

EFFECT OF AN ENTERPRISE'S LEGAL AND ORGANISATIONAL FORM ON SELECTION OF COMPETITIVENESS FACTORS

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Abstract

Competitiveness is a basic parameter used to evaluate an enterprise. It is ambiguous, complex, and characterised by a number of levels and dimensions, however. As a result, identification of enterprise competitiveness factors requires addressing a number of aspects of its operation. It is the aim of this paper to examine impact of an enterprise's legal and organisational form on selection of enterprise competitiveness factors.

Results of the author's research among 264 large enterprises active in the Polish economy are presented. The study employed the method of Computer-Assisted Telephone Interview (CATI). Analysis of the results concluded the legal form of an enterprise does not discriminate selection of enterprise competitiveness factors as measured in three dimensions: competitive standing of an enterprise, competitive potential of an enterprise, and instruments of competing.

The theoretical part applies critical review of literature concerning enterprise competitiveness and current legislation applicable to legal and organisational forms of enterprises in Poland. Descriptive statistical metrics and Kruskal-Wallis analysis are employed in the empirical section.

Key words: legal form, competitiveness, enterprise

JEL Code: D22, L22

Introduction

The economic theory presents a multi-aspect approach to competitiveness (Huggins, Thompson, 2014; Wolak-Tuzimek, 2018). This is partly due to the fact competitiveness may be examined at several levels: of a state, region (Alarcon, 2004), sector, industry, branch of economy (Marakova et al., 2016), a group of countries (Komarkova et al., 2014), or an enterprise (Leśniewski, 2011) and by means of a wide range of indicators and measures.

Choice of factors enterprises employ to enhance their competitiveness depends on internal and external conditions of enterprise development.

It is the aim of this paper to examine impact of an enterprise's legal and organisational form on selection of enterprise competitiveness factors as measured in three dimensions (competitive standing of an enterprise, competitive potential of an enterprise, and instruments of competing).

Results of the empirical research into factors of enterprise competitiveness among 264 large firms active in the Polish economy are presented.

Three research hypotheses are proposed:

H1: An enterprise's legal and organisational form affects selection of enterprise competitiveness factors that determine its competitive standing.

H2: An enterprise's legal and organisational form affects selection of factors that determine its competitive potential.

H3: An enterprise's legal and organisational form affects selection of instruments of enterprise competition.

Non-parametric ANOVA testing is used to verify the hypotheses. Kruskal-Wallis test serves to determine whether the resulting discriminations can be generalised to the population of large enterprises in Poland.

1 Enterprise competitiveness in light of specialist literature

Competitiveness is a notion economists pay increasing attention to, although it is not clearly defined or interpreted. It may denote the ability to take advantage of individual, specific and valuable resources that are difficult to imitate by competitors (Huggins, 2003), an ability to compete, that is, operate and survive in a competitive environment (Gorynia 2010), a firm's ability to compete (Mantura, 2002), to be profitable and maintain a dominant standing in the market (Lombana, 2006), standing of an economic entity (e.g. a country, enterprise or a household) in relation to other economic entities measured by comparing quality of operations and results in terms of superiority/ inferiority (Reiljan et al., 2000), ability of a region, industry or an individual enterprise to compete in markets where it is a player (Lament, 2018) while also improving living standards of society (Alarcon, 2004), a discovery procedure in the market in conditions of a full freedom of action (Hayek, 1941). Selected definitions of enterprise competitiveness are listed in Table 1.

Tab. 1: Selected definitions of enterprise competitiveness

Author	Definition
A.J. Abbas (2000)	Capacity of firms for innovation and flexibility, manifested in gaining of competitive advantage
M. Findrik, I. Szilard (2000)	Sum total of a given product's properties and effects by means of which an enterprise can increase its market share and/or profits in a given period
A. Ambastha, K. Momaya (2004)	Ability to design, manufacture, and sell products and services better than those offered by competitors, considering price criteria and quality criteria
L. Blažek (2007)	Ability of an enterprise to be successful at business competition with other enterprises; such competition results in success / failure expressed with economic results and measured with financial indicators
W. Chao-Hung, H. Li-Chang (2010)	An enterprise's economic power relative to its competitors in the global market, where products, services, people, and innovations move freely in spite of geographical boundaries
M. Dolata, B. Hadryjańska (2016)	Ability to attain goals effectively in free market conditions and to gain advantage over other participants in the competition process
M. Kraszewska K. Pujer (2017)	Ability of an enterprise to provide customers with proper goods or services of adequate quality at the right time and place, so that customers' needs are satisfied more efficiently and effectively than by other enterprises

Source: The author's own compilation on the basis of: Wolak-Tuzimek, 2019.

