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**Abstract:**

The CLINES project is planning common actions to be implemented by the project partners after the project end. The first draft of the action plan is already available. This document reports an assessment of the sustainability of the actions currently proposed, lists ideas for new or revised sustainable actions, and shows funding options for cross-region actions.

**Keyword list:** sustainability, action evaluation, funding options, key activity, consortium, services

# Table of Contents

- SUMMARY..... 3**
- 1 INTRODUCTION..... 4**
- 2 KEY ACTIVITIES TO KEEP CLINES GOING STRONG – LOCALLY AND AS A CONSORTIUM..... 4**
  - 2.1 IDENTIFY CONCRETE CORE TOPICS OF (VALUE CHAIN) COLLABORATION..... 4
  - 2.2 CONVINCING STORY ..... 5
  - 2.3 CREATION OF REGIONAL CLINES FOOTPRINTS IN EACH OF THE REGIONS ..... 6
  - 2.4 COMMON CLINES SMARTCITY NEWSLETTER WITH PIECES OF NEWS FROM EACH REGION ..... 6
  - 2.5 CROSS-PROMOTING MATCHMAKINGS ..... 6
  - 2.6 IDENTIFY KEY INDUSTRIAL PARTNERS IN EACH REGION ..... 6
  - 2.7 STRENGTHEN THE INTERNATIONALIZATION ISSUES..... 7
  - 2.8 CONTACTS WITH INITIATIVES AND ALLIANCES AROUND URBAN DEVELOPMENT ..... 7
  - 2.9 PROMOTION OF CROSS-REGION STRATEGIC AGENDAS ..... 7
  - 2.10 SHOWCASES..... 7
  - 2.11 COMMON OFFER FOR PROJECT MONITORING..... 8
  - 2.12 SMART CITY EVALUATION PLATFORM..... 8
- 3 SUSTAINABILITY-EVALUATION OF JAP ACTIONS ..... 9**
  - 3.1 CREATE COMMON VISION BASED ON SWOT..... 9
  - 3.2 MEDIATE CROSS-SECTOR AND TO PUBLIC AGENCIES ..... 9
  - 3.3 PERMANENT SMART CITY STAKEHOLDER ROUNDTABLE..... 10
  - 3.4 COMMUNICATE CLINES VISION; USE EXAMPLES;..... 11
  - 3.5 ANALYSE AND INFLUENCE REGIONAL POLICIES..... 11
  - 3.6 JOINT INTERNATIONAL EVENTS ..... 12
  - 3.7 FORMAL SMART CITY / CLINES OFFICE..... 13
  - 3.8 MATCHMAKING ACROSS SECTORS AND ACROSS REGIONS ..... 13
  - 3.9 CONNECT TO SIMILAR (EU) PROJECTS ..... 14
  - 3.10 CREATE ACCESS TO RESEARCH GROUPS..... 14
  - 3.11 INNOVATION WORKSHOPS ..... 15
  - 3.12 INNOVATION SHARING VIA DEMONSTRATORS ..... 16
  - 3.13 UNDERSTAND USERS VIA USE CASES..... 16
  - 3.14 TRAINING/MENTORING ..... 17
  - 3.15 EXCHANGE OF KNOWLEDGE..... 18
  - 3.16 MATCH MAKING/OPEN DEVELOPMENT MODELS ..... 18
  - 3.17 FACILITATE INTERNATIONAL OUTREACH FOR SMES..... 19
  - 3.18 KNOWLEDGE ON BUSINESS MODELS ..... 20
  - 3.19 EXCHANGE BETWEEN UNIVERSITIES ..... 20
  - 3.20 PUBLIC PROCUREMENT ..... 21
  - 3.21 FUNDING OPPORTUNITIES EXCHANGE VIA REGIONAL OFFICES ..... 22
- 4 REVENUE SOURCES, TO FINANCE THE SMART CITY ACTIVITIES ..... 23**
  - 4.1 MEMBERSHIP FEES ..... 23
  - 4.2 SERVICES..... 23
  - 4.3 STATE FUNDING..... 24
  - 4.4 EU PROJECTS..... 24

## Summary

The CLINES project is planning common actions to be implemented by the project partners after the project end. This document looks at the 21 actions planned from a sustainability angle. It reports evaluations from the project partners which funding options might regionally sustain each action, proposes new and revised actions with good sustainability outlook, and lists general funding options for cross-region actions.

