ANNALS OF FACULTY ENGINEERING HUNEDOARA
– INTERNATIONAL JOURNAL OF ENGINEERING
Tome X (Year 2012) – FASCICULE 2 (ISSN 1584 – 2665)

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RISK MANAGEMENT IN SERBIAN BANKS AND INSURANCE COMPANIES

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ABSTRACT: *Risk acceptance is the basic activity of insurance companies and banks. The essence of risk management is to recognize and use opportunities in surrounding and to mitigate effects of threats of those risks. Serbian banks implemented risk management function, risk management process and minimal capital adequacy ratio. Serbian insurance sector is in the phase of establishment of the risk management function and implementation of full process of risk management within the company. The majority number of Serbian insurance companies: are in the second or the third phase of risk management process (from 6 phases) and is in the establishing phase of risk management function.*
KEYWORDS: *banks, insurance companies, financial institutions, risk, risk management*

INTRODUCTION

Risk is deviation of expected results on the basis of movement of financial parameters, which have impact on money loss of financial company i.e. bank or insurance company. Risk management (RM) or managing the risk means optimization of management costs, while ensuring that nobody will have loss. RM implies business philosophy, culture and climate of organization, as well as some business functions of a financial institution.

Accepting of the risk is basic business of the banks and insurance company. The essence of RM in banks and insurance companies is to recognize opportunities in risk environment and to use it on the best possible way i.e. minimize or avoid the threat.

At the beginning risks were recognized in insurance industry, but RM process was established first in the banks. The reason for it was catastrophic loss which customers of the bank and banks had in the past during the different crises. European regulation bodies created regulatory frame for insurance industry known as Solvency I and II, on the basis of positive results of introducing banks' regulation known as Basel Rules (I and II).

The subject of this work is to show common and different things at the level of implemented RM process and further development perspectives of it in Serbia.

RISK DEFINITION IN FINANCIAL BUSINESS

Risk is not desirable and unpleasant. Rational nature of the man goes in direction to take some initiative in risk management. Financial theory defines the risk as deviation of expected results on the basis of movement of financial parameters, which have impact on money loss of financial company i.e. bank or insurance company.

Risk can be classified in different ways, but the most important classification for the banks and insurance companies is as follows [Vaughan and Vaughan, 1995]: 1) Financial and non-financial risk – financial risk covers situations where there is possibility of financial (money) loss, while in the situation of non-financial risk there are no financial damages. 2)

Pure and speculative risk – speculative risk is the situation where there is possibility of loss and profit at the same time. Pure risk is the situation which covers just possibility of loss or no loss.

In case of banks we can consider different principles of classification, which results with more theories about banks' risk. In accordance with one theory, banks' risk can be categorized in two groups: 1) financial risk which includes dividend risk, capital risk, interest rate risk, liquidity risk and foreign exchange (FX) risk, 2) business risk which includes credit risk, strategic risk, law risk, operative risk, commodity risk and risk connected to financial products. In accordance with transactional principle banks' risk can be classified on: credit risk, trade risk and balance risk.

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In Serbia current regulation defines following bank's risks: credit risk, interest rate risk, FX risk and other market risks, exposure risk, investment risk, country risk, operational risk and liquidity risk.

In case of insurance companies there are three groups of risks [Muller's report, on CEIOPS site]: 1) technical risks which include risk of insufficient tariffs, deviation risk, evaluation risk, insurance risk, etc. 2) investment risks which include depreciation risk, liquidity risk, interest rate risk, evaluation risk, etc. 3) non-technical risks which include management risk, general business risk, etc, i.e. in accordance with the phase of appearing in insurance company acceptance risk, investment risk and risk of damage liquidation. In accordance with Directive on Solvency II, main risks connected to insurance companies can be classified on four groups: insurance risk (in the area of non-life, life and health insurance), market risk, credit risk and operational risk.

In Serbia current regulation defines following risks in insurance industry: insurance risk, market risk, operational risk, risk of term and structure misbalance of assets and liabilities, deposited risk and investment risk, legal risk and reputation risk.

