St. Petersburg State University
Graduate School of Management

WORKING PAPER

Y. Bystrova, G. Shirokova

ORGANIZATIONAL CHANGES AND FIRM PERFORMANCE: EVIDENCE FROM RUSSIAN NEW VENTURES

# 10 (E)–2015

Saint Petersburg
2015
Keywords and phrases: organizational change, administrative change, technological change, new venture, firm’s performance.

Abstract: This paper represents results of the research devoted to investigation of the influence of various types of organizational changes on Russian new ventures’ performance. In order to explore this topic and define relationship existing studies, covering influence of organizational changes on the performance and key characteristics of new ventures are analyzed. Hypotheses on the impact of technological and administrative changes such as the introduction of new management systems, new methods of responsibilities distribution among employees, changes in the management structure and outsourcing of non-core operations for the first time, on new ventures’ performance are tested. The empirical study is based on 1129 Russian new ventures from the database Business Environment and Enterprise Performance Survey (BEEPS), collected in 2012. The findings are interesting and have implications for managers and researchers. This study reveals negative influence of technological changes. Second, positive influence of administrative changes on new ventures’ performance was confirmed. Finally, it was concluded that manager’s experience influences positively on firm’s performance while conducting organizational changes, but to a certain value.

Yulia Bystrova, Doctoral student, Graduate School of Management, St. Petersburg State University
e-mail: st036298@student.spbu.ru

Galina Shirokova, Professor Strategic and International Management Department, Director of the Center for Entrepreneurship, St. Petersburg State University
e-mail: shirokova@gsom.pu.ru

© Yulia Bystrova, 2015
© Galina Shirokova, 2015
© Graduate School of Management, St. Petersburg State University, 2015
<table>
<thead>
<tr>
<th>Section</th>
<th>Page</th>
</tr>
</thead>
<tbody>
<tr>
<td>Introduction</td>
<td>5</td>
</tr>
<tr>
<td>Theory and Hypotheses</td>
<td>6</td>
</tr>
<tr>
<td>Method</td>
<td>14</td>
</tr>
<tr>
<td>Results</td>
<td>16</td>
</tr>
<tr>
<td>Discussion</td>
<td>18</td>
</tr>
<tr>
<td>Conclusion</td>
<td>21</td>
</tr>
<tr>
<td>References</td>
<td>23</td>
</tr>
</tbody>
</table>
**Introduction**

In today's global and competitive business environment, a firm's ability to adapt to its environment, and the ability to manage organizational change, become crucial for survival and growth. During the time when change is ‘more the rule, rather than exception’ (Bouckenoohe et al., 2009), executives’ ability to manage organizational change and build commitment to change is becoming increasingly important (Jaros, 2010).

How organizational changes influence company’s performance is among main streams of research studies in the area of strategic management and change management. In recent years, quite many studies on this subject were conducted but most of them focused on large international companies from developed countries (Dean, 1998; Huy, 1999; Pettigrew, Woodman, Cameron, 2001; Shaw, 2005; Hatton, 2011; Van de Ven, Sun, 2011; Battilana, Casciaro, 2012; Mohrman, Lawler, 2012; Shin, Taylor, Seo, 2012). Several attempts were made to predict and explain the relationship between changes and performance of firms from emerging economies (Newman, 2000; Mühlbacher, Nettekoven, Kovac, 2011; Grancelli, 2012). However, still there is no answer to research question on how different types of organizational changes influence performance of new ventures from different economies.

New ventures, which include firms at the age of 0 to 6 years (Brush, 1995) are of particular interest for the investigation of the relationship between organizational changes and their performance, primarily because through changes they interact with business environment, gain experience, learn how to avoid errors and improve performance indicators in the future (Nicholls-Nixon, Cooper, 2000). Usually, at the stage of new firm creation entrepreneurs already have some expectations about business environment, but unfortunately they are not always correct and thus changes represent an opportunity to adapt the business environment conditions (Bhave, 1994; Cassar, 2010). Because new ventures have constantly to maneuverer between survival, death and growth changes are more common phenomenon for them, rather than for large companies.

New ventures often suffer from liability of newness (Stinchcombe, 1965; Carroll, Delacroix, 1982; Freeman, Carroll, Hannan, 1983; Carroll, 1984), which is defined as a high probability of failure due to limited resources and knowledge (Hatton, 2011). It can be assumed that organizational changes in new ventures especially at the early stages of their life cycle are risky, as they disrupt routines thereby decreasing stability and thus reduce survival chances. This assumption is supported by the results of numerous research studies, which indicate importance to provide favorable conditions for early stages of new ventures’ development by avoiding changes that can lead to their “death” (Hannan, Freeman, 1984; Amburgey, Kelly, 1993).

At the same time, new ventures have to be flexible, ready for changes and implementation of new practices in operations in order to be able to adapt to the rapidly changing business environment (Drucker, 1985; Nicholls-Nixon, Cooper, 2000). Thus, despite the opposite views on influence of organizational changes, it appears vital for new ventures to change. However, each step can be the last one and there is simply no resources and time for a mistake. Therefore, investigation of the influence of organizational changes on new ventures’ performance provide us with an answer how to avoid fatal mistakes and which types of organizational changes to conduct in new ventures in order to achieve success (Battilana, 2012).

This study is designed to shed light on the relationship between different types of organizational changes and performance of Russian new ventures. We consider two types of organizational changes: administrative and technological. Configuration approach was implemented as a methodological base (Dess, Newport, Rasheed, 1993) to study the nature of the relationship. The
relevance of configuration approach to analyze the relationship between organizational changes and performance of new ventures is represented in Harms, Kraus and Schwarz (2009) paper.

This paper consists of three main parts. The first part devoted to the theoretical basis of the study and hypothesis development, the second contains a description of the methods and results of the empirical analysis and the third part represents discussion of the results. Main findings as well as limitations of the current study and directions for future research are proposed in the conclusion.

Theory and Hypotheses

**NV Specific Features**

According to most research studies firms at the early stages of their life cycle have high risk of failure and premature death (Rajeswararao, Chaganti, 2012; Timmons, Spinelli, 2004; Song et al., 2008). Thus, following Timmons and Spinelli (2004) about one of five new ventures fail and Rajeswararao and Chaganti (2012) two thirds of new ventures die within the first seven years of their life. In the study (Song et al., 2008) results indicate that during first four years 36% of new ventures survive, but after they reach the age of five years only 22% continue their operations. Numerous failures of new ventures motivate scholars to study the factors that influence their performance (Thornhill, Amit, 2003; Timmons, Spinelli, 2004; Song et al., 2008; Kessler et al., 2012; Rajeswararao, Chaganti, 2012).

