

**Management of
innovative development
the economic entities**

**Collective monograph edited by
M. Bezpartochnyi, I. Britchenko**

Higher School of Social and Economic
Przeworsk (Poland) 2018

Zarządzanie innowacyjnym rozwojem podmiotów gospodarczych

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pod redakcją naukową
M. Bezpartochnego, I. Britchenko**

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The authors of the book have come to the conclusion that it is necessary to effectively use modern approaches the management of innovative development the economic entities in order to increase the efficiency of activity, to ensure competitiveness, to intensify innovation activity. Basic research focuses on assessing the innovation and investment potential of economic entities, analyzing the use of innovative technologies, diagnosing innovative activity. The research results have been implemented in the different models of formation the strategy of innovative development the economic entities, development of Internet communications, innovative restructuring management enterprises, introduction of innovative products and services in various spheres of the national economy. The results of the study can be used in decision-making at the level the economic entities in different areas of activity and organizational-legal forms of ownership, ministries and departments that promote of development the economic entities on an innovative basis. The results can also be used by students and young scientists in modern concepts and mechanisms for management of innovative development the economic entities in the context of efficient use the resource potential and improvement of innovation policy.

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**COMPARATIVE ANALYSIS
OF THE PAYMENT CARDS
MARKET IN UKRAINE
AND NEIGHBORING
COUNTRIES TO IDENTIFY
THE POTENTIAL FOR THE
INNOVATIVE
DEVELOPMENT OF
BUSINESS**

One of types of innovation activity is the new organizational-economic and financial-credit decisions that improve the quality and efficiency of managerial and commercial processes. First of all, the experience of neighboring countries and an analysis of existing financial instruments for stimulation of the innovative development of business entities are studied in the conditions further integration into the World Economy.

Today, Ukraine and its neighboring countries have different levels and directions of economic development, one part of them belongs to the countries of the European Union (Romania Hungary, Slovakia, Poland), the other one intends to become the EU member (Ukraine,

Moldova), the third belongs to the post-soviet countries (Russia, Belarus). However, being neighboring countries and having similar geographic and socio-cultural conditions, they implement different approaches to innovation development and business, and to finding new financial-credit instruments for stimulation of the innovative development of business entities. This all served as the basis for conducting a comparative analysis of the payment card market to determine the potential of innovative business development in Ukraine.

The investigation of the role of financial instruments as an important stimulation factor for innovative development was initiated by foreign and domestic researchers. According to Hungarian Professor Boris Santo (1990) “Innovation are a Means of Economic Development” [1]. The problems of innovative development of economy of the Republic of Belarus and ways to solve them are described in work of Petrasik E.L. (2010) who expressed the idea that in monetary, credit-financial and fiscal system of the country contains significant untapped reserves to stimulate innovation activities of domestic enterprises and the national economy as a whole. [2]

The innovation performance of the Slovak Republic including analyze position country in European Union and innovation barriers in Slovak SMEs was study in the work of Ladislav Klement et al. (2016) [3]. In additional some specific recommendations for focusing the position of Slovakia among the closest competitor regions (V4 neighboring countries – Slovakia, Poland, Hungary, Czech Republic) was also given by them.

Michał Polasik and Dariusz Piotrowski (2016) declared in their works about payment innovations in Poland that a “next most important challenges for the banking sector will be the ability to introduce innovations into the market and the implementation of new technologies, including mobile technologies”. [4]

In the work by Andriy Ramskyi et al. (2017) analyzed of relationships between banking system transformation and effective development of the Ukrainian economy and determined Ukraine’s integration into the European Union as way strengthen the business environment. [5]

Accordingly, it is necessary to study the payment cards market neighboring countries in order to understanding of the potential of innovative development of business. The purpose of researches is to make a comparative analysis of the payment cards market of Ukraine and neighboring countries to determine the connection of the influence

of credit-financial instruments on stimulation of the innovative development of business entities. To this end, the markets of payment cards have been investigated according to the data of the central banks of the countries and the level of development and different business conditions has been analyzed using the international methods “BDO International Business Compass” “Doing Business” for 2017 in such neighboring countries as Belarus, Hungary, Moldova, Poland, Romania, Russian Federation, Slovak Republic and Ukraine.

