

RISK TAKING PROPENSITY OF CROATIAN EXPORTERS

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Abstract

The rather bad export performance of Croatian exporters can be explained by a number of factors, and one of them surely is the low level of risk taking propensity which is one of the three major dimensions of entrepreneurial behaviour. The aim of this paper is to define factors that determine level of risk taking propensity in Croatian exporting companies and research the risk taking propensity influence on different aspects of export performance. The paper is based on research of 88 Croatian exporters.

Key words: *Export performance, risk taking propensity, statistical analysis, international business, entrepreneurship.*

1 Introduction

Out of 67,000 registered companies in Croatia there are only about 6,700 (10%) exporting companies. Among them, only 3,144 can be called active exporters that made export value of over 1 million kuna (Croatian currency equaling about 133 000 Euro) in 2003. Over 95% of Croatian exports are made by large groups or companies. At the same time, the long term export results in Croatia are rather unsatisfactory: imports are constantly growing and exports are stagnating, thus creating a disturbing balance of trade deficit.

The research (Izvoznik 2004) has shown that most managers see several reasons for such a situation:

- problems with export financing,
- non-competitive export prices,
- insufficient or bad promotion activities, and
- export products' quality.

Obviously, some of the mentioned reasons can be associated with risk taking propensity. The aim of this paper is to analyze the risk taking propensity of Croatian managers of exporting companies and find out if and how it influences their export performance.

The major hypothesis of this paper is that higher risk taking propensity will result in better export performance of Croatian exporters. In order to test the hypothesis, a sample of 88 Croatian exporters were analyzed: they were clustered into «risk-taking» and «non-risk taking» segments, and their differences according to sample characteristics were analyzed. Thereafter, two two clusters were checked against different aspects of export performance. The results are presented in this paper.

2 Theoretical Framework

2.1 Risk Taking Propensity and Risk Perception

Risk propensity can be defined as a tendency to take or avoid risks. It is a relatively stable characteristic but can be modified through experience. Although it is viewed as an individual characteristic, the positive association between risk propensity and risky decision making by individuals is expected to translate to organizations through top management teams (Panzano and Billings 2005).

Risk perception is the perceived degree of risk inherent in certain situation.

Risk taking is defined as one of the three dimensions of entrepreneurial orientation of a company and refers to the willingness of the management to commit significant resources to opportunities that might be uncertain (Junehed and Davidsson 1998). Risk taking depends on risk propensity and risk peception. The higher the risk propensity and the lower the risk perception, the more likely it is that the risky decisions will be made. Hostile environments, as are most international markets in comparison to the domestic one, speak in favour of using the entrepreneurial strategy (involving higher risk-taking willingness). Therefore, risk taking initiatives should be more neccessary in order to achive good results in hostile markets. Or, in other words, mangers who dare to take more risks, take actions that are more suitable and perform better.

Abby and Slater (1989) found that management which has an international vision, favorable perception and attitudes toward exports, is willing to take risk and has the capacity to engage positively in export activities is likely to lead a company to export success.

In order to reduce risks, managers need to know which variables influence their export performance. If they have a higher risk-taking propensity, they positively affect export performance.

2.2 Export Performance

Export performance is today one of the most widely used measures of a company's success, due to the globalization and market liberalization processes. As a result of these processes, an increasing number of Croatian companies have opted to engage in export activities. However, their exporting results are far from satisfactory.

Over the years, researchers have generated numerous studies on exports many of which focus on the determinants of performance. Although it is difficult to make generalizations as much depends on companies' business position and the environment

they operate in, some determinants of export performance can be identified as general (Lefevbre et al. 1995): company's characteristics that include size and experience on international markets; competencies of a company, i.e. how it organizes and uses its resources (management capabilities, information gathering activities and specific products or technologies); environment of the company, or what is the company influenced by (characteristics of the industry, markets, government activities); and moderating factors which include strategy related variables such as marketing mix elements and the like.

The Appalachian Resource Centre Report (1997) on SME export performance includes the following findings:

- the farther in the supply chain accompany is situated, the lower its value added, and the more closely it works with its customers, the less likely it is to be an exporter;
- company size is directly related to the probability it exports, but not necessarily to its success in exporting;
- management is a key factor in export performance: the greater a manager's innovativeness and knowledge, the greater the export performance.

