FACULTY OF ENGINEERING

Towards a Relational Heritage Approach: Fostering Community-Heritage Engagement

Karim van Knippenberg

Doctoral dissertation submitted to obtain the academic degree of Doctor of Urbanism and Spatial Planning

Supervisors

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SUMMARY

Background

Throughout European cities and countrysides, architects, spatial planners, and policy makers increasingly see the historic environment and heritage assets as a unique quality to be used in revitalisation and regeneration programmes. Accordingly, heritage is often framed as a cultural or economic resource that can be appropriated for contemporary uses. Alongside the process of putting the economic value of heritage on the agenda, there is a tendency to promote community engagement with heritage. To maintain and develop heritage, it is argued that support and involvement of local communities is needed. The EU for instance is now supporting the adaptation of more participatory, locally rooted, and people-centered approaches to heritage. However, it must be noted that despite this increased attention to the integration of heritage as a resource in spatial planning, and the engagement of communities in heritage matters, less attention is being paid to what community-heritage engagement means regarding heritage approaches. Yet, a further integration of heritage and spatial planning and working closely with (heritage) communities - each with their own, but interrelated interests and understandings of heritage – means that multiple perspectives will be present in the continuous production of heritage.

From this backdrop, and based on an analysis of the theoretical assumptions and the subsequent heritage management practises of different heritage approaches, this thesis shows that current dominant heritage management approaches are either object- or process-oriented, and thus strive towards single or fixed heritage values – the first by focusing on the physical heritage asset, the second by focusing on an overall heritage narrative – and thus leave little room for this dynamism and multiplicity. The object-oriented or process-oriented heritage approaches thus have difficulties in accommodating the multiplicity and dynamism that community engagement and integration of heritage in spatial developments would require.

Based on these observations, it becomes clear there is a need to explore additional theoretical conceptualisations to view heritage relational. Therefore, the objective of this research project is to explore heritage approaches that address dynamism and multiplicity in order to deal with an ongoing heritage valuation process by communities and other stakeholders. Various heritage scholars have hinted at approaches that, for instance, adopt a transformational view of heritage, or that have a value-centred

approach that is flexible and multivalent in order to meet the reality of multiple, contested, and shifting values as ascribed to heritage. Accordingly, the research hypothesis of this thesis is that relational approaches can help to overcome some of the limits inherent to an object-oriented or process-oriented approach. As we expect that such relational approaches would see heritage not as constrained, but open and full of interpretations and reinterpretations, these approaches might help us to better and more precisely explain communities' and individual's ideas and values of heritage.

Results

In line with the above research objective, this dissertation explores theoretical conceptualisations that see heritage as a manifestation of continually changing and interrelated processes of valuation and revaluation. Relational notions of space and place, and assemblage theory appear to be useful in understanding a web of relations and changes over time. To make these evolving interactions even more explicit, and to deal with the issue of continually change over time, the concept of coevolution was used. Various European heritage practises have been studied to explore how such a relational heritage approach manifests itself and which methods and tools are used to sustain such an approach over time.

Analysing 15 projects of heritage reuse throughout Europe shows the importance of community involvement from an early stage or the reuse project, the importance of reflecting and exploring a variety of heritage values (both material and immaterial), and the importance of integrating heritage sites in its wider context. Out of the 15 cases analysed, only in two cases is a relational approach recognisable, as in these cases heritage is linked to various other aspects such as the local heritage community, and to the wider context. Moreover, a crucial factor in those two cases seems to be the openness and flexibility of the heritage approach applied, to enable them to adopt to changes over time. This openness to continually changing values and needs is crucial in assuring that heritage remains relevant in a complex world of multiple heritage values and different stakeholders involved. Indeed, by analysing a large-scale conversion project in a former mining area, it is shown that heritage management approaches that lack this openness, in combination with the lack of stakeholder involvement, led to a project where there was almost no room for incorporating more personal, or immaterial ideas of heritage. Notwithstanding, this project did inspire local communities within the respective mining region to initiate small-scale projects to reflect their own ideas about miners heritage. The lessons learned from this case is that a more local, open, and dynamic conceptualisation of heritage should be the starting point of redevelopment processes. A reflection on a rapidly changing heritage district in Warsaw however shows that while small-scale initiatives are seen as an effective method to enhance community-heritage engagement, the ability to change the broader social and institutional context is an essential element in creating an environment where these initiatives can really flourish.

The various cases therewith show that a relational heritage approach is not just a matter of (re) connecting various aspects, such as the community to its heritage, but also a matter of remaining open to the multiplicity and dynamism of those communities. The impact on and the ability to change the broader social and institutional context are an essential element too, and, as we have seen in the case in Warsaw, key to creating an environment where community-heritage engagement can flourish.

Reflections and recommendations

The integration of heritage as a resource in spatial planning, and the increasing calls for community-heritage engagement, bring several challenges for heritage management and for those dealing with heritage. Most notably while questions about the nature of heritage are being asked more often. This thesis has provided several clues on answers to these challenges.

This thesis argues that heritage management should be fundamentally community (and communities' values) oriented. In various cases it appeared that incorporating communities' heritage values was the way to make heritage more resilient in a complex world of continually changing values. Next, heritage management could be more flexible and adaptive not only in terms of better differentiation of policy and management to incorporate differences in different contexts or locations, but also flexible and adaptive in terms of changing heritage values over time. And, in line with the above two, this thesis furthermore argues that spatial (re)developments could be more embedded in local histories, heritage values, and better connected to local communities' needs. These three main recommendations can be summarised as a plea for heritage approaches that focus on expressions of heritage such that heritage becomes a manifestation of continuous processes of valuation and revaluation and as something that is always involved in the process of 'making'.

SUMMARY

SAMENVATTING

Aanleiding tot het onderzoek

Erfgoed wordt door beleidsmakers, architecten en planologen steeds meer gezien als een uniek en waardevol onderdeel van de stedelijke inrichting. Daarnaast lijkt de interesse in cultuurhistorie toegenomen en wordt de culturele en economische waarde van erfgoed steeds meer herkend. Beleidsmakers en politici zijn zich dan ook in toenemende mate gaan inzetten voor het behoud en de ontwikkeling van cultuurhistorie. In veel Europese steden zijn vandaag de dag voorbeelden te vinden van succesvolle herbestemmingsprojecten rondom erfgoed. Toch zijn er nog de nodig vragen wat betreft erfgoedbeheer en herbestemmingsprojecten, met name rondom de verdere integratie van erfgoed in ruimtelijke planning en rondom burgerbetrokkenheid bij erfgoed. Zo zijn er steeds nadrukkelijkere pleidooien om burgers vaker te betrekken bij deze herbestemmingsprojecten. Om erfgoed te kunnen behouden en ontwikkelen, zo wordt geredeneerd, is er meer inspraak en betrokkenheid nodig van burgers en andere betrokkenen. Tegelijkertijd is burgerbetrokkenheid soms lastig te organiseren, en komt er met burgerbetrokkenheid een veelvoud aan erfgoedmeningen naar voren, wat potentieel kan leiden tot conflict. De vraag is dan welke erfgoedbenaderingen en/ of methodes van herbestemming het beste tegenmoetkomen aan de pleidooien om burgers vaker te betrekken bij erfgoed, en om erfgoed een meerwaarde te laten zijn in de stedelijke inrichting.

Middels een analyse van erfgoedbenaderingen die vandaag de dag veelal worden toegepast, blijkt dat de heersende benaderingen vaak uitgaan van ofwel behoud en bescherming van materiele erfgoedwaarde, of uitgaan van behoud van slechts een enkel erfgoed narratief. Daarmee doen deze benaderingen te kort aan de veelvoud van erfgoedmeningen die naar voren komt als er meer burgerbetrokkenheid rondom herbestemmingsprojecten zou zijn. Aan de hand van deze analyse werd het duidelijk dat er behoefte is aan een theoretische verkenning van erfgoedbenaderingen die meer aandacht hebben voor burgerbetrokkenheid en de integratie van erfgoed in ruimtelijke planning. In deze thesis worden zulke erfgoedbenaderingen verder onderzocht. De onderzoekshypothese die in dit onderzoek gebruikt is, is dat zogenaamde relationele benaderingen van erfgoed meer ruimte bieden aan burgerbetrokkenheid en de integratie van erfgoed in ruimtelijke planning. In de erfgoedliteratuur zijn er verschil lende auteurs te vinden die al gehint hebben op een dergelijke relationele benadering, omdat deze benadering verder gaat dan puur het behoud en beheer van objecten of een enkel erfgoed narratief. In plaats daarvan zouden relationele benaderingen van erfgoed een mogelijkheid kunnen bieden om open te staan voor verschillende en veranderende percepties rondom erfgoed en de herbestemming van erfgoed.

Het onderzoek

Deze thesis start met een uiteenzetting van relationele benaderingen van erfgoed. Aan de hand van theorieën uit het vakgebied van de ruimtelijke planning wordt uiteengezet dat relationele benaderingen handig kunnen zijn om inzicht te krijgen in verschillende en veranderende percepties rondom erfgoed en de herbestemming van erfgoed. Ook theorieën rondom co-evolutie worden beschouwd, aangezien deze bruikbaar zijn om veranderingen doorheen de tijd te begrijpen. Met deze theorieën als uitganspunt zijn verschillende casussen bekeken om te zien hoe een relationele benadering van erfgoed zich manifesteert in deze casussen en welke methoden gebruikt worden om zo'n benadering vorm te geven.

Een analyse van 15 Europese voorbeelden van herbestemmingsprojecten toont andermaal aan dat het van belang is om burgers en lokale erfgoedgemeenschappen al in een vroeg stadium te betrekken bij het herbestemmingsproces. Daarnaast toont deze analyse aan dat het belangrijk is om verschillende erfgoedpercepties (zowel materieel als immaterieel) te verkennen en mee te nemen in herbestemmingsprojecten, en het belang van een passende nieuwe functie voor het erfgoedobject. In slechts 2 van de 15 casussen zien we dat aan deze voorwaarde is voldaan. Daarnaast is in deze 2 projecten gekozen voor een flexibele en zeer open benadering van erfgoed, zodat er de mogelijkheid is om open te staan voor verschillende en veranderende percepties op erfgoed. In deze 2 casussen zorgt deze open benadering ervoor dat het erfgoedobject in kwestie steeds opnieuw een relevante functie kan vervullen voor de lokale gemeenschap. In een tweede casus – een project rondom herbestemming van erfgoedobjecten in een voormalige mijnregio – blijkt inderdaad dat juist deze openheid en flexibiliteit gemist werd in de gekozen erfgoedbenadering. Deze casus is opgestart vanuit goede intenties (onder meer om een grensregio meer te laten samenwerken), maar toch gebotst op de complexiteit van de realiteit, waarin mensen soms zeer uiteenlopende perspectieven hebben op wat identiteit is en hoe erfgoed daarin een rol speelt. In dit project was er daarnaast sprake van weinig tot geen burgerbetrokkenheid, waardoor de erfgoedpercepties van lokale gemeenschappen nauwelijks of niet zijn meegenomen in het project. Als reactie hebben deze lokale erfgoed gemeenschappen zelf kleinschalige projecten opgezet die recht doen aan hun lokale identiteit en bijbehorend erfgoed. Ook in de derde casus – een wijk in Warsaw met veel erfgoedobjecten – blijkt het belang van deze kleinschalige erfgoedprojecten die de identiteit van lokale gemeenschappen uitdragen. In deze snel veranderende wijk bieden kleine erfgoedobjecten houvast. In die zin is het vreemd dat de lokale overheden niet echt openstaan voor nieuwe erfgoedinitiatieven.

De verschillende casussen tonen dus aan dat het naast het verbinden van verschillende aspecten, zoals erfgoed en de lokale gemeenschap, ook belangrijk is om rekening te houden met de bredere (institutionele) context waarbinnen een herbestemmingsproject wordt opgezet.

De resultaten

De pleidooien om burgers vaker te betrekken bij erfgoed, en om erfgoed een meerwaarde te laten zijn in de stedelijke inrichting brengen uitdagingen met zich mee voor diegene die zoeken naar herbestemmingen voor erfgoedobjecten. Met name omdat er steeds meer, en steeds weer verschillende en veranderende percepties rondom erfgoed meegenomen moeten worden. Deze thesis stelt dan ook dat:

Erfgoedbenaderingen, nog veel meer als nu, burgerbetrokkenheid als uitganspunt zouden moeten nemen om zo recht te doen aan verschillende percepties op erfgoed en lokale erfgoedwaarde; dat erfgoedbenaderingen openheid en flexibiliteit als uitganspunt zouden moeten nemen om aan te geven dat erfgoed niet iets vastomlijnds is, maar steeds aan verandering onderhevig is; en dat erfgoedbenaderingen adaptief dienen te zijn om zo aandacht te hebben voor verschillende contexten of schaalniveaus. Deze drie aanbevelingen kunnen worden samengevat als een pleidooi voor erfgoedbenaderingen die erfgoed zien als iets wat altijd in verandering is.



INTRODUCTION

1.1 Heritage discourses in policy

Throughout European cities and countrysides, many examples can be found of redevelopment projects in which heritage assets were seen as a source of inspiration. These projects, such as Zeche Zollverein in Essen or Westergasfabriek in Amsterdam, have inspired architects, spatial planners, and policy makers to see the historic environment and heritage assets as a unique quality to be used in revitalisation and regeneration programmes. Accordingly, policy reports, rules, treaties, and conventions have been produced in which heritage is framed as a cultural or economic resource which can be appropriated for contemporary uses (see, for instance, the "Cultural Heritage Counts for Europe" report [CHCfE Consortium, 2015]). The European Union (EU), for instance – which coordinates, supports, and supplements policies and measures around culture (and heritage) - argues that heritage is of great value from an environmental, economic, and social point of view (CHCfE Consortium, 2015; Council of the European Union, 2014a; Lähdesmäki, 2014). Heritage, the EU argues, creates considerable externalities through cultural tourism and, as such, heritage has an important economic impact (European Union, 2017). To even further increase the economic impact of heritage, the EU is further integrating heritage into wider policy frameworks, especially by explicitly promoting the reuse of heritage. In documents like The European Framework for Action on Cultural Heritage, the EU once more emphasises the value of heritage (reuse) regarding, for instance, regenerating cities and regions, promoting cultural tourism, and stimulating creative and cultural industries (European Commission, 2016, 2019).

Alongside the process of putting the economic value of heritage on the agenda, there is a tendency to promote community engagement with heritage. In fact, as we live in what is called a participatory society Lovan et al. (2004), there is an increased attention to the involvement of stakeholders, including citizens, in a number of spatial domains, such as in nature preservation, neighbourhood management and urban development. In the domain of planning, congruent ideas about participatory planning entered the scene from the 1960s onwards. New communicative and collaborative approaches entered into planning practice, whereby the protagonist of these approaches stressed the need for shared partnerships, and sometimes even the need for shared implementation, by and for the people (Innes, 1995, Healey, 2003, Healey, 1997). Also in the domain of heritage, it is argued that support and involvement of local communities is needed to maintain and develop heritage. The EU, for instance - who sees heritage as a shared resource and common good that has the potential to bring people together – is now supporting the adaptation of more participatory, locally rooted, and people-centered approaches to heritage (Council of the European Union, 2014a, 2014b). It is, however, not just the EU that calls for more participatory heritage approaches. National policies and international conventions such as the Dutch Belvedere Memorandum (Feddes & Caspers, 1999), the English Power of Place (English Heritage, 2000), and the international UN's Historic Urban Landscape approach (UNESCO, 2011) have a particular emphasis on participation in decision-making processes related to heritage.

At the same time, the EU recognises that the heritage sector is at a crossroad, as it is facing several challenges, such as decreasing public budgets and disengagement due to social and environmental problems. This disengagement was found in a European survey on heritage. This survey showed that large majorities of EU citizens think that heritage is important to them personally, as well as to their community and region. Yet at the same time, only just over half of the respondents have some personal involvement in heritage (European Union, 2016). This might be an indication that current heritage approaches are only partly able to accommodate the above-mentioned calls for enhancing the social and economic value of heritage.

1.2 Heritage discourses in research

As the economic and social value of heritage has been put on the agenda, also academics started to consider the role of heritage in socio-economic and urban development. Within the international heritage literature there is a broad range of papers on community engagement in heritage matters, and the relationship between local communities and official authorities' understanding of heritage (Harvey, 2001; Waterton & Watson, 2010, 2013). Within those papers, the growth in interest and input from nonexperts in determining what qualifies as heritage and how it should be dealt with is framed as positive, as it is argued that lay discourses of heritage can emphasise a broader range of meanings (Ludwig, 2016; Mydland & Grahn, 2012), hold the potential to enhance social inclusion (Parkinson et al., 2016; Pendlebury et al., 2004), contribute to a more democratic and inclusive notion of heritage (Littler & Naidoo, 2005), and open up new perspectives (Dubrow, 1998). However, at the same time, it is acknowledged that heritage is inevitably part of the process of social inclusion and exclusion (Waterton & Watson, 2015), which in turn can lead to the erasure of specific parts of history to 'better' serve certain economic or societal goals (Stegmeijer & Veldpaus, 2021).

Heritage scholars also note that the preservation, conservation, management, and development of the historic environment and of heritage assets has been increasingly integrated with spatial planning, making heritage more explicitly part of a dynamic system of future making (Ashworth, 2011; Bosma, 2010). Graham et al. (2000) for instance note that heritage assets are increasingly seen as a cultural or economic resource that can be appropriated for contemporary uses. However, as heritage becomes more integrated into spatial dynamics, it is also much more explicitly expected to facilitate and stimulate economic development (Veldpaus & Pendlebury, 2019). As an implication, consequences of the process of instrumentalising heritage, such as gentrification and commodification, are regularly deproblematised and even celebrated (Beeksma & De Cesari, 2019). Again, these arguments can be seen as an indication to reflect on current heritage approaches' ability to integrate heritage in socioeconomic development.

1.3 Heritage in motion

To summarize, the heritage debate (both across European contexts and in heritage scholarly domain) is now paying particular attention to the socioeconomic values of heritage, and the engagement of communities in heritage matters. Engagement of local communities is a wider phenomenon that can be found in many spatial domains. Community engagement on heritage matters in this regard can be a way to create cultural backing; to create a sense of shared culture and belonging. As such it can be the base for engagement of communities on other spatial issues as well. Indeed, also within planning there is a growing tendency to include relational approaches, in order to deal with the plural interest and volatilities of the present dynamic society (Healey, 2006). Within these processes it becomes clear that new assemblages with a similar or integrated cultural background are more successful than others. Therewith, a further integration of heritage and spatial planning, working closely with (heritage) communities – each with their own, but interrelated interests and understandings of heritage – might enhance more resilient and sustainable spatial programs for the future.

However, it must be noted that despite this increased attention for community engagement in heritage matters, less attention is being paid to what community-heritage engagement means with regard to heritage approaches. Yet, a further integration of heritage and spatial planning and working closely with (heritage) communities – each with their own, but interrelated interests and understandings of heritage – means that multiple perspectives will be present in the continuous production of heritage. Waterton and Watson (2013) already pointed out that the involvement of communities in heritage matters profoundly questions the ideas, constructs, concepts, and levels of abstraction that construct frames through which heritage can be viewed and understood. Nonetheless, despite the calls for more inclusive, dynamic, and value-driven conceptualizations of heritage, the literatures exploring how this plays out in heritage approaches, are, however, much less abundant.

Accordingly, in the next sections, it is explored whether and how current dominant heritage approaches are able to meet the multiplicity and dynamics that integration within spatial development and community engagement in heritage, would require. Based on an analysis of the core assumptions and the subsequent heritage management practices of different heritage approaches, the next sections will highlight the pros and cons of each approach with regard to the multiplicity and dynamics that community engagement in heritage would require.

1.4 Heritage as sector, factor, and vector

One effort to characterise and visualise different heritage approaches is the conceptual framework developed by Janssen et al. (2017). Based on an analysis of the shifting role and purpose of heritage management in relation to the Dutch spatial planning context, they identify three different approaches to dealing with heritage in planning: heritage as sector, heritage as factor, and heritage as vector (see Figure 1).

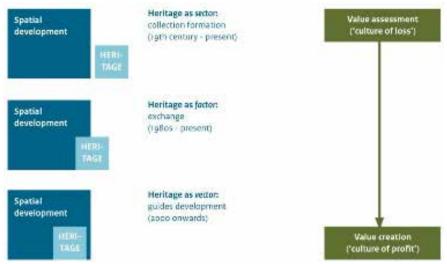


Figure 1 Conceptual framework by Janssen et al. (2017) showing the evolution of the interaction between heritage management and spatial planning.

The first approach, heritage as a spatial sector, is based on the notion that socioeconomic and spatial dynamics pose a constant threat to heritage. Accordingly, this approach is characterised by a defensive attitude based on preservation and protection to prevent loss.

The heritage as a factor approach sees heritage as an inherent quality that can be used to make the landscape more attractive. In other words, heritage is seen as a source for development instead of mere conservation. The focus of this approach is not so much on value assessment and rigorous conservation, but the support of economic value and increase of cultural quality.

Since the turn of the millennium, the growing importance of the 'immaterial', as well as the multiplicity and dynamics of values and meanings associated with the historic environment and heritage assets, has meant that heritage is seen as something that can inspire developments both in physical and nonphysical terms. The heritage as a spatial vector approach sees heritage as an inspiring and guiding force in spatial developments. Janssen et al. (2017) see this as a 'culture of profit' as *"without the associated narrative, the historical context is soon forgotten and the physical forms and patterns that remain lose their meaning"* (p. 1664).

While this model looks at different relations that have developed over time, it also shows that the different ways in which the fields of heritage and planning relate to each other do not phase each other out, but rather exist in various combinations (Stegmeijer & Veldpaus, 2021). In fact, Janssen et al. (2017) note that although these approaches have developed in a historical sequence, the new did not replace the old, but rather coexist in Dutch planning practise. All three approaches are still relevant and they complement each other in the present, enriched repertoire. What connects the different approaches is their emphasis on a careful interpretation of history. The main difference lies in how they frame heritage issues and, subsequently, interpret the relationship between heritage and spatial development.

1.5 **Different heritage approaches**

As the conceptual framework by Janssen et al. (2017) mainly considers the evolution of, and the interaction between heritage management and spatial planning, less attention is placed on the aspect of community engagement in heritage. Therefore, this section further explores and discusses the pros and cons of current dominant heritage approach regarding the multiplicity and dynamics that come with community engagement in heritage.

1.5.1 An object-oriented approach to heritage

The management of heritage assets has long been primarily about the conservation or restoration of monuments as influenced by nineteenth century architects like Ruskin (1849) and Viollet-le-Duc (1866). Indeed, in its original sense, the word heritage was used to describe an inheritance, such as properties, heirlooms, legacies, and values which are handed on from parents to their children (Davison, 2008; Harrison, 2010). The emphasis on inheritance, and the focus on 'things' is important here, as heritage is viewed as a physical object, already assumed valuable. Hence, heritage is seen as a valuable feature of the environment that is worth preserving from decay or development. Davison (2008) notes that heritage "expresses the unspoken conviction that there is nothing that we have made or can hope to make, that is as valuable as what we have inherited from the past" (p. 34). This sense of inheritance promotes the idea that the present has a particular `duty` to the past and its monuments. This understanding of heritage strongly regards heritage as a property, site, object, or structure "with identifiable boundaries that can be mapped, surveyed, and recorded" (Smith, 2006, p. 31). In other words, heritage is seen as something that can be objectively observed, understood, recorded, and dealt with by a detached heritage expert either by means of classification, listing, maintaining, preserving, and promoting.

Heritage management approaches based on this object-oriented understanding of heritage operate in the light of threats to heritage such as destruction, loss, or decay. Indeed, historically, heritage management practises had a particular focus on protection and preservation through the designation of important sites and objects, supported by planning controls over potentially damaging development (Fairclough, 2006). At present, this object-oriented approach – with an emphasis on protection and preservation of inheritances – is a guiding principle for many heritage practitioners. The European Commission's definition of heritage, for instance, is based on the notion that heritage is preserved for posterity; heritage belongs as much to the generations yet unborn, as to the past. They define heritage as: "A rich and diverse mosaic of cultural and creative expressions, our inheritance from previous generations of Europeans and our legacy for those to come" (European Commission, 2018). Likewise, other (international) organisations on the protection and management of heritage sites use definitions that illustrate this position towards heritage: "Heritage is our legacy from the past, what we live with today, and what we pass on to future generations" (UNESCO, 2006). To sum up, an object-oriented heritage management approach is implicitly linked with protection and preservation of inheritances and is therefore rather defensive.

Such a defensive attitude is often accompanied by a strong tendency towards isolation of the heritage asset from its immaterial aspects, from its wider spatial context, and from socioeconomic and cultural developments (De Kleijn et al., 2016). Various scholars have criticised this approach for its difficult rhyming with the more transitional character of heritage (e.g. Thorkildsen & Ekman, 2013). They argue that this approach distracts people from the contemporary and creative aspects of culture that could transform heritage (Harrison, 2010). This object-oriented approach is a rather top-down, organised, authoritarian approach, which has only limited space for community-heritage engagement. Communities, and other recipients, are seen as a passive audience to whom communication is directed and whose heritage is already defined (Waterton & Watson, 2013). In other words, heritage is prefigured and predetermined by some entity as ready-made objects and then made selectively available (Crouch, 2010). Another central argument criticising this approach is that the multiplicity of values and ideas, inherent to heritage, is not fully recognised. Communities and their understanding of heritage are not incorporated and, as such, an object-oriented approach to heritage does not capture heritage adequately and comprehensively. Critics have further disapproved the idea of collecting heritage objects by means of classification, listing, and protection because seeing heritage as a selective, path-dependent, self-referential process based on homogeneous understandings of heritage leads to a culture of loss (among others, Harrison, 2013a; Smith, 2006; Waterton & Watson, 2013). In this kind of fixed system of value attribution, in which values are inherent and unchanging, heritage objects easily remain distanced from societal dynamics.

More fundamental critics have emerged relative to the idea of a straightforward world based on universal valid definitions of objects, places, and the environment. Similar critics can be found in the domain of planning. Here too, planning theorists and practitioners started to avert the idea that the future shape of a place could be designed by planners based on rational, scientific considerations and knowledge (Baarveld et al., 2013; Sandercock, 2004). Such a planning approach based on rationalities - which we now typify as a technical-rational approach - has many similarities with the object-oriented approach to heritage. Indeed, technical-rational planning practises have a particular emphasis on the physical planning result by developing extensive plans or spatial blueprints, which are steadily translated into a built form. Within this technical-rational approach, a clear meaning can be attributed to planning: planning is the tool to implement previously formulated strategies to deal with environmental challenges. Following a technical-rational approach, planners have tried to contribute to the progress and development of our society by creating and shaping a desired physical environment based on certainty and the possibility to predict our future and - in the end - to control this planned future, with the planner as the expert showing us the way (Sandercock, 2004). As said before, these blueprint plans, based on single and proven solutions, started to be criticised not only for being inflexible to change, but also because they were difficult or even impossible to implement.

To sum up, an object-oriented approach to heritage, which shows similarities to the heritage as a sector approach, has for a long time been, and still is, a guiding approach in heritage practise to preserve heritage objects in good physical condition. However, as this approach has an overriding emphasis on a kind of fixed, inherent, idea of heritage,

heritage objects easily remain distanced from societal dynamics. This approach has hardly any room to meet the multiplicity and dynamics that community engagement in heritage would require.

1.5.2 A process-oriented approach to heritage

In the 1970s and 1980s, in response to the critiques and shortcomings of the object-oriented approach, heritage scholars (Hewison, 1987; Lowenthal, 1985, 1998; Samuel, 1994; Wright, 1985) began to focus on the everyday use of heritage in contemporary society by arguing that an object-oriented heritage approach actually distracts people from engaging with their past. Hewison (1987) accordingly argues that heritage is not so much about the past, but about our relationship with it. In the mid-1980s to late 1980s, these scholars were among the first who undertook to explain heritage as a cultural phenomenon, with more awareness of its ideological underpinnings.

Drawing on these debates, several scholars (Graham et al., 2000; Hall, 1999; Harvey, 2001, among others), began to question what heritage actually is. They reconceptualised heritage as a social and cultural process. Ashworth (2008) for example argues that heritage is not an object but "a process and outcome: it uses objects and sites as vehicles for the transmission of ideas in the service of a wider range of contemporary social needs" (pp. 24–25). In other words, heritage is not seen as something frozen in the past, but as something that can be appropriated and used by communities, for example, to construct a ('ever changing') sense of identity. Jones (2017) calls this 'social value', which is defined as a collective attachment to heritage that embodies meanings and values that are important to a community or communities. In line with this, Harrison (2013b) urges us to consider heritage as inherently 'dialogical', acknowledging that all heritage engages with contemporary economic, environmental, political and social concerns too. Attention thus shifted from a focus on objects towards the modern-day socioeconomic, political, and cultural process that transforms elements of the past into heritage (Ashworth & Graham, 2005; Harvey, 2001). These scholars argue that heritage - like objects, truths, facts, realities - does not pre-exist of observations but has to be experienced for it to be heritage (Smith, 2006). In heritage literature accordingly, scholars shifted attention towards understanding how heritage is constructed (Felder et al., 2015; Ludwig, 2016, for example).

