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STUDY ON THE OPPORTUNITY OF AN IT BUSINESS INCUBATOR IN ALBA COUNTY

Summary: The digital industry creates nowadays a digitalised global, high-tech economy, influencing our daily life, the way we work, study, take decisions, check our health, invest and make transactions, many times simplifying the processes and even lowering the expenses for the producers and for the buyers. Domains as health, education, industry, telecommunications, banks and finances, agriculture and environment, constructions and real estates, energy and many others are developed through digitalisation.

The investments all over the world in technology and innovation are huge. The IT field is in Romania among the most developed and appealing fields for the IT giants and for the entrepreneurs and they pay much attention to the protection of the investments through intellectual property – cloud computing, case studies, royalties, patents and inventions, design and registered marks. The year of 2018 bring to the business environment and also for the public sector the impact of the coming into force of the new general data protection rules – GDPR, which introduces new obligations related to the management, the use, the collection and the preservation of data. Still, IT is a field presenting development potential. Our paper represents a quantitative research based on an on-line questionnaire for the evaluation of the opportunity of an IT business incubator in Alba County.

Key words: IT business incubator, high-tech economy, entrepreneurship.

1. INTRODUCTION

The IT sector in Romania reached an inflexion point when the models of simple businesses, based on outsourcing services, had come close to the threshold of competitiveness, as a result of the growth of the costs with the working force. Thus, the outsourcing from the Romanian. It becomes expensive, requiring for the companies the passage to the development of their own products. The Romanian economy must evolve from the models based preponderantly on productivity to the models based on **innovation**. The solution is represented by innovation and

the strategic alignment of the IT sector to some specialised directions, founded on elements of indigenous intellectual property.

Starting from the competitive advantage of the M. Porter, Barney, J. B. (1991) thought resources constitute tangible and intangible assets utilised by an organisation in order to implement their strategies.

According to the definition, **the business incubator** is a support structure for businesses, organised as infrastructure in a proper space, inhabited by the residents of the incubator. It is managed by an administrator, aiming to create a favourable sustainable environment for the newly founded SMEs, stimulating their development and viability potential and helping them to grow during the beginning period, by ensuring them common facilities and the necessary managerial support. Any economic operator, SME, Romanian and/or foreign corporate body, functioning according to the law and developing economic activities in the business incubator, can be resident of the business incubator and benefit of this statute for a period up to 3 years.

In according with Carree M.A., Thurik A.R (2003) entrepreneurship is “at the heart of national advantage” [Porter 1990, 125]. In his study William B. Gartner, Nancy M. Carter, and Paul D. Reynolds (2003) offer some ideas and evidence about the processes of organization formation, insights into the nature of organization formation.

SMEs with economic activities in the incubator, depending on their specificity, will be able to benefit of **business support** related to:

- Managerial counselling and constant cooperation from the resident companies;
- Access to services of professional formation for the present and future needs of the market;
- Juridical and accounting professional services;
- Collective acquisition of services and products;
- Access to NGO funds for economic development;
- Access to financing sources, investments and working capital;
- Contacts with individual investors and venture capital funds;
- The transfer and the commercialisation of technology, as well as contacts with universities and research and development institutes;
- Services for the internationalisation of SMEs;
- Services for the general management of the space of the business incubator;
- Other services.

Thus, the **business incubators** are, according to the provisions of the Law 102/2016, structures for the support of the businesses, aiming permanently to create a favourable and sustainable environment for the newly founded SMEs. Thus, the growing and viability potential of the enterprises will be stimulated, helping them to develop during their first years by ensuring common facilities and managerial support. The founders of such structures can be legal persons, public authorities, institutions/consortia of academic education, research-development institutes, centres and stations and chambers of commerce.

