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O.T 4.1

“Report on Smart Space Strategy Elaboration”

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1. Executive Summary

In the Smart Space project, the activity AT4.1 aims to elaborate a Smart Space strategy containing strategic actions to reinforce the cooperation and the collaborations within the Alpine Space area on the topic of digitization of traditional SMEs.

Based on the outputs of WPT1, including the consideration of the specificities of the Alpine Space on digitization challenges, the results of the SMEs on-line survey that had been conducted by the PPs, an analysis has been conducted and discussed within the consortia. This analysis also took into consideration all the recommendations and lessons learnt from the pilot actions in WPT3 for intermediaries/SMEs.

The analysis also took in consideration that the Alpine Space regions have dedicated policies with specific local/regional actions for industry 4.0, the Alpine Space states have also their own national plans for industries 4.0 with also some dedicated services or instruments that are targeting SMEs. The Alpine Space Interreg program also supports some projects on digitization and industry 4.0 in the Alpine Space macro-region such as the Smart Space project or the Bifocalps project. At European level, the framework program Horizon 2020 funds digitization related programs such as the Industry for Manufacturing SMEs (I4MS) or as the Factory of Future PPP. The Smart Space strategic actions should be linked to these initiatives.

The Smart Space Strategy has been built on 4 pillars, with a list of actions and expected outputs for each of the pillars.
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2. Applied approach

Based on the analysis of the results of WPT1, the needs the Smart Space Strategy actions should address have been outlined for the three targets of the Smart Space project and a SWOT analysis has been compiled.

- **The Alpine Space industrial SMEs need to digitalize their products and their processes to face the global competition.**

  This is even more relevant in the Alpine Space area because the manufacturing sector is strong with a lot of SMEs working in traditional sectors such as mechanics, chemicals, wood, textile... This category of traditional SMEs is less aware about the potential of digitization for their development. According to the Smart Space survey conducted at Alpine Space region level in the WP1, for most of the SMEs, there is no strategy or a lack of strategy for digitization. Most of the SMEs have no specific plans or actions on this topic.

- **The Alpine Space intermediaries in charge of SMEs development need to be qualified in digital transformation and digital technologies to provide the adequate assistance to the SMEs in their paths to industry 4.0.**

  Intermediaries should be able to diagnostic the digital maturity of the SMEs, to identify their needs for Industry 4.0, then to inform and connect them with the appropriate expertise or relevant technology existing in the ecosystem. This can be done at local level (region) and at transnational level (Alpine Space macro-region).

- **The policy makers need to take measures to create the good framework conditions to have more digitized SMEs in the Alpine Space**

  One major characteristic of the Alpine Space region is a strong R&D tissue, with a lot of technologies leaders, technologies providers and innovative digital start-ups, well-known research and technology organisations that are a huge resource for the SMEs. The policies should encourage the matching of these resources with the SMEs and should support the networking of all the digital stakeholders (SMEs, intermediaries) at Alpine Space level.
<table>
<thead>
<tr>
<th>STRENGTHS</th>
<th>WEAKNESSES</th>
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<tbody>
<tr>
<td>Strong network of industrial SMEs in the Alpine Space</td>
<td>No existing strategy on digital transformation for a large range of traditional SMEs</td>
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<td>High R&amp;D and technologies resources and expertise (competences, equipment, infrastructure ...) in the Alpine Space ecosystem</td>
<td>Reluctance of some SME to be involved in transnational cooperation for expertise due to cultural, distance and language barriers</td>
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<td>Alpine Space area as a relevant geographic area in Europe for economic development and industry</td>
<td>Low rate of the highly digitalised SMEs</td>
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<td>Large panel of intermediaries and infrastructures to assist traditional SMEs to foster digital innovation</td>
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<tr>
<th>OPPORTUNITIES</th>
<th>THREATS</th>
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<td>Increase the competitiveness of traditional SMEs from the industrial sectors through adoption of digital and industry 4.0 technologies</td>
<td>Regional governments focus on regional approaches first, no priority for transnational collaborations and for interregional co-investments.</td>
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<td>Alpine Space area to become more competitive and innovative territory with digital technologies adoption through a network of intermediaries/hubs to assist SMEs (a network of DIHs at Alpine area level)</td>
<td>Numerous and fragmented initiatives in the Alpine region</td>
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<td>Shared policy trough EUALPS to develop cross-border cooperations in the Alpine Space regions for digital transformation. Reduce fragmentation between regional, macro-regional, national, european initiatives.</td>
<td>Transnational support difficult to be mobilized by an SME</td>
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<td>Existing connections and networks thanks to H2020/Interreg projects</td>
<td>Transnational sustainable model for a network of Digital Innovation Hubs at a macro regional level (Alpine Space)</td>
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<td>A group on Digital Industry in the EUSALP implementation strategy working groups</td>
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Then the Smart Space Strategy has been built on 4 pillars. For each pillar, a list of relevant action has been identified as recommendations of strategic actions and a list of outputs for the Smart Space strategy and its implementation.
- Pillar 1: Horizon Europe program including Factory of Future PPP with collaborative projects between Research & Innovation centers / Digital Innovation Hubs and SMEs, some projects supporting SMEs for digital transformation through experiments and test of new digital innovations;
  
  o Outputs of Pillar 1 for the Smart Space Strategy:
    ▪ Collaborative Horizon 2020 projects with Alpine Space SMEs to develop, test and experiment digital solutions for new products/ processes/ services
    ▪ Coordination and support actions in Horizon 2020 for Alpine Space organisations including networking of Alpine Space Hubs
    ▪ Vouchers to the benefits of Alpine SMEs from cascade funding projects

