

heritact

**2.4 HERITACT Community led design
framework**

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Deliverable

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D2.4 HERITACT Community led design framework

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Statement of Originality

This deliverable contains original unpublished work except where clearly indicated otherwise. Acknowledgement of previously published material and of the work of others has been made through appropriate citation, quotation or both.

Summary

This Deliverable 2.4 (D2.4) report includes the research conducted and the framework developed under Task 2.4 (T2.4) *Community led design & development methodological framework* from months M2 to M5 of the HeritACT project.

T2.4 aligns with the first objective of Work Package 2 (WP2) Ecosystem Mapping: “Development of the basic frameworks needed for reaching the HERITACT project objectives”

The goal of the Community-led design methodology is to complement the digital participatory tools and the participatory processes (workshops) that will be run by the HeritACT partners with a Co-Design and Co-Creation toolkit. Community-led design methodology emphasises, prioritises, and focuses on the practice of collaborating with the end users and stakeholders as an integral part of the design process. Participants with different roles will align and offer diverse insights, in facilitated workshops that will be held either online or in situ. HeritACT aims at creating a design toolkit that will be able to complement and support the digital tools and enable partners to deploy a bespoke Co-Creation methodology to a given sub(project) / task.

Research approach:

Community-led design is not a theory. The evolution of community engagement and design has yielded valuable lessons from participatory and co-design initiatives,

emphasising the importance of adjusting power dynamics, centering community voices, and ensuring continuous community involvement. In response to these learnings, there has been a deliberate move towards community-led design, with the aim of enhancing the effectiveness and impact of community engagement efforts.

Since community-led design is not a theory, but rather it has emerged as a shifting design paradigm, there is a need to track its evolution in order to understand its fundamental characteristics. Numerous participatory and co- design European initiatives with a focus on community involvement, have introduced various methods, tools, and techniques. A considerable number of them have also become integral in facilitating heritage activation, introducing their approach as well. All these initiatives have been developed based on frameworks they have organised.

Therefore, in T2.4 we attempt to merge the evolution of community-led design, taking a historical perspective and a literature review, and the progressive application of participatory approaches in the Heritage sector during the last decade in order to frame our work in the present project.

The purpose of T2.4 is summarised as follows:

1. To understand the evolution of co-design towards community-led design retrospectively through literature review.
2. To follow the application of co-design in Heritage through literature review.
3. To collect and examine European Union's best practices with a focus on community engagement, participatory approaches, and heritage reactivation.
4. To analyse the collected European Union's best practices and their frameworks.
5. To find common ground between these best practices and the present project's -heritACT- goals and participatory tools.
6. To complement the heritACT tools with methods and tools stemming from the literature and the collected European Union's best practices.
7. To form the heritACT development methodological framework based on the community-led design fundamental characteristics that have been identified from both literature review and European Union's best practices.

The intended outcomes can be outlined as:

1. An understanding of the evolution of co-design to community-led design.
2. An understanding of the evolution of co-design application and implementation in the Heritage sector.
3. A high-level understanding of how community-led design facilitates heritage reactivation and preservation.
4. Familiarisation with other European best practices community-led design frameworks and toolkits.

5. Identification of community-led design fundamental characteristics.
6. Realisation of how community led design can foster heritage reactivation and preservation.
7. Orientation of the heritACT community-led design framework’s various stages and their principal prerequisites and participatory tools.

T2.4 has thus comprised of the following number of actions, as set out in this report:

1. A review of literature on the evolution of co-design.
2. A review of literature on the application of co-design in Heritage.
3. A review of European best practices with a focus on community engagement, participatory approaches, and heritage reactivation.
4. A selection of European best practices with a focus on community engagement, participatory approaches, and heritage reactivation.
5. A review of literature on the emergence of community-led design and its relation to heritage reactivation and preservation.
6. An analysis of how community-led design foundations form the heritACT development methodological framework.
7. A completion of co-design methods and tools to the heritACT digital participatory tools.
8. A mapping of co-design methods and heritACT tools to the project framework’s community-led design stages.
9. A concluding discussion highlighting the foundations of community-led design in general and in the project.

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1/ Background and context analysis

1.1 Introduction

This chapter delves into the theory and practice of co-design, exploring its evolution and context. Co-design emerged from a growing recognition of the importance of involving users in the design process. We will follow the trajectory of the discipline from one that caters to user's needs towards encouraging users to take the lead of the design process. This evolution has been marked by key milestones, including the adoption of new technologies and a shift towards greater participation.

As co-design has evolved, it has become a recognized and critical aspect of design practice in various fields, including heritage preservation. Heritage preservation plays a vital role in connecting communities to their cultural and historical inheritance, shaping a sense of belonging and continuity. By involving communities in the design process, co-design methodologies enable them to have an active role in the preservation of their tangible and intangible heritage. This approach can also ensure that heritage projects meet the needs of the community and respect their cultural traditions and values.

Co-design methodologies in heritage preservation also provide an opportunity for community empowerment, encouraging communities to become active participants in shaping their future. This approach fosters a sense of ownership and investment in the project, leading to greater long-term sustainability and resilience. Moreover, co-design can also promote a more inclusive and diverse approach to heritage preservation, incorporating the voices and perspectives of traditionally marginalised groups.

1.2 Co-design: a historical perspective

Co-design theorists and practitioners are part of a legacy that has evolved from a user-centred approach of "designing for" to an array of community-led design frameworks, toolkits, and guides that often go beyond "designing with" (Sanders, 2014). These approaches are leaning towards a form of design that emerges from the community it serves, highlighting the shift in the role of designers from designing systems that fit people to enabling people to design their own systems (Bødker et al., 2000).

As designers began to understand the importance of involving users in the design process, the practice of co-design emerged, taking root in the 1960s and 1970s. During this time, co-design was mainly implemented in the industrial design sector with a focus on the interfaces of physical products. It was in this sector that the lack of user involvement became apparent, leading to a shift towards creating more user-centred products. In the next two decades, co-design expanded beyond industrial design to sectors such as urban planning, architecture, and social design (Sanders & Stappers 2008). It began incorporating a wider range of stakeholders, including communities, end-users, and groups that did not often have a say during the design process. Designers and non-designers started working together, using scenarios, prototypes and other sense-making tools to discover, define, develop and deliver (British Design Council, 2004) their ideas. Co-design, seen as a process of democratic design experiments, can also facilitate contradictions, oppositions, and disagreement through direct engagement (Binder, 2015).

In recent years, co-design has gained momentum in sectors such as health, education, sustainability, and preservation of cultural heritage (Vosinakis et al., 2020; Barbera et al., 2017; Gheduzzi et al., 2021; J. Lee et al., 2019; Durall et al., 2019) where community involvement is crucial for effective design solutions. Co-design approaches vary widely, from collaborative workshops and participatory design sessions to co-creation labs and online platforms. This plurality of approaches creates a spectrum, where depending on where the emphasis is put - be it community participation, collaboration, leadership, or education, the role of designers shifts from initiators to enablers, and from creators to facilitators (Sanders & van Patter, 2004; Y. Lee, 2008; Morelli, 2007a; Margolin & Margolin, 2002; Leadbeater, 2010).

Overall, the evolution of co-design has led to a greater emphasis on community-led design, emphasising the importance of involving diverse stakeholders in the design process to co-create solutions that are more inclusive, accessible, and sustainable.

1.3 Application of Co-design in Heritage

In the Cultural Heritage sector, co-design practices have been increasingly implemented in recent years to enhance the engagement of communities and stakeholders in the preservation, interpretation, and promotion of cultural heritage. They have been manifested in various ways and have shown variations over time, with different networks of heritage communities involved either simultaneously or at different stages of the design process.

Additionally, the relationships that have been formed, and still being formed in such co-design initiatives, stem from academic projects or from institutions and communities where further research is needed, thus indicating an ongoing discussion. So far, co-design practices in the Cultural Heritage sector acknowledge the importance of reflection on processes that support collaboration, reflexivity, relationship building, and trust in co-design activities among the involved parties (Maye & Claisse, 2022).

Some examples of co-design practices that have been implemented in Cultural Heritage include the *Participatory design workshops* that involve different stakeholders to collaboratively develop design ideas and solutions for cultural heritage projects and assure the inclusion of diverse groups of people, including members of the public, experts, and stakeholders such as local authorities, heritage organisations, and cultural institutions. Another example is the *Co-creation of exhibitions* that engage audiences and stakeholders to gain feedback on the exhibition themes, objects, and narratives, as well as involving them in the design of interactive components of the exhibition. Similar to co-creating an exhibition is the *Co-production of digital content* such as digital storytelling, participatory video-making, and other digital media projects that enable communities and stakeholders to share their perspectives and experiences of cultural heritage. Finally, *Collaborative research* includes conducting community-led research projects, co-designing research questions and methodologies, and involving communities in the analysis and dissemination of research findings.

There are various works in the research community that describe the co-design approach and the process of involving different stakeholders in the intermediate design phases of a cultural heritage product (Vosinakis et al., 2020; McDermott et al., 2014; Ciolfi et al., 2016; Popple & Mutibwa, 2016). The work of Avram et al. (2020) stands out, describing a large-scale, long-term European research project, *meSch*, in the heritage domain that was built on co-design practices. *meSch* involved a diverse group of participants, including designers, technologists, social scientists, and

cultural heritage professionals (CHPs), with the aim of creating a platform for interactive installations in exhibition settings.