We can conclude that for banks the most important risk is credit risk, and for insurance companies it is insurance risk (which is shown in table 1).

Table 1: Risks in local banking and insurance business

Risks	**Banks**	**Insurance companies**	**Priority - banks**	**Priority – insurance companies**	**Note**
Credit	✓	+/-	1	5	In case of insurance companies regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Interest rate, FX and other market risks	✓	✓	2	2	In case of insurance companies regulator defined it more detailed.
Exposure risk	✓	+/-	3	5	In case of insurance companies regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Investment risk	✓	+/-	4	5	In case of insurance companies regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Country risk	✓	+/-	5	5	In case of insurance companies regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Operational risk	✓	✓	6	3	In case of banks regulator defined it more detailed.
Reputation risk and law risk	✓	✓	7	7	In case of insurance companies regulator did not define law risk.
Liquidity risk	✓	✓	8	3	In case of insurance companies liquidity risk is part of risk of term misbalance.
Insurance risk	-	✓	-	1	In case of bank's business insurance risk is connected to the situation where insurance is technique for risk mitigation i.e. in the terms of financial standing of insurance companies to pay insured case (damage).
Risk of term and structure misbalance of assets and liabilities	✓	✓	8	4	In case of bank's business regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Deposited risk and investment risk	+/-	✓	2	5	In case of bank's business regulator did not define it. Having in mind industry characteristics it can be priority on proposed way.
Law risk	✓	✓	9	6	In case of bank's business regulator defined it through operational risk definition.

Source: The Official Gazeta of Republic of Serbia (no. 12/2007, 129/07, 63/2008 and 112/2008)

RISK MANAGEMENT IN FINANCIAL BUSINESS

„RM or managing the risk is in the general meaning, art of making the decisions in unpredictable environment. RM means optimization of managing costs in the manner that nobody will be damaged. RM includes business philosophy, culture and climate of organization, as well as some business functions of financial institution. RM is central part of strategic and corporative management of any company.“ [Vaughan and Vaughan, 1995]

Focus of the good RM is on identification and mitigation of the risk. Targets of RM are: 1) financial institution can survive the losses and after that to achieve the growth i.e. maximize the profit, 2) To be efficient in risk environment, c) To be in complied with regulation.

RM are techniques which are used by individuals and companies in order to mitigate the risk (includes managing the business risk). In financial companies it is important to manage pure risks. RM is permanent and always developing process which is part of organization strategy and implementation of the strategy. RM process is dynamic process. Every financial institution is obliged to develop its own internal manual for RM, which is approved and adopted by the relevant supervisory management bodies of the financial institution. RM process includes 6 steps:

1. ***Defining the targets** – in the RM program. It precisely defines what the financial institution expects from this implemented RM. The primary aim is to protect efficiency of the financial institution. The secondary aim is to protect employees at work. Other aims are connected to the different areas such as: decrease in costs, social responsibility, good public relations, etc.*
2. ***Risk identification** – risk manager should be aware of risk existence before taking any action. Risk manager must discover the risks to which business of the company is exposed. In accordance with it the crucial aspect of risk identification is to determine the risk exposure i.e. potential losses which are connected to the particular type of the risk of those categories: physical assets, financial funds, human resources and responsibility.*

Risk identification is the risk management phase which includes: determination of the risk in general classification system of the bank and defining the responsible employees, as well as to discover cause – effect relations between the risks and to percept risk events. The perception of risk events is connected to the ability to predict potential risk situation which will be the cause of damage i.e. to determine the risk which can be the active cause of the damage, as well as to determine the threats which can increase the effects of the mentioned risk.

The basic classification of the risk in the business of financial company is: a) Critical risk – results with the bankruptcy of the financial institution, b) Important risk - has impact on company’s liquidity, but the negative effects of it can be recover (by using the bank’s loan or to increase efforts to collect due dates receivables), c) Non-important risk – the effects of those risks do not have important impact on company’s business i.e. they do not have impact on liquidity and solvency of the financial institution.

