





From Innovation Dialogues to Action Plans

Engaging with Industry and Public Authorities

Part 3 - DENMARK - NORDDJURS









EUROPEAN REGIONAL DEVELOPMENT FUND

These nine reports give the reader an overview about the status of the video, computer and mobile game industry in the Baltic Sea Region as a whole and nine of its hotspot regions. The main goal of these document is to provide several examples of how to approach framework changes for an emerging industry such as the game industry, taking different contexts into consideration.

Part 3 of 9 - Denmark - Norddjurs

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EXECUTIVE SUMMARY

Strategic Highlights

With several success stories, the games industry in the Baltic Sea Region has been booming for the past decade. With exponential increases in turnover, company revenues in the billions, and thousands of people added to its work force, the gaming industry still shows high potentials with already very renowned Nordic and Polish game producers.

The gaming industry is no longer a niche market for a specific consumer segment - gaming has become a viable form of entertainment for players from all backgrounds and ages. Roughly, 1,500 game industry companies exist in the Baltic Sea Region, generating a combined revenue of 5 billion euros. Although this is approximately 5 times smaller than China and 4 times smaller than the US, it shows the importance and the growth potential of the industry in the region. Moreover, with the advent of mobile gaming and improvements to hardware used in playing these games, the regions/companies are looking for ways on how to grow, build more games and impact more lives.

This report gives the reader an overview about the status of the video, computer and mobile game industry in the Baltic Sea Region as a whole and of nine of its hotspot regions. The main goal of this document is to provide several examples of how to approach framework changes for an emerging industry such as the game industry, taken different contexts into consideration.

The snapshot per region introduces their specific context; the communication map delineates the different players, influencers and decision-makers involved in game politics and implementing actions for improving current framework conditions for each region.

To understand the different settings that determined the way for the next course of action, the local dialogue events, where different stakeholders from the industry and the public authorities met to define the strengths and bottlenecks of both the industry and the respective framework conditions are described. The outcomes of



those meetings were SWOT and TOWS matrixes and concrete plans for actions to be performed during the Baltic Game Industry project and beyond.

There were several joint topics/areas of interests that came out of those dialogue events.

For some countries (Denmark, Lithuania), the discussion quickly turned to cluster management or cluster creation. Although cluster development is a difficult concept to define, the idea would be to somehow formalise the cooperation between incubators/accelerators, educational institutions, private companies and public organisations. This would facilitate access to global and national support programmes and incentives for the video games and creative industry and its members. The cooperation in form of a cluster might also support the human resources development/mobilisation among enterprises, or among research systems and enterprises including the attraction of highly qualified human resources.

Other regions are planning to open a game hub or incubator to find the best and the brightest and equip them with entrepreneurial skills, such marketing, management, sales and last but not least game development. The partners from Estonia, Germany and Poland are planning to focus their efforts on building an infrastructure for innovation with game developers as a new instrument in support of the game industry. The idea would be to help indies or non-formal teams, but also young, innovative studios develop a mature approach to business.

Funding-related topics (funding, public support etc.) were discussed by several regions (Sweden, Finland, Germany): the lack of public support, obstacles in accessing information on support instruments targeted for games industry or just knowing which the current bottlenecks to raise the capital are.

Joint marketing efforts were raised by Germany, Finland, Sweden as one of the possible actions to perform as public-private co-operation. This is based on the assumption that improved marketing measures would attract new risk funding and foreign talent to the regions. With the lack of talents in most regions, improved recruiting and marketing actions are necessary to recruit not only local/national level talents, but foremost non-European and Eastern European talents to improve the regional industry's international business performance. Furthermore, if claimed to be important by the city officials, the game industry needs to be more visible in regions marketing statements.