What follows is that heritage is no longer considered merely as an object that needs to be protected from external threats or isolated from its societal context. Instead, heritage management approaches focus increasingly on how heritage can be used and exploited as a vital resource for local communities (Smith, 2006). As a result, from the late 1970s onwards, heritage practises in most western European countries have been extended beyond protection of objects towards becoming part of a broader movement for urban and regional regeneration and socioeconomic development (Ashworth, 2008; Bloemers et al., 2010). A number of European countries began to recognise the regenerative potential of historic environments to produce socially inclusive and economically vibrant cities and landscapes (Janssen et al., 2014). Thus, heritage management shifted towards a more integrated and inclusive heritage management approach, which allows

heritage to reposition itself in spatial developments. Heritage is now seen more and more as an integral part of our cities and landscapes rather than as a world set apart (Fairclough, 2008).

Alongside this paradigm shift towards a more integrated heritage management approach, there is a tendency to widen the scope and ambition of heritage definition thereby seeking for a more holistic idea of heritage that also depicts immaterial aspects (Vecco, 2010). This shift in perspective not only represents a reconsideration of the traditional, professional understanding of heritage, but also has some implications for heritage practitioners and the processes of community-heritage engagement (Parkinson et al., 2016). As this approach decentres the object and focuses on the actual processes that transform things into heritage, differences are highlighted and heritage may start to become a source of selectivity, contestation, and differentiation. Waterton and Watson (2015) note that heritage is inevitably part of the process of social inclusion, which in turn can lead to certain heritage values being represented where others are not. Indeed, acknowledging that heritage exists because people attach values to it means acknowledging that multiple and potentially competing ideas of heritage can exist at the same time. From here it becomes important "to address the implied questions – who decides what heritage is, and whose heritage it is?" (Graham et al., 2000, p. 24). Indeed, as the process of attributing meaning to heritage is intrinsically embedded within power, Smith (2006) observed that not all understandings of heritage are equally represented as she argues that there is an authorised heritage discourse (AHD); a particular way of seeing heritage that privileges the cultural symbols of the white, middle-/upper-classes, and excludes a range of alternative ways of understanding heritage. Thus, as various stakeholders and values come into play, heritage becomes dependent on context, plural ideas, and political notions and becomes part of a struggle of power and empowerment. In addition, the multiplicity and dynamism of community-engagement is often not fully captured in a process-oriented approach, as this approach often leads to a univocal representation. Acknowledging multiplicity and dynamism would require a post-representational conceptualisation of heritage in which everyday practises and performative manifestations of the lived world are captured (Thrift, 2008). This in turn can also help to overcome some of the more commonly shared critics on the commodification, touristification, and privatisation of heritage because of univocal representations.

The shift towards a greater emphasis on social processes not only influenced thinking about heritage, but run through other academic disciplines as well, including planning theories and practice. From the 1960's onwards planning theorists started to question the idea of a straightforward understanding of the world in which the environment is seen as something that is known and controllable. Ever since, novel planning ideas have emerged and planning theorists are now reorienting planning practice away from a technical science based on fixed planning, towards a practice of consensus building within a dynamic context. This shift had an impact to planning practice as well, as it got more and more acknowledged that the environment is not shaped solely by the planner, but in interaction with many stakeholders (Sandercock, 1998). Planning practice accordingly became a more strategic approach in managing the environment, thereby paying attention to both the qualities of place and process. To sum up, a process-oriented approach, which shows similarities with both the heritage as factor and heritage as vector approach, pays particular attention to the ways in which heritage comes about regarding issues of involvement, incorporation of certain values, and the actual processes that transform things into heritage. However, by doing so, heritage also becomes a source of contestation and conflict, as a variety of stakeholders shares a plurality of heritage values. Although this approach offers a starting point to more closely incorporate individual and communities' heritage values, one could wonder to what extent these values are truly incorporated in heritage practise application.

1.5.3 Characteristics of different approaches

As Janssen et al. (2017) already noted, heritage approaches can exist next to each other and complement each other. The object-oriented approach guarantees that heritage objects are preserved in a good physical condition. When it becomes clear that not all heritage objects can be preserved in good physical condition, other approaches that focus more on the socioeconomic value of heritage might become more desirable or necessary. The process-oriented approach is an approach that pays particular attention to the ways in which heritage comes about, and the goals that it can serve. However, both approaches have some downsides. The object-oriented approach might lead to fixed and isolated heritage values, and the process-oriented approach might lead to contestation and conflict. The characteristics, approaches, and downsides of both approaches are summarised in Table 1.

	Object-oriented approach	Process-oriented approach
Characteristics	Its value system is mainly based on tangible qualities and inherent values of an object; heritage is seen as rare and unique; and the significance lies in the past, not the present. OUTCOME	Its value system is based on the contemporary social, cultural, perceptions of different stake- holders; heritage can be found everywhere; and its significance lies in the present. PROCESS leading to an OUTCOME
Approach	Its value system is defined through preservation doctrine; the identification and treatment of heritage is the domain of experts; law is used to enforce this preservation doctrine; heritage values are assumed to be immutable and are fixed through the use of lists; tangible qualities of materials are conserved rather than the meanings associated with these objects.	Everyone is a heritage expert; management shifted from expert- led authoritarian procedures towards more inclusive and participative community-led practises; different stakeholders and values are included in the process of defining heritage.
	DEFINED and FIXED	PROCESS and AGREED UPON
Downsides	Overriding emphasis on a kind of fixed, inherent, idea of heritage; heritage objects easily remain distanced from societal dynamics.	Heritage becomes plural, and political; issues of unequal representation; potential source of contestation and conflict.

From this backdrop, I will further elaborate on the question why these current dominant heritage approaches have difficulties in connecting heritage with spatial development and community engagement.

The turn to community-engagement in heritage is inextricably bound up with multiplicity and dynamism due to the plurality of actors involved and the versatility of (changing) heritage values. Shortly stated, heritage means different things to different people at different times and in different contexts (Ludwig, 2016). Hence the meaning and value of heritage is continually defined and redefined in different ways, so that heritage understandings can change over time (Jones, 2017). Acknowledging this means that a straightforward and universal definition of heritage is no longer valid, and that it will become impossible to define heritage unambiguously. Both the object-oriented and process-oriented approaches strive towards a kind of fixed understanding of heritage, whether defined or agreed upon. Although the process-oriented approach does focus on the ways in which heritage comes about, the versatility of value transmission is not fully addressed; this approach focuses on one 'constructed' value instead of continually changing values. Hence, the process-oriented approach provides a single, agreed-upon solution in which only some values are incorporated rather than a solution that is flexible, adaptive, and able to represent myriad and continually changing values. For this reason, the idea of focusing on the process side of heritage has increasingly been called into question over the last decade. Theorists are now trying to answer questions that move beyond political-economic power and cultural differences and which have subsequently surfaced by putting greater emphasis on the social aspects of heritage (Waterton & Watson, 2013). Crouch (2015), for example, argues that we need to go beyond the political to make more room for encompassing personal needs and aspirations of individuals and communities engaging in heritage matters.

This in itself is no easy task. Communities and community engagement are terms that are often used in an ambiguous way. Originally the term "community" was used to describe a collection of people. But since scholars, and most notably Anderson (1983), started to criticise and move away from this dominant, nostalgic idea of a community's it became clear it is as difficult to identify a community as it is to label people as part of a group (Crooke, 2010). As a result, scholars like Crooke (2010, p. 16) mention that "community is a multi-layered and politically charged concept that, with a change in context, alters in meaning and consequence". According to Waterton and Smith (2010, pp. 8, 9): "Communities thus become social creations and experiences that are continually in motion, rather than fixed entities and descriptions, in flux and constant *motion, unstable and uncertain*". Such understanding of communities is also particularly relevant for grasping community-heritage engagement. Here, too, a heritage community can be defined in various ways. A heritage community can be defined as groups of citizens or individuals who value and define heritage in a specific context. Therefore, the way communities engage with heritage depends not only on the role that heritage plays in a particular society, but also on the meanings ascribed to heritage by a particular society (Waterton & Watson, 2011). In other words, the motives, level of involvement, form, and purpose of community-heritage engagement will differ with each context.

The intrinsic dynamism and multiplicity of community-heritage engagement is also often highly at odds with unilateral definitions or single narratives. When it comes to including communities in governance models for the management of heritage, for instance, it appears that ideas and objectives initiated by the community are predominately excluded by public authorities, since the communities' input might diverge from the dominant heritage discourse (Pendlebury, 2013). Both Waterton and Smith (2010) and Perkin (2010) argue that community-based projects (usually brought forth by governments or organisations) are often initiated to fulfil the prescribed ideals for engagement without addressing the needs and aspirations of the community itself. These processes of engagement can often result in tokenistic and unsustainable projects that erode the trust of communities and result in a lack of support. Moreover, Watson and Waterton (2010, p. 2) note that community engagement in heritage addresses both material (places) and immaterial (narratives, tradition) heritage as they state that "community engagement with heritage is more overtly linked with cultural distinctiveness, identity..., or exists as an articulation of ancestral links with important places, traditions and narratives", thus pointing out that both material and immaterial heritage are important for communities. Carman (2009) notes that material heritage cannot be seen in isolation of its immaterial aspects, yet immaterial values are often overlooked in processes of community-heritage engagement.

To sum up, as heritage is increasingly induced with various aims such as communityengagement in heritage matters and the integration of heritage and spatial planning, various relations become more important. Current dominant heritage approaches only partly acknowledge these relations, and even sustain certain mismatches. Heritage management, for instance, becomes more interwoven with spatial developments, yet with an unfortunate tendency towards isolation of heritage assets from its immaterial aspects. And although various scholars argue to incorporate individual or communal notions about affectivity with heritage, current heritage approaches tend to work towards single, agreed-upon ideas of heritage in which communities do not necessarily recognise themselves. As community-engagement in heritage matters and the integration of heritage and spatial planning becomes more important, heritage approaches should become more receptive towards dynamism and multiplicity, due to the variety of stakeholders involved and values attributed. Current dominant heritage management approaches that are either object or process-oriented and thus strive towards single or fixed heritage values – the first by focusing on the physical heritage asset, the second by focusing on an overall heritage narrative - leave little room for this dynamism and multiplicity. Linking heritage to a deeper mixture of relations and embracing the multiplicity of ways of understanding heritage is not fully reckoned and included in object-oriented or process-oriented heritage approaches.

1.6 **Research objectives and questions**

The object-oriented or process-oriented heritage approaches thus have difficulties to accommodate multiplicity and dynamism that community-engagement and integration of heritage in spatial developments, would require. As these approaches strive towards a unilateral, general and inherent definition of heritage, or a single and dominant agreed upon heritage narrative, it is difficult to link heritage to a deeper mix of relations. A more precise understanding of communities' heritage values is pivotal for cultural engagement, that can be a starting point for engagement in other spatial issues as well. Besides, a further integration of heritage and spatial planning, working closely with (heritage) communities – each with their own, but interrelated interests and understandings of heritage - might enhance more resilient and sustainable spatial programs for the future. Nevertheless, heritage approaches that answer to this dynamism and multiplicity have so far been seriously underdeveloped. Based on the discussion of the pros and cons of current heritage approaches, it becomes clear there is a need to explore additional conceptualizations to view heritage relational. Therefore, the objective of this research-project to explore heritage approaches which address dynamism and multiplicity in order to deal with an ongoing heritage valuation process by communities and other stakeholders.

Research objective:

To explore heritage approaches addressing dynamism and multiplicity that come with community-heritage engagement

Various heritage scholars have hinted at such heritage approaches. Harrison (2013b) argues to adopt a transformational view on heritage, where heritage is seen as continually changing. Mason (2004) argues for a value-centred heritage approach that is flexible and multivalent in order to meet the reality of multiple, contested, and shifting values as ascribed to heritage. Crouch (2010, 2015) argues to link heritage to a deeper mixture of relations with other heritage sites, previous experiences, and memories, feelings, and emotions wrapped up in our encounters with heritage. Harvey (2015) argues for a relational view on heritage, as he says that "a processual and present-centered conception of heritage needs to be tied to a more progressive and relational sense of place, that is place as a temporary constellation of connectivity" (p. 589). Others argue for a co-evolutionary perspective, to see changes to heritage in relation to a changing context and society (Della Torre, 2019). In order to explore heritage approaches that can accommodate dynamism and multiplicity, this thesis continues on these proposed research paths. Accordingly, the research hypothesis of this thesis is that relational approaches can help us to overcome some of the limits inherent to an object-oriented or process-oriented approach. As we expect that such relational approaches would see heritage not as constrained, but open and full of interpretations and reinterpretations, these approaches might help us better and more precisely explain communities' and individual's ideas and values of heritage. As such, it is expected that a relational approach to heritage can enhance community engagement and thus make heritage more broadly socially meaningful and democratic. As a relational approach sees heritage in relation to other aspects, such as the community and the local context, it is expected that such an approach would lead to a better embeddedness of heritage objects in a specific context.

Research hypothesis:

Relational approaches to heritage can help in opening up to dynamism and multiplicity that come with community-heritage engagement

In line with the research objective and research hypothesis, the following research questions are formulated:

- RQ1: How could a relational approach to heritage be conceptualised and practised?
- RQ2: What aspects and interactions constitute such a relational heritage approach?
- RQ3: How does a relational heritage approach manifest itself in present-day European heritage practises?
- RQ4: Which methods and strategies help to sustain this relational heritage approach over time?

The first question focuses on different theoretical conceptualisations that see heritage as relational. This question is answered in the theoretical part of this dissertation. The second question focuses on the elements and relations that constitute a relational heritage approach. The third and fourth questions focus on how a relational approach manifests itself in present-day heritage practises and how relations are sustained over time. The second, third, and fourth questions are answered in the empirical part of this dissertation.



THEORETICAL ACCOUNT

Chapter one argued that heritage approaches that answer to dynamism and multiplicity that come with community-heritage engagement have so far been seriously underdeveloped. From this background we need to explore additional theoretical conceptualisations that see heritage as relational. In this chapter, different theoretical notions – such as relational notions of space and place, and assemblage theory – are discussed in order to formulate an answer to the first research question: How could a relational approach to heritage be conceptualised?

2.1 Relational notions

Before introducing relational notions to space and place, we need to explore the origins of these notions. These notions emerged in the late 1990s, with the aim to counter the dominant structuralist notions of space, which were focused on examining the underlying truths of predefined systems. The upcoming poststructuralist ideas deconstructed the single narrative and instead acknowledging diversity and multiplicity. Meanings and actions cannot be seen as simple manifestations of underlying structures – they proliferate in complex and unexpected ways, depending on the relations established between subjects and objects within the system (Murdoch, 2006). Other features of a poststructuralist approach are that relations between subjects and objects are subject to contestation – meaning that there is an interplay between systemic relations and struggles over meaning and identity, and that social and cultural systems are never seen as closed but are open and dynamic (Murdoch, 2006).

Acknowledging that realities are never closed, but are open and dynamic, stimulated the quest for a better understanding of interrelatedness and interdependency. Accordingly, from the late 1990s onwards, so called 'relational notions of space and place' started to appear within economic, urban, and cultural geography, and within the context of strategic planning (Paasi & Zimmerbauer, 2016). Soon after, keywords such as networks, webs, corridors, hubs, flows, zones, and soft spaces, began to characterise planning practise at various scales and the representations of space embedded in such practise (Graham & Healey, 1999; Olesen & Richardson, 2011). These relational notions appeared to be particularly applicable in "social and cultural associations that are open and dynamic, constantly in process of becoming" (Murdoch, 2006, p. 10). Or as Gibson-Graham (2000, p. 96) notes, a relational approach is adopted to show that the creation of meanings is "an unfinished process, a site of (political) struggle where alternative meanings are generated and only temporarily fixed".

Within a relational conceptualisation of space and place, meanings and actions "are not so much the product of underlying structures, but must be set in a context of extensive relations" (Murdoch, 2006, p. 9). Indeed, Graham and Healey (1999) describe relational planning as planning that primarily considers relations and processes rather than objects and forms. Massey (2005, pp. 10–11) conceptualises relational space along three principles:

- 1. Space as a product of interrelations, constituted from interactions, relations being understood as embedded practises;
- 2. Space as the sphere of the possibility of multiplicity, plurality, difference, and heterogeneity; and
- 3. Space as always under construction, always in process, again, as an open system.

Thus, space, like meanings and actions, cannot be seen as simple manifestations of underlying structures – they proliferate in complex and unexpected ways, depending on the relations established between subjects and objects within the system (Murdoch, 2006). It is argued that meanings and modes of identification depend on the various relationships with other meanings and on a specific context. Relational approach thus emphasises the multiplicity of the webs of relations, which transect a territory and the complex intersections and disjunctions developing among them (Graham & Healey, 1999). In this perspective, social relations can be understood as webs or networks with diverse morphologies, connecting people and events in one node to others. The physical places that planners are typically concerned with - neighbourhoods, development areas, cities, regions – may have very different social, economic, and environmental meanings for those located in them (Healey, 2006). By analysing current endeavors in strategic spatial planning, Healey (2006) has noted, however, that it seems difficult to translate an appreciation of relational complexity into a relational spatial imagination. Instead, there is a strong tendency to revert back to traditional physicalist concepts about spatial order. Yet these traditional planning concepts fail to capture the dynamics and tensions of relations that have very different driving forces and scalar relations, as these coexist in particular places, leading to a situation where only some relations are taken into account (Healey, 2006). Therefore, Healey (2006) argues to push the concept of what she calls "relational complexity" further in order to be able to combine an appreciation of the open, dynamic, multiple, and emergent nature of social relations with some degree of stabilising force. In other words, this requires a recognition of multiple and fluid meanings attached to a place addressed by a diversity of stakeholders or citizens.

2.1.1 Relational notions and heritage

Incorporating this idea of relational complexity with regard to heritage results in a conceptualisation of heritage where meaning and value of heritage are not intrinsic, but always relational while receiving meaning from the context and from other subjects. Heritage is thus not a fixed thing, but depends on how it is dealt with and how it is performed in an ongoing process. Heritage comes alive through the active and creative ways in which people use heritage, and this is situational and relational. Waterton and Watson (2013) state: "Different people will inevitably respond differently to a particular heritage site – some may feel pride, connected, pleasure, others exclusion and rejection, and others still boredom – but these feelings, their affects, may in part be framed by the way the site is conjured and evoked discursively, visually or popularly" (p. 555). Heritage is thus constituted in being alive – in an ongoing process with openness to possibility, disruption, complexity, vibrancy, and liveliness (Crouch, 2010). As such it has to be regarded as being subjective and always in the process of making (Haldrup & Bœrenholdt, 2015), and performed within specific contexts, combinations, and connections (Crouch & Parker, 2003).

As the value and meaning of heritage depends on specific contexts, combinations, and connections, heritage scholars have started to explore relational notions and focus on ways to understand relations. Harrison (2013b), for instance, argues to adopt a transformational view on heritage, where heritage is seen as continually changing. And scholars like Harvey (2015) and Crouch (2010) argue for a relational view on heritage: "heritage is always emergent, in process" (p. 88) "and therefore to be conceptualised relationally" (p. 79). To capture these relations and the multiplicity and dynamism of heritage, Haldrup and Bœrenholdt (2015) argue to look at the way heritage is produced, performed, and emerging in the embodied and creative uses of heritage generated by people. Performativity, Crouch (2015) argues, allows us to focus attention on the mechanisms, and their potentiality, through which our participations and feelings may work, and may be affected. Haldrup and Bœrenholdt (2015, p. 55) define performances as "practises already inscribed in and inhabiting the world, and practises are bodily and material". Crouch (2012) furthermore argues that "the idea of performativity positions our practices, actions, relations, memories, performative moments as emerging contexts too" (p. 21).

This relates to Thrift's notion of nonrepresentational theory by which he attempts to revalue a belief in subjectivity and identity (Thrift, 2000). Thrift (2000, 2008) summarises the main tenets of nonrepresentational theory as being about everyday practises and performative manifestations of the lived world; practises of embodied subjectification, of bodies engaged in affective dialogue and joint actions; and about contingency and technologies of being human and nonhuman. Feelings and emotions thus become part of ongoing reflections of a thick and relational character, sometimes consciously, sometimes not. Crouch (2000) argues that individuals engage, encounter, and grasp the world through a process of embodiment. Whereby embodiment is defined as "a process of experiencing, making sense, knowing through practise as a sensual human subject in the world" (p. 68). The focus is thus on what people 'do', how contexts and practises interact through human experience. To grasp these processes of personal embodiment with heritage, Crouch (2010) suggests the notion of 'heritagisation'. Seeing heritage in this way allows us to engage with the very real emotional and cultural work that the past does as heritage for individuals and communities (Smith, 2006). Heritage becomes produced and constituted in cultural contexts, consumed, further reified, and 'held onto' as a sense of belonging (Crouch, 2010; Smith, 2006). By studying tourists' activities, Haldrup and Bœrenholdt (2015) highlight examples of heritage as something that is produced, performed, and emerging in the embodied and creative uses of heritage generated by people. They show that heritage not only comes alive through performances of heritage (i.e., re-enactments), but also how performances of tourists at heritage sites shape the stories and experiences produced at heritage sites (i.e., how visitors construct their own heritage worlds based on media, guidebooks, popular culture, and interactions with other visitors), and performance with heritage in relation to wider aspects of everyday life (taking photos and collecting souvenirs as material tokens to bring home, for example).

To sum up, applying relational notions to the domain of heritage makes us see that heritage is not a fixed thing, but dependent on how it is dealt with and how it is performed in a specific context. Shifting focus towards the practises and performances through which heritage is appropriated and used in everyday life enables us to provide a more precise understanding of the ways in which individuals and communities engage with heritage, as heritage is linked to the realm of the everyday.

2.2 Assemblage theory

As Harrison (2013b) notes, following a notion of heritage as dependent on performances in a specific context leads us to the concept of the assemblage: *"Exploring heritage as a production of the past in the present leads to a reassessment of who and what is involved in the process of 'making' heritage and 'where' the production of heritage might be located within contemporary societies"* (p. 32). Seeing heritage as an assemblage can be done in two different ways. First is the conventional way in which heritage is seen as a series of objects, places, or practises that are gathered in a museum, list, register, or some other form (Harrison, 2013b). The second notion of assemblage draws on De Landa's articulation of Deleuze and Guattari's assemblage theory.

According to DeLanda (2006), an assemblage is constructed by a wide range of social entities, in connections between persons, organisations and nation-states, through specific historical processes by shaping a whole from heterogeneous parts. An assemblage, however, does not form a seamless whole. Rather, an assemblage is "a whole whose properties emerge from the interactions between parts" (DeLanda, 2006, p. 5; 2016, p. 9), and therefore offers more than its individual parts. This is achieved by the parts not being constructed by 'relations of interiority', meaning that they refer not only to each other. Instead, according to DeLanda (2006), assemblages are wholes characterised by 'relations of exteriority' in that they may be detached from it and plugged into different assemblages in which their interactions are different (DeLanda, 2016, p. 11). In essence, an assemblage is made up of parts, which are self-subsistent and articulated by relations of exteriority (DeLanda, 2006, pp. 10–18). Assemblage theory exists as an alternative to the metaphor of society as a living organism that has dominated social theory throughout the twentieth century. In perceiving social structures as assemblages, DeLanda (2006) indicates that the properties of such natural/cultural groupings are not the result of the functions of the components themselves, but instead exist as the product of the exercising of their capacities. They are not an inevitable outcome of the function of their components (i.e., they are not logically necessary), but they are a product of their particular histories and their relationships with other parts of the assemblage (i.e., they are contingently obligatory) (DeLanda, 2006, p. 11).

In brief, we can define an assemblage as a nonessentialist, nontotalising social entity, constructed through specific historical processes and from heterogeneous parts (DeLanda, 2006). DeLanda (2016, pp. 19-21) summarises some of the main aspects of assemblages (see also Bennet, 2005):

- An assemblage is an ad hoc grouping, a collective whose origins are historical and circumstantial, though its contingent status says nothing about its efficacy, which can be quite strong;
- An assemblage is always composed of heterogeneous components. Besides an assemblage is not governed by a central power and power is not equally distributed across the assemblage;
- An assemblage can become part of larger assemblages;
- An assemblage emerges from the interactions between their parts, but once an assemblage is in place it immediately starts acting as a source of limitations and opportunities for its components;
- An assemblage, finally, is made up of many types of actants: humans, nonhumans, animals, vegetables, minerals, nature, culture, and technology.

A distinguishing dimension of assemblage theory is the attention it gives to nonhuman dimensions. This helps to draw out the nonstatic nature and ways in which power relations – both horizontal as well as vertical – are constantly being renegotiated: power as plurality in transformation (Anderson & McFarlane, 2011, p. 125). Power is thus contingent and emergent within social collectives, involving both human and nonhuman actors, and taking many different forms (Joyce & Bennett, 2010).

In the work 'Intensive Science and Virtual Philosophy', DeLanda (2002) also indicates aspects to include in assemblage thinking. He notes the temporal aspects of the genesis of organisms. Although a rate of change does not need to involve time, time does enter into the formulation of many important rates. Even when two processes operate at similar scales, the result of their interaction may depend on their coupled rates of change (DeLanda, 2002, p. 117). Moreover, he highlights the aspect of temporality. Thinking about the temporality involved in individuation processes as embodying the parallel operation of many different sequential processes throws a new light on the question of the emergence of novelty. To Delanda, this aspect of individuation processes is highly significant because it eliminates the idea that evolutionary processes possess an inherent drive towards an increase in complexity (DeLanda, 2002). Another aspect mentioned is flexibility. DeLanda (2002) notes that certain features are never fully fixed. At any rate, even the most anatomically and behaviourally rigid individual, even the most extensive of finished products, is immediately caught up in larger-scale processes where it becomes part of other intensities.

2.2.1 Use of assemblage in other domains

The term assemblage is often used to emphasise emergence, multiplicity, and interrelations, and opens up to see space as a composition of diverse elements into some form of provisional socio-spatial formation. In broad terms, assemblage is, then, part of a more general reconstitution of the social that seeks to blur divisions of social-material, near-far, and structure-agency (DeLanda, 2006). In this use, deploying the term assemblage enables us to remain deliberately open to the form of the unity, its durability, the types of relations, and the human and nonhuman elements involved (Anderson & McFarlane, 2011). More specifically, assemblage appears to be increasingly used to emphasise four interrelated sets of processes (Anderson & McFarlane, 2011, pp. 124-125; McFarlane, 2009):

- 1. First, assemblage emphasises gathering, coherence, and dispersion. In this respect, assemblage emphasises spatiality and temporality: elements are drawn together at a particular conjuncture only to disperse or realign according to place and the 'angle of vision';
- Second, assemblage connotes groups, collectives, and, by extension, distributed agencies. Assemblages are not organic wholes where the differences of the parts are subsumed into a higher unity. As Bennett (2005) has persuasively argued, assemblage names an uneven topography of trajectories that cross or engage each other to different extents over time, and that themselves exceed the assemblage;
- 3. Third, following Li (2007), assemblage connotes emergence rather than resultant formation. Part of the appeal of assemblage, it would seem, lies in its reading of power as multiple coexistences assemblage connotes not a central governing power nor a power distributed equally, but power as plurality in transformation;
- 4. Fourth, and in common with some but not all renditions of the term network, an emphasis is placed on fragility and provisional the gaps, fissures, and fractures that accompany processes of gathering and dispersing.

For these reasons assemblage thinking has influenced the poststructuralist scholarship also in domains like geography, urban studies, and urban planning (Yadollahi, 2017). The implementation of assemblage theory in these fields is because of the range of useful and interrelated concepts and methods in studying the relations among the human and nonhuman elements. However, domains like geography, urban studies, urban planning, and also heritage, do not have a long tradition in reflecting upon the temporality and unpredictability of processes.

2.2.2 Use of assemblage in heritage domain

Therefore, the central assumption In Yadollahi (2017)'s paper entitled 'the prospects of applying assemblage thinking for further methodological developments in urban conservation planning' is that assemblage thinking can broaden the horizon of heritage by offering useful concepts and methods. Various heritage scholars actually applied assemblage thinking, when talking about heritage. Pendlebury (2013), for instance, has used the concept of assemblage to describe administrative conservation planning systems. In addition, the work of Macdonald (2009) is worth mentioning, as this is one of the few examples in heritage literature that has gone beyond a merely terminological use of concepts of assemblage thinking in explaining an urban heritage-related process.

Macdonald (2009) argues that it has become commonplace in heritage research to highlight the ways in which heritage is defined and shaped to political ends. In such accounts, heritage is depicted as the outcome of particular political interests, and the past as manipulated to service the present. While any contest involved in this may be acknowledged, or even made central, what is usually given less attention is the way in which heritage acts as what Bruno Latour calls a 'mediator'. That is, rather than simply being the material worked upon, heritage plays a part in shaping the interactions in which it is enmeshed. Therefore, Macdonald (2009) argues to see heritage both as part of a wider 'heritage assemblage' as well as through specific material, symbolic, and perhaps even legal features of the particular heritage involved. Considering heritage as an assemblage helps us conceptualise the complexity of the social relationships in heritage management. It helps draw out the horizontal and shifting power relationships that exist in contestations over the management of places (Pendlebury, 2013). This helps to show that heritage is not only a practise of those who perform or interact in everyday life with whatever is termed heritage, but also of those involved at the initial stages of assembling the representations and discourses through which such heritage is articulated and presented to heritage institutions, the general public, and practitioners in various forms (Bille, 2012). Indeed, the international valorisation of heritage begins with an assembly: an assemblage of discourses, documents, and persons linked to pasts, practises, or materials (Bille, 2012).