# 1 Introduction

The CLINES project is planning common actions to be implemented by the project partners after the project end. The first draft of the action plan is already available (as deliverable D4.2); work on the final version is on-going.

This document reports an **assessment of the sustainability** of the actions currently proposed, lists ideas for **revised or new actions**, and shows **funding options** for cross-region actions. The lessons learned are essential in producing a sustainable Joint Action Plan by the end of the project.

This deliverable is part of the efforts in Task 6.5, „Communicate findings to adjust JAP“. It complements the deliverables D6.3 “Delta Analysis” and D6.2 “Intermediate Evaluation” by looking at the proposed actions from a sustainability and funding perspective, and will serve as important input to the final revision of Joint Action Plan (WP4), which is right on track to be finalised next year.

The three sections of the document are equally important for this goal: The key activities identified by the project partners for keeping the consortium together after CLINES funding has run out are listed and described in Chapter 2.

The most likely funding sources for each of the action originally proposed, evaluated separately by each region, are reported in Chapter 3.

An overview of general funding options for cross-region actions (including concrete EU calls) is presented in Chapter 4.

## 2 Key activities to keep CLINES going strong – locally and as a consortium

The following activities have been identified as key for keeping the CLINES consortium alive after the project funding has run out.

The method to obtain these activities was iterative brainstorming followed by evaluation loops, both via in-person meetings and phone calls/document exchange.

### 2.1 *Identify concrete core topics of (value chain) collaboration*

The main objective of the CLINES joint action plan is to develop economic activities in the area of embedded systems for smart cities (ESSC). Embedded systems/micro and nano electronics are a key component in trending technology solutions such as: the internet of things, 3D printing, smart machines, or context-rich systems. All those trending technology solutions enable solutions to city challenges. In numerous cities projects are launched to coop with city challenges.

To support economic development in the ESSC area the CLINES consortium has to focus on:

1. Keeping track of what technology trends in the ESSC are and the stakeholders within the CLINES ecosystem who are actively involved in developing technology solutions in the ESSC area.
2. Screen smart city opportunities where ESSC solutions can be a driver for solutions.
3. Develop future scenarios which make the added value of ESSC for smart cities obvious
4. Liaise with key stakeholders in the Smart Cities and ESSC area and mobilize them to make ESSC enabled solutions for smart cities a sustainable reality.
5. Organize support measures to shorten the time to market for ESSC enabled smart city solutions.

## **2.2 Convincing story**

To build a local footprint we need a convincing story. The JAP and internationalization strategy are a first step in that direction but have to be translated in a tangible value proposition which is strong enough for stakeholders to invest time and money.

The CLINES joint activities focus on 2 major customer segment groups of stakeholders:

- Target customer segment 1: Technology stakeholders with a focus on research and development in the domain of embedded systems technology
- Target customer segment 2: Smart city stakeholders with a focus on developing smart city services and products

CLINES supports its stakeholders to grab the value offered by embedded systems opportunities in a smart city context. This means that CLINES can communicate the following strong points to the customers:

- Creating turnover and profits for companies.
- Transferring research results to market.
- Allow academics to do more research in the ESSC domain
- Helping ‘Cities’ to become more resilient and delivering the right services
- Creating an augmented ‘City’ experience for citizens.

To reach this goal CLINES consortium partners develop a complete service portfolio which can be delivered throughout Europe.

### **2.2.1 Closer relations to cities**

It is the cities and smaller municipalities that will be shaping the actual smart city. Thus it is central that close relations with persons in the municipality steering organisations that are interested and active are well included in the CLINES activities – they can outline the key challenges to be solved in their town.

Some of the municipalities already contacted in the project:

- North Denmark
  - Municipality of Aalborg City
  - Municipality of Frederikshavn

- Flanders
  - Agoria Smart City community
- Bavaria
  - Munich
  - Coburg
- Basque Country
  - Municipality of Bilbao City
  - Municipality of Zamudio City
  - Municipality of San Sebastian City

### **2.3        *Creation of regional CLINES footprints in each of the regions***

The regional interest groups of the CLINES regions have been important in the initial phases of the CLINES project in order to assure a regional formulation of the different elements in the joint action plan.

The people actively involved in the Regional Interest Groups, as well as the links established to local solution providers, are essential to driving the implementation of Smart City projects. This group, as well as contacts to policy makers, has to be sustained.