2. THE IT MARKET IN ROMANIA

The evolution of the IT industry to the national level is significant: there were 14,339 companies in 2016, with over 100,000 employees, their number growing with 75% in the last 6 years. The growth of the proportion of the start-ups on the market, after their double growth between 2011 and 2017, also shows the appearance on the market of the young entrepreneurs, promoters of new ideas and solutions and of a new business attitude, thus completing the landscape of the experienced companies that grew at fast pace in the last years.

The capacity of the start-ups to resist a powerful concurrence is a stake on the IT market, attracting the interest of the specialists. This is one of the premises of a successful continuity in the field of IT. The business capacity developed by the IT companies is highlighted by a **doubled total turnover** in the last 6 years. A market of 5 billion Euros represents an important segment in any provision calculation.

The number of IT companies has grown in Region Centre (Counties Alba, Sibiu, Mures, Harghita, Hunedoara) with over 75% compared to 2011, much over the national rate. If we also consider the new companies appeared as a result of the governmental programs, e.g. "Start-up Nation", we can discuss at this time of a double number.

Between 2011 and 2016, the **number of start-ups almost doubled** (from 1,806 in 2011 to 3,795 in 2016), total of the companies grew from 18.4%, in 2011 to 26.5% in 2016.

The IT Cluster ARIES Transylvania from Cluj Napoca, with the support of the City Hall and the Local Council of Cluj-Napoca performed a study on the IT market in Romania, with an analysis to the national level and a comparative analysis on the companies from the urban centres in Romania (Cluj-Napoca, Bucharest, Iași, Timișoara, Brașov and other cities), on a period of 6 years (2011-2016).

According to this study, **the main action necessities** in IT to the level of the Region Centre are:

- The encouragement, the support and the financing of the projects aiming to innovate the ICT sector, taking into consideration the entire economy (digital economy) and the necessity for adaptation of the entrepreneurs to this tendency.
- The encouragement and the support of the investments in the ICT technology, due to the fact that it contributes to the efficacy and the scalability growth of the SMEs.
- The development of an efficient cooperation mechanism between universities and the IT industry, aiming to generate a number as big as possible of highly-qualified IT specialists.
- The support of the development of an IT community with access to the structure required for the development of the activity, based especially on innovation and partnerships.

- The encouragement and the involvement of the IT field from the Region Centre in the participation to events of themes related to the challenges of the society, the development tendencies, the regional, national and international risks and threats, from the perspective of the identification and development of feasible solutions.
- The promotion and the support of the local IT companies from Region Centre for their economic development and innovative potential, contributing directly and indirectly to the durable regional development.
- The extension of the international presence through which competitiveness and innovative products or services.
- The encouragement and the involvement of the IT companies from Region Centre in the formation process of the students through the development of educational and practical projects, in partnership with the research environment and the public administration (e.g.: access to practice in the companies during the holidays of the students, mentorship programs, prize contests for the identification of innovative and creative solutions for themes related to the IT technologies, etc.).

3. THE RESEARCH METHODOLOGY

The study was developed between 1st of June 2018 and 20th of June 2018. The research methodology was the on-line investigations based on a questionnaire. The data were collected from 3 sub-samples as:

- **IT students** and graduates of this specialisation – **114 people**
- **Companies** from Alba County with activities in **the field of IT** – **23 companies**
- **Companies** in Alba County with activities in **other domains** – **62 companies**

The objectives of the research were:

O1. The identification of the familiarisation degree with the concept of “business incubator”

O2. The measurement of the degree in which the young students and graduates are interested to develop an IT business in the following 2 years

O3. The identification of the IT segment where the young people and students are interested to develop a business

O4. The identification of the market segment the young people will address in case of developing an IT business

O5. The evaluation of the young people’s and students’ opinion on the services of an IT business incubator

O6. The identification of the segment of activity of the IT company

O7. The identification of the market segment addressed by the IT companies

O8. The evaluation of the opinion of the representatives of IT companies on the services offered by an IT business incubator