Macdonald (2009, p. 118) argues that an assemblage perspective can productively open up questions for heritage research, not the least which are the capacities of heritage and its implication in the production of other entities, especially temporalities, place, and citizens. Taking an assemblage perspective on heritage directs our attention less to finished 'heritage products' than to processes and entanglements involved in their coming into being and continuation. While a good deal of other heritage research in recent years has been concerned with the construction of heritage (rather than taking its existence and legitimacy as given), an assemblage perspective tries to avoid imputing 'magical' notions such as 'society' or 'ideology' as part of its explanations. Instead, it focuses on tracing the courses of action, associations, practical and definitional procedures, and techniques that are involved in particular cases. In doing so, it considers not only the human and social but also the material or technical. This typically has the following consequences (Macdonald, 2009, pp. 118-119):

- First, instead of reading a finished heritage product as an outcome of the political interests, policy decisions, or individual decision-making, the emphasis is on the multiple, heterogeneous, and often highly specific actions and techniques that are involved in achieving and maintaining heritage. An assemblage perspective also asks what else helped to sustain their implementation, perhaps giving them a new inflection in the mediatory process. A usual consequence of this is that greater degrees of indeterminacy, as well as unintended courses of action, are made visible;
- Second, moments that previously may have seemed like clear punctuations, moments of novelty, or invention often become more blurred as we see how certain pre-existing elements are taken up into a reshaping assemblage;
- Third, because of assemblage theory's commitment to avoid imputing analytical divisions a priori and, more specifically, because of its rejection of scalar models in which the micro is seen as nestling inside the macro, or the local inside the global, an assemblage perspective potentially provides more nuanced accounts of complexes of interrelationships.

Seeing heritage as an assemblage thus has a series of implications for the way in which we study past and contemporary material-social relations. Harrison (2013b) identifies

some of these implications. First, assemblage thinking focuses our attention on the ways in which things and people are involved in complex, interconnected webs of relationships across time and space, rather than seeing objects and ideas about them as somehow separate from one another. Secondly, the notion of the assemblage helps us to concentrate on the formation and reformation of social processes across time and space. Thinking of heritage as an assemblage means, according to Harrison (2013b), paying attention not only to individuals and corporations and the discourses they promulgate or resist, but also to the specific arrangements of materials, equipment, texts, and technologies, both 'ancient' and 'modern', by which heritage is produced in conversation with them.

To sum up, alike relational notions on space and place, assemblage theory is a useful poststructural lens to focus on the ways in which things are interconnected. At the same time, both lenses provide a more or less fixed picture of a web of relations, and as such, reveal less about how these interrelations evolve over time. Opening up to dynamism and multiplicity that come with community-heritage engagement, however, means that we see heritage as a manifestation of a continually changing process of valuation and revaluation. Therefore, besides discussing lenses that see heritage relationally, there is also a need to explore theoretical notions that particularly address the aspect of evolutions over time.

2.3 **Complexity theory**

To explore theoretical notions that particularly address the aspect of evolutions over time, we first turn to spatial planning theory, where the turn towards approaches based on multiplicity and dynamism has already been taken. Indeed, over the last decades, several planning theorists have explored a complexity perspective on spatial planning in order to understand diffuse planning processes that involve a great variety of actors that behave in unpredictable ways. Both poststructuralists and complexity theorists criticise the idea of a linear paradigm, and instead focus on how each part of complex systems influences the others reciprocally, exchanging information mutually and in accordance with the specific circumstances or contexts (Portugali et al., 2012). Recognising the complexity of our environment is, however, only a recent idea within planning. The planner's world is no longer regarded as a static one, instead the planner's reality is a world that continually evolves. Acknowledging complexity is therefore about acknowledging an endless and continuous movement and interaction between all kind of different elements (people, places, and institutions). In short, complexity means that realities are continually evolving, and that there is no such thing as a static world in which planners or policymakers operate. In that regard, notions of complexity theory are a useful theoretical frame to address irreversible, irreducible, and nonlinear changes, and to understand the interrelatedness, interdependency, diversity, and multiplicity of contemporary society. Looking at complex interactions within the context of multiplicity of changing heterogeneous actors, and changing or fuzzy objects, is more and more done through the lens of co-evolution.

2.4 **Co-evolution**

Co-evolution is a concept derived from biology, which describes the process of interaction between two (or more) systems, where these interactions cause change in the nature of these systems (Kallis, 2007). The emphasis on interactions and reciprocity makes the concept of co-evolution different from mere evolution. Whereas evolution relates to the process of adaptation and transformation of one specific species, co-evolution describes a process of reciprocal selective interaction with biotic circumstances, including other organisms or systems. The concept of co-evolution thus places emphasis on the reciprocal interactions between two or more evolving systems within and in interaction to a specific context (Gerrits, 2008). To better explain and understand the concept of co-evolution we first need to take a closer look at notions of biological evolution, which can be achieved by going back to the original source, *The Origin of Species*, by Darwin (1859).

While biology has undoubtedly changed in the 150 years since its publication, *The Origin of Species* remains one of the most elaborate descriptions of biological evolution. This Darwinian theory is still valid as the basics of Darwin's argument have not considerably changed (Ghiselin, 2003). Darwinian theory is comprised of three elements, or principles: variation, competition, and inheritance (Lewontin, 1970). First, different individuals within a population have (through inheritance) different characteristics and opportunities in terms of morphologies, physiologies, and behaviors. Second, there is competition between different individuals, resulting in a situation where not all individuals have an equal chance of surviving and reproducing. Third, there is a correlation between parents and offspring in the contribution of each to future generations. Together, these three principles embody the principle of evolutionary change, defined as a change in the frequency of a trait in population over time. As long as this inheritance-competition-variation cycle continues, a population will undergo evolutionary change. Hence, it is important to note that evolution only happens when all the three elements are demonstrated.

Darwin himself, however, already speculated that these principles of inheritance, competition and variation might also apply to other evolutions, such as human language, moral principles, and social groups (Darwin, 1859, 1888). In 1983, Dawkins coined the term "universal Darwinism", to suggest that the core Darwinian principles apply not only to biological phenomena but also to other open and evolving systems, including human cultural or social evolution (Dawkins, 1983). This idea that Darwinian theory may have a broad applicability to other open and evolving systems has been developed in different ways by several authors (for an overview of authors applying the idea of universal Darwinism see Hodgson, 2005), thereby further extending the idea of universal or generalised Darwinism. This is also done by Mesoudi (2011) who, for instance, analysed – by taking the three principles of biological evolution into account – whether cultural change can be regarded as an evolutionary process. By looking at the number of languages (about 6,800), religions, patents, and Wikipedia entries he argues that the first precondition – inheritance – is present in culture. When it comes to competition, he notes that the competition for space in memory (i.e., learning every

one of the 6,800 languages is impossible), and also the effects of that competition (i.e., extinction of cultural practises, such as language) can be regarded as an endless struggle for existence. Cultural variants can be passed from one individual to another (Mesoudi, 2011). These findings seem to demonstrate – as all three elements of evolution are present – that cultural change can be explained by using universal Darwinism. Yet, Hodgson (2005) indicates that these findings are rather premature, as in many of these attempts to explain universal Darwinism some questions are only addressed to a limited extent, noting that there is a lack of reflection on social structures and their irreducibility to individuals, and a lack of explanation of the links between different social structures.

This is a criticism that not only counts for discussions about universal Darwinism (applied in different domains), but clearly also counted for Darwinian theory as applied to biological processes. In 1964, Ehrlich and Raven (1964) noted that one of the least understood aspects of population biology is community evolution. Community evolution is defined as the evolutionary interactions amongst different kinds of organisms, where exchange of genetic information is assumed to be minimal or absent (p. 586). They noted that one group of organisms is all too often viewed as a physical constant, and that the reciprocal aspects of interactions between communities have been ignored. They found that organisms do not only evolve in specific biotic circumstances, but also through reciprocal selective interaction with other (related or unrelated) organisms and they named these patterns of interaction between two major groups of organisms "co-evolution". Ehrlich and Raven (1964) were the first to explicitly focus on co-evolution, yet without outlining a definition.

Janzen (1980, p. 611) provides such a definition as he defines co-evolution as "an evolutionary change in a trait of the individuals in one population in response to a trait of the individuals of a second population, followed by an evolutionary response by the second population to the change in the first". Co-evolution, as a type of evolution, is thus about the mutual influence between two populations in a (changing) context. However, it should be noted that co-evolution is more than just the mutual influence between two systems (Gerrits, 2011). Indeed, Janzen (1980) stresses that co-evolution should not be seen as a synonym of interactions, symbiosis, or mutualism. One of the differences between co-evolution and evolution is that in biological evolving systems selection acts only on or in the system as a whole, as the components do not replicate. In co-evolving systems, the components of the system do replicate. In fact, co-evolution is the process of multidirectional changes in the systems' state through both perceptible and blind reciprocal selection (Gerrits, 2008). The core principle of co-evolution lies in the reciprocal nature of selection; the evolution of an organism can depend on the evolution of another related organisms (Futuyma, 1995; Gerrits, 2008). Or in other words, in a co-evolutionary process, different subsystems are shaping each other, but not determining each other (Kemp et al., 2007). The concept of co-evolution thus places emphasis on the reciprocal interactions between multiple evolving systems within and in interaction to a specific (changing) context. Acknowledging this means that evolution does not take place in a vacuum, but rather in reciprocal selective interaction with its biotic circumstances, including other organism or systems (Gerrits, 2008; Gerrits et al., 2009). Hence, co-evolution is especially applicable in explaining patterns of mutual influence that cause change over time. Co-evolutionary processes are ongoing processes and will continue to change throughout time.

2.4.1 Three types of co-evolution

Co-evolution is thus not a process that can be controlled. Not only are systems and their interactions complex in and of themselves, but they are also part of a larger complex system and are comprised of smaller systems within themselves. Moreover, systems are not evolving in an isolated environment; their environment evolves as well, and this environment consists of other systems and actors within these systems (Gerrits et al., 2009). Systems thus co-evolve with other systems over time, and systems co-evolve without one system constantly steering the other. Therefore, co-evolution is not a process that can be controlled. Nevertheless, the processes and patterns of change can be analysed. Gerrits et al. (2009) have developed a categorisation of mutual interactions between systems, depending on the extent of change in a system. They define three types of interaction:

- *Interferential:* a form of co-evolution with the result that the state of all systems alters to a state that constitutes degeneration for all concerned;
- *Parasitism:* a form of co-evolution where agents manage to position themselves in such a way that their system evolves into a favorable state at the expense of other systems;
- *Symbiotic:* a form of co-evolution that leads to results that do not come at the expense of anyone or anything.

Although, Gerrits et al. (2009) note that not all interactions lead to changes in systems and therefore to co-evolution, or that interactions can happen intended or unintended, this categorisation is a helpful starting point to analyse types of interaction.

2.5 **Co-evolution in related domains**

Although co-evolution is rooted in biology, the co-evolutionary principle has emerged in other domains as well, such as cultural anthropology and sociocultural change (Ames, 1996), economics (Kallis & Norgaard, 2010; Norgaard, 1984), and governance (Bertolini, 2010; Gerrits & Teisman, 2012; Van Assche et al., 2017). Moreover, Sanderson (1990) notes (regarding sociocultural domain) that there is a growing number of accounts that regard sociocultural change as co-evolution between a biological system with genetic mechanisms and a cultural system with nongenetic mechanisms. Also within spatial planning (e.g., Bertolini, 2007, 2010; Duineveld et al., 2015; Kosunen et al., 2020), the potential of co-evolutionary perspectives is increasingly recognised, especially in cases in which neither the involved actors, the context, nor the precise challenges or objects of planning are clear (Boelens & de Roo, 2016).

With regard to the potential of co-evolutionary perspectives in planning theory, Evolutionary Governance Theory (EGT) is particularly worth mentioning as it is a comprehensive perspective on co-evolution in governance and spatial planning. Planning within this perspective is understood as a political activity that can and does take many forms that change over time, in evolutions that alter both the structures and elements of a planning system (Duineveld et al., 2015; Van Assche et al., 2017). This theoretical framework shows how understanding governance as entirely and continually restructuring allows for new understandings of broader changes in society and new understandings of the spaces for intervention (Beunen et al., 2015). Within EGT, all elements of governance are seen as subject to evolution; i.e., governance is continually reproduced in order to exist. Actors change, institutions change, knowledge changes, and the objects and subjects of governance are changing as well. All these elements co-evolve and many of them are products of governance itself. Governance can be seen as the emergent outcome of the interactions between all these different elements (Beunen et al., 2015).

Also with regard to sociocultural evolution, notions of co-evolution are useful to link everyday lives with broad-scale social and cultural changes. Ames (1996) tried to apply notions of co-evolution to sociocultural change, by linking it to Durham's (1991) dual inheritance theory. Dual inheritance theories postulate that, "... genes and culture constitute two distinct but interacting systems of information inheritance within human populations" (pp. 419–420). Culture is defined as "systems of symbolically encoded conceptual phenomena that are socially and historically transmitted within and between populations" (p. 9). And cultural selection is "the differential social transmission of cultural variants through human decision making" (p. 198). What Durham is saying with this theory is that material cultural is not culture, but rather the phenotypic expression of the interplay among cultural inheritance and environment (Ames, 1996). Hence, this was a first attempt to link changes in culture (and related aspects, such as heritage) to human decision making and changes in the environment. Indeed, whereas notions of co-evolution are applied with regard to spatial planning and other domains, the concept remains mainly theoretically elaborated with regard to heritage. Although not explicitly referring to the term co-evolution, Daniel and Robin (2016) argue for dynamic conservation where heritage objects are not seen as the relics of a time gone by, but as resources for development through the interaction with new actors and societal processes. Della Torre (2019, 2020) proposes the implementation of a co-evolutionary approach to heritage reuse to highlight the effects of heritage objects on the environment and society.

2.6 How it all adds up

Chapter one argued that heritage approaches that answer to dynamism and multiplicity that come with community-heritage engagement have so far been seriously underdeveloped. In this chapter we introduced and explored theoretical conceptualisations that see heritage as a manifestation of continually changing and interrelated processes of valuation and revaluation. Poststructural notions – such as relational notions of space and place, and assemblage theory – appear to be useful to understand interrelatedness. At the same time, both lenses reveal less about how these interrelations evolve over time. To deal with the issue of continual change over time, the concept

of co-evolution appears to be helpful. Although the concept of co-evolution has hitherto mainly been theoretically elaborated regarding heritage, it would fit in poststructural heritage theories.

There are indeed similarities and connecting factors between poststructural, relational notions, and co-evolution. DeLanda (2006) for instance already notes that the process of formation and reformation of social processes differs across time and space, and that assemblages constantly undergo iterative change and evolution. One of the main advantages of assemblage theory in this regard is that deploying the term assemblage enables us to remain deliberately open as to the form of the unity, its durability, the types of relations, and the human and nonhuman elements involved (Anderson & McFarlane, 2011). In fact, an assemblage perspective puts the focus on tracing the courses of action, associations, and practical and definitional procedures and techniques that are involved in particular cases rather than on the outcomes (Macdonald, 2009). This, in turn, can help to highlight components working to stabilise its identity as well as components forcing it to change (DeLanda, 2006, p. 12). Using assemblage theory in this way – "as a broad descriptor of disparate actors coming together, ... as a way of thinking about phenomena as productivist or practise-based, as an ethos that attends to the social in formation, and as a means of problematising origins, agency, politics and ethics" (Anderson & McFarlane, 2011, p. 126) – will allow us to connect assemblages to a potentially limitless array of concepts and to use it in relation to any provisionally structured formation. As such, co-evolution fits within an assemblage perspective on heritage, as both co-evolution and assemblage theory enable us to remain deliberately open, and as co-evolution helps us to see assemblages as constantly undergoing iterative change and evolution.

Addressing interrelatedness and changes over time – a combination of assemblage theory and co-evolution – brings us a theoretical conceptualisation that allows us to see heritage as a manifestation of continually changing processes of valuation and revaluation, influenced by reconsiderations and therefore always moving. In this dissertation, this theoretical conceptualisation will be called a co-evolutionary heritage approach. Such a co-evolutionary heritage approach starts from the notion that heritage is an open and responsive system in which many actors and ideas – as subsystems – act in parallel, and in unforeseen, nonlinear, and spontaneous ways due to changing circumstances. The meaning of heritage then would not be intrinsic, but relational while receiving meaning only from the context and from other subjects and influencing them in turn (see Figure 2). Adopting this notion of a co-evolutionary heritage approach will help us to overcome some of the limits of the object-oriented and process-oriented heritage approaches, as these were rather fixed approaches that have difficulties to accommodate multiplicity and dynamism that community-engagement and integration of heritage in spatial developments would require. Therefore, a co-evolutionary approach – a combination of two related notions of assemblage theory and co-evolution - will be used in this dissertation to guide the analysis: assemblage theory will be used to describe how heritage is constituted, and co-evolution will be used to analyse and classify processes and patterns of change over time. Before applying these concepts to the analysis, a further operationalisation of the concepts is pivotal for its application in heritage theory and practice.

Object-oriented approach	Inherent values
Process-oriented approach	Contextual values
Co-evolutionary approach	Values are constantly created

Figure 2 Characteristics of different approaches to heritage values.



ANALYTICAL AND METHODOLOGICAL FRAMEWORK

Two combined theoretical notions – assemblage theory and co-evolution – will be used to guide the analysis of cases that follows. The analysis consists of two steps. As a first step, assemblage theory will be used to describe how heritage is constituted; as a second step, co-evolution will be used to analyse and classify processes and patterns of change over time.

3.1 Step 1: Using assemblage theory to describe heritage assemblages

DeLanda (2016) describes assemblage theory not only as a useful way to describe gathering processes, but also as a manner to address key elements like change, temporality, and unfixed processes. Assemblage theory is thus instrumental in describing how heritage is constituted at a certain moment in time. Linking assemblage thinking to heritage means we first have to identify what elements are part of the gathering process. In this regard Harrison (2013b, p. 35) notes that thinking of heritage as an assemblage means "paying attention not only to individuals and corporations and the discourses they promulgate or resist, but also to the specific arrangements of materials, equipment, texts and technologies, both 'ancient' and 'modern', by which heritage is produced in conversation with them". These specific arrangements of materials might include not only the 'historic' fabric of a heritage site itself, along with the assortment of artefacts that represent its patina of age and authenticity, but also the various technologies of tourism and display by which it is exhibited and made visible as a heritage site. Moreover, Yadollahi (2017) note that assemblages can exist of elements like humans, organisations, legal frameworks, technological tools and infrastructures, the built environment, the natural environment, and nonhuman beings that come together and make an assemblage. Indeed, historic buildings can have the capability of aligning with legal systems, human emotions, and value priorities and play a significant role in the way communities decide to shape their environments. We might furthermore think of the governmental capacities of these various socio-technical components, which together make up the heritage assemblage (Harrison, 2013b). In addition, Pendlebury (2013) notes that a heritage assemblage embraces institutional organisations, norms and objects (e.g., laws and regulations), and normalised practices. The elements that have an impact on the assemblage are to be observed and followed in a topology of relations. In this regard, taking an assemblage perspective means that one has to search for information sources that can elaborate on individual definitions of various aspects of that assemblage, within a specific context.

To better understand the continuous process of constructing and reconstructing heritage assemblages in interaction between multiple contexts, and in interaction to a specific context, it is helpful to refer to Luhmann's system theory. For Luhmann (1997), society is regarded as complex, a-linear, and volatile. Hence, it is argued that there is no point in society from which society can be observed in totality. To deal with this kind of complexity, Luhmann (1997) regards it as essential to approach the complex reality with various autonomous and distinct subsystems, such as the economic system, the legal system, the system of science, etc. These subsystems are operationally closed by

reducing the complexity of the environment, according to the structure and the internal and self-defined codes of that subsystem. For Luhmann, however, this doesn't mean that modern society would only be highly fragmented in various distinct subsystems, but, on the contrary, as highly relational. In other words, a subsystem also evolves in its changing surroundings or in relation to other subsystems. To understand the interrelation between different systems in space, the Actor Relational Approach (ARA) is regarded as helpful. The actor relational approach developed by Boelens (2010) is based on Actor Network Theory and is an approach that helps to focus on the interrelation between different actors in specific dynamic settings. In other words, it is an approach that helps us see how actors, factors, and institutions in specific spatiotemporal situations constitute and reconstitute a heritage assemblage within a specific setting. The actor relational approach consists of three major components: actors, factors of importance, and institutions. Actors include human actors like public, business, and civic actors. Factors of importance include nonhuman actors such as infrastructure, landscape, water, buildings, environment, or other geographical features and these are represented through mediators or intermediaries. Institutions can be formal or informal and they present the rules and regulations that are prevalent in a given subsystem. These three subsystems - actors, factors, and institutions - are never to be seen as closed, but always in a state of becoming and therefore continually changing. Adopting the ARA approach means that systems can be regarded as a networked actor-factorinstitutional assemblage, meaning that actors and institutions have an impact on the geographical space itself, vice versa, and operate in a bigger environment (Boelens, 2010). The actor relational approach thus delineates the process of studying various systems, as it identifies components of subsystems (such as actors, factors, and institutions), and the interrelations between these subsystems.

3.1.1 Heritage as an assemblage

To delineate what elements are deemed part of heritage assemblages, we return to the introductory chapter where it is introduced and illustrated that heritage is increasingly linked to various other aims such as community-engagement in heritage matters and the integration of heritage and spatial planning.

Indeed, the integration of heritage and spatial developments has increasingly been acknowledged (Bloemers et al., 2010) and heritage is more and more seen as an integral part of cities and landscapes (Fairclough, 2008). Accordingly, there is a broad range of papers on the links between heritage and spatial developments, focussing on different aspects: for example, the role of material heritage in (sustainable) urban revitalisation (Bizzarro & Nijkamp, 1998; Pendlebury, 1999; Tweed & Sutherland, 2007); creating a symbiosis of both tourism and heritage in historic areas (Bucurescu, 2015; Nasser, 2003); and the role of heritage in climate change adaptation (Harvey & Perry, 2015). At the same time immaterial heritage values are also more and more recognised, also with respect to spatial developments as is noted by Vecco (2010). He states that additional parameters have now been added in valuing immaterial heritage regarding spatial developments, values such as *"the cultural value, its value of identity and the capacity of the object to interact with memory"* (Vecco, 2010, p. 324). Linking immaterial heritage with spatial developments is mostly done via materialising the immaterial.

An example of the materialisation of immaterial values in spatial developments is provided by Tweed and Sutherland (2007) who mention an example of street patterns, which are designed to incorporate the historic narratives of a neighbourhood. There are also papers on the development of heritage tourism in relation to immaterial aspects. Zabbini (2012), for instance, provides an example of a battlefield (without any physical relicts), which is now used for touristic purposes by using new techniques to present the story of the site and thus to valorise the heritage values of the site.

In general, in the academic literature there is a tendency to frame immaterial heritage as a way to extent the concept of material heritage, as new parameters related to memory or identity are also captured by defining immaterial heritage (e.g., Ahmad, 2006; Carman, 2009; Ludwig, 2016; Pocock et al., 2015; Vecco, 2010). Ludwig (2016), for example, notes - based on an analysis of local heritage designations in England - that interviewees appear to portray heritage as a more complex, multi-sensual experience, rather than something simplistically tied up in the physical fabric of buildings. The article discusses examples (for instance, a wall painting), which represents local socio-historic legends and narratives which hold a certain importance in terms of immaterial historic/social significance. This is in line with what Carman (2009, p. 197) notes, that material heritage cannot be seen in isolation of its immaterial aspects: "What makes heritage is, rather than anything else, that objects represent immaterial qualities we value". It becomes clear that not only material heritage objects are to be recognised, but that attention needs to be paid to practices and immaterial values which can add up or strengthen material heritage. Mydland and Grahn (2012) add to this by investigating how local understandings of heritage relate to its official understanding (in a Norwegian context). They found that the motivation for local preservation, and for spending time and money on objects belonging to the community, is not primarily preserving cultural heritage objects for the future, but to establish and maintain common social institutions in the local society, institutions of vital importance to the local identity. The research focused on old schoolhouses and it appeared that "the motivation behind the local initiatives for restoring the old schoolhouses is not so much to preserve an 'antiquarian' building for the future, but rather to use them as a medium to develop and maintain social fellowship and a common identity" (p. 583). In this context, the local understanding of cultural heritage becomes a social process rather than a physical object to be preserved. In other words, "cultural heritage is seen as an instrument for the development of social experiences, relations, exchanges and so forth" (p. 583).

This example already indicates that community engagement is increasingly becoming an integrated part of dealing with heritage. Watson and Waterton (2010) note that community engagement has become an integrated part of dealing with heritage, and that this engagement counts for both material and immaterial heritage: *"Community engagement with heritage is more overtly linked with cultural distinctiveness, identity and nationalism, or exists as an articulation of ancestral links with important places, traditions and narratives"* (p. 2), therefore addressing both material heritage (places) as well as immaterial heritage (narratives, tradition). Murzyn-Kupisz and Działek (2013) investigated the link between immaterial and material heritage and communities by focusing on the creation of social capital. Social capital is defined as a concept to highlight the socioeconomic development of particular groups, communities, or neighbourhoods. They identify several types of impact and links between heritage and social capital, such as:

- "heritage objects, sites, or traditions as the main aim and reason for undertaking common actions and community integration around an important goal";
- *"the role of heritage in attracting new residents and supporting their integration with the local community";*
- *"heritage as a constitutive part and an expression of identity, pride, sense of place and belonging at different spatial scales";*
- *"heritage as the reason for common celebrations and festivities"* (p. 45).

At the same time, this article highlights the negative impact of thinking in terms of communities: *"Strong bonding capital in traditional communities may make them avoid external contacts and inspirations, making them distrustful or even hostile towards outsiders. Heritage institutions may promote the values of prominent social, economic, or political groups, becoming tools of domination and control rather than social inclusion"* (Murzyn-Kupisz & Działek, 2013, p. 45). Notwithstanding, many scholars in the field of heritage are studying issues of community engagement. There is a broad range of papers discussing how official understandings of heritage relate to local community understandings (e.g., Mydland & Grahn, 2012; Perkin, 2010). These scholars note that communities' understanding of heritage can emphasise a broader range of meanings, including also immaterial aspects, thereby challenging the notion that the primary purpose of conservation should be the maintenance of material heritage (Parkinson et al., 2016).

We can summarise this concise literature review, by mentioning that heritage is increasingly induced with various aims such as community-engagement in heritage matters and the integration of heritage and spatial planning. In order to open up to the dynamism and multiplicity that come with community-heritage engagement and integration of heritage and spatial planning more attention needs to be paid to various relations between different aspects. In line with the above literature overview and the problem statement in chapter 1, we particularly focus on the interrelatedness of four aspects: material heritage, immaterial heritage, local (heritage) community, and spatial development/identity.

3.1.2 Four interrelated definitions

These four aspects are discussed in more detail below, in order to come up with a proper definition to be used in this research project.

Material heritage refers to the idea of inheritance and the idea of physical 'things', which are regarded as valuable and can be handed down. Indeed, much of the heritage rhetoric starts from the premise that heritage is old, immutable, and physical, something to preserve the way it is (Howard & Ashworth, 1999). This idea has been critiqued in few different ways. Commentators have proposed going beyond materialism by conceiving of heritage as a process (Graham et al., 2000), understanding all heritage as intangible (Smith, 2006), and thinking of heritage places as not only 'seen' but also practised

(Cresswell & Hoskins, 2008). While not denying that the overemphasis on material heritage is problematic, for the present purpose we operate with the assumption that the materiality of heritage is important.

• Material heritage in this research project is defined as physical objects – such as monuments and sites, architectural ensembles, archaeological sites, historic townscapes, industrial heritage – which are signifiers of a past.

Immaterial heritage refers to nonmaterial aspects of culture – such as language, literature, and cultural practices – that are important aspects for local communities' identity (Harrison & Rose, 2013). The term immaterial heritage (or intangible heritage, a term which is also frequently used in academic literature) was originally coined to problematise the focus on material things only. Immaterial heritage is about practices, but it is also closely related to the production of both collective and individual memory and performs social work, which helps to build community and identity (Harrison, 2010). Logan (2007, p. 33) defines intangible heritage as *"heritage that is embodied in people rather than in inanimate objects"*. While we acknowledge that a clear separation between the material and immaterial could be seen as a way to strengthen the materiality of heritage, material and immaterial heritage are for the present purpose seen as two distinct aspects.

• Immaterial heritage in this research project is defined as practices – such as traditions, festivals, language, and expressions – which are signifiers of a culture and manifestations of social memory.