### **2.4        *Common CLINES SmartCity newsletter with pieces of news from each region***

To establish a common brand, and to make all the players in the participating regions aware of the cross-region network, a regular newsletter will be sent out in all the regions. It will contain those news from each region that are of interest to stakeholders in other regions, promoting important lighthouse events (such as DSP B2B matchmakings, BICCnet Innovation Forums, important trade fairs), be them organised by the clusters, or in the region.

At first, the news can be included in existing newsletters. In the second stage, a special newsletter on ESSC is sent out. In a third stage ESSC branding is added to the newsletter (in addition to the regional cluster one).

### **2.5        *Cross-promoting matchmakings***

The participating clusters already have matchmaking activities, where they strive to match companies with complementary profiles. This is especially important in the Smart City context, where expertise from different stakeholders and different domains have to be combined to build solutions.

Those matchmakings – be it B2B events, business speed dating, matchmaking days or the like – can be tailored to Smart City topics, and promoted by all regions to foster international cooperation.

### **2.6        *Identify key industrial partners in each region***

The industrial partners in each region, a number already acting on the global market, should be identified. This will enforce the internationalization activities in general, and in particular it will

support the identification of relevant international clusters to be approached in order to extend the eco system beyond CLINES.

## **2.7 Strengthen the internationalization issues**

In order to be able to react promptly on new trends and opportunities, it is important to be part of an international eco system of clusters, which complements existing, regional competences. In order to provide a sustainable preparedness, this eco system has to go beyond CLINES as outlined in the internationalization strategy.

## **2.8 Contacts with initiatives and alliances around urban development**

A potential partner alliance is the Joint Programming Initiative Urban Europe<sup>1</sup>. Their aim “is to create attractive, sustainable and economically viable urban areas, in which European citizens, communities and their surroundings can thrive.”

CLINES is very focused on bringing smart to the city by means of the Embedded Systems technologies, but the more general approach followed by the JPI Urban Europe could enrich the global vision of a Smart City by looking at all perspectives involved. Accordingly, the CLINES project could add further improvement to several insights of the mentioned JPI, so this could derive in a win-win association. CLINES may try to get in contact as an observer, for instance.

Denmark and Germany are already members<sup>2</sup> of this initiative, so two of the CLINES regions can actually be considered being “in”. Spain is listed as an observer too.

## **2.9 Promotion of cross-region strategic agendas**

The strategic agendas of the CLINES regions are important elements of the foundations for the respective clusters. Hence, whenever commonalities or complementarities can be identified among the agendas, potential opportunities may be formulated. Therefore, the agendas must be constantly followed and disseminated among the clusters.

The findings can be communicated back to local policy shapers, to make them aware of the positioning of the other regions.

## **2.10 Showcases**

In the interest of promoting collaboration between CLINES regions or others and based on the pilot projects within each region it may be of interest to create a database with the SMEs of each Clusters that already implemented best practices to share between them and promote B2B event and improve the collaboration.

GAIA already operates a database like this, called SC4C - Smart Capacities for Cities. It is available in an English version<sup>3</sup>.

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<sup>1</sup> JPI Urban Europe: <http://jpi-urbaneurope.eu/>

<sup>2</sup> JPI Urban Europe membership: <http://jpi-urbaneurope.eu/about/who/members/>

## 2.11 **Common offer for project monitoring**

With the knowledge accumulated in the CLINES consortium, services could be offered to other Smart City / Embedded Systems projects. Project monitoring is such a service. It could entail regular consultation with the customer project to see if they are on track, and offer advice on the specific roadblocks and challenges especially multi-stakeholder Smart City projects face.

Even earlier, consulting services could be offered to help find the optimal funding sources for the projects.

## 2.12 **Smart City evaluation platform**

Create a platform that allows to know if a city is Smart and at what level. For that we need to carry out the following steps: diagnoses, action plans, evaluation and monitoring. And based on the results we establish the level at which the city is located, depending on the level of maturity.

The maturity levels could be:

- **Initial:** Few processes defined to be a Smart City
- **Repeatable:** It is establishing a minimum discipline to be a Smart City
- **Defined:** Processes are normalized and they are documented
- **Managed:** There is collected and analysed data on the processes and results
- **Optimizing:** Continuous improvement of the processes is performed

Develop an interoperable and international platform that allows unifying concepts and introduce standards in the field of smart cities. An existing standard is the ISO 37120:2014. - Sustainable development of communities<sup>4</sup>.

