new rules [3, p. 227].

Ukrainian banks make up financial statements according to international standards since January 2013 according to the National Bank of Ukraine ordinance № 23 «About procedure for the formation and use of reserves by banks to reimburse possible losses resulting from active bank operations», which provides the reserves formation for active operations in accordance with new requirements [11]. Meanwhile the National Bank of Ukraine is only preparing to implement a stress test, while there is no sense in its conduction based on the data of 2012. According to the results of last stress tests of domestic banks in 2009, in which the estimation of the reserves adequacy, capital and loan portfolio was carried out, the required sum of additional capitalization in Ukrainian banks equaled 40 billion hryvnyas. However, the National Bank of Ukraine assures that the banking system is currently stable, and the main bank performance measures are normal [8], because the domestic banking system received 139 billion hryvnyas of additional capital, including 127 billion hryvnyas of equity capital during the period from the end of III quarter 2008 to the end of I semester 2012, according to the international rating agency Fitch [17].

An increase of requirements on the formation of regulatory capital by commercial banks to the sum of 120 million hryvnyas by the 1st of January was stipulated according to the approved ordinance of the National Bank of Ukraine № 273 «About amendments to some regulatory-legislative acts of the National Bank of Ukraine» dated the 9th of June [12]. In accordance with the assessment of the Association of Ukrainian Banks (AUB) more than 80 active banks did not have capital in such amount and had to increase the size of regulatory capital by 67.2%, that is 3.9 billion hryvnyas for performance of these requirements. The Association of Ukrainian Banks also notes that the minimal initial capital for the creation of a European bank equals approximately 50 million hryvnyas, which is two times less than in Ukraine. In the new banking standards Basel III, 8 years are given for an increase of the regulatory capital adequacy from 8 to 10.5%, which means on 31%, while for domestic banks only 2 years are given for an increase of the regulatory capital size more than on 60% [1]. In addition, the Program of Economic Reforms for 2010-2014, approved by the President of Ukraine Viktor Yanukovych aims to increase the average level of bank equity capital not less than twice by 2014 [10].

It should be underlined while assessing the Basel Committee new standards that the increase of regulatory capital adequacy ratio to the value of 10.5% including capital buffer will not significantly affect the functioning of Ukrainian banks, as the actual value at the 1st of January 2013 was 18.06%. The increase of requirements to Tier 1 capital from 4 to 6% is an innovation as this ratio is new to Ukraine. However, in our opinion, the introduction of this ratio will not affect the capital adequacy. According to our calculations, based on the data of the National Bank of Ukraine [5], the correlation between the share capital and total assets of domestic banks was 15.5% at the 1st of January 2013.

The further implementation of Basel III in Ukraine at this stage requires developing practical recommendations on improvement of domestic banking regulation. The most significant, in our opinion, are:

- creation (at the national level) of methodological documents, which regulate this process;
- conduction of domestic banks stress tests held by the National Bank of Ukraine and international rating agencies for appropriate assessment of the required amount of additional capital;
- providing an appropriate financial, material, technical and human resources base for using complex

economic models, which the Basel Committee recommends and introducing a modern systems of risk management;

- using independent auditors to supervise commercial banks;
- conduct various trainings for employees of the Banking Supervision Department of the NBU and representatives of banking institutions supported by the European Union and the Basel Committee in particular;
- increasing regulatory capital adequacy ratio in accordance with the pace of its growth by 31% (from 10 to 13%) in obedience to Basel III requirements;
- introducing the liquidity coverage ratio (LCR) and the net stable funding ratio (NSFR) instead of the current liquidity ratio (N5) and the short-term liquidity ratio (N6), the value of which should be more than 100%;
- increasing bank capitalization level by means of mergers, acquisitions etc.

Hence, the current state of the domestic banking system is a good basis for the implementation of Basel III standard: the regulatory capital adequacy ratio considerably exceeds the value proposed by the Basel Committee, including capital buffer; additional capital, including owners' equity capital, constantly flows into the banking system, and, as the National Bank of Ukraine says, the main indicators of banks activities are normal in general. In spite of discussion on the new Basel standards expediency and their implementation into the domestic banking practice, in our opinion, Basel III should become an important precondition for appearance in the market of financially stable and reliable banks with their own strategies and business models, which will adequately perform the functions of financial intermediaries according to the needs of economic development independently of possible disturbances and fluctuations in the global financial environment. ■

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