According to existing literature new ventures often suffer from various liabilities. Stinchcombe (1965) characterized new ventures by ‘liability of newness’, which means that “a higher proportion of new ventures fail than old” (Stinchcombe, 1965, p.148) because of their limited resource capabilities. Researchers suggest that liability of newness include a new venture’s lack of legitimacy, lack of routines and capabilities, lack of stable links to clients, supporters, or customers, lack of experience, and lack of limited resources (Stinchcombe, 1965; Carroll, Delacroix, 1982; Freeman et al, 1983). The most comprehensive definition of legitimacy is given in (Suchman, 1995, p.574), where legitimacy - is "a generalized perception or assumption that the actions of the subject of legitimate, appropriate and relevant within particular social system of norms and values.” It is considered that recognition of new venture by other stakeholders of the market, that supposes achievement of its legitimacy, greatly increases the chances of its survival and future success, as the firm gains access to resources (Meyer, Rowan, 1977; Aldrich, Fiol, 1994; Nagy et al., 2012).

Further new ventures were also characterized by liability of smallness (Aldrich, Auster, 1986) and liability of adolescence (Fichman, Levinthal, 1991; Bruderl, Schussler, 1990). In 1990 Bruderl and Schussler were the first who introduced the tem " liability of adolescence", according to which the level of risk of firm losses or failure grows in the initial stages of life cycle and then significantly reduces. Thus, the relationship between the risk of failure and the age of the firm appears in inverted U-shaped dependence (Henderson, Twerski, 1999). Often, researchers focus on the relationship between the level of legitimacy and the period of formation and growth of the firm. It is considered that the increasing level of legitimacy could help to overcome or at least reduce the risk of death just after birth, as well as in "teen" age of the firm (Singh, Tucker, House, 1986; Baum, Oliver, 1991).

Aldrich and Auster (1986) by liability of smallness supposed that populations of larger organizations have lower risk than small ones. In addition, the small size of the firm makes it unstable to the dynamic market changes (Kale, Arditi, 1998). Larger firms have advantages in raising capital, attracting skilled labor and overcoming tax liabilities (Aidrich, Auster, 1986; Fichman, Levinthal, 1991). According to many researchers (Baum, Oliver, 1991; Delacroix,
Swaminathan, 1991; Thornhill, Amit, 2003), "liability of smallness" appears in inverse relationship between firm size and the probability of its failure. Of course, not all companies established in small forms and therefore "liability of smallness" is not common characteristic of a new venture. But it should be highlighted that the start-ups usually remain small in size and their tendency towards growth is not observed (Aldrich, Auster, 1986; Storey, 1994; Reynolds, White, 1997; Aldrich, 1999).

Thus the following main features of new venture can be pointed out that distinguish them from mature companies. Firstly, new ventures are characterized by lack of resources (Hitt et al., 2001; Li, Zhang, 2007). Research findings in the field of entrepreneurship indicate that this is one of the main reasons of high level of new ventures’ mortality (Evans, Leighton, 1989). Secondly, new ventures often suffer from lack legitimacy and networking (Shane, Cable, 2002; Shepherd, Zacharakis, 2003), that often lead to limited access to external resources (Li, Zhang, 2007).

It is considered that new ventures are suppliers of radical innovations (Shane, 2009). However, new ventures face lack of knowledge and skills, market power and other resources available for mature firms (Campos, José, Parellada, 2012). In order to confront tough competition, they have to actively look for new ways to create innovation and enhance the competitiveness (Bhuian, Menguc, Bell, 2005). Despite general high death rates of new ventures, high survival and growth rates of start-ups in innovative industries, where they can gain available niche, can be observed (Audretsch, 1995). In turn, the innovative industry is characterized by constant technological changes that propose this industry as favorable for changes.

It is important to mention that survival of new venture greatly depends on its ability to receive and process information from the external business environment quickly, as well as to conduct immediate changes in order to adapt (Nicholls-Nixon, Cooper, 2000).

Two opposite views on relationship between organizational changes and new venture performance exist. On one hand, a number of scholars indicate high level of risk to conduct changes in new ventures, especially at the early stages of their life cycle, as changes lead to a decrease in stability and thus reduce chances for survival (Hannan, Freeman, 1984; Amburgey, Kelly, 1993). For instance, following ecology population theory shift of attention from the key functions and operations of the firm to carry out organizational changes could lead to exit from the market (Hannan, Freeman, 1984). On the other hand, according to entrepreneurship theory it is vital for new ventures to be flexible, ready to change and introduce new practices in modern fast-changing business environment for better adaptation and further growth (Nicholls-Nixon, Cooper, 2000; Lichtenstein, Brush, 2001).

**Types of Organizational Changes**

An analysis of research on organizational change shows that scholars have long studied typologies of organizational change and the characteristics of various types of such change. The majority of such studies distinguish between incremental and radical change (evolutionary and revolutionary, cumulative and discrete). This distinction was first made in the early 1970s, when Watzlawick et al. (1974) introduced the concept of first- and second-order changes. The former was understood as ‘a variation on a basic theme,’ the latter as a critical breakthrough not related to the past. This classification seems somewhat general, and it may be interpreted as related to content and process, or to both simultaneously. On one hand, this is an obvious advantage of this classification (high degree of generalization); on the other hand, it creates some confusion in the literature on organizational change.

Current research on change management critiques existing approaches to classifying organizational change and attempts to build new approaches to distinguishing various types of change.
(Graetz, Smith 2010; Burnes, Jackson 2011). Typically, suggested approaches offer a continuum, with opposite types of change at the ends, based on one or another attribute such as duration of change, speed of change, or the strategic approach that is applied. For example, incremental change is distinguished from transformative change (Dunphy, Stace 1993), episodic from continuous (Huy 2001), planned from unexpected (Bamford, Forrester 2003), evolutionary from revolutionary (Pettigrew 1985), first order from second order (Bartunek, Moch 1987), convergent from radical (Miller, Friesen 1982; Greenwood, Hinings 1988; 1996), and so on.

In this paper organizational changes are investigated in two areas: technological and administrative. Such classification was used before by Weick (1999) and Zheng (2006) due to the fact that it emphasizes both social structural and technological changes, which distinction represents a general and comprehensive classification (Han, Kim, Srivastava, 1998). According to Child and Tse (2001) this typology is particularly suitable for the firms from emerging economies, where dynamically changing business environment forces companies to introduce advanced technologies and modern management systems. Therefore, firms can be required to conduct various changes as in technology as well as in administrative areas.

**Technological organizational changes**

Technological organizational change is modification of production operational processes and systems (Edquist, Hommen, McKelvey, 2001). They may affect the products, services or production processes (Damanpour, Evan, 1984; Brown, Duguid, 1991; Damanpour, 1991; Wischnevsky, Damanpour, Mendez, 2011). Technological change is often considered as a result of new product development or introduction of new production processes and aimed to increase efficiency, product quality and to reduce cost (Zheng, Tse, Li, 2006).