The project aimed to understand the impact of co-design in the cultural heritage sector, particularly museums, to tackle technology-driven applications that are often designed by external experts and perceived as separate from exhibition design and heritage interpretation. The researchers draw from the collected data to document the process, understand how co-design influenced the team and their practices, and examine the perceived value generated by the participatory approach. They adopted the concept of *value co-creation* proposed by Sanders and Simons (2009), which encompasses *use or experience value*, *social value*, and *monetary value*. The researchers aimed to reflect on the outcomes and impact of the co-design approach based on this framework.

The results regarding *use or experience value* had a positive user experience for CHPs, who used a specific toolkit created during the project, and for visitors of the museums featuring the installations. In terms of *social value*, mutual learning and understanding were highlighted as valuable outcomes, while team building helped address tensions and conflicts, leading to a more positive perception of roles and contributions. Another crucial aspect was the recognition of intermediate achievements and unplanned collaborations in sustaining the challenging process, thus highlighting the social value building within the team. Lastly, *monetary value* was reflected upon the gaining of new skills by the participants, likened to professional training, and the confidence expressed by the CHPs in using co-design in the future and involving other colleagues or external collaborators.

This work sums up not only the significance of putting effort into reflecting on the co-design processes followed within a project, but also investing in long-time activities. The long-term activities' implementation facilitates mutual understanding, trust, and recognition of the different role and contribution each stakeholder brings in the initiative.

1.4 Conclusions

In conclusion, the evolution of co-design from its early days in the industrial design sector to its current applications in diverse fields such as health, education, and cultural heritage, highlights the importance of involving various stakeholders in the design process. The co-design approach emphasises collaboration and participation, leading to more inclusive, accessible, and sustainable design solutions. In the cultural heritage sector, co-design practices have become increasingly common in the past decade to enhance engagement and inclusion of communities and stakeholders in the preservation and promotion of cultural heritage. Participatory design workshops, co-creation of exhibitions, co-production of digital content, and

collaborative research are some examples of co-design practices implemented in the cultural heritage sector. Co-design has a significant potential to create meaningful and sustainable solutions by bringing together diverse perspectives and expertise from various stakeholders. At the same time, it can provide value co-creation among the members of a group working on a common idea, resulting in mutual appreciation and recognition of the various roles and contributions each member brings in the project, especially when applied in the long-term.

2/ European Union Best Practices

2.1 Introduction

By gathering notable case studies from methodologies, guidelines, and toolboxes developed within the European Union, we aim to map the field of community-led design. This process allows us to draw insights and inspiration from successful initiatives, serving as a foundation to expand our contributions and align with their mission and vision.

In order to map the field of similar case studies of European projects of relevance to our present project, we asked team members with experience and expertise in the implementation of participatory processes to suggest examples they consider noteworthy and why. From the [resulting list](#), we accessed and examined, through the respective websites, the projects that had been proposed. We looked to select projects that had the following characteristics: (1) participatory processes as a key methodology for the intermediate stages of the project, specifically co-design or community-led design, (2) a conceptual methodological map that reflects the loops of conditions and results of each intermediate stage of the participatory processes, (3) participation and activation of the community to which the results of the project are addressed, (4) resulting in a manual or handbook or toolkit ensuring the sustainability of the project but also with the possibility of reproducing the process followed in similar future contexts, (5) relating to urban planning and, ideally, to the preservation, highlighting, and reactivation of heritage for the benefit of the place and the community.

Through this mapping exercise, we can identify best practices, innovative approaches, and valuable lessons learned from community-led design projects

across different contexts within the European Union. This knowledge has informed and enhanced our own efforts in promoting and implementing community-led design principles, ultimately contributing to the advancement and sustainability of this project's initiatives.

2.2 Case Study 1/ Be.CULTOUR

The overarching goal of Be.CULTOUR is to co-create and test sustainable human-centred innovations for circular cultural tourism through collaborative innovation networks/methodologies and improved investments strategies (Be.CULTOUR project, 2021). Be.CULTOUR project Coordinator is the Institute for Research on Innovation and Services for Development, National Research Council of Italy (CNR-IRISS). The Be.CULTOUR Consortium comprises 15 partners, covering EU and non-EU Countries. This project has received funding from the European Union's Horizon 2020 research and innovation programme under grant agreement No 101004627.

The Consortium includes research organisations, provincial and regional authorities, consultancies specialised in financial services, NGOs, municipalities, non-profit organisations, as well as umbrella organisations representing respectively local and regional governments (ERRIN and ICLEI).

Targeting deprived, remote, peripheral or deindustrialized areas and cultural landscapes as well as over-exploited areas, local hHeritage innovation networks will co-develop a long-term heritage-led development project in the areas involved enhancing inclusive economic growth, communities' wellbeing and resilience, nature regeneration as well as effective cooperation at cross-border, regional and local level.

The Be.CULTOUR Methodology provides actionable guidelines for the Be.CULTOUR Community: it clarifies the project's concept, approach, theoretical framework and overall methodology. This Methodology develops a comprehensive methodological basis to establish and guide the activities of the Heritage Innovation Networks (HIN). This Methodology provides methodological guidance and support to the local stakeholders throughout the different stages of the human-centred innovation process. This Methodology includes guidelines for an in-depth identification, selection, and engagement of key stakeholders for the Heritage Innovation Networks, to obtain a fair representation of all relevant groups including minority cultures and marginalised social groups. The objective is to ensure that expectations are met for each stakeholder group, thus ensuring the effectiveness of the co-creation process. These guidelines for the identification of stakeholders consider both the needs of the local level and its context as well as those of the entire project.

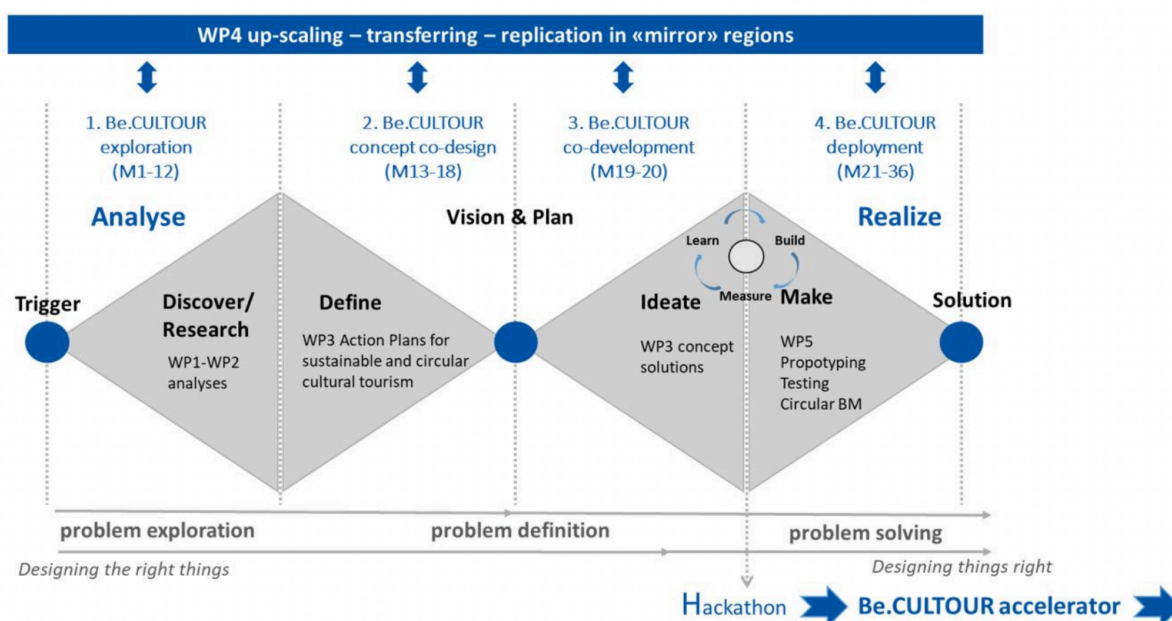


Figure 1: The Be.CULTOUR Methodology

The exploration and co-design phase includes a documentation of relevant best practices from mirror innovation ecosystems; already established Heritage Innovation Networks or other forms of Open innovation networks. Mirror innovation ecosystems stakeholders and innovators are invited to propose circular cultural tourism solutions within the context of a Hackathon.

Co-development phase: Mirror innovation ecosystems share their best practices and strategic plans for sustainable and circular cultural tourism at the Learning Lab. Mirror innovation ecosystems stakeholders and innovators can take part in the Hackathon in case they have developed concept ideas. Additional awards/prizes could be provided by own resources to take part in the Be.CULTOUR Accelerator programme.

Deployment: The selected mirror innovation ecosystems will transfer the project methodology and provide feedback regarding its transferability and replicability. Representatives of mirror innovation ecosystems will participate in webinars and benefit from Be.CULTOUR partners support/mentorship.

