BENCHMARKING OF BUSINESS INCUBATORS IN CEE AND CIS TRANSITION ECONOMIES

by

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INTRODUCTION

Question 1: Does a business incubator need to have a business plan prior its establishment? 4

Question 2: What are the criteria of success of a business incubation process? 5

Question 3: What kind of services should a business incubator provide? 8

Question 4: How long incubation period to chose for a tenant? 11

Question 5: How many incubator place do you need and what kind of facility? 13

Question 6: Who are the stakeholders/local alliances of the business incubators? 14

Question 7: How to finance business incubators? 16

Question 8: How to create clusters and network of enterprises? 19

Question 9: How to select the best possible incubator manager? 23

Question 10: How to select the business incubator supervisory board? 27

Question 11: How to evaluate the activities of the business incubators, science and technoparks? 28

Question 12: What are the criteria of the sustainability of business incubators, science and technoparks? 31

Annex 1: List of Experts Preparing National Presentations 35

Annex 2: Benchmarking of the Best Business Incubators by National Experts 38

Annex 3: Types of Business Incubators in selected CEE & CIS countries 39
INTRODUCTION

This paper serves as the Background Paper for the Workshop on Business Incubators in Selected Central-Eastern European and Commonwealth of Independent States Countries. All the information in the background paper stem from the international research implemented by ERENET – Entrepreneurship Research and Education Network of Central European Universities – and by ENTRANSE on behalf of SINTEF – The Foundation for Scientific and Industrial Research at the Norwegian Institute of Technology. National presentations were made based on the Questionnaire on Business Incubators in selected Central-Eastern-European & Commonwealth of Independent States Countries.

Originally twelve countries were involved in the research:
1) Armenia
2) Croatia
3) Georgia
4) Hungary
5) Moldova
6) Poland
7) Romania
8) Serbia
9) Slovakia
10) Slovenia
11) Turkey
12) Ukraine

The former Yugoslav Republic of Macedonia joined to the research team later. However, due to time constrain the findings were not built into the study so far.

For Benchmarking of Business Incubators National Experts were chosen based on their experiences in the field of SME policies and development of business support infrastructure. In order to have a neutral opinion, no representatives of any national government authorities or SME support institutions were invited. The Experts filled out the questionnaire that contained only open questions, so the structures of the answers were often different. Certainly, there were many similarities in the twelve studies, but lots of country-specific differences could be detected too.

While compiling the Background Paper, our first aim was to collect and keep all information given by the different national studies. The second aim was to give a redundancy-free final report, exempted form repetitions.

Please note that this paper is edited from the national studies written by the following national experts. The list of Experts see in Annex 1.

Question 1: DOES A BUSINESS INCUBATOR NEED TO HAVE A BUSINESS PLAN PRIOR ITS ESTABLISHMENT?

Best way to start any business (including incubating) is to work out a business concept, analyze its feasibility and develop a business plan. Business incubators, like any other businesses, only can benefit from well described goals, objectives and mission statements. According to our research, it can be realized that most of the incubators in the post-socialist countries have had a formal business plan elaborated before starting their activity.

Business incubators need to prepare a preliminary business plan for at least the following three main reasons:
(i) Business incubators are, without exception, established by such entities (e.g. local governments, organisations managed from public funds, enterprise development
organisations, etc.) who require applications for funding the establishment of business incubators.

(ii) The business plan is also necessary for setting up the staff of the business incubator, since this is the document that describes what functions the incubator would have to fulfil (and what functions there are sources for), and then the appropriate human resources need to be assigned to these functions.

(iii) The preliminary business plan is also indispensable in order to ensure the subsequent evaluation of the business incubator established: it is on the basis of the business plan that we can later answer the question whether the work of the incubator was successful or not. The question whether the organisation achieved the objectives set at the time of its launch, as documented in the business plan, can be asked on the basis of the preliminary business plan.

The business plans mainly contain the followings:

- Description of the incubator’s environment,
- Explanation of the target markets,
- Types of services provided. It is necessary to indicate the permanent services offered in the business incubator and those which will be acquirable from outside, the main characteristics of them in terms of each client specifics, prices policy, types of results, the established indicators;
- The rules of business incubator function, criteria of admitted in, the rent, the policy of exclude from incubator,
- Management plan, operational policies and procedures
- Economical analysis (costs and incomes from rent and provide services), fund rising strategy, financial sustainability assessment,
- The marketing strategy, types of business which will be incubated
- Forecast of possible internal and external risks.

The business plan is necessary for the business incubators not only in the stage of establishment but also in the following years. The business plan must be very well-founded, realistic and clear – and like any other business plans, it should be updated at least in every three years.

Majority of the incubators in Croatia are top-down initiatives dependent on the public government policy and programs support. In order to attract sufficient funding from the local authorities all business incubators prepare a formal business plan with the goals and mission statement, service and purpose description, market assessment, management and financial plan. Therefore it is not surprising that the majority of the business incubators in Croatia (14 out of 16 in the sample) reported they have got the formal business plan.

The Polish study describes that most of the early business incubators in Poland had no professional business plans before 1994; they rather had feasibility studies. Later, within the Micro-Enterprise Development program financed by the Polish Ministry of Labour and Social Policy old and existing business incubators were assisted by Polish and American experts in development of Business Plans between 1994 and 1997. Moreover, a so called Model Incubator Business Plan was developed to serve other incubators, too. After the EU accession of Poland, the Polish technology business incubators financed by Structural Funds have had to submit Business Plan, Feasibility Study and Report on environmental impact of the business incubation.

In Romania, it is necessary to elaborate a business plan before creating an incubator in accordance with the the Government Strategy for Stimulating the Development of BI in a National Network, based on GD. No. 260/2006

According the opinion of the Slovak National Experts, it is important to have a business plan prior the establishment of business incubator.
There are countries in the region (e.g. Serbia) where the question of drawing up business plans for business incubators is not prescribed by law. In the study of Serbia we can read about the first Serbian incubator, created in the city of Nis (BIC). This incubator started in the summer of 2005, while the business plan was finished only several months later, at the beginning of 2006. As a direct consequence they had an insufficiently clear purpose and the type of incubator, which resulted in a very heterogeneous structure of tenants’ programs. Moreover, although the incubator had been in operation for several months, particular services of utmost importance for tenants did not start, first of all in the fields of training, education, mentoring and coaching of entrepreneurs.

**Question 2: WHAT ARE THE CRITERIA OF SUCCESS OF A BUSINESS INCUBATION PROCESS?**

There are several criteria mentioned in the national studies for measuring the success level of the incubation process. We can form the following groups of the criteria:

1. **Survival/Existence of the business incubator:**

   Survival of the incubator is one of the most important criteria for the success of the process of business incubation since it enables the continuity of attracting and developing entrepreneurs with new and attractive business ideas. The studies also pointed out the following crucial characteristics:

   - Effective business incubation programs are **based on** legitimate feasibility studies and business plans,
   - **Proaction and strategic focus** have basic importance in the success. Proaction and strategic focus are enhanced by continuation of the clients, environment, and industry monitoring and alertness,
   - Critical point can be the continuing, regular **evaluation of the performances** and the abilities of the program to fulfill its goals, and to evolve with the market,
   - **Benchmarking performances** to the best practice standards can be really useful.

2. **Tenants and their business success:**

   Business success of the tenants is the basic purpose and the mission of setting up any business incubator. Under this topic, the studies highlight the following indicators:

   - Number of **firms incubated,**
   - Number of **new businesses created** (registered) and supported by the incubator,
   - **Employment opportunities provided** – number of jobs (total and new jobs) created at client or graduate companies of the business incubator,
   - Growth of **revenues / profits** of these businesses,
   - Number of **businesses graduating** / leaving the incubator successfully,
   - **Temp and speed of** tenants’ development,
   - The **length of stay** of businesses in incubator before leaving,
   - The number of **enterprises demonstrating financial stability** and successful independent development after graduating from business incubators.

“In order to increase the probability of the tenants’ commercial success it is indispensable to develop different systems of supervision and control, starting with the activity of selecting and choosing the entrepreneurs in the pre-incubation stage to active supervision and control of their business performance during the incubation period.

In the stage of pre-incubation it is necessary to try to develop the methodology of early identification of “good” business ideas that have considerable market potential. While selecting future
tenants of the incubator it is necessary to take into account as many criteria as possible, such as market potential, prospects of product development (product and production), business experience of the entrepreneurs, mental attitude and attitude towards work and the particularly important criterion for Serbia – export-oriented production and production that can substitute for import. Supervising business performance of the tenants and early and prompt response to potential problems is of the utmost importance in the stage of incubation.”

3. Political and regional effects:

- Ability to make region more competitive,
- Diversity of local economic activity,
- Facilitation of privatization,
- The tax base created through these businesses,
- Stimulation of economic environment,
- The needs of the region,
- Connections & interaction among enterprises,
- Creation of markets
- Marketing policies adequate to the local, regional, national or international specific,
- Connection on requirements, impulsions and facilities of the environment,
- Developing strong relationship with community,
- Growth of local artisans,
- Assistance to disadvantaged.

4. Finance and sustainability:

- Secure, stable financial support provided by the local authorities, or attracted by the donations, grants, etc.,
- Micro loans – value and number of clients,
- Rents to subsidize Incubator operations,
- Annual Audit Reports and Business Plans,
- Three-months Enterprise Activity Reports,
- Sales,
- Profitability,
- Internal rates of return,
- Investment return of enterprises,
- Sales and profit target,
- Expense targets,
- Cash flow targets,
- Investment targets,
- Export capacity,
- Annual income tables, balance sheets, and cash flows,
- Capital situation and access to credit resources,
- Solvency and payment discipline of renters.