There is an opinion that firms that introduce new products and services, control and manage carefully these processes achieve success more often (Golikova et al., 2008). Technological organizational changes may help to improve operational efficiency and to achieve better performance that in turn is reflected in profit increase (Wischnevsky, Damanpour, Mendez, 2011). Introducing new product or service and meeting the low level of competition the firm gains a significant advantage for further growth and development (Roberts, 1999). Besides offering modern and innovative products to its customers, the firm can thereby prevent market demand uncertainty (Han, Kim, Srivastava, 1998).

It is considered that the rapidly changing business environment creates favorable conditions for technological change. The tendency towards technical perfection becomes a characteristic of emerging economies in contrast with developed countries in the field of technological development (Zhou, Yim, Tse, 2005).

However, Russia has underdevelopment of service and manufacturing sectors. This can be explained by the fact that the transition to a market-oriented economy has not been prepared in advance and proceeded in unfavorable conditions of business environment for the development. Today, Russian firms have been "squeezed" between developed technology companies from Europe and cheap labor from Asia. Therefore they face difficulties to compete on the world market and this resulted in product quality and prices of Russian firms (Frye, Yakovlev, Yasin, 2009). Due to these reasons the level of innovative development in Russia leaves much to be desired and offers limited base for the successful implementation of technological changes in firms.

The results of the research conducted by European Bank for Reconstruction and Development (EBRD) indicate that Russia can be found in many international economic ratings in low positions, reflecting its low level of innovation activity and there is no reason to believe that the situation will change soon (Diversification in Russia ... , 2012). For instance, in 2011 Russia in
terms of innovation was positioned only on 71th place out of 142 in the ranking of the World Economic Forum (Global Competitiveness ..., 2011).

In fairness it should be noted that Russia can be found in higher position if talking about innovative potential (Russia: a course on innovation ..., 2013). Russian government is aware of the innovation development issues and in recent years initiated a number of programs oriented to motivate innovation activity. Quite many attempts were made to create conditions that would facilitate the implementation of modernization of firms. However, reforms in this area do not bring significant results yet and many of them are still not completed.

Technological changes usually refer to R&D area and production units (Zheng, Tse, Li, 2006) and this requires additional investment. In general, the program began by available funding for the private sector, but firms that are at the early stages of modernization still face funding issues. According to the report of the EBRD, it seems that all over the world mature companies with low risks are more likely to receive external funding than new ventures and Russia is not an exception (Diversification in Russia ..., 2012). Therefore, new ventures that do not have sufficient reputation and relevant level of legitimacy can only rely on their own, already limited, resources (Murzacheva, 2009). Meanwhile, firm makes decision to launch a new product or process taking into account many factors such as external (competition, consumer preferences, etc.) and internal, including possible funding sources. Therefore, new ventures that are more focused on survival, rare have enough resources to conduct technological changes (Ardichvili et al., 1998; Bloodgood, 2006) that lead to conclusion about negative influence of technological changes on their performance.

It is important to mention that technological changes often require changes in administrative processes (Tsoukas, 1996; Pettigrew, Woodman, Cameron, 2001). For instance, if the bank is going to introduce new service then relative set of administrative arrangements such as training of employees for example is needed for its implementation (Han, Kim, Srivastava, 1998). Thus, administrative organizational changes are often preliminary stage of technological changes (Damanpour, Evan, 1984) and this fact consequently increases total number of changes in the company. According to Amburgey and Kelly (1993) and Huy (2001) only carefully and well-planned change may have positive results. However, it is unlikely that new ventures are able to develop a successful plan of conduction, taking into account the "liability of newness" and the lack of experience and knowledge.

Based on the discussed arguments above such as low-level of innovation development in the country, the need of combination with other changes in order to get positive result, limited access to government and public funding for modernization, due to low levels of new ventures’ reputation and legitimacy, "liability of newness" and limited resources, the first hypothesis is formulated.

**Hypothesis 1. Performance of Russian new ventures that conduct technological organizational changes will be lower in comparison with those that do not conduct such changes.**

**Administrative organizational changes**

Administrative organizational change is a change in internal system related mainly to the administrative area of the firm. They usually refer to new procedures in the management processes (Damanpour, Evan, 1984; Daft, 2001). Administrative changes may include changes in the structure and policies of the firm, payment system, labor relations, structure of subordination, monitoring and control system (Wischnevsky, Damanpour, Mendez, 2011). They are indirectly related to the basic operations of the company, but directly address management issues (Damanpour, 1991; Tsoukas, 1996).
Introduction of new operating processes and routines (for instance change of subordination hierarchy, introduction of new compensation and payment systems, etc.) will affect the whole company (Damanpour, 1991; Han, Kim, Srivastava, 1998). Therefore administrative changes represent significant deviation from the normal operating processes and require more time for implementation than technological (Damanpour, 1991; Damanpour, Evan, 1984). Also administrative changes often associated with strong resistance from the side of employees (Hannan, Freeman, 1984).

According to recent study conducted by EBRD, Russia lags behind in quality of management in comparison with developed countries and many European countries with emerging economies (Diversification in Russia ..., 2012). Today the share of managers who have received high-quality training in management in Russia is relatively small due to underdeveloped management business administration programs (MBA) in Russian higher education and absence of effective management training system. Modern Russian managers have little knowledge in the field of entrepreneurship (Zaslavskaia, 2012). Many entrepreneurs of Russian new ventures represent some kind of a special cluster known as “self-taught managers”, who have acquired skills to manage and develop their business through own experience (Kozina, 2008).

Recruiting companies note that the most common characteristics of Russian managers are lack of management skills and ability to solve problems. The results of the survey devoted to business environment and enterprise performance (BEEPS) conducted in 2009 by EBRD jointly with the World Bank show that 45% of the growing firms believe that their growth is limited due to lack of qualified employees (Transition Report ..., 2010). Therefore the quality of management in Russia is considered as one of the weaknesses and associated with negative impact on the introduction of new processes and products in the firm.

Scholars believe that roots of the problem could be found in the training programs and knowledge transfer system (Kozlova, Puffer, 1994; Gilbert, Gorlenko, 1999). Misunderstanding of Western techniques, as well as resistance from the side of managers to implement new practices can be widely observed (Jankowicz, 1994; Warner, Denezhkina, 1994; Czinkota, 1997; Gilbert, Cartwright, 2008). Lack of adequate integration of educational and research activities, fragmentation of knowledge, high degree of borrowing elements of Western theories without proper understanding and adaptation to Russian reality, low requirements on the level of students’ knowledge are considered as the main issues in management higher education in Russia (Moskovskaia, 2012).