2.3 Risk Taking Propensity and Export Performance Relationship

Internationalization process theories are rooted in behavioral models of uncertainty avoidance. These models posit that internationalization progresses in a gradual and carefully controlled manner (Andersen 1993) in that companies choose to export to countries that are physically and culturally close to the home country and therefore require less resource intensive investments and are perceived as lower risk. However, these conventional theories on internationalization where a period of domestic growth is expected prior to a gradual expansion into foreign markets are being more and more contradicted today with a new term of global entrepreneurship. Global entrepreneurship indicates an emergence of mainly small companies that internationalize immediately or rapidly (Jones and Coviello 2002). Its emergence is due to the following:

- deregulation of international business,
- improvement in transportation and information technology, and
- emergence of knowledge based industries.

It seems that a lack of resources or appropriate knowledge is a lesser barrier to these companies and they appear to recognize and accept challenges and inherent risks in internationalization, and overcome them in innovative and entrepreneurial ways.

The internationalization process and consequently the export performance is influenced by the entrepreneurial behaviour of the company owner/manager and of the company itself. Individuals, i.e. entrepreneurs with their mindset and attitudes towards internationalization as well as with the social capital they bring to the company, their social networks, experience and general characteristics (for example, perception of risk and their risk tolerance) affect organizational culture and behaviour. Beside that, company level behaviour may be influenced by other internal factors (organizational structure, strategy, resource availability, etc.) and external factors (environment hostility and diversity, competition, legal framework, government support, etc.). In addition to

these, the marketing theory recognizes a whole set of so called foreign transactional risks:

- general stability risk, which refers to management uncertainty about the future viability of the host country political system,
- ownership/control risk, which reflects the management uncertainty about host government actions affecting the entrant's ownership or control position,
- operations risk, which is defined as a possibility of sanctions that could constrain entrant's operations in the host country, and
- transfer risk that refers to the limitations of entrant's ability to transfer capital out of the host country.

All of these factors strongly influence the company's willingness and commitment to exporting and consequently, its export performance.

3 Research

We have conducted a research of Croatian exporters in the period March – May 2004. The data collection model was postal survey. A questionnaire was sent to a sample of 300 exporters which were randomly drawn from the Croatian Chamber of Commerce database as 10% of active exporters. A weighting variable was computed (sample representativeness is $\pm 4\%$) in terms of company size, number of employees and type of activity. The sample covers the whole territory of Croatia. The key informant approach was used and the recipients of the questionnaire were chosen to be managing directors of the companies. Four weeks after initial mailing a reminder letter and a new questionnaire was sent to non-respondents. At the end, a total of 90 questionnaires were returned and 88 of them were usable for our research (2 companies were not exporting anymore). The effective responsive rate reached 29.3%.

3.1 Sample Description

Table 1. shows the major characteristics of the sample. According to business activity the sample was divided into two groups: one that consisted of so called traditional activities that are characterized by labour intensity, and the other that is mostly technology or capital intensive. 46 companies (52.9% of the sample) belong to the first group and 42 (47.1% of the sample) to the second.

The most common measure of company size in entrepreneurship as well as in exporting research is the number of employees. According to this criterion, 20.5% of the sample has 100 or less employees. 50% of the sample employs 215 or less employees. Almost half (45.5%) of the sample belongs to large companies. The largest company has 3,880 employees.

According to the company age the following pattern in our sample shows: 50% of the sample is 44 years old or younger, i.e. 44 years old or older. The oldest company is 400 years old. Only 12 companies in our sample (13.6%) can be considered young (10 years or less).

Export performance was measured by objective measure of export sales ratio and subjective measure of perceived satisfaction of company managers with export

performance. The analysis of exports sales ratio shows that the majority of companies (46.6%) in the sample are large exporters, selling over 50% of their products abroad. Overall export performance was marked with average of 3.36 which is not very high. However, 47.7% of the sample marks the overall export performance with very good or excellent.