The codesign toolkit developed for the Be.CULTOUR project aims to facilitate the creation of action plans of circular tourism for remote places. The toolkit is made up of three steps: “Pick a destination”, this step includes Stakeholder Mapping, community building and identification of challenges and opportunities. The second

step, called “Plan your trip” is focused on ideation of possible directions, the tools adopted in this step are Signposts for the future, Action plan development and the transformation of challenges into opportunities through the use of “how might we” questions. The third and final step is titled “Pack your suitcase”; it aims to link the local Action Plan developed in the previous and other local/regional strategies. This linkage ensures the relevance, effectiveness, and long-term sustainability of the Action Plan.

Overall the Be.CULTOUR methodology adopts a community based approach that has the ambition to collectively develop a local action plan that aims to foster the emergence of a long-term heritage-led development project in the areas involved enhancing inclusive economic growth, communities’ wellbeing and resilience, nature regeneration as well as effective cooperation at cross-border, regional and local level. The key points for the methodology developed are the identification of relevant networks both locally and globally during the stakeholder analysis. The transformation of challenges to opportunities through ideation and the effective and open deployment of said action plan by a local community.

2.3 Case Study 2/ Human Cities: Creative works with small and remote places (SMOTIES)

Human Cities is a platform of interdisciplinary exchange, founded in 2006. It is examining the livability of public spaces by using participatory design as a tool to facilitate systems of process and innovation. The Human Cities platform will apply its approach to 10 small and remote European places that are affected by strong rural depopulation. These places are depositories of material and immaterial culture at risk to be undervalued, not consolidated or handed down, and hence lost. This new Human Cities project is called SMOTIES – Creative works with small and remote places. The consortium includes: Politecnico Di Milano Italy, The University Of Madeira, Portugal, Department Of Product And Systems Design Engineering Greece, The Estonian Association Of Designers Estonia, Cité Du Design – Esadse, France, Clear Village United Kingdom, Urban Planning Institute Of The Republic Of Slovenia, Zamek Cieszyn Poland, Fh Joanneum, Austria, Alternance Architecture And Urban Planning Iceland. The project is funded through European Cooperation Projects 2020 Eacea 32/2019.

SMOTIES: Creative works with small and remote places is a project that builds on the Human Cities Network involving design, art and architecture universities, practices,

agencies, cultural companies spanning all Europe, and promoting the liveability of public spaces by using participatory design as an approach to supply systems of process and innovation (SMOTIES Project, 2021). During the first years of the project, the project partners developed a shared methodology resulting in a Toolbox (still under implementation). The SMOTIES Toolbox aims to provide project leaders with practical guidance and resources to effectively engage local communities and stakeholders in envisioning near and distant futures. It is addressing specific contexts and assessing specific impact objectives to leverage the development of cultural and creative activities, ultimately leading to more livable and vibrant remote places.

The methodology of the SMOTIES Toolbox revolves around a systematic and interconnected approach to concept development and impact assessment (figure 2.). It consists of six collections of tools/toolkits. These toolkits are designed to complement and synergize with each other, providing a comprehensive framework for project leaders. The methodology involves gathering and analysing contextual information, envisioning desired future outcomes, and defining and assessing the project's impact. By leveraging the tools within each toolkit and integrating them across the system, project leaders can gain insights, set clear objectives, and evaluate the social, cultural, economic, and environmental impacts of their initiatives. The methodology promotes a structured and iterative process, enabling informed decision-making and maximising positive project outcomes. The subdivision of these toolkits guarantees a non-prescriptive and flexible process considering the needs of the project team, as well as the possibility of hacking the toolbox itself.

The first toolkit, ***Meeting the small and remote place's community, and understanding its assets and challenges***, and the second one, ***Analysing the physical morphology of the remote region***, are designed to provide project leaders with a set of tools to frame the context of a small and remote place. Through a combination of primary and secondary research, observation, and discussion, this toolkit aims to uncover the key issues and challenges faced by the community, organising them in guiding perspectives towards the future. These perspectives have been called Windows on the Future and are thematic lenses through which looking at small and remote places as seeds of the future, and constitute the third toolkit, named ***Understanding the future directions implied in the assets and challenges of the remote region***. The fourth toolkit, ***Analysing the public space of intervention of the small and remote place***, provides the tools to analyse the small and remote place's specific public space of intervention.

The methods used in this first set of toolkits facilitate reading and understanding the unique characteristics of the place, including its social, cultural, economic, and environmental aspects. By conducting research and engaging in dialogue, project leaders can identify stakeholders and map the territory, gaining a comprehensive

understanding of the local context. These toolkits set the foundation for effective project planning and ensure that initiatives are aligned with the specific needs and dynamics of the small and remote place.

The **fifth** toolkit, called ***Imagining and Envisioning Futures***, focuses on long-term thinking, and employs a foresight process to guide the ideation of creative solutions. Drawing inspiration from design practices, this toolkit utilises methods and tools for envisioning and scenario building in the development of new concepts. By considering present and future uncertainties, project leaders can generate innovative ideas and explore potential future scenarios. This toolkit encourages a forward-thinking approach that takes into account emerging trends, societal changes, and evolving needs. It fosters creative thinking and empowers project leaders to envision alternative futures and develop concepts that address the complex challenges of small and remote places.

The last (**sixth**) toolkit, named ***Defining and Assessing Impact***, aims at supporting the impact assessment of each project, by identifying the possible impacts of a project in a small and remote place and evaluating them. Defining impacts in the meta-design phase of a project allows a better clarification of the project's objectives.

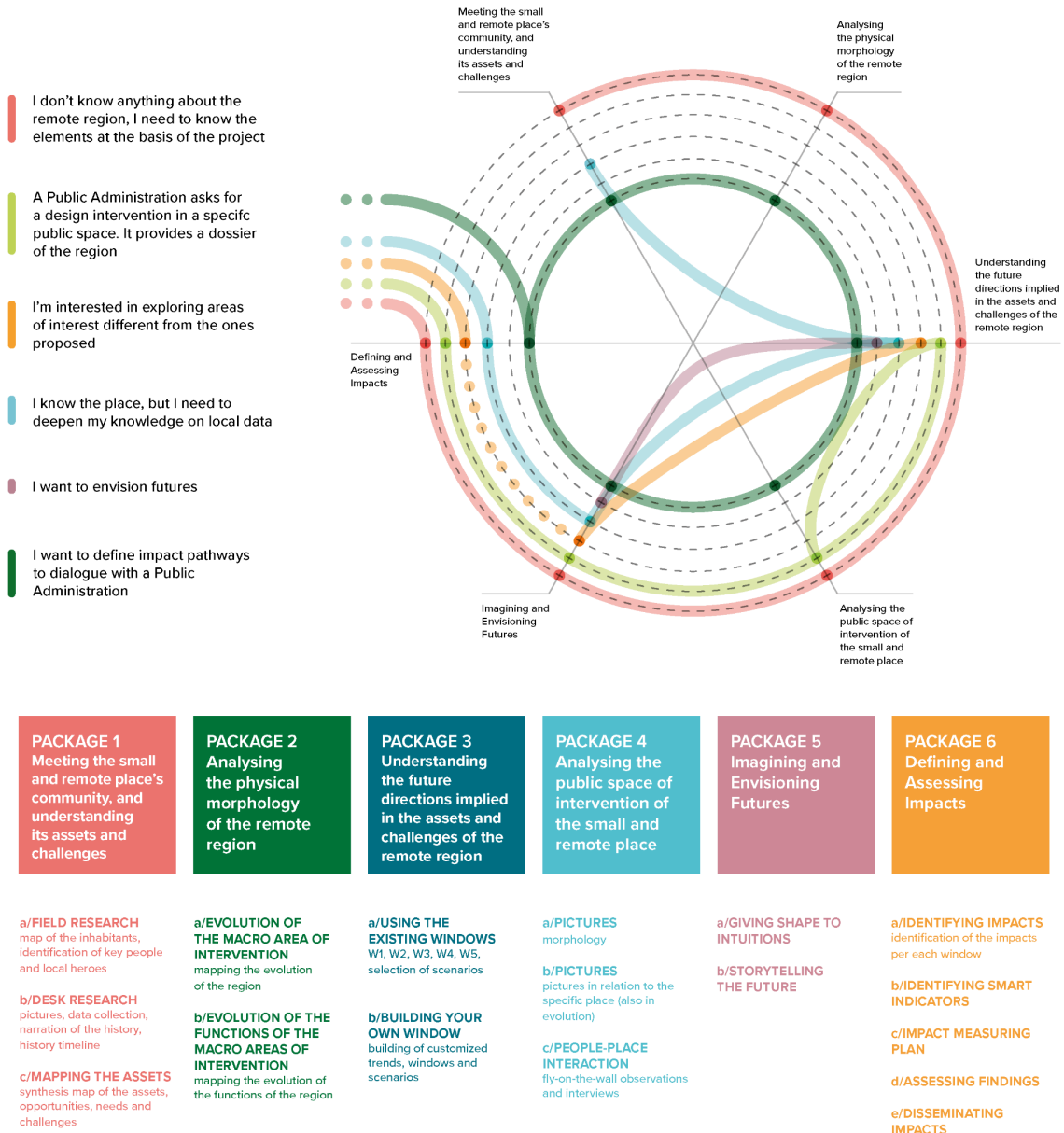


Figure 2: The SMOTIES Toolbox (under construction).