It can be assumed that for Russian firms the goal of administrative changes is not only to improve firm performance through adaptation to the business environment, but also to compensate the lack of knowledge in the field of management. Low performance indicators can be a signal to inefficient existing management system, which in its turn makes a strong case for changes (Zheng, Tse, Li, 2006). The dissatisfaction of the results of operations, which is caused by processes of formation, lack of experience, "liability of newness" could be motivating factors for a new venture to conduct administrative changes that do not require huge investments in comparison with technological.

It should be pointed out that administrative changes could facilitate the conduction of technological changes, as well as to ensure success of already running ones (Barras, 1990; Damanpour, Evan, 1984), that is crucial in the context of new ventures due to high risk of technological transformations in conditions of limited experience and knowledge. Results of the study (Zheng, Tse, Li, 2006) demonstrate that administrative changes can affect indirectly through influencing technological changes that improve the basic performance of the company.
Following ecology population theory (Hannan, Freeman, 1984) it is crucial to establish routines in the operations and processes of the firm at early stages of its life cycle. However, new ventures from developing countries have a high risk of falling into the trap, when resources will be directed at improving the operations, which will be out of date in a rapidly changing business environment (Levinthal, March, 1993). Therefore administrative changes could help to adapt and avoid negative effects of the turbulence of the business environment of emerging economies (Damanpour, Evan, 1984).

Additionally, administrative changes may enhance increase in legitimacy level of new venture. The firm is considered legitimate if its activity, culture and processes fit values, norms, rules and beliefs of established business community (Dowling, Pfeffer, 1975; Suchman, 1995). Administrative organizational changes in new venture can be considered as a tool to develop these norms, rules and values, that will be reflected in higher level of legitimacy and in turn influence positively on the firm performance. Thus, based on the arguments above, it is possible to formulate the second hypothesis.

**Hypothesis 2.** Performance of Russian new ventures that conduct administrative organizational changes will be higher in comparison with those that do not conduct such changes.

Administrative changes represent more complex picture due to their variability. For instance, introduction of new knowledge management system allows better information exchange; new quality management system helps to control quality of products or services, etc. These innovations may lead to redistribution of responsibilities, demand of training sessions for employees, introduction of new reporting system, etc. However, various forms of administrative organizational changes may influence differently firm performance, especially in the short run due to the fact that effect may occur only after some time (Shirokova, Berezinetz, Shatalov, 2014). Therefore, we consider different types of administrative organizational changes and analyze the influence of each of them on Russian new ventures performance.

**Knowledge management system**

Knowledge management includes the process of knowledge creation, transfer and delivery (Puffer, McCarthy, 2011). Usually new knowledge management system is introduced in order to use and exchange information more efficiently inside firm. There is evidence that dynamic organizational changes can lead to information overload (Dierickx, Gool, 1989; Hambrick et al., 2005). This may occur when top management team receive, interpret and analyze information over their ability to process it adequately (Huber, 1991). Therefore, in case of rich information flows, that bring new venture necessary knowledge for further development and growth, it is important to choose appropriate knowledge management system that would provide its full processing and rational use.

Management training programs, designed to diversify the management tools, help to improve performance indicators of firms from emerging markets, including Russia (Danis, Chiaburu, Lyles, 2010). Russian new ventures could use acquired knowledge to develop strategies that allow to improve firm competitiveness as on domestic market, as well as to lead to success on international one.

Effective information flows and its full assimilation is limited due to historical hostility to knowledge exchange in Russian firms (Michailova, Husted, 2003). Scholars argue that effective knowledge management system will contribute to more transparent management system, will help to create competitive business strategies and improve performance indicators (Puffer, McCarthy, 2011). Therefore knowledge management system can be considered as one of the key potential sources that can help to improve performance indicators of Russian new ventures. Fol-
Following this discussion, first hypothesis in respect of one of the types of administrative organizational changes is proposed.

**Hypothesis 3a. If Russian new ventures introduce new knowledge management system then their performance will be higher in comparison with those that do not conduct such change.**

**New methods of distribution responsibilities**

New methods of distribution responsibilities and decision-making involve redistribution of duties that already performed by employees or introduction of new ones for better fit between goals, objectives, functions and internal environment of the firm (Wischnevsky, Damanpour, Mendez, 2011). In its turn, new venture internal environment will depend on how successfully adaptation to the external business environment is completed.

Understanding of objectives, functions, areas of responsibility, commitment to the firm by employees are considered as the most important components for success of the company (Quinn, 1988; Shin, Taylor, Seo, 2012). It is important that employees understand the goal and meaning of their responsibilities, rather than know just implementation procedure (Deshpande, Webster, 1989). To achieve this it is crucial that each employee has firstly adequate workload and area of responsibility and secondly, the duties appropriate to his competency, education, skills and knowledge. Considering high level of stress in new venture it is important to control both the quality and quantity of the duties performed by each employee (Huy, 1999; Kotter, Cohen, 2002). Redistribution of responsibilities can have a huge potential for further improvements of new venture performance.

In new venture, especially at the earliest stages of its life cycle, the owner usually tends to save costs through management team. This can be observed when several management responsibilities performed by one person, thus that there is no “extra” level of subordination (Kozina, 2008). Interestingly, the combination of manager and owner’s functions is very widespread phenomenon in Russian firms. According to the finding of the research (Dynin, Litovchenko, Blackie, 2004), 82% of top managers in the private sector are both owners and managers and 55% also has responsibilities of middle managers. This leads to excessive workload, which consequently requires the redistribution of responsibilities for better performance.

Even if a new method of distribution responsibilities and decision-making does not fit requirements of the company, employees anyway gain additional experience and knowledge. Results of different studies show that the more diversified employees’ competences, the better new venture’s performance (Cooper, Gimeno-Gascon, Woo, 1994; Ensley, Pearson, Amason, 2002). This lead to the following hypothesis.

**Hypothesis 3b. If Russian new ventures introduce new methods of responsibilities distribution then their performance will be higher in comparison with those that do not conduct such change.**

**Changes in organizational structure**

By change in organizational structure is meant the creation of new units, the integration of different departments or activities. The organizational structure is very important for the company as it permeates its entirely. Composition and structure of divisions influence performance of the whole firm. Employees with a combined working experience are able to make decisions quicker (Eisenhardt, Schoonhoven, 1990; Ruef, Aldrich, Carter, 2003). Recomposition of departments, hierarchies and their number disturb relationships between employees and existing operating system that lead to confusion in internal environment of new venture. This can cause failure or slowing of operations that will negatively influence firm performance.
Reorganization of the firm structure is considered usually as a significant and radical change because it requires considerable amount of time. Introduction of something radically new and unfamiliar to employees may cause their resistance. In case of resistance such change often leads to negative consequences (Momcilovic, Rajakovic, 2009).

