## **Competitiveness Factors of Cities in Lithuania**

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The article presents the results of empirical research, which aimed to specify main factors of city's internal and external environment that influence the competitiveness of cities in Lithuania. The research was based on a theoretical city competitiveness model, presented in earlier issue of this journal (No. 25, p. 67-82). Also, the results of analysis of competition (including aims and markets) among cities in Lithuania are presented in this article as well.

Keywords: urban competitiveness, factors of competitiveness, Lithuania city competitiveness.

Raktažodžiai: miesto konkurencingumas, konkurencingumo veiksniai, Lietuvos miestų konkurencija.

### Introduction

Globalization and internationalization processes influenced large-scale flows of international trade, investment and capital, transfer of technologies, mobility of people and competition. This strengthened the interest of researchers, practitioners and politicians towards competitiveness of organizations, industries, territories, and other subjects. The geographical approach to study competitiveness is constantly increasing. Different researchers suggest different geographical levels to study territorial competetiveness; for example, global economy level, wider economic space; group of neighbouring states; nation; state / province; city / metropolitan region; rural territory [13], and similar.

It is important to notice that in the context of general competitiveness researches, focus on the competitiveness of sub-national subjects (cities, regions) still remains quite limited. Indeed, some deeper researches in this area were conducted only in early 1990-ies [3; 4; 20], focusing on causes and results of urban competitiveness. Theoretical studies of competitiveness at local level increased in late 1990-ies [8; 14] and in the last decade (for example, by Acs, 2002; Hall, 2003; Florida, 2005 and others). Published results of the studies prove a

great impact of economic globalization, advanced information technologies and structural transformations on cities [2; 7; 9; 10; 18; 19].

According to Lever and Turok [12], urban competition differs from national or organizational competition. Indeed, cities compete to increase attractiveness for potential target groups: mobile investment, tourism, large events, specialized human resources [16], modern infrastructure, advanced technologies, innovations [17]. They also compete for improving the quality of life [15; 23] and environmental standards.

Despite increasing interest of academics and practitioners in the issues of urban competitiveness analysis, there is still no single agreement what the "competitiveness" consists of and what local and national policies can do to strengthen it. According to Kitson, Martin and Tyler [11], a unified, widely accepted system to define, theoretically and empirically analyze urban competitiveness does not exist. Indeed, the author of this article states that there is a problem of a single definition of the concept, clear explanation of its content and also the methods for analysis of urban competitiveness.

In the previous issue of journal "Public Policy and Administration" [21, p. 67-82] was published an article, where the main issues of analysis of urban competitiveness and also the possibilities to solve them were discussed; the theoretical urban compete--tiveness model was presented. This article is a continuation of that article and presents the results of empirical research, which aimed (following the theoretical model) to specify the most important factors and their elements representing both internal and external environment of the Lithuanian cities.

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# Analysis of competitiveness factors of Lithuanian cities

The empirical research was conducted in January-April, 2008. Pre-experimental research design (static measurement of features, i.e. opinions, of one-two groups by interview method) and autoquestioning type (when respondent fills in a questionnaire in electronic form) were applied.

According to the Yearbook of the Department of Statistics of Lithuania [22], there are 103 cities in Lithuania; 6 of them have the status of centre of municipality. Other cities belong to other Lithuanian city or district municipalities. Therefore the range of experts was created following the structure of Lithuanian cities - centres of municipalities. Range of experts consisted of heads of municipal departments (or delegated by them municipal government officials) responsible for city or district socialeconomical development, attracting of investments, and strategic planning of 54<sup>1</sup> Lithuanian municipalities (except for district municipalities, centre of which is a separate city municipality<sup>2</sup>: Vilnius district, Kaunas district, Klaipėda district, Šiauliai district, Panevėžys district, Alytus district).

According to the aim of the research (to distinguish the most important competitiveness factors of internal and external environment of Lithuanian cities) and following the logic of the theoretical urban competitiveness model [21, p.67-82] a questionnaire consisting of 16 open and closed questions was developed. 39 out of 54 experts completed and returned the questionnaire form (questionnaire return rate -72 per cent).

The aim of the survey was to find out, which of the competitiveness factors from the theoretical model are most important for Lithuanian cities, i.e. what groups of factors from external environment are most important; what groups of factors from internal environment are most important; what factors in factor groups are most important; what other factors (other than suggested by the theoretical model) are important for Lithuanian cities in the process of competition with other cities.

## Main results of the research

According to the survey experts representing administrations of Lithuanian local governments,

the most important are the physical, institutional and human factor groups (all of them belong to internal factor group).