Overall, the Smoties Toolbox guides project leaders through conducting research, mapping stakeholders, and identifying challenges in small and remote places. Through foresight processes and design practices, they generate creative solutions for long-term impact. The methodology also emphasises defining clear objectives, co-creating indicators, and evaluating project effectiveness.

2.4 Case Study 3/ CitieS Health

CitieS-Health aimed to put citizens' concerns at the heart of research agenda on environmental epidemiology by tackling health issues that concern them. Citizens along with scientists in five cities in Europe co-designed and implemented epidemiological studies to explore how their living environment is affecting their health. The consortium includes the Barcelona Institute for Public Health from Spain, Epidemiologia Prevenzione from Lucca Italy, the Joseph Stephan Institute of Ljubljana, Slovenia, Vytauto Didziojo University from Lithuania and Utrecht University from the Netherlands. The project co-created an interactive toolkit with customised tools and best practices for the replication of the studies in other locations by researchers, individuals and citizen groups. This project received funding from the European Union's Horizon 2020 research and innovation programme.

The CitieS Health Toolkit serves as a prime example of a best practice framework for community engagement and problem-solving. This interactive collection of adaptable instruments empowers individuals to actively address common concerns and deploy actions for the betterment of their communities. By guiding users through four distinct phases – identification, co-design, deployment, and action – the toolkit provides a structured approach to navigate the complexities of community-based initiatives. With a focus on inclusivity and participatory decision-making, this framework fosters collaboration and enables users to make a meaningful impact on the world they live in (CitieS Health Toolkit project, 2022).

The methodology employed by the CitieS-Health Toolkit encompasses a comprehensive approach that revolves around community engagement and participatory design (figure 3.). The framework follows a step-by-step process, starting with the **identification phase**, which involves understanding citizens' concerns and transforming them into research questions. Subsequently, the **co-design phase** emphasises the involvement of community members in decision-making processes and the design of studies to answer the research questions identified earlier. The **deployment phase** focuses on launching data collection efforts and analysing the collected data, while the **action phase** emphasises the dissemination of results, citizen-led initiatives, and planning for long-term project legacies.

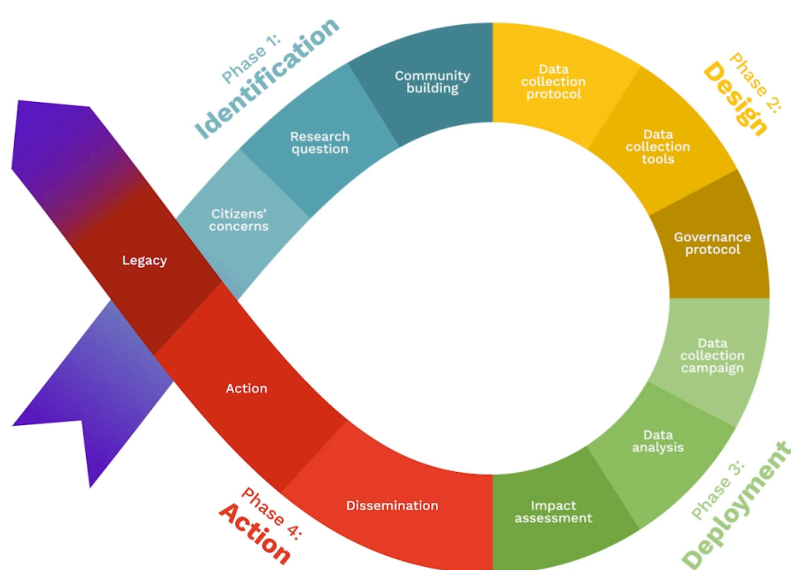


Figure 3: The CitieS-Health Toolkit

The design phases of the CitieS-Health Toolkit offer a nuanced and holistic approach to addressing community concerns. In the Identification phase, participants delve into the core issues affecting their communities, establishing a foundation for subsequent actions. The toolkit guides users through the process of turning these concerns into research questions, ensuring a systematic and focused approach. The co-design phase capitalises on the expertise and perspectives of community members, empowering them to contribute to the decision-making process and actively shape the research study design. This participatory element fosters inclusivity and generates a sense of ownership among community members.

The approach adopted by the CitieS-Health Toolkit can be characterised as community-centric and action-oriented. By placing citizens at the forefront, the toolkit recognizes the importance of engaging with local communities to gain a comprehensive understanding of their concerns and aspirations. The emphasis on co-design and participatory decision-making ensures that the outcomes of the research process are rooted in the real needs of the community. Furthermore, the toolkit encourages the implementation of actions that leverage the research findings, aiming to create tangible and sustainable impacts. This comprehensive approach not only generates valuable insights but also cultivates a sense of empowerment and ownership within communities, fostering a culture of active citizenship.

2.5 Case Study 4/ Making Sense

The Making Sense project ran for two years between 2015-2017 with the aim to deepen citizens' understanding of collective awareness and develop frameworks for participatory environmental practices, citizen co-inquiry, and hands-on transformation of surroundings. The consortium is made up of WAAG Society from the Netherlands, IAAC from Barcelona, the University of Dundee from Scotland, P.E.N. from Kosovo, the joint Research Centre- European Commission from Belgium and the University of Twente from the Netherlands. This project has been co-funded by the European Commission within the Call H2020 ICT2015 Research and Innovation action.

The motivation stemmed from the fact that Fab Labs and maker spaces had already created opportunities for citizen-driven innovation in various domains, including open hardware, digital fabrication, and participatory sensing, and leading to the development of low-cost, open-source sensors. The result was a toolkit based on the Smart Citizen platform, tested in pilot projects in Amsterdam, Barcelona, and Prishtina.

The toolkit acts as a handbook drawing on nine citizen sensing campaigns in 2016 and 2017. Based on the pilots, the project developed a conceptual and methodological framework for participatory environmental maker practices providing citizens and communities with appropriate tools to enhance their everyday environmental awareness, to enable active intervention in their surroundings, and to change their individual and collective practices, in the form of a toolkit (Making Sense project toolkit, 2020).

The framework has eight (8) phases: **Scoping, Community Building, Sensing, Awareness, Action, Reflection,** and **Legacy** (pictured in figure 4.). Each phase provides the rationale behind it, asking the questions “why is it important”, “what happens”, “who can do this”, “when do we do it”, and “how to do it”, and contributes with adequate participatory techniques, tools and steps to apply them, and the relevant key participants involved in each process.

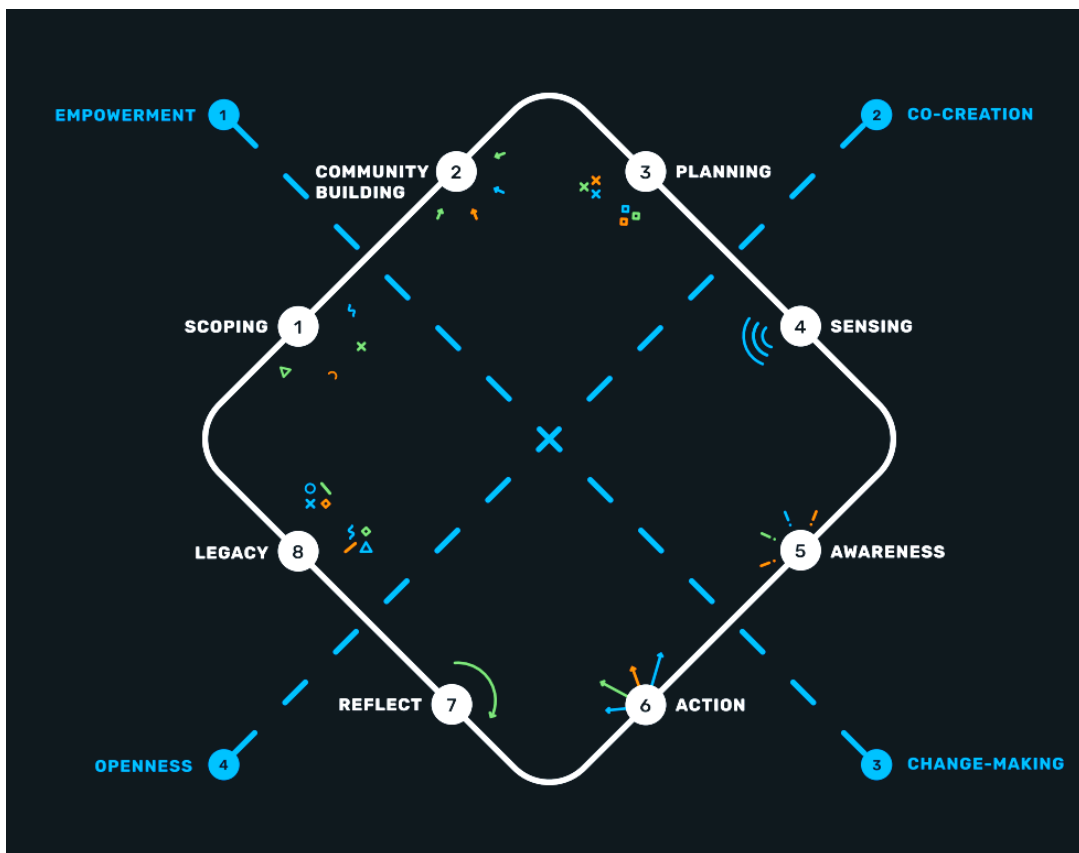


Figure 4: The Making Sense Toolkit.

