

Sharing solutions for better regional policies



Fostering startup & innovation ecosystems in Europe (INNOVA FOSTER)

Action Plan for Tartu

Tartu City Government

Part I - General information

Project: Innova Foster

Partner organisation: Tartu City Government

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Innova Foster aims at leveraging startups (scalable, high-potential SMEs with less than 5 years of life) growth through their engagement into the innovation processes at local or regional level and improving their role as regional and industry innovation providers in seven European regions.

Therefore, the main objective of Innova Foster project is to:

• identify, share examples, ideas, solutions,

- · tailor them to regional and local needs based on strengths,
- implement action plans,
- improve regional policies,
- serve as documented cases for analysis to other European regions and cities.

This Action Plan (AP) for Tartu reflects the joint learning and collaboration processes undertaken during the project, aiming at improving policy instruments that will positively affect startup & innovation ecosystem in Tartu.

Part II - Policy context

The Action Plan aims to impact:

- Investment for Growth and Jobs programme
- European Territorial Cooperation programme
- Other regional development policy instrument

Name of the policy instrument addressed: Development Strategy Tartu 2030

Background

Estonia has made a name for itself as a country using innovative applications of information and communications technology and where state-of-the-art technologies are a part of the way of life.

Tartu has always been a trendsetter when it comes to ICT developments – talented minds and ambitious entrepreneurs have led to a rapidly growing ICT ecosystem which has attracted the attention of venture capitalists as well as foreign ICT companies. For example, in 2016, the city hosted more than 60 startup events

(from hackathons 1.2.3 to Mobile Monday 4 to sTARTUp Day 5 etc), with more than 5000 people from the tech industry getting involved.

The startup scene in Tartu is characterized by many startups, who have partially grown out of the large ICT companies and who supplement each other and form a well-working cluster. The ecosystem is not only being supported by the companies, but also by several technological institutions like the Software Technology and Applications Competence Centre⁶, the Buildit Accelerator⁷, sTARTUp HUB⁸ and SPARK HUB⁹, Tartu Science Park¹⁰ and the Smart City Lab cluster¹¹. The aforementioned institutions also form the business support ecosystem of Tartu. This community offers wide range of different support, from incubation (Biotech¹², Creative Industries¹³, Space) to Töötukassa (Estonian Unemployment Insurance Fund)¹⁴, Chamber of Commerce¹⁵ to infrastructure (Biopark¹⁶, sTARTUp HUB¹⁷, Tartu Science Park¹⁸) and to Tartu Business Advisory Services¹⁹.

The startup community's prosperity can be largely attributed to the beneficial relationships that have developed among key players in Tartu. This has produced a nurturing and supportive ecosystem. And it is in working to make Tartu a truly attractive city for startup founders (from Tartu and beyond), strong and active cooperation has started to unfold among these key players (i.e sTARTUp Day). This entails developing partnerships among startup founders, the city government, University of Tartu and others, that create win-win situations for all parties involved, while keeping an eye on the primary goal of continuing to improve the local startup ecosystem.

Even in the digital age, a startup ecosystem needs physical space to thrive. Just recently built, the office spaces SPARK HUB, sTARTUp Hub, and sTARTUp Lounge have become a new home for the tech community in Tartu. Those buildings also include the hardware accelerator Buildit and two initiatives as a result of collaborations with both public and private organizations – Makerlab and a showroom for Estonian businesses called SPARK Demo.

SPARK HUB, a business and community centre for tech & hardware companies, which forms a whole entrepreneurial ecosystem of its own that is open for both house members and visitors beyond our doors. Here is the central point where entrepreneurial teaching for children meets educating adults, traditional enterprises get acquainted with startup companies, established companies welcome beginning founders and hardware combines with information technology. The key players in this ecosystem are SPARK Demo – a display area for the businesses in the South-Estonian region to share their singularity and a contact point between the region's most successful exporters and stakeholders, SPARK MakerLab – a place to make things with your hands and mind. Here you will be provided the workspace as well as the tools, materials and programs you need to bring your ideas to life, Entrepreneurship Village teaching children entrepreneurship and SPARK BizTown event and meeting rooms' complex.