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<sup>3</sup> SC4C database: <http://www.gaia.es/smartcities/en/home/>

<sup>4</sup> ISO on Sustainable Development of Communities:  
[http://www.iso.org/iso/catalogue\\_detail?csnumber=62436](http://www.iso.org/iso/catalogue_detail?csnumber=62436)



### **3 Sustainability-Evaluation of JAP actions**

For each action planned in the Mid-JAP (published as deliverable D4.2), the project partners were asked to contact their stakeholders, and deliver an evaluation of the sustainability of the funding for each action.

For each action, each partner lists the three most probable funding sources that, in its own ecosystem, could provide sustainability for the action. Additionally provided is an estimate of the probability that the funding option can be realised (on the scale of very likely – likely – not likely).

#### **3.1 *Create common vision based on SWOT***

##### **3.1.1 AAU**

EU Cluster projects (very likely)  
 Cluster base funding (likely)  
 Region North government (likely)

##### **3.1.2 BICCnet**

EU Cluster projects (very likely)  
 Cluster base funding (likely)  
 Bavarian government (likely)

##### **3.1.3 GAIA/Tecnalia**

EU Cluster projects (likely)  
 Our base funding (likely)  
 Basque Country government (likely)  
 Tecnalia's own ecosystem by promoting common vision using own funding (likely)  
 Tecnalia's Innovation Strategies Division support for developing a deep SWOT analysis for some potential clients (very likely)

##### **3.1.4 DSP**

Investment of 'core clines' partners (likely)

#### **3.2 *Mediate cross-sector and to public agencies***

##### **3.2.1 AAU**

H2020 technology projects (very likely)  
 Innovation Express (likely)

Region North government (not likely)

### **3.2.2 BICCnet**

Mandate be sectorial organisations (not likely)

Public body assignment (not likely)

National project (likely)

### **3.2.3 GAIA/Tecnalia**

Basque Country government (very likely)

Basque Country Municipalities (likely)

Spain Government (likely)

Tecnalia's own funding for identifying synergies and cross-sector opportunities (very likely)

Tecnalia mediating with public agencies in the promotion of Smart City initiatives (not likely)

### **3.2.4 DSP**

New cluster policy and funding in Flanders (likely)

Sponsorships and membership fees (likely)

EU project grants (likely)

## **3.3 *Permanent Smart City stakeholder roundtable***

### **3.3.1 AAU**

Cluster funding (very likely)

Municipal sponsorship (likely)

Region North government (likely)

### **3.3.2 BICCnet**

Cluster funding (very likely)

Public funding (regional) (very likely)

EU cluster projects (likely)

### **3.3.3 GAIA/Tecnalia**

Basque Country government (very likely)

Cluster base funding (likely)

Spain Government (likely)

The Sustainable Construction and the Health Divisions from Tecnalia promotes alliances with international stakeholders on Intelligent Infrastructures and Ambient Intelligence (AmI) for Smart City (very likely)

### **3.3.4 DSP**

In collaboration with existing Flemish initiatives which means no extra funding is needed.

## **3.4 *Communicate CLINES vision; use examples;***

### **3.4.1 AAU**

H2020 Smart City projects (very likely)

National funding (likely)

Region North government (likely)

### **3.4.2 BICCnet**

Cluster funding (likely)

EU cluster projects (likely)

Smart City Company contributions (likely)

### **3.4.3 GAIA/Tecnalía**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalía investing own funding on communicating CLINES vision after the project lifecycle (not likely)

### **3.4.4 DSP**

Via memberships & sponsorship (Likely)

Flemish cluster funding (likely)

Part of EU funded projects (likely)

## **3.5 *Analyse and influence regional policies***

### **3.5.1 AAU**

Region North government (very likely)

Municipal sponsorship (likely)

H2020 projects (likely)

### **3.5.2 BICCnet**

Cluster funding (likely)

Smart City Company contributions (not likely – conflict of interest)

Municipality associations (not likely)

### **3.5.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia is in close contact with Basque Government in what concerns defining a Research Strategic Plan for the Region (very likely)

### **3.5.4 DSP**

Regional and EU Grants and Subsidies (likely)

Membership, sponsorship (unlikely)

## **3.6 *Joint international events***

### **3.6.1 AAU**

EU Cluster projects (very likely)

H2020 technology projects (likely)

Region North government (likely)