O9. The identification of the domain, other than IT

O10. The identification of a market segment which is addressed by companies from other fields of activity

O11. The evaluation of the opinion of the representatives of the companies from other fields of activity on the services offered by an IT business incubator

O12. The profile of the participants

The analysis and the interpretation of the collected data are presented as follows:

O1. The identification of the familiarisation degree with the concept of “business incubator”

According to the collected data, as seen in Figure 1, a high level of familiarisation with the concept of “business incubator” is identified in the case of the representatives of the IT companies (over 80%) and also among the representatives of the companies with activities in other domains (over 75%). In the case of the young people, only 18% declared that they know what a “business incubator” is.

O2. The measurement of the degree in which the young students and graduates are interested to develop an IT business in the following 2 years

Less than a half of the young IT graduates and students (31% from the investigated segment) declared to be interested in developing an IT business in the following 2 years.

O3. The identification of the IT segment where the young people and students are interested to develop a business

For the young people interested in developing an IT business in the following 2 years, the most attractive segments are: on-line marketing, e-commerce support, software development and implementation, IT apps development, Web Design and web site promotion. Segments as printing equipment service and hardware are attractive in low degrees.

O4. The identification of the market segment the young people will address in case of developing an IT business

Related to the market segment the young people will address to, in case of developing an IT business, the majority of them prefer the market of the individual customers 72% and 28%- B2B.

O5. The evaluation of the young people’s and students’ opinion on the services of an IT business incubator

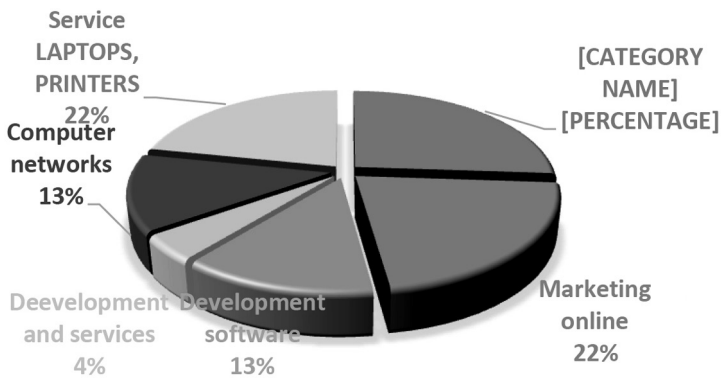
Over 90% of the young people familiar with the concept of “business incubator” declared to be interested in benefiting of the services of an IT business incubator.

They are mostly interested in preponderantly benefiting of services as: Accounting and fiscal support, Legal support, Direct contacts with the investors, Practical working experience with start-ups, Consultancy on the development of new products, Co-working space, The internationalisation of the business.

O6. The identification of the segment of activity of the IT company

Our research also intended to evaluate the opinion of the IT companies with activity in Alba County on the opportunity of a business incubator. The investigated companies (as seen in Figure 1) have activities as: web design and internet promotion, SEO, solutions for on-line, on-line marketing, hardware service.

Fig. 1. Activities



O7. The identification of the market segment addressed by the IT companies

After the investigation of the IT companies, we observed that more than 70% of them address to the market of the organisational customers.

O8. The evaluation of the opinion of the representatives of IT companies on the services offered by an IT business incubator

Almost 80% of the representatives of the IT companies, who are familiar with the concept of “business incubator”, manifested interest in the services of an IT business incubator. Over 95% appreciate the idea of establishing an IT business incubator in Alba County as “very favourable” and “favourable”. Mostly, the IT companies are interested to predominantly benefit of services as: Accounting and fiscal support, Legal support, Access to promotional events and fairs, Research-development, Direct contacts with the investors, Practical working experience for start-ups, Consultancy on the development of new products, Co-working space, The internationalisation of the business, Networking.