Finally, education-related topics (all the partners). With the objective to increase number of highly qualified specialists for the game industry, the grassroots level of the industry will be tackled. Although global talent is more easily accessible today than ever before, local education and initiatives need to be introduced to allure those talents to the region in the first place. The sooner young industry talents are exposed to business-driven game development and education, the easier it will be to create solid business cases and find artistic vision. So, game education and informal education activities (youth clubs, hackathons etc.) play a crucial role in building local talents.

The above-described process initiated a continuous dialogue in the regions and countries. Although many of the detected areas for improvement require activities the impact of which will only become measurable in the long or medium term, we expect the dialogues to continue and form the gaming-hub of Europe.

Your Baltic Game Industry project team

DENMARK - NORDDJURS

Snapshot of the Situation

The game development industry in Norddjurs Municipality is relatively strong compared to the national average, and with a solid potential for development. The gaming community encompasses the entire education system, from primary school to bachelor degrees, and extending into a working game incubator, the Game Hub Denmark. The gaming sector in Denmark on a national level resides under the ministry of culture, which impacts the national agenda regarding the development of gaming in the country. The national status of the gaming sector is developing on all parameters, while not being a significant on a large scale.

	Year	Games sector
Businesses	2009	72
	2017	186
	Development	158,30 %
Full-time work	2009	516
	2017	1009
	Development	95,50 %
Turnover	2009	377
	2017	916
	Development	143,00 %
Export	2009	339
	2017	552
	Development	62,80 %

Table 1: Turnover in mio. Dkk., number of businesses and full-time equivalent

Table 1 shows a clear and solid development in the gaming industry in Denmark, which surpasses Films, TV and commercial in number of businesses, yearly full-time work, while being close in both turnover and exports.

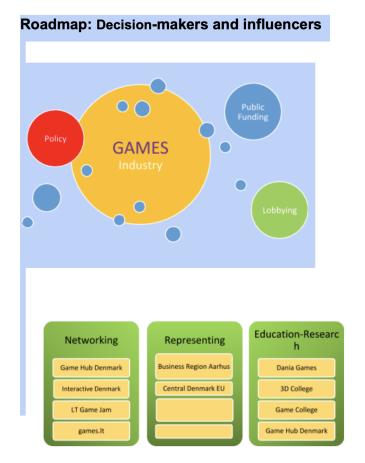
The existing framework for gaming development is limited. There is only a single existing national business support scheme for gaming development, which is shared with movies and requires a focus on cultural and

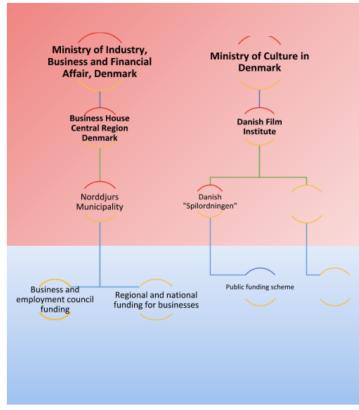
learning aspects - Not on business development. The gaming industry can apply for general support schemes available for all businesses.

The gaming community in Norddjurs, as well as on a national level, has been living a "hidden existence" from policy-makers as well as private funding organisations with a strong do-it-ourselves attitude towards developing larger gaming companies. The gaming sector is still comprised of primarily small gaming companies, with only a few "larger" companies with a significant number of employees.

The status quo has changed, with the innovation dialogue approach being based on a new business strategy in Norddjurs Municipality highlighting gaming as a business area with significant potential, and thereby creating a basis for more formal and informal dialogues.

Communication Map





Chosen Approach for the Dialogues

The approach to the Innovation Dialogue events was based on sharing knowledge and information between Norddjurs Municipality and Game Hub Denmark. As a public organisation, Norddjurs Municipality reached out to local stakeholders as well as to potential regional stakeholders and partners in the development of the gaming industry. With a very short distance between political decision-makers and public servants, the decision was to have a few key formal meetings, and a series of more informal meetings between municipality employees and key stakeholders the local and regional gaming community.