The toolkit also offers seven (7) key insights as a closing point, including the importance of bringing the community fully on board when key decisions are to be made, targeting for expansion and partnering up, combining engagement campaigns through social media, planning for inclusivity, accumulating diverse knowledge, generating robust and accessible data, and promoting community ownership so the results can sustainably continue without experts' support after a while.

Overall, the resulting handbook intends to help community activists, professionals in organisations which support community actions and activists, and researchers in the fields of citizen science, community activism and participatory sensing, government officials and other public policy actors who wish to include citizens' voices in the decision-making process.

2.6 Case Study 5/ Regeneration and Optimisation of Cultural heritage in creative and Knowledge cities (ROCK)

ROCK was an EU project during 2017-2020 aimed at revitalising and reusing historic city centres through an innovative, collaborative, and circular approach. Involving 10 cities, 7 Universities, 3 networks of enterprises, 2 networks of cities and several companies and development agencies, a foundation and a charity. This project has received funding from the European Union’s Horizon 2020 research and innovation programme. By implementing successful heritage-led regeneration projects, ROCK, pictured below in figure 5. sought to test the replicability of these initiatives and address the specific needs of historic city centres (ROCK project, 2019).

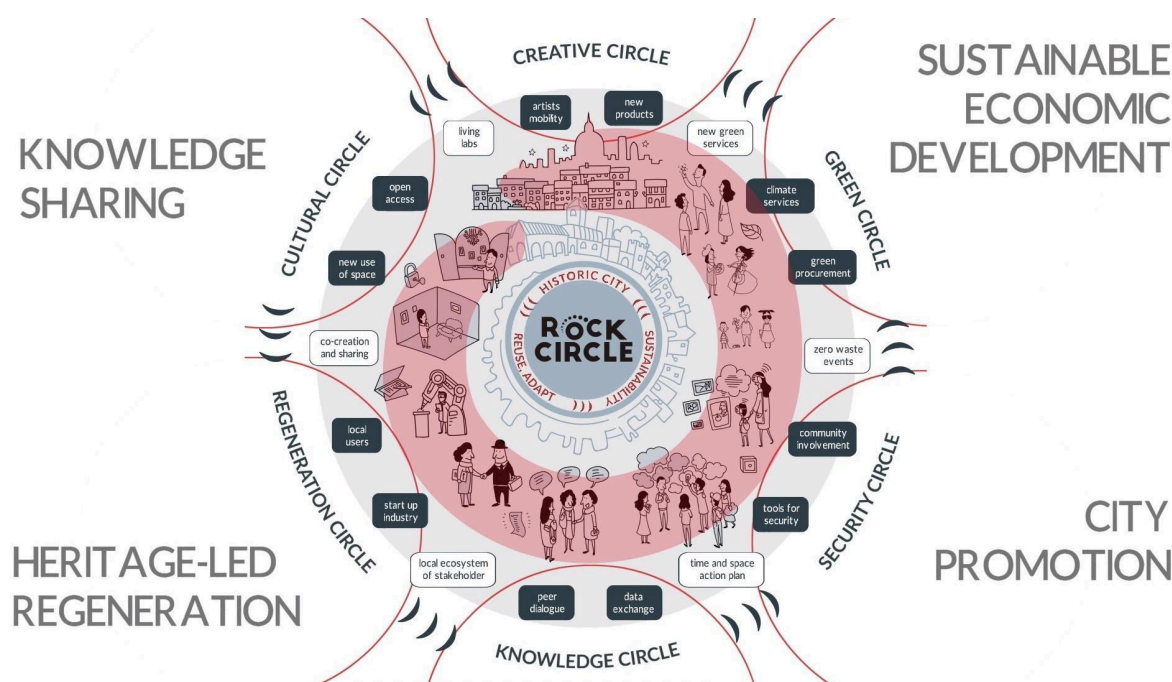


Figure 5: The ROCK Circle project concept

The project intended to transfer successful models and best practices to other cities, using a cross-disciplinary mentoring process and establishing common protocols and implementation guidelines. ROCK desired to enhance access and experiences related to cultural heritage while ensuring environmental sustainability, city branding, and bottom-up participation through living labs. Additionally, ICT sensors and tools were

utilised to support the practical application of ROCK principles, and an interoperable platform to facilitate data collection, exchange, networking, and synergies.

ROCK's value lies in combining sustainable models, integrated management plans, and funding mechanisms based on successful financial schemes, thereby promoting the creation of industry-driven stakeholder ecosystems. The project included a monitoring tool that will continue running for two years after the project's completion. The anticipated impacts included the development of effective and shared policies that accelerate heritage-led regeneration, improve accessibility and social cohesion, increase awareness and participation in local decision-making, and stimulate businesses and employment opportunities.

Involving multiple cities, universities, enterprise networks, city networks, companies, and development agencies, as well as foundations and charities, ROCK aimed to catalyse challenges and innovative pathways within the European Union and beyond. It recognized cultural heritage as a factor for production, competitiveness, and sustainable growth. Its online index provides toolkits, booklets, essentials and guidelines for adaptive reuse and heritage regeneration, ranging from urban heritage to placebranding, plastics and food guides.

2.7 Conclusions

The analysis of the European state of the art points to a convergence of values and Methodologies in the context of adopting collaborative practices for sustainable management of cultural heritage. The main points that are shared amongst different European projects include:

- The adoption of long term, strategic thinking;
- The development of flexible approaches through toolkits;
- The fostering of community of practice to pass ownership to local stakeholders;
- The focus on iterative development of solutions through pilot projects;
- The synthesis of global, regional and local networks that feed back to a body of work that is a European common.

In the next paragraphs these key points will be elaborated.

The adoption of long term, strategic thinking in heritage-led development projects enables the enhancement of inclusive economic growth, community well-being, nature regeneration, and cooperation at various levels. The establishment of networks is a central tenet in achieving this goal, the approaches analysed focus on the integration of exit practices to ensure that the impact of the project will have a legacy beyond the funding horizon of the project. Inclusivity, participatory decision-making, collaboration that fosters the empowerment of the diffuse design

capacity of an emergent community of practice enables the sustainability of the results of the project. In addition, the type of projects developed in this context focus on long term social and environmental sustainability. Future studies and forecasting based approaches move the temporal horizon of the development of projects further. The push for projects that focus on long term futures require this type of thinking as most contemporary development models centre on short term futures.

For the development of flexible approaches through toolkits, Europe is a rich and diverse setting that is characterised by a wide array of cultures. At the same time, it is important to create an approach to participatory heritage management that is flexible enough to integrate the regional cultural differences. Design toolkits play a crucial role in fostering such a flexible approach that allows the regional differences of different places to shape a project. These toolkits provide designers with a structured yet flexible framework and a diverse range of resources that can be adapted to specific contexts. By embracing the unique characteristics and cultural nuances of different regions, designers can create solutions that are deeply rooted in the local context, addressing the specific needs and aspirations of the communities they serve. Design toolkits encourage designers to engage with local stakeholders, understand their values, and incorporate their perspectives into the design process. This inclusive and collaborative approach not only ensures that the resulting solutions are relevant and effective but also promotes cultural appreciation and sensitivity. Ultimately, design toolkits empower designers to embrace the rich diversity of our world and leverage it as a source of inspiration and innovation, leading to more sustainable and meaningful design outcomes.

Fostering the emergence of a local community of practice is instrumental in enabling local stakeholders to take ownership of initiatives developed through a participatory design approach. When stakeholders are actively involved in the design process, they develop a sense of ownership and investment in the outcomes. By creating a community of practice, where stakeholders can collaborate, share knowledge, and learn from one another, a supportive network is formed. These citizen-led initiatives provide a platform for continuous engagement, where stakeholders can contribute their insights, expertise, and local knowledge to shape the initiatives. As they participate in the design process and witness the impact of their contributions, stakeholders develop a sense of pride and responsibility towards the initiatives. This ownership fosters long-term sustainability as the local community becomes self-sufficient in implementing and maintaining the initiatives, ensuring their relevance and effectiveness. Furthermore, a local community of practice promotes collective learning and capacity building, allowing stakeholders to continuously improve their skills and expertise in driving positive change within their own context. The focus on iterative development of solutions through pilot projects is instrumental in enabling citizen co-inquiry and hands-on transformation of surroundings, having as a direct result the empowerment of local stakeholders. By adopting an iterative

approach, pilot projects allow for experimentation, learning, and refinement based on real-world feedback and experiences. This process encourages active citizen participation and engagement, as stakeholders become co-inquirers, actively involved in the exploration and development of solutions. Through hands-on involvement, they gain a deeper understanding of the challenges at hand and the potential solutions. This empowerment not only builds confidence and a sense of ownership among local stakeholders but also fosters a culture of collaboration and shared responsibility. As they witness the tangible transformation of their surroundings through their own efforts, stakeholders are motivated to take on larger roles in shaping their community's future. The iterative nature of pilot projects ensures that the solutions developed are contextually relevant, responsive to the needs of the local community, and sustainable in the long run. It establishes a platform for ongoing dialogue and collective decision-making, enabling local stakeholders to actively participate in the co-creation of their environment and the improvement of their quality of life.