Table 1: Sample description

	N	Valid percent
Type of activity		
<i>Traditional (labour intensive) activities</i>	46	52.9
<i>Non- traditional (technology or capital intensive) activities</i>	42	47.1
Number of employees		
<i>Up to 50</i>	13	14.8
<i>50-250</i>	35	39.8
<i>250 and more</i>	40	45.5
Company age		
<i>0-10</i>	12	13.6
<i>10-30</i>	24	27.3
<i>30-50</i>	18	20.5
<i>50-80</i>	18	20.4
<i>80-300</i>	16	18.2
Export sales ratio		
<i>Less than 10%</i>	9	10.2
<i>10-25%</i>	17	19.3
<i>25-50%</i>	21	23.9
<i>Over 50%</i>	41	46.6
Perceived satisfaction of export performance		
<i>Unsatisfactory</i>	4	4.7
<i>2</i>	10	11.6
<i>3</i>	31	36.0
<i>4</i>	33	38.4
<i>Excellent</i>	8	9.3
<i>Unanswered</i>	2	0.01

3.2 Questionnaire

Company risk-taking propensity was tested on two levels: one is according to the sample characteristics: traditional vs. non-traditional activity, company size and age; and the other according to general managers' evaluation on a 5 point Likert scale of the following criteria:

- risky business activities
- gradual implementation of new projects
- conservative approach to major business decisions
- strong hold onto existing and experienced procedures and projects.

The results were then checked against variables describing environmental hostility (reliability of financial and material resources, possibilities for business development, competition, industry settings and general climate for business), environmental diversity (key foreign markets and their economic and cultural diversity) and dynamism

(importance and influence of political, economic and cultural changes in the key export markets).

Upon describing major differences of the defined clusters of “Risk takers” and “Non Risk takers”, we have checked the differences in export performance of the two clusters.

Export performance was measured by already mentioned objective measure of export sales ratio and subjective measures of perceived satisfaction of company managers with the following trends in their companies, again on a five point Likert scale:

- export growth
- export profits growth,
- international image and corporate identity development, and
- overall export performance.

All these trends were used in order to capture both financial and non-financial aspects of export performance.

The correlation between the export sales ratio and different aspects of export performance measured by managers’ satisfaction was checked, and analysis has shown that the only statistically significant correlation is between export sales ratio and managers’ satisfaction with export growth ($r=.293$; $p=0.006$)

4 Analysis and Results

Cluster analysis was used on four above mentioned variables that define risk taking propensity, including the managers’ personal opinion on risk propensity. The decision about number of clusters (two) was made according to the dendrogram, a graph of hierarchical cluster analysis. The non- hierarchical k- means cluster analysis has segmented companies into two clusters of the same size ($n=43$). However, ANOVA has shown that managers’ personal opinion on risk propensity was not statistically significant ($p=0.388$) and it was omitted in further analysis. The second cluster analysis based on three variables resulted in two clusters that be defined as “Risk-takers” ($n=41$), and “Non-risk-takers”.

Table 2. Analysis of clustering criteria

Variable evaluation (5-point Likert scale)	Cluster	N	Mean	Std. Dev.	t-test	p
“New projects are implemented gradually, step-by-step”	non-risk takers	45	3.98	.75	3.491	.001
	risk takers	41	3.29	1.03		
“We have conservative approach to major business decisions”	non-risk takers	45	3.67	.93	8.247	.000
	risk takers	41	2.22	.69		
“We hold strongly onto known projects and procedures”	non-risk takers	45	3.78	.67	8.716	.000
	risk takers	41	2.59	.59		

Interestingly enough, no statistically significant differences were found between the two clusters in basic company characteristics: company size, age and type of activity. They also do not differ in their export performance measured by the export ratio and by

managers' personal evaluation of different financial and non financial measures of export performance.

The only statistically significant difference was found in their perception of some important factors that influence their company's business: competition and industry settings, as it can be seen in Table 3. Industry settings in the context of this research can be defined as the level of organization and cooperation of companies within the branch on the foreign market)

Table 3: Statistically significant differences between the two clusters

	Cluster	N	Mean	Std. Dev.	t-test	P
Competition	non-risk takers	45	3.98	.94	2.158	.034*
	risk takers	40	3.48	1.18		
Industry settings	non-risk takers	45	3.33	1.02	2.317	.023*
	risk takers	40	2.80	1.09		

Risk- takers cluster evaluates competition and industry settings as of lesser influence and importance for their business activities.