Aside from local policy-makers, the key stakeholders to create a dialogue with for Norddjurs Municipality were both the entire gaming eco-system within the municipality to understand their needs and requirements, and regional partners and stakeholders within the policy-making process.

SWOT Analysis

Strengths:

S1. Established local gaming eco-system from early education up until and including incubator

S2. None/Few competitors for talent nationallyS3. Strong gaming contacts worldwide

S4. Informal and flexible cooperative procedures locally or nationally

S5. Strong "We can do it" attitude in the local gaming industry

S6. Gaming a focus area in municipal business policy

Opportunities:

O1. Creating a physical gaming cluster as well as a network cluster

O2. Lobbying towards a broader geographical focus on gaming – Business Region Aarhus

O3. Bridging gap between financing sector and gaming sector through events

O4. Building stronger links to the neighboring gaming powerhouses Finland and Sweden.

O5. Creation of a strong triple-helix cooperation surrounding gaming

Weaknesses:

W1. No large, local established gaming powerhouses W2. Low knowledge of gaming sector in the investment/business angel community

W3. Lack of support measures for gaming startups in the national business schemes (direct competition with movies)

W4. Small talent pool to recruit from

W5. Existing outside the established business environment

W6. Success based on few key people

W7. Weak collaboration in a triple-helix setting (Games sector, public sector and educational sector)

Threats:

T1. Change in financial climate locally and nationally

T2. No development of larger gaming businesses can dry out interest and support

T3. Lack of lobbying can marginalize the gaming industry before it gain critical mass and be

self-sustained

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Topics Identified



The Innovation Dialogue

The Innovation Dialogue events can be separated into 2 categories. Category 1 is the formal meetings with invitations, attendance lists and with pictures taken as listed below.

Kick-off meeting of the physical infrastructure development of the gaming eco-system in Grenaa, Norddjurs

June 28th, 2018

The Gaming Mile - Visualising the Future

Venue: City Library (located on the "Gaming Mile")

15 attendees (upon invitation): stakeholders' experts from the local games community, gaming education organisations, municipal public servants within planning and business development, architect consultants

Innovation Dialogue Rationale for "Physical infrastructure"

Purpose and background for the event

The main topic of "The Gaming Mile - Visualising the Future" was to gather the primary, local stakeholders and give them an introduction to the thoughts behind creating a "Gaming Mile"; a physical strip of road where all the gaming educations, incubators and established gaming companies all develop their organisations in synergy and strong partnerships - As a fully-fledged gaming cluster. The background for the event and the theme was the lack of cooperation between the individual organisations working with gaming education and incubation in

Norddjurs, despite being placed next to one another. Furthermore, despite an active gaming community is located on the same street, there is no indication for visitors that the area is the foremost gaming community in Denmark. The participants were asked to bring their own thoughts and ideas to the table through a workshop, thereby trying to establish a common ground for areas to focus on in the physical development of the "Gaming Mile" and have a proper action plan to be executed.

Main findings and value propositions

The central issue during the opening workshop was the issue of no proper visual representation of being a gaming cluster in Grenaa. There was full agreement from all stakeholders during the meeting that this is something that should be developed upon, in a cooperation between Norddjurs Municipality and the gaming community incubators and education organisations.

The second issue was discussing what the wishes of each organisation was, and how to proceed in developing a common vision that all stakeholders could agree upon, and would be implementable.

Currently there are no municipal funds to work on the physical development- However, based on the discussions that arose during the workshop, there is a need for further work on creating a common vision and planning document, that all stakeholders agree upon.

Stakeholders interested in further collaboration

Despite not having finances for implementing physical infrastructure, all stakeholders have indicated an interest in further collaboration.

Next step

The next step is to further work with stakeholders and agree upon working towards a common vision for the physical development of the gaming cluster

Workshop on Topic "Cluster development"

May 23rd, 2018

Venue: GL. Estrup Castle

Workshop on how best to support "upcoming" business communities and create sustainable clusters that uses a triple-helix support structure. Also focus on autonomous upcoming clusters developed outside existing support framework.