It is crucial to consider special features of Russian business environment discussing such type of change. Despite the fact that there are studies, which indicate the dominance of informal relations inside Russian firms (Kozina, 2008), in general Russian management culture and traditions are characterized by high concentration of power in the hands of top management team (Clark, 1999). Therefore changes in organizational structure, especially in formal management level are quite difficult procedure due to widespread top managers' multifunctionality and their resistance to delegate responsibilities considering it as losing control (Shekshnia, Kets de Vries, 2008). Therefore, reforming organizational structure of the Russian new venture is quite difficult and the following assumption is made.

**Hypothesis 3c. Changes in organizational structure of Russian new ventures will increase their performance in comparison with those new ventures in which such changes are not conducted.**

In modern business environment it is a common practice for companies to outsource non-core operations. Various definitions of this phenomenon exist in academic literature, but the most simple is the following: outsourcing is a process that accompanies with a contract with an external unit chosen for performance of non-core firm function or set of functions that can be operated outside the company-customer (Shen, 2005; Potkany, 2008). External unit - the performer can take one or more operations (Caruth, Caruth, 2010). Conducting outsourcing for the first time represents something new to the firm and that is why can be considered as a change.

Outsourcing can be very useful first of all because area of responsibilities becomes smaller and firm may focus on its' key operations. In other words transferring non-core functions to third-party units, new venture has the opportunity to focus on its core operations and improve performance. Secondly, companies which operations are delegated to usually considered being professionals in the relative area. It should be noted that recently, many Western companies consider Russia interesting for IT outsourcing services in their projects (Mechitov, 2009). In general, outsourcing in Russia, is now on the initial stages of its' development but there is a tendency of increasing demand, which in turn creates a huge potential area for further improvements (Smith et al., 2006). Although outsourcing in Russia has not proved financial benefits yet, there is enough evidence to argue that it can influence positively new ventures' performance (Wee, 2010). For instance, results of the research (Salimath et al., 2008), devoted exclusively to outsourcing issues show positive impact, due to decrease in area of responsibilities and opportunity to focus on key operations. Therefore based on these arguments last hypothesis about such form of administrative changes as outsourcing for the first time is proposed.
Hypothesis 3d. If Russian new ventures outsource non-core operations then their performance will be higher in comparison with those that do not conduct such change.

Figure 1 presents the theoretical model of current research study.

**Figure 1: Theoretical Model of the Research**

**Method**

Multiple regression models were selected in order to test relationship between different types of organizational changes and Russian new ventures performance. In the Control variables and independent variables were used to test developed hypotheses in the current study. The equation of the model is:

\[
\text{ln} \, SpE = \beta_0 + \beta_1 AOC + \beta_2 TOC + \beta_3 Mexp + \beta_4 Inv + \beta_5 Is + \beta_6 \ln E + \varepsilon,
\]

where \( \text{ln} \, SpE \) - dependent variable - "annual sales per unit of labor", that is expressed using the logarithm of the indicator. There are many approaches for measuring firm performance and quite many research studies are devoted to this issue (Dess, Robinson, 1984; Hansen, Wernerfelt, 1989; March, Sutton, 1997; Kimball, 1998; Khanna, Rivkin, 2001; Yip, Devinney, Johnson, 2008; Chandra, 2009; Richard et al., 2009).

In current study in order to measure firm performance variable "sales per unit of labor" was chosen, which is calculated using the following formula:

\[
SpE = \frac{Annual \, Sales}{Number \, of \, employees},
\]

where \( SpE \) – annual sales per unit of labor, \( Annual \, Sales \) - annual sales denominated in rubles and \( Number \, of \, employees \) - the number of employees at the end of the reporting year. The indicator is calculated on the data collected in 2012 on firm information at the end of 2010 and 2011.
Such performance indicator as “annual sales per unit of labor" is a tool for measuring firm performance in the economic research and was successfully used previously as dependent variable in several research studies (Huselid, 1995; Schneider et al., 2005; Shaw, 2005; Sun, Aryee, Law, 2007). It represents the share of total annual sales accounted for each employee of company. According to scholars, its main advantage is that it provides general index that can be used for comparisons between firms as well as to assess the effectiveness of internal processes. In addition to all these benefits, indicator “annual sales per unit of labor" is composite indicator of the performance (Devinney, Johnson, 2010) because “number of employees" and “annual sales" separately can be used as firm performance indicator. In current research this indicator is considered appropriate enough because the alternative ones - for instance, "sales growth" or "change in productivity" - will not be able to reflect enough the real performance of new ventures and could not be compared with each other due to differences in new ventures’ age from 0 to 6 years.

Variables TOC and AOC are independent variables. They were used as explained variables reflecting the different types of organizational changes in new venture such as 1) technological organizational changes; 2) administrative organizational changes respectively. These variables show whether relative change took place at least once during last 3 years and coded as binary variables - "1" if the relative change took place and "0" in the opposite case.

Such control variables coded as binary and reflecting the industry as Im - «production», Is - «service» and other "key industries" were also included in the model. The base category was represented by variable "key industries". Such variables as lnE – “firm size" and Mexp - «manager’s experience" were included in the model as control variables. Variable "firm size" was measured by using the logarithm of the number of employees and allowed to assess the effect of firm size on new venture performance. Variable "manager’s experience" was measured as the number of years of manager’s working experience in relative industry. This variable was included in the model due to the assumption of high importance of this indicator in the context of organizational changes and positive relationship between experience and new venture performance.

In equation unknown parameters of the model are introduced through βi and random error through ε.

For the development of the initial model was created the following model:

\[ \ln SpE = \alpha_0 + \alpha_1 Ac_1 + \alpha_2 Ac_2 + \alpha_3 Ac_3 + \alpha_4 Ac_4 + \alpha_5 TOC + \alpha_6 MExp + +\alpha_7 Im \\
+ \alpha_8 Is + \alpha_9 \ln E + \epsilon. \]

Apart from already described above variables the following explaining variables were included in the model: Ac_1 - (a) “new knowledge management system” for more effective information exchange; Ac_2 - (b) “new methods of distribution responsibilities” between employees; Ac_3 - (c) significant “changes in organizational structure” of the firm such as for instance creation of new divisions; Ac_4 - (d) “outsourcing for the first time”. All four variables reflect whether the relative change took place during the last 3 years. They are binary and coded as "1" if the change occurred at least once in the last 3 years and "0" otherwise. Unknown parameters of the model are introduced through ai and random error - ε.