### **3.6.2 BICCnet**

EU cluster projects (very likely)

Company sponsorship for local events (very likely)

Cluster funding for local events (very likely)

### **3.6.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's own funding for participating in international events of relevant interest (very likely)

Tecnalia promoting/organising international events with own funding (not likely)

### **3.6.4 DSP**

Back to back with existing events which are funded by event organizers (likely)

Payment by cluster members (likely)

Supported by Flanders Investment and Trade (likely)

### **3.7        *Formal Smart City / CLINES office***

#### **3.7.1        AAU**

EU Cluster projects (likely)

Region North government (not likely)

H2020 Smart City projects (likely)

#### **3.7.2        BICCnet**

Company sponsorship (not likely)

Municipal sponsorship (likely)

Bavarian government (not likely)

#### **3.7.3        GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's plan for establishing a formal Smart City or CLINES office on its own (not likely)

#### **3.7.4        DSP**

Funded by EU grants and other subsidies (likely)

In kind contribution by CLINES consortium partners (likely)

Cluster membership fees and sponsorship (likely)

### **3.8        *Matchmaking across sectors and across regions***

#### **3.8.1        AAU**

National Funding (likely)

Sector associations (very likely)

Region North (likely)

#### **3.8.2        BICCnet**

EU cluster projects (very likely)

Company sponsorship for local events (very likely)

International trade promotion funds (intern./nat.) (very likely)

#### **3.8.3        GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government ( very likely)

SMEs members of GAIA (likely)

Tecnalia's nature is focused on making business across sectors and regions by knowledge and asset transfer to companies (very likely)

### **3.8.4 DSP**

Back to back with existing events which are funded by event organizers (likely)

Payment by cluster members (likely)

Supported by Flanders Investment and Trade (likely)

## **3.9 *Connect to similar (EU) projects***

### **3.9.1 AAU**

EU Cluster projects (very likely)

Cluster base funding (likely)

H2020 projects (likely)

### **3.9.2 BICCnet**

Cluster funding (very likely)

EU cluster projects (very likely)

Export aid funds (likely)

### **3.9.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Our base funding (likely)

Tecnalia participates in many other EU projects (very likely)

Tecnalia scouts for key partners/projects in the domain of interest and establishes specific contact (very likely)

### **3.9.4 DSP**

Business Development Budget from CLINES partner (likely)

Supported by Flanders Investment and Trade (likely)

## **3.10 *Create access to research groups***

### **3.10.1 AAU**

National funding (very likely)

H2020 technology projects (likely)

Cluster base funding (likely)

### **3.10.2 BICCnet**

Cluster funding (very likely)

Project funds for dissemination of results (likely)

Request by companies (likely)

### **3.10.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Our base funding (likely)

Tecnalia uses its own network for providing access to different research groups within or outside the consortium (very likely)

Tecnalia takes a step in gaining valuable contacts with specific research groups not connected up to date (very likely)

### **3.10.4 DSP**

Membership fees, sponsorship (likely)

Project funding (likely)

## **3.11 Innovation workshops**

### **3.11.1 AAU**

EU Cluster projects (very likely)

National funding (likely)

Region North (likely)

### **3.11.2 BICCnet**

Cluster funding (very likely)

EU cluster projects (likely)

Company request with specific needs (likely)

### **3.11.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's own funding (not likely)

Tecnalia seeking for specific funding for Innovation Workshops (not likely)

### **3.11.4 DSP**

Project funding (likely)

Sponsorship (likely)

Fee for service (likely)

## **3.12 *Innovation sharing via demonstrators***

### **3.12.1 AAU**

H2020 technology projects (very likely)

Funding from involved companies (likely)

Innovation express (likely)

### **3.12.2 BICCnet**

Project funds for dissemination of results (likely)

Marketing funds of companies (likely)

Marketing funds of research institutions (likely)

### **3.12.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Our base funding (likely)

Tecnalia promotes achievements and spreads research outcome via own demonstrators (very likely)

Tecnalia supports Innovation Sharing by disseminating partners' demonstrators (very likely)

### **3.12.4 DSP**

Project funding (likely)

Funded by stakeholders as part of their business development strategy (likely)

## **3.13 *Understand users via use cases***

### **3.13.1 AAU**

National funding (very likely)

H2020 projects (likely)

Region North government (not likely)



### **3.13.2 BICCnet**

Company request (not likely – specialised companies exist)

Project funds of research institutions (likely)