3. ***Risk estimation** – is the general process of risk analysis and estimation of the risk.*

Risk estimation can be: qualitative, quantitative and half-quantitative in terms of the probability of appearing the risk event and possible damages. The different techniques can be used for risk analysis.

The results of risk analysis can be used for getting the profile of the risk which gives assessment of risk importance (for each risk) and provides the tools for defining the priority in risk regulation i.e. allows ranking of the identified risk in the way to determine the relative importance.

Upon completed risk analysis process, it is important to compare the potential risk with the defined risk criteria (by the financial institution). The risk evaluation is important for the decision making on importance of the risks for the company and to make further steps accordingly (it means the risk should be regulated or accepted).

4. ***To consider alternatives and to choose techniques for RM** – includes two solutions: a) Risk control – which is connected to minimization of the loss (to which the company is exposed). Methods are: avoidance, preventive and decrease i.e. stop and loss control, and minimizing of different losses (if they come). b) Risk financing i.e. optimization of available funds for the purpose of loss mitigation, which left after the applied risk control technique. Methods are: acceptance and transfer of the risk.*

The realistic level of risk acceptance is based on cost-benefit relation. It is important to find the optimal relation between the costs and benefits. There are many cases where potential loss will not result with the bankruptcy of the company, but transfer of the risk is desirable.

5. ***Execution of the decision*** *– is the administrative process of decision appliance on particular risk.*
6. ***Monitoring and evaluation*** *– is permanent function of risk manager, which means constant evaluation and correction of risk management organization, in accordance with the changes of risk (because risk can be disappear or to become new). Also, the mistakes can be appeared during risk management and it should be corrected.*

Monitoring and control of RM means that effective RM includes particular reporting and control structure in order to identify and quantitative risk in time, and to implement relevant controls as response to a risk event.

RISK MANAGEMENT IN LOCAL INSURANCE COMPANIES AND BANKS

Basel Rules (I and II) are regulatory frame for banking business. At the same time, frame for RM in insurance industry is European Directive on Solvency. Benefits from implementation of the mentioned regulatory frames will have both financial industries, supervisory and customers of financial institutions.

Table 2. Risk management process in banks and insurance companies

1. The phases of risk management process	*Banks*	*Insurance companies*	*Note*
Defining the targets	✓	✓	
Risk identification	✓	✓	*Crucial, important and non-important*
Risk estimation: • *Qualitative* • *Quantitative* • *Half-quantitative*	 + + +	 + - +/-	*The banks quantify risk exposure in money equivalent. They use a lot of common methods, but also they have own methods specific for their basic business activity.*
To consider alternatives and to choose techniques for risk management: • *Risk control* • *Risk financing*	✓	✓	*They use common techniques for risk management, but in the practice they use different instruments for risk mitigation.*
Execution of the decision	✓	✓	
Monitoring and evaluation	✓	✓	
2.Regulation	*Basel I*	*Solvency I*	*Directive on Solvency were prepared on the basis of Basel rules. In Serbia implementation of Basel II is expected at the beginning of 2011 and Solvency II at the end of 2012.*
Area of implementation	✓	✓	
Pillar I – quantitative requirements	*Min capital requirement (adequacy ratio). Models for risk exposure quantification: the basic indicator approach, the standardized approach and advanced measurement approach.*	*Min capital requirement (MCR), solvency capital requirement (SCR), technical reserves. Models for quantitative requirements: standard formula and internal models.*	*Both regulatory frameworks are in favour of internal models for risk exposure quantification.*
Pillar II – supervisory process	*The best risk management practice; approval process for internal models.*	*Corporate governance and internal audit; process of control supervisory and supervisory power; risk management function and liability management.*	*It means that supervisory bodies have qualified human resources which are able to evaluate internal models of the bank and insurance company.*
Pillar III – market discipline	*Demanding requirements for publishing the data.*	*Reporting risks to supervisory body and other stakeholders.*	*The aim of appliance 3rd pillar is to protect the customers of financial institutions and to protect financial institutions from potential taking risk events.*