In the early stages of the development of business incubators it is indispensable to count on stable and long-term financial resources which are often found in different forms of assistance and donations. For the countries in transition this issue is particularly delicate due to budgets constrains which state and local authorities have to face. Therefore, international assistance and donations are one of the most important resources for these countries. This is exactly the case in Serbia where the first business incubator was established with the help of a donation of the Norwegian Government. Medium and long-term success of business incubation depends largely on the stability of financial resources. Hence it is essential to consider future financial projections as early as when drawing up a business plan for business incubators in order to create healthy foundations for self-financing of the whole system of business incubation.
5. Management team:

- Vibrant business incubator needs **entrepreneurial manager**. Alternative to the entrepreneurial manager there is “receptionist for the multi-tenants buildings”
- **Upgrading management** and networking **skills** of the incubator staff.
- **Education of the management staff** for providing consulting and networking roles.
- A **competent management team**, who can assure modern and adjust solution according to the incubate proposals;
- **People**,

6. Services:

- Priority is given to the **mentoring, networking, and human resource development**.
- Developing **flexibility, commitment, ability to lead (tenants) and to serve** (local community partners).
- Developing **strong relationship with community**.
- **reduction of small business failures**
- **attraction & retention** of new small businesses
- **retention of youth** (particularly university graduates)
- **commercialization of research** from university labs (technology transfer)
- **generation of individual wealth**
- **growth of local artisans**
- **assistance to disadvantaged**
- **Range and quality of services** offered
- **Experiences**, which can lead to higher quality of offered consulting and advisory services,

7. Infrastructure and source

- **Sources** (funds, building and equipment and so on),
- **Building arrangement** of incubator (size in m2, type of area, size of collective area, and so on),
- **Area occupancy**,

8. Research potential and networks

- **Commercialization of research** from university labs (technology transfer),
- The **demand for services** of business incubator,
- **Involvement in transfer** of technology and innovation, collaboration with R&D,
- Turning to the account the **research potential**, especially of universities and research institutes and creating a portfolio of patent,
- The **access to national or international networks** and to partnerships, regarding the organizations and institutes which assure necessary support of development of small enterprises. This category is starting with suppliers of services and till public authorities or international organizations,
- Among indirect criteria of success of business incubation for innovative and technological BI we can consider number of **innovative projects**, which were prepared with support of the incubator and are implemented by its client companies,
- **Publications** of enterprises,
- **Product and institutional image** of the enterprises,
- Having **regular customers**.
Question 3: WHAT KIND OF SERVICES SHOULD A BUSINESS INCUBATOR PROVIDE?

The services provided by the business incubators can be divided into four main groups.

1. Basic services:

   A) Rent of space

   ➢ Renting flexible space (office, production space, laboratories) for new businesses under beneficial terms (with rents gradually raised to the market level).

   Classic business incubators usually provide premises in a suitable facility. Business premises (office, etc.) are usually available at the business incubator at a discounted renting rate, and they normally encourage tenants to leave the given incubator after the incubation period by way of gradually raising the lease rates to the market level. In the interest of this objective, the lease may, after a time, not only reach, but even increase its usual levels on the market.

   Business incubators may be facilities established by way of green-field investments (there are several examples for this also in Hungary). It is more frequent, however, that facilities that have lost their earlier function are transformed for the purposes of the business incubator. A typical example in Hungary is the transformation of military facilities (mainly former Soviet army barracks) for this purpose. Also typical around the world is the utilisation of deteriorated, no longer used industrial plants (these have the additional advantage that water, gas, electricity, sewage, etc. lines are installed in a way suitable for industrial activities and with the necessary permits also in place). Both in Hungary and abroad, the buildings of several major steel works have been turned into business incubators after the international crisis of the steel industry.

   B) Usage of places

   ➢ Physical and industrial infrastructure –
     • Conference hall and conference rooms, which are part of the incubator and besides the firms in incubator they can be also used by others, external firms under commercial conditions
     • Shared meeting and board rooms
     • Communal rooms for guests and visitors
     • Computer rooms,
     • Conference equipment,
     • Advisory literature will become a part of the incubator.
     • Parking spaces,
     • Cafeteria.
   ➢ To assure the utilities, at reasonable prices, without initial costs for connection,

   C) IT services

   ➢ Telecommunication services and information technology services
   ➢ Telephone lines,
   ➢ Access to high-speed Internet,
   ➢ Electronic mail,
   ➢ Possibility of placing information about company on Incubator web sites,
   ➢ Design of websites,
   ➢ Shared office services (photocopying and fax services),
   ➢ Support in creation of Web sites for SMEs

2. Additional services
A) Office services, usage of equipments

- Reception (receptions are the parts of incubator and they provide the primal contact of the clients),
- Postal services,
- Office equipment, usage of tools,
- Shared office administration for example secretarial services (the starting entrepreneurs have them at their disposal together with access to the mailbox and the copying),
- Library – library containing statute books, actual legal, accountant and other.

3. Advanced level services

A) Consulting

- Business plan processing – the incubator can helps with the commercial and business plan creation – together with help with business plan creation.
- Continuously provision of business consultancy,
- Consulting on tax and customs, financial management, accounting, and other on-demand issues,
- Shared bookkeeping and accounting services for the tenants,
- Provides marketing and advertising services, market research
- Provides know-how services,
- Juridical assistance,
- Consulting SMEs on existing financial sources and loan guarantee mechanisms,
- Consulting SMEs on innovations, modern technology, acquisition and protection of license;
- Consulting and advisory
  - legal
  - financial
  - technology transfer
  - managerial
  - marketing
  - information
  - access to capital
  - seed capital fund
  - to speed up the new business creation, and to develop the growth capability of the new businesses,
- Assistance with aspects of e-business and IT systems,
- Mentoring and coaching,
- Consulting services beyond those contracted with entrepreneurs,
- Obtaining capital and access to a range of other more specialized professional services, specialized knowledge, or special clients,
- Provision of advanced competences.

B) Business Training

- Organize professional business training courses,
- Business management skills (planning, organizing, directing & controlling) assessment & training,
- Building management teams,
- Business function skills (marketing, finance, operations, bookkeeping & team building) assessment & training,
- Knowledge transfer,
Hold discussions on **SME problems** (legislative, branch and other) organized jointly with interested partners,
Ensure SME participation in vocational and training courses arranged by specialized BSPs upon demand,
**Assess training needs** of small and medium businesses,
**Tutorship and personnel training** services,
**Entrepreneurial training** programs, **coach training** programs,
Assistance with **organizational building** (advisory boards and senior management teams),
Offering **special courses**:
- Learning experiences,
- Language courses.

**C) Business Information**

- Information on **tax and customs**,
- Information on **innovations**, new **technology** and protection of intellectual **property rights**,
- Information on available **financial sources** for SMEs;
- Information services about **national and international programs** like FP6, INTERREGIIIA, B, C, cooperation in field of grants and projects
- Preparation of **development and investment programs**,  
- **HI-TECH** advisory,
- **Data base**

**D) Cooperation**

- Promoting **clustering** and **networking**,  
- Assistance with **professional networking** internally with other entrepreneurs and externally with business community (Chamber of Commerce, business & professional associations, and venture forums)
- Networking with other incubators and different support institutions (universities, local government, local business centers etc.).
- Quarterly **networking events** (internally and externally),
- Monthly CEO **roundtables** to discuss shared resources, ideas & services,
- Community services such as **meeting & board room rental** after hours,
- **Joint presentations**, contacts with business partners.

4. **Financial help**

- Reducing start-up costs,
- Assistance with **early financing** (early bank loans, angel and commercial finances),
- Financial services like **micro loans, credit program, intermediation of financial sources**, and so on,
- **Fundraising**,  
- Access to **favorable financing resources**,  
- Incubator also helps the entrepreneurs with **finding the sources** of their project financing.

5. **Other services**

**A) Marketing help**

- **Commercialization of the innovation**,  
- **Enhancing competitiveness and entrepreneurial climate**,  
- Consulting services and advisory in field of **promotion and public relation**,  
- Providing **logistical services**,
Shortening tenants’ time to market,
Milestone setting and performance targeting,
To assure the fast access and visibility,
Providing local visibility of emerging business,
Assistance with the registration of business organizations,
Organization and carrying out advertising campaign,
Provides services in consumer protection,
Promotion of the authentic original national product, services, and technology,
Attraction of the direct foreign investments,
Assistance with export.

B) Technical services

- laboratory services, instruments,
- or even research services.

Some business incubators do not provide this type of services at all, due to their specific profile, but in some other cases, e.g. biotechnology incubators, laboratory services, instruments, or even research services, which are also frequently outsourced, can be provided by the business incubator. In these organisations an important incentive for the establishment of the business incubator is that the instrument needs of the activity are significant and also very expensive, with indispensable instruments only used by the given company in a fraction of the total time invested. In such cases, time-shared operation is the most cost-efficient solution, whereby several clients of the business incubator may have access to the instruments on the basis of a previously established schedule.

C) Technological help

- Assistance with early engineering & prototype development,
- Quality management services,
- Provides technological services,

D) Security and insurance

- Security services – protection of the building by security service at night and at weekend, permanently by the camera and electronic security system,
- Provides insurance services.

E) Job creation

Question 4: HOW LONG INCUBATION PERIOD TO CHOOSE FOR TENANTS?

As for the national studies, the suggested length of the incubation period in the post socialist countries varies between few months and 5-7 years. Most of the countries set the upper limit to 5 years, saying that only specialized technology incubators (bio & nanotech) offer longer incubation period for the tenants (here the maximum is 7 years).