O9. The identification of the domain, other than IT

During the research, we also aimed to evaluate the opinion of the companies from domains outside IT, with activity in Alba County, on the opportunity of establishing an IT business incubator. Thus, according to Figure 11, the sample contains companies with activities in the following domains: Manufacturing sector, Constructions, Agriculture, forestry, fishing, Wholesale and retail, Transport and storage, Hotels and restaurants, Information and communications, Financial intermediations and insurance, Real estate transactions, Professional, scientific and technical activities, Administrative services and support services, Education, Health and social assistance, Entertainment and cultural activities.

O10. The identification of a market segment which is addressed by companies from other fields of activity

According to the data, 36% of the companies with activity outside the field of IT already externalise their services totally or partially. Most of the time, there are externalised services as: software update, IT service, accounting software.

O11. The evaluation of the opinion of the representatives of the companies from other fields of activity on the services offered by an IT business incubator

Related to the interest of the companies from other fields of activity, we depict an important interest manifested toward the following services that can be offered by an IT business incubator: Accounting and fiscal support, Legal support, Access to promotional events and fairs, Consultancy related to award grants, Project management support, Research -development, Direct contacts with the investors, Practical working experience for start-ups, Consultancy on the development of new products, Co-working space, The internationalisation of the business, Networking.

O12. The profile of the participants

According to the data in the Figures below, the sub-samples used for the data collection were structured as follows: The majority of the young people we investigated are between 18 and 24 years old (84%) and are students (87%), 51% of the companies participating to the research are micro-enterprises and 39% are SMEs, 83% of the IT companies participating to the research are micro-enterprises and 17% are SMEs.

4. CONCLUSIONS

In accordance with Christensen JF, Olesen MH, Kjær JS (2005) open Innovation in regard to technology reflect their position within the innovation system in question, the nature and stage of maturity of the technological regime, and the particular value proposition pursued by companies.

After the data collection, analysis and interpretation, the following conclusions related to the identified need can be enounced:

- It is necessary to promote the concept of “business incubator” among the students and young people in the field of IT; only 18% is familiar with the concept;
- There are business opportunities in the field of IT for offering services for companies in different fields, wiling to externalise this type of services;
- It is necessary to promote and encourage the entrepreneurship among the young people and students in the field of IT;
- It is necessary to promote and support the entrepreneurship in fields as on-line marketing, e-commerce support, software development and implementation, development of IT apps, Web Design and the promotion of web sites;
- It is required a better information of the young people related to the business opportunities in IT, coming from the market of the organisational customers;
- The young people manifest a significant interest related to an IT business incubator in Aba County, in order to benefit of services as:
 - Accounting and fiscal support
 - Legal support
 - Direct contact with the investors
 - Practical working experience for start-ups
 - Consultancy related to the development of new products
 - Co-working space
 - The internationalisation of the business
- The IT companies manifest a significant interest in an IT business incubator in Alba County, in order to benefit of services as:
 - Accounting and fiscal support
 - Legal support
 - Access to promotional events and fairs
 - Research – development
 - Direct contact with the investors
 - Practical working experience for start-ups
 - Consultancy for the development of new products
 - Co-working space
 - The internationalisation of the business
 - Networking.
- There is a significant interest from companies in other domains, manifested on a wide range, for the following services that are possible to be offered in a business incubator in IT:
 - Accounting and fiscal support
 - Legal support
 - Access to promotional events and fairs
 - Consultancy related to award grants

- Project management support
- Research – development
- Direct contacts with the investors
- Practical working experience for start-ups
- Consultancy on the development of new products
- Co-working space
- The internationalisation of the business
- Networking.

Thus, creating a business incubator in the field of IT will generate the increase of the success rate during the first critical years, the significant decrease of the launching time, the possibility of the owners to concentrate on the development of the key products, the marketing of the research results, the identification of the investment opportunities, the creation of new working places and the entrepreneurial encouragement and formation. In the end, the incubator aims to have a positive impact on the economic health of an area and of a community.

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