Local (heritage) community refers to groups of citizens or individuals who value and define material and immaterial heritage in a specific spatial context. Community has to be understood the way Waterton and Smith (2010, pp. 8-9) state it: *"Communities thus become social creations and experiences that are continuously in motion, rather than fixed entities and descriptions"*. Additionally, local heritage communities can also be defined as those being subject to heritage management and preservation. Waterton and Smith (2010, p. 11) explain: *"Community or group identity becomes the object of regulation through the heritage management process, not only reinforcing the power differentials in community' and their continual misrecognition"*. A local heritage community is therefore also the highly formalised and institutionalised context of government officials and consultants, academic researchers, legal experts, and commercial actors who created specific thinking, speaking, and acting about heritage conceptualisation and accordingly heritage management practices.

• A local (heritage) community in this research project is defined as those who signify material and/or immaterial heritage.

Spatial development/identity refers to the spatial context, landscape, or environment in which material and immaterial heritage objects are located. Moreover, this spatial lens also encompasses more broader perspectives on heritage. Widening the scope of defining heritage brings us concepts such as 'historic environment', heritage landscapes (Bloemers et al., 2010), and ensembles such as historic city centres, or tourist-historic cities (Ashworth & Tunbridge, 2000), or so-called historic urban landscapes (Veldpaus et al., 2013). This conceptualisation of the spatial dimension of heritage allows us to identify other forms of heritage (whether material or immaterial) beyond the idea of the individual material or immaterial heritage object alone. It should be noted that heritage management has become a central concern within spatial development and place-making strategies, performing diverse roles from maintaining place distinctiveness and urban character to neoliberal conservation-led urban regeneration or place-branding initiatives (Pendlebury, 2015; Pendlebury & Porfyriou, 2017).

 Spatial development/identity in this research project is defined as the broader environmental context of heritage – including situational and contextual value of the heritage object, spatial planning, plans and heritage landscapes.

These four aspects are regarded a part of the heritage assemblage (e.g., the subsystems). Yet, assemblage theory is a gathering process, meaning to focus particularly on the interrelatedness of the different aspects of an assemblage. Regarding these four aspects as part of the heritage assemblage, we saw in the literature that only some of these relations are extensively described. In particular, the link between material heritage and spatial development, community and spatial development, and the link between community and immaterial and material heritage are well described. It must however be noted that some of the links are discussed only in one direction, the mutual relation between aspects is only discussed in some cases. Whereas the link between community and spatial development is underpinned by a well-established field of literature, some other links – between immaterial heritage and spatial development, for instance – are less or almost never discussed in the literature. However, it must be noted that the literature shows some overlap between various links. The link between immaterial heritage and spatial development, for instance, overlaps with the link between material and immaterial heritage as immaterial heritage is mostly linked to spatial development by materialising it (e.g., street patterns). Although it's logic that research articles do not cover all four aspects, it must be noted that the literature is rather fragmented as there is only limited research work addressing one aspect in relation to various and heterogeneous (thus human/nonhuman) other aspects.

These 'mismatches' are also to be recognised in current dominant heritage approaches (i.e., object-oriented or process-oriented), as discussed in chapter 1. In an object-oriented approach, material heritage is seen in isolation of its spatial context and developments, and there is only limited room for incorporating communities or immaterial aspects of heritage. Although the process-oriented approach to heritage allows us to see material heritage in relation to spatial developments, community, and even immaterial heritage, this approach still brings us a single, rather fixed solution in which only some values are incorporated rather than a flexible, adaptive, and continually changing approach.

By contrast, a co-evolutionary approach to heritage – most notably an assemblage approach – would therefore see material and immaterial heritage assets, local heritage communities, and spatial development/identity as continually and mutually related and responded to each other's changes. Indeed, it is not just one of these aspects that

should be part of the assemblage, or a combination of several aspects. Instead, it is of particular significance to address the interrelatedness and interconnectivity of all four aspects: material and immaterial heritage, local heritage communities, and spatial development/identity. This conceptual frame is visualised in Figure 3.



Figure 3 Conceptual model of a relational approach to heritage.

3.1.3 Analysing heritage assemblages

The first step of applying a co-evolutionary heritage approach to the analysis of cases is to use assemblage theory to describe how heritage is constituted. Based on the above, three criteria of a co-evolutionary heritage approach are formulated to describe and analyse heritage assemblages. These are:

- Multiple aspects as part of the heritage assemblage;
- A continuous interaction between the aspects of the assemblage, evoking mutual transformation of these aspects;
- Interaction with, adaption to, and transformation of the broader social and institutional context.

The first criteria of co-evolution is the multiplicity of aspects being part of the heritage assemblage. Indeed, to speak of co-evolution, two or more systems (in this subsystems of the assemblage) have to evolve together within a dynamic context, so that the evolution of one aspect relates to the evolution of another related aspect (Gerrits, 2008). Hence, these multiple driving forces are related to various subsystems operational within a heritage assemblage. In this research project, a co-evolutionary heritage approach is defined as a continuous and mutual process of interaction between material and immaterial heritage, local heritage communities, and spatial development/identity. These four aspects are part of the heritage assemblage, and each of the aspects comes with its own set of stakeholders, legislations, discourses, practices, and epistemes, and can thus be seen as separated-but-related socio-institutional subsystems (Luhmann, 1970).

The second criteria for co-evolution is that these four subsystems of the assemblage continually and mutually relate and respond to each other's changes. Key to the concept of co-evolution is the idea that there is a mutual relation between two or more evolving systems within a dynamic context. The notion of co-evolution therefore

shifts attention towards describing relations and processes, rather than objects and forms (Massey, 2005). This relational view on heritage is increasingly acknowledged in contemporary heritage literature (e.g., Harvey, 2015). Yet, it appears that the literature is rather fragmented as there are only few researchers addressing the relations of multiple aspects the heritage assemblage. In fact, most research only addresses the relation between two aspects (e.g., material heritage and local heritage communities). Co-evolution *does* acknowledge the relations and the reciprocal interactions *between* these different aspects of the assemblage.

With only addressing the interrelatedness between the different aspects of the assemblage as described above, we do not, however, fully grasp the complexity of heritage assemblages. As explained earlier, the concept of co-evolution not only places emphasis on the reciprocal interactions between two or more evolving systems, but also on the interactions in and to a specific dynamic context (Gerrits, 2008). In other words, co-evolution takes place within a broader evolving social and institutional context. Hence, the third criterium of co-evolution is that a heritage assemblage adapts to changes in its broader social and institutional context and evokes changes in that context as well.

In the analysis of cases that follows, we will therefore not only analyse the different aspects of the heritage assemblage and the various and heterogeneous interactions between these aspects, but also the interaction within the broader social and institutional context. To speak of co-evolution, all three criteria have to be met.

3.2 **Step 2: Using co-evolution to analyse processes** of change over time

As mentioned earlier, assemblage theory and the theory of co-evolution fit each other well, as they both remain deliberately flexible and open; co-evolution theory can help in seeing assemblages as constantly undergoing iterative change and evolution (DeLanda, 2016). If we consider the dynamic nature of assemblages, power and impact can be present or absent in different phases of the assemblage, meaning that the assemblage is in the process of becoming. As a second step in the analysis, these processes of becoming and patterns of change over time are analysed.

To that end, Actor Network Theory (ANT) will be used. The Actor Network Theory seems to be a suitable theory to explain why and how associations between different parts of the assemblage come into existence and change over time. ANT departs from the idea that actors construct 'realities' by forming networks of relations, or associations. Actors act in a surrounding of other actors; actors continually and reciprocally send and receive, in other words, actors act within a network. These actor networks (or better: actant networks, explicitly including nonhuman actors) are not fixed. Not only is every action fundamentally relational, it can only occur as a consequence of the specific connection between people, entities, and resources concerned (Latour, 2005). Actornetworks thus change, so the receiver can become a sender and vice versa, and other actors can come in or leave, transforming or 'translating' from one phase to another. Callon (1986) has distinguished four steps in the translation of actor networks:

- Problematisation: when a problem or challenge comes up and is identified;
- Interest: where the problem or challenge becomes shared by others;
- Enrolment: when ideas for solutions arise and a structure evolves to cope with them;
- Mobilisation of allies: when a communal solution for all interests is chosen and put into a shared strategy, rule, or organisation.

ANT thus considers heterogeneous networks and analyses how power comes into being, and ANT is useful as it includes things and entities as autonomous forces or (f)actors of importance. In addition, ANT puts the attention on the heterogeneous actants themselves, and their actions to develop meaningful connections in networks. Nevertheless, this translation of one phase to another, is always a process, never a completed accomplishment, and it may fail (Callon, 1986). ANT assumes that by following and tracing actors, we can gain insight into the formation and evolution of such a network. Moreover, this actor networking doesn't occur in a tabula rasa or in a mere generic environment, but in a specific surrounding of time and place. For analysing cases, this means that ANT can be used to see how things began and how they work.

3.3 Methodological framework

As stated in the introduction, the domain of heritage is increasingly engaged with questions on integrating heritage and spatial planning, and questions around community-heritage engagement. Accordingly, heritage research is mostly concerned with understanding heritage values, and is mainly focused on exploring processes of social construction of heritage. These are qualitative issues relating to 'how' and 'why' values are constructed, opposite to more quantifiable concerns over 'how much'. Qualitative research is a useful tool for describing processes of social construction (Creswell, 2009) and to inductively explore social phenomena to find empirical patterns that can function to generate theory (Boeije, 2005). The process of qualitative research is largely inductive, while the inquirer generates meaning from the data collected in the field (Creswell, 2009). It is particularly useful for explorative research, as qualitative methods assure flexibility so that data collection can be adjusted to the findings which emerge (Boeije, 2005; Creswell, 2009).

In this research project, empirical data collection involved using in-depth case study via qualitative techniques and procedures (explained in detail below). Kumar (2014) argues that case study research provides the opportunity to explore an area where little is known or where you want to have a holistic understanding of the situation, process, or phenomenon. A case study furthermore offers an ideal vehicle for exploratory and explanatory research, rather than confirming and quantifying (Kumar, 2014; Yin, 2014). Moreover, case study research is an often applied and proven method within policy, governance, and planning studies (Buijs et al., 2009). Indeed, case studies are a

preferred strategy for empirical enquiry when how or why questions are being posed, and when the boundaries between phenomenon and context are not clearly evident (Yin, 2014). In order to not only analyse the data within a specific context but also across situations, a multiple case study is needed (Yin, 2014). Multiple cases allow wider exploration of research questions and theoretical evolution in this dynamic behaviour (Eisenhardt & Graebner, 2007). Case study research is characterised by a flexible and open-ended technique of data collection and analysis (Kumar, 2014) and theory development can occur through the systematic piecing together of detailed evidence to generate theories of broader interest.

Moreover, the description of a case and a set of cases strongly resembles the definition of an assemblage, namely an open whole of loosely connected parts. Indeed, an individual case is something singular, but is in itself made up of various parts -acomplex entity in its own situation and context. Hence, an assemblage is made up of different aspects. A case, for instance, can be a collection of organisations and people, artefacts, settings and the community, policies, processes, etc. (Yin, 2014). The focus of case study research is therefore on relationships and interactions, open boundaries between case and context, and processes of becoming with no single outcome. In this research, this is translated as the mutual and continual interaction between material and immaterial heritage assets, local heritage communities, and spatial development/ identity. Furthermore, this assemblage is set in time through co-evolution. This enables the researcher to understand differences and similarities between cases in its composition and throughout time (Stake, 2005). For this research project, two sets of cases were selected. The three (sets of) cases represent a different research design, including one multiple-case study, and two singular, in-depth case studies. These sets of cases are chosen in line with the research questions and accordingly serve a different purpose. The multiple-case study is set up to identify and describe how heritage is constituted. The assemblages of these heritage practices will be described and analysed. This is then followed by two singular, in-depth case studies in which both steps of the analysis are applied: describing the assemblage and identifying changes throughout time.

3.3.1 Collecting the data

The different cases were subjected to multiple methods of data collection. Qualitative researchers usually use multiple sources of data collection, such as interviews, observations, and document analysis instead of depending on one single source of data (Creswell, 2009). This is also particularly applicable for exploring assemblages, as McFarlane (2011) notes that to understand the assemblage the researcher can include a variety of sources, such as literature, historical manuscripts, maps, places, organisations and people, artefacts, settings, and the community studied in ethnographic research. It should however be noted that it is difficult to capture or map the entire elements of an assemblage in a precise manner (Dovey & Ristic, 2017). This is due to the complexity and the continually changing nature of assemblages. Yet, the use of assemblage approach gives freedom to follow processes of change by considering the impact of a wide range of elements that are involved. To structure among the wide range of elements involved the researcher can – depending on the research questions –

include elements that have a meaningful impact on the studied phenomenon (Dovey & Ristic, 2017). This perspective encourages a flexible way of approaching the topic, which is studied as an assemblage. Such a flexible way of approaching the topic can be used to explain the official politics and the practice of heritage reuse, for instance (Pendlebury, 2013), or to follow the process in which heritage values are shaped and prioritised as a result of flows of information and resources. It is also of interest for heritage research to explore how these heritage values influence the functional and formal fabric of heritage (Yadollahi, 2017).

One way to flexibly observe the assemblage processes is to trace the processes of gathering and dispersing of the elements that are involved. Following temporal power formations demands a flexible methodological framework and the active presence of the researcher as an observer of the assemblage process (Yadollahi, 2017). Indeed, in most research on urban or heritage assemblages various methods are used in a flexible way (Yadollahi, 2017). Among scholars who study urban assemblages, ethnography-inspired methods are particularly popular and recommended, compared to the methods limited to the literature review and policy analysis (Dovey & Ristic, 2017). The researcher needs to investigate dynamics of people, things, and documents with a pragmatic ethnographic sensibility. But what to observe? And what sources and research methods to include? To define the ways of data collection, we first return to the three criteria of a co-evolutionary heritage approach as discussed above.

The operationalisation tells us to first check the multiple aspects part of the heritage assemblage, followed by an investigation on the interrelatedness and interconnectivity of these aspects, and then an exploration of the interactions with the broader social and institutional context. For these different steps, different methods of data collection are required:

- For checking and describing the aspects part of the heritage assemblage: Documents, website and policy studies, supplemented by interviews with policy makers and other stakeholders;
- For checking and describing the relations and interactions between these aspects: Interviews with a diverse group of stakeholders;
- For an exploration of the influence of these interactions on the broader social and institutional context: Documents, website and policy studies, supplemented by interviews with policy makers and other stakeholders.

In order to analyse changes throughout time, longitudinal, ethnographic research methods were applied including group discussions, field visits, and regular meetings with involved stakeholders. The methods of data collection used are described below in more detail, specified for each of the cases.

3.3.1.1 Multi-case study

A first set of cases concerns fifteen practices of heritage reuse throughout Europe (see Table 2). In order to identify how heritage is constituted and to analyse heritage assemblages, we draw from a multiple-case study that has been conducted within the context of a Horizon2020 research project called OpenHeritage. The author of this

dissertation is part of this OpenHeritage project as an academic partner and took part in the data collection and analysis.

Name: Cascina di Roccafranca Location: Turin, Italy Date of reuse: 2004–2007 Original function: farmstead New function: multi-functional community center	Name: Stará Tržnica Location: Bratislava, Slovakia Date of reuse: 2013–2016 Original function: market hall New function: market hall
Name: Scugnizzo Liberato Location: Naples, Italy Date of reuse: 2015 Original function: convent New function: social meeting place	Name: Potocki Palace Location: Radzyń Podlaski, Poland Date of reuse: 2015 onwards Original function: Rococo residence New function: cultural facility to attract tourists
Name: Sargfabrik Location: Vienna, Austria Date of reuse: 1994–2000 Original function: coffin factory New function: collaborative housing complex	Name: ExRotaprint Location: Berlin, Germany Date of reuse: 2007 Original function: printing machine factory New function: place for cultural and social activities
Name: Färgfabriken Location: Stockholm, Sweden Date of reuse: 1995 Original function: industrial building New function: exhibition space and event center	Name: St. Clemens hospital Location: London, England Date of reuse: 2011–2020 Original function: workplace, hospital for poor people New function: housing and a community space
Name: Largo Rêsidencias Location: Lisbon, Portugal Date of reuse: 2011–2013 Original function: ceramic factory New function: hotel, community hub	Name: Jam Factory Location: Lviv, Ukraine Date of reuse: 2019 Original function: Jam Factory New function: art center
Name: Jewish District Location: Budapest, Hungary Date of reuse: after 2000 Original function: historical neighbourhood New function: 'Party district'	Name: Citadel Location: Alba Iulia, Romania Date of reuse: 2000 onwards Original function: fortification New function: cultural facility to attract tourists
Name: LaFábrika detodalavida Location: Maimona, Spain Date of reuse: 2014 Original function: cement factory New function: cultural space	Name: Marineterrein Location: Amsterdam, Netherlands Date of reuse: 2015 onwards Original function: Navy yard New function: future-proof city quarter
Name: Halele Carol Location: Bucharest, Romania Date of reuse: 2013–2016 Original function: factory hall New function: club, creative events	

 Table 2 Overview of the selected cases, a short description, and introduction of the next chapter.

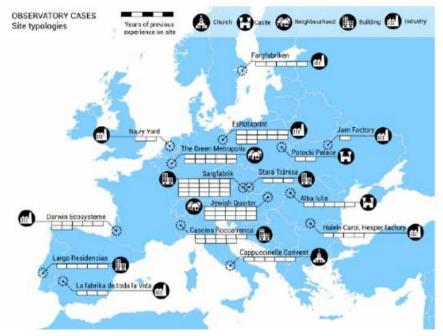


Figure 4 Overview of geographical positions of selected cases.

In the framework of OpenHeritage, these cases have been selected for several reasons: (1) to reflect a variety of regional experiences as well as of geographical positions (urban, peri-urban, and rural) across Europe (see Figure 4: Overview of geographical positions of selected cases.); (2) to represent a variety of heritage assets involved; and (3) to show a variety of reuse aims, from cultural to community-based, societal and environmental. In the framework of this research project, these cases are selected as they are all examples of ongoing or recently realised projects which attempt(ed) to connect material and immaterial heritage with local heritage communities and ongoing spatial developments. As such, these cases are likely to illuminate insights into the inter-relatedness and interdependency of the different aspects of the heritage assemblage.

These cases have been subjected to multiple qualitative techniques and procedures of data collection in order to get an in-depth picture of the case (Creswell, 2009; Yin, 2014). Document, websites, and policy studies were combined with qualitative semi-structured interviews, and on-site field observations as a method of data collection.

Selecting interviewees was done based on stakeholder function and included the protagonists of the initiative, civil servants (or other governmental stakeholders), investors, and users (e.g., local residents or community members). At least five interviews per case were conducted so that at least one person of each stakeholder group was interviewed per case. Combining different stakeholders allowed us to provide a comprehensive overview of the project. The interviews usually took place during on-site field observations, in face-to-face settings. This allowed the researchers to have an open-ended conversation whilst addressing all topics identified in advance. The interviews were structured along a topic list, which was set-up by the OpenHeritage research team (included in Appendix 1: Topics and interview guidelines for the 15 cases).

Topics discussed during the interviews were – among others – a description of the project (process, values, identity); an analysis of the role of heritage in the reuse process (regulations and policy, the uses envisioned in the transformation and the design principles); a stakeholder analysis; and an impact analysis (reception of the project, influence on broader context).

Interviews were done by researchers of the OpenHeritage consortium. The choice for a certain case-analysis was based on language proficiencies, the geographical proximity, and in some case the involvement in the cases of the respective consortium members. Seventeen OpenHeritage consortium members conducted in total 110 interviews of which some were audio-recorded or otherwise supported by hand-written notes. In combination with a document study – which also provided detailed contextual information that helped illuminate the processes and structures of the study's context – and the on-site visits, this threefold way of collecting data enabled triangulation of sources. Moreover, after the data collection process, the data went through a review process where missing elements were highlighted and clarification was asked in some matters related to the key components of the study. A more elaborate description and analysis of the cases can be found in the OpenHeritage deliverable 'D2.2 Individual Report on the Observatory Cases' (OpenHeritage, 2019b). This document also includes additional information on the method of data collection.

3.3.1.2 Two singular in-depth case studies

Two singular in-depth case studies were conducted, on which both steps of the analysis are applied: the heritage assemblage is described to see how heritage is constituted, and co-evolution is applied to identifying changes throughout time. One in-depth case is on a regional scale and consists of an assemblage of assemblages. The other is on a local scale and discusses an area with an industrial past that is characterised by a challenge to redesignate the heritage of that area. For exploring the assemblages, both cases were studied with a pragmatic ethnographic sensibility (McFarlane, 2011). In other words, a certain longitudinal sensitivity was required (Vandenbussche et al., 2020). Within a PhD research project, the time for the researcher to investigate cases is limited. However, longitudinal sensitivity in this research project was nevertheless realised by turning towards already predefined cases from the OpenHeritage project. Indeed, by gathering information form the OpenHeritage cases, and by cooperating with the partners researching these cases, this longitudinal sensitivity was achieved, as these partners were often involved in the process from the start and know about the changes over time. Moreover, they form a direct link to information such as literature, historical manuscripts, maps, organisations, and people that are needed in ethnographic research on assemblages.

3.3.1.2.1 First case: 'The Grünmetropole'

The first singular, in-depth case study concerns an example of post-industrial transformation; namely a project called 'The Grünmetropole' that aimed at renewal of a post-industrial landscape, by connecting various local (heritage reuse) projects through the establishment and promotion of two touristic routes across the former mining area in the German-Dutch-Belgian border region. The applied heritage management approaches in combination with the (lack of) community involvement makes this case particularly relevant. To study this case more in depth we used and combined on-site field observations, fifteen in-depth interviews, and a document study. After some explorative fieldwork and some first observations, data collection started in February 2019. In order to get a contextualised understanding, qualitative semi-structured interviews are used as a method of data generation. The interviews were semi-structured and thematic (see Appendix 2: Semi-structured topics and questions for interviews on Grünmetropole for an overview of questions and topics used), allowing consideration of contextual features and respondents' subjective opinions during discussion (Yin, 2014). The interviews were conducted in a face-to-face setting and some of the interviews were audio-recorded and supported by hand-written notes. The interviews were held on separate dates. Selecting interviewees was done based on their function (i.e., type of stakeholder), and their link with the Grünmetropole (e.g., were they in the setup of the project). Since the project was implemented more than ten years ago, it appeared rather difficult to find the people involved in the setup of the project, since people on longer worked at the organisation they worked at then. In addition, the perspective of the users (i.e., tourists who use the routes designed within the context of the Grünmetropole project) is not included.

We conducted ten interviews with policy makers in the domain of heritage and spatial planning and five with policy officers working at the tourist departments, all in different municipalities in the case area in the three respective countries (see Table 3). The duration of the interviews was 30–100 minutes, and most of them were conducted between February 2019 and May 2019. Topics discussed during the interview were – among others – a description of the project, the cooperation in the setup of this project, and community engagement. Moreover, we asked them to evaluate whether the post-industrial context provided specific challenges for urban planning and heritage management.

COUNTRY	ORGANISATION AND ROLE				
Netherlands	Employee at the tourist office VVV Zuid-Limburg				
	Spatial planning policy officer at the municipality of Landgraaf				
	Heritage policy officer at the municipality of Brunssum				
	Heritage and spatial planning policy officer at the municipality of Heerlen				
	Tourism policy officer at the municipality Valkenburg aan de Geul				
Belgium	Employee at a regional heritage organisation (region Beringen)				
	Employee at the tourist office Tourism Limburg				
	Heritage policy officer at the municipality of Beringen				
	Spatial planning policy officer at the municipality of Beringen				
	Heritage guide at the city of Eisden				
	Heritage policy officer at a regional heritage management organisation in Genk				
	Heritage policy officer at the Province of Limburg				
	Spatial planning policy officer at the Province of Limburg				
	Employee at the Centre for intangible cultural heritage				
Germany	Employee of the tourist office and museum 'Energeticon' in Alsdorf				

Table 3	Overview of the	interviewees of	the in-depth	case study	Grünmetropole.
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During these interviews, other potential information sources, such as information leaflets and maps, were shown. These information sources are – akin to the information gathered from (policy) documents, articles, websites, newspapers and so on – seen as the second source of data collection. This kind of data, mostly provided by secondary sources, is used to extract descriptive and narrative information. These information sources included a book explaining the conceptual idea of the Grünmetropole (Heinrichs et al., 2008), and a book elaborating on the initial masterplan for the Grünmetropole project (Bava et al., 2005), for example. Various newspaper articles from different periods are used to see how reporters and interviewees reflected on the Grünmetropole project in different periods.

The third major source of data collection is on-site field observations. On-site field observations were conducted including oral histories, group discussions, and six informal, conversational interviews (duration about 30 minutes) with local heritage tour guides and citizens. A three-day field trip to the region, together with a group of four master students from the master Urbanism and Spatial Planning (Ghent University), was also part of this third source of data collection. This threefold way of collecting data enabled triangulation of sources (Yin, 2014) as information provided during the on-site observations could be checked by reviewing documents, websites, or the interviews. For analysing both types of interviews, we used a grounded theoretical approach, where the codes were structured in line with the review of current dominant approaches to heritage.

3.3.1.2.2 Second case: Praga district, Warsaw

The second in-depth, singular case study concerns the Praga district located in Warsaw, Poland. The Praga district is one of the smallest districts of Warsaw in size but the most problematic in terms of life quality. Being part of the oldest and most densely populated core of the city, it has been labelled the poorest, less developed, and most dangerous but, at the same time, the most genuine (Dudek-Mańkowska & Iwańczak, 2018). One can still find here traditional quarters of the tenement houses, smaller and larger factories, and other elements of the industrial past. The last years have brought new investments to the district; the next ones are to come. Having a heavily stigmatised image, today it is an area with social deprivation and, at the same time, the scene of an interesting cultural revival. which feeds on its specific status and identity. However, the heritage identity has been often exploited as a branding tool rather than seen as an important value for the local community. Therefore, questions need to be raised about how the heritage in the district can be reused in conjunction with local heritage communities and ongoing issues of spatial redevelopment.

To analyse this case, various methods of data collection were used, including document, websites and policy studies, and qualitative semi-structured interviews. Research on these two cases took place during the period that the COVID-19 pandemic hit, making data collection much more challenging.

The research in Praga district, for instance, was carried out in spring 2021, and due to travel restrictions, I was not able to visit the district myself.¹ As a consequence, the process of collecting data, and most notably of planning the interviews, was very dependent on interviewees' responses by e-mail. Selecting the interviewees was initially done based on a short screening of reports, newspapers, and policy documents, but soon turned out to be dependent on suggestions by other interviewees (so-called snowball sampling). Yet, even though interviewees were very helpful in suggesting other interviewees, there still were some issues in setting up the interviewees. Some interviewees never responded or were not able to have an interview (including at least two key figures who I unfortunately did not speak to in the end). In some other cases there appeared to be language and translation issues. For this reason, three interviews were conducted in Polish, with the help of a translator (live translation from Dutch to Polish and vice versa). One interview was conducted in German. All the other interviews were conducted in English (although in one case the level of English appeared to be very poor, which might have led to some misinterpretation).

In total, fifteen interviews were conducted in Praga district, representing a diverse group of stakeholders (see Table 4). The interviews were semi-structured, and conducted in an open-ended conversation, allowing consideration of contextual features and respondents' subjective opinions during discussion (Yin, 2014). Some key questions and themes were used as a starting points and checklist (see Appendix 3: Semi-structured topics and questions for interviews on Praga district). Interviews were held on different dates and took place through online communication platforms (Microsoft Teams and Zoom). The interviews took about 60 minutes on average (some took 45 minutes, whereas some others up to 90 minutes or even longer). All of the interviews were audio-recorded, or otherwise supported by hand-written notes, and transcribed afterwards. Transcripts were sent to the interviewees for a check on accuracy.

Although the researcher had visited the district before.

ORGANISATION AND ROLE	DATE	REMARKS
Architect at OpenHeritage PragaLab	23/02/2021	
Architect at OpenHeritage PragaLab	01/03/2021	
Architect and project developer	26/03/2021	
Revitalisation officer at the city of Warsaw	19/05/2021	In Polish
Head of the department for revitalisation, city of Warsaw and member of the city council	30/03/2021	
Professor at Kozminski University in the domain of heritage and entrepreneurship	01/06/2021	
Member of PragaLab advisory board, member of several NGOs in the district, conservator, activist	19/04/2021	
Member of PragaLab advisory board, director of Museum of Praga	27/04/2021	Poor level of English
Member of PragaLab advisory board, and working for the department of economic development, city of Warsaw	19/05/2021	In Polish
Manager of an NGO on citizen's rights, activist	06/05/2021	
Resident and PhD student on Praga's heritage	28/05/2021	
Director of the NGO Association 'Guardians of Cultural Heritage of Warsaw'	27/05/2021	In German
Architect at OpenHeritage PragaLab	03/11/2021	
Member of local NGO NaPradza	30/06/2021	In Polish
Employee at Museum of Praga	30/06/2021	

Table 4 Overview of the interviewees of the in-depth case study Praga district.

Next to the online interviewees, one person (a member of a local heritage NGO) answered the interview questions via e-mail, albeit in a concise way. As part of a research trip to Praga district², master students from the master Urbanism and Spatial Planning (Ghent University) did a few exploratory interviews in Praga district (e.g., Casteels et al., 2020). Another major source of information was a workshop organised by PragaLab. Together with several stakeholders from Praga district and beyond (including some other partners of the OpenHeritage project) we discussed heritage reuse models in Praga, in particular paying attention to a specific heritage reuse project in Praga, called 'the Bakery'. This workshop – which could be regarded as a focus group – was recorded and transcribed afterwards.