Further on, no statistically significant differences between risk-takers and non-risk takers cluster were found in managers' evaluation of all elements of their company's environment diversity or dynamism that were subject to our analysis.

5 Discussion

The statistical analysis was based on exporters' clustering according to their evaluation of the three variables used for measurement of their risk taking propensity in international market. According to this, exporters were divided into two segments: the first one being «non-risk takers» whose average score of criteria variables was 2.7, and the second one being «risk takers» whose average score of criteria variables was 3.81. Although, this is a significant difference, we might say that Croatian exporters, according to this research, in general do not have a very high risk taking propensity when doing business internationally.

According to the theory, we have expected that both internal and external factors will influence the risk taking propensity. Balabanis and Katsikea (2003) argue that company size and age strongly influence risk taking propensity of exporters: large companies have more financial and technical capabilities and resources than small ones, that allow them to take risks. On the other hand, newer firms are not bound by traditions and routines and as a result have more freedom in making decisions and taking risks. We also have expected that non-traditional activities are more risk-taking by their nature. However, all these internal factors show no significance in relation to the level of risk taking propensity of Croatian exporters.

This research shows that the only statistically significant differences between the two clusters, risk-takers and non-risk-takers exists in their perception of the competition and industry settings as important factors of environment hostility. In both cases, the risk-

takers' cluster evaluates these two factors as less important in making business decisions than the non-risk-takers' segment. Risk-takers consider competition more influential than industry setting. Other analyzed external elements that define environment hostility, dynamism and diversity show no significant differences between the two clusters.

Finally, no statistically significant differences were found in exporting results and managers' evaluation of export performance between the two clusters. It can be partly explained by the company characteristics, especially age: namely, 50% of the sample is 44 years old or more, so it could be assumed that these companies have spent a number of years doing business internationally and therefore they perceive it as less risky. Most of them probably have long term business relations and networks. Furthermore, the export orientation of the sample follows a specific pattern: about 1/3 of the sample has more than 50% export concentration in ex-Yugoslavian markets, which are perceived as «quasi domestic» and in any case not very hostile or diverse.

6 Future Research

To a great extent, the results of this research were not what was, according to the theory, expected. Therefore the future research might take into account the application of statistical instrument for measuring competition as a limiting factor of risk taking propensity.

The other interesting avenue of future research might be analysis of interaction of all entrepreneurial features for exporters – innovativeness, proactiveness and risk taking propensity.

References:

- Abby, N., Slater, S. 1989. Management Influences on Export Performance: A Review of Empirical Literature 1978-88, *International Marketing Review* 6(4):7-26
- Andersen, O. 1993. On the Internationalization Process of the Firm: A Critical Analysis, *Journal of International Business Studies* 26(2):209-231
- ARC 1997. *Online Resource Centre Report: Export. Competitiveness and Synergy in Appalachian Industry Clusters*. www.arc.gov [Accessed: 29.10.2004.]
- Balabanis, G.I., Katsikea, E.S. 2003. Being an Entrepreneurial Exporter – Does it Pay?, *International Business Review* 12: 233-252
- Izvoznik 2004. A virtual newsletter of Croatian Exporters' Association, www.hrvatski-izvoznici.hr/newsletter/ (Accessed 17.2.2005)
- Jones, M.V., Coviello, N.F. 2002. A time based contingency model of entrepreneurial internationalization behaviour, *WP 2002-12*, Haskayne School of Business, Glasgow, Scotland
- Junehed, J, Davidsson, P. 1998. Small Firms and Export Success: Development and Empirical Test of an Integrated Model, *WP 1998-7*, Jönköping International Business School
- Lefebvre, L.A., Lefebvre, E., Bourgault, M. 1995. Innovative Efforts as Determinants of Export Performance: The Case of Specialized Suppliers. *Cirano Scientific Series* No

95s-23. Montreal

Panzano, P.C., Billings, R.S. 2005. An organizational level test of a partialy mediated model of risky decision-making behaviour, www.dssincorporated.com (Accessed: 15.2.2005)