Table 1 shows the minimum, maximum, average and suggested incubation periods in the questioned countries.
Table 1: Incubation periods in the post-socialist countries

<table>
<thead>
<tr>
<th>Country/years</th>
<th>Character of tenant companies</th>
<th>minimum (yrs)</th>
<th>maximum (yrs)</th>
<th>average (yrs)</th>
<th>suggested max (yrs)</th>
</tr>
</thead>
<tbody>
<tr>
<td>Armenia</td>
<td>production</td>
<td>1</td>
<td>5</td>
<td>5.08</td>
<td></td>
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<tr>
<td></td>
<td>services</td>
<td></td>
<td>5</td>
<td>4.14</td>
<td></td>
</tr>
<tr>
<td>Croatia</td>
<td>academic</td>
<td>1</td>
<td>2</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>manufacturing</td>
<td>1</td>
<td>2</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>technology</td>
<td>2</td>
<td>4</td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>bio (nanotech)</td>
<td>5</td>
<td>7</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Georgia</td>
<td>production</td>
<td>12</td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td></td>
<td>services</td>
<td></td>
<td></td>
<td></td>
<td></td>
</tr>
<tr>
<td>Moldova</td>
<td>academic</td>
<td>1</td>
<td>2</td>
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<tr>
<td></td>
<td>manufacturing</td>
<td>2</td>
<td>4</td>
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<tr>
<td></td>
<td>technology</td>
<td>3</td>
<td>5</td>
<td></td>
<td></td>
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<tr>
<td></td>
<td>bio (nanotech)</td>
<td>5</td>
<td>7</td>
<td></td>
<td></td>
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<tr>
<td>Poland</td>
<td>production</td>
<td>3</td>
<td>5</td>
<td></td>
<td></td>
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<tr>
<td>Romania</td>
<td>production</td>
<td>0.2</td>
<td>5</td>
<td>3</td>
<td></td>
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<tr>
<td></td>
<td>services</td>
<td></td>
<td>5</td>
<td></td>
<td></td>
</tr>
<tr>
<td>Serbia</td>
<td>production</td>
<td>3</td>
<td>4 to 5</td>
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<tr>
<td>Slovakia</td>
<td>services</td>
<td></td>
<td>3</td>
<td></td>
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<tr>
<td>Slovenia</td>
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<td>3</td>
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<td></td>
<td>high tech</td>
<td>3</td>
<td>4</td>
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<tr>
<td>Turkey</td>
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<td>2</td>
<td>5</td>
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<tr>
<td>Ukraine</td>
<td></td>
<td>3</td>
<td>5</td>
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</table>

There is no thumb finger rule on the incubation period. Practices show that most often three years is considered the most optimal period of business incubation. Within that time the tenants are expected to win considerable market share which will enable them to become independent and lead their business operations successfully. Many countries use different time limits for the tenants that belong to different industries. The high tech companies can stay in the incubator for the longest time and the academic typed tenants have to leave the business incubators within the shortest period. There are countries (Croatia, Moldova and Slovenia) that use different time limits for the service companies and the producing tenants.

According to the studies we can point out the facts on which the incubation period depends. These are the following:

- **Owner of the incubator.** In Turkey the incubation period in the Public incubators Private incubators offer 2 to 5 years long incubation periods;
- **The character of tenant companies:**
  - In Slovenia the incubation period is 2-3 years for service businesses, 3-4 years for production businesses and 5-7 years for high-technology businesses (technology oriented businesses). This period should be flexible for an additional year if there are sufficient guarantees that this year would enable new company to start independent business elsewhere.
  - In Croatia the average incubation period for the tenants (in production) is 5.08 years; while the average incubation period for the tenants in services is 4.14 years.
  - In Hungary, the incubation period is at least one year and might last as long as three or four years. In practice, however, many companies even stay longer than that, and it is not easy to detach a company from the incubator’s favourable system of services.
  - In Moldova the academic incubators generally require 1 to 2 years; mixed use light manufacturing incubators generally require 2 to 4 years; technology incubators 3 to 5 years; and specialized technology incubators (bio & nanotech) generally take 5 to 7 years;
  - Poland suggests 3-5 years for incubation period. Usually Polish Incubators declare maximum 3 years. However in practice companies which stay longer are not rejected.
- **The space available to the incubator** (so new candidates should not wait for too long);
- **Demand for incubation services** which often exceeds supply and physical capacity of business incubators (existence of the waiting line for entering business incubator proves this fact) in some regions of Ukraine the term of business incubation constitutes 2 and sometimes only 1 year;
- **The availability of appropriate space to rent elsewhere** (in business zones, in the technology park). In some cases where no new candidate businesses would be available, the
incubation period could be prolonged in order not to have inactive spare premises in the incubator;

- The level of tenants’ development and gradual demand;
- Strategy,
- Life cycle of the industry,
- Targeted markets,
- Kind of services provided,

This question of time limit is particularly delicate because if a high company “death rate” occurs after the period of business incubation, the success of the process of business incubation itself will be brought into question. Therefore a dilemma persists: is three years too short or too long a period for the tenants to become independent and achieve success?

As it can be read in the Serbian study, a period of five years might be a more efficient solution. It is a typical medium term period for which, in management and planning, strategic and investment decisions can be made, actions undertaken and their effects perceived. A longer period of time in the incubator would make the tenants feel more secure and enable them to think in strategic terms in the longer run. There is, of course, the danger of inefficiency and ineffectiveness in the tenants’ performance. However, this can be prevented with an adequate system of control and continuous supervision of business performance. In addition, other possibilities exist, such as a combination of these, where the first exit from the incubator would be after three years, and in certain cases extension of duration would be possible with exit after 4 or 5 years.

**Question 5: HOW MANY INCUBATOR PLACE DO YOU NEED AND WHAT KIND OF FACILITY?**

It is obvious that business incubators are a rather costly element of the means available for enterprise development. In some cases, such as biotechnology incubators, such support to the foundation and launching of businesses is inescapable and also more efficient than any other method; however, from the perspective of an average enterprise, on the level of the entire society, it is only worth spending 1-2-4 years in a business incubator if the business incubator’s own costs can be reduced to a minimal level, e.g. the facility requires no expensive investment but can be solved by way of utilising an otherwise unused property.

Surveys by Canadian Business Incubators, during 2004, reveal that the average size of incubators (total space) in America is approximately 3,500 sq meters whereas in Europe is 3,010 sq meters. In America most incubators attempt to maintain an 85% occupancy rate which is similar to Europe.

The level of equipment provided primarily depends on the profile: where the needs of tenants can be satisfied with simple office services, and only an office (and common facilities on the corridor) need to be provided for them.

In case of enterprises building upon intellectual work, factors that need to be taken into consideration also include ensuring that the workers in the same room do not disturb each other, or make each other’s work altogether impossible, because of overcrowding. This means that experiences proved that 6 to 12 sq. metres need to be calculated for one person, including the desk and its accessories. Attention must also be paid to appropriate traffic routes even in case of these enterprises.

The national studies give us the information, that incubators should range at least 3000 sq meters, but at present, the practice often differs from the wishes:

1. In Croatia incubators are still quite young, with the potential to extend the location and facilities. On average, incubators in Croatia have got 1445 m² (min.100m²; max. 7000m²);
88% of the available space is occupied by tenants; and average number of the tenants is 11 (min. 4; max. 20).

2. The Polish study says, that minimum 3000 sq. meter is needed for a business incubator. This is a benchmark in Poland to enable self-financing for the incubator.

3. In Serbia, financial projections show that the minimum area for the Incubator should range from 4,000 – 5,000 m² at least in order to ensure the stable financing from our proper resources, i.e. through rent collection.

4. The Romanian study provides only number of tenants suitable as minimum for in average for 11 tenants.

5. Practice of implementation of business incubation programs in Ukraine demonstrates that for incubators focused on support of small business the area of a business incubator should exceed 1500 sq. meters (it desirable to build business incubators in a separate building with opportunity to expand to 2500-3000 sq. meters). At the same time general area of leased space should constitute not less than 80%. In practice total area of Ukrainian business incubators varies from 350 sq. meters to 2650 sq. meters.

The central question in determining the number of tenants is the question of viability, and we have to bear in mind that the incubators cannot survive without stable financial resources. Therefore, it is necessary, at the very start, to consider the range of potential financial resources where other services beside rent would be charged and thus existence and stability of the incubator ensured.

In case of enterprises where machinery with moving, rotating or cutting parts are used, a labour safety specialist must also be consulted in order to ensure optimum sizes. In case of such equipment, there are specific regulations in terms of what distances must be kept between these machines and routes of traffic or approach (which must be also indicated with painted floor signs of different colours); also, in case parts, tools or materials need to be delivered to the machines, the safety of these delivery routes must also be ensured.

The observance of labour protection rules is one of the most important issues for a business incubator, and it is also a service itself, since liability is divided between the entrepreneur using the area and the incubator centre consciously renting it out for this purpose. This is why abandoned parts of plants are frequently converted into incubator facilities.

Incubation place, location and a kind of facility has an important role in attracting particular type to the potential tenants. Public incubators are usually located in the areas that need to be revitalized. Private incubators are less location constrained. However, technology and science parks tend to be in the proximity to the universities and research institutes.

On the other side, due to the impact of the digital economy, incubation process is less and less constrained to the physical place. A number of digital businesses can be incubated without the physical walls in virtual incubators.

**Question 6: WHO ARE THE STAKEHOLDERS/LOCAL ALLIANCES OF THE BUSINESS INCUBATORS?**

Important success factor of the incubators are developing relationship with the local, regional, national (in some cases) even international environment. The most important stakeholders of the incubators are:

1. Government agencies,
2. Local authorities,
3. Research/Development/Academic centers,
4. Universities and R&D institutes,
5. Corporate businesses and commercial firms,
6. Trade Unions,
7. Business associations,
8. Investment foundations and agencies,
9. Financial intermediaries,
10. NGOs

Table 6.1 shows all the stakeholders mentioned in the national studies:

<table>
<thead>
<tr>
<th>Stakeholder/Country</th>
<th>Armenia</th>
<th>Croatia</th>
<th>Georgia</th>
<th>Moldova</th>
<th>Poland</th>
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Contrary to the American and Western European experiences, in CEE and CIS one rarely finds institutes of higher education among the founders of business incubators. The reason for this is that provisions of law had, for a long time, prohibited universities to participate in enterprising activities.

We also can get information about the **percentage distribution of the stakeholders** in the analyzed countries:

In **Croatia**, business incubators the local authorities are the most important stakeholders. Majority of the Croatian businesses are initiated by the local authorities, by local universities and institutions; or by public private partnerships. Business incubators are registered as limited liability companies.

In **Hungary**, founders of business incubators in the majority of cases are local governments, since they are in possession of the properties (or the right of use) where the business incubators can be founded. Among founders of business incubators we also frequently find the local enterprise development centres, the Hungarian Foundation for Enterprise Development – MVA -, enterprises, interest-representing or professional organisations, as well as organisations whose objectives include or relate to either business incubation or the profile of the planned incubator.

In **Romania**, most of stakeholders of the BIs are County Councils, Local Councils, Commerce and Industrial Chambers, patronage associations, agencies governmental and non-governmental, universities and the business community, universities, research institutes and domain ministries. Only in few cases there are individual natural persons, as inventors or natural independent persons. one BI
there are as stakeholders The National Research – Development Institute for Metals and Radioactive Resources, Bucharest University and National Company of Pit coal.