Among *physical* factors, urban infrastructure and geographical location of a city were indicated as most important. In the group of *institutional* factors, the most important is effectiveness of local government activity. In the group of *human* factors, local city leaders received the greatest importance (factor of local labour skills statistically was very close, too). In the group of *economic* factors, local high value added activities were indicated as having the greatest importance for city competitiveness. Within the group of internal factors, the following factors of local R&D institutions and local tax system received the least attention.

By answering to open questions the experts had an opportunity to propose other internal factors, which, in their view, are very important for competetiveness of their city (see Table 1). The proposed factors can be regarded as clarification of the more general factors, provided in the theoretical model. Most attention received the factor of local government effectiveness and human factors in general.

Results of evaluation of the external factor group are the following: macroeconomic situation

Group of factors	Proposed factors
Human	Political environment – lack of leaders (or absence); municipality leaders and their qualification; skilled employees; patriotism, love for the homeland; openness of society (closeness).
Institutional	Absence of ruling majority; coopera- tion of local government with busi- ness sector; lobbying skills (to attract national and other finances); ability to attract investors; city image – pub- lic opinion (from external factors); Stable local government policy; stability of local government and logic sequence of decisions; agreement between ruling position and opposition regarding stra- tegic issues of the city; creation of con- ditions favourable for tourism.
Physical	Development of infrastructure; devel- opment of housing; urban architecture and attractiveness to tourists; seaport; good relations with neighbour cities (from external factors).
Economic	-

<sup>&</sup>lt;sup>1</sup> There are 60 municipalities in Lithuania. Not only city's, but also district's municipalities are based in Vilnius, Kaunas, Panevėžys, Šiauliai, Klaipėda, Alytus cities.

<sup>&</sup>lt;sup>2</sup> Such decision was based on the assumption that experts working in exceptionally rural municipality can have difficulties to assess competitiveness factors of a city.

(economic growth) in the country received the most attention of the experts.

Political-legal stability in the country was indicated as the most important in the group of *political-legal* factors. External security and international agreements of higher authorities were statistically very close to the previous factors. In the group of social-cultural factors, the most important was the factor of national incomes level. Statistically close to this answer were the factors of demographic situation in the country and effectiveness of social and educational systems of the country. In the group of technological factors the most important was the development of ICT in the country/in the world. Abundance of national energy resources received the most attention of the experts in the group of natural-ecological factors. It is interesting to notice that the least attention in the group of external factors received the specifics of national life-style, abundance of national biodiversity, country climate, establishment of new industries in the country/ world; assurance of equal rights in the country.

By answering to open questions of the questionnaire, experts proposed other important external environment factors, which affect the competetiveness of a city (see Table 2).

Generalizing the expert survey on the most important factors for Lithuanian city competitiveness, one can state that the most important factors are the effectiveness of local government activity, city infrastructure, geographical location of a city and its accessibility (by roads, railroads, air and water transport, internet), local development strategy and local leaders. Very close to these were the factors of local labor skills and national macroeconomic situation.

Based on these results, the theoretical urban competitiveness model was adjusted (see Figure 1). The new model indicates factors of both internal and external environment of a city, which are presented in a sequence of importance: the importance of the factor groups from left to right decreases; the importance of the factors inside of each factor group going from top to down decreases.

# Specifics of competition among cities in Lithuania

During this research the author also tried to look not only at the main factors influencing competitiveness of cities in Lithuania, but also to answer the question, how intense is the competition among cities in Lithuania, at what levels the competition takes place and what aims the competing cities pursue. For this reason several additional questions were included in the questionnaire form, which helped to collect information about three main cities-competitors of the city of the respondent (local government expert), also aims and markets of their competition.

Table 2: Other external factors proposed by
experts

Group of factors	Proposed factors
Political-legal	National policy guidelines; high quality of laws; representatives of the same political power in both local and national government; good geographical location; advancement of neighbouring countries; security.
Social-cultural	Educational reform
Economic	Development of largest cities of Vilnius and Kaunas; negative in- fluence of national finance centrali- zation; assimilation of means of the Structural Funds (complicated and long); tax system in the border area; accessibility and visa regime; increasing competitive pressure of neighbouring states in the fields of recreation, tourism, services in internal and external markets.
Technological	-
Natural- ecological	Environment pollution; general global climate warming; area of protected territories.
Historical	City status–capital (from internal factors).

Forty (41) representatives of administrations of city municipalities of Lithuania (out of total 54 city municipalities) responsible for social-economic development of their city answered the questions. One expert represented one municipality/city. Representatives of Taurage, Šilale, Pasvalys, Lazdijai and Kaišiadorys municipalities did not provide answers to the questions about cities-competitors of their cities, markets and aims of competition. Therefore below are the results of analysis of responses from 36 cities<sup>3</sup>.