Public funds for policy preparation (not likely – specialised companies exist)

### **3.13.3 GAIA/Tecnalia**

SMEs members of GAIA (likely)

Basque Country government (likely)

Our base funding (likely)

Tecnalia performs extensive sessions with potential customers in order to showcase their inner demands, or weaknesses where technology could help or solve hidden problems (very likely)

Tecnalia uses virtual use cases for illustrating benefits of incorporating technology to improve specific variables, situations, or problems (very likely)

### **3.13.4 DSP**

Research projects (likely)

Paid by stakeholders (likely)

## **3.14 Training/mentoring**

### **3.14.1 AAU**

Own funding by the involved institutions (very likely)

National funding (likely)

EU cluster projects (likely)

### **3.14.2 BICCnet**

Time donations by companies (likely)

Cooperation with entrepreneurship institutions (likely)

Public funding (not likely)

### **3.14.3 GAIA/Tecnalia**

Basque Country Municipalities (likely)

Basque Country government (likely)

Our base funding (likely)

Tecnalia performs training in many different ways, with its own budget (not likely)

Help companies to find funding for training and mentoring (likely)

### **3.14.4 DSP**

Fee for service (likely)

SME portfolio (likely)

Voucher schemes as part of EU funded projects (likely)

## **3.15 *Exchange of knowledge***

### **3.15.1 AAU**

EU Cluster projects (very likely)

National funding (likely)

Region North government (not likely)

Tecnia investing own funds in sharing knowledge (likely)

Tecnia helping companies in the look for funding for knowledge management (likely)

### **3.15.2 BICCnet**

Cluster funding (very likely)

Event sponsorship by companies (likely)

National industry promotion projects (not likely)

### **3.15.3 GAIA/Tecnia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

### **3.15.4 DSP**

Fee for service (likely)

Business development budget (likely)

Project funding (likely)

## **3.16 *Match making/Open development models***

### **3.16.1 AAU**

EU Cluster projects (very likely)

National funding (likely)

Sponsorship by involved institutions (likely)

### **3.16.2 BICCnet**

Cluster funding (likely)

EU project funding (likely)

Company sponsoring of matchmaking events (likely)

### **3.16.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's own funding for match making (not likely)

Tecnalia's own funding for promoting open development models (not likely)

Tecnalia guiding/supporting companies willing to adopt open development models with help of external funding (likely)

### **3.16.4 DSP**

Membership fees (likely)

Fee for service (likely)

Project funding (likely)

## **3.17 *Facilitate international outreach for SMEs***

### **3.17.1 AAU**

EU Cluster projects (very likely)

National marketing funding (likely)

Region North government (likely)

### **3.17.2 BICCnet**

Regional/national export promotion funds (very likely)

EU export promotion funds (very likely)

Time donations by export promotion agencies (likely)

### **3.17.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's intention to bring regional SMEs into EU funding schemes (very likely)

Tecnalia supporting SME's strategic plans for international expansion (likely)

### **3.17.4 DSP**

Flanders investment & trade (likely)

Project grants from EU and regional authorities (likely)

## **3.18 *Knowledge on business models***

### **3.18.1 AAU**

EU Cluster projects (very likely)

Sponsorship by involved institutions (likely)

Cluster base funding (not likely)

### **3.18.2 BICCnet**

Cluster funding (not likely)

Event entry fee (likely)

Time donations by economic research institutions (likely)

### **3.18.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Spain government (likely)

The Innovation Strategies Division of Tecnalia helps envisioning and developing innovative business models (very likely)

### **3.18.4 DSP**

SME portfolio (likely)

IWT feasibility studies (likely)

EU projects (likely)

## **3.19 *Exchange between universities***

### **3.19.1 AAU**

H2020 technology projects (very likely)

National funding (likely)

Region North government (not likely)

### **3.19.2 BICCnet**

Funding by Technical University of Munich (very likely)

EU mobility support (likely)

National mobility support (DFG) (likely)

### **3.19.3 GAIA/Tecnalia**

EU Cluster projects (likely)

Basque Country government (likely)

Our base funding (likely)

As a Research Centre, Tecnalia is always in close contact with European Universities and Research Institutions (very likely)

### **3.19.4 DSP**

Membership fees (likely)

Project grants (likely)

Business development budget (likely)

## **3.20 Public Procurement**

### **3.20.1 AAU**

H2020 technology projects (very likely)