Thus, variables included in the first model are subdivided into two explanatory factors (technological and administrative organizational changes) and control variables (manager’s experience, firm size and type of industry). First model is developed further into the second one, where administrative organizational changes are represented in four various forms.
Sample

The empirical research is carried out on the basis of data from the Business Environment and Enterprise Performance Survey (BEEPS) conducted in 2012 by the European Bank for Reconstruction and Development (EBRD) and World Bank. For the first time survey was conducted in 1999 and covered approximately 4000 enterprises in 26 countries of Eastern Europe and Central Asia to get information upon the environment for private companies and business development. Since first round the survey was repeated 4 times approximately every 3 years. The goal of the surveys to get feedback from companies from Central and Eastern Europe, which represent emerging markets, about business environment and conditions, in which firms are operating. Overall one of the goals is to collect data period by period, in order to monitor changes in the business conditions and environment over the time. The survey includes questions, which reflect the conditions and quality of the business environment, information about firm's operations and represent relationships between companies, the country’s environment and their various performance indicators.

The empirical research is based on the survey of the fifth round. The fifth round of the BEEPS started in Russia in 2011-2012, covering 4220 enterprises in 37 regions. Obtained data from this survey is coded and standardized. This allows using it further to suggest possible reasons for particular relationships between variables (different types of organizational changes and new ventures’ performance). The survey is represented as a questionnaire. In order to test hypothesis and make analyses, sampling of companies at the age of 0-6 years considered as new ventures (Brush, 1995) was done. Initial sample from available by today data includes 1129 Russian new ventures. This selection criteria is fully appropriate to meet the goal of current research study – to investigate relationship between organizational changes and new ventures performance in emerging markets (evidence from Russia). The share of firms located in the capital region in the sample is 2.1% and the remaining share is 97.9%, which represents new ventures from different regions of Russia. The sample includes 26.58% new ventures from "manufacturing" industry, 10.28% - "service" sector and 63.14% - other key industries. Concerning new ventures’ age in the sample the distribution is the following: less than 1 year - 1.18% 1 year - 4.37%, 2 years - 13.53%, 3 years - 19.55%, 4 years - 21.74%, 5 years - 21.68% and 6 years - 17.96%. As to revenue, then sample contain 1.48% of new ventures with annual sales from 400 thousand to 1 million rubles, 25.34% - from 1 to 10 million rubles, 31.96% - from 10 to 100 million rubles, 8,15% - from 100 million to 1 billion rubles and 33.08% of new ventures from 1 to 1.5 billion rubles per year. Finally, with respect to the firm size sample includes around half - 49.8% new ventures that has from 5 to 19 employees, 45.1% - from 20 to 99 and 5.1% - more than 100 employees.

Results

Table 1 represents descriptive statistics, which include variables used in the regression models for testing hypotheses.

<table>
<thead>
<tr>
<th>Variable</th>
<th>#</th>
<th>Mean</th>
<th>Standard deviation</th>
<th>Min</th>
<th>Max</th>
</tr>
</thead>
<tbody>
<tr>
<td>Firm age</td>
<td>1693</td>
<td>3.931</td>
<td>1.5</td>
<td>0</td>
<td>6</td>
</tr>
<tr>
<td>Number of employees</td>
<td>1676</td>
<td>25.881</td>
<td>43.862</td>
<td>5</td>
<td>400</td>
</tr>
<tr>
<td>Firm size (log of number of employees)</td>
<td>1676</td>
<td>2.637</td>
<td>0.968</td>
<td>1.609</td>
<td>5.991</td>
</tr>
<tr>
<td>Annual sales per unit of labor</td>
<td>1129</td>
<td>2913694</td>
<td>6687136</td>
<td>5454.545</td>
<td>1.20e+08</td>
</tr>
</tbody>
</table>
It should be pointed out that sample includes new ventures of different size, that meet goal and objectives of this study because the object of study is new venture that can be found in various size – small, medium and large, depending on the industry, objectives and strategy of the company. The minimum number of employees is five people. As to the age of the company, the sample includes new ventures at the age from 0 to 6 years, in line with criteria and objectives of the research.

Figure 2 and Table 2 show the distribution of new ventures in the sample, where relative organizational changes took place or not during last three years.

**Figure 2: Distribution of New Ventures in the Sample where OC took or did not Take Place**

![Bar Chart: Distribution of New Ventures in the Sample where OC took or did not Take Place](chart.png)

Results of observation analysis shows that in 15% of new ventures in the sample conducted technological organizational changes, while the administrative organizational changes took place in 23% of firms (Figure 2).

**Table 2: Distribution of New Ventures in the Sample that Conduct Various Types of Administrative OC**

<table>
<thead>
<tr>
<th>Type of administrative OC</th>
<th>Share in the sample</th>
</tr>
</thead>
<tbody>
<tr>
<td>New knowledge management system</td>
<td>14%</td>
</tr>
<tr>
<td>New methods of distribution responsibilities</td>
<td>15%</td>
</tr>
<tr>
<td>Change in organizational structure</td>
<td>11%</td>
</tr>
<tr>
<td>Outsourcing for the first time</td>
<td>5%</td>
</tr>
</tbody>
</table>

According to the information in Table 2 new knowledge management system was introduced in 14% of new ventures in the sample, 15% used new methods of distribution of responsibilities and decision-making, changes in the organizational structure took place in 11% of firms in the sample and 5% of new ventures outsourced non-core operations for the first time at least once during the last three years.
Table 3 represents results of the regression model analyses. The table contains estimates of the parameters, F-statistics and their p-values and adjusted coefficients of determination ($R^2_{adj.}$) to each of the six models. The table shows that all models are statistically significant at the level of less than 0.01. The first model includes only control variables. As well as in other models with their participation, the results show significant negative coefficient estimate of the variable "firm size" at the level not less than 1% significance. This can be interpreted as the greater the number of employees, the lower annual sales per unit of labor in this new venture. This can be because of the fact that the more employees in the firm, the more work they duplicate and therefore the lower annual sales per each of employees.

Industry variables have statistically significant negative coefficient estimates in the relative models, except for the last one, where only variable "manufacturing" has statistically significant estimate. This indicates that new ventures from service and manufacturing sectors have lower annual sales per unit of labor in comparison with firms from other "key industry".

Control variable "manager’s experience" got statistically significant positive estimate at the level of at least 10% of significance. This case can be interpreted in favor to manager’s experience. In other words the more experience manager has in the relative industry, the higher new venture performance indicators.

Variable "technological organizational changes" has negative statistically significant coefficient estimates on the level of not less than 5% in the second and fourth models, which supports hypothesis $H1$ concerning difference in performance of new ventures that conducted technological organizational changes in comparison with those in which such changes did not take place.