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http://garage48.org/events/hardwarearts2017
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http://garage48.org/events/spacetech

http://garage48.org/events/openbigdata

http://www.momoestonia.com/

⁵ https://www.startupday.ee/

⁶ www.stacc.ee

⁷ www.buildit.ee

⁸ https://startuphub.ee/

https://sparkhub.ee/

¹⁰ www.teaduspark.ee

¹¹ http://smartcitylab.eu/

¹² http://biopark.ee/biomed-incubator?lang=en

¹³ http://loovtartu.ee/en/

¹⁴ https://www.tootukassa.ee/eng

¹⁵ http://www.koda.ee/en

¹⁶ http://biopark.ee/?lang=en

¹⁷ https://www.contriber.com/startup-hub/

¹⁸ www.teaduspark.ee

¹⁹ http://www.tartu.ee/arinouandla/

In addition to the business festival sTARTUp Day, many other relevant events in Tartu are consistently held. There are also hackathons, pitching and ideation events, such as Idea Storm (organized by the University of Tartu). There is also VUNK Idea Garage (organized by VUNK accelerator) which serves as a pre-event for their accelerator program. Coworking spaces are pivotal elements of the local startup ecosystem. This is where founders work to make the magic happen in addition to being a nice place for people to meet. For example, sTARTUp HUB hosts some of Idea Lab's pre-incubation program events and serves as a workplace for members of different startup teams.

Policy instrument

The selected policy instrument, the **Development Strategy Tartu 2030**, sees Tartu as the intellectual capital of Estonia and the centre for promoting development in South-Estonia as a whole. According to the vision of Tartu 2030, the city is a "university town with traditions, a city of youth where creativeness and open reasoning support development activity and innovation in entrepreneurship, a city with modern urban environment, safe, developing, sustainable way of life and an actively cooperating Estonian city."

The instrument will make considerable contributions to the **development of Tartu's innovation system** in support of the regional economy. The instrument will support high-tech enterprises based in Tartu that are of great vitality. This also enables to address the development of smart entrepreneurship in Tartu region and create an attractive environment. The measure will address the improvement of startup ecosystem by talent attraction, the improvement of human resources by trainings, incubation activities etc.

The **specific strategic directions** of the development strategy that are the most relevant for this AP are outlined in the section "Relation to the policy context".

SWOT analysis

As a follow-up to the local context analysis that was carried out in the beginning of the Innova Foster project, Tartu City Government organized **stakeholder meetings** with the representatives of some of the most relevant players in the local startup ecosystem. Besides raising awareness of the project and the upcoming AP among key stakeholders, the aim was to gather various perspectives and insights of the strengths, weaknesses, opportunities and threats of the local startup ecosystem as input for shaping the respective actions and creating visions for not only the next two years but also beyond. Combining information from the stakeholder meetings with relevant background documents and strategies, the SWOT analysis of the Tartu startup ecosystem is presented in the following table.

Strengths

- Tartu is the economic leader and hub of South-Estonia.
- Tartu is a relatively small and compact city where relevant actors and ecosystem members know each other well.
- High level of qualification and education Tartu has 11 higher education institutions and is known for its internationally recognized research.
- Strong start-up ecosystem with many start-up events (e.g. sTARTUp Day, Mobile Monday) and support services (e.g. Tartu Business Advisory Services).
- Various incubators and accelerators (Tartu Science Park, Tartu Biotechnology Park, SPARK Hub, Buildit hardware accelerator, ESA BIC Estonia).

Weaknesses

- Critical mass issues among all sectors and stakeholders (lack of qualified personnel, finances, time).
- Estonia is rather far from the target markets.
- Small local market. This means that, in order to grow, startups must think globally from day one. Some consider this as strength, but sometimes, the testing of new ideas in the absence of a local market is more difficult.
- Small local market also means that there are only few MNEs or big enterprises, who would create corporate programs for startups.
- The local market lacks funding. This is due the size of the market although there are seed capital programs, the funding will get scarce after the seed round has finished.
- There is no entity, either organisation or person that would act as community manager/ecosystem manager for the whole startup ecosystem in Tartu.

Opportunities

- Readiness for coordinated activities and planning among local startup ecosystem stakeholders.
- Innova Foster project contacts provide basis for cross regional cooperation and innovation.
- Continuous flow of students who are starting their careers as entrepreneurs in Tartu.
- More and more foreign students choose Tartu as a study destination, potential to engage them in the local innovation ecosystem.
- There have been start-up success stories and good cooperation between different stakeholders that can be brought out as positive examples for emulation.
- Education of new entrepreneurs could help improve the outcomes of the startup ecosystem. Today, incubation and acceleration programs are doing a good job in educating entrepreneurs and this could have a positive impact in the future. And also the entrepreneurial programs at the university are creating a more entrepreneurial mindset among young people, thus resulting in more startups.
- Foreign MNEs (multi-national enterprises) are looking to invest in Estonian startups thus creating a opportunity for such programs

Threats

- Potentially too many events aimed at start-ups and businesses in the local ecosystem which can bring about duplication and waste of resources (i.e. the target audience is not able to attend all events offered).
- Fear of failure, lack of trust, and readiness for cooperation in the business culture.
- Brain drain many skilled engineers and scientists choose to leave the country and move to the US and elsewhere Europe where, often, salaries are higher, working conditions might be better and there is more potential and opportunities.
- Demographics as a significant threat. Estonian population is declining and there is a shortage of skilled and well-educated labour already. Although we have different supportive initiatives like Teleport and startup visa, the problem remains unsolved.

