## METHODOLOGY FOR CHOOSING FISCAL STIMULI FOR ECONOMIC COMPETITIVENESS DEVELOPMENT

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### -Abstract -

In this article the author analyses different possibilities of how, with the help of fiscal stimuli, to increase national economic competitiveness in comparison with other countries. The author has developed a methodological approach to analyse the efficiency of fiscal stimuli to increase national economic competitiveness.

This article puts forward competitive tax policy, investment in business and knowledge infrastructure, fiscal support for knowledge based businesses (in the form of credits and guarantees), support of the ability to export, EU structural funds and public procurement as significant fiscal stimuli that foster innovation.

**Key Words:** National economic competitiveness, M.Porter's competitiveness diamond, fiscal stimuli

# JEL Classification: FO1 1.INTRODUCTION

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# 1.1. The compatibility of Michael Porter's diamond model of competitive advantage with the pillars of competitiveness

The author's developed methodology for fiscal stimuli efficiency analysis is based on the coupling of Michael Porter's diamond model of competitive advantage (Porter,1990:71) (hereinafter – the diamond) with the global competitiveness index pillars, which have been developed in the Global Competitiveness Report (Global Competitiveness report:2008).

Namely, the author places the pillars in the diamond and distributes them on the four facets forming the diamond: factors; company strategy and competitiveness; demand conditions; and related and supporting industries.

These competitiveness pillars are the ones that form the national competitiveness advantages of a relevant diamond facet. Thus, every competitiveness pillar is cognisant of a competitiveness diamond's facet. The listed competitiveness pillars include several subcomponents, which may be cognisant of several facets of the diamond. The impact of fiscal stimuli on the competitiveness pillars in each facet of the diamond is analysed in this article. Following such a methodological approach, the fiscal stimuli relevant to each facet of the diamond, and the most efficient among them for strengthening particular competitiveness pillars, were established during the analyses done.

The diamond was chosen as the cornerstone of the methodological framework used in this article because it includes all the determinants of growth and national economic development. In turn, the competitiveness pillars identified in the Global Competitiveness Index were chosen because of their comprehensive and universal character. It has to be noted that each country analyzed in the Global Competitiveness Report is ranked in the economic development stage relevant to it; each country has pillars characterizing it which determine the development of that particular economy. Latvia is listed in a group of countries that are in transition from an efficiency driven to an innovation driven economy. Thus, even though the Global Competitiveness Index comprises 12 pillars of competitiveness, this article analyses the eight which are characteristic of economies that are in transition from an efficiency driven to an innovation driven economy. Thus the competitiveness pillars placed inside the diamond are: higher education and regualification, commodity market efficiency, labor market efficiency, financial market multi-facetness, market size, technological readiness (productivity entrepreneurship multi-facetness, and innovations (innovation economy),

economy driving forces). Each of the pillars comprises several subcomponents, which may be cognisant of several facets of Porter's diamond.

When placing all the subcomponents of the competitiveness pillars inside Porter's diamond, theoretically we obtain the ideal competitiveness of an imagined country – all the facets are equally strong and they have all the competitive advantages.

In the ideal model for countries belonging to the described group; the eight relevant competitiveness pillars are distributed among Porter's diamond facets as follows: 6 pillars belong to the factor facet, 5 – to company strategy and competitiveness, 3 – to demand conditions, and 2 – to related and supporting industries.

When considering the impact of fiscal stimuli on competitiveness pillars in Porter's diamond, it is possible to obtain a depiction of the ideal diamond's ideal fiscal stimulation. The following four tables represent potential fiscal stimuli applicable to each of Porter's diamond's facets; moreover, only theoretical or ideal Porter's diamond facets were considered. Thus, it is assumed that there exists an ideal diamond model, such that each facet has all the relevant competitiveness pillar subcomponents as its advantages and all theoretically possible fiscal stimuli are applied.

Even though only the competitiveness pillars in relation to possibly influencing fiscal stimuli are put in the table, the author will indicate (in brackets) how much particular pillar subcomponents are affected by each fiscal stimulus. If there are pillars that cannot be affected by means of fiscal stimulation, this means that such factors can be influenced by other instruments, for example – statutory instruments or regulations.

Table 1: Application of fiscal stimuli to the Factor facet of an ideal Porter's diamond

	Tax	Government	Export	Government	EU	Public
	system	investments	support	provided	Structural	procurement
				subsidies,	Funds	
				grants, and		
				support		
				programs		
Higher	-	+ (5)	-	-	+ (6)	-
education and						
requalification						
Efficiency of	+(1)	-	-	-	-	-

commodities market						
Labour market	+ (2)	-	-	-	-	-
efficiency						
Financial	-	-	-	+ (4)	+(1)	-
market						
development						
Technological	-	+ (4)	-	-	+(1)	-
readiness						
Innovations		+(1)			+(1)	

As can be seen from the table the most potent fiscal stimuli are government investments and EU structural funds. Such a conclusion is logical and follows from the nature of factors namely, these are important production factors for businesses (including financial resources) and their availability is within the scope of the government.