24 attendees (selected mix of local and regional experts in business and cluster development from both public and private sector, as well as participation from university expert in cluster development etc.)

Innovation Dialogue Rationale for "Cluster Development"

Despite having an entire gaming eco-located located within a small geographical area, the various gaming educations and incubator still have a large potential for cooperation within the group, as well as outside the group. This do require a stronger level of branding and awareness raising, as well as more cooperation, in order to develop into a national gaming cluster.

The Cluster Development workshop, was an event focused on getting both theoretical and practical knowledge of what business clusters are, how they operate, and how to support them. With expert speaker and selected

knowledge persons participating, the workshop aimed to discuss how to work with potential clusters that exists outside the current framework for business development.

Main findings and value propositions

With the presentation of clusters and cluster development by a PhD from Southern University of Denmark and the following workshop, the main findings was that the key instruments needed for creating a successful cluster, is the right partners being present and interacting with each other, as well as a clear focus on communication and branding, awareness raising and networking – both locally, nationally and internationally.

A uniqueness regarding the gaming community in Norddjurs, is the fact that it has grown and developed outside the existing frame of business support, both from a local level and a national level. This gives an added challenge when it comes to developing the cluster idea.

Stakeholders interested in further collaboration

Local stakeholders are interested in further collaboration; however, it requires more analysis and research, including potential study trips to successful clusters that have grown outside existing business support schemes.



Picture: Mads Ingstrup, PhD. Southern University of Denmark and Cluster Development expert

Next step

Charting successful clusters which would relevant to visit and extract best-practice knowledge on how to develop into a full, national and international known gaming cluster. Following that, a potential study trip could be planned.

Innovation Dialogue Rationale for "Public-Private Partnerships"

In order for both developing physical infrastructure as well as the cluster development theme, a stronger public-private partnership was needed, starting on a local level, in order to facilitate a stronger voice towards funding of the gaming industry. This dialogue has mainly been done by having a series of informal meetings between the local gaming community and municipal employees and elected politicians.

Main findings and value propositions

The informal meetings have been key in establishing a dialogue on funding schemes for local gaming development, and through which action-plans were determined and a local support funding by the local elected politicians was granted.

Stakeholders interested in further collaboration

Both Game Hub Denmark, gaming education organisations and Norddjurs Municipality are working closer together in a partnership

Next step

The next step has been finding the proper way of doing public-private partnerships, and to fund the development of the gaming cluster in Norddjurs.

Innovation Dialogue for "Creative Talents for the future"

Norddjurs Municipality has held a vast number of informal meetings with counterparts in neighbouring municipalities and business organisations, as well as Business Region Aarhus and Game Hub Denmark, in order to create the best set-up for bringing together stakeholders from the financing community and business talents, including the gaming community.

Main findings and value propositions

The discussions and meetings have given a clear picture of the need for various stakeholders within the national gaming community work on defining the role of the gaming sector within the broader business community – In order to have a clear profile towards both public and private funding.

Stakeholders interested in further collaboration

Due to unforeseen events, the gaming community will not be the central theme of the "Creative Talents for the future" business event. There is currently being worked on a workshop within the scope of the "Creative Talents for the future" specifically for the wider gaming community and associations.

Next step

Working with key stakeholders within the gaming community in order to clearly find the proper placement of the gaming community within the larger national funding community both private and public.

TOWS Analysis

\$/O USE STRENGTH TO MAXIMISE OPPORTUNITIES

S1,S4,S5,S6/O1 ("Physical and network cluster"): Using all the strengths, establish a common vision and plan for physical development

S2, S3/O2, ("Larger geographic reach"): Strengthen the role as a natural regional centre for attracting talents and investment

S1, S3, S4, S5, S6/O3 ("Fundraising assistance"): Helping gaming start-ups

\$/TUSE STRENGTH TO MINIISE THREATS

O1/W2, W3, W5 ("Physical and network cluster"): Establishing vision and plan for cluster to mitigate the lack of knowledge and support for gaming industry

O3,O4/W1, W6 ("Financing"): Having the right financial support combined with experience from neighbours could leapfrog the development of a larger gaming businesses and equalize the issues of dependency on few key people.