In Slovakia, the stakeholders are municipalities, commercial firms, business and innovation centres, regional and developing agencies, universities, the Slovak Chamber for Industry and Commerce, and the Slovak Trade Chamber.

In Slovenia, the ownership of the BIs is similar to Slovak, plus financial institutions (local commercial banks, funds) in order to ease the access to financial resources etc.

In Ukraine, 20% of the incubators of the BIs referred to as classical were created by universities and scientific and research institutes or have close connections with them. 20% were established with participation of local authorities and operate under their patronage, while 60% were created on the initiative of business community. In terms of organizations providing range of services, which cannot be considered complete in classical understanding of BI we can say, that rate of NGOs working in the sphere of business incubations would make up over 80%. Thus they work without support of governmental and local authorities being not truly commercial projects and at the same time they manage to solve urgent problems of business establishment and development.

In Serbia, the Government with technical and financial assistance of the Government of Norway has been launched the business incubation development project. Like in case of the BIC in Nis. The most important stakeholders include SINTEF implementing the project, the City of Nis (co-owner with 51%), Regional Centre for Development of Small and Medium Enterprises (co-owner with 49%).

**Question 7: HOW TO FINANCE BUSINESS INCUBATORS?**

Financing is one of the crucial issue for the success and sustainability of any BI. While discussions this issue we have to distinguish two phases of financing a BI:

(i) Financing the establishment of a BI
(ii) Financing the long-term operation of a BI

While designing the establishment of any BI these issue should be taken into consideration. National and international sponsors are eager to provide technical and financial assistance for the establishment of this business service institutions. Even in case of the most suitable and adequate project it may happen that the sponsor runs out of sources, or reduces the financing of the project for reason. The revenues received from the tenants usually covers only a part of the total operation costs, so the budget, therefore, constantly need financing from external sources.

1. Finance. From creation to operational activity:

The question of finances is certainly one of the most delicate issues of the entire project of the process of business incubation in most of the countries. The survival, prospects, growth and development of business incubators depend on the stability and vitality of financial resources.

In general, it is possible to name two stages of financing business incubators: at the stage of creation and at the stage of operational activity.

A) The stage of creation

At the stage of creation most of the incubators are financed by technical assistance programs and donor money.

International donations are of particular important of financial resources for BI in the transition economies. It does not cover only financial assistance, but also of knowledge and experience
(which, of course, have their own financial dimension) of how to start and successfully conduct these processes.

One more source of financing business incubators is grant money, which is rendered to business incubators for implementation of training programs, strengthening infrastructure, development of additional services by local and international donors. However every year share of grant money decreases as well as the number of donor organizations offering grants in the sphere of support of entrepreneurship and innovations.

The possibility of establishing private incubators should be anticipated as one of the alternatives. In that case private investors (domestic as well as foreign) would be allowed to invest their capital. Two modules should be allowed (i) combined financing - state and private (for example, from international donations or resources of national and local authorities on the one hand and private investors on the other), and (ii) purely privately financed incubators.

Last but not least, the financial intermediaries could also be involved in establishment of business incubator, especially example venture capital firms, business angel networks - or private equity funds.

Studies of the different countries inform us about the following facts:

In Armenia, the existing business incubator and two techno-parks functioning so far are still being mainly financed by the support organizations (international donor organizations, state support and so on).

In Hungary, in fortunate cases, a business incubator is supported by a stable financing background. The tendencies of donor policies generally determine whether they prefer to finance projects or successful organisations. In Hungary, project financing has come to the foreground in recent years, which is unfavorable for business incubators, since it renders their business operation less certain.

In Poland, external funding at the beginning is from: local authorities, Polish government, and foreign aid programs. These sources are given for the feasibility study, business plan, starting of operations. After accession to EU private investors have started financing of Business Incubators. They just can get subsidiary financing from Structural Funds. Starting from late ‘90es crucial funding in Poland comes from EU projects.

In the Republic of Moldova funding comes from:
- Public sector 50%
- International agencies 20%
- Private sector 10%
- R&D centers 5%
- Other 15%

In Romania, the source of funding are: subsidies – EU and other international agencies, national authorities and public agencies, payments from banks and other private sector organizations, payments from universities (INFRATECH) and other R&D organizations, rental income and other incubator charges, service contracts, investment income other sources.

In Ukraine, the resources were provided for repairing the apartments, the creation of infrastructure of the BI, purchase of office equipment and furniture, training of personnel. None of first pilot business incubators had ever had or have now their own building and apartments at their property. In cases when with support of local authorities or founding members it became possible to get these facilities either for free use (Slavutych) or at lease on preferential terms (Bila Tserkva, Lviv, Kharkiv), then not only launch of activity, but also further development of business incubators became possibly successful in the forecast.
B) The stage of operational activity

Business incubators have own financial resources too. Those are in the first place cash flow from collecting money for rent and various other services. The greater is the number of services, the more financial resources there are. Diversification of financial resources will be an issue of high priority for the management of any business incubator. However, due to a specific mission of lessening the administrative cost for new ventures; and due to the limited financial resources of the new ventures, public incubators tend to increase the number of tenants, rather than the value of the revenues generated from one tenant.

One has to bear in mind that the services do not have to be offered to the tenants only, but to external users as well, which can increase financial flexibility and the power of the incubator itself.

At the stage of operation the financial sources in the different countries are the following:

In **Croatia** two main sources of incubators revenues are government and local administration grants; and rental services (see figure below).

![Figure: Frequency of the financial sources in financing incubators](image)

In **Hungary**, project financing has come to the foreground in recent years, which is unfavourable for business incubators, since it renders their business operation less certain.

In the **Republic of Moldova**, generally, operating funding for incubators come from:

- Rental income: 40%
- Public subsidies: 30%
- Service contracts: 10%
- International agencies: 10%
- R&D centres: 5%
- Private sector: 5%

In **Romania**, the that the main finance resources are from rental income, private consulting, special services, governmental or local contribution, from training activities, from national or international projects, and subsidies. The source of funding are:

- subsidies – EU and other international agencies,
- national authorities and public agencies,
- payments from banks and other private sector organizations,
- payments from universities (INFRATECH) and other R&D organizations,
- rental income and other incubator charges,
- service contracts,
- investment income other sources.
In the Republic of Serbia, permanent lack of financial assets in budgets of central as well as local authorities limits considerably their more active involvement into financing the process of business incubation. (After considering the potentials for development and positive results of the first pilot project of BIC in Nis we can expect a more active involvement of the central and local authorities in providing premises, technical, institutional and even financial preconditions to stimulate a more intensive development of business incubators throughout Serbia.)

In Ukraine, as a rule at the stage of operational activity main sources of financing of business incubators are resources, obtained from principal economic activity (rent, payments for basic and consulting services, payments for training of personnel of client companies etc.). Important source of co-financing is participation in implementation on the basis of BI of programs for business support, which are financed from the local budget. These can be programs aimed at providing self-employment of the unemployed by training and rendering assistance in creating private enterprises, which are financed by local employment centers. One more possible variant is remuneration of work of consultants working in BI within priority directions for the territory from the local budget. Such practice for Ukraininan business incubators is rather an exception than the rule. Share of financial support from the side of local authorities is small.

As a conclusion, we can agree that:

Business incubators are institutions to facilitate the local/regional economic development. To operate in this function, their finances should include:

- budget resources (regional or national budget) to provide for the premises,
- local (municipality) budget to support promotional activities,
- international donations,
- grants,
- rents from the space offered to tenant businesses,
- revenues from business services provided to tenant businesses or other clients
- private money.

Question 8: HOW TO CREATE CLUSTERS AND NETWORK OF ENTERPRISES?

Business incubators and clusters differ in many respects. It is very rarely important for a cluster to appear in a shared property or to use a common business model. Clusters are usually alliances of already operating, independent companies, while in case of business incubators companies first settle in and the process of cluster formation begins subsequently.

Clusters and networks are alliances of enterprises operating close to each other, in the same sector, and their objective is to enable the individual companies, by way of purchasing their inputs and/or selling their outputs together, to specialize, to develop technological capabilities, to adapt to the market demands, to build upon their innovative activities, and to improve their competitiveness. The basic idea behind both clusters and networks is that enterprises that are otherwise competing with each other are able to find a form of mutual cooperation, a dynamic balance between competing and working with each other, placing mutual interests into the foreground.

Business incubators have some things in common with clusters and networks inasmuch that they require external assistance, but:

- in case of business incubators, it is the supported inputs that are shared,
- while in case of clusters, the outputs (products or services) are apparently similar.

Yet another important difference is that incubation is usually fixed to a location, and presupposes enterprises located in a larger complex of buildings or conterminous premises, while
businesses in the same cluster may be geographically more dispersed, although they are usually from the same, well-definable region.

**Entrepreneurial clusters** are sets of enterprises in a loose, casual relationship with one another that enter into case-by-case alliances in their purchasing, value-production and sales strategies. Clusters are keys to creating favorable business environments for developing businesses. They help by creating critical masses, pooling resources, finding partners, sharing knowledge and even sharing resources. In developing countries they can be important in speeding up change and stimulating privatization.

A cluster has members, which are typically companies and institutions, while the cluster organisation is usually a non-profit organisation consisting of a few persons only, for example an association, which operates partly from members’ fees and partly from state subsidies. **Members of clusters** may be not only small enterprises but also administrative, research and non-profit organisations, as well as big companies interested in organised forms of cooperation. Enterprises vertically related to the participating companies also often become associated members of clusters: on the input side these may be suppliers, while on the output side they are marketing or purchasing companies. The majority of clusters are defined by either a profession/field or by a region, in some cases by both.

In creating clusters the existence of danger of **potential problems among entrepreneurs** should be kept in view. Namely, experience of particular countries shows that in the initial stages of development certain tensions and unfair competition may occur among members of clusters. Therefore, information, training and education should be worked on in order to build the sense of communal benefits of all members. The very concept of business incubators can represent one of the alternatives which would precede the creation of clusters.

**FROM THE BUSINESS INCUBATOR TO THE CLUSTER**

Active participation between the incubated and associated enterprises often emerges around business incubators. The level of cooperation over a certain level already justifies calling these enterprising networks. A business incubator actively supporting cooperation between its tenants and with external companies/institutions, therefore, can be considered an institutionalizing form an enterprising network.