With regard to the variable "administrative organizational changes", then in all models in which it was used, parameter estimates were statistically significant and indicate positive affect.

With respect to different types of administrative organizational changes important to mention that variables "new methods of distribution responsibilities" and "outsourcing for the first time" got statistically significant at the 5% level and positive estimates of the coefficients, except the fourth model, where the estimate of the parameter is statistically significant only at the 10% level.

**Discussion**

This section of the paper is devoted to the discussion of obtained results. Based on the regression analysis, where data on 1129 Russian new ventures at the age from 0 to 6 years is used, four out of six hypotheses are supported. With respect to hypothesis $H3a$ the coefficient got statistically significant estimate, but demonstrates reverse relationship that lead to opposite assumptions introduced initially.

Hypothesis $H3c$ was not supported neither rejected due to not statistically significant estimate of the variable "change in the organizational structure" in all three models. In other words econometric analyses demonstrate that there is no difference between new ventures performance that conduct and do not implement this change.

Statistical analysis allow to support hypothesis $H1$ that can be interpreted as Russian new ventures performance that conduct technological changes will be higher in comparison with those that do not make such changes. It should be mentioned that the results of previous research studies, in contrast, showed positive relationship between technological changes and firm performance (Storey, 1994; Zheng, Tse, Li, 2006; Tan, Menkhoff, Chay, 2007).
Table 3: Regression Model Analyses

Notes:* — \( p < 0.1; ** — p < 0.05; *** — p < 0.01.\)

<table>
<thead>
<tr>
<th>Variable</th>
<th>Model 1</th>
<th>Model 2</th>
<th>Model 3</th>
<th>Model 4</th>
<th>Model 5</th>
<th>Model 6</th>
</tr>
</thead>
<tbody>
<tr>
<td>Technological OC</td>
<td>-0.246**</td>
<td>0.052</td>
<td>-0.260**</td>
<td>0.030</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Administrative OC</td>
<td>0.317***</td>
<td>0.310***</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New knowledge management system</td>
<td>-0.167</td>
<td>-0.246*</td>
<td>-0.290*</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>New methods of distribution responsibilities</td>
<td>0.250*</td>
<td>0.330**</td>
<td>0.373**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Change in organizational structure</td>
<td>0.194</td>
<td>0.094</td>
<td>0.074</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Outsourcing for the first time</td>
<td>0.443**</td>
<td>0.537**</td>
<td>0.541**</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Manager's experience</td>
<td>0.012**</td>
<td>0.011*</td>
<td></td>
<td>0.011*</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Firm size</td>
<td>-0.152***</td>
<td>-0.160***</td>
<td></td>
<td>-0.162*</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Industry: manufacturing</td>
<td>-0.426***</td>
<td>-0.439***</td>
<td></td>
<td>-0.425***</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Industry: service</td>
<td>-0.267**</td>
<td>-0.204*</td>
<td></td>
<td>-0.198</td>
<td></td>
<td></td>
</tr>
<tr>
<td>F-statistic</td>
<td>12.65***</td>
<td>4.96***</td>
<td>8.31***</td>
<td>5.57***</td>
<td>3.40***</td>
<td>6.22***</td>
</tr>
<tr>
<td>( R^2_{adj.} )</td>
<td>0.042</td>
<td>0.008</td>
<td>0.044</td>
<td>0.014</td>
<td>0.011</td>
<td>0.047</td>
</tr>
<tr>
<td>Number of respondents</td>
<td>1093</td>
<td>978</td>
<td>946</td>
<td>1112</td>
<td>973</td>
<td>941</td>
</tr>
</tbody>
</table>
According to entrepreneurship theory, changes are crucial for new ventures’ survival and adaptation to business environment (Drucker, 1985). However, technological changes often seem to be very risky for new ventures because they are investment consuming and require quite many resources which are limited in new firms (Evans, Leighton, 1989; Zimmerman, Zeitz, 2002; Murzacheva, 2009). According to many studies and reports (Diversification in Russia ..., 2012; Chadee, Roxas, 2013; Holden, Vaiman, 2013) access to public funding in Russia for new ventures is almost impossible. Therefore, technological changes may reduce new venture’s budget that in its turn affects firm performance indicators. Low level of innovation development in Russia and unfavorable conditions for realization of innovative activities do not lead to successful outcomes of technological changes. Another important factor is the problematic access to the latest technology.

In addition, technological changes require preliminary implementation of administrative reorganizations that increases the total number of changes in the company. Probably the combination of these reasons could explain supported assumptions concerning such relationship between technological changes and new venture performance.

With regard to administrative changes, the statistical analyses support hypothesis H2. Therefore it can be argued that the administrative organizational changes generally have a positive effect on the performance of Russian new ventures. Previous studies also demonstrate positive relationship between administrative changes and operation results (Levinthal, March, 1993; Damanpour, Evan, 1984; Zheng, Tse, Li, 2006).

This can be explained by the fact that, firstly, administrative changes may contribute to a better fit of goals, objectives and functions inside the organization (Wischnevsky, Damanpour, Mendez, 2011) and also help new ventures to adapt to business environment. Secondly, due to the fact that the administrative changes do not involve significant investments and the majority of them do not require long period of time for conduction, they seem to be the most attractive and simple way to gain legitimacy. Finally, due to the low quality of management in Russia (Moskovskaia, 2012; Holden, Vaiman, 2013) administrative changes allow to compensate lack of management and consequently contribute to survival and further growth of Russian new venture.

Hypothesis H3a concerning relationship between new knowledge management system and new venture performance was not supported. Results indicate that the introduction of knowledge management system in Russian new ventures may be a premature step. According to organizational behavior theory and knowledge management theory, effective management system, processing, control and adequate use of information is important for the development and growth of the firm (Pawlowski, Bick, 2012; Gustafsson, Borglin, 2013; Larsen, Olaisen, 2013; May, Stewarl, 2013). According to research study (May, Stewarl, 2013) dysfunctional knowledge management can be observed nowadays in Russian companies. It can be assumed that the knowledge management system is only on its early stage of formation and many Russian companies are not familiar with it that causes negative affect at least in the short run. In addition, in many Russian firms communications are informal and introduction of premature formalization related to knowledge exchange can lead to resistance (Momcilovic, Rajakovic, 2009).

Hypothesis H3b was supported and suggests that if new venture uses new methods for the distribution responsibilities then the performance will be higher in comparison with those organizations that do not conduct such changes. Administrative changes are carried out for a better distribution of workload. In the early stages of the firm it is very important to strive for rational allocation of responsibilities among subordinates in order to achieve high performance indicators (Huy, 1999; Kotter, Cohen, 2002). Positive impact of effective workload distribution between
employees was revealed in earlier studies (Shin, Taylor, Seo, 2012) that support our results.