Municipal sponsorship (likely)

Region North government (likely)

### **3.20.2 BICCnet**

Regional government (likely)

### **3.20.3 GAIA/Tecnalia**

Basque Country Municipalities (likely)

Basque Country government (likely)

Spain government (likely)

Tecnalia's own activity (not likely)

### **3.20.4 DSP**

PCP scheme EU (likely)

### **3.21**      ***Funding opportunities exchange via regional offices***

#### **3.21.1**      **AAU**

Region North government (very likely)

National funding (likely)

EU cluster projects (likely)

#### **3.21.2**      **BICCnet**

Regional economic promotion funds (likely)

Time donations by existing funding navigation agencies (likely)

Regional project initiation funds (likely)

#### **3.21.3**      **GAIA/Tecnalia**

Basque Country government (likely)

Spain government (likely)

Our base funding (likely)

Tecnalia dedicates a specific department (Public Programmes) to support all activities related to the exchange of information regarding regional, national, or international funding opportunities in diverse research fields (very likely)

#### **3.21.4**      **DSP**

Support by Flanders Investment and Trade (likely)

## 4 Revenue sources, to finance the Smart City activities

The purpose of this chapter is to give a general overview of which options are available to fund the Smart City activities of the CLINES consortium partners after the project funding has run out. For some funding categories, very concrete opportunities are listed.

While the focus of the previous chapter is to provide viable funding ideas for very specific action, the intention of this one is to provide an overview of possible ways of funding.

This chapter is supplementing the deliverable D2.4, “Analysis and catalogue of funding sources”, but concentrating on funding for common cluster actions, and not on R&D funding options. Current EU calls sprung up since the completion of D2.4 are detailed.

### 4.1 *Membership fees*

- Paid by general cluster members. It has to be noted that the cluster organisations in the consortium have member companies from a wide range of technical fields, and only a subset of them is from the Smart City area – so only a portion of the general fields can be used in this area.
- As part of a special Smart Cities experts group. This group would collect individuals from entities that are interested in the development of Smart City ideas and projects, so much that they are willing to pay a fee to be included. The group would serve as a communication platform, and include companies as well as municipalities.

### 4.2 *Services*

Cluster organisations might be able to collect fees for services they provide. Services relevant in the Smart City context:

- Consultancy on Smart City solution consortium forming – enabling companies to offer more complete products by mutually aligning along the value chain
- Collecting Smart ideas from the university for the City (board established for this in Aalborg already)
- Organising Smart City Innovation Workshops – the fees can either be collected from the challenge owner (e.g. municipalities), or from the participants that get access to the challenge owner and get closer ties with complementary businesses.
- Organise B2B meetings between Smart City Municipalities and SMEs – helping the municipalities in choosing procurement/solution partners.
  - Matchmakings can also be held cross-nationally, tightening the CLINES ecosystem.
- Train experts in the field of Smart City by providing literature and briefing sessions. This enables for example time-strapped executives of SMEs to get a grasp of the field.

More service ideas – ranked important for the CLINES consortium – are listed in Chapter 2 (e.g. 0 – Smart city evaluation platform).

### 4.3 State funding

National and regional funding might be available in the following contexts:

- Smart City is recognised as important topic in official roadmap documents (compare deliverable D2.1, chapter “Public programs and policies”)
- Economic promotion funds aimed towards technology companies
- Promotion schemes for relations between specific countries
- Research programs unfortunately seldom allocate funds for the involvement of cluster organisations – whose role would be to facilitate consortium creation, act as a translator between the domains involved, and ensure smooth communication within the project consortium.

### 4.4 EU Projects

The most promising EU project call lines for Smart Cities have already been identified in Deliverable D2.4, Chapter 7, “European budget financial Sources” (p. 29ff). This chapter puts the focus on funding of cluster organisations and recent calls.

An additional source for all financial support in a Smart City is available in the article “An Overview of Funding Opportunities for Smart Cities”<sup>5</sup>.

#### 4.4.1 Topics

Calls from the following topic areas are of interest to the ESSC consortium:

- Smart Cities
  - Smart Transport
  - Smart Living
  - Smart Energy/Environment
- Embedded Systems
  - SW
  - Chips
  - CPS/IoT

#### 4.4.2 Programs

##### General Cluster Collaboration

The EU initiatives and calls to tighten cluster collaboration can be located via the EU cluster portal<sup>6</sup>. Of special interest is the European Cluster Observatory that provides an analysis of national and EU cluster policy.