Competitiveness of enterprises is a concept employed both in the context of their global rivalry to capture a specific share in the world market and in the micro-context of specific performance relative to other entities in a local market.

2 Legal and organisational forms of Polish enterprises

An enterprise operates within the framework of legal and organisational structures determined by the legal system in a country. This gives rise to various forms of business activities that establish foundation requirements, power structures, and responsibilities and protect interests of the public, state, owners or workers.

Companies are the most common organisation of enterprises in Poland (with the exception of microenterprises). Depending on the source laws that govern their establishment and operation, civil partnerships, which operate on the basis of the Civil code regulations, and commercial companies, governed by the Code of Commercial Companies, can be distinguished.

As far as the economic foundations and the associated liability of partners for company obligations are concerned, on the other hand, partnerships (civil law, general, professional, limited, and limited joint-stock) and capital companies (limited liability and joint-stock) can be distinguished.

Partnerships base their operations on personal work of all (or some) partners who (at least some of them) are fully liable for obligations of their enterprises. Capital companies

normally do not involve bonds between operations of a company and personal work of shareholders, thus, ownership is as a rule separated from management. Capital and shares contributed by individual holders are decisive in this case. Characteristics of the particular types of firms are set out in Table 2.

Tab. 2: Selected advantages and disadvantages of companies in the Polish economy

Company type	Advantages	Disadvantages
Civil partnership	<ol style="list-style-type: none"> 1. Quick foundation procedure 2. Low costs of registration, 3. No minimum capital required 4. Option of selecting best form of taxation, 5. Joint and several responsibility of partners. 	<ol style="list-style-type: none"> 1. No legal capacity 2. Once larger, a firm must be transformed into a general partnership or limited liability company, 3. Personal responsibility of partners for company's obligations, 4. Each partner must be entered in the Central Business Registration and Information.
General partnership	<ol style="list-style-type: none"> 1. Each partner can represent the company, 2. A partner may be excluded from the representation in the articles of association, 3. Financial risk is distributed among all partners, 4. Freedom of formulating the articles of association, 5. Business may be exempted from the VAT if turnover is low. 	<ol style="list-style-type: none"> 1. No legal capacity, 2. Civil liability of partners towards third parties extends to all assets of the partners and their families, 3. Financial statements must be drafted by 30 June every year and filed with the KRS register, which entails extra fees, 4. Shareholdings rights to the company may not be sold, hence the membership is stable, unless articles of association stipulate otherwise, 5. Costs of registration.
Professional partnership	<ol style="list-style-type: none"> 1. Limited liability for obligations arising from operations of other partners, 2. No specific capital requirements, 3. Business of the company may be delegated to a board, 4. The so-called integrated accounts are not required. 	<ol style="list-style-type: none"> 1. The company may only operate in the field of its partners' professions, 2. No legal capacity, 3. Only natural persons may set up a partnership.
Limited partnership	<ol style="list-style-type: none"> 1. Responsibility of some partners may be limited, 2. Simpler, flat-rate forms of taxation are possible. Both the general and limited partners pay personal income tax. The company pays the VAT, 3. No quantitative limitations on operations of a limited company, 4. A limited liability company may be appointed a general partner for the purpose of tax optimisation. 	<ol style="list-style-type: none"> 1. Full, joint, though subsidiary responsibility of some partners for the company's obligations, 2. Costs of a notarised deed, entry in the commercial register, and its publication, 3. Integrated accounts are required. 4. Different rights and duties of the general and limited partners and the consequences.
Limited joint-stock	<ol style="list-style-type: none"> 1. Shareholders are exempt from liability for the company's obligations, 2. Capital can be raised through share 	<ol style="list-style-type: none"> 1. High minimum share capital (PLN 50 000), 2. Integrated accounts are required,