The synthesis of global, regional, and local networks that inform and are informed by a body of work that is a European common is instrumental in enabling a democratic management of our shared cultural heritage. By integrating appropriate technologies such as augmented reality (AR), virtual reality (VR), and other information and communication technologies (ICTs), novel ways to experience cultural heritage are developed, fostering greater accessibility, engagement, and inclusivity. This synthesis recognizes the diversity of our cultural heritage and the need for a sensitive, place attuned and democratic approach to the development and deployment of such initiatives. By leveraging these networks, a collective approach is adopted to preserve, showcase, and interpret our shared heritage. The integration of AR, VR, and ICTs enhances the immersive and interactive nature of experiencing cultural heritage, transcending physical boundaries and time limitations. It enables people from diverse backgrounds to engage with cultural heritage on their terms, fostering a sense of ownership and connection. Additionally, this democratic management approach ensures that decisions regarding the preservation and presentation of cultural heritage are made collectively, with the participation of various stakeholders. It promotes inclusivity, diversity, and the conservation of multiple perspectives, creating a rich and dynamic cultural landscape that reflects the values and aspirations of the European community as a whole. Connecting the initiatives that build these solutions and learning from each other is a necessary part for the development of a replicable and scalable European heritage management model.

3/ Community-led Design

3.1 Introduction

There are multiple dimensions and definitions of community and its relevance in co-design activities in heritage contexts. There is the "community of practice" (Wenger, 1999) where members come together to learn and engage in a shared concern, a "community of place" where people connect based on a particular location (which can include digital spaces), and socially constructed communities based on beliefs or media influences (Anderson, 2006).

In the context of heritage, there might be a distinction between citizen-led groups that are documenting, preserving, and co-constructing local heritage knowledge, and professional groups connected to institutions. In addition, there may be other types of communities engaged in heritage co-design, acknowledging the recent technological advancement and the impact of COVID-19 in shaping, reforming or connecting other types of communities either online or through telecommunication tools (Maye & Claisse, 2022).

Another critical aspect in the formation and induction of co-design initiatives in projects related to the Cultural Heritage sector, is the broad understanding of heritage and its various manifestations across different disciplines. Heritage is not limited to tangible and intangible connections to the past, but also includes "living heritage" which encompasses everyday practices and living memories that are considered vital aspects of a community's heritage (Smith, 2006).

While institutions such as galleries, libraries, archives, and museums play a role in preserving heritage through their holdings, artefacts, and stories, it is important to recognize the heritage that exists within citizen-led groups. These groups, independent of institutional goals, have their own values, needs, and motivations regarding heritage. They may focus on preserving or eliminating specific memories and shaping their heritage to support the future of their communities.

3.2 Background and context analysis

As we discussed in the second chapter, community-led design initiatives play a crucial role in enabling heritage activation. These initiatives have introduced numerous methods, tools, and techniques, prompting the need for organising them within frameworks (Sanders, 2014). Over the past decade, participatory design methodologies, co-design approaches, and relevant frameworks that prioritise

community involvement have progressively gained prominence, forming the concept of community-led design (Alexiou et al., 2013). This shift towards community-led design represents a deeper commitment to community empowerment, inclusivity, and sustainable change, as we also discussed. In addition, moving from co-design to community-led design suggests a shift in the level of involvement and decision-making power given to the community. This shift has occurred due to several reasons and evolving understandings of community engagement.

As the field of community engagement and design has evolved, there have been valuable lessons learned from co-design initiatives. These lessons have highlighted the importance of shifting power dynamics, centering community voices, and ensuring sustained community involvement. The move towards community-led design is a response to these learnings, aiming to improve the effectiveness and impact of community engagement initiatives.

Community-led design has so far acknowledged that community members possess valuable expertise, knowledge, and lived experiences that are essential in creating effective and contextually relevant solutions (Lam et al., 2017; Costanza-Chock, 2020; Agid & Chin, 2019). It recognizes that communities are experts in their own realities and can contribute unique insights that external experts may not possess. It recognizes that true empowerment comes from giving communities the power to make decisions and drive change in their own lives. This shift aligns with principles of self-determination, autonomy, and democratic participation. While co-design can inadvertently reinforce power imbalances between external experts and community members, community-led design seeks to address these power dynamics by redistributing decision-making authority and prioritising the voices of marginalised and underrepresented community members. It aims to create more equitable partnerships and ensure that all community members have an equal say in shaping their own communities.

Community-led design also emphasises the importance of community members having a sense of ownership and agency over the design process and outcomes. But in order to achieve sustainable and long-term impact, it requires active community involvement and investment. By engaging community members as leaders and stakeholders in the design process, there is a greater likelihood of long-term impact and the development of solutions that are contextually relevant and responsive to community needs. Hence, moving towards community-led design represents a paradigm shift that recognizes the inherent value and agency of communities in shaping their own futures and creates design processes to better address community needs and aspirations.

On the other hand, heritage preservation or re-activation related design projects and initiatives have already applied such processes. Cultural heritage is by default an interdisciplinary academic field. Various heterogeneous researchers, professionals,

stakeholders, and community members take part in the design and development process of a (digital) product or service or urban solution. As we discussed, there are communities that preserve their heritage, independent of institutions such as museums or archives, and have their own values, needs, and motivations regarding heritage. A representative paradigm is the communities that are the main carriers of a cultural tradition. This happens in many cases of intangible cultural heritage, such as the Tinian marble craftsmanship or the mastic cultivation of Chios. It is inevitable for instance, a museum that seeks to promote the intangible cultural heritage of a place to not include the respective community of practice in its (digital) exhibition design (Muntean et al., 2015a; Nikolakopoulou et al., 2022a; Vosinakis et al., 2020; Koutsabasis et al., 2022) or even in its management and communication policies (Kirshenblatt-Gimblett, 2004; Alivizatou, 2016). There are strict ties between such museums and the people that represent the heritage concerned.

In any case, heritage constitutes a means to bring people together through shared identity, sense of belonging, cultural exchange, storytelling via collective memory, cultural celebration via festivals, preservation of cultural diversity, economic and tourism opportunities, and community pride. It plays a vital role in building bridges, fostering understanding, and promoting social cohesion. It serves as a unifying force that transcends individual differences and creates connections among people, contributing to a more inclusive and harmonious society.

Therefore, we understand that cultural heritage and community-led design share common participatory ground and anthropocentric values, thus making it ideal to form community-led design initiatives with heritage as the main community's binding and driving force. Whether it is to design local museum exhibitions, urban solutions or conservation plans or heritage digitization strategies, implementing community-led design can provide solutions with contextual relevance and sustainability while crafting the basis for community resilience.

By prioritising cultural identity and pride, intergenerational knowledge transfer, community engagement and ownership, inclusivity and representation, adaptive reuse, sustainable practices, collaboration and partnerships, education and training, and respect for authenticity and diversity, community-led design can ensure that heritage preservation and re-activation efforts are culturally meaningful, inclusive, and sustainable. Furthermore, community-led design can align with the aspirations and needs of the community, ensuring that heritage preservation and re-activation efforts are culturally meaningful, inclusive, and sustainable.

3.3 Phases, methods and tools for community-led design

Some scholars even propose viewing participatory design projects as meta-design endeavours that provide frameworks and toolboxes for flexible configurations (Giaccardi and Fischer, 2005; Pipek and Wulf, 2009 as cited in Binder, 2015). We cannot move forward, though, without mentioning theories related to power dynamics, collaboration, empowerment, and social justice, among others, which should be embedded in the frameworks used in community-based design.

To fully grasp the design process phases within HeritACT, it is essential to highlight the significance of frameworks such as the one we have developed. They act as guiding principles that align the values and aspirations of facilitators and community members alike. The design process can be complex, especially when it involves individuals from diverse backgrounds and with different ambitions. However, the activation of stakeholders driven by a shared heritage presents an incredible opportunity to bring them together, united under a collective vision of place. This shared appreciation and commitment to preserving heritage serves as a strong motivator, fostering collaboration and generating meaningful design outcomes. Moreover, to ensure a seamless integration of each phase's outcomes, it is vital for local community members to familiarise themselves with the tools and processes employed throughout. By becoming acquainted with these methodologies, community members can actively engage in the design process and contribute their valuable perspectives. This adaptation to the tools and processes not only fosters a sense of ownership but also empowers community members to actively participate, enabling them to effectively contribute to the project's success.