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<sup>5</sup> An Overview of Funding Opportunities for Smart Cities: Marketplace of the European Innovation Partnership on Smart Cities and Communities, <https://eu-smartcities.eu/content/overview-funding-opportunities-smart-cities>; retrieved 12/2015; very current data.

<sup>6</sup>EU cluster portal: [http://ec.europa.eu/growth/smes/cluster/index\\_en.htm](http://ec.europa.eu/growth/smes/cluster/index_en.htm)



## **COSME**

The program will target actions to improve and strengthen the competitiveness and sustainability of EU enterprises, and in particular SMEs;

The call COS-CLUSTER-2014-3-03 – Cluster Go International has the goal of intensifying cluster and business network collaboration across borders and sectorial boundaries and supporting the establishment of European Strategic Cluster Partnerships. The consortium applied to this call, and was recently **invited to begin grant preparation**.

## **Interreg**

The Interreg Europe program<sup>7</sup> is part of the cohesion policy of the EU, and strives to improve cross-regional cooperation. Calls for example under Interreg Alpine Space<sup>8</sup> set the focus on a specific region, and within on a certain domain. Cluster organisations can act as facilitator for such calls (for example BICCnet found regional cluster partners for an Alpine Space consortium).

## **Eurostars**

Eurostars<sup>9</sup> is an open transnational program, where projects have partners from two or more Eurostars countries, focussed at SMEs. Thanks to this international collaboration, SMEs can more easily gain access to new markets.

## **Innosup**

The current Innosup calls<sup>10</sup> – “For a better innovation support to SMEs” – have a clear focus on support services for SMEs, which cluster organisations are well positioned to provide.

## **Joint Programming Initiative Urban Europe**

The aim of the JPI<sup>11</sup> is to create attractive, sustainable and economically viable urban areas. One of the JPI actions is to handle calls for European parties, such as the call “ERA-NET COFUND Smart Cities and Communities”<sup>12</sup>. H2020 calls supporting the JPI, such as the CSA “Support to JPI Urban Europe”<sup>13</sup>, are of interest to Smart City cluster organisations.

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<sup>7</sup> Interreg: <http://www.interregeurope.eu>

<sup>8</sup> Alpine Space: <http://www.alpine-space.eu/>

<sup>9</sup> Eurostars: <https://www.eurostars-eureka.eu/>

<sup>10</sup> H2020-INNOSUP-2016-2017:

<https://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/calls/h2020-innosup-2016-2017.html>

<sup>11</sup> JPI: <http://jpi-urbaneurope.eu/>

<sup>12</sup> ENSCC: <http://jpi-urbaneurope.eu/enscc/>

<sup>13</sup> WIDESPREAD-02-2016:

<http://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/topics/4055-widespread-02-2016.html>

### 4.4.3 Concrete Calls of interest

#### **Net Innovation Initiative**

Topic identifier: ICT-12-2016<sup>14</sup>

Deadline: 12-04-2016

Topic summary: FIWARE & Smart Cities

Possibility for a Coordination and Support action providing support for collaboration and networking in the domain of Future Internet including the organisation of the Net Futures conference.

Core interest is the distributed architectures and decentralised platforms developed under FIWARE.

#### **Large Scale Pilots**

Topic<sup>15</sup> identifier: IoT-01-2016

Deadline: 12-04-2016

Topic summary: IoT Pilots

An innovation action, with pilot 4 requesting IoT “Reference zones in EU cities”, and pilot 5 proposing “autonomous vehicles in a connected environment”. Both pilots are in line with CLINES goals and stakeholder contacts.

#### **Smart Cyber-Physical Systems**

Topic identifier: ICT-01-2016<sup>16</sup>

Deadline: 12-04-2016

Topic summary: Embedded CPS for IoT

The CSA of the call is about strategically updating and validating CPS roadmaps. The CLINES consortium has already summarised roadmaps, and participated in the creation of one (agendaCPS).

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<sup>14</sup> ICT-12-2016:

<http://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/topics/5083-ict-12-2016.html>

<sup>15</sup> IoT-01-2016:

<http://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/topics/2223-iot-01-2016.html>

<sup>16</sup> ICT-01-2016:

<http://ec.europa.eu/research/participants/portal/desktop/en/opportunities/h2020/topics/5085-ict-01-2016.html>