The information collected from the interviews, e-mail answers, and workshop was verified on the basis of information collected from documents, websites, and policy studies. Documents on Praga district and PragaLab appeared to be abundant and were easily obtainable with the help of OpenHeritage partners in Warsaw. These included policy documents, revitalisation plans, books on Praga district, and PragaLab plans (of which some needed to be translated from Polish to English), for instance.

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2 Which unfortunately turned out to be an online research trip due to the COVID-19 pandemic.

3.3.2 Data analysis

As a first step in analysing the manifestation of co-evolutionary practices and approaches in the cases, we analysed how heritage is constituted and how the assemblage is made up. To do so, this research relies on the information gathered in documents, websites and policy studied; interviews with policy makers and other stakeholders; and other sources of information. The first step of the analysis consists of checking the multiple aspects part of the heritage assemblage, followed by an investigation on the interrelatedness and interconnectivity of these aspects, and an exploration of the interactions with the broader social and institutional context. To analyse these criteria of co-evolution in heritage practices, and to guide the analysis of collected information, template analysis was applied (Crabtree & Miller, 1999). In this approach, codes are identified a priori, extracted from the literature, and referred to particular themes, which characterise an area of interest. This provides us with a reasonably clear direction to follow when structuring the examination of the collected evidence and its presentation (Silverman, 2010). These themes are derived from the definitions of the four aspects part of the heritage assemblage (as described above). In order to assess these themes we follow the selection criteria identified by Wang and Zeng (2010) for the analysis of reuse of historic buildings, Yung et al. (2017) for evaluating social and cultural impact of heritage and by Vecco (2010) for immaterial heritage (see Table 7 and Table 8 in Appendix 4: Coding frameworks). In the analysis of data collected, the researcher observed and compared whether the interviewees referred to the theme's criteria. As a second step in analysing co-evolution, it was checked whether interviewees mention interrelatedness and mutual impact of these different aspects on one another – whether positive or negative. Finally, co-evolution was analysed by analysing the outcome of these interactions and the extent to which there were interactions, or changes in the broader social and institutional context. Criteria for this aspect relate to impact and effect, and include, for instance, the environmental effect, potential improvement of the environmental quality of the surrounding, changes in policy, inspiration for other projects, and/or changes in societal thinking about heritage.

Having put together the heritage assemblages, the second step involves identifying changes throughout time, and distinguishing the different steps in the translation of actor networks. This was done according to the four steps identified by Callon (1986) as discussed above. These steps were then translated into an issue list by which the interviews and other data collected were structured.

Problematisation refers to the phase when a problem or challenge comes up and is identified. Problematisation examines the conditions that were crucial in the becoming of an initiative, what conditions needed to be changed, or what conditions enabled the actors to start something new. It identifies the reasons why certain actors leave behind their usual ways of working and start something new. This phase was identified by asking questions such as:

- What is the issue that requires a solution?
- Who are the relevant actors?
- Can spokespeople be identified who can represent specific groups?
- What are the issues that the initiators want to change or achieve?

Interest refers to the phase where the problem or challenge becomes shared by others. This phase is characterised by an external orientation, as initiators try to be open to new and different options, other stakeholders and actors, new content. It is a phase in which diversity is created, connections are made, and plans, ideas, content, and actors come into play. This phase was identified by asking questions such as:

- Can relevant actors be interested in the solution to the issue?
- What 'terms of commitment' are there, and/or how can they be convinced that their own interests will be served?
- What options were considered over time?
- Did the focus and the range of activities/plans broaden over time?

Enrolment refers to the phase when ideas for solutions arise and a structure evolves to cope with them. This phase is characterised by dealings with internal settings: how does an initiative gain robustness by binding together the components of the assemblage, how are relations sustained over time, and how are actors bound together. This phase was identified by asking questions such as:

- How can common interests be converted into potential associations?
- Do the different actors accept their role?
- Can they be geared to the available resources?
- What choices were made, and what options were followed or not?
- Did actors leave the initiative, and if so, why?

Mobilisation of allies refers to the phase when a communal solution for all interests is chosen and put into a shared strategy, rule, or organisation. It refers to the elements that turn an initiative into something familiar, something that fits existing schemes or policies, as part of something bigger. This phase was identified by asking questions such as:

- Is there wide support for the expected outcomes?
- Do the spokespeople actually represent their respective constituencies effectively?
- How can the actor network association be embedded in a wider setting?
- What references were made to other initiatives?
- What legal frameworks did the initiative use?

These four phases of translation are used to identify changes throughout time in the two singular in-depth cases. These two cases are classified based on the above criteria.



A EUROPEAN MULTIPLE-CASE STUDY PERSPECTIVE

In this chapter, fifteen European cases of heritage reuse projects are analysed. We do so by describing and analysing the heritage assemblages of these cases (step 1 of the analysis, as described above). In trying to reconstruct the paths of each case considered, the analysis further takes into account both the data collected in the OpenHeritage Observatory Case Report (OpenHeritage, 2019b) and in the OpenHeritage document about current heritage reuse policies and regulations in Europe (OpenHeritage, 2019a). By doing so, this chapter aims to answer the sub-research questions: How does a relational heritage approach manifest itself in present-day European heritage practices? This chapter will be organised as follows: in the first section, an attempt will be made to identify the unique core features of individual projects by addressing the cases in more detail; this is followed by an analysis of the manifestation of co-evolutionary practices in these cases of heritage reuse. Finally, a reflection is provided on the heritage approaches and strategies applied in these cases to enhance co-evolution. The chapter is concluded by answering the sub-research question.

Heritage reuse

In this chapter, the cases are referred to as projects or practices of heritage reuse. It is for this reason that a short elaboration on the definition of heritage reuse is included here for reasons of clarity. Reuse of heritage buildings is an example of how relicts of the past are appropriated and adapted to meet new needs (Plevoets & Van Cleempoel, 2011). At the very least, heritage reuse involves converting a building to undertake a change of use required by new or existing owners (Wilkinson et al., 2009). A commonly used definition is provided by Douglas (2006, p. 22), who defines adaptive reuse as "any building work and intervention aimed at changing its capacity, function or performance to adjust, reuse or upgrade a building to suit new conditions or requirements". This is underlined by different scholars who seem to agree that heritage reuse implies (partly) changing the function and programme of a building, as well as physically adapting the building to new needs and requirements (Plevoets & Sowińska-Heim, 2018; Plevoets & Van Cleempoel, 2011). Converting a building can be anything varying from refurbishment to renovation of (parts of) buildings and structures to reuse to any other interventions. Reusing heritage buildings is no longer only a practice of keeping the historic, built values of a heritage object (Bullen & Love, 2011), but also about transforming them to meet new needs and requirements (Misirlisoy & Günçe, 2016; Plevoets & Sowińska-Heim, 2018).

Indeed, reuse is increasingly linked to other aspects such as economic, sustainability, or cultural issues (Shen & Langston, 2010) as adaptive reuse can provide social benefits by revitalising familiar landmarks and giving them a new life, for instance (Conejos et al., 2011). In addition, the reuse of heritage sites, along with the creation and the promotion of new narrative paths and co-defined heritage values, becomes an opportunity for the identity of buildings and sense of belonging (Tweed & Sutherland, 2007). Heritage reuse is increasingly being seen as part of a broader strategy of urban regeneration and sustainability (Bullen & Love, 2011). With regard to the latter, increasing the life of a building through reuse helps to lower material, transport and energy consumption, and pollution, and this contributes to sustainability (Bullen & Love, 2009; Conejos et al., 2013; Velthuis & Spennemann, 2007; Yung & Chan, 2012). In fact, reuse of heritage is one of the most effective and environmentally friendly tools of modern

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urban development in a circular economy and in terms of sustainability (Bullen & Love, 2009; Yung & Chan, 2012; Yung et al., 2014). Bullen and Love (2011) further argue that reuse projects can provide a link to the past and contribute to the development of new identities of communities, thereby contributing to social sustainability. In sum, heritage reuse can best be defined as the act of conserving heritage buildings by reusing those spaces for a variety of uses, driven by calls for urban regeneration (Bullen & Love, 2010).

4.1 **Fifteen European projects of heritage reuse**

In this section, the individual cases will be addressed in more detail by focusing on the various aspects part of the heritage assemblage, and the interactions between these different aspects.

Cascina di Roccafranca (Turin, Italy)

Cascina di Roccafranca is a multi-functional community center, located in a former farmstead in the Mirafiori Nord district, a suburb southwest of Turin, Italy. This district has about 25,000 inhabitants and the area has been struggling with severe social and economic problems (such as unemployment, low level of education, and decay of buildings and public spaces). The city of Turin purchased the building of the Cascina di Roccafranca with the intention of transforming it into a public space where they provide services for citizens. This transformation process shows different interactions between various aspects of the assemblage. The project has, for instance, restored the value and attractiveness of the neighbourhood, regenerating its surroundings and providing a public space for the community, while also implementing its well-being. These outcomes are the result of the combination and interaction of a number of factors. Among the main features shown by the Cascina di Roccafranca project is the ability that the project actors have shown in developing methods of co-governance, present in the launch of different types of cultural activities, managed not only by the Foundation, but also by other local 'external' organisations. The Cascina di Roccafranca Foundation is established in the form of a 'participatory foundation', a form of foundation designed to balance the action of public and private entities, in order to create forms of co-responsibility and co-management. This shared structure has been an important element in the development of the project and more specifically to increase the attractiveness of the area as well as the level of place perception by its inhabitants. In fact, the building became the space where this collaboration was concretely implemented. Since then, Cascina di Roccafranca has hosted hundreds of activities a year, targeting a variety of groups and interests. Hence, there is a strong interaction between the local community and the material heritage object. Moreover, immaterial heritage values are addressed as the cooperation between various actors and their joint action has not only made it possible to redevelop the area and to recover abandoned buildings, but also to recover cultural values that the district expresses (i.e., immaterial heritage). In particular, with reference to the latter, an Ecomuseum (Centro di Interpretazione e Documentazione Storica) has been set up within the multifunctional centre that is now the Cascina as a testimony to the activities that have spread and been carried out over time in the district Mirafiori.

Scugnizzo Liberato, (Naples, Italy)

The project Scugnizzo Liberato aimed at creating a new cultural and creative centre through the recovery of a 17th century building (the so-called complex of San Francesco delle Cappuccinelle, a former monastery), located in the district of Avvocata, in the historical Centre of Naples, Italy. The complex is a public property, transferred to the City of Naples in 2014. The following year its spaces were occupied by the social cooperative 'Scacco Matto' and the project Scugnizzo Liberato was launched, which allowed the former convent to reopen to the general public. The aim of this initiative was to give new life to a historic building, located in a strategic position, helping to restore the value of the building and the neighbourhood. The project contributed to increase liveability in the area, and the attractiveness of the place and citizens' well-being benefited from its activities. This was possible mostly due to the location of the former Cappuccinelle convent, a central location in a densely populated area in which there was a lack of significant gathering spaces and squares. What was of importance was the commitment of the project's participants. The local community has a strong sense of belonging to the building and feels a strong commitment accordingly. This strong feeling of belonging is linked to the historical importance of the former convent and its subsequent use as juvenile detention, from which the project takes its name. The importance of the local community in this project is also demonstrated by the use of the legal instrument of 'civic use' as a means to manage the asset. Through 'civic use', the community is empowered to manage common property, which is then placed at the service of citizens' needs.

Sargfabrik (Vienna, Austria)

The Sargfabrik project was launched to reclaim an area, not far from the centre of Vienna, which has been desolate since the early 1980s. The reuse project is a former prestigious coffin factory, closed for many years, but whose architectural structure has been saved from demolishment. Since the end of the last century, the Association for Integrative Living has started to take care of the structure recovery and, through a bottom-up process, started a social housing project to be realised inside the complex that previously housed the factory. The Sargfabrik project demonstrates a clear social and cultural intent to redevelop the area, which has been successful over the years. The project has contributed to the relaunch of the neighbourhood and its repopulation, as well as reactivating the real estate market in that area. In fact, its founding members not only wanted to change the lives of those involved in it, but also aimed to influence the sociocultural life of the neighbourhood. Despite the success achieved by the project, it still raises some questions related to the renovation of building and the relationship with the neighbourhood. A gentrification process seems to have been established in the neighbourhood, and prices of houses have increased, generated precisely by the relaunch pursued by the project. The project has undoubtedly contributed to raising the real estate value of the neighbourhood, bringing the concept of experimental living into a formerly considered boring or desolated area of the city. Now the Sargfabrik project is one of the reasons to advertise the area on the market. One of the reasons for this success is once more the relation with the community. Indeed, the Association for Integrative Living, as a representative of the community, played a major role in the reuse process. With regard to immaterial heritage, there doesn't seem to be a very strong link. Although the Sargfabrik project has had an impact on the reuse of the material heritage, it does not seem to have promoted or conveyed the immaterial values related

to cultural heritage that the asset has. The project's aim seems more to look to the future than to the past, although the association has taken care to maintain and hand down certain heritage values of the building (such as the original chimney pot), and to organise exhibitions to tell the story of the coffin factory. The lack of this relation can be explained by looking at the project's aim which was, above all, to relaunch the value of the area, not necessarily through the enhancement of its cultural heritage, but rather through the recovery of the market estate value of the buildings.

Färgfabriken (Stockholm, Sweden)

The Färgfabriken project started with the renovation of an industrial building built at the end of the nineteenth century, located in Stockholm in the industrial and suburban area of Lövholmen. This building has long been used as a paint factory, and production remained active until the mid-1990s. The owner of the building – the private industrial company Lindengruppen – then purchased the building and planned to create a cultural venue. At present day, Färgfabriken is a platform and exhibition venue for contemporary and cultural expressions, with emphasis on art, architecture, and urban planning. The Färgfabriken project has demonstrated a positive effect by increasing the real estate value of the area, restoring attractiveness to the neighbourhood, and supporting its transformation. Indeed, there is a strong relation between material heritage and the broader spatial developments. Certainly, it is still an area that is undergoing profound changes, but the mere presence of the project seems to impacted the regeneration of the area and increased the neighbourhood liveability. Yet the strength of this project does not seem to come from a strong level of community integration. In fact, although many people are involved in the project, most of them are related to the foundation. Many collaborations are taking place and the attractiveness of the place has meant that many people in the district are approaching the project, but are not yet actively participating in it. These outcomes can be explained by the strongly private-centric imprint of the project, which was born on the basis of a project shared by a rather homogeneous core of people who still drive the project. However, it should be noted that Färgfabriken has been a catalyst in attracting new initiatives to the area and building relationships within it. In fact, the project has continually reached out to other art spaces and studios in Lövholmen, creating a variety of collaborations with different local organisations. In addition, Färgfabriken has also developed its own method, that allows it to replicate the Färgfabriken experience in other contexts through interdisciplinary practices and participatory strategies.

Largo Residenciâs (Lisbon, Portugal)

Largo Residenciâs project was born from the SOU Cultural Association to open an artistic space that would have a positive impact on the community. The objective of Largo Residenciâs is to contribute to the regeneration of marginalised areas in Lisbon, so the search for a place as a basis for project activities turned towards finding a vacant building in need of renovation. Hence, here we see a clear link between material heritage, community, and spatial development and identity. Indeed, the heritage reuse project has increased the real estate value of the building, making the area more attractive but it has also resulted in a touristification and gentrification processes. The project also certainly contributed to creating a community identity. Indeed, the aim which the project foresees is to include the local population (both individuals and associations

or informal groups) within the Largo Residenciâs initiative, with a view to remaking the neighbourhood. As such, the project aims to interact with the community, to involve its representatives and their organisations in the process. Yet, the project itself relies mainly on the members of the cooperative and its founders to run the activities, without much involvement of the community with regard to the reuse project. Largo Residenciâs has established numerous collaborations over the years of activity, but none of them have actually been formalised. In particular, those with public authorities have taken place within the organisation of community meetings, festivals, public hearings, and other events of an artistic and cultural nature. With regard to the material and immaterial heritage, it appears that the renovation of the building, while preserving its original history – i.e., maintaining the characterisation of the facade of the ancient ceramic factory, as well as the organisation of workshops and creative courses among the project activities – has allowed to keep alive the immaterial heritage.

Jewish District (Budapest, Hungary)

The Jewish district is a historical district of the city of Budapest, recently renamed 'Party District' or 'Ruin Bar District' because of the phenomenon that emerged around the 2000s, and for which the courtyards of ancient and historic empty buildings have been transformed into combined hospitality and cultural venues. The phenomenon of ruin bars brought back to life the run-down district in search of revitalisation. Now decades after the fall of the socialist regime, these initiatives have made this area very popular among locals and tourists, to the point of becoming a mass phenomenon from the 2010s. The ruin bars have led to a gentrification process that represents a problem for the residents' well-being and for the liveability of the neighbourhood, which has been reduced ever since. One of the reasons for this is the presence of a cultural network to create the ruin bars brand, which then contributes to tourism in the area. This in turn results in the promotion of the cultural values of the district and the provision of a multitude of services, in addition to the bars, bike shops, weekend markets, and various other events.

LaFábrika detodalavida (Los Santos de Maimona, Spain)

The LaFábrika detodalavida project is aimed at the recovery of the Badajos area in the western and rural region of Extremadura, Spain. The project is located inside a building in Los Santos de Maimona, which was built in the mid-1950s as a cement factory. The factory closed in the early 1970s, the building fell into disuse, and the local community, which until then had experienced the opportunities offered by the industrial district, found itself without prospects and many people left the area. The aim of the project is to transform the site and the area into a cultural and participatory place, through models of inclusive and common management. The idea is to stimulate cooperative production, free culture, and DIY construction to develop creative dynamics and methodologies, focusing on the heritage shared by the community. Today the site hosts many cultural projects and programs and is also home to cultural organisations. As such the reuse of material heritage is interrelated to spatial development as the relocation of the spaces has led to an increased real estate value, making the area's value grow accordingly. In terms of relation to the local community it must be noted that many people were involved to participate in the project, on local and regional levels. Specifically, their involvement first ensured daily-based social and cultural activities and programs based

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on the community's needs. Secondly, it ensured the creation of an inclusive participatory public space. Indeed, the fact that LaFábrika detodalavida promotes activities for the redevelopment of the former industrial area contributes to the involvement of many of the local inhabitants and beyond as it attracts people from other nearby towns and people who had left to return to these places. Regarding the links to material and immaterial heritage, it appears that regeneration and reuse of the site has contributed to a promotion of the heritage values present in the area, especially by bringing to light its industrial history. Hence the projects' objectives of reviving, exploring, converting, and socialising a forgotten heritage into an open space have contributed to the realisation of some cultural activities in favour of the community.

Halele Carol (Bucharest, Romania)

The project's aim is to recover an industrial building, still partially active, in order to open it to the public and make its heritage and history known to the community, thus making the place accessible and a venue for events. In order to revitalise the area, the Halele Carol project combines the still-active production of the factory with cultural initiatives that can help to spread the potential of the industrial heritage of the site and the neighbourhood where it is located. Hence this already indicates links between material heritage, community, and spatial development. So far, the project has certainly contributed to bring out the potential of the area. The project increased the attractiveness of the neighbourhood. In turn, the municipality has invested in the area, trying to increase the effects of this project. Regarding the interrelations with the community, it appears that the project has not yet been able to secure the support of the local public administration, and has not yet established strong links with the communities of the neighbourhood, although it has managed to attract the attention of a wide variety of national artists and cultural workers, as well as NGOs for its activities. The reuse of the building and its regeneration have contributed to the transformation of the area, to the benefit of both the neighbourhood and to the city. Moreover, the project has largely contributed in bringing forward the importance of industrial heritage and how it can be transformed for the benefit of the city. Indeed, the Halele Carol project has opened a discussion about the importance of heritage in the area, and how it can be used to increase the city's potential. This attracted the attention of other stakeholders and opened the way for the district and area development.

Stará Tržnica (Bratislava, Slovakia)

The Stará Tržnica project ('Old Market Hall') was launched and implemented by the Stará Tržnica Alliance. Their proposal was to rethink the space of the city market hall and its building, located in Bratislava city centre. The aim of the project is to enhance the market space and to combine food market activities with those related to cultural events. The aim is that all these activities will be managed in a sustainable way, so that other spaces will gradually be renewed and new event venues and meeting spaces will be created in the heart of the city. As such, the renovation works and cultural activities have certainly contributed to creating a sense of community as the project gave an opportunity for local communities. The Alliance has involved a significant number of local stakeholders in the management of activities and entrepreneurial ventures within the market space so far, and it is aimed to involve even more people. This is supported by

the reuse of material heritage. So far the process of reusing the building has contributed not only to preserving and enhancing heritage values, but also to creating a multitude of services to offer to the community. These outcomes in turn were possible due to the commitment of the people and the entrepreneurial spirit shown by those who decided to join the project. This group varies from local citizens participating in the market and other activities (e.g., Christmas markets), to actors involved in the project, including the organisers and members of the Stará Tržnica Alliance and the Municipality of Bratislava, to local young entrepreneurs, associations, and citizens.

Potocki Palace (Radzyn Podlaski, Poland)

The project was launched by the municipality of Radzyn Podlaski in order to revitalise the Potocki Palace, a residence dating back to the mid 1400s. The municipality decided to turn the building into a cultural tourism facility, given its proximity to Warsaw. It is a top-down project, in which the promoter is a public authority. Until now, this has not resulted in much interaction with the local community. In fact, the applied public management schemes have not included a view to involving more stakeholders and citizens within the project. In essence, the sole and final decision-maker for the project initiatives is the municipality of Radzyn Podlaski and, in particular, its mayor. He is the one who makes the strategic decisions, communicates them to the public, and prepares the project proposals. Not involving local civic organisations in the management of the project is a choice that could definitely impact on the project's outcome.

ExRotaprint (Berlin, Germany)

Today ExRotaprint is a place where affordable rents for small businesses, artists. and social projects are offered. The aim of the project was primarily to take the former factory buildings away from privatisation and destruction. It subsequently started a nonprofit real estate development project and set a precedent in Berlin, which inspired many experiments in cooperative ownership and campaigns to change the privatisation policy of the city. The renovation of the site contributed to increasing the real estate value and attractiveness of the place and stimulated a gentrification phenomenon in the area, since the buildings are located in a rather strategic area of the city of Berlin, which has been the object of significant real estate and financial speculation in recent times. The number of people and actors involved is not particularly high, except for the tenants, the members of the project organisation, and those who make up the supporting foundations. It does not seem that there have been direct or formal forms of collaboration with subjects external to the municipality or with other public or private subjects. Immaterial heritage is mainly addressed as an additional layer to the material heritage, as the project had an impact on preventing the cultural heritage and stories expressed by the former factory complex from being forgotten.

London Community Land Trust (London, United Kingdom)

This project represents the first example of a Community Land Trust (CLT) in the urban area of London. The objective of the project is to offer affordable housing and long-term rentals to residents who could no longer live in the area due to displacement and trends in lack of affordable housing. In addition, CLT has promoted a campaign to have one of the buildings in the complex, which is classified as a listed building (or rather, as "Asset of community value"), transformed into a common space, where a café or a place

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where people living in the area can meet. These objectives already indicate a link with the aspect community. Indeed, the participation of the community, represented by CLT, was complemented by a certain entrepreneurial spirit. To this effect, however, the site was not intended to become a gated community, but rather to include commercial activities and residents' associations to be part of the neighbourhood community life. As such, the project gives voice to local needs to respond to the urgent need to provide affordable housing in London, by renovating and providing accessibility to a local community asset, the St. Clemens site. Moreover, the project had a relation with spatial development, as the project contributed to the attractiveness of the area and the well-being of its inhabitants by transforming the buildings from a community asset to a community utility. There is less interrelatedness with immaterial heritage values, although it should be noted that the regeneration process of the site and area has led to a revitalisation and promotion of its heritage values (mainly material oriented).

Jam Factory (Lviv, Ukraine)

The Jam Factory project is aimed at the creation of an Art Centre inside the spaces of the neo-gothic building of a former jam factory in Lviv, located in the historic industrial district of Pidzamche, Ukraine. The project implementation process started in 2019 when the renovation of the building, the adaptation of two buildings classified as listed buildings, and the construction of additional premises started. This place was already quite well known by the local community, due to its previous temporary uses by artists and cultural initiatives, which have remained alive in the collective memory of the community and have greatly increased the level of perception of the neighbourhood by its inhabitants. The interest aroused by the strategic location of the site has contributed and will probably continue to contribute in the future to foster community integration. The project has also contributed to the development of the material and immaterial heritage present in the area. Indeed, the research on the history of the building in order to start its regeneration has been considered and further promoted through the provision of a multitude of services and the construction of public meeting spaces (e.g., café, restaurant, etc.) in the complex. By doing so, the project became a reference for many similar initiatives. Hence, there is a strong interrelatedness between the aspects material and immaterial heritage in relation to community in this case.

Marineterrein (Amsterdam, Netherlands)

The Marineterrein project is an initiative of the Amsterdam city council to redevelop a space owned by the Ministry of Defence, to open it to new uses through the provision of space or buildings for the public, even for residential use. Although the project is still in development, there seems to be particular interest for the local community. One of the characteristics of the project is that the public authorities not only use and develop innovative forms of collaboration, through legal instruments and innovative agreements (e.g., guided organic transformation) provided by the regulatory framework, but also actively involve local organisations and stakeholders, making them participate in decisions. In fact, a significant number of people have participated in the project activities, although this area is still little known even among the inhabitants of Amsterdam because of its history of being a locked area. The number of actors involved in the project is also large: the local community, local public authorities and national government, various innovation institutes and research centres, museums,

and start-ups. Regarding its material and immaterial heritage, it should be noted that there is special attention for the story of this place (i.e., immaterial heritage), and these stories are regarded as an important aspect, even as important as the material heritage values.

Citadel (Alba Iulia, Romania)

The Citadel project has been conceived to revitalise and relaunch the historical-archaeological area of Citadel, surrounded by a star-shaped fortress built in the 18th century. The aim of the Municipality of Alba Iulia is to relaunch the area for tourism purposes and to revitalise it and also to allow citizens to rediscover their cultural heritage. Many of the works are still in progress, but in addition to the initiatives of the Municipality, other property owners in Citadel are contributing to the renovation of their buildings. Right now it is mainly a municipal organised project, with only marginal input from local organisations, or local community members. Hence there is almost no interrelation between various driving forces such as spatial developments, material and immaterial heritage, and or community.

4.2 Manifestation of co-evolution

4.2.1 Case observations

In the above-described projects of heritage reuse, heritage is often seen as a resource. Reuse of heritage objects is happening because the heritage assets are expected to generate some sort of positive social, economic, and/or cultural impact. What varies is what aspects of the heritage are mobilised and preserved. When the aim of the project is to care for and showcase a particular heritage asset, it will likely focus on different heritage aspects then when the aim is to create a community hub, or a housing project. Moreover, heritage can be just one of the angles to spark an interest in a project and to mobilise the local heritage community (heritage as a local resource of identity and belonging).

We can see across the projects that heritage has the capacity to integrate (but then also by default to divide) a wide coalition of (institutional) stakeholders, education, skills, regeneration, culture, arts, music, academia, businesses, etc. Heritage is important in narratives of local and regional identity, and a way to link specific sites and assets to wider stories and histories (or highlight their distance and uniqueness – e.g. a site of resistance – from them), and subsequently it is also a driver of spatial developments and identity. Heritage can be a common good for a neighbourhood or region undergoing structural changes (e.g. post-industrial region), to create a new identity built on some form of a shared past. The common assumption seems to be that shared heritage means shared values, and heritage provides an opportunity to make a case about specific values and how they 'materialise' in the heritage asset. There are some similar case observations to discuss in more detail:

Heritage as a source of contestation and differentiation

By putting a greater emphasis on a variety of heritage values and on the social and cultural-political aspects of heritage, differences are highlighted, and heritage might become a source of contestation or differentiation (Harrison, 2013b). Even within one heritage reuse project, there are multiple and potentially competing or conflicting values and ideas of which history is important or even about what heritage is in the first place. Not all these ideas can be equally represented, and unless this process of heritage making is done very carefully, it is usually those whose values and ideas exist outside the dominant heritage discourse that are excluded. The heritage values represented in heritage reuse projects are often more or less fixed, single, and agreed-upon solutions, in which only some values are incorporated. Conflicts may arise within a heritage reuse project, but also in relation to the interaction between different communities. Working with a fixed and limited understanding of heritage in some cases leads to conflicts on heritage ownership and values between different groups. Investing in co-creating a set of shared values can help to avoid or overcome conflicts and also help to create a connection to the existing/wider heritage community.

Heritage discourses and questionable incentives

Conflicts may also arise as a result of fixed definitions of heritage in the process of identification of heritage as such. Declaring heritage status, for instance, is a rather top-down, organised, authoritarian act, often accompanied by a strong tendency towards safeguarding a physical heritage asset. In this respect, heritage listings rarely incorporate the communities' values attributed to and understandings of heritage. The project in Alba Iulia is set-up around a notion that heritage is a thing to conserve and protect. This is underlined by a heritage management approach strongly focused on the preservation of the object. The Citadel has been on the tentative list for UNESCO World Heritage Sites, and it is one of the most strictly protected areas of archaeological and built heritage in Romania. In this case, however, the conceptualisation of heritage as a material object leads to little interaction with other heritage values. Only one heritage narrative is addressed, whilst the narratives focusing on the everyday lives of the multi-ethnic and multicultural population hardly appear. International funding and the discourse of EU projects in some cases strengthen this process of hiding certain conflicts that often focuses on particular minorities and marginalizes or leaves stories of other groups untold.