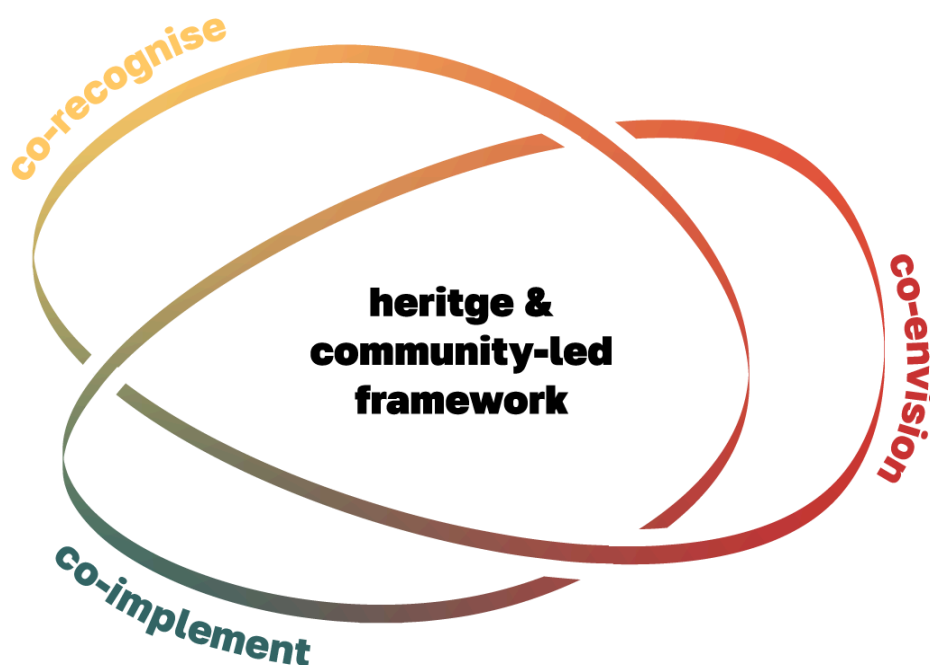


Figure 6: The developed community-led design framework encapsulating the phases of Co-Recognition, Co-Envison, and Co-Implementation

3.3.1 Co-Recognition

During the co-recognition phase, the primary objective is to identify and acknowledge the diverse stakeholders who possess valuable insights and perspectives relevant to the design project.

The ParticiMap tool enables the mapping and visualisation of stakeholders, facilitating a comprehensive understanding of their roles and relationships within the community. Additionally, interviews with key local persons allow for in-depth discussions to uncover local knowledge, cultural significance, and community aspirations.

Questionnaires serve as a valuable tool to gather broader perspectives and collect quantitative data from a larger sample of community members. Digital crowdsourcing campaigns leverage technology to engage a wider audience and gather diverse ideas and suggestions. Bodystorming, an interactive technique, involves physically enacting scenarios to stimulate creativity and empathy, encouraging participants to embody different perspectives and experiences. Thematic walks provide an

opportunity for stakeholders to explore and engage with the physical environment, uncovering hidden insights and gaining a deeper understanding of the community context.

By utilising these tools, the co-recognition phase promotes active stakeholder engagement, knowledge sharing, and the establishment of a common understanding among participants. It lays the foundation for inclusive and collaborative design processes, ensuring that subsequent design activities are informed by the rich diversity of perspectives within the community. Ultimately, the co-recognition phase fosters meaningful relationships, builds trust, and sets the stage for co-creating solutions that resonate with the community's needs, values, and aspirations.

Proposed tools for the Co-Recognition Phase	Proposed tool links
Personas	Personas Service Design Tools Dynamic Personas Service Design Tools #TiSDD Method: Co-creating Personas
Three-brain warm up	#TiSDD Method: Three-brain warm-up
Stinky fish	Stinky Fish Hyperisland
Crocodile River	Crocodile River Hyperisland
Journey Mapping	Journey Map Service Design Tools #TiSDD Method: Co-creating journey maps
Stakeholder Mapping	Stakeholders Map Service Design Tools The Complete Guide to Stakeholder Maps IxDF
ParticiMap tool	Draft
NegoDesign tool	Draft
SustainACT (TAG) tool	Draft

Table 1: Proposed tools for the Co-Recognition Phase

3.3.2 Co-Envision

The Co-Envision phase of the methodology engages with the diffuse creativity of a community of practice to collectively imagine how new cultural offerings can be brought forward. The participants are selected in a way that aims to balance

expertise with lived experience. Expert participants provide a sociotechnological backdrop to arouse the imagination of locals as to ‘what can be’ as it relates to using new technological or social models to produce new value from existing local heritage.

Co-envisioning, a collaborative process involving local communities in imagining solutions to approach existing heritage in innovative ways, holds the potential to significantly increase the perceived ownership of those solutions and foster longer-term engagement. By actively involving community members in the design process, co-design ensures that solutions are attuned to local challenges and conditions. This localization of solutions enhances their relevance and effectiveness, strengthening the community’s connection to them. Moreover, the participatory nature of this process empowers individuals and enables them to have a say in the type of solution being developed. This involvement fosters a sense of ownership and responsibility, as community members feel pride in contributing to solutions that directly address their specific needs.

A key factor during this phase is striking a balance between external experts and local community members. External experts bring technical expertise, broader perspectives, and innovative ideas from other contexts. They can contribute valuable insights that push the boundaries of what is considered possible. However, it is crucial to ensure that their expertise is complemented by the lived experiences and deep understanding of the local community. By combining the expertise of external professionals with the insights and aspirations of local participants, co-designed solutions can navigate the practical constraints of the local context while still aiming for transformative change.

This balanced approach between pragmatism and utopian ideals is crucial for sustainable and meaningful solutions. The involvement of external experts ensures that solutions are informed by global best practices and innovative technologies, while the engagement of local community members ensures solutions remain rooted in local realities. Co-design creates a space where the practical and visionary aspects of problem-solving can be harmonised, resulting in solutions that are both practical and inspiring. Striking this balance enhances the perceived ownership of the solutions and sustains long-term engagement, as they are seen as realistic yet aspirational pathways towards positive change.

Proposed tools for the Co-Envision Phase	Proposed tool links
Brainstorming	#TiSDD Method: Brainstorming
CoCreation ideation	Co-creation brainstorm toolkit

This 'n That	Creativity Exercise by Dave Birss - author, speaker and consultant
Probot	Protobot
Slicing the Elephant	#TiSDD Method: Slicing the elephant and splitting the ideation challenge
10 plus 10	#TiSDD Method: 10 plus 10
SustainACT (TAG) tool	Draft
DesignYourHeritage tool	Draft
Fund4Act tool	Draft
HERIcraft tool	Draft

Table 2: Proposed tools for the Co-Envision Phase

3.3.3 Co-Implementation

These initial phases, Co-Recognition and Co-Envision, lay the groundwork for the Co-Implementation phase. They provide the necessary understanding of the project context and participants' needs, which inform the design and development process. The Co-Implementation phase then includes actively involving participants in implementing, refining, and finalising the design solution based on their input and feedback. The main goals are to ensure that the participants' requirements, preferences, and perspectives are incorporated into the final outcome, and to foster a sense of ownership and empowerment among the participants.

Engaging the participants can be achieved by maintaining open communication channels with them and keeping them engaged throughout this phase by providing regular updates, seeking feedback, and encouraging active participation. This way, it can move on to collaborative design by working closely with them to translate their ideas and requirements into concrete design elements. The use of collaborative tools, workshops, and design sessions facilitate co-creation and co-design.

Another important aspect is the iterative development the phase needs to adapt. Adopting an iterative development approach, where participants' feedback and insights are continuously incorporated into the design by regularly testing prototypes, gathering feedback, and refining the design based on participant input is ideal. Throughout this process, skill-building and training emerge. These iterations offer opportunities for participants to acquire new skills and knowledge relevant to the project. By providing training sessions or workshops to enhance their understanding of the design process, tools, and technologies being used iteratively,

the participants delve into the formation of the final outcome while at the same time learn new ways to explore the design space.

All of the above set the scene for the rest to complement, such as maintaining transparency by sharing project updates, decisions, and progress with participants, and encouraging open dialogue and addressing any concerns or issues raised by the participants promptly, thus leading to accountability among participants. On the other hand, the iterative development approach comes with evaluation and assessment. It is suggested to regularly evaluate the co-implementation process to assess its effectiveness and identify areas for improvement. Collecting feedback from participants on their experiences and using this information to refine the approach for future projects constitutes an optimal way. The Usersense tool can turn out an effective mechanism to provide such feedback and refine the users' experience concerning the desired project's solutions.

Finally, documentation and knowledge sharing, such as documenting the Co-Implementation process, including design decisions, challenges faced, and lessons learned, and sharing this knowledge with participants and other stakeholders to promote learning and understanding, are the intermediate steps before ensuring participants' empowerment and ownership of the project's outcomes. By involving them in decision-making processes and acknowledging their contributions, the Co-Implementation phase facilitators can foster a sense of ownership and empower the participants to take an active role in shaping the project's outcomes.

Proposed tools for the Co-Implementation Phase	Proposed tool links
Decision Matrix	#TiSDD Method: Decision matrix
Prototyping	#TiSDD Method: Cardboard prototyping #TiSDD Method: Paper prototyping
Service Safari	Service Safari
Role Playing	Role Playing Service Design Tools #TiSDD Method: Desktop walkthrough
Wizard of Oz prototyping	#TiSDD Method: Wizard of Oz approaches
Value proposition canvas	Value Proposition Canvas - Download the Official Template #TiSDD Method: Business Model Canvas Value Proposition Canvas Service

	Design Tools
Fund4Act tool	Draft
Usersense tool	Draft

Table 3: Proposed Tools for the Co-Implementation Phase

3.4 Conclusions

In conclusion, community-led design initiatives in heritage contexts have emerged as a powerful approach to preserving and activating cultural heritage. By engaging local communities as active participants and decision-makers, these initiatives prioritise community empowerment, inclusivity, and sustainable change. The shift towards community-led design recognizes that communities possess valuable expertise, knowledge, and lived experiences that contribute to effective and contextually relevant solutions. It aims to address power imbalances, promote equity, and ensure that all community members have an equal say in shaping their own heritage and communities.