Summary of interregional project findings and lessons learnt

Based on the learning exercises undertaken during the Innova Foster project – context analyses, good practices, thematic workshops etc. – the following lessons were the most relevant for Tartu City Government:

- Know-how of how other regions monitor and improve their existing policy measures.
- Understanding that a common problem among the project partners is related with growing the startup
 ecosystem and talents. Therefore, the effective management and coordination of available financial and
 human resources is crucial. Although involving all relevant parties of the local ecosystem and aligning
 their goals can be difficult, it is of high importance for growth and development of the entire
 ecosystem.

Proceeding from these lessons, the key takeaways for planning the AP actions were the following:

- Human resources need to be trained better and existing resources need to be exploited better while at
 the same time avoiding duplication among seemingly similar events organized by the local ecosystem
 stakeholders. Keeping the talent in the region and not letting them leave for capital areas was one of the
 major themes for all the project partners.
- Furthermore, the creation of events to attract talent to the region is something that other regions have also brought out – PODIM in Slovenia, VentureFest North West in Manchester, Startup Weekend in Torun etc.
- Startups are being trained and developed through incubators and accelerators, which provide the startups an environment to grow and learn in. This is a good practice for all the project partners. Yet, we learned that still the incubators and accelerators are working independently and there is a lack of a bigger picture. We are planning to create two programmes in Tartu to address this gap. One is to create a Fast Track Tartu programme which joints several members of the startup ecosystem in Tartu towards one goal city as an incubator (providing a certain track, programme, mentoring, services, pitching opportunities to investors etc.). Secondly, although Manchester had a Smart City initiative, none of the regions had a smart city focused incubation/acceleration programme. With the data and platform available in Tartu, we see a niche unfilled here and would also help the whole consortium by piloting smart city solutions in small scale in Tartu, before they move to partner regions.

Structure of the planned actions

In combination and as a result of the stakeholder meetings, the SWOT analysis and the lessons learned from the Innova Foster project, the following structure was developed for the AP:

- Action 1. Promotion of Tartu and its ecosystem through international events and projects
 - o 1a. Organizing international business festival(s) to attract local and foreign startups to the region
 - 1b. Organizing international events and trainings/workshops to improve and exploit available human resources
- Action 2. Promoting and exploiting the use of already existing services and knowledge of the different stakeholders to create an efficient and future-oriented ecosystem
 - 2a. Hiring a community manager/nominating an organisation, who would be responsible for promoting Tartu's ecosystem and creating synergies inside of the ecosystem
 - o 2b. Creating the strategy for startup ecosystem in Tartu for 2030
 - 2c. Organizing study visits and financing stakeholders' study visit initiatives to support internationalization (e.g. with Innova Foster project partners)
- Action 3. Develop the city as an ecosystem concept by creating a strong value proposition for Tartu
 - 3a. Designing and execution process of Fast Track Tartu programme by 2020
 3b. Designing and execution process of Urban Accelerator programme for smart city topics by 2020

Relation to the policy context

Coming back to the Development Strategy Tartu 2030, the strategy outlines the following specific strategic directions that are also reflected in this AP:

Strategic direction No.	Strategic direction	Related AP action No.
3.1	The implementation of the concept of an enterprising university in cooperation between the academic community and businesses.	Action 2a, 2b, 3a, 3b
3.4	The development of entrepreneurship support structures within higher education institutions through training and advisory services	Action 1a, 1b, 2a
6.2	Supporting businesses in internationalization and export	Action 1a, 1b, 2a
6.3	Attracting capital for new technological solutions, product development and the commercialization of research results	All
6.5	Attracting talents and entrepreneurs to Tartu to build/establish their companies	All
7.1	The development of Tartu and its brand as an open and innovative city	Action 1a, 1b, 2a,2c
7.4	The development and funding of startup ecosystem in Tartu	All
7.5	Promotion of cooperation between enterprises, research and development institutions and local municipalities	Action 3a, 3b

Part III - Details of the actions envisaged

ACTION 1. Promotion of Tartu and its ecosystem through international events and projects

Background

Through the Innova Foster project it became evident that all regions have some bigger events (PODIM, VentureFest North West, Startup Weekend) through what they promote the local ecosystem and build stronger networks. Yet, in order to bring the local startup ecosystem to the new level and also to get traditional companies to join and work together to build a stronger regional economy, we need to even more active in transferring international knowledge and creating international events/workshops.