Heritage and the problem of memory

A growing emphasis on the immaterial and personal values of heritage, and the process of widening the scope of what is defined as heritage, has led to a profusion of remembering and collecting heritage objects. Integral to this process of remembering is the process of forgetting, meaning that one cannot properly form memories and attach value to heritage without selecting some things also to forget (Harrison, 2020). Some kind of 'strategic forgetting' occurs when it concerns heritage assets that address so-called dark, difficult, dissonant, or conflict heritage (i.e., uncomfortable heritage), such as in the cases of London CLT (psychiatric hospital and workhouse) and the ruin pubs in the former Jewish Ghetto of Budapest. In contrast, in the case of Scugnizzo Liberato, the uncomfortable heritage is embraced and incorporated in the name and social mission statement of the adaptive reuse project. Likewise, Sargfabrik uses its

uncomfortable heritage in branding. There is an interesting interplay between the name and symbolic forms referring to death and a mission and vision about creating an environment for a 'good life'. Uncomfortable heritage and the problem of memory can lead to conflicts, especially when some unwanted storylines are left out at the expense of certain communities or individuals. However, this could also be used the other way around, by turning uncomfortable storylines into a key element of the branding strategy or by recognising it in the heritage reuse plans, reaching out to communities who own dark or difficult heritage.

Unintended outcomes

Heritage reuse projects sometimes struggle with unexpected and undesired side effects, or intended impacts becoming larger than life. Heritage reuse is often tourismoriented, and it strongly relies on heritage branding and identity, leading to a process of heritage-led gentrification, touristification, heritagisation, as well as an overt focus on specific (more usable) parts of the heritage. This poses a challenge for local heritage communities as their heritage narratives and identity are not necessarily recognised or incorporated and can easily become exploited and appropriated. In the case of the Jewish District we saw a clear example of the process of rewriting the narrative by reuse, turning the area into a party district. This reuse resulted in a stronger local economy but a changing local identity, and heritage-led gentrification. Jewish heritage tourism is another type of reuse yet focusing on very selected narratives. This posed a threat of erasing certain histories. This case illustrates that what appears as a strength at national (or international) level, can be a threat at a local level if there is no control over qualitative/distributive aspects of the transformation. These processes of gentrification, touristification, and heritagisation can even become worse when a project aligns itself with international organisations such as UNESCO. A World Heritage listing seems desirable in many respects but in most cases leads to typical impacts, such as heritagisation and touristification.

The impact of heritage policy and financial incentives

Heritage protection and regulation can be used to prevent slash-and-burn developments or strategic disinvestment – thereby limiting the power of real estate speculators. Yet, heritage protection does not prevent for-profit real estate developers from engaging in reuse and turning it into a successful business – as observed in cities like Stockholm. Such a situation requires additional political and regulatory prioritisation for civic initiatives. Fragmented and weak institutional frameworks can also have a negative impact on heritage reuse projects. Heritage protection, for instance, can work against civic initiatives of heritage reuse as it imposes too many requirements, limitations, burdens, and costs on the civic initiatives on reuse. Heritage status is often framed as an additional burden in terms of finances and time even though protection policies also serve the goal of protecting the monument from demolition. The complexity of heritage and planning framework can be seen in other ways too: the scale and typology of the building may be too much for a small town (Potocki Palace), or there is no interest in cooperation on behalf of the municipality, or they have a rather laissez-faire approach (Jewish District). Similar bottlenecks can be identified when looking at financial incentives. There are very different financial incentives (or disincentives) for (formal) heritage – some are tax based, many are competitive (grant funding); some are thematic or competitive (e.g., only for religious, highstreets, villages); and some are only for specific actors (e.g., community groups, heritage groups, academics, cultural organisations, etc.). Whilst heritage status can lead to financial advantages as it can help to get low interest mortgages, loans, funding, or to reach out to investors, programs for funding or heritage preservation are not equally available and accessible in various areas. In general, the availability of financial resources is often limited, and they are often focused on the preservation of material heritage. Funding mechanisms are also heritage processes: public funding, for instance, supports the idea that heritage belongs to the entire society, whereas pool funding leads to a situation that everyone can personally possess heritage. International funding strengthens the international embeddedness of the local heritage and hence leads to the upscaling of heritage values. It is necessary to be aware of these effects of funding mechanisms as heritage processes, and to act on this by incorporating social responsibility into contractual agreements, as an example.

4.2.2 The heritage assemblages

The first step in the analysis of cases is to use assemblage theory to describe how heritage is constituted. The three criteria of co-evolutionary heritage approaches (as described earlier) are applied in order to describe and analyse heritage assemblages. In the analysis of the cases that follow, the different aspects of the heritage assemblage are addressed, as well as the various and heterogeneous interactions between these aspects, and third the interaction with the broader social and institutional context. To speak of co-evolution, all three criteria have to be met.

The first step is defining the heritage assemblages of the various cases. Table 5 presents an overview of the cases and illustrates which aspects of the heritage assemblage were identified. In most cases, multiple aspects were manifest, although some aspects were more frequently identified than others. In thirteen of the fifteen cases, there was a particular emphasis on the material values of the heritage object, either as a stand-alone driving force (Potocki Palace, Jam Factory, Citadel) or in combination with spatial development (Jewish District, Halele Carol), and only occasionally in combination with spatial development and immaterial heritage (Marineterrein), spatial development and community (St. Clemens Hospital) or community (ExRotaprint). Only three cases do not showcase material heritage with community and spatial development; Sargfabrik – which combines community with spatial development; and LaFábrika – which only recognises immaterial heritage as a driving force for its reuse. Only two cases combine all four systemically embedded driving forces in their heritage reuse project: Largo Residencias and Stará Tržnica.

 Table 5 Overview of the different aspects of the heritage assemblages of the cases.

Site	Material heritage	Immaterial heritage	Spatial develop- ment/ identity	Local heritage communi- ties
Cascina Roccafranca, Turin				
Scugnizzo Liberato, Naples				
Sargfabrik, Vienna				
Färgfabriken, Stockholm				
Largo Rêsidencias, Lisbon				
Jewish District, Budapest				
LaFábrika detodalavida, Maimona	1			
Halele Carol, Bucharest				
Stará Tržnica, Bratislava				
Potocki Palace, Radzyń Podlaski				
ExRotaprint, Berlin				
St Clemens hospital, London				
Jam Factory, Lviv				
Marineterrein, Amsterdam				
Citadel, Alba Iulia				

Engagement of the local heritage community has been identified as a driving force in eight out of fifteen cases, always in combination with other driving forces and never as a stand-alone: including the case of St. Clemens hospital in London, the Sargfabrik in Vienna, and the Cascina Roccafranca in Turin. Within this latter case – a derelict former farmstead transferred and refurbished into a meeting centre for the community – heritage values seem not to have a big role. In fact, the building was not listed as a monument and was only of limited value to the locals. In this regard, a community centre could have been created in any place, and the location of Cascina Roccafranca was chosen for mere practical reasons. An involved stakeholder argues that "you first need have some basic conditions since it is hard to fight social isolation without available spaces". For this reason, they needed a space that was "'transparent' to facilitate the idea of sharing and publicness" (project manager), this space was provided by the Cascina Roccafranca as "these places have a spirit, a vibe, but not an excluding spirit" (involved stakeholder). In this regard, the building supported the community-engagement. Yet, it was not the heritage of the site that was the main driving force, but the aim to provide a multipurpose space for socialisation, civic engagement, and cultural activities.

In line with this, the case Marineterrein in Amsterdam provides an example where it was particularly the immaterial heritage that appeared to guide the reuse project. The buildings on this site are, except from one building, not listed as protected heritage sites. These buildings are typical highly functional buildings from the 1960s and not the main reason why this site is seen as valuable: *"As heritage, the buildings don't have much value"* (local resident). An involved stakeholder explains that it was rather the immaterial values, such as the stories related to the site: *"This has always been a military zone and it has always been close to the city. Even though it is not always reflected in the buildings themselves, this has always been a very important place in a historic sense"* and *"I find some of the buildings on this site really great. But actually, what I find even more special is the story we want to continue to tell; an area that has always been of great value to the city".*

The context of spatial (re)development/identity is mentioned in eight out of fifteen cases. An exceptional case, in which material heritage only played a very limited role and certainly wasn't the driving force, is LaFábrika. The initiators of this project explicitly aimed at rewriting the memories connected to the site as a part of a healing process for the community, and to create a symbol of a new and bright future. This aim has less to do with the relicts of the industrial past, but more with present-day aims like strengthening local communities and creating social and cultural infrastructures.

The Citadel in Alba Iulia is one of the cases in which only one driving force, namely material heritage, was identified. This case was indeed set up around the notion that heritage is a thing to conserve and protect. This is underlined by a heritage management approach that strongly focuses on the preservation of the object. In fact, the citadel has been on the tentative list for UNESCO World Heritage Sites. Alba Iulia Citadel is indeed one of the most strictly protected areas of archaeological and built heritage in Romania. This protected status had to be taken into consideration during the reuse process: archaeological research was required before earthmoving or constructions, and the renovation of protected buildings also had to be preceded by research. In this case, however, the conceptualisation of heritage as a material object led to little interaction with the more immaterial heritage aspects. Indeed, only one heritage narrative - of a political and ecclesiastical history – was addressed, whilst the narratives focusing on the everyday lives of the multiethnic and multicultural population hardly appeared. Stakeholders criticised this one-dimensional way of presenting heritage and, consequently, there is a long ongoing contest for the ownership of the past, which is also present in the interpretation of the built heritage at present day.

The presence or absence of some of the aspects of the heritage assemblage in these cases of heritage reuse strongly depends on the extent to which communities' and individual's ideas of (immaterial) heritage are identified and recognised.

4.2.3 Interrelatedness of various aspect of the heritage assemblages

In terms of interrelatedness between the various aspects of the assemblage and their impact on one another, it appears that various relations are indeed being established in the projects, yet often more in a conflicting rather than supporting manner. In the Lviv case, we noticed that understandings of heritage in Ukraine are still very much expert-centred, and the opinion of the community is often not deemed so crucial. An involved stakeholder argued for the importance of including the opinions of local residents on the heritage of the Jam Factory, in order to establish 'a heritage community'. For that reason, a project called 'tell your story' was set up to map the living memories of those who worked at the factory as immaterial heritage. This project however appeared to have little impact on the heritage reuse project. Although attempts have been made to create an interrelatedness between material and immaterial heritage and the local community, it appears rather difficult to sustain these relations. Indeed, connecting to a local heritage community and their understanding of heritage appears to be rather challenging, as immaterial values are hybrid and divergent, and experts remain focused on material values. Also the project in Budapest, the Jewish District, shows conflictual interrelatedness. The problem in the Jewish district is that material and immaterial heritage often appear in an artificial separation, especially in the public discourse, where mostly built heritage is addressed whilst other layers of immaterial heritage (notably the Jewish traditions) are not recognised at all. This case shows that heritage values are important triggers for a local community to act or to be involved in a reuse project as they acknowledge and potentially connect the immaterial and material aspects of heritage, albeit in a conflicting way – e.g., divergent immaterial values advocated by various communities versus material values advocated by experts and formal policies and regulations.

A more harmonious interrelatedness between communities and material and immaterial heritage values can be found in the reuse of Scugnizzo Liberato in Naples. Here, local citizens first became aware of the architectural and historical values of the building as they started to informally occupy the building. Later on, it appeared that the abandoned buildings could still have a certain value to the community and add to the vitality of the city, as one interviewee mentions: *"The Scugnizzo Liberato shows that [even though] there are many abandoned spaces in Naples they are still able to add to the vitality of the city. A sort of pride is hidden behind the people who are engaged in transforming these ancient places into a collective one. It is a way to take back what was, and has always been, ours". This relation actually works in two ways. Not only is the community interested in taking care of the heritage, but the heritage in turn also contributes to community building: <i>"People were also very curious about the space itself, since it had been locked for almost two decades. They were curious about what was hidden inside. Many of them approached us, so we could establish some first relationships".*

The mutual impact between different aspects of the heritage assemblage is something that we also see when analysing the interrelation between heritage – either material or immaterial – and spatial development. In several cases (Scugnizzo Liberato, Stará Tržnica, Largo Rêsidencias, Jewish district, among others), the projects of heritage reuse were indeed linked to broader spatial developments, for instance the revitalisation of a neighbourhood or district. Yet, spatial developments often bring additional challenges to projects of heritage reuse and the protection of material and immaterial heritage. Material heritage can mostly be incorporated in spatial developments, whereas immaterial heritage values are mostly impacted by the spatial developments rather than taken into account (which we see in the case of the Jewish district). This in turn impacts the local communities as they feel that their stories and values are not incorporated in a spatial development plan based on a confined heritage narrative.

Examples of interactions between the heritage reuse project and its broader social and institutional context are found in cases like ExRotaprint, Färgfabriken, and Sargfabrik. The Sargfabrik project in Vienna – which aimed at creating communal activity – brought a lot of vitality to the neighbourhood and challenged the initiators to find ways to not grow their own gentrification project. As such it became an example of a co-housing project that actually built a relation with the neighbourhood and thereafter also impacted the way housing is thought and discussed in Vienna. Also, Färgfabriken influenced the direct area around the project, and changed thinking about urban issues in the city of Stockholm. The project has essentially become a gathering point to discuss the future of the nearby Lövholmen area, taking a position to include working spaces and cultural venues in future developments besides the inevitable residential complexes: "I think the whole area of Lövholmen and more recent industrial buildings offer such incredible opportunity to have another way of living and thinking. Färgfabriken has a role and responsibility to tell the stories of these sites, the topography as well as the negotiation between the building, the city, the water and the climate that such constructions show" (involved stakeholder). ExRotaprint in Berlin is a heritage reuse project that set up a heritage building right and nonprofit status in order to buy and restore an industrial complex. This complex was bought from the municipality at a time when large international investment companies bought many real estate development projects for reasons of speculation. ExRotaprint set a precedent in Berlin in terms of alternative ways of financing a project, and as such inspired many experiments with cooperative ownership, and even started a campaign that changed the city's housing policy. As such, these three projects were inspirational cases in terms of shedding light on similar spaces in the area, and in terms of changing the discourse on urban issues in their city.

4.2.4 Two heritage assemblages: Stará Tržnica and Largo Rêsidencias

Applying the conceptual model for co-evolution reveals differences regarding the driving forces behind the reuse projects, the level of interrelations between various aspects of the heritage assemblage, and the interactions with the wider social and institutional context. Although in some cases various aspects of the heritage assemblage were recognisable, a multiplicity and plurality of interrelations between these aspects can only be found in some. The relatedness and mutual influence between cases of heritage reuse and their wider social and institutional context remains limited to only a few cases. We therefore conclude that most cases we analysed do not comply with our definition of a co-evolutionary heritage approach. Two cases make an exception, as within these cases all four aspects of the heritage assemblage were present, interacted with each other, and were interrelated with the wider social and institutional context. These are the Stará Tržnica project and Largo Rêsidencias. The Stará Tržnica project combined material heritage and the stories and histories around the place (immaterial heritage) with community-engagement, influencing the broader urban context as well. These connections appear to be one of the main aims: "As we started to revitalise this small square which is right in front of the old market hall, we wanted to be involved also further as it connects us with other communities in the city" (involved stakeholder). In line with this: "We moved our focus to the surrounding area and thought about how to create added values through our spaces" (co-founder of the project) thereby using the material values as the starting point. "All our actions fit to the protected status of the building" (idem). Various strategies are applied to create an interrelation between the various aspects in this project. Initially small-scale events were organised in this former market hall to get local communities involved and interested in the material heritage of the place. Moreover, the idea of a 'flexible forum' was implemented in the building, allowing the space to be as multifunctional and flexible as possible to fit the needs of the neighbourhood's residents. Eventually the reuse into a community-based functioning of the building resulted in a highly engaged local community who in turn also shared their stories and histories of the place. In other words, there was a constant process of interaction between the various aspects.

The project of Largo Résidencias also showed interrelatedness and interconnectivity towards a heritage assemblage. The project's aims were not only to renovate a building into a multipurpose space for the community, but also relate the building to its surroundings, thereby contributing to the regeneration of a marginalised area in Lisbon. Within this project, the link with the wider area was considered an important element: "We want to build this area and not to abandon it. This project only makes sense if it's locally based and if you manage to build the area" (involved architect). A project adviser furthermore stated: "Larao is a symbolical center of radical change in Lisbon. This area of the city used to have a flourishing market of drugs and prostitution; it was considered a dark area and many Lisboans would not come here. Things began to change when key community agents started working in this area to create new living conditions, to increase the quality of life, and to attract people here". The project founder underlines this: "I tried to convince my colleagues to do something bigger for the neighbourhood". During this process of connecting to the neighbourhood, and the wider community, Largo Résidencias has been working on embracing both the material and immaterial heritage of the building and the neighbourhood. The stories related to the building's past as a ceramic factory are, for instance, translated into a variety of activities related to ceramic tiles, which were once produced in the building and used across the neighbourhood and the city. A process of mapping the neighbourhood's social memory also contributed to countering the process of forgetting as a consequence of gentrification and touristification. A local journalist states: "In some parts of the city we cannot speak of social bonds anymore because many inhabitants have moved out. The social capital and memory that was essential to the resilience of these places is lost. That is a big issue that has to be understood to prevent the worst gentrification and urban transformation yet to come".

In these two cases we can recognise a co-evolutionary approach, as these cases show multiple driving forces and interrelatedness of all four aspects of the heritage assemblage. What is further notable about the Largo Rêsidencias and Stará Tržnica cases is that they both had a rather flexible approach, allowing them to implement diverse and changing functions to best fit the community and the surrounding areas. In the case of Stará Tržnica the main idea was to create a space as multifunctional and flexible as possible to find a community-based content and functioning of the building. Being adaptive and flexible in order to deal with changing contextual circumstances appears to be a critical factor for establishing and maintaining a certain interrelatedness over time.

4.3 Heritage approaches and strategies

4.3.1 Strategies

In the different cases various strategies are implemented to create an interrelatedness of various aspects of the heritage assemblage, or to enhance the implementation of a relational heritage approach. By analysing the cases in more detail, we identify various strategies applied in the process of heritage reuse. Below we present a series of strategies which were identified in the practises of heritage reuse, and we will discuss how the related practises, policies, and aims for heritage create variations in their outcomes.

Preservation of heritage by use

Finding a (new) use, and thus users for a building is seen as one of the most effective ways to take care of a heritage asset in the long run, whether these users come in post-renovation or as part of the process. Developing a community around the site from an earlier moment in the process can be a way to make sure that the restored buildings are part of the community and that they are taken care of as such in the future. Here are some policies and practises that exemplify preserving heritage by use:

- In the case of the Potocki Palace and Alba Iulia, the practises are that they start with renovation paid from EU grants, then find occupants.
- In many cases we see practises of creating a network of local organisations and actors, matchmaking between empty buildings and organisations and reaching out to already existing organisations with the aim of finding a way to use the heritage assets in order to preserve them.
- Policies that support adaptive reuse projects tend to start from the assumption that using heritage is better than leaving it empty.
- Policies can support heritage reuse projects when they create a level of flexibility and provide discretion to the policy officers, allowing for a tailored approach to projects (e.g., in their consent/permit systems). This is most directly useful when available on the government level closest to the project. However, discretion and flexibility in the protection process might also mean that choices are made 'against' heritage value or are in favour of recognising only some heritage significance.

Raise awareness about heritage

In many cases we see that raising awareness about heritage is a way to start the heritage reuse process. Temporary uses and events can raise interest and establish effective relationships with the site and enable people to explore heritage and as such to raise awareness. Here are some policies and practises that support this idea:

- Across cases, some effective practises have been to open up the site for visitors; forge links with existing heritage narratives; invite people to tell their own memories and stories; encourage or start heritage dialogues online or on-site; educate by inviting participation from school groups, clubs, or other organisations; develop touristic routes; connect sites and stories.
- Local authorities and other heritage building owners can support this by agreeing on a temporary use to allow various groups to share their histories and memories. In the case of Naples, Scugnizzo Liberato, a group of young people had a clear social, political, and cultural mission. The lease was not asking for money, but they were asked to deliver 'other' value in exchange (e.g., inform people about the heritage value of the site).

Connect heritage with people

Going beyond awareness raising, this strategy is about facilitating connections between local heritage communities and places. Combining the material restoration of the building with its social reuse and reintegration in the community is a way to develop impact. Yet, the ways to connect people with places and involve them in the related processes vary in different contexts and per stage of the process. One kind of involvement is not necessarily better than the other; sometimes a good and transparent informing will do, while in other situations co-creative processes or mutual partnerships would give the best results. Applying community involvement can also be(come) tokenistic (e.g., the Alba lulia case), and there are many faux engagement and consultation processes when it comes to heritage and planning. Since heritage means different things to different people, contestations are not uncommon, and facilitating connections can thus also mean being open to new and different interpretations of this heritage and reconsidering which histories and values should be put in the foreground.

Using a broad interpretation of what is heritage is the most used strategy in creating space for heritage reuse to happen and to connect material and immaterial heritage and local heritage communities. A broad interpretation of heritage means a focus beyond the material, the aesthetic and the 'old', and incorporating immaterial heritage, capturing local knowledge and memory, looking at a wide range of local histories (and making them accessible by research, exhibition, booklets, websites, social media, etc.). The immaterial heritage can focus on practises, production, processes, competencies, knowledge, and more. A broad interpretation of heritage acknowledges that heritage is not 'in the past', but a way to mobilise the past in the present, and to set out pathways for the future. This way of understanding heritage is potentially building on the emotional attachment of the locals to a heritage asset. Places have different values, and different emotional attachments to different people, and the memories and emotions they bring about can be traumatic, problematic, or simply not of interest to people. People should be allowed to 'refuse' to participate or engage, and there should be space for people to

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contest and question the heritage that is mobilised, for the narratives to become more inclusive and diverse. The following are some policies and practises that are used to connect heritage with people.

- Policy can support the aim to secure certain assets for civic-minded, socialoriented actors and initiatives.
- Facilitating connections can be done through a range of community engagement tools such as offering the heritage for temporary use and events, listing a building as an 'asset of community value' (e.g., London CLT), and co-creating heritage research, exhibitions, and walkabouts.
- Some heritage funders are moving from funding aimed solely at material restoration towards more people-oriented projects, where the focus is on use and integration; e.g., workshops, engagement programmes, skills building, knowledge sharing, community involvement that support heritage buildings, processes, or practises.
- Connecting heritage and people can also be the result of the building itself, or its function. In London CLT heritage reuse is combined with housing, whereas in other cases social-oriented initiatives are prioritised in competitive bidding (e.g., Stara Tržnica). In the case of ExRotaprint, the project was built on emblematic architectural heritage: the architectural heritage values of the building made the identity of the place more explicit and helped to reinforce the place attachment.
- A variety of funding sources can foster wider connections between people and heritage sites (e.g., London CLT, but also LaFábrika). Yet, having to rely on a variation of resources (e.g., mix of funding) also means these projects probably need a variation of stories and people involved, and this can mean they must be to be more inclusive and creative about their heritage. However, it can also mean they are more selective concerning the heritage that is useful to them.

Amplify heritage links

Many of the projects use or benefit from partnerships to amplify and connect the very localised heritage assets and their values and link them into wider networks. The following are some policies and practises that have been used to amplify heritage links.

• A popular practise has been to build connections with similar sites (e.g., industrial sites in the region, ruin bars across Europe). This can be done by building narratives between heritage sites, projects, and/or organisations, to increase the role of the site in the historical narrative of the entire area, and/or to strengthen the identity of the area. Sometimes it is about integrating storylines better into existing wider landscapes and histories, and thus develop shared identities. It can also mean working across (cultural, municipal, national) borders. Depending on the aim of the partnership, added values will be different. Often there is the hope for income generation for the actors involved; e.g., investing in tourism commodities, through cultural routes and tours, or selling of heritage memorabilia; promoting shared practises (in food, religion, traditions, culture, agriculture); or attracting new residents, creating an aesthetic and cultural atmosphere that attracts certain groups (e.g., bars, creative industries and communities).

Use, or become part of, a wider area-based approach

In heritage reuse projects integration of the site within its wider context is often seen as an important aspect. This can be done by incorporating an area-based approach in the heritage reuse project, or by actively reaching out to existing structures, organisations, and communities. There are many supporting policy programs that support the integration of the site into its environment. An integrated approach between spatial development and heritage preservation is often based on regional identity building, for tourism strategies or to attract new residents. Heritage is a resource and can be integrated in a wider network of resources to make the area more attractive. The following are some wider area-based policies and practises.

- Policies/ governments can address regional discrepancies and provide funds for restoration and reuse to support more disadvantaged areas, mainstreaming reuse within certain other sectors; e.g., regeneration, sustainability, tourism.
- Employ policy programs aimed at investing in wider area regeneration, by integrating various concerns, including employment opportunities, development perspectives for small businesses, essential social and physical infrastructure, and heritage protection.

Explore and reflect on the different understandings of heritage

When looking at a project, who is involved – e.g., who is seen as responsible for its maintenance – can tell something about how heritage is perceived. Moreover, stories and immaterial heritage can be very important in the inclusion of people in a project. Heritage can attract, create a sense of belonging, bring together, and be inclusive, but it can also divide and exclude. Both are used, sometimes strategically, sometimes with less awareness. The following are some policies and practises that explore this concept.

- In some countries the 'public' nature of heritage means the public authorities have the main responsibility (e.g., Potocki Palace). This can mean a fairly inflexible approach to (formally designated) heritage assets, following an inflexible legal system, and focusing on materiality, aesthetics, and a very narrow set of values. Yet, both private and public ownership can be an obstacle in accessibility and participatory heritage processes.
- When heritage is seen as a public good, it can help create different ideas of ownership; e.g., communal and societally shared rights and responsibilities. Seeing heritage as a public good means that the resource is shared by a collective or a more general stakeholder group.
- Civic contributions foster the sense of community ownership of the initiative and can strengthen the engagement within the initiative as people involved will feel comfortable with the heritage mobilised and the heritage narratives recognised.
- Creating a democratic understanding of heritage can also be reached by researching the architectural values and/or heritage narratives. In many cases, research on the architectural values becomes an opportunity to rediscover identity and symbolic values for the community and the entire district, to map people and places, and to promote the spatial and social heritage of the area. This is also a process of creating heritage by promotion; co-creative projects on heritage meaning create a sense of belonging and raise awareness.

• Heritage can be translated into broader project values that can be reflected in legal/formal structures and means. The comanagement of the asset and the coproduction of offered services can be based on or strengthened by having connections to how past users organised, and/or shared (heritage) values. In ExRotaprint and Cascina, research is done on the architectural heritage of the site by involving the community and their understanding of heritage. In the case of Cascina, the site is also a carrier of local memory and heritage, since it hosts the Local History Interpretation and Documentation Centre. This centre is conceived as an Ecomuseum, that is, a place where local historical memories are archived and made accessible to citizens.

4.3.2 Heritage approaches

These strategies relate to different kinds of heritage approaches. In chapter one, we distinguished three approaches to heritage management: an object-oriented approach, a process-oriented approach, and a co-evolutionary approach. In the cases described, we see big differences regarding which strategies and approaches are applied. It must be noted that these approaches are not exclusive for any project as various stakeholders can have different aims within the same project and aims and approaches can also change with time. In this section we reflect on the three approaches with respect to the analysis of the practises and strategies of heritage reuse discussed in this chapter.

Object-oriented approach

This approach aims to preserve the heritage asset for the present and future generations. All the reuse projects we look at in this research, whether they address legally designated heritage or not, have the aim to preserve heritage in a certain sense. In some cases, this means a so-called original or authentic state, or as close to that as possible referring mostly to material authenticity; here conservation is an important part of the aim. In other cases, the concept of authenticity also includes the immaterial aspects. Reuse is a tool to preserve not just the physical structures but also the related traditions, stories, and uses, and restoring the building serves this purpose too. Indeed, preservation by use is an important element in heritage projects in order to have people who take care of the site and to ensure the financial background for the preservation. The risk of abandonment and decay is often emphasised in this approach as a process against which heritage reuse must act.

Who defines the values that guide the preservation is important? Often heritage experts define which are the relevant attributes and elements to preserve and restore, that is, which are the heritage values. These values are considered inherent even if contextually recognised (e.g., relevant for a certain region or nation), and rooted in the past. As in the case of the Potocki Palace and Citadel in Alba Iulia, the architectural and historical values are seen as inherent and the task of the stakeholders is to protect these values and pass them on to the public in the present and the future generations. The specific legal and policy context largely impacts who can make such decisions and what the consequences of these decisions are. In the Jewish District, a bottom-up initiative by experts as civic actors led to the official protected status of buildings as heritage, which,

in turn, significantly limited how these buildings can be reused and has contributed to a process which is ultimately unfavourable for the residents.