Representatives of cities, which participated in the survey, indicated 3 main cities-competitors

<sup>&</sup>lt;sup>3</sup> Alytus, Birštonas, Biržai, Druskininkai, Elektrénai, Gargždai, Ignalina, Jonava, Joniškis, Jurbarkas, Kaunas, Kazlų Rūda, Kėdainiai, Klaipėda, Kretinga, Kupiškis, Marijampolė, Mažeikiai, Molėtai, Neringa, Pagėgiai, Panevėžys, Plungė, Prienai, Raseiniai, Rokiškis, Šakiai, Šalčininkai, Šilutė, Švenčionys, Ukmerge, Utena, Vilkaviškis, Vilnius, Visaginas, Zarasai.



Figure 1: General competitiveness model of cities in Lithuania

(competitor 1; competitor 2; competitor 3) along with the aims of every single competition. Three target groups were suggested as aims of the competition: business/investment, residents/workers, and visitors / tourists. Generalized results of the responses are shown in Table 3.

Aim of competition	Compe- titor 1	Compe- titor 2	Compe- titor 3
Business/investment	17	19	11
Residents/workers	27	13	14
Visitors/ tourists	13	13	13

Table 3: Competition aims of cities in Lithuania

As results of the analysis show, the greatest competition among Lithuanian cities takes place to attract new residents/workers and to keep the existing ones (27 experts named this aim as the main one). Also, many cities compete for attracting/keeping the business and investment (answers of 17 cities). For the cities, which participated in the survey, the weakest competition takes place in the area of attracting tourists/visitors; 13 cities indicated this aim.

A more detailed analysis of expert responses from three major Lithuanian cities Vilnius, Kaunas, Klaipėda (author of the research calls them "national" cities) shows that Vilnius sees as its main competitors cities of Riga, Tallinn and Klaipeda (two foreign cities, one – national); main aim – to attract/retain business and investment. Kaunas sees Klaipėda (copetetor No.1; to attract/retain investment and business) and Vilnius (competitor No.2; to attract/retain residents and workers), also other cities of similar size from the Baltic Sea Region (to attract/retain investment and business). For Klaipėda the main competetor is Vilnius (investment/business), Kaunas (investment / business) and Šiauliai (investment / business).

It is important to notice that experts of Vilnius, Kaunas and Klaipeda, who participated in this survey, see other two major Lithuanian cities or major cities of neighbouring countries as their main competitors. The main aim of competition at this level – to attract new or retain existing investment and business (see Table 4).

In the group of other Lithuanian cities (the author calls them "regional" cities, i. e. cities – county centres) competition aims are different. From 7 "regional" cities, which participated in the research, only Alytus, Marijampolė, Panevėžys and Utena experts provided their opinion, therefore, it is not possible to make some general conclusions about the situation in this level, however, some tendencies can be highlighted: "regional" cities see neighbouring (but not "national") cities as their main competitors); the main aims of the competition are visitors/tourists and investment/business.

Table 4: Competition aims of Vilnius, Kaunas and Klaipėda

City	Competitor 1	Aim	Competitor 2	Aim	Competitor 3	Aim
Vilnius	Riga	Investors , tourists	Tallinn	Investors, tour- ists, workers	Klaipėda	Investment, investors
Kaunas	Klaipėda	Investors	Vilnius	Workers	Similar cities of the Baltic States	Direct foreign investment
Klaipėda	Vilnius	State and priva- te investment	Kaunas	State and private investment	Šiauliai	State and pri- vate investment

Two "regional" cities (Alytus and Marijampolė) see Kaunas (a "national" city) as their second priority competitor in the market of workers and residents (table 5). The third priority competitor is Vilnius, competition takes place for workers and residents (in cases of Alytus and Marijampolė), visitors/tourists (Marijampolė) and investment (Marijampolė). Utena sees in Ukmerge and Kėdainiai as its main competitors in the market of investment/business.

It is evident, that in this level a geographical factor has more importance, i.e. competition takes place between geographically close to each other cities; aims of the competition are different. In the case of "district" cities (cities – centres of district municipalities, other than centres of counties), main competition takes place between cities of similar size or with larger cities, which are in the same geographical-functional region (for example, Rokiškis-Biržai, Šakiai-Jurbarkas, Gargždai-Klaipėda, Ignalina-Vilnius). This level revealed a competition between cities of some "specialization": Birštonas (health resort) and Druskininkai (health resort) see each other as main competitors, Neringa (resort) as its main rival considers Druskininkai (second priority - Birštonas, third priority – Palanga), Mažeikiai (oil refinery city) as its third priority considers Latvian seaport city Ventspilis (oil terminal city). This allows making a conclusion that cities of some clear specialization (in this case, cities-resorts, and cities specializing in oil refinery business) see as their main competitors cities of the same specialization, even in a more distant geographical regions. In other instances, the main competition at the level of "district cities" takes place between cities of the same or higher level from the closest geographical region. Aims of the competition differ.