For determination the potential of innovative development of business entities of the country, the degree of attractiveness of business development is essential. To assess the level of development and business conditions, the Rank and Value of Economic, Political-Legal, and Socio-cultural conditions system, which is defined among 174 countries by the BDO International Business Compass (BDO IBC) method, is analyzed. The comparative analysis of Ukraine and its neighbors by 2017 is presented in Table 3.1

Table 3.1

The parameters of BDO IBC in 2017 for analysed countries

Country	Index		Economic		Political-legal		Socio-cultural	
			General conditions					
	Rank	Value	Rank	Value	Rank	Value	Rank	Value
Belarus	87	49.8	79	48.9	133	44.7	40	56.7
Hungary	45	59.2	56	52.1	41	72.7	46	54.7
Moldova	95	48.7	74	49.2	102	51.5	103	45.7
Poland	34	60.7	47	52.7	32	77.6	47	54.7
Romania	51	56.4	68	49.8	51	68.3	60	52.7
Russian Federation	109	46.7	67	49.9	143	40.1	70	50.9
Slovak Republic	43	59.4	41	54.2	39	74.2	61	52.1
Ukraine	134	42.7	112	45.8	151	37.1	102	45.8

Source: compiled by the authors based on [6]

According to the data of the table of 2017, Ukraine ranks 134 in the ranking of 174 countries in relation to the generalized index of BDO IBC, which is the lowest index among the analysed countries under study. At the same time, under economic conditions, Ukraine occupies 112nd position in the ranking, according to the political-legal conditions – 151st position and according to socio-cultural conditions – 102nd

position. The highest ranking among the countries under study is Poland – 34th among 174 countries. At the same time, in economic and socio-cultural terms, Poland occupies 47th position in the ranking, and Poland has a higher ranking in terms of political-legal conditions, occupying 32nd position.

Also, the most well-known and popular is the methodology for assessing the establishment and support of business “Doing Business” (DB), conducted by the World Bank among 190 countries in the world. The methodology is based on the assessment of various indicators of the start-up and development of small and medium-sized businesses to ensure the enforcing of contracts and resolving insolvency.

So, for innovative business development, the most important indicators are the conditions: Starting a Business and Getting Credit. Consider the 2017 Indicators of “Doing Business” method for Ukraine and its neighboring countries in Table 3.2.

Table 3.2

Analyses of sub-indices DB in 2017 for analysed countries

Doing Business	Belarus	Hungary	Moldova	Poland	Romania	Russia	Slovakia	Ukraine
Starting a Business								
Procedures	5	6	5	4	6	3,7	6	4
Time	5	7	6	37	12	9,8	12	5
Cost	0,6	7,1	6,2	12	2,0	1,0	1,2	0,5
Min.capital	0,0	46	0,0	11	0,6	0,0	18	0,0
Getting Credit index								
Depth of credit info	7	5	6	8	7	7	6	7
Strength of legal rights	2	10	8	7	10	6	7	8
Extent of disclosure	7	2	7	7	9	6	3	6
Director liability	2	4	4	2	4	2	4	2

Source: compiled by the authors based on [7]

According to the table, Ukraine among the neighboring countries has the most immediate conditions for starting a business in terms of the number of procedures (4), days (5) of its registration, Cost (% of income per capita) – 0.5 and Minimum capital (% of income per capita) – 0. The most demanding conditions for starting a business are in Poland – the number of business registration days is 37 days in accordance, Cost (% of income per capita) – 12.1 and Minimum capital (% of income per capita) – 10.9%. At the same time, the conditions for obtaining a loan for business development in both countries are roughly the same. So,

table 2 reveals, that Depth of credit information index (0-8) in Poland – 8 and in Ukraine – 7, Strength of legal rights index (0-12) in Poland – 7 and in Ukraine – 8, Extent of disclosure index (0-10) in Poland – 7 and in Ukraine – 6, Extent of director liability index (0-10) as Poland as in Ukraine – 2.