Community-led design emphasises the importance of community ownership, agency, and active involvement throughout the design process. It recognizes the significance of cultural heritage as a binding and driving force for communities, fostering identity, belonging, cultural exchange, and social cohesion. By prioritising cultural identity and pride, intergenerational knowledge transfer, inclusivity, collaboration, and sustainable practices, community-led design can create culturally meaningful, inclusive, and sustainable solutions aligned with the aspirations and needs of the community.

The phases, methods, and tools for community-led design involve a co-recognition phase that identifies and acknowledges stakeholders' perspectives, a co-envision phase that engages communities in collectively imagining innovative solutions, and a co-implementation phase that actively involves participants in refining and finalising the design. These phases emphasise stakeholder engagement, collaboration, iterative development, skill-building, transparency, evaluation, documentation, and knowledge sharing. By integrating these elements, community-led design initiatives can foster a sense of ownership, empowerment, and long-term engagement among community members.

Overall, community-led design in heritage contexts provides a framework for inclusive and participatory design processes that honour the expertise and aspirations of local communities. It offers an opportunity to create sustainable

solutions that preserve cultural heritage, foster community resilience, and contribute to the well-being and vitality of communities. By placing communities at the centre of the design process, community-led design ensures that heritage preservation and re-activation efforts are responsive, relevant, and meaningful to the people they serve.

4/ Conclusions

In order to produce a community-led design framework centred around heritage, an analysis of the background and historical context analysis was done, bridging the fields of co-design and heritage. The European Union best practises exploration informed and enhanced our efforts in promoting and implementing community-led design principles, ultimately contributing to the advancement and sustainability of this project's initiatives.

In the first chapter, the evolution of co-design from participatory design to community-led design was presented. This emerging approach has brought significant advancements in the field of collaborative design processes. Firstly, the transition from participatory design to community-based design signifies a shift towards more inclusive and equitable design practices. By actively involving diverse community members in the decision-making and problem-solving processes, co-design has become a means to empower individuals and communities to have a voice in shaping their built and intangible environment. This inclusive approach ensures that the design outcomes are not only aesthetically pleasing but also address the unique needs and aspirations of the community, fostering a sense of ownership and pride.

Secondly, the progression from participatory design to community-led design has highlighted the importance of long-term engagement and sustained collaboration. Unlike the traditional design processes that often prioritise the input of experts and professionals, community-led design emphasises ongoing partnerships and dialogue between designers and community members. This prolonged engagement allows for a deeper understanding of the community's context, challenges, and aspirations. Moreover, it enables designers to co-create solutions that are responsive, contextually appropriate, and socially sustainable. The resulting designs are not just products of collaboration but representations of a shared vision and collective effort.

Lastly, the evolution towards community-led design has underscored the significance of interdisciplinary collaboration and the integration of local knowledge systems. Designing for communities necessitates an understanding of the complex social, cultural, and environmental dynamics at play. By engaging professionals from diverse disciplines, such as urban planning, anthropology, sociology, and environmental science, co-design processes can benefit from a wider range of expertise. Additionally, the incorporation of local knowledge systems, including traditional practices and indigenous wisdom, enriches the design outcomes by incorporating deep cultural understanding and promoting sustainable practices. This integration of interdisciplinary collaboration and local knowledge fosters innovation

and ensures that co-design approaches are not only responsive but also respectful of the community's cultural heritage and natural environment.

In conclusion, the transition from participatory design to community-led design has been instrumental in fostering inclusive, participatory, and sustainable design practices. By actively involving diverse community members, ensuring long-term engagement, and integrating interdisciplinary collaboration and local knowledge systems, codesign approaches have evolved to empower communities, promote social equity, and create built environments that reflect the values and aspirations of the people they serve. As we move forward, it is essential to continue advancing co-design methodologies, promoting community agency, and recognizing the importance of collective action in shaping our shared spaces.

The application of participatory and community centred approaches to contemporary heritage management prioritise engaging with local communities have proven to be vital in preserving and revitalising local cultural capital. Firstly, active community involvement in heritage management processes fosters a sense of ownership and pride among community members, leading to increased commitment and dedication towards the preservation of local cultural heritage. By empowering local communities to participate in decision-making, planning, and implementation, heritage management becomes a collaborative effort that reflects the diverse perspectives and values of the community. This inclusive approach ensures that heritage preservation efforts are aligned with the needs and aspirations of the local population, thus enhancing the sustainability and long-term success of such initiatives.

Engaging with local communities in heritage management facilitates the transmission and revitalization of cultural capital. Cultural capital encompasses the intangible aspects of a community's heritage, including traditions, customs, knowledge systems, and artistic expressions. By actively involving community members in the preservation and promotion of their cultural heritage, contemporary approaches to heritage management facilitate intergenerational knowledge transfer, safeguarding traditional practices, and revitalising vernacular crafts. Moreover, community engagement creates opportunities for cultural exchange and learning, both within the community and between the community and external stakeholders. This dynamic interaction helps to breathe new life into cultural capital, ensuring its relevance and continuity in a changing world.

Contemporary approaches to heritage management that prioritise community engagement foster sustainable development and socio-economic benefits. Local cultural heritage assets have the potential to serve as catalysts for community-driven tourism, creative industries, and economic revitalization. By involving local communities in the development of heritage tourism initiatives, for example, their unique cultural assets can be leveraged to create authentic and

immersive visitor experiences. This not only generates economic opportunities but also enhances the overall well-being and quality of life for community members. Moreover, by placing communities at the forefront of heritage management, these approaches ensure that the benefits of cultural tourism and economic development are distributed equitably, empowering local residents and fostering social cohesion.

The chapter concludes by discussing how contemporary approaches to heritage management that prioritise engaging with local communities have proven to be effective strategies for preserving and revitalising local cultural capital. By empowering communities, facilitating intergenerational knowledge transfer, and fostering sustainable development, these approaches ensure the longevity, relevance, and socio-economic benefits of local cultural heritage. As we continue to navigate the challenges of cultural preservation in the modern era, it is crucial to prioritise community involvement, collaborative decision-making, and the recognition of local knowledge and agency in our heritage management practices.

The adoption of community-led design approaches in the European Union has demonstrated numerous advantages for democratic heritage management. Firstly, the integration of long-term, strategic thinking has proven instrumental in ensuring the preservation and sustainable development of heritage sites. By taking a proactive and forward-looking approach, community-led design allows for the identification of long-term goals and the development of comprehensive strategies that address the multifaceted dimensions of heritage management. This strategic thinking enables decision-makers to navigate complex challenges, anticipate future needs, and make informed choices that safeguard the democratic process while preserving the integrity of heritage sites.

Additionally, the development of flexible approaches through toolkits has facilitated adaptability and responsiveness in heritage management practices. Community-led design recognizes that each heritage site and community is unique, necessitating customised solutions. Toolkits provide a framework of adaptable guidelines, methodologies, and best practices that can be tailored to specific contexts. This flexibility allows experts and local stakeholders to address the dynamic needs and aspirations of the community, ensuring that decision-making processes remain inclusive and participatory. By providing a range of options, toolkits empower communities to actively engage in shaping the management and future of their heritage, reinforcing democratic principles.

Furthermore, the fostering of a community of practice has been crucial in passing ownership of heritage focused initiatives to local stakeholders. By creating networks and platforms for knowledge exchange, collaboration, and capacity-building, community-led design approaches facilitate the formation of communities of practice. These communities bring together diverse actors, including heritage professionals, academics, policymakers, and local community members. Through

shared learning, dialogue, and mutual support, local stakeholders gain the necessary skills, expertise, and confidence to actively participate in heritage management processes. This passing of ownership ensures that decision-making power is decentralised and democratised, allowing local voices and perspectives to shape the future of their heritage.

Lastly, the focus on iterative development of solutions through pilot projects has enabled experimentation, learning, and iterative development. Community-led design acknowledges the complexity and uncertainty inherent in heritage management. Rather than relying solely on predetermined plans, this approach embraces a process of iterative development, where pilot projects are implemented, evaluated, and refined based on feedback and insights from local stakeholders. This adaptive approach allows for the testing and refinement of innovative ideas, the identification of successful strategies, and the correction of potential shortcomings. The iterative development process ensures that heritage management practices are continuously evolving and responsive to the changing needs and aspirations of the community.

In conclusion, the adoption of community-led design approaches in the European Union for democratic heritage management has demonstrated numerous advantages. These include the integration of long-term, strategic thinking, the development of flexible approaches through toolkits, the fostering of a community of practice to empower local stakeholders, and the focus on iterative development of solutions through pilot projects. By synthesising global, regional, and local networks and feedback mechanisms, community-led design contributes to the creation of a European common heritage management framework that is democratic, inclusive, and sustainable. Moving forward, it is crucial to continue promoting and supporting community-led design approaches, recognizing their potential to foster democratic participation, preserve heritage, and shape the future of European cultural landscapes.

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