**Contacts** among entrepreneurs within the walls of the business incubators as well as with external entities give them opportunity to become effective factor of development. It is here where assistance in establishing the network of client companies of the business incubators is one of important parts of activity of business incubators.

**Location** of client companies under one “roof” provides unique opportunities not only for sharing information but for establishing mutually beneficial cooperation. One more fact that contributes to the process is that clients of the business incubators are people with similar mentality, typical for start-ups problems. Close neighborhood facilitates not only establishment of cooperation for every participant but also control of execution of agreement. Such cooperation may be occasional, when for example one company may render equipment to another company for execution of urgent works. It can also be long-term cooperation stipulating for placing orders for execution of part of work by the partner based on contract of supply of goods and services.

A mature business incubator has possibilities to assist establishment of external business contacts based on its authority and business relationships for establishing contacts of the business incubators’ clients with local businesses. Activity in this direction may include organization of presentations of client enterprises and exhibitions of their products for local business community, issue of catalogues of products, promotion of products and services of client enterprises through Internet. Graduates of business incubators play significant role in establishment of the network of enterprises. This role lies in rendering assistance to BI clients, which is not limited by financial help. For example
they may help enterprises in promotion of their products and services at the local market, render assistance in search of outlets and business partners, share their experience and provide opportunities for training personnel.

Importance of network interaction among business incubators, their clients not only at regional level, but also at interregional level is a very urgent issue. In Ukraine since 2003 on the initiative of Ukrainian Business Incubators and Innovation Centers Association establishment of interregional information and communication network of business incubators and centers for entrepreneurship support was launched. Operation of this network which works in close contact with local administration, unions and associations of enterprises as well as with everyone interested in establishment of interregional economic relations is focused on:

- creation of conditions for effective change of information, knowledge and practices within the business incubators’ network,
- assistance in development of cooperation among client companies within the business incubators’ network,
- enhancing business efficiency with use of ICT,
- expansion of the range of services owing to introduction in business incubators specialized (ICT) services for clients such as e-marketing, and providing enterprises with opportunities of starting e-business.

Creating clusters

In the places which are state or community property in the first stage of creation of the cluster it is necessary:

- To give privileges for buying or renting places in the cluster,
- To provide necessary suitable good-working activity of the infrastructure (roads, communications, electricity, water and so on),
- Networks and clusters need promotion and external support at the early stage of development.

The following steps are required:

- Collaboration of many actors: regional and local authorities, enterprises – suppliers, manufacturers, logistic, quality management, clients, R&D, business support organizations,
- Changes in mentality towards understanding and supporting cluster concept and operations,
- Sector studies and analysis,
- Common goals recognition, tasks settlement,
- Linking opportunity and capacity,
- Attracting cluster partners,
- Training on clusters,
- Development of the broker institution managing the cluster,
- Strong leader of the cluster,
- Development of the appropriate and effective network structure,
- Promotion of the cluster,
- Data base,
- Financing of the mutual projects: products, fairs and exhibitions, international cooperation.

Recommended steps in the developing of clusters are:

- Identify, analyze and classify existing small businesses with similar characteristics, suppliers and work forces,
- Analyze successful clusters to determine their factors of success,
- Develop cooperation agreements between competing and complimentary small business with an objective of win-win,
➢ Develop programs to assist these businesses to share resources, information and new knowledge bases,
➢ Develop programs to assist local authorities to better understand the infrastructure needs of these clusters and improve their support to them.

Experiences in cluster creation

The Hungarian National Expert highlights, that it is very rarely important for a cluster to appear in a shared property or to use a common business model. Clusters are usually alliances of already operating, independent companies, while in case of business incubators companies first settle in and the process of cluster formation begins subsequently. This process, as well as the relationship between clusters and business incubators are analysed in detail, relying on significant empirical findings, in the research project titled “Business Incubators in Hungary” (coordinated by the Association of Business Incubators and SEED Enterprise Development Foundation; the closing study written by Judit Dobák, Péter Futó, Kutor Susan and Pál Lányi; supervised by Anikó Soltész).

In Poland, networks and clusters need promotion and external support at the early stage of development. The following steps are required:

- Collaboration of many actors: regional and local authorities, enterprises – suppliers, manufacturers, logistic, quality management, clients, R&D, business support organizations,
- Changes in mentality towards understanding and supporting cluster concept and operations
- Sector studies and analysis
- Common goals recognition, tasks settlement
- Linking Opportunity and Capacity
- Attracting cluster partners
- Training on clusters
- Development of the broker institution managing the cluster
- Strong Leader of the cluster
- Development of the appropriate and effective network structure
- Promotion of the cluster
- Data base
- Financing of the mutual projects: products, fairs and exhibitions, international cooperation,

Managements of BI/STP develop manufacturing networks asking tenants and clients to join their efforts to implement activities which are too difficult for single company: common products development, fair and exhibitions, marketing, training, exchange of information, updated information on technology, cooperation between small and large companies, etc. Sharing costs and making many activities more cost effective make clusters interesting for BI/STP tenants and clients. In the region with specialized industry profile Polish Government offers grants for training on clusters, operational expenses of cluster management, mutual events, promotion, etc.

The Slovenian experience with the clustering process started in 1999 when the national government created an active industrial policy changing the development concept from assisting the ailing companies towards supporting “development champions”, mostly networks and clusters. In 1999, a research project studied the feasibility of the clustering process, involving 1700 firms. The findings were as following:

- identified potential clusters in Slovenia without strong geographic concentration. The potential member firms were dispersed over the whole territory of Slovenia,
- only weak relationships were already in existence among these firms, potential members,
- identified, that production / service systems lacked the “critical mass” of resources (companies),
- the infrastructure for networks / clusters was only partly existing.
- There were no real clusters in existence at that time, however, in some activities there were capabilities and potentials to create a cluster. Ministry of Economy supported
clustering through the concept of sharing some financial support with the resources of companies (tenders in 2001, 2002, 2003-2004).

In 2001, the three pilot projects started:
- the **automotive cluster** (with some large companies and a number of smaller companies (currently 50 members with 17,162 employees; already 32 projects)
- the **tool-making cluster** (currently 27 members with 1,670 employees, 31 projects accomplished),
- the **cluster in transport and logistics** (with Port of Koper and a number of transport companies, currently 15 members with 14,340 employees, 28 projects).

In 2002 further 8 cluster initiatives started and new clusters were added in 2003, focused on specific activities (in production and services) or technology areas. These clusters include:
- producers of high-technology equipment,
- cluster on climatisation, heating and cooling equipment,
- cluster Plasttechnics, producers of products from plastic and other chemical fibres,
- clusters of service providers in surveying and other geo-research activities,
- cluster of wood-processing firms,
- cluster in IT (information technology),
- ecological cluster,
- cluster for sustainable energy and ecology,
- cluster of smaller hotels,
- cluster for long-distance energy providers,
- congress cluster,
- innovative textile cluster,
- cluster of construction companies.

Government supported clusters with 30-40 % of financial sources through two stages:
- **Stage 1.** Preparation work on new initiatives for clustering: preparing the cluster strategy, internal communication setting, preparation of research and development projects,
- **Stage 2.** Support in the early operation of the cluster, developing the joint research infrastructure (office of the cluster, research centre) and implementation of joint R&D projects.

In 2005, the new government decided to support the implementation of cluster projects. It will not support the creation of new clusters (the potential for successful clusters deemed exhausted) but specific R&D projects in existing clusters could be supported according to the EU rules. In the period of 2001-2004 government provided the financial support of some 8.7 Million Euro to 60 projects of different clusters.

Also, at the regional level there were additional projects of “micro-clustering”, developing smaller, geographically concentrated clusters in tourism, agricultural production and other activities. JAPTI (then PCMG) supported these clustering initiatives with counselling and financial support.

**Question 9: HOW TO SELECT THE BEST POSSIBLE INCUBATOR MANAGER?**

The business incubators management is one of the most important factors in assurance of the success on long term. The management team has to determine the purpose of the incubator. The ability of management team on creating and maintaining a positive business environment and necessary culture on long term are the key factors. The team management has to be selected before starting the activity of BI in order to assure coherent and unitary rules for all BI clients.
The manager (project manager) of a business incubator is usually selected based on open competition from applicants. It is not easy to find a good manager; however the whole success of the business incubator largely depends on the fitness of the given person for the job.

Business incubators may have different purposes, among which the following are the most important tasks:

- Establishment of start/up companies;
- Job creation;
- Development of innovative ideas into marketable products and services;
- Management of technology transfer;
- Business incubators can also be created for specific purposes, such as helping youth, women, minorities and disable entrepreneurs.

Some further aims and tasks of the incubator management can be identifies as:

- Assist the economic development and growth of the region;
- Diversification of the regions’s industry and service sector;
- Contribute to the multiplication of the sponsor’s investment;
- Fight against unemployment by job creation.

The management of a business incubator, even though it does not generally require a big staff, is a team effort, and the manager has to be able to unite and supervise the work of the team. The manager is also “the face of the incubator”, which means that he or she has to have good PR capabilities and skills, as well as contacts. One of the most important expectations within is excellent ability to establish personal rapport and contact, since the entrepreneurs are often “difficult” people, with whom it is not easy in any case to establish a trouble free working relationship.

Managers of business incubators must have a fair level of economic knowledge, since they would lose their credibility in the eyes of the tenants, if they were unable to answer basic questions, or would know less about the market and thinking in terms of the market than those whom they wish to help. For the same reason, over-the-average empathetic skills, wanting and being able to understand the ideas and positions of partners is also important. In addition, since the enterprise is in need of supplemental sources, the business incubator manager must be good at writing grant applications.

**THUMB FINGER RULE**

The CEO or Head of the business incubator must be a good Entrepreneur/Manager. Avoid to nominate a defeated politics as incubator manager.

Management is evaluated and appointed by the Supervisory board. Managers of the Croatian incubators are well educated (economic, engineering, masters, even two Ph. D. degrees), minority of them have got entrepreneurial background (4/16). Half of the incubators are managed by male and other half by female managers.