Source: (www.bis.org, www.ceiops.org, www.nbs.rs)

In Serbia, National bank of Serbia implemented regulatory framework Basel I and Solvency I. If we analyse the questionnaires which were fulfilled by banks (available on the website of the National Bank of Serbia /NBS/) and insurance companies (available on the websites of CEIOPS and NBS), we can notice that the phases of RM process in both financial institutions (shown in table 2) are identical, but the differences are visible in the segment of risk estimation and tools which are used for risk mitigation. In accordance with it, the banks are one step ahead of insurance companies i.e. they formally implemented the whole RM process and made adequate reservation in the equity (equity is the basic guarantor for bank's business and RM).

Serbian banks and insurance companies avail of the same techniques, but they use different instruments for risk mitigation. Insurance companies usually use following techniques for risk mitigation: own capacities for risk management (level of retention), reinsurance and co-insurance. Banks usually take additional collaterals or transfer the risk (i.e. insurance, outsourcing, etc.).

If we analyse the structure and the process of RM administration in Serbian insurance companies and banks, we can notice that: 1) the banks developed more detailed structure and the administration process of RM. 2) Insurance companies are in the phase of establishing the structure and the administration process of RM. In accordance with it, banks established RM division and insurance companies are in the phase of establishment of RM division. Also, the regulator precisely defined that the most responsible bodies for RM are: 1) supervisory and executive board of the bank, 2) supervisory board and manager of the company.

The employees of the financial institution are the key resource for the implementation of RM i.e. their awareness of the risk and their skills to manage the risk. After that, operative processes and IT of the financial institution, and integrated control mechanism i.e. minimizing of the risk in execution of daily activities of organizational part. The last but not the least budget process i.e. allocation of defined sum of money for covering the business risk of the bank and insurance company.

CONCLUSIONS

The good RM of insurance company and bank requires from the company adoption of methodical approach to RM which:

- *Protects shareholders, customers and other stakeholders, i.e. whole industry,*
- *Secures that the executive board fulfils its own obligations connected to the execution of the strategy, creating of company's value and improvement of company's performance,*
- *Secured that there are implemented adequate management's control and that they function in the satisfactory manner.*

Basel Rules represent a regulatory framework for RM in the bank. At the same time Directives on Solvency are a regulatory framework for RM in insurance companies.

If we analyse the questionnaires which were fulfilled by banks and insurance companies, we can notice that the phases of RM process in both financial institutions are identical, but the differences are visible in the segment of risk estimation and tools which are used for risk mitigation. In accordance with it, the banks are one step ahead of insurance companies i.e. they formally implemented the whole RM process and done adequate reservation in the equity (guarantor for the business of the company).

The employees of the financial institution are the key resource for the implementation of RM i.e. their awareness of the risk and their skills to manage the risk. After that, operative processes and IT of the financial institution, and integrated control mechanism i.e. minimizing of the risk in execution of daily activities of organizational part. The last but not the least, it is the budget process i.e. allocation of defined sum of money for covering the business risk of the bank and insurance company.

Serbia had delay (1 year) in implementation of Basel II Rules, and after all happenings (lack of qualified and experienced staff, high costs of staff education and creation of IT system, improvement of technology, development of models and data base) it should be at the beginning of 2012. The aims which should be fulfilled with implementation of Basel II Rules are: further development of banking sector and financial system, improvement of risk management process in banks and supervisory process based on risks, transparency strength and market discipline, adaptability with terms and conditions on international market, harmonization with EU rules, and creating strong relation between the capital requirement and exposure to the risk on the bank level.

In accordance with it, the NBS expects the regulatory frame Solvency II will be implemented easier (based on the experience which they have with implementation of Basel II).

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ACKNOWLEDGMENT

This Research Paper was the part of the project "Advancing Serbia's Competitiveness in the Process of EU Accession", no. 47028, in the period 2001-2015, financed by Serbian Ministry of Science and Technological Development.

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