Process-oriented approach

In several cases, heritage is instrumentalised in addressing specific issues and producing specific benefits; e.g., by increasing touristic potential, contributing to the image of an area, serving as the basis of city or regional branding, producing direct or indirect economic benefits. This type of use can involve both the material structures and the immaterial heritage: stories, narratives, traditions, knowledge, etc. The Stará Tržnica case is strongly characterised by this approach where the heritage of the market serves as the basis of rebranding and revitalising the area.

As in the previous approach, it is an important question here too who has the power to decide the uses and the direction of development, whose heritage is used by whom for exactly what purpose, and whose heritage and which elements of heritage are neglected or hidden. Since a certain (group of) stakeholder(s) define the expected benefits and coordinate the process accordingly, there is always a risk of exclusion and cultural appropriation. In the case of Alba Iulia, material heritage and history serve as the basis of city branding strategy, but the process is managed by the city leadership with limited community involvement at the level of tokenism, so many layers of the heritage remain hidden in the process, and minorities feel excluded.

Co-evolutionary approach

Heritage reuse can be a way to link individuals, groups, their environment, certain material assets, and contribute to producing communities, social and cultural infrastructures, and networks of sites. This appears explicitly as an aim or mission in heritage reuse projects such as at LaFábrika, where the initiators wish to rewrite the memories connected to the site as a part of a healing process for the community and create a symbol of a new and bright future. In most cases this approach is in the service of area regeneration where social regeneration is seen as the core of the process. Heritage reuse can support the rehabilitation of a common past by a focus on particular sites, linking them in their cultural landscapes and with a common vision for the future.

Aiming for social and spatial cohesion, heritage reuse projects can be used to advocate for alternative approaches to real estate and urban development, and for example fight against gentrification, or promote community ownership and commons approaches, such as the Largo and the London CLT do. Many of the projects use approaches that aim to enhance the value of the building for a community (whether direct neighbours or a wider or sectoral community or both) by opening up, restoring, and making the heritage asset useful to them again, as well as by (re)creating connections in terms of identity and belonging. ExRotaprint aims to create a different idea of ownership by preserving heritage buildings; generating social, economic, and cultural capital; and advocating for alternative approaches to real estate and city development. While building on the architectural and local historical values of the site as a resource for developing a communal identity, they choose a future-proof financial model that prevents property speculation and a governance model that ensures social diversity within the project.

4.4 **Reflection and conclusion**

The analysis of the cases presented in this chapter provides some ingredients that contribute to an answer for the sub-research question of this chapter: how does a relational heritage approach manifest itself in present-day European heritage practises? Applying the approach of co-evolution to fifteen projects of heritage reuse throughout Europe reveals major differences between the driving forces behind these projects and the heritage assemblages of the cases. In most cases, various aspects of the assemblage were present, yet the interrelation between these aspects turned out to be only occasionally supportive. The extent to which interrelations are established and maintained over time strongly depends on the initiators of the heritage reuse project and the social and institutional context of the project. It has been demonstrated that the relation between material heritage and spatial development/identity is frequently strong in the projects. Community-heritage engagement and incorporating communities' and individual's ideas of (immaterial) heritage on the other hand appears to be rather context-dependent and strongly influenced by national heritage policy. Developing a local heritage community around the site from an earlier moment in the process can be a way to make sure that the restored buildings are part of the community, and that they are taken care of as such in the future. From the start of the initiative to reuse Stará Tržnica, linking heritage to the community has been a key aspect; the reuse initiative started from a proposal with the support from various communities who were convinced that the reuse project would serve their purpose. This support also helped to convince the municipality about the public interest in their reuse plan. Rather than starting with renovation works and only find occupants later on (as was the case in Potocki Palace and Alba Julia), engaging with the local heritage community in an early stage of the heritage reuse project helps to establish links between the local community and the material heritage object.

Another criteria to recognise co-evolution is the integration of a heritage site in its wider context. In some cases, this is done by applying an area-based approach, linking heritage to ongoing spatial developments, or spatial identity. In other cases, this is achieved by actively reaching out to existing structures, organisations, and communities. In the case of Largo Rêsidencias, there are several supporting policy programs that enhance the integration of the site into its environment. The project has been on the radar of various municipal policies such as a special investment program in Lisbon that provides funding to civic projects, including heritage preservation. In a number of socioeconomically disadvantaged ('priority') neighbourhoods the municipalities' policy helped to see heritage as a resource that can be integrated in a wider network of social and cultural activities that help to make the area around a heritage object more attractive. The analysis of cases also shows that another important aspect is to explore and reflect on the different understandings of heritage. In some countries the 'public' nature of heritage means public authorities have the main responsibility (e.g., Potocki Palace). This can mean a fairly inflexible approach to (formally designated) heritage assets, following an inflexible legal system, and focusing on materiality, aesthetics, and a very narrow set of values. Opposite to this, and in order to also address and incorporate immaterial heritage values, cases where a cocreative process was followed

to explore heritage meanings, a sense of belonging was created and this process raised awareness of heritage values that go beyond the material ones alone. These values have been explored in both Largo Rêsidencias and Stará Tržnica by organising all kinds of social mapping activities, and by incorporating stories and histories in the reuse plan. In turn, this became an opportunity to rediscover identity and symbolic values for the community and the entire district.

In the cases Largo Rêsidencias and Stará Tržnica, a relational approach to heritage is recognisable since heritage is linked to the community and is integrated into its wider context, multiple and different understandings of heritage are explored, and a flexible and adaptive approach is implemented in order to adapt to future changes. A heritage approach based on these characteristics assures that heritage remains relevant in a complex world of multiple heritage values and different stakeholders involved. Based on the cases discussed in this chapter, it can be concluded that the establishment of relations between various aspects of the assemblage depends on the complex interplay of the actions of initiators and others in the heritage reuse projects, as well as the social/institutional system in which they operate. Indeed, the extent to which interrelations are established and maintained over time strongly depends on the initiatives of local actors and the extent to which their actions impact policy and institutions.

However, we also note that heritage reuse processes can be long-term processes and might turn out differently than initially expected, or even change over time. Co-evolution implies that heritage reuse is transformative in many ways, as a project can continue to adapt to changing needs or new demands. The analysis applied here was mostly based on retrospect on realised projects and only addressed the first step of the analysis (analysing the heritage assemblages of the cases). The analysis did not consider the long-term impact of the projects or changes over time, proactively (second step of the analysis). In the cases to be discussed in the following chapters we address ongoing cases to see not only how heritage is constituted, but also how it changes over time.



LINKING PAST AND PRESENT 1: 'THE GRÜNMETROPOLE'

In this chapter the analysis of a single in-depth case study is presented in which both steps of the analysis are applied: describing the assemblage, and identifying changes throughout time. We do so by referring to a large-scale, regional project for the conversion and reuse of various heritage objects in a former mining area. This project, called 'the Grünmetropole' – which has been implemented in the Belgian-Dutch-German border region – aimed at rehabilitating the common mining past of this region. The mining industry in this region shaped not only the physical appearance, but also social and cultural life. Hence, the end of the mining industry put forward challenges with regard to conversion of the region, and also with regard to heritage management. The Grünmetropole project aimed at addressing these issues. Its objectives were to renew the post-industrial landscape, to strengthen the common identity of the region, and to create a touristic impulse. This was done by implementing two touristic routes along relicts of the mining past, including some examples of heritage reuse projects. The applied heritage management approaches in combination with the (lack of) community involvement makes this case particularly relevant.

In trying to reconstruct the paths of this case, the analysis will take into account the data collected in the OpenHeritage Observatory Case Report (OpenHeritage, 2019b). By doing so, this chapter aims to answer the sub-research questions: How does a relational heritage approach manifest itself in present-day European heritage practises? And how is this relational approach sustained over time? This chapter will be organised as follows: in the first section, some contextual information about the Grünmetropole is provided, followed by an analysis of the heritage assemblage of this case. After that we discuss the project Grünmetropole in more detail, followed by a section identifying changes throughout time. A reflection on the heritage approaches and strategies applied is then provided. The chapter is concluded by answering the sub-research question.

5.1 Introducing the case

The area of the Grünmetropole covers a tri-national, cross-border area not corresponding to any legislative or governmental institution and without direct political power. This area, in terms of location, is comparable to the Meuse–Rhine Euroregion and the Tri-Country Park. The Euroregion Meuse–Rhine is a transnational cooperation structure between territories located in three different European countries and is composed of the city-corridor of Aachen–Maastricht–Hasselt–Liège. The Tri-Country Park is the name of the nature park in the tri-national, cross-border area which forms a connection to various other natural areas such as the Eifel Park, the Ardennes, and the natural region Campine. The area of the Grünmetropole in terms of size and location is, however, slightly different as it covers only a small part of the Euroregion, namely a kind of belt ranging from Beringen in Belgium, via Heerlen in the Netherlands, to Düren which is located in Germany (see Figure 6). It's an urban area consisting of about 2,200 square kilometres with about 1.6 million inhabitants (Heinrichs et al., 2008), and is located in the centre of northwest Europe in between various other urban areas, such as the Ruhr Metropolis.

Although the area of the Grünmetropole is divided by three national borders, and although it does not correspond to any legislative institution like the Euroregion, it has a common denominator of the industrial past as this region was characterised by mining activities due to the presence of natural resources such as coal (see Figure 5). Hence, the area of the Grünmetropole has a shared economic and cultural history based on a long tradition of industrialisation based on coal.



Figure 5 Coal field locations (in grey) in the southern part of the Netherlands and adjacent mining districts in Belgian Limburg and near Aachen (Germany), after Van Bergen et al. (2007).

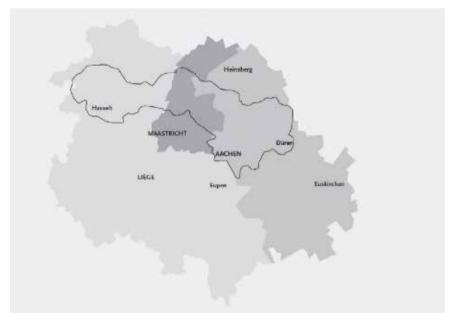


Figure 6 Area of the Grünmetropole.

Yet there are differences between the three countries. In the southern part of the Netherlands, for instance, coal reserves were exploited for many centuries. The Augustinian monks of the Rolduc Abbey started to allow extraction of coal in the 12th century. At the beginning of the 16th century, the monks started to hire local miners to extract the coal more extensively. Extraction at an industrial scale commenced in the beginning of the twentieth century and peaked between 1950 and 1975 (Van Bergen et al., 2007). In this period, a - mainly government-controlled - coal mining industryexisted, which in the late 1950s employed almost 20,000 underground miners in eleven mines (Messing, 1988). During the 1970s, exploitation became less economically interesting. Among other reasons, deposits of natural gas were found in the north of the Netherlands (Messing, 1988). Consequently, all the mines were closed after 1965 since they could not be operated profitably any longer. In Belgium, in contrast, exploitable coal was only discovered in 1901 in the province of Limburg (Flanders). At that time, the flourishing steel industries of Wallonia and the French steel basins were in desperate need of additional coal supplies. Major French and Walloon investment groups were therefore given concessions to set up seven privately owned coal mines (Baeten et al., 1999). Similar to the Dutch mines, coal production reached its peak during the post-WWII years with almost 40,000 miners in this region (van der Wee, 1983). Although the economic importance of the mines started to decline from 1952 onwards, the Belgian government agreed to cover the financial losses of the remaining mines (Baeten et al., 1999). The last coal mines in Limburg, Belgium, were closed in 1992, almost 20 years after the last Dutch mine was closed. In Germany, the development of a mining industry is closely related to the brown coal extraction in the Ruhr area. At the same time there are links with the Dutch and Belgian mining areas. The collieries of the so-called 'Aachen district' (a mining area in Germany, see map Figure 5), are located close to the Dutch frontier and therefore exploited the same major coal basin as the mines in the southern part of the Netherlands (Harris & Matzat, 1959). In the 'Aachen district', coal mining started in the early nineteenth century and developed to an industrial scale within a few decades. Due to a change in coal winning techniques, some of the mines were able to remain in production until 1997 (Reger & Hassink, 1997; Salam, 2001).

5.2 **The heritage assemblage**

In all three countries' mining regions the rapid growth of the mining industry led not only to a physical change of the landscape, but also influenced the socio-demographic characteristics of the mining areas. In this section we will describe how heritage is constituted by describing the elements of the heritage assemblage.

5.2.1 Social composition: local heritage communities

In the Belgian mining area (in the province of Limburg [Flanders]), a rural landscape with only some industrial activities, transformed into a significant industrial region (Delbroek, 2008). This region used to be a poor, agriculture-oriented, and unpopulated area with a population density of about 20 people per square kilometre (De Rijck & Van Meulder, 2000). Hence, this region could never meet labour demands, either

in terms of quality and quantity. Moreover, local people were reluctant to start working as miners since working in the collieries was perceived very negatively (Delbroek, 2008). Consequently, during the construction phase of the mine shafts workers from all over Belgium were recruited. Later on, during the actual coalmining, migrant workers from all over Europe, Turkey and Morocco, were recruited to work in the mines. By 1930 there were about 6,500 migrant workers in this Belgian mining region (Delarbre et al., 2009). The mine in Eisden (Belgium) is one of the most extreme examples in terms of the ethnic composition of the employees, as more than half of the miners were migrant workers (Delbroek, 2008). Yet, even in other towns throughout the Belgian mining area that had a lower number of migrant workers, their presence was, and still is, noticeable. In the city of Beringen (Belgium), for example, the Turkish mosque, library, and cultural centre are still used by the Turkish community. Likewise, both the Italian and Polish community have their own clubhouse, and the Greek community still meets in a Greek Orthodox church (GM11: tour guide, 2019). Moreover, these communities have strong community feelings. From a social point of view, these communities are, in some cases, still individually recognisable in present-day city life. In Beringen, for example, the Turkish community forms a segregated group: "The Turkish community is spatially segregated, and as a community they are inwards looking; besides they have a strong connection with Turkey, as they, for example, used to watch Turkish television." (GM19: policy officer, 2019).

In the Dutch mining region, similar developments can be identified. Here, too, a rural, agriculture-oriented region was not conditioned to change into an industrial region. In this mining region, miners also needed to be recruited from other parts in the Netherlands, or abroad. Although Dutch-speaking miners were preferred, the need for more skilled workers forced the mining companies to recruit miners from elsewhere, mainly from the nearby German mining districts of Aachen and the Ruhr area. Later on during the actual coalmining, migrant workers from Poland, Italy, Spain, Yugoslavia, Morocco, and Austria were recruited (Langeweg, 2008). The population in this Dutch mining region grew in the period from 1900 to 1930 from 70,000 inhabitants to 230,000 inhabitants. In 1930 almost 32 per cent of all miners in this region were of non-Dutch origin (GM5: guide museum, 2019; Langeweg, 2008, 2011; van Cann, 2016). The rapid growth of migrant workers changed not only the composition of the society but also social interactions. Some of these changes are still recognisable in today's society. The term Koempelmentaliteit (free translation: miners' mind-set), for example, came up during the mining period. This term was used to express the natural teamwork, solidarity, and fellowship between miners from various origins and with different cultural backgrounds. Today, this term is still proudly used as a nickname among people living in the former mining area. In addition, the mix of nationalities of the miners also influenced the language in the region. Since close cooperation was of crucial importance for underground workers, a simple and understandable communication language was developed in which influences from various languages were recognisable (van de Wijngaard & Crompvoets, 1989). The rapid growth of migrant workers also brought new sociocultural influences to the until-then homogeneous society in the region. Slovenian miners, for example, brought Communist ideology to the Catholic region. And these ideas were exchanged within newly established Polish and Slovenian football clubs, and musical and social associations that were open for both migrant workers as well as locals (GM5: guide museum, 2019).

In Germany the situation was slightly different as the local politicians and mining companies were initially rather sceptical about the commencement of recruiting migrant workers (Seidel, 2014). Tt first workers were recruited from other parts of Germany, especially from the Polish-speaking parts of Germany (at that time, part of The Weimar Republic). However, alike the Belgian and Dutch mining regions, here, too, work demand increased rapidly due to the rapidly developing coal mining industry. From the 1960s onwards migrant workers needed to be recruited, and this was done particularly from Turkey. Turkish migration to western Europe began with the signing of a recruitment agreement for workers between Turkey and Germany in 1961 (Sen, 2003). In the 1970s, more than 70 per cent of the migrant workers in the collieries was of Turkish origin (Seidel, 2014). It was expected by local politicians and mining companies that integration of migrant workers, and especially the Turks, would be problematic as was the case in other parts of Germany. And although the Turks were the largest migrant group in the German mining region, this did not lead to any major issues in terms of integration (Seidel, 2014; Sen, 2003). In some cases there is still a sense of 'foreignness 'that exists among the Germans as well as the Turks, which leads to ethnical clustering of Turks (Sen, 2003), similar to the situation in some Belgian cities (see the abovementioned example of Beringen).

5.2.2 Spatial composition: spatial development/identity

The mining industry thus dominated the economic structure of the mining regions. Migrant workers also changed the socio-demographic characteristics of the mining regions in the three countries. The mining industry, however, had an even bigger impact as the mines significantly influenced the sociocultural context of the region and the shaped spatial structure, urbanisation; and infrastructure. The mining companies provided for most of the needs of the workers and their families as they took care of the organisation of health care and social activities (Ročak et al., 2016). Churches, schools, meeting places, and residential areas, or 'mining colonies' were constructed by the mining companies (Delarbre et al., 2009; Peet, 2013) and the mining companies – along with the Catholic Church - 'educated' the labour workers by organising social activities and hobbies, in order to strive for obedient workers and social peace (Hoekveld & Bontje, 2016; Ročak et al., 2016). Altogether, this led to a strong socio-spatial dependency between the miners and the mining companies (Peet, 2013). An example of this strong socio-spatial dependency can be found by taking a close look at the mining colony Eisden-Tuinwijk, which is located in Maasmechelen (Belgium). In this Belgian city, alike many other cities in the mining region, a mining colony was constructed inspired by the Garden City concept. The result was a planned neighbourhood, based on a grid pattern, characterised by a village-like atmosphere, and defined by a lot of greenery – rows of trees, parks, and hedges (Keunen, 2010). These hedges are exemplary for the strong socio-spatial dependency at the time of the mining industry, since the hedges were owned by the mining companies, but had to be maintained by the miners who lived there: "These hawthorn hedges in the neighbourhood were planted by the mining companies, but it was the citizens of the neighbourhood who had to trim the hedges twice a year, in accordance to the prescribed height requirements. The citizens, however, had no equipment to trim the hedges; this was provided by the mining company. During the season, the pruning shears were brought to each house at each street corner. The owner then had to trim his hedge and pass the shears on to his neighbour. You could choose to not trim your hedge, this was no problem. Then a gardener was sent to trim the hedge for you, but your pay was docked to pay the salary of the gardener. In short, everyone had to trim his hedges" (GM21: tour guide, 2019). Nowadays, the physical appearance of the neighbourhoods is still recognisable as a green neighbourhood (GM21: tour guide, 2019; Keunen, 2010). One of the interviewees adds: *"The feeling of living in this former miners' neighbourhood is ... different from living in any other neighbourhood*" (GM21: tour guide, 2019). Some of the social aspects of living in such an organised and controlled mining colony can also be recognised at present day. Living in a mining colony led, for example, to strong social cohesion and rootedness. These are aspects that are still recognisable today in the former mining regions (GM5: guide museum, 2019; Hoekveld & Bontje, 2016).

The influence of the mining industry on the region and its citizens was thus substantial as the mining industry changed the physical appearance of the landscape, initiated the arrival of migrant workers, and influenced the sociocultural context of region. The closing of the mines – from the 1970s onwards – thus had a profound impact on the mining regions in all three countries, not only regarding the economy, but also with regard to housing, the social structure, ideology, etc. The end of the coal exploitation meant deindustrialisation, unemployment, and again changed the socio-demographic characteristics of the region. The mining regions faced a difficult physical and environmental legacy in the form of unused mining shafts and buildings and polluted coal heaps. In short, the three mining regions in the three countries once more faced enormous challenges to their economic, social, and environmental future. Here again we can identify differences and similarities in the three countries regarding the process of conversion and restructuring.

5.2.3 Conversion and restructuring: material and immaterial heritage

In the Netherlands, the decision to close the mines was taken in 1965. The Dutch mining region in the southern part of the province of Limburg was characterised at the time by a pronounced monoculture in the form of the mining industry. The social consequences of the decision to close the mines upon those directly affected and upon the region cannot be ignored (Toonen, 1972). Since the mines were largely state owned, it was up to the Dutch government to adopt a policy aimed at closing all the mines as rapidly as possible. The reconversion policy, as outlined in Dutch government documents, focused on several aspects (see Toonen, 1972, for an overview): economic measures related to retraining for miners, and measures for encouraging the establishment of substitute employment (Kasper et al., 2013). In fact, economic conversion has largely been done by transforming the Dutch state mines into a large chemical enterprise (DSM, net sales 8.6 billion euros in 2017) (Hassink et al., 1995). Despite this focus on economic conversion, the former mining region had struggles in terms of unemployment for several decades after the closing of the mines (Kasper et al., 2013). A second pillar of the conversion measures focused on branding the region to attract new entrepreneurs and to keep workers and citizens in the region. For this goal, a close cooperation between various governmental bodies, such as municipalities, provincial, and national governmental organisations, was set up. This collided into an NGO such

as the Limburg Investment and Development Fund (LIOF). Regarding the physical environment and the relicts of the mining industry, the conversion policy has had a major impact. On the one hand, new industrial landscapes (the DSM enterprise, for example) were laid out, and new infrastructure was constructed in the form of regional roads and highways (Kasper et al., 2013; Toonen, 1972). On the other hand, the industrial landscapes that became obsolete after the closing of the mines were restructured and reallocated. This restructuring policy, often referred to as 'van zwart naar groen' (black to green) – referring to the transition of dusty black mining relicts to a green, park-like, post-industrial landscape – resulted in the destruction of many landmarks referring to the mining past. In fact, this happened with striking speed and nearly all references to the extraction of coal were removed from the landscape. As an example, the last coal mine (the Oranje-Nassau I) ceased production in 1974 and by 1978 there was not a single place left where one could come across a coherent whole of slag heaps, mine structures, and miners' cottages (van Veldhoven, 2015). Dutch reconversion policy and practise thus aimed at removing the obsolete mining landscape and transforming it into a post-mining landscape. The strong focus on physical reconversion, however, meant that other aspects did not get full attention, in particular social aspects, and the recognition of industrial heritage.

With regard to the social aspects, it should be noted that miners who lost their jobs also lost status in society. Their self-esteem deteriorated, and social isolation occurred as the mines were no longer guiding the social infrastructure of society (Kasper, 2012). Together with the upcoming secularisation, the closing of the mines caused insecurity among the miners and unrest in families (Kasper, 2012). Moreover, the large-scale demolishment of mining relicts led to a situation where former miners felt deceived; they felt their world had collapsed around them (GM13: former miner, 2019; van Veldhoven, 2015). This frustration can still be noted today: "The Dutch government is not interested in Limburg's most southern region and this region itself is characterised by the perils of village politics, this doesn't help for taking care of heritage. This also differs from Belgium where they treat the past with respect and accordingly look after their heritage" (GM13: former miner, 2019). Regarding the heritage management policy this interviewee refers to, it should be noted that at the time of the closing of the mines, the public opinion about the mining heritage was rather negative. Many of the former colliers suffered from severe forms of silicosis and felt deceived, and their status had evaporated. At that time, due to the social trauma of the closures of the mines, there seemed to be, first and foremost, a 'need to forget' as van Veldhoven (2015) calls it. This is underlined by a guide from the Dutch mining museum: "One wanted to demolish all objects that reminded of the mining period, this was called 'van zwart naar groen', only later on, one started to reject this since everything was gone" (GM15: guide museum, 2019). Only from the 1990s onwards has public opinion changed as people have once again started to show interest in the mining past and related heritage. Since that time, heritage organisations have also started to recognise industrial heritage (van Veldhoven, 2015).

Chronologically speaking, the lessons from the Dutch reconversion policy could have been taken into account in the Belgian situation, since the last coal mines in the Belgian Province of Limburg were closed only in 1992, almost 20 years after the last Dutch mine was closed. Indeed, the mine closures in Belgian came in a period in which the recognition of industrial heritage was growing, and the idea that mine buildings had to be removed from the landscape was facing increasing resistance (van Veldhoven, 2015). Yet, Belgian reconversion policy shows many similarities with the Dutch reconversion, albeit there was no Belgian 'black to green' policy. In Belgium, the mining industry had been one of the central industrial sectors of significance in the Flemish province of Limburg. Since this mining industry was dominated by Walloon capital – both in terms of investment capital flows and destination of coal production – there was almost no regional capitalist-entrepreneurial tradition in this region (Swyngedouw, 1996). Already during the 1950s the mining industry showed signs of stagnation, and new industry notably Ford and Philips – were attracted to generate new employment opportunities. Yet, by the time the closures was announced, 17,000 miners were still employed in the sector (Hassink et al., 1995). Therefore, together with the closure, the national state decided to initiate a project of urban and regional development. The state embarked 100b Belgian francs (about 2.5 billion euros) for both redundancy payments and to support and cofinance investment in the socioeconomic and spatial reconversion and restructuring of the region (Swyngedouw, 1996; van den Panhuyzen, 1989). The reconversion plans were outlined in a document called 'Future contract for Limburg' (Toekomstcontract voor Limburg), based on erasing the old physical landscape, the sociocultural fabric, and the mental image of the region, and aimed at production of a new region and the construction of a new urban landscape (Swyngedouw, 1996; Vlaamse Overheid, 1987).

Next to the focus on creating a new labour profile, there was a strong tendency to want to get rid of the mining landscape. This was comparable to the Dutch 'black to green'-restructuring policy (outlined previously) and supported by local municipalities. This strong focus on creating a new urban landscape is underlined by one of the interviewees: "In this region, however, everything had to disappear, because one thought that these buildings were negative reminders of a negative past" (GM21: tour guide, 2019). The large-scale demolition works, however, also led to protests from heritage organisations and from local citizens, thereby illustrating the love-hate relationship with the mining past. An example is the city of Eisden: "Here in Eisden, there were 56 buildings from the mining period on one site. Almost nothing is left now. We made plans for the protection of this former mining site, we even protested, but without much success. Even former miners came to us, asking us what we were doing. They told us to get rid of all the buildings because it reminded them of a very negative, unhealthy past. But as soon as they started to demolish things, the same persons came to us, worried about the scale of the demolition works. This shows the love-hate relationship; the mining past is not a romantic story" (GM21: tour guide, 2019).

Amongst other reasons (e.g., financial scandals) these protests led to the establishment of a new conversion agency for the Flemish Province of Limburg. This, so-called LRM (*Limburgse Reconversiemaatschappij*) then became responsible for the remaining buildings and relicts from the mining period. Also citizens started to organise themselves as they established local associations for the protection of the mining buildings and relicts. It was at this time that people started to see the value of these buildings and even started to see it as potential heritage objects (Delarbre et al., 2009; van Veldhoven, 2015). Focus then shifted towards protection of the remaining mining buildings. Redevelopment and reuse of these buildings by giving them a new function (e.g., for tourism or living) has been done more and more over the past decades. Although these redevelopment projects are (financially) supported by the conversion agency LRM, they are still very expensive, complicated processes (Delarbre et al., 2009), mainly because there is a lack of support and of financial means. *"Dealing with mining heritage is not easy, no one is supporting you and there are no funds, this is not like taking care of castles. You never get support for this"* (GM21: tour guide, 2019).

In short, the story of the physical conversion of the mining landscape in Belgium is a dynamic one. At first a policy focusing on demolishment was initiated, but citizens and politicians then started to embrace their once-denied mining past as they started to protect and redevelop former mining buildings. Alike Belgium, conversion of the mining landscapes in Germany took place more gradually, meaning that time was taken to think about a post-mining economy and landscape (Soete et al., 2000). Conversion in the former mining district in the region Aachen aimed at creating industries related to technological expertise. Indeed, Aachen is building its conversion on the presence of one of the largest European technical universities, which has already led to the establishment of hundreds of small engineering and consultancy firms (Hassink et al., 1995). A strong focus was put on the establishment of research and consultancy firms in the domain of energy and sustainability. In the German city of Jüllich, for example, a technology park was founded with the support of the German government, which funded about 90 per cent of this technology park (Soete et al., 2000).

Next to the economic conversion, the physical conversion of the mining landscape was quite impactful in Germany. In fact, alike the Netherlands, in the former mining district in the region Aachen hardly any of the industrial buildings such as offices, cooling towers, coal bunkers, washing plants, and so forth have been preserved (van Veldhoven, 2015). The city landscape of the town of Alsdorf (Germany) still shows the reminders of this conversion policy. For decades the cityscape of Alsdorf was dominated by the mines that were located in the hearth of the town. Hence, the town depended on its mining industry. In 1992, however, it was announced that mines had to close in Alsdorf as well. At that time, a large conversion plan was set up that focused on the demolishment of the mining buildings. Accordingly, the large mining complex in the town's middle was demolished and the larger pieces were transferred to an urban green park from 1992 to 1995 (GM14: guide museum, 2019). Some buildings remained and serve as a landmark today (e.g., the water tower, and the shaft tower), whereas some other buildings are reused as new functions are added (e.g., a high school and a museum). Most parts have, however, been demolished, leaving a wide-open area. Some parts of this area were transformed into a residential area and a shopping centre, but the largest part was transformed into an urban green park (Heinrichs et al., 2008). Also in Alsdorf, a link was made with the post-mining story related to technological expertise and energy. The museum focuses on 'experiencing energy', and throughout the park a so-called 'Weg der Energie' can be followed, which leads you along various stops that inform you about energy and technology (GM14: guide museum, 2019; Heinrichs et al., 2008).