**Roles of the manager**

The responsibilities of the manager include:

- the daily operations of the incubator,
- the monthly budget management,
- recommendations on the admissions & exits of entrepreneurs,
- training and networking of the entrepreneurs,
- selection and coordination of the mentorship team,
- monitoring the progress of the incubating companies,
- facilitation of the acquisition of funds for the incubating companies.
It is viewed as paramount that this person comes from the private sector, is none public sector senior administrator, and understands the entrepreneur and their desire to work in a creative and dynamic environment.

**Skills, experience**

The best possible incubator manager must be the person who has:

- Years of experience in program/project planning, management and implementation including financial management.
- Excellent knowledge of the political and economic environment at the duty station;
- Excellent analytical capability to recognize effects of decisions;
- Excellent organizational and communication skills with the ability to self-motivate and to be pro-active;
- Ability to work as a team member;
- Knows well the main difficulties of the business developing.
- Knows the main barriers of start-ups.

First of all the ideal manager should be devoted to mission of his business incubator, be concerned with success of each company, assist in solving problems which appear in front of start-ups. In order to efficiently perform these functions he needs to have wide range of up-to-date knowledge and skills in business sphere, have his own experience in entrepreneurial activity. At least it is desirable that the manager could act as a consultant in basic business issues like: how to start a company (knowledge of basic legislative and regulatory acts), how to prepare business proposal and how to develop a business plan, what requirements and procedure of financial accounting of enterprises are etc.

In addition to the usual criteria, there is one additional requirement that makes finding the best applicants a more difficult task, which is **proficiency in foreign languages**, as a basic requirement. It is less and less acceptable for the manager of a business incubator not to speak, apart from his mother language, also English, and in some cases also another foreign language.

**Choosing the manager**

In the process of selecting the best possible management for business incubators the central part belongs to correctly defined standards and criteria which should be consistently applied later. The founders, i.e. the owners of the incubator should play a particularly important part in the process. The selection method itself depends largely on the ownership structure of the incubator and the financial resources. However, regardless of that, it is necessary to take into account the requirements of the contemporary human resources management, i.e. to attract a larger number of high-quality candidates, perform a selection and choose the best and provide them with further professional improvement and development.

Assuming that there are three major financial resources (international donations, national state resources and private investors’ assets) it is possible to distinguish three different approaches to this issue:

- If business incubators are financed mainly from international resources (for example donations) it is indispensable to ensure active participation of representatives of international institutions in all stages of the selection process. Certain difficulties can arise if there is a combination of international and national state resources.
- If establishing the incubator is stimulated by the state with its efforts and financial assets, significant problems can arise in the selection process. For example, for the first business incubator in Serbia – BIC in Nis the selection was performed by the Board of Directors following a public call. The legal procedure was strictly followed and a young and ambitious manager was chosen. However, the specific ownership structure, where the participation of the local authorities dominates, emphasized certain weaknesses. In fact, the director of BIC was not chosen but appointed by the political structures in power in the City of Nis. In Serbia (and it is certainly not the only country in the region) a powerful impact of politics on social and economic life is still present. In the circumstances when
state authorities have a considerable part in ownership of the business incubator, there is the danger of appointing a politically fit manager instead of selecting the most competent one. For example, the problem in Nis can escalate if the local power changes after the next elections. The question is whether they should replace the successful BIC manager and appoint a candidate who is loyal to them. In order to overcome the potential problems it is necessary to define beforehand the high criteria which would include the candidate’s adequate education level, professional experience (particularly in the field of private business), presentation of the operational program and obligatory non-membership of any political party.

In the case of private business incubators the problem of selecting the best managers is less marked and the risk of wrong choice is left over to the founders and investors. By definition, they will want to choose the best and the most skilled managers who will ensure normal business operations, growth and development of the incubator.

Business incubators’ management’s responsibilities cover such a broad spectrum of areas that it is almost impossible to find someone who possesses all the skills necessary to manage such facility and attendant business development program.

That problem could be overcome by hiring more than one person to manage the incubator, each with a different set of skills, but it is difficult to pass this increased overhead costs on to the tenants without pricing the facility beyond their means. For this reason most incubators operate with one manager who is expected to either have one or be able to acquire the skills to manage the real estate, both physically and financially, and supply business assistance to the tenants firms.

Incubators in Croatia typically engage management staff using standard professional selection criteria. Majority of the business incubators have got management boards of 1.88 persons; average management staff is 3.31 persons. Management staff usually includes:

- manager,
- administrator (professional consultant for legal, accounting, insurance, and finance)
- receptionist.

Different approaches were used in Slovenia:

- selecting the manager from the existing staff (mostly from R&D departments),
- selecting on the basis of personal knowledge of an appropriate person and
- public tender to get to a number of candidate and selecting among them on some pre-defined criteria (also part of the tender)

Poland has been trying to address the challenge of selecting the best manager in Poland by professional development framework for the incubator managers, management trainings for current and potential BIC managers and developers, but more importantly by encouraging project managers to seek out and collaborate with other skilled service providers in the community so that the manager can focus on areas where he/she has some competence while building a network of business assistance.

The Polish study says, that if the manager has been selected in an open community-wide competition on the basis of his or her qualifications, then the job is seen to be a professional job rather than a political appointment. The manager chosen by means of competition often seems more confident and secure and as a result more open to encouraging teamwork among the staff and collaborating with others. They have adopted this process of managers selection as their recommended and required method of manager selection.
**Question 10: HOW TO SELECT THE BUSINESS INCUBATOR SUPERVISORY BOARD?**

The supervisory board of the business incubator is usually appointed by the founders, and its task and aim is to safeguard the implementation of the founders’ intentions. This also means that in these supervisory boards professional participation is less frequent, and the commitment of the members of the supervisory board toward their delegating organisations is more important. Experiences show that the delegating organisations often appoint such persons for the supervisory boards who, whose professional or scientific reputation guarantees that they would be able to oversee the activity of the business incubator, and whose evaluation would be clear and reliable.

Supervisory board consult, evaluate and control management staff of the incubator and their performances, and in most cases participate in all important and strategic decision of the incubator. The members of the supervisory boards usually reflect the stakeholder structure in the incubator equity. Members of the board usually represent local authorities, business organizations, community organizations, local educational institutions.

**Number of the board members:**

The studies agree, that the incubation supervisory board should be made up of no more than 10 members. In the Croatian incubators the supervisory boards usually consist of 3-5 persons, who perform their roles during the 4 years time span, after which they can be reelected or exit the board. The Moldovan study suggests up to 8 members plus a voting chair. The Polish suggest a minimal level and a maximum, too (3 to 10 members).

Recommendations for the **members of the supervisory board** are the following:

- Representatives of local authorities (responsible for development of entrepreneurship and innovations),
- Members of Chamber of Commerce business development committee,
- Local labor association members,
- Representatives of controlling units (tax inspection, fire prevention inspection etc.),
- Representatives of financial and credit institutions, leasing companies, local bank representative in charge of small business loans,
- Representatives of NGOs dealing with entrepreneurship issues,
- Successful entrepreneurs and representatives of big business,
- Members of small business association,
- Members of university faculty in charge of small business program,
- Members of university in charge of continuing education,
- Representatives of consulting and auditing companies, members of local venture forum,
- The owner/owners of business incubator,
- Presenters of the beneficiary (presenters of tenants).

They are all protecting the interests of their organizations, but also must protect the idea and issues of business incubator.

**Supervisory Board on operation**

For the effective operation of the Board the following suggestions can be really useful:

- Make the creation of BI policy main task of the board,
- Make external obligations be an important duty of the board. Let BI manager focus mainly on internal problems,
- Develop procedures for eliminating not effective and destructive member of the board,
- Develop effective system of information flow,
- Make optimum number of the board members – not less and not more. Say 3 to 10 members. If for any reason number is bigger make the Executive Presidium. You can also work with other than members of the board professionals within working groups,
- Develop procedures for changing, or replacing members of the board in the process of BI development,
It is advisable that the presenters of the beneficiary (presenters of tenants) participate in meetings of supervisory board by the schema of rotation.

As for the functions and objectives of coordinating, the supervisory boards may vary in their comprehension, however most of the have important role in:

- Elaboration of the strategy of BI development and definition of priority directions of its activity.

**Question 11. HOW TO EVALUATE THE ACTIVITIES OF THE BUSINESS INCUBATORS, SCIENCE AND TECHNOPARKS?**

**Indicators’ impacts**

Incubator development is a long-term project and process. Five to ten years may be necessary to achieve a real local or regional impact.

**Impacts** of the business incubators are multifold:

1. **Economic**: incubators provide protected environment for the most vulnerable phase of the venture development.
   The most important benefits are:
   - Lower failure rate among new businesses,
   - Higher survival rate of the new businesses,
   - Faster product development,
   - Shorter time to market,
   - Lower unemployment rate,
   - Increase in local community development opportunities and activity,
   - Greater visibility of the new venture under the incubator brand name.

2. **Social**: incubators develop communities based on trust, collaborations, and promote enterprising social and cultural norms and learning environment, creating strong norms, expectation and responsibility among local community.

3. **Political**: incubators are usually part of the policy scheme targeting underdeveloped regions of the country, socially excluded or disadvantaged persons (young, females, minorities). Economic and social impacts generate also certain political gains and are sometimes used for promotion of the particular political options.

   Evaluation is a key to successful incubation. The purpose is to assure the incubator stakeholders that the project is meeting its objectives in an effective and efficient manner. Measurements of effectiveness and efficiency from the individual incubators should be compared to other incubators of similar nature both locally and internationally. Specifically measurements should be taken to determine if the incubator is meeting the objectives of the stakeholders.

**Measuring efficiency**

There are number of indicators for evaluation the business incubators, science and techno – parks. **Suggested measurements** are:

1. **Financial measurements**
   - Incubator cost (capital & operating) per start up,
   - Break-even (income less operating costs),
   - The level of the profitability of the Business Incubator,
   - Rate of growth,
The high of value added,
The export capacity.

Control of work of client companies by the business incubator is performed in the interests of companies as well as in the interests of the BI. In particular the incubator needs this control in order to be confident, that companies do not violate existing legislation. The main form of control is control of financial activity of client companies. Companies on quarterly basis submit financial reports, prepared according to international accounting standards including profit and loss statement. This allows management of BI to analyze efficiency of the company, reveal “weak places” in its economic activity, advice on ways of improving the situation. At the same time receiving of information about current problems at the enterprise allows to work out ways of improving operation of the BI itself.