W/O MINIMISE WEAKNESSES BY USING OPPORTUNITIES

S4,S5,/T1 ("Local strength"): Continues usage of local strengths to mitigate potential financial issues

S1,S2,S3,S4,S5,S6/T2 ("Financing"): By utilizing the strengths, creating the foundation for upscaling of businesses to become drivers of gaming development

S1, S4, S5, S6,/T3 ("Communication: Lobby and awareness") Using existing strength to further the knowledge of successful gaming development in Norddjurs

TOWS

W/T MINIMISE WEAKNESSES AND AVOID THREATS

The overall goal with the activities is the following:

- creating a triple-helix vision and plan for the future physical and network cluster for gaming, in order to remain the hotspot for game development in Denmark
- creating a triple-helix vision and plan for the future physical and network cluster for gaming, in order to remain the hotspot for game development in Denmark
- Branding the existing activities and cooperation to larger geographical area
- Focus on financial support for gaming industry via lobby and events

The Action Plan

Steps towards an Action Plan

In order to create ambitious Action Plans, the TOWS analysis have been made. The analysis should be seen as supporting document to the innovation dialogues, and the Action Plans a conclusion of both innovation dialogues within the 4 themes, as well as the TOWs. In addition to this, a continuous dialogue between Norddjurs Municipality and Game Hub Denmark has been maintained, in order to create Actions Plans that are both ambitious and realistic.

#	Action	Targeted outcome
1	Creating a common vision and plan for physical development of the gaming community	A common vision and plan agreed on by all relevant stakeholders within the gaming community
2	Working towards establishing a national and internationally known gaming cluster	Stronger networks established towards other autonomous clusters and a clear vision of the future gaming cluster in Norddjurs
	Building upon existing relations and creating a strong public-private partnership and funding opportunities	A common strategy between Game Hub Denmark and Municipality of Norddjurs created, with funding towards implementation granted
4	"Creative talents for the future" - The role of the gaming community in the national business support schemes	Raised awareness of the role of gaming community and the challenges of funding

Action 1 – Creating a common vision and plan for physical development of the gaming community

The actions aim to deal with the issue of while having an entire gaming eco-system located on a single street in Norddjurs, it is for all intents and purposes invisible. There is no physical indication of being in a growing gaming community, and little branding value at present.

Activity	Description
Engaging experts	In order to create an optimal process of creating a common vision, the right experts need to be engaged. Both internally in Norddjurs Municipality with regards to laws when it comes to planning, but also external expertise in the form of process consulting and architecture and user-driven innovation.
Running workshops and creating the common vision	Invite all relevant, local stakeholders to a series workshops where the output should be a common agreed-upon vision and secondary a plan, for developing the physical infrastructure within the gaming community

Expected outcomes	Expected impacts measures
Created vision and plan for physical infrastructure	# of local stakeholders participated in the workshops # of local stakeholders agreed upon the final vision # of local stakeholders implemented the vision in their own development strategies

Action 2 – Public-Private partnerships

The objective of this action is to strengthen the public-private partnerships with the gaming community, both on a local level, but also on a broader regional/national scale. Secondary via local funding scheme to develop the gaming community and show the potential of the gaming industry.