- Pillar 2: Digital Europe programme with support of networking of the Alpine Space DIHs to provide to the SMEs the best competences and infrastructures for digital transformation and with capacity building and training of SMEs on digital technologies;
  
  o Outputs of Pillar 2 for the Smart Space Strategy:
    ▪ Qualified intermediaries and high quality services
    ▪ Network of Alpine Space Digital Hubs to share complementarities in term of expertise between local and transregional hubs to the benefit of the SMEs
    ▪ Set up and Alpine Space digital innovation hub catalogue;

- Pillar 3: Strategic partnership and Smart Specialization Strategies (S3) to rationalize and encourage investments for digital equipments and infrastructures including investments through European Regional Development Funds (ERDF) and to facilitate interregional cooperation by exploiting complementarities in the digitization
  
  o Outputs of Pillar 3 for the Smart Space Strategy:
    ▪ Co-investments (interregional investments) in digital technologies and in development of digital skills
    ▪ Invest in infrastructures to test digital technologies.

- Pillar 4: EUSALP strategy to develop dedicated policies and initiatives that will encourage digital transformation of companies and for facilitating transnational collaborations;
  
  o Outputs of Pillar 4 for the Smart Space Strategy:
SMART-SPACE – Output OT 4.1

- Alpine Space transnational events on industry 4.0
- Transnational directories of digital expertise, technologies and infrastructures,
- Put digitization and Industry 4.0 as priorities of the agenda of the next presidency of the Alpine Space area and of the next Alpine Space program with the working group on Digital Industry
- Develop instruments to support the collaboration on regional and transnational level on digital transformation
- Sustain the SMARTSPACE Hub, implement and enlarge it.

3. The main results

**Smart Space Strategy Baseline:**

Provide to each Alpine SME an effective and sustainable digitization ecosystem and access to the best capacities in the Alpine area for digitization, using the strengths of transnational collaborations and synergies at Alpine space level

Regarding the SWOT analysis and considering the 4 pillars above to base the strategy, we set up a proposal on the actions for the Smart Space Strategy. To implement this strategy the aim is to exploit all the potentials of the existing regional, national and European initiatives targeting digitization of SMEs.

<table>
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<th>Identified action</th>
<th>Means and recommendations</th>
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<tr>
<td><strong>Pillar 1: EUSALP</strong></td>
<td>Alignment of Alpine Space strategy for manufacturing with European, national and regional policies. Alpine Space regions should respond to the needs of the industry for digitalization.</td>
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<td>EUSALP working group on Digital Industry</td>
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<td>Put digitization and Industry 4.0 as a priority in the future</td>
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<td>Interreg Alpine Space</td>
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<td></td>
<td>Sustain the Smart Space Hub, implement and enlarge it</td>
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<td>Boost the matching between SME needs and the technologies in Alpine Space</td>
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<td>Alpine Space transnational events</td>
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<td></td>
<td>Alpine space transnational directories and mapping of competences (Smart Space Hub as the basis) - An important aspect is the capacity to define the criteria</td>
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| **Pillar 2: Horizon Europe and Factory of Future** | **Improve collaboration between Research & Innovation centers and SMEs and between the industries themselves for digitization** | **Promotion of technological networks and of technology providers**
Collaborative H2020 project with several Alpine Space partners
Alpine Space Interreg projects |
|--------------------------------------------------|--------------------------------------------------|------------------------------------------------------------------|
| **Encourage exchange of experiences and good practices for Industry 4.0 and digitization at Alpine Space level** | **Coordination and support actions in Horizon 2020**
Alpine Space Interreg projects | |
| **Support for SMEs for innovative experiments with digital technologies** | **Cascade funding for Alpine SMEs (vouchers system at Alpine Space level)**
ERDF funds | |
| **Pillar 3: Digital Europe and Digital Innovation Hub** | **Provide to the Alpine SME the complementary competence and infrastructure at Alpine Space level** | **Set up an Alpine Space DIH catalogue serving both the purpose of gathering data on the DIHs that exist in Alpine Space and advancing DIH** |
| **Pillar 4: Strategic partnerships and S3** | **Rationalize and encourage investments in Alpine Space area: funding and investments dimensions are** | **Develop co-investments in digital technologies and in development of digital skills in complementary with the** |

| **Development of the network of the Alpine Space area DIHs. Identify complementarities in SME needs and digital expertise** | **Describe use cases: description of the service that can be provided to an Alpine SME by this network of DIHs. No Hub has all relevant resources for digital transformation of SMEs. Partnering with other DIHs is a key solution. An Alpine Space network of DIHs could be the platform to share complementary expertise and good practices. It could be a solution to identify common specific issues for SMEs in Alpine Space and propose to the SMEs solution from another Alpine Space region, get solutions, best practices can be exported to other regions.** | |
also very important to be successful in Smart industries. European program (Digital Europe) and national programs. Alpine Space Interreg projects are also a mean.

Smart specialization strategies drive interregional cooperation, by exploiting complementarities in the development for digitization.

Invest in shared infrastructures to test and experiment digital technologies.

### 4. Other results

- Connection of the project to the Alpine Space program Working Groups, Group 4 on digital Industry
- Identify the main pillars of the strategy of Smart Space
- Identification of the main actions to be conducted and of the means/ways to implement it
- Communication on the Smart Space Strategy though a workshop in Brussels on November 8, 2019

### 5. Annexes

- Document D.T4.2.1: elaboration of the Smart Space Strategy
- PWT presentation of the strategy - Steering Committee in Global Industry, March 8, 2019
- PWT presentation of the Smart Space strategy, steering committee Lyon on June 13, 2019
- The Smart Space Strategy brochure