2. Measurements of operational activity
- The number of the tenants,
- Occupancy rate (space rented vs. total space available),
- Job creation per firm (number of full time jobs per firm),
- The duration of the incubation process,
- Quality of BI management, degree of infrastructure support,
- Annual graduation rate (tenants graduating over tenants staying),
- Survival rate. The number of successful and working firms, which left business incubator,
- Number of innovations and innovative projects which were initiated and implemented by companies,
- The willingness of the tenants function successfully out of Business Incubator,
- The achievements of the tenants after incubation process,
- The impact on market of incubated firms,
- Impact on community’s economic health by maximizing the success of emerging companies.

Conditions of executing control of enterprises are fixed in Agreement on Control of Operation between the enterprise and BI. This agreement testifies consent of the client for execution of such control and guarantees confidentiality of received information by BI.

3. Measurements of the services
- The demand for services of the Business Incubator,
- Petitions of incubated firms, concerning the quality and terms of services provides by BI,
- Clients’ satisfaction.

Monitoring of activity of graduate companies by the business incubator is performed on the basis of annual written questioning of companies in a simplified form, which at the same time reflects state of development of the company, number of jobs created at the enterprise and allows to assess efficiency of its operation.

The activities of these institutions should be monitored and evaluated:
- Annually, on the basis of their annual report to be discussed at the Program Committee, Supervisory Board and the Assembly of Shareholders,
- On the basis of some independent professional evaluation (usually for some 2-3-years period).

Their evaluation should follow some concepts of the balanced scorecard approach, including:
- The evaluation of their promotion of entrepreneurship and enterprising culture in the community (the assessment of activities),
- The direct results in terms of the number of initiatives discussed, business plans assessed, new tenant businesses accepted, the performance of the tenant businesses
(survival rate, number of jobs, other performance parameters – revenues, profits, investments, exports, new products and services developed etc.),

- The development of the institution: internal professional growth of the staff, development of premises and equipment etc.

**Indicators showing the efficiency**

The following indicators show that the Business Incubators/Science and Technology Parks work effectively:

- BI/STP is a **dynamic model** of a sustainable efficient business operation,
- BI/STP has **obtained consensus on a mission** that defines its role in the community and **has developed a strategic plan** that contains quantifiable objectives to achieve the program mission,
- BI/STP has **effective board of directors** committed to the incubator’s mission and to maximizing management’s role in developing successful companies,
- BI/STP has recruited and appropriately compensates **management capable of achieving the mission** of the incubator and having the ability to help companies grow,
- BI/STP has **prioritized management time** to place greatest emphasis on client assistance, including proactive advising and guidance that will result in company success and wealth creation,
- BI/STP has **developed and Incubator/STP facilitate, resources, methods and tools** that contribute to the affective delivery of business assistance to client firms and that addresses the developmental needs of each company,
- **Seeks integrate the Incubator/STP program and activities** into the fabric of the community and its broader economic development goals and strategies,
- **Is supported by stakeholders**, including a resource network, that helps the incubation program’s client companies and support the Incubator/STP mission and operations,
- **Maintains the management information system and collects statistics** and other information for on-going program evaluation, improving effectiveness and evolving with the needs of the Incubator/STP and its clients,
- **Occupation rate** of BI. Regarding this issue, it has to be kept the registrations about monthly and annual rates of occupation, types of clients, stakeholders and employees profile. It is also important to analyze the clients which were successful during the incubation period.

**Evaluation in the context of enterprise development policy**

Business incubators, science and techno parks should never be evaluated outside the context of the enterprise development policy. On the one hand, we can find many business incubators, which are essentially market- and profit-oriented enterprises, and their main activities are real estate development, utilisation and renting Other organisations, however, are supported, non-profit organisations themselves, whose most important task is to forward the support they receive, with the best possible efficiency, to the incubated enterprises. A common element in different business incubators is that they try to resolve some pressing bottleneck in the region, whether it be the expansion of employment, scientific and technological development, sometimes research, innovation, or the most efficient utilisation of the human and other resources of the region.

In the course of the evaluation, therefore, the objectives and tasks for which the organisation must be taken into consideration, just as the issue of what expenditures are necessary to achieve these (or not to achieve them); on the other hand, an important starting point for the evaluation may be the initial business plan of the incubator, since the comparison of the fact numbers with the plans is an important method of evaluation.
A special difficulty is posed by the evaluation of the activities, success and efficiency of the ever more frequent virtual incubators. This is because the clients of such virtual incubators are exposed to several other influences, and the package of services, the consultancy or other inputs are only a part of these influences. In such situations it is extremely difficult to determine what results are owing to the business incubator and what can be attributed to other influences.

**Question 12: WHAT ARE THE CRITERIA OF THE SUSTAINABILITY OF BUSINESS INCUBATORS, SCIENCE AND TECHNOPARKS?**

Due to the complexity and diversity of the business incubation initiatives, there is no single framework to assess performances and sustainability of the business incubators. However, three areas of the sustainability can be identified:

- **Performance outcomes (results of the incubator functioning),**
- **Effectiveness of management policies and practices (according to the organizational effectiveness approach the organization is effective if it accomplishes its stated goals, acquires needed resources; satisfies its constituencies, develops excellent internal processes and functioning),**
- **Services and value added.**

According to the national studies the success factors can be summarized according to the following criteria as following:

1. **Performance outcomes**
   - Sustainability by mission: effective network of partners and good governance; new local partnerships created,
   - Strong image and positioning in the local business environment,
   - Publicity generated.

2. **Effectiveness of Management policies and Practices**
   - New company attraction and retention,
   - Sustainability by motivation: learning organization, international aspects as incentives,
   - The pursuit of tenant, during the entire period of incubation.

3. **Services and their value added**
   - The performance of services provided by the business incubators. The feedback obtained, at regular intervals from their clients, concerning the efficiency of services provided, as those of consulting and rate of rents,
   - Entrepreneurial satisfaction levels,
   - The optimum administration of the common utilities,
   - Ability to render services to clients in permanent range,
   - Ability to expand range of services for clients,
   - Ability to increase quality of services and quality of management of the organization.

**Financial and developmental sustainability**

All the studies mention financial sustainability as one of the utmost important criteria. However, as we can read, several countries face with challenges concerning to this question.

**Country experiences:**

**Croatia**

The Croatian incubators perceive management effectiveness important and emphasize a dispersion of the financial sources as critical issue. At present, Croatian incubators are not self
sustainable due to the relative newness of the incubators as business institutions. Croatian incubators have reported 30 – 40% of the self financing as the most frequent level of self sustainability, the minimum is 10% and the maximum level of the self financing reported is 90% (only one incubator reported such a high self financing).

Impact of the incubators on the local communities and tenants, have significant social, intangible impact that can not be measured through usual cost-revenues schemes.

Furthermore, the majority of the incubators in Croatia are oriented toward broadening of the client base for services and value added. Recognizing weak financial purchasing power of the tenants, the managers are developing clients outside the incubator and are looking for the services they would sell to the business community; alumni (graduated) firms, businesses outside incubators, universities.

One of the most important tangible performance outcomes of the Croatian incubators are 77% survivability rate (mean value). Incubators in Croatia that participated in the study generated 79 new ventures and 61 ex tenants are successful and operational outside the incubator. In average, typical Croatian incubator has got 10,50 tenants; 5,64 graduated firms; and 4,36 of the graduated firms are still operational.

Hungary

Several Hungarian research projects have unanimously found (cf., for example, the study of SEED Foundation and the Association of Business Incubators) that the business incubators themselves are also of the opinion that they need continuous support, especially because they can only carry out their developments (such as investments in real estate, purchase of instruments, infrastructural developments or other investments) from supplementary external sources. It is not only the opinion of the parties concerned (who clearly find it more attractive if they are continuously sponsored than having to compete for resources on the market), but our own research findings also indicate that self-sustaining cannot be a basic criterion in case of business incubators. On the other hand, business incubators have to pursue a business policy whereby they can survive temporary reductions of external sources, gradually decrease their dependence on external funds, and ensure that some of their activities operate at least at the break-even point. To expect them to provide efficient incubation services and at the same time sustain themselves from its revenues on the market seems unrealistic, however. (In theory, it is possible for a business incubator to have appropriate revenues from the rent and other fees, since many of them are able to solve this problem, while also operating quite profitably from real estate developments.) However, if the profits are generated at the developing organisation, this is only possible if these profits are withdrawn from the incubated enterprises. This, however, cannot be the interest of a developing organisation. The Hungarian National Expert considers it a good model, and especially a good financing model, where the profits are generated not at the business incubator providing the services, but at the incubated enterprises in the form of cost-price or subsidised service fees.

Poland

(i) **Sustainability by mission**: effective network of partners and good governance
(ii) **Financial sustainability**: social venture capital at start and self-sustainable business model through mixed revenues sources (facility, training and consulting services)
(iii) **Sustainability by motivation**: learning organization, international aspects as incentives and 
(iv) **Strong image and positioning** in the local business environment

Republic of Serbia

In the initial stages of the *Serbian business incubators*, all possibilities for diversification of financial resources must be considered. In addition to collection of rent and other basic services, new services should be offered and additional investment attracted and this could be the solution to the problem. However, although this dimension is of the utmost importance it is not the only one since there is the dimension of development.
Romania
The Romanian National Experts evaluating the activity of a BI, the following aspects recommend to be taken into consideration:

(i) Occupation rate of BI. Regarding this issue, it has to be kept the registrations about monthly and annual rates of occupation, types of clients, stakeholders and employees profile. It is also important to analyse the clients which were successful during the incubation period;

(ii) Financial indicators regarding the profits, the incomes, costs, profitable rates;

(iii) Petitions of incubated firms, concerning the quality and terms of services provides by BI;

(iv) The impact on market of incubated firms.

Slovakia
The Slovak National Experts consider the main criterion is the financial sustainability of incubator activities, what also impacts the services structure. For self financing incubator is necessary to offer services appropriate for consumers, price is not determining. The specialization is asked. For less sophisticating services offered by incubator is necessary multi financing, which help to cover these subsidy. Techno incubators prefer the innovative technology firms.