Table 2: Application of fiscal stimuli to the company strategy and competitiveness facet of an ideal Porter's diamond

		I _		_	I	I
	Tax	Government	Export	Government	EU	Public
	system	investments	support	provided	Structural	procurement
				subsidies,	Funds	1
				grants, and		
				support		
				programs		
Efficiency of	-	-	-	-	-	-
commodities						
market						
Labour market	-	-	-	-	-	-
efficiency						
Technological	+(1)	-		+ (2)	+(1)	-
readiness						
Enterpreneurship	+(1)	-	-	+ (2)	+(2)	-
multi-facetness						
Innovations	+(2)	-	-	+(1)	+(1)	

The most potent fiscal stimuli in the company strategy and competitiveness facet of the diamond are tax system, state subsidy and support programs, as well as EU structural funds, as can be seen in the table.

Table 3: Application of fiscal stimuli to the demand facet of an ideal Porter's diamond

Table 5. Application of fiscal stillian to the demand facet of an ideal forter's diamond						
	Tax	Government	Export	Government	EU	Public
	system	investments	support	provided	Structural	procurement
				subsidies,	Funds	
				grants, and		
				support		
				programs		
Efficiency of	-	-	-	-	-	-
commodities						
market						
Market size	-	-	+ (2)	-	-	+(2)
Innovations	-	-	+(1)	-	-	+(3)

This very important diamond facet can be influenced by the following fiscal stimuli: export support and public procurement, as can be seen in the table.

Table 4: Application of fiscal stimuli to the related and supporting industries facet of an ideal Porter's diamond

	Tax system	Government investments	Export support	Government provided subsidies, grants, and support programs	EU Structural Funds	Public procurement
Related and supporting industries	-	-	-	+ (5)	+(1)	-

Summarising the information presented in the tables, it can be concluded that the fiscal stimulus which influences the most competitiveness pillar subcomponents is ES structural funds -14; the next is state investments, which influences 11 competitiveness sub-pillars; tax breaks -7; public procurement -5, and export support -3.

It is important to note that the efficiency of the fiscal stimuli in any case cannot be judged by how many competitiveness pillar sub-components are potentially affected by each fiscal stimulus. The reason is that in each diamond's facet there are a different number of competitiveness pillar sub-components. The information provided is informative and it allows us to see which and how many sub-components are influenced by which fiscal stimuli. When comparing the influence of fiscal stimuli on each of the diamond's facets, it can be observed that by using

fiscal stimuli in the factor facet it is possible to affect 23 sub-pillars out of 43, in the company strategy and competitiveness facet -6 sub-pillars out of 12, in the demand facet -3 sub-pillars out of 5, and in the related and supporting industries facet -5 sub-pillars out of 5. In addition it has to be noted that several sub-pillars are influenced by several fiscal stimuli, as can be seen from the tables.

# 2. ANALYSES OF FISCAL STIMULI IN THE CONTEXT OF LATVIA'S ECONOMIC COMPETITIVENESS

By placing into Porter's diamond those competitiveness pillar sub-components, which can be regarded as Latvia's competitive advantages, the author has developed the Porter diamond for Latvia. It has to be pointed out that Latvia's competitive advantages were identified by the developers of the Global Competitiveness Index comparing Latvia's performance with that of other countries. The only strong diamond facet for Latvia is the factors facet; unfortunately, we do not have a competitive advantage in the other facets, according to the Global Competitiveness Index. Also, in the factor facet, which is Latvia's strongest in the competitive diamond, Latvia has 13 competitive advantages compared to 43 advantages in an ideal diamond.

In the following tables the author will present the fiscal stimuli that are best suited to positively influence Latvia's competitiveness sub-pillars in comparison with theoretical fiscal stimulation applications.

Table 5: Latvia's practice in the application of tax system rates and tax breaks, in comparison with a theoretically possible model

Diamond facets	Potential and	Latvia's practice in
	theoretical	the application of tax
	influence of tax	system rates and tax
	systems and tax	breaks (the number of
	breaks (the	influenced
	number of	subcomponents is
	influenced	indicated in brackets)
	subcomponents is	
	indicated in	
	brackets)	
Factor facet	+ (3)	+ (3)
Company strategy	+ (4)	-
and		
competitiveness		
facet		

The table shows that out of 7 competitiveness pillar subcomponents that can potentially be influenced, Latvia, with its tax system and tax breaks, influences only 3, which relate to the overall low tax rate. Unfortunately, Latvia's fiscal policy does not provide for tax breaks to increase foreign investment in sectors with high added value. Likewise, there are no tax stimuli for promotion of production process refinement, such as the introduction of new innovative products into the manufacturing process. There are also no tax breaks for an enterprises' expenditure on R&D (so called "tax credits").