According to the State of European Tech 2018 report, Europe has huge upside potential in building active tech communities in all cities where there are large tech talent clusters. This is because there is, perhaps unsurprisingly, a very high correlation (r-squared of 0.914) between the strength of tech community engagement within cities, as defined by the number of tech-related meetups, and the rate of companies formation²⁰.

Tartu City Government works closely together with other stakeholders of the startup ecosystem to organise and focus on supplying such events and workshops to help local startups and entrepreneurial minded people to develop and get international contacts and funding.

• **Objective** - The objective of Action 1 is to leverage sTARTUp Day business festival and promote Tartu as a favourable destination for startups, talent and international investors

Action

- 1a. Organizing international business festival(s) to attract local and foreign startups to the region
- 1b. Organizing international events and trainings/workshops to improve and exploit available human resources

Target group(s) of the action

The main target groups are startups and talent from Estonia, Nordic countries, Baltic States and Eastern Europe.

• Governance structure of the action and players involved

Tartu City Government will be responsible for the success of Action 1. However, the organization of the specific events and workshops will be done in cooperation with other relevant stakeholders.

Potential partners: sTARTUp Day, University of Tartu, Tartu Science Park, Tartu Business Advisory Services, Tartu Centre for Creative Industries, Tartu Biotechnology Park, University of Tartu Idea Lab, Ole Rohkem, Contriber, sTARTUp HUB, Spark HUB.

Timeframe

- Step 1. To organise a preparatory meeting with organisers of sTARTUp Day business festival and relevant stakeholders to define/map the events planned during the next years. January-April 2019
- Step 2. Tartu City Government to organise a initial meeting with local stakeholders in defining needs and further development projects for improving the attraction of local and foreign startups to the region. May 2019
- Step 3. Carrying out the seminars/trainings/workshops. May 2019 December 2020
- Step 4. To organise a meeting with Innova Foster project partners in order to connect Innova Foster regions to bigger events in Tartu. October/November 2019
- Step 5. Evaluating the results of the activities carried out. November-December 2020

https://2018.stateofeuropeantech.com/chapter/state-european-tech-2018/article/executive-summary/

Costs

The actions will be executed by the actor(s) with own resources.

Funding sources

sTARTUp Day business festival (partly funded by Tartu City Government) and Tartu City Government will organise the events through its existing budgets.

• Indicators to measure results and impact of the action

Output indicators:

Number of events organized

Number of people participating in the events

Number of Innova Foster partners participating in the events

ACTION 2. Promoting and exploiting the use of already existing services and knowledge of the different stakeholders to create an efficient and future-oriented ecosystem

Background

A good startup ecosystem is an unfair advantage. To develop a successful community all the actors must be convinced about the vision, generate a commitment and be clear about the role and tasks for each group. This must be a job not only for the entrepreneurs, the government, or the universities, but all of them adding the investors, the mentors, service providers and large companies must work together. If one of those groups is not developed, the other groups need to work on it, to find the people, the answers and the way to get a balanced ecosystem.

Furthermore, we are seeing that in order to develop the startup ecosystem and bring it to the next level, there needs to somebody in charge, leading the process and creating the strategy. There should be a joint commitment to develop the community and for that, Tartu is planning to support the non-profit organisation sTARTUp Day to become the leader of the community and create a joint vision and strategy for the ecosystem.

• **Objective** - The objective of Action 2 is to create a vision and synergies between the different organisations in the ecosystem

Action

2a. Hiring of a community manager/nominating of an organisation, who would be responsible for promoting Tartu's ecosystem and create synergies inside of the ecosystem

2b. Creating the strategy for startup ecosystem in Tartu for 2030

2c. Organizing study visits and financing stakeholders' study visit initiatives to support internationalization (e.g. with Innova Foster project partners)

• Target group(s) of the action

The main target groups are startups and talent from Estonia, Nordic countries, Baltic States and Eastern Europe.

Governance structure of the action and players involved

Tartu City Government will be responsible for the success of Action 2. Tartu City Government will provide funds for hiring the community manager/organisation promoting Tartu's ecosystem. However, a joint contribution is expected from the stakeholders of the startup ecosystem.