Slovenia
The main success factors include

(i) The criteria of the sustainability should be predominantly financial, involving their capacity to finance their operations without the constant financial support from the budget (local / regional / national, international grants) but also to finance the development (new premises, improved facilities). The financial aspect should also include their capability to attract other (commercial) private investors (to finance rental premises), to attract financial institutions (venture capital funds, business angels, other investors) to support the growth of tenant businesses.

(ii) However, as development institutions they should also be assessed through their contribution to the economic development of their community.

(iii) The important element of their sustainability should be the extent of resources provided through their own activities (revenues from services rendered to tenant and other businesses). However, they should not be pushed into the commercial support activities in order to survive or they cease to function as development institutions.

(iv) Their sustainability should be partly provided through their work on different development projects for their community paid from the regional / national or international sources (development strategies, other papers on economic development in the community etc.).

Ukraine
It should be noted that under absence of systematical support by local authorities and state in Ukraine only few even out of the most successful business incubators (Slavutyh, Bila Tserkva) can count on further sustainable development with preserving and slow development of directions of the main activity. Thus if situation changes as to preferential terms of rent and functioning of these business incubators, impossibility of obtaining assistance from local and central authorities at the current minimum level these companies would have only two alternatives – either to transform into purely commercial enterprises (this may lead to loss of clients who hoped for certain preferential terms at the first stage of running business) or to reduce the volume of services they render to their clients (by refusing to lease apartments, reducing other services). All of this would limit their possibilities
including obtaining additional financing from donor organizations which as a rule connect criterion of sustainable development with interest of local community and authorities in assisting and supporting projects financed by them.

**Developmental sustainability** is closely connected to business success of the tenants themselves and survival of the incubator. Business incubators, science and technoparks must be an integral part of a wider institutional setting for supporting small and medium businesses. Regardless of form (non-profit institutions, partnership between state and non-profit institutions, private, integral part of a university, etc.), business incubators, science and technoparks must be linked with present economic needs and economic and developmental policy of the country. In the case of Serbia this dimension is particularly important if we bear in mind the present problems that the country is facing, like: high unemployment rate, low level of aggregate production, inefficiency of certain old large economic systems, low export and high import rate, structural economic problems, uneven economic development, technical and technological underdevelopment of the economy, etc. The concept of business incubators, science and technoparks can be of considerable help in solving some of the above mentioned problems. It can also bring about a range of advantages in the affirmation of entrepreneurship, innovation development, establishing new business standards, organizational culture, increasing business ethics level, and social responsibility of business. While considering the dimension of developmental sustainability not only financial models should be used but a wider concept of cost-benefit analysis which should include a range of indirect and intermediary effects on the country that are difficult to be measured.
### Annex 1.

**LIST OF EXPERTS PREPARING NATIONAL PRESENTATIONS**

<table>
<thead>
<tr>
<th>Name</th>
<th>Organization &amp; Title</th>
<th>Address</th>
<th>E-mail address</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>RSHTUN MARTIROSYAN</strong></td>
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</tr>
<tr>
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</tr>
<tr>
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</tr>
<tr>
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</tr>
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</tr>
<tr>
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<td>to be send via Nino Elizbarashvili to <a href="mailto:wbus@caucasus.net">wbus@caucasus.net</a></td>
</tr>
<tr>
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</tr>
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</tr>
<tr>
<td>Name</td>
<td>Title</td>
<td>Address</td>
<td>Email Address</td>
</tr>
<tr>
<td>-----------------------</td>
<td>-----------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------</td>
<td>--------------------------------------------------------------------------------</td>
</tr>
<tr>
<td>KRZYSZTOF ZASIADLY</td>
<td>President of Polish Business and Innovation Centres Association, PBICA</td>
<td>Os. Armii Krajowej 98/57 61-381 Poznan Poland</td>
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</tr>
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<td>AURELIA BRAGUTA</td>
<td>President of National Association of Young Managers of Moldova (ANTIIM)</td>
<td>Albisora 86/3, ap. 512, MD 2005, Chisinau, Republic of Moldova</td>
<td><a href="mailto:abraguta@asc.md">abraguta@asc.md</a> and <a href="mailto:aureliabraguta@yahoo.com">aureliabraguta@yahoo.com</a></td>
</tr>
<tr>
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<td><a href="mailto:eric@ptt.yu">eric@ptt.yu</a></td>
</tr>
<tr>
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<td>Associate Professor, Dean of the Faculty of Economics, Law and Administrative Sciences at “Petru Maior” University</td>
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</tr>
<tr>
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<td><a href="mailto:daniela.stefanescu@ea.upm.ro">daniela.stefanescu@ea.upm.ro</a></td>
</tr>
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</tr>
<tr>
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<td>Vice-Dean, Professor in Finance, Faculty of Economics, Technical University of Košice</td>
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<td><a href="mailto:vincent.soltes@tuke.sk">vincent.soltes@tuke.sk</a></td>
</tr>
<tr>
<td>Name</td>
<td>Position/Role</td>
<td>Address</td>
<td>Email</td>
</tr>
<tr>
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<td>-------------------------------------------------------------------------------</td>
<td>------------------------------------------------------------------------</td>
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<tr>
<td><strong>MARIJA ZAREZANKOVA-POTEVSKA</strong></td>
<td>Associate Professor University new York in Skopje</td>
<td>Jane Sandanski no. 87/II-2 Skopje, The former Yugoslav Republic of Macedonia</td>
<td><a href="mailto:mzarpot@hotmail.com">mzarpot@hotmail.com</a> and <a href="mailto:marija.z.potevska@economy.gov.mk">marija.z.potevska@economy.gov.mk</a></td>
</tr>
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<td><strong>DILEK CETINDAMAR</strong></td>
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<td>Tuzla, 81474 Istanbul Turkey</td>
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</tr>
<tr>
<td><strong>ANDREY A. TARELIN</strong></td>
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</tr>
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</table>
Annex 2.

**BENCHMARKING OF THE BEST BUSINESS INCUBATORS SELECTED BY NATIONAL EXPERTS**

<table>
<thead>
<tr>
<th>Country</th>
<th>Year of establishment</th>
<th>Size of the premises in sq. meters</th>
<th>Maximum incubation period in years</th>
<th>Number of managers</th>
<th>Number of support staff</th>
<th>Number of businesses left the BI</th>
</tr>
</thead>
<tbody>
<tr>
<td>Armenia</td>
<td>2002</td>
<td>1900</td>
<td>1</td>
<td>18 (?)</td>
<td>13</td>
<td>n.a.</td>
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<tr>
<td>Croatia</td>
<td>1996</td>
<td>9000</td>
<td>3-5</td>
<td>3</td>
<td>4</td>
<td>8</td>
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<tr>
<td>Georgia</td>
<td>1998</td>
<td>400</td>
<td>1-2</td>
<td>4</td>
<td>1</td>
<td>23</td>
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<tr>
<td>Hungary</td>
<td>2003</td>
<td>4500</td>
<td>5</td>
<td>5</td>
<td>20</td>
<td>5</td>
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<tr>
<td>Moldova</td>
<td>2005</td>
<td>300</td>
<td>2</td>
<td>2</td>
<td>3</td>
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<tr>
<td>Poland</td>
<td>1994</td>
<td>5600</td>
<td>5</td>
<td>3</td>
<td>20</td>
<td>30</td>
</tr>
<tr>
<td>Romania</td>
<td>1995</td>
<td>1800</td>
<td>5</td>
<td>50 (?)</td>
<td>7</td>
<td>15</td>
</tr>
<tr>
<td>Serbia</td>
<td>2005</td>
<td>2700</td>
<td>3</td>
<td>7</td>
<td>2</td>
<td>nil</td>
</tr>
<tr>
<td>Slovakia</td>
<td>2004</td>
<td>750</td>
<td>3</td>
<td>2</td>
<td>3</td>
<td>8</td>
</tr>
<tr>
<td>Slovenia</td>
<td>1995</td>
<td>7000</td>
<td>5</td>
<td>1</td>
<td>n.a.</td>
<td>5</td>
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<tr>
<td>Turkey</td>
<td>2004</td>
<td>1200</td>
<td>2</td>
<td>2</td>
<td>2</td>
<td>2</td>
</tr>
<tr>
<td>Ukraine</td>
<td>1999</td>
<td>1375</td>
<td>3</td>
<td>1</td>
<td>2</td>
<td>66</td>
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</table>


*Armenia:* Enteprise Incubator Foundation, Yerevan
*Croatia:* Business Incubator BIOS D.O.O., Osiek
*Georgia:* Georgian Business Incubator, Tbilisi
*Hungary:* CHIC Central Hungarian Innovation Centre
*Poland:* Kalisz Business Incubator Foundation, Kalisz
*Romania:* Technology and Business Incubator, Craiova
*Serbia:* Incubator Center (BIC), Nis
*Slovakia:* Business Incubator: RPIC Prešov - Technical Incubation Centre
*Slovenia:* Inkubator Sezana Ltd., Sežana
*Turkey:* Incubator: Ankara Teknoloji Geliştirme Bölgesi Kurucu ve İşletici A.Ş.
*Ukraine:* Business Incubator of the Municipal Enterprise “Business Development Agency in Slavutych”
## TYPE OF BUSINESS INCUBATORS IN THE SELECTED CEE & CIS COUNTRIES

<table>
<thead>
<tr>
<th>The purpose and type of the business incubator</th>
<th>AR</th>
<th>CR</th>
<th>GE</th>
<th>HU</th>
<th>MD</th>
<th>PL</th>
<th>RO</th>
<th>SR</th>
<th>SK</th>
<th>SL</th>
<th>TR</th>
<th>UK</th>
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<tr>
<td>Classical business incubator with different tenants;</td>
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<td>x</td>
<td>x</td>
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<td></td>
<td></td>
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<td></td>
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<tr>
<td>Specialized business incubator oriented for certain businesses;</td>
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<tr>
<td>Business incubators for service industries;</td>
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<tr>
<td>Technological oriented business incubator;</td>
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<tr>
<td>Business incubator oriented for women entrepreneurs;</td>
<td>x</td>
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<td>Business incubator oriented for youth;</td>
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<td>Export processing incubator;</td>
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<tr>
<td>Other type of business incubator (please specify)</td>
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