City	Competitor 1	Aim	Competitor 2	Aim	Competitor 3	Aim
Alytus	Druskininkai	Tourists	Kaunas	Workers, youth	Vilnius	Workers, youth
Marijam- polė	Alytus	Investors, tourists	Kaunas	Students, resi- dents, workers	Vilnius	residents, tourists, workers, investors
Panevėžys	Šiauliai	Investors tourists				
Utena	Zarasai	Tourists	Ukmergė	Investors	Kėdainiai	Investors

Table 5: Competition aims of "regional" cities

It is interesting to notice that the largest number of competitors have three major Lithuanian cities (Vilnius, Kaunas and Klaipeda) and cities-resorts of Druskininkai, Palanga, Birštonas, Ignalina. None of the experts participating in this research named cities of Elektrenai, Joniškis, Kaišiadorys, Lazdijai, Pasvalys, Plunge, Prienai, Šalčininkai, Taurage and Utena as cities-competitors.

## Conclusions

Results of the survey show that competition between Lithuanian cities exist and is an important objective of both local and national policies and academic research. Also, it can be concluded that the competition between Lithuania cities is not "absolute"; it is clearly evident at certain levels and in certain geographical regions: "national" cities compete with each other and with cities of similar status and size from the neighbouring states; "regional" cities compete first of all with other "regional" cities, especially belonging to the closest geographical region. The main competitors of the "district" cities are their neighbouring "district" cities or cities of the same specialization (for example, resorts). The lower level the city is, the narrower is the geographical area of its competition; competition aims are diverse. And in the contrary, the higher level of the city is, the larger is the geographical level of the competition; here the main of competition is to be more attractive to investment / business.

These results allow to make an assumption, that competitiveness of cities from different levels is influenced by different factors and importance of the factors differs as well. That means, for a city that aims to attract investment, it is important to develop one set of factors in its territory, while for a city that wants to attract workers/residents, other factors will be more important.

Based on the results of this research, the "national" Lithuanian cities, which aim to increase their competitiveness, should pay a greater attention to development of physical factors (urban infrastructure, city accessibility, etc.) with some less attention to economic factors (for example, access to capital, local tax system, etc.). For the "regional" cities it should be important to develop first of all the institutional factors (especially, effectiveness of local government, institutions-leaders, public services, etc.) with a lower attention to economic factors (reforms of local taxation system, access to capital, etc.). Managers of the "district" cities should strengthen first of all the physical factors (especially, city accessibility, city's natural resources) and to put slightly less efforts on development of economic factors (R&D institutions, local tax system, access to capital, etc.).

From the point of view of external city environment factors, cities of all levels should be able to effectively forecast and try to favourably influence first of all the economic factors (changes in the national and international macroeconomics; development of ICT, fiscal policy, etc.). Lithuanian cities pay less attention and efforts on the change of ecologicalnatural factors.

Speaking about the results of this research, it is important to emphasize the importance of its continuity and possible directions. From the point of view of the author of the research, it is important to specify by both theoretical and empirical studies of the groups (and elements) of internal factors of city competitiveness. Also it is important to set a system to measure (assess) the meaning of each factor. This will strengthen the applicability of the theoretical model in practice (i.e. would be possible to measure the level of competitiveness of certain cities).

Deeper researches (involving more and more diverse groups of experts from other sectors, application of different data processing methods, etc.) of the Lithuanian cities, which would aim to specify the markets of competition, main competitors, also means that are applied to achieve better competition results and their effectiveness would be very useful and important for practitioners and policy makers interested in this topic.

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#### Lietuvos miestų konkurencingumo veiksniai

### Santrauka

Straipsnyje pateikiamas ankstesniame "Viešoji politika ir administravimas" numeryje (Nr. 25, p. 67-82) esančio autorės teorinio tyrimo, skirto nustatyti pagrindinius miesto konkurencingumą sąlygojančius veiksnius ir jų elementus, tęsinys – empirinis tyrimas, kuriuo buvo siekiama patikslinti teorinį miesto konkurencingumo modelį, išskiriant svarbiausius Lietuvos miestų konkurencingumą lemiančius vidinės ir išorinės miesto aplinkos veiksnius. Taip pat supažindinama su bendraisiais bandomojo tyrimo, skirto Lietuvos miestų konkurencijos tikslams ir rinkoms analizuoti, rezultatais.