Activity	Description
Stronger dialogue between Norddjurs Municipality and the gaming community, and a common strategy for development agreed upon	The stronger dialogue should ensure that the development of the gaming community and the actions taken by Norddjurs Municipality always correlates and supports each other, and thereby have a stronger voice when it comes to potential funding schemes for the gaming sector. This should manifest itself in a strategy agreed upon by both Game Hub Denmark and Norddjurs Municipality
Broaden the awareness and branding of the gaming community and its funding possibilities	With a foothold in the local strategy and dialogue, broaden the awareness of the gaming community in Norddjurs Municipality to a regional and national scale, through cooperation and municipal organisations

Action 3 – Cluster development

Cluster development is a difficult concept to precisely define. In the context of this action, it is working within a formalised cooperation between incubator, educational organisations, private companies and public organisations in a triple-helix model. The activities for this action are very much that of informal discussions and meetings, as well as fact-finding and best-practices of existing clusters.

Activity	Description	
Research on cluster development, mapping potential cluster visits and informal discussions with cluster experts	Working on cluster development requires a lot of knowledge transfer for existing clusters, clusters with similar attributes to the Gaming cluster in Norddjurs, as well as feedback from experts. Research on how to do it is of key importance.	
Study trip, analysis and recommended activities towards a full-fledged cluster	Pin-pointing key clusters to serve as inspiration, analysing the outcome of study trips, meetings, analysis. Make a list of recommendations	
Expected outcomes	Expected impacts measures	

A series of recommendations that different	# recommendations to further the cluster
stakeholders can develop and build on, as well as a network with other clusters with experience and	# of clusters and innovation networks contacted
challenges similar to the gaming cluster in Norddjurs	

Action 4 - Creative talents for the future

"Creative Talents for the future" is a broad headline for a large-scale event focusing on celebrating start-ups across all business sectors. Originally centred on the Game Hub Denmark start-ups, the event is now a broader event, although there is a separate focus on the role of gaming within the regional and national business support structure.

Activity	Description
Host a development workshop on the role of gaming community within the existing business and funding schemes	Still in progress, the theme of the workshop would be on i.e. Whether gaming is a creative business or within the IT and digital business structures, how this affects funding opportunities both from the public sector and private sector
Follow-up activities based upon the results of development workshop	Depending on the output of the development workshop, more workshops and meetings on how to influence the decision-makers with regard to the gaming industry role.

Expected outcomes	Expected impacts measures
A clearer picture of the gaming industry, and how to proceed with key stakeholders	# of stakeholders participating in workshop # recommendations for gaming sector within the national business funding scheme

Summary of the Action Plan

It is important to recognise that each action plan is not a stand-alone, but that the activities in the action plans overlap, and are interdependent. For instance, the physical infrastructure and cluster development are both targeting the challenge of a lack of awareness and cooperation, as is the public-private partnership and creative talents for the future. This also means that some of the action plan activities are more pronounced and crystallised, while others remain vaguer. The main focus for the remainder of the project duration is to work closely with Game Hub Denmark to implement the action plans, as well as emphasising the awareness of the cluster with potential cooperation partners (Business Region Aarhus, other clusters, policy-makers on national level), as well as expanding on the existing cooperation locally.

The public version of the action plan can be viewed at: https://www.norddjurs.dk/media/6714964/BGI GoA2-3-output-DE-NO.pdf

THE PROJECT

The project 'Baltic Game Industry' (BGI) aims to foster the game industry in the Baltic Sea region - turning an ambitious game developer scene into a competitive and attractive business sector with sound innovation potential and thus making the region a game hotspot with worldwide competitiveness.

The partnership works together on framework condition improvements, on making business support services fit for the special needs of game start-ups and finally on new business opportunities for game developers in other industry sectors, such as health care. The core element is the installation of durable game incubators, programmes and schemes for game start-ups across the region.

BGI effectively combines policy and business development. Tailor-made game business support fosters a durable economic growth of this innovative industry in the whole region. The introduction of VR technologies in non-game industries contributes to boosting innovation beyond games. The common branding of the Baltic Sea region as game innovation hotspot will attract international clients, investors, creative entrepreneurs and qualified workforce.

Read more at www.baltic-games.eu

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