*Hypothesis H3d* was also supported. It can be argued that outsourcing leads to positive results in Russian new ventures performance. The positive relationship between the outsourcing of operations and firm performance has been demonstrated in several studies before (Bertrand, Mol, 2013; Salimath, Cullen, Umesh, 2008). Speaking about new ventures, it should be pointed out that at the early stages of formation company faces many different changes and new processes in contrast to mature companies where the internal environment is stable (Brush, 1995; Nowinski, Rialp, 2013). Consequently decrease in the number of operations at the early stages reduces the risk of failure, because in case of outsourcing functioning system is simplified by exclusion of some of them. That is why outsourcing has a positive effect on the performance of new ventures.

Interesting results were obtained concerning estimates of control variables.

For instance, both industry variables "manufacturing" and "services" got negative statistically significant estimates. This suggests that new ventures belonging to service and manufacturing sectors can be associated with lower annual sales per unit of labor, in comparison with new ventures from other "key industries". Some researchers think that possible explanation for such results can be first of all the effect of industry specific context (Cliff, 1998); secondly, low level of service and manufacturing sectors development in Russia (Frye, Yakovlev, Yasin, 2009).

Relationship between firm size and new venture performance was demonstrated in an inverse form. As noted before number of employees not always positively correlates with firm performance indicators (Delmar, Davidsson, Gartner, 2003). Results of current research concerning firm size can be supported by findings of other scholars that indicate that the smaller size of new venture, the higher its growth rates (Evans, 1987). The main goal of new venture is to survive and small size of the firm may help to avoid duplication of employees’ functions (Varijam, Kraybill, 1992).

While conducting any kind of organizational change adequate manager’s experience is very crucial because the process of reorganization require from managers a lot of deep knowledge and skills to develop new systems and implement new approaches (Nadler, Tushman, 1990; Kotter, 1996; Senior, 2002). The success of organizational change depends on top manager’s understanding of its importance for new venture survival and growth. Managers who do not have full understanding of change need (Wilson, 1992) usually become the most powerful source of internal resistance to reorganizations (Hannan, Freeman, 1984; Goodstein, Boeker, 1991). Therefore, experience is very important and it is not surprising that the results indicate positive correlation between manager’s experience and Russian new ventures performance.

**Conclusion**

While economic, technological and social aspects of the business environment change, changes in knowledge, practices, concepts and approaches required for effective management can be observed. Such factors as globalization, development of information technologies that change the way of communication between people and organizations make this issue more complex.

Today, firms more than ever need theoretical knowledge about organizational changes that will help them to conduct them in order to adapt to rapidly changing business environment and be effective (Mohrman, Lawler, 2012).

In current research study relationship between different types of organizational changes and Russian new venture performance was investigated considering specifics of Russian business environment. Two types of organizational changes as technological and administrative were considered and the last consequently were subdivided into four other forms for further study.

21
Organizational change represents new ventures the way of adaptation to dynamically changing Russian business environment. Considering the fact that new ventures have to maneuver between survival and growth, many researchers tend to believe that organizational changes are constant and integral part of their life.

At the same time, due to new ventures’ need to "survive", especially in the early stages of their life cycle organizational changes are perceived by managers of these firms as a source of possible premature "death" of the company. New ventures need to access resources, which are limited and crucial for survival and growth, through various partnerships and by attracting customers (Aldrich, Fiol, 1994). For this, they need to show stability and achieve the recognition, in other words to become legitimate (Delmar, Shane, 2004). Organizational changes represent the mechanism for creation, administration and development of organizations norms, procedures and regulations accepted by other firms in business community.

Our results suggest that organizational changes can be both harmful and useful for new venture's performance depending on their type and form. The analysis indicate that the administrative organizational changes generally have a positive effect on the performance of the Russian new ventures, while technological changes have the opposite impact. Consistent with entrepreneurship research, we got evidence that administrative changes in general allow new ventures to adapt to business and institutional environments of developing countries and may have positive impact. However, these results are also consistent with population ecology research in that technological changes and introduction of new knowledge system disrupt internal routines and undermines ventures’ ability to learn, which constantly resets the firm’s liability of newness clock and is ultimately harmful to a new venture’s performance.

These results can be partly explained by difference in required investments and resources needed to carry out the relative change. Administrative changes may affect in a greater extent employees’ behavior and they are not significantly investment consuming, but their implementation requires strong reasons for initiation and can cause serious resistance. Technological changes require significant investments and resources that are usually limited in new venture. Additionally, technological changes initiate administrative ones that increase the total number of changes in the organization.

The study also demonstrates that different types of administrative changes may be differently related to the performance of new ventures. Such forms of administrative changes as new methods of distribution responsibilities and outsourcing of non-core operation for the first time, representing experiment with routines, faced to be beneficial to new venture’s performance in Russia.

Findings make theoretical contribution extending knowledge of such phenomenon as organizational change in new ventures and giving better understanding of the nature and consequences of different types of changes in new enterprises. Especially this research will contribute to the discussion in the context of emerging markets.

This paper can be also of practical value to practitioners, policy-makers, and advisors providing additional insight into main aspects of organizational changes’ influence on the performance of new ventures. Managers of new ventures, which are characterized by liability of newness, liability of smallness and liability of adolescence and have constantly maneuverer between survival, death and growth, can be aware about consequences of different types and forms of organizational changes in such companies. This may help in decision making whether to conduct or not reformation in enterprise or in the choice of relative organizational change that could match firm’s goals and strategies.
Our study’s findings should be considered in the context of its limitations. According to scholars there is no perfect performance indicator (Penrose, 1959). In this study we consider the ratio of annual sales to number of employees as it is quite tricky to measure growth of new ventures at the age of 0-2 years. Also the majority of new firms are established in mature industries in order to satisfy demand on local market and do not pursue the goal to grow (Reynolds, Bygrave, Autio, 2003). Therefore great interest is represented to investigate influence of organizational changes on such indicators of new venture performance as firm's revenue, international activity or R&D investments, etc. Moreover it is important to analyse the influence of changes in long term rather than in short run as outcomes may differ greatly.

Secondly, we investigated organizational changes just in two areas. However the question concerning influence of frequency, pace and scale both in the short and long terms remains open.

Moreover in order to generalize results and make them applicable for other emerging markets research in other county contexts should be carried out on the same topic.

References


Bluian S., Menguc B., Bell S. Just Entrepreneurial Enough: The Moderating Effect of Entrepreneurship on the Relationship between Market Orientation and Performance // Journal of


Mühlbacher J., Nettekoven M., Kovac J. Competency Management in Slovenia: Paradoxes between Development Trends and Drivers of Change // Journal for East European Management