Effective supported and availability of cashless payments very important for innovative development of business, including using plastic cards. A comparative analysis of the payment cards market in Ukraine and neighboring countries is presented in Table 3.3

Table 3.3

Comparative analyses of payment cards market in 2017 for analysed countries

Country	Population, mln.	Number of card, mln.	Cards - per capita	ATM, pcs.	People – per ATM	POS, ths.pcs.	People - per POS
Belarus	9, 5	13,9	1,46	4 404	2 157	151	63
Hungary	9, 8	9,1	0,93	5 107	1 913	136	72
Moldova	4,1	1, 7	0,43	1 099	3 694	17	244
Poland	38,6	37, 8	0,98	23 230	1 663	605	64
Romania	19,1	16, 4	0,86	11 069	1 724	194	98
Russian Federation	146,5	268, 5	1,83	206 316	710	2189	67
Slovak Republic	5, 4	5, 5	1,01	2 765	1 966	42	129
Ukraine	42,2	34, 9	0,82	37 003	1 142	252	168

Source: compiled by the authors based on [8-15]

A comparison of the population of Ukraine and its neighboring countries showed that the closest indicator for Ukraine is Poland. The remaining neighboring countries in comparison with Ukraine, except for Russia, have a significantly smaller number of people and, accordingly, the number of small and medium business enterprises.

The comparative analysis of the number of payment cards per capita in Ukraine with other neighboring countries showed that the indicator is slightly lower than in neighboring EU member states and about 2 times less than in the post-soviet countries (Russia, Belarus). So, according to the indicators of the neighboring countries, there is a reserve to increase the emission of payment cards in Ukraine.

Comparison of the ATM's park showed that the largest number of ATMs is in the Russian Federation, however, the number of clients using ATM is the smallest, 710 people per 1 ATM. The smallest number of ATMs is in Moldova, however, the number is the highest for the number of clients using ATM, 3694 people per 1 ATM. In the neighboring countries of the EU an average 1 ATM accounts for about 1800 people. At the same time, the smallest indicator is in Poland – 1,663, which is 1.5 times higher than in Ukraine. Thus, Ukraine has the potential to reduce the ATM's park taking into account the average number of people per 1 ATM in the EU neighboring countries and Ukraine's efforts to reduce cash flow in order to combat the shadow economy.

In order to extend cashless settlements, countries increase the total number of POS-terminals, reducing the number of individuals per one terminal. Among the neighboring countries, Ukraine ranks second after Moldova for the number of persons serviced by one terminal, respectively 224 and 168 number of capita per POS. Average number of capita per POS in other countries is about 70 people, which is almost 2.5 times less than in Ukraine. Therefore, Ukraine has the opportunity to increase the POS terminals park in order to extend cashless settlements and withdraw business from the shadow. Focusing on EU neighboring countries, it should be noted that the best indicators of using the park of funds intended for payment card transactions in Belarus Poland Russian Federation.

The market of payment cards of Ukraine and Poland are similar. Ukraine and Poland are neighboring countries and have approximately the same conditions for the development of the payment card market. Thus, the total population in both countries is approximately the same as 42 264 thousand in Ukraine and 38 640 thousand in Poland. The number of payment cards in both countries is also approximately the same and is respectively 34858 thousand cards in Ukraine and 37 765 thousand cards in Poland.

However, the number of cards per capita in Poland is higher than in Ukraine by almost 20% and is respectively 0, 98 cards per person in Poland and 0, 82 per 1 person in Ukraine. The number of Business customer cards in Poland is almost 7 times the number of Corporate Cards in Ukraine and is respectively 9.74% and 1.5% in the total number of cards. Therefore, Ukraine has great potential for issuing corporate cards as a financial and financial tool for the development of innovative business.