Table 6: Latvia's practice in the application of state investments, in comparison with a theoretically possible model

theoretically possible model		
Diamond facets	Potential and theoretical	Latvia's practice in the
	influence of government	application of state
	investments (the number of	investments (the number of
	influenced subcomponents is	influenced subcomponents is
	indicated in brackets)	indicated in brackets)
Factor facet	+(11)	+ (4)

The table shows that out of 11 competitiveness pillar subcomponents that can potentially be influenced, Latvia, with the help of its government investments, influences only 4. Unfortunately, government investment is absent in the sectors, which are important for an innovative economy, such as improving the quality of scientific research institutions and an increase in the availability of training services and specialised studies.

Table 7: Latvia's practice in the application of export support instruments, in comparison with a theoretically possible model

theoretically possible model		
Diamond facets	Potential influence of export	Latvia's practice in the
	support instruments (the	application of export support
	number of influenced	instruments (the number of
	subcomponents is indicated in	influenced subcomponents is
	brackets)	indicated in brackets)
Demand facet	+(2)	+(2)
Company strategy and	+(1)	-
competitiveness facet		

The table shows that Latvia applies export support instruments in order to generally foster export and service export. Unfortunately, there are no specific export support instruments, which would foster innovation development, for example export support instruments to support innovative products or products with high added value.

Table 8: Latvia's practice in the application of government subsidies, grants and support

programmes, in comparison with a theoretically possible model

<u> </u>	<u> </u>	
Competitiveness pillar sub-	Potential influence of	Latvia's practice in the
components	government subsidies, grants	application of government
	and support programmes (the	subsidies, grants and support
	number of influenced	programmes (the number of
	subcomponents is indicated in	influenced subcomponents is
	brackets)	indicated in brackets)
Factor facet	+ (3)	+(1)
Company strategy and	+ (5)	-
competitiveness facet		
Related and supporting	+ (5)	-
industries		

The table shows that, due to the lack of available funding, Latvia practically does not utilize the listed fiscal stimulus, with the exception of the loan availability programme, which has been implemented by the Mortgage and Land Bank of Latvia.

Table 9: Latvia's practice in the application of EU Structural Funds, in comparison with a

theoretically possible model

incordically possible model		
Competitiveness pillar sub-	Potential influence of EU	Latvia's practice in the
components	Structural Funds (the number of	application of EU Structural
	influenced subcomponents is	Funds (the number of influenced
	indicated in brackets)	subcomponents is indicated in
		brackets)
Factor facet	+ (9)	+ (9)
Company strategy and	+ (4)	+ (4)
competitiveness facet		
Related and supporting	+(1)	+(1)
industries		

The table shows that Latvia uses EU funds to the fullest possible extent in order to influence their relevant competitiveness sub-pillars.

Table 10: Latvia's practice in the application of public procurement, in comparison with a

theoretically possible model

Competitiveness pillar sub-	Potential influence of public	Latvia's practice in the
components	procurement (the number of influenced subcomponents is	application of public procurement (the number of
	indicated in brackets)	influenced subcomponents is
		indicated in brackets)
Demand facet	+ (3)	-

The table shows that, due to the lack of available funding, Latvia does not apply the listed fiscal stimulus to increase competitiveness; however, it is considered a significant facilitator for innovation in a majority of developed nations.

## 3. CONCLUSIONS AND PROPOSALS

- 1. The range of fiscal instruments used in Latvia for fostering economic competitiveness and strengthening innovation capacity is insignificant in comparison with the theoretical fiscal stimuli application possibilities.
- 2. The fiscal stimulus used most in Latvia is EU Structural Funds, which on their own, without the application of an adequate government investment and support program, cannot create a successive and favorable environment for innovative economic development.
- **3.** The range of fiscal instruments used in Latvia predominantly affects overall entrepreneurship development; the systematic application practice of financial stimuli for the development of an innovative economy which is based on high added value, is absent.
- **4.** Taking into account that the only diamond facet, where Latvia has competitive advantages, is the factor facet, it is necessary to continue to strengthen it. Since the fiscal stimuli which dominate in the factor facet are EU Structural Funds and government investments, these fiscal stimuli are the ones to be used more, strengthening the availability of factors which are necessary for innovative economic development.
- 5. Since several competitiveness sub-pillars are influenced by several fiscal stimuli, the choice of stimuli should be based on the national economic situation funds available in the budget, as well as the evaluation of their efficiency, for example in comparison with the experience of foreign countries.

### **BIBLIOGRAPHY**

Michael, Porter (1990) The competitive advantage of nations, N.Y: The free press, a division of Macmillan, Inc.

World Economic Forum (2008) Global competitiveness report <a href="http://www.weforum.org/en/initiatives/gcp/Global%20Competitiveness%20">http://www.weforum.org/en/initiatives/gcp/Global%20Competitiveness%20</a> [accessed 22.07.2010.]