	<ul style="list-style-type: none"> issues, 3. General partners have decisive influence on company operations without necessarily covering the share capital 4. Capital-consuming ideas can be financed by inviting a group of individuals (shareholders) to fund them, 	<ul style="list-style-type: none"> 3. The charter must be notarised 4. Shareholders act on behalf of the company only as proxies, 5. Costs of a notarised deed, entry in the commercial register, and its publication.
Limited liability company	<ul style="list-style-type: none"> 1. Legal capacity, 2. Limited liability of shareholders, 3. Free trade in shares, 4. Foreigners can set up ltd. companies in Poland. 	<ul style="list-style-type: none"> 1. Notarised articles of association 2. Obligatory share capital (at least PLN 5 000), 3. High responsibility of managers, 4. Integrated accounts and auditing of statements are required, 5. Double taxation of income.
Joint-stock company	<ul style="list-style-type: none"> 1. Easy accumulation of capital, 2. Uncomplicated methods of raising capital in the duration of a company, 3. Shareholders are not liable for obligations of a joint-stock company, 4. Open financials of a joint-stock company. 	<ul style="list-style-type: none"> 1. Complicated, costly, and time-consuming process of registration, 2. High formal requirements of joint-stock company operations, 3. Integrated accounts are required, 4. Smaller shareholders have no control over company operations, 5. Complicated process of liquidation.

Source: The author's own compilation.

Companies, as flexible and multi-functional entities, are not only mechanisms for efficient support of the market economy but also its serious hazards. They can be used not only as forms of starting 'joint undertakings' but also of organising collaboration between big entrepreneurs.

3 Methods

The study was carried out in January 2018. The sample was selected at random and comprised large enterprises operating in Poland. As of 30.06.2017, the general population consisted of 4436 enterprises. 1600 firms were drawn out of that population so as to guarantee each member of the general set had an equal chance of finding itself in the sample. The resultant sub-group of the elements represents and is representative of the entire population, that is, it allows for conclusions concerning the general set. The method of Computer-Assisted Telephone Interview (CATI) generated 264 correctly completed survey questionnaires.

The number of correctly filled surveys was $n=264$, which means results of the analysis are representative of the general population, assuming $\alpha=95\%$ and $\beta=6\%$.

The empirical study utilised an original survey questionnaire which consisted of two sections: particulars and contents. Six objective (or close to objective) criteria were adopted in the former to characterise the sample. In the other part, 34 variables (competitiveness factors)

were recorded on 10-point ordinal scales, with 1 denoting low significance and 10 – high significance. They were divided into three groups defining three dimensions of enterprise competitiveness. 5, 16 and 13 variables were used in the individual dimensions, respectively.

The study took advantage of the infrastructure and human resources of Voice Contact Center Sp. z o.o. of Warsaw, a member of OEX Group, a major business service provider in Poland. That enterprise's share in the research was limited to providing the technical facilities for CATI interviews, generation of a random phone number database, and collection of the statistical materials, namely, interviews and recording of raw data as a spreadsheet. The study was prepared, its results compiled, and conclusions were drawn by the author herself.

Kruskal–Wallis test was applied in order to examine impact of an enterprise's legal and organisational form on selection of enterprise competitiveness factors. It is a non-parametric test which verifies statistical hypotheses on discrimination of particular dimensions across groups. It is equivalent to one-factor analysis of variance (ANOVA). Application of Kruskal-Wallis test requires (Kruskal, 1952):

- Variables to be measured along an ordinal (interval) scale,
- Groups tested to be independent,
- Distribution to be normal.

These assumptions were met. The zero hypothesis of Kruskal-Wallis test assumes samples originate from a population of the same distribution, whereas the alternative hypothesis stipulates they come from different distributions.

Therefore:

$$H_0: \theta_1 = \theta_2, \dots, \theta_k \quad (1)$$

(distribution of a variable is identical for all codes of a grouping factor, as compared with the alternative hypothesis of):

$$H_1: \text{not all } \theta_j \text{ are equal } (j=1, 2, \dots, k) \quad (2)$$

(variable distributions for at least two codes of the grouping factor are different),

where:

$\theta_1, \theta_2, \dots, \theta_k$, – are medians of a tested variable in populations where samples have been withdrawn.

p , determined on the basis of the test statistics, is compared to the significance level α :
if $p \leq \alpha \Rightarrow H_0$ is rejected and H_1 is accepted,
if $p > \alpha \Rightarrow$ there are no grounds for rejecting H_0 .

Acceptance of H₀ entails the statement levels of a factor have no significant impact on the results observed. Rejection of H₀ implies levels of a factor have significant effects on the results observed. A given factor discriminates the results then. The level of significance $\alpha=0.05$ was adopted. The results were compiled by means of *Statistica 12* and the observed level of significance p was analysed. Its value represents a diminishing reliability of results. It helps to estimate likelihood of a given result assuming H₀ is true. p should be greater than the set significance level α .