One of the factors behind the reduction of cash flow in business and the expansion of cashless payments in Ukraine is to reduce the ATM fleet and increase the POS-terminals park, taking into account the experience of Poland. The total number of POS-terminals and Merchants in Poland is much higher than in Ukraine. The calculation of Merchants' provision of POS-terminals has shown that on average one outlet in Poland is set to almost 2.4, while in Ukraine this indicator is 1.5, which is 60% less.

Thus, a comparative analysis of the payment cards market of Ukraine and neighboring countries to determine the potential of innovative business development has shown that by the rating "BDO International Business Compass", "Doing Business" and the author's assessment of the payment card market in 2008-2017, the best for studying and determining the potential of innovation development of business in Ukraine within the framework of European integration is the experience of Poland.

Comparing the indicators of the payment cards market in Poland and Ukraine, reserves have been set for increasing the emission of corporate cards for business, reducing the number of ATMs and increasing the number of POS-terminals.

However, on the results presented in these researches, it is possible to conclude that the Polish payments card market is now far better equipped to face future challenges for innovation business development than Ukrainian payments card market. It seems justified that Ukrainian banking system should benefit from the Polish experiences.

The opening of payment card markets, the removal of tariff and non-tariff barriers and the greatest possible freedom of movement for bank services generated completely new opportunities for innovative development of business.

Considering the above, for the comparable analysis payment card market methodological tools offered on the basis of scoring and rating. The three criteria: cards availability, ATM park and POS-terminal park recommend used for comparative analysis of payment card market to determine the potential for the innovative development of business.

Criteria and indicators payment card market for identify the potential the innovative development of business are presented in Figure 3.2.

Ukraine and neighboring countries has different population, so comparable total number of payment cards is not show real conditions of payment cards market. The best criteria of cards availability is Number of payment cards per capita which is defined as the index of the

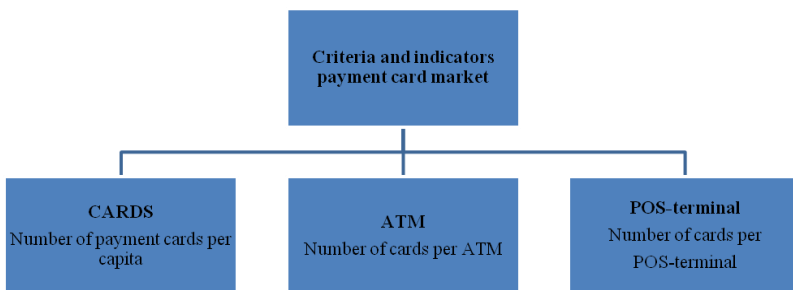


Figure 3.2 Criteria and indicators payment card market

Source: proposed by the authors

number of payment cards to the population of every country.

The strategy to decrease the ATM park in Ukraine and its neighboring countries give the opportunity for expand non-cash settlements between subjects of entrepreneurial activity and withdraw business from the shadow. In this case, the optimal criteria of ATM park are Number of cards per ATM which is defined as the index of the number of cards to the number of ATMs of the country.

Additionally for expand non-cash settlements between subjects of entrepreneurial activity and withdraw business from the shadow is very important development POS-terminal park. The best criteria of POS-terminal park are Number of cards per POS-terminal which is defined as the index of the number of cards to the number of POS-terminal of each country.

Each of three mentioned criteria for the payment cards market has the same significant effect on the state of the payment market in the country. It should be noted that when comparing countries and determining the rating, it is necessary to take into account certain features of each criterion of the payment card market. The highest number of cards per capita and the largest number of cards per 1 ATM is a positive factor and corresponds to the highest rating. At the same time, the highest number of cards per 1 POS terminal indicates a lack of equipment and is a negative factor and corresponds to the lowest rating.

Therefore, it is proposed for industry and SMEs to use the recommended methodology for a rapid review of the payment card market in almost every country. Upgrading and in-depth analysis on an annual basis will ensure that the data is always relevant to reliably compare the risks and opportunities of the market. Thus, our methodology can provide you with a solid foundation for your

innovation solutions that can make your business even more successful.

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