Potential partners: sTARTUp Day, University of Tartu, Tartu Science Park, Tartu Business Advisory Services, Tartu Centre for Creative Industries, Tartu Biotechnology Park, Contriber

Timeframe

Step 1. To hire a community manager, who would be responsible for promoting Tartu's ecosystem. January-

March 2019

Step 2. To organise regular meetings with local stakeholders in order to find sources of synergies and eliminate dublication of actions in the local ecosystem. March 2019 - December 2020

Step 3. To organise meetings with local stakeholders in order to create a startup ecosystem strategy for 2030. March 2019 - October 2019

Step 4. Organise at least two study visits for the startup ecosystem and startups. March 2019 - December 2020

Step 5. Evaluating the results of the activities carried out. November-December 2020

Costs

The actions will be executed by the actor(s) with own resources.

Funding sources

Tartu City Government will organise the actions through its existing budget.

Indicators to measure results and impact of the action

Output indicators:

Startup ecosystem strategy 2030 document is completed

Number of people participating in the study visits

ACTION 3. Develop an strategy and action plan for the startup ecosystem in Tartu

Background

One of the keys to the success in Tartu or Estonia in general has been the government support for the ecosystem, helping it gain momentum. With initiatives such as different incubators and accelerators, preincubation programmes for students, initiatives like e-government, the digitization of public agency processes, and e-Residency, offering foreigners a government-issued digital identity and the opportunity to run a trusted company online, have been well-received by the startup community.

We have great entrepreneurs and top talent but across skillsets stakeholders agree that the quantity is insufficient to meet the growing need. In order to close that gap with a small population, talent attraction must be part of the solution.

Having achieved a high immigration success rate and short visa response time, efforts have turned to attracting high-quality technical talent, especially from Russia and Eastern Europe countries where large pools of top quality talent are looking for exciting startups to join. The last two years have seen an increased influx of such talent.

However there is a lot to do to ensure that our ecosystem continues to grow sustainably and there is a strong value proposition, supporting services (real estate, social services etc) etc in place in order to attract the talent and compete with London, Berlin, Madrid, Manchester, or also Torun with the new Poland Prize programme in place.

For such reasons, we are planning to start with two programmes. The aim of the Fast Track Tartu programme is a city as an incubator approach, where talent/startup can go though an incubation programme offered jointly by all of the members of the local startup ecosystem. The validation of the idea will be made by University of Tartu's Idea Lab or a committee of experts and the incubation will have different milestones including pitching to the investors during our events like sTARTUp Day. The aim of the Urban Accelerator programme is offer Tartu as a testing ground for smart city applications. The city will provide also its own open data that the startups could use to validate their business case.

• Objective - The objective of Action 3 is to create strong programmes for local and foreign talent to start and develop their startup in an open and supporting ecosystem

Action

- 3a. Designing and execution process of Fast Track Tartu programme by 2020
- 3b. Designing and execution process of Urban Accelerator programme for smart city topics by 2020

Target group(s) of the action

The main target groups are startups and talent from Estonia, Nordic countries, Baltic States and Eastern Europe.

• Governance structure of the action and players involved

Tartu City Government will be responsible for the success of Action 3. However, the organization of the specific events and workshops will be done in cooperation with other relevant stakeholders.

Potential partners: sTARTUp Day, University of Tartu, Tartu Science Park, Tartu Business Advisory Services, Tartu Centre for Creative Industries, Tartu Biotechnology Park, University of Tartu Idea Lab, Ole Rohkem, Contriber, sTARTUp HUB, Spark HUB.

Timeframe

- Step 1. To hire a community manager, who would be responsible for promoting Tartu's ecosystem. January-March 2019
- Step 2. Carrying out the designing process of Fast Track Tartu programme in order to have a joint value proposition for startups and talent by the startup ecosystem in Tartu. March 2019 September 2019
- Step 3. Validate and carrying out a pilot programme for Fast Track Tartu. October 2019 to March 2020
- Step 4. Carrying out the designing process of Urban Accelerator programme in Tartu. January 2020 April 2020
- Step 5. Validate and carrying out a pilot programme for Urban Accelerator in Tartu. August 2020 to December 2020

Step 6. Evaluating the results of the activities carried out. November-December 2020

Costs

The actions will be executed by the actor(s) with own resources.

Funding sources

Tartu City Government will organise the actions through its existing budget.

Indicators to measure results and impact of the action

Output indicators:

Number of teams applying for either programmes Number of foreigners applying for either programmes Number of teams submitted for either programmes

Signature:

Date:

Stamp of the organisation (if avail