4 Results

Levels of the competitiveness factors among the enterprises surveyed for their legal and organisational forms were above average (Table 3). In respect of competitive standing factors, joint-stock companies and general partnerships scored maximum average values: 7.38 and 7.43, respectively. As far as the competitive potential factors are concerned, limited liability, joint-stock and other companies scored the highest on average: 6.96, 6.94, and 6.93, respectively. In the case of competition instruments, joint-stock (7.25) and limited liability companies (7.22) attained the maximum averages.

Limited and general partnerships graded factors of enterprise competitiveness the lowest. With regard to the competitiveness standing factors, the assessments averaged 7.30 and 7.43, for competitive potential – 6.78 and 6.83, and for the instruments of competition – 7.13 and 7.15, respectively.

Tab. 3: Average values and standard deviations concerning enterprise competitiveness factors as divided in respect of the legal and organisational forms.

Enterprise type	Factors of competitive standing		Factors of competitive potential		Instruments of enterprise competition	
	Average	Standard deviation	Average	Standard deviation	Average	Standard deviation
Joint-stock company	7.38	0.46	6.94	0.29	7.25	0.40
Ltd. liability company	7.36	0.43	6.96	0.25	7.22	0.31
General partnership	7.43	0.56	6.83	0.26	7.15	0.39
Limited partnership	7.30	0.55	6.78	0.25	7.13	0.19
Other	7.31	0.44	6.93	0.20	7.13	0.39

Source: The author's own compilation.

A maximum diversity in evaluations of competitive standing factors could be noted with general and limited partnerships: 0.56 and 0.55, respectively. With regard to the factors

of competitive potential, meanwhile, the greatest differentiation was observable for joint-stock companies (0.29) and general partnerships (0.26). The instruments of competition displayed a maximum discrimination for joint-stock companies (0.40), general partnerships (0.39), and other firms (0.39).

As far as the factors of enterprise competitive standing are concerned, the responses by limited liability (0.43) and other companies (0.44) showed the lowest variability. A minimum discrimination regarding competitive potential was recorded for other unclassified companies (0.20). In respect of the competition instruments, limited partnerships demonstrated a minimum discrimination of 0.19.

Kruskal-Wallis test was utilised to determine if the discriminations listed above can be generalised to the population of enterprises in Poland.

Two hypotheses were posited:

H0: Distributions of the competitiveness factors (for the individual dimensions of competitive standing of an enterprise, competitive potential of an enterprise, and instruments of competition) are identical for the variable of legal and organisational form of enterprises.

H1: Distributions of the competitiveness factors (for the individual dimensions of competitive standing of an enterprise, competitive potential of an enterprise, and instruments of competing) are not identical for the variable of legal and organisational form of enterprises.

The test results for the competitiveness factors (as measured along the three dimensions) divided as per legal and organisational forms of enterprises are shown in Table 4.

Tab. 4: Test results for the competitiveness factors competitiveness divided as per legal and organisational forms of enterprises

No.	Zero hypothesis	Test	Significance (<i>p</i>)	Decision
1	Distribution of enterprise competitive standing factors is identical for the variable of legal and organisational form of enterprises	Kruskal–Wallis test	0.983	Accept the zero hypothesis
2	Distribution of enterprise competitive potential factors is identical for the variable of legal and organisational form of enterprises		0.225	Accept the zero hypothesis

3	Distribution of instruments of competing is identical for the variable of legal and organisational form of enterprises		0.764	Accept the zero hypothesis
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Source: The author's own compilation.

In line with the conditions defined, the zero hypothesis must be accepted for all the factors of enterprise competitiveness (measured in its three dimensions), since values of boundary probabilities are greater than the adopted level of significance ($\alpha=0.05$). Thus, the results cannot be generalised to the population of large enterprises in Poland. This means legal and organisational form of an enterprise does not influence selection of competitiveness factors measured along its three dimensions.

Conclusion

Competitiveness of an enterprise is its ability to compete by offering something better to customers than other players in a market in respect of specific instruments of competition. Enterprises in the market economy are forced to compete with bundles of competition instruments, not isolated factors.

In light of the author's research, which consisted in surveying 264 large enterprises active in the Polish economy concerning impact of their legal and organisational forms on choice of competitiveness factors, the zero hypothesis, stating distributions of the competitiveness factors (for the individual dimensions of competitive standing of an enterprise, competitive potential of an enterprise, and instruments of competition) are identical for the variable of legal and organisational form of enterprises. The boundary probabilities are greater than the adopted level of significance ($\alpha=0.05$). These results undermine the research hypotheses H1-H3. This entails a legal and organisational form of an enterprise has no effect on selection of competitiveness factors as measured in three dimensions.

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