In all three countries the removal of these industrial activities left marks in the three countries' history. For a long time, the heritage of the mining era was not recognised. Hence, the scars of the industrial past still characterise the cultural landscape of today

in many cases. Yet, a changing attitude with regard to mining heritage and a physical conversion policy led to the preservation and reuse of some of the mining relicts. However, conversion policy in the three countries took a slightly different path: Belgium preserved, valorised, and integrated most of the objects related to its mining past in the urban fabric as mining land was converted into spaces for housing, offices, education, and museums and nature recovered. In the Netherlands, however, the most explicit mining relicts (such as the shafts) were demolished and are not visible anymore in today's landscape. In Germany, closed mining areas were partly demolished and partly kept as natural and historical monuments. Thus, all three mining regions have followed a different conversion process that was mainly devised at the national government level, and only partly influenced by local politicians, organisations, and citizens (Hassink et al., 1995).

5.3 **The Grünmetropole project**

The area of the Grünmetropole is thus characterised by a common denominator of the industrial past and the mining activities. Mining industry in this region, however, has a dynamic history of industrial production, decline, and reconversion. Indeed, the removal and reconversion of these industrial sites left marks in the three countries' history, and the scars of the industrial past in some cases still characterise the present-day landscape. Only more recently has mining heritage started to be recognised. Public opinion has changed, as people once again start to show interest in the mining past and related heritage. One interviewee states: "First people used to see the mining past as a negative history, but at the same time it is just part of our collective memory" (GM21: tour guide, 2019). This is further explained by a Dutch municipal policy officer who explains: "There is now a generation who is not familiar with the region's mining past, but who is nevertheless looking for their roots in order to understand developments in their living environment" (GM3: policy officer, 2019). Also (local) heritage organisations started to recognise industrial heritage, listed them as classified buildings, or made plans for redevelopment of these former mining buildings. These redevelopments were linked to other domains like tourism, leisure, living, nature development, or shopping (GM19: policy officer, 2019). It is against this backdrop that the Grünmetropole project comes in. The Grünmetropole was a project aimed at rehabilitating mining heritage by connecting various local projects and collaborations connected to that mining heritage through the establishment and promotion of two tourist routes across the region. In this section, an analysis of this case will be provided, thereby focusing on both steps of the analysis: describing the interactions between the various elements of the heritage assemblage, and identifying changes throughout time by taking the various phases of ANT into account.

5.3.1 Ideation phase of the Grünmetropole: Die EuRegionale 2008

In order to explain the origin of the project the Grünmetropole, the concept of the *'Regionale'* and more specifically the 2008 EuRegionale needs to be explained first. The Regionale is a design instrument used by the German federal state North-Rhine-Westphalia. North-Rhine-Westphalia is a state in western Germany covering an area of 34,084 square kilometres. This state – the most densely populated state of Germany – is divided into 31 districts (*Kreise*) and 23 urban districts (*kreisfreie Städte*). The Regionale is a tool for regional development initiated by the state. The Regionale can be seen as a design instrument that aims at a cooperation between various stakeholders, such as districts and municipalities (Dembski, 2006), hereby focusing on one or several (urban) districts. Although the Regionale is (financially) supported by the state government, it is up to the region (i.e., district[s]) and the regional governments to cooperate to implement the identity of a certain region (i.e., one or several urban districts) and to promote the region (Dembski, 2006; Kuss et al., 2010). The outcome of the Regionale is the development of various projects focusing on topics such as landscape, heritage, tourism, and culture. The first Regionale was organised in 2000 and from then on organised bi-annually.

In 2000, the region Aachen (Städteregion Aachen) expressed their interest in organising a Regionale and started to make plans for the application for the 2008 Regionale. After several explorative workshops and input rounds, the region Aachen submitted its candidacy in October 2001. In January 2002 it was announced that the Aachen region's bid was selected, thereby marking the start of the setup phase of the 2008 Regionale. Already during the design process of the application a strong focus was put on cross-border cooperation as it was recognised that the Aachen region had various historical links (the mining history being the most prominent one) with the adjacent regions in the Netherlands and Belgian (Vos & Gottschalk, 2009). Therefore, soon after the bid had been accepted in May 2002, several authorities and local and regional governments from the three countries met to discuss partnerships, resulting in the establishment of the EuRegionale 2008 agency (EuRegionale 2008 Agentur GmbH) in November 2002 (Vos & Gottschalk, 2009). Because of the unique location of the Aachen region – close to the borders with Belgium and the Netherlands – the Regionale 2008 became the first (and so far, only) cross-border Regionale, and was therefore named EuRegionale 2008. Accordingly, the slogan of the EuRegionale 2008 was Grenzen Überschreiten (crossing borders). The EuRegionale 2008 agency, which was based in the city of Aachen, consisted of the following partner organisations (i.e., regional and local governments and authorities): the city of Aachen, the Kreis Aachen (i.e., district), Kreis Düren, Kreis Euskirchen, Kreis Heinsberg, Parkstad Limburg (i.e., a regional cooperative between 8 Dutch municipalities), the Dutch city of Maastricht and adjacent Mergelland region, the government of the German-speaking community in Belgium, Aachen's chamber of commerce, Aachen's chamber of handicrafts, and a private company working on Aachen's future (Zukunftsinitiative im Aachener Raum e.V.) (Vos & Gottschalk, 2009). In addition, there was an advisory board composed of the North-Rhine-Westphalia's ministry for building and transport, the district government of the district Cologne, a local bank, and a local company working on innovation and technology (die Aachener Gesellschaft für Innovation und Technologietransfer mbH [AGIT]) (Vos & Gottschalk, 2009). Although the EuRegionale 2008 agency embraced the cross-border cooperation, it should be noted that the office was located in Germany and that the majority of the stakeholders came from Germany. Accordingly, they were leading the decision process (GM1: tourist officer, 2019; GM20: policy officer, 2019).

This is underlined by a Belgian policy officer who explains that: *"The project was set up in Germany, the EuRegionale agency took the lead"* (GM20: policy officer, 2019).

The 2008 EuRegionale focused on three main tracks: conversion of former industrial landscapes, promoting the region as an important European region for culture and science, and strengthening the regional and cross-border cooperation in the region (Vos & Gottschalk, 2009). The overall slogan 'crossing borders' was the overarching guiding principle for all three tracks. In all three domains, various projects were selected and accordingly developed. As soon as the EuRegionale 2008 agency was established, the consortium launched a call for projects. The designing phase for these projects took three years (from 2002 to 2005) and tens of masterplans and ideas were proposed. The proposed projects were first checked by the EuRegionale agency based on a list of ten criteria such as financing, quality, feasibility, time planning, and political support. This first round of selection resulted in a list of 65 selected projects. Then, the stakeholders of the EuRegionale agency (as listed previously) were first consulted to share their preferred projects. A general meeting for all stakeholders was organised to make a final selection based on the information from the consultation round. In total 43 projects were selected. In 2005, implementation of the projects (the total sum of investments was about 132 million euros) started. In 2008, the year of the EuRegionale, about 80 per cent of the projects were finished, and the remaining projects were finished in 2009 (Vos & Gottschalk, 2009). For an overview see timeline of the setup of the 2008 EuRegionale (see Figure 7).

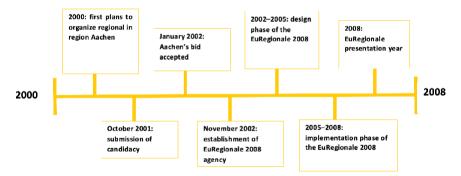


Figure 7 Timeline of the ideation phase of the 2008 EuRegionale, after Vos and Gottschalk (2009).

This ideation phase can be identified by processes of problematisation and of interest. Problematisation refers to the process of creating conditions that made the initiative for the EuRegionale start. Moreover, the relevant stakeholders were identified, and the initiative started by these stakeholders. The interest phase refers to the processes of consultation of various stakeholders, the bidding process, the setup of various partnerships, and the establishment of the EuRegionale 2008 agency.

5.3.2 Phase towards the Grünmetropole

One of the three tracks within the EuRegionale 2008 was 'conversion of former industrial landscapes'. This track aimed at using the German-Dutch-Belgian border region's industrial past as a driver for future development; e.g., linking industrial heritage to tourism. It is within this EuRegionale track that the project Grünmetropole was developed and implemented. The design process of the EuRegionale projects took from 2002 to 2005 (see Figure 7), during which a strong focus was put on historical links in the cross-border region. In 2002, for example, an Aachen foundation called Kathy Beys proposed to link elements of the industrial past in order to use them as a resource for the future (Vos & Gottschalk, 2009). The Kathy Beys foundation supported the EuRegionale and the development of the Grünmetropole throughout the years that followed (till 2008). Within the track conversion of former industrial landscapes, a call for projects, called *Industrielle Folgelandschaft*, was launched in January 2004. The design teams taking part in this competition were encouraged to consider various aspect related to cross-border cooperation in order to enhance the profile of the German-Dutch-Belgian border region. Eight international teams of architects and designers took part in the design completion. An international team under the direction of the French landscape architect Henri Bava (in corporation with designers Alex Wall, Stephen Craig and Erik Behrens) also took part in this design competition and proposed a design masterplan presenting the concept of a "Grünmetropole" (Heinrichs et al., 2008). At the end of 2004, the design plans were reviewed by the EuRegionale agency and the concept of a 'Grünmetropole' was selected as the winner of this design competition. This was followed by the presentation of the design masterplan in spring 2005 (Vos & Gottschalk, 2009). This masterplan gained a lot of attention. Henri Bava's design team was invited to present their masterplan of the Grünmetropole at the German pavilion during the 10th International Architecture Exhibition at the 2006 Venice Biennale of Architecture. This German pavilion was set up around the topic of 'Convertible cities - modes of densification and dissolving boundaries'. The presentation of the concept of the Grünmetropole at this exhibition gained a lot of interest from other designers as this design fit well within the idea of cross-border cooperation and convertible cities (Heinrichs et al., 2008). In the same year (2006), the design proposal of the Grünmetropole was awarded by the German Institute for Urbanism and Landscape Design (Deutschen Akademie für Städtebau und Landesplanung (DASL)). Since 1980, this organisation has biannually awarded projects focusing on urbanism and spatial planning by handing out the German prize for urban development. In 2006, a special award of this German prize for urban development was awarded to Henri Bava's design team for their Grünmetropole project (Heinrichs et al., 2008). Moreover, in 2008, the 7th European Urban and Regional Planning Achievement Award for the category cross-border planning and regional development was awarded to the Grünmetropole project (Eibler et al., 2014).

In this same period of time (2005–2008), supporting organisations and finance had to be organised in order to implement the Grünmetropole design. Regarding the latter, half of the needed resources (3.8 million euros) came from the participating stakeholders³, such as municipalities, and from the EuRegionale 2008 agency itself, which in turn was funded by the German federal state North-Rhine-Westphalia. Funding also became available by linking the Grünmetropole project to an existing INTERREG program. This INTERREG program, called 'INTERREG III A program for the Euregion Meuse-Rhine region', focused on the development of cross-border cooperation between Belgium, Germany, and the Netherlands. Application for this INTERREG program, which ran between 2000 and 2006, was done by the 'Stichting Euregio Maas-Rijn', a foundation based in Maastricht. Within this INTERREG program, the European Commission cofinanced projects with structural funds assistance of a total budget of 211 million euros. One subproject within this INTERREG program was called *Industrielle Folgeland*schaft (conversion of former industrial landscapes). It is within this subproject that the Grünmetropole project, as well as one other project called Pays des Terrils (a project in the former mining region in the Belgian Walloon region, focusing on ecological research and conversion of the coal mines' spoil heaps by transforming them into a nature area), was funded. In total, 3.8 million euros of INTERREG funding were made available for the Grünmetropole project (Eibler et al., 2014; Vos & Gottschalk, 2009).

The concept of the Grünmetropole gained a lot of attention from 2002 to 2008 (e.g., by winning several awards), and a significant amount of funding was made available for this idea. Hence, the Grünmetropole plan was the most important project within the track conversion of former industrial landscapes in terms of partners involved, total sum of investment, and in terms of making cross-border connections. It should, however, be noted that the Grünmetropole was not the only implemented project within the context of this track. I total, eleven other projects were also implemented (see Vos and Gottschalk [2009]). However, these projects were subsidiary to the Grünmetropole plan as the eleven smaller projects were guided by, and linked to, the Grünmetropole plan (BKR Aachen, 2005, 2008). One of the eleven projects, called 'Masterplan Wormdal' (focusing on nature and tourism development in the German-Dutch border region), is even defined as a 'building-block' of the Grünmetropole plan (BKR Aachen, 2005). This Wormdal project, as well as other projects within the track conversion of former industrial landscapes, are all linked to the Grünmetropole plan (Vos & Gottschalk, 2009).

³ A participating small municipality, like the municipality of As, for example, had to contribute about 12,000 euros for placement of signs and one information panel at the train station in the city of As Het Nieuwsblad/Limburg. (2008)40. Uw gemeente elke dag in de krant. *Het Nieuwsblad/Limburg*, 28.

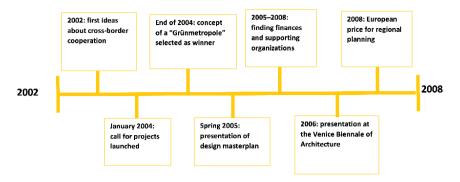


Figure 8 Timeline of the setup phase of the Grünmetropole, after Vos and Gottschalk (2009).

The process towards the Grünmetropole is thus characterised by processes of enrolment as different actors became involved and various funds were made available. In this phase, the Grünmetropole project grew from just a proposal to a plan that could be implemented as various stakeholders and funding's were supporting the plan. In this phase, processes of interest were still recognisable, as relevant actors were linked to the project and their interests were aligned in favor of the project.

5.3.3 Design phase of the Grünmetropole project

The concept of the Grünmetropole was the centerpiece of the track conversion of former industrial landscapes. Indeed, the Grünmetropole concept fit the idea to unify the region and to create a new identity (Bava et al., 2005). The Grünmetropole (GM) was designed as an equivalent of the large metropolis in Europe (like Berlin and Paris), and was planned to be a subregion within the western European network of metropolises. This subregion would be characterised by a combination of urban centers and nature and culture as connecting elements in between urban areas. Framing the GM region this way, it was argued, would give a strong economic impulse, and would lead to a closer cooperation in the region as the region would be framed as one entity (Bava et al., 2005). To make the area of the Grünmetropole into a connected region, three main goals were identified (Bava et al., 2005):

- Renew the landscape to give the region a socioeconomic impulse;
- strengthen the common storyline and identity of the former mining area;
- creation of impulses for a touristic future by creating new touristic routes.

Although named differently, these goals are also mentioned by a Dutch policy officer: *"The three main objectives of the Grünmetropole were to connect people and places, to enhance a regional identity, and to stimulate tourism"* (GM2: policy officer, 2019). He, however, clarifies that this latter point was especially important. Moreover, the overall goals of the EuRegionale (cross-border cooperation), and of the track (conversion of former mining areas) were taken into account (Heinrichs et al., 2008). This is also underlined by one of the interviewees: *"The initial aim of this project was to present the mining history of the region, and to stimulate cross-border cooperation"* (GM1: tourist officer, 2019).

To reach these goals, two cross-border tourist routes through the landscape and along the relicts of the mining past in the landscape were designed. These routes were designed to link the post-industrial landscapes in the German, Dutch, and Belgian border region and to encourage residents and tourists to explore the region (Bava et al., 2005). The two routes are the 'Green Route' for cyclists and the 'Metropolisroute' for motorists (see map Figure 9). The Green Route takes cyclists through some of the natural areas of the region. The Metropolisroute focuses on the industrial heritage of the more urban areas. This route is set up for discovering the region by car. Both routes have a length of about 250 kilometres and connect about 70 touristic highlights related to the mining past, but also local culture and nature (Bava et al., 2005; Heinrichs et al., 2008; van der Heyden, 2008).



Figure 9 The two routes of the Grünmetropole: the 'Green Route' for cyclists (in green) and the 'Metropolisroute' for motorists (in blue) in the area of the Grünmetropole (after Vos and Gottschalk [2009]).

Part of the Grünmetropole design was the idea to connect about 70 touristic highlights related to the mining past to the two designed routes (see Figure 10). These highlights were designed as a stop along the route. Selection of these stops was initially done by the designers, but these stops have been adjusted during the implementation phase of the Grünmetropole as entrepreneurs, local (heritage) groups, and citizens shared their ideas for potential stops along the route. One interviewee explains: "Initially, the points of interest were chosen in such a way that they represented the mining history. Later on, they also added different locations, but initially it was focused on the mining history. However, because some entrepreneurs along the route complained that only some locations were selected, they changed their mind, and some other locations were added" (GM1: tourist officer, 2019). Hence, there are some small differences between the initial design and the implemented project. The list of about 70 touristic stops along the Grünmetropole route is thus very diverse, and these stops include sites related to former mining activities, nature areas, cities, but also recreational sites like a theme park. The link between these stops, the two routes, and the overall Grünmetropole project is however equivocal. Some projects, like the aforementioned project 'Wormdal',

were part of the EuRegionale 2008 and for that reason linked to the Grünmetropole project by making it a stop on the routes. The development of these projects was thus linked to the Grünmetropole plan (Vos & Gottschalk, 2009). Other stops on the route were selected since local entrepreneurs, for example, proposed their location (e.g., a pub or recreational area) to become part of the Grünmetropole route. These stops were then listed as a stop and got a sign to put on their façade to indicate that this was a stop on the Grünmetropole route.



Figure 10 Overview of the routes and some of the 'points of interest'.

In the city of Beringen (Belgium), for instance, various sites are included as a stop on the Grünmetropole route. These this include the coal heap, the Flemish museum of mining that is housed in a former mining office building, and the former residential areas (i.e., garden city) (van der Heyden, 2008). Indeed, in Beringen the mining past is still very present as the relicts of the former mining settlement have been preserved comprehensively. This means that next to the mining site itself (with the shafts, sewage plants, offices, and so on), the coal heap, the former residential areas (i.e., a garden city), the former recreational buildings, churches, and other community buildings, and the properties of the different migrant worker communities such as a mosque, a clubhouse of the Polish community, and a Greek orthodox church, can still be seen in present-day landscape (GM11: tour guide, 2019). The mining site has been, and still is, being redeveloped, thereby partly reusing former mining buildings. The coal heap has been transformed into a so-called 'adventure park', which means that there is a playground, mountain bike trail, hiking trail, and viewing platform. The sewage treatment plant has been transformed in an aquarium with diving activities taking place. One of the former offices has been transformed into the Flemish mining museum, and the former power plant has been transformed into an indoor climbing centre. However, the developments and heritage reuse processes in Beringen took place independently from the Grünmetropole project. This is also mentioned during the interviews: "The Grünmetropole project didn't play a role at all in this process" and "I don't think that the *Grünmetropole project was a stimulator for further development in this region"* (GM20: policy officer, 2019).

Furthermore, both routes were designed as part of an umbrella structure called 'Urban DNA', which was designed to form a green equivalent of the more urban metropolises in Europe. A clear, defined and promoted 'Urban DNA', it was argued, would also help to strengthen the identity of the region (Bava et al., 2005; Heinrichs et al., 2008) making the region 'more readable'. There are six main elements of this 'Urban DNA' identified within the GM-project: the cities, natural and rural areas, the former spoils heaps of the coal mines, the neighbourhoods where the miners used to live, the former mining shafts and other industrial buildings, and other landscape features that are linked to the mining past. For all these six elements of the 'Urban DNA' specific development goals were identified in line with the overall objectives of the Grünmetropole plan.

An organisational model was set up after the concept of the Grünmetropole was chosen as the winner of the design competition in 2005. In total, 25 organisations such as district governments, municipalities, and tourist organisations from all three countries started to cooperate to implement the Grünmetropole project (Eibler et al., 2014; Vos & Gottschalk, 2009). It is also noted in the masterplan that all interested stakeholders in the region could have their say in order to make the Grünmetropole effective in terms of cooperation and development in the region (Bava et al., 2005). The roles of the various stakeholders, however, varied, ranging from designing and implementing the routes, to an advisory role to reflect on the designed routes. One interviewee who works at a Dutch touristic organisation explains: *"Selecting stops along a route was done in cooperation with municipalities and other organisations. They asked us to think about potential locations, so-called 'points of interest', but not for designing the routes. We could made proposals, like, did you consider this, or this, or this? I think we just had an advisory role as organisation at that time" (GM1: tourist officer, 2019).*

Also local (heritage) organisations had a supporting role in the design process. "Local nonprofessional history clubs were asked to get involved in the Grünmetropole project. Those who did participate could then propose historic objects, landscapes, or sites that could be interesting to make them part of the Grünmetropole' touristic routes" (GM2: policy officer, 2019). This person, however, notes that these local heritage organisations only had a supporting role, they had no decisive say in the design phase of the project (GM2: policy officer, 2019). In short, although the local (heritage) organisations, entrepreneurs, and communities had only an advisory role, they were able to influence the selection of points of interest, and thereby the route design of the Grünmetropole (GM1: tourist officer, 2019; GM2: policy officer, 2019). The 25 cooperation organisations were, however, responsible for the final design, implementation, communication, and financing of the Grünmetropole design. The project was implemented in spring 2008 and the designed route was materialised in the landscape by sign placements, information panels, and traffic signs (for a complete chronological overview see Figure 11). The 'Metropolisroute' was opened in May 2008; the 'Green route' in June 2008 (Vos & Gottschalk, 2009) (see map Figure 10). The routes only use existing roads, since this made it easier to design the route, and it was also more about creating a connection rather than designing roads (GM1: tourist officer, 2019; GM19: policy officer,

2019). Supporting information about the routes including maps were distributed through existing touristic infrastructure like tourist offices in the region. Information leaflets and route maps were made available in different languages.

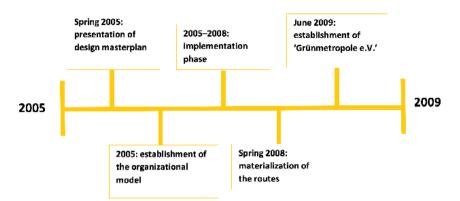


Figure 11 Timeline of the design phase of the Grünmetropole project, after Vos and Gottschalk (2009).

In the design phase of the Grünmetropole, we can identify two of the four phases of translation of actor networks. Interest refers to an external orientation of involving other stakeholders and fine-tuning of the plans to implement. This is recognisable in the process of designing the routes and the stops along the route. Enrolment in this design phase refers to the establishment of organisational models that were set up in order to implement and maintain the Grünmetropole routes.

5.3.4 Implementation and maintenance phase

After implementation yet another organisational model and another round of funding were set up to keep information about the Grünmetropole routes available and to further strengthen and promote the touristic services within the tri-national cross-border region. The new organisation, called 'Grünmetropole e.V.' was founded in June 2009 (Vos & Gottschalk, 2009). This organisation aimed at the maintenance and further development of the touristic routes in the region Aachen, including the Grünmetropole routes. Fourteen German organisations are part of 'Grünmetropole e.V.', mainly governments of cities in the region Aachen, as well as governments of the districts. Funding for these activities was available because of yet another INTERREG programme (see Figure 12). This INTERREG programme, called INTERREG IV A-Project TIGER (Touristic Valorisation of the cross-border European Region), aimed at enhancing the touristic profile of the German-Dutch-Belgian border region (Eibler et al., 2014). From 2008 until 2013 funding was available through this INTERREG programme. For this INTERREG programme, the organisation 'Grünmetropole e.V.' cooperated with several other organisations namely: tourist office Zuid-Limburg (Netherlands), Toerisme *Limburg* (Belgium), Parkstad Limburg (i.e., a regional cooperative between eight Dutch municipalities), and the Féderation du Tourisme de la Province de Liège (i.e., Belgian tourist office). Although these organisations were also involved in maintaining the Grünmetropole routes, it was mainly the German organisations (e.g. 'Grünmetropole e.V.') that put the most effort into keeping the Grünmetropole routes up-to-date. One interviewee who works at the tourist office Zuid-Limburg, explains: "In Germany a better marketing strategy resulted in the situation that the Grünmetropole is still up-to-date there. In the Netherlands, we decided to only maintain the routes without further marketing. Belaium is comparable to the Netherlands, they do maintain the route, although they do not really know what this route is about" (GM1: tourist officer, 2019). It appears that the 'Grünmetropole e.V.' is not well known: "It would be good if there would be an organisation responsible for the Grünmetropole nowadays, but I have no idea who that could be" (GM16: heritage officer, 2019). A policy officer working at a Dutch municipality adds that maintenance of the Grünmetropole routes was dependent on funding: "When funding stopped, the project also stopped, since no one was responsible any longer" (GM3: policy officer, 2019). In addition, "Maintenance is an issue. There was funding for just three or four years, and afterword's no money was available anymore" (GM1: tourist officer, 2019). Another person highlights the importance of political support: "They made nice maps and information leaflets, but there was no political support, thus the projects' soul is absent" (GM13: former miner, 2019). Thus, although a special organisation was set up to maintain the route, a lack of responsibility, funding, and political support resulted in degradation of the Grünmetropole routes.

At present-day both touristic routes are badly maintained and consequently barely used (GM1: tourist officer, 2019; GM11: tour guide, 2019; GM19: policy officer, 2019; GM21: tour guide, 2019). "You can see that it is just barely used by cyclists; they choose either the existing cycling network (Knoopuntenroute), or a route that is better marketed. This route was marketed 10 years ago, so people just don't know about it: they see the signs but wonder what it is about" (GM1: tourist officer, 2019). Another guide adds: "I was surprised when I read that you are interested in the Grünmetropole, I didn't expect that anyone would still be interested in the Grünmetropole" (GM21: tour guide, 2019).

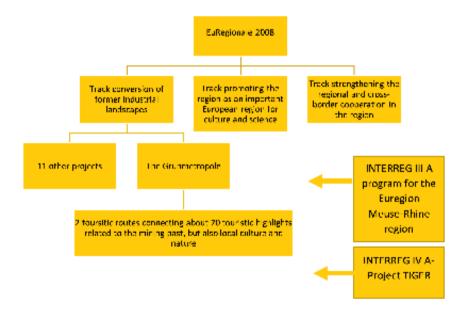


Figure 12 Overview of the relation between various aspects of the Grünmetropole project.

The implementation and maintenance phase of the Grünmetropole project is characterised by a process of enrolment as organisational models were set up to implement and maintain the Grünmetropole routes. Furthermore, other additional resources were made available, which is a characteristic of the enrolment phase. The setup of organisational models, and the involvement of various actors that should take care of the maintenance of the Grünmetropole, could be seen as an example of mobilisation of allies (the fourth phase in the translation of actor networks).

5.3.5 Wrap-up

The mining past influenced the identity and physical landscape of the area of the Grünmetropole. The end of the mining industry brought challenges regarding conversion policy and the reuse of relicts of the mining past. The Grünmetropole project aimed to contribute to the rehabilitation of the mining past by connecting the region and by focusing on tourism. In the setup of the project, different phases can be identified. First was the ideation phase in which the context was shaped and the Grünmetropole project emerged and the process towards the GM, in which various actors were aligned and the plan for the Grünmetropole, took its shape. This was followed by the design phase, and the implementation and maintenance phase in which the project was implemented and taken care of. These different phases reflect some of the different steps in the translation of actornetworks, as define by Callon (1986). Indeed, in the ideation phase, we can see the process of problematisation and of interest as conditions are created that made the initiative for the EuRegionale start. Moreover, the relevant stakeholders were identified, and the initiative was started by these stakeholders. The process towards the Grünmetropole is characterised by processes of enrolment as different actors are involved and various funds are made available in this phase. In this phase, also processes of interestment are still recognisable, as relevant actors are linked to the project and their interests are aligned in favor of the project. In the design phase of the Grünmetropole, we can identify two of the four phases of translation of actor networks: interest and enrolment. Interest refers to the external orientation of involving other stakeholders and fine-tuning plans to implement, and enrolment refers to the establishment of organisational models to implement and maintain the Grünmetropole routes. The implementation and maintenance phase of the Grünmetropole project is characterised by a process of enrolment, as organisational models were set up to implement and maintain the Grünmetropole routes. The setup of organisational models, and the involvement of various actors that should take care of the maintenance of the Grünmetropole, could be seen as an example of mobilisation of allies (the fourth phase in the translation of actor networks). Yet, as illustrated previously, it must be noted that the Grünmetropole never really got institutionalised, and the project was not embedded in a wider setting. The fourth step of the translation of actor networks (mobilisation of allies) is almost not recognisable in the different phases of the Grünmetropole project. After plotting the different steps of the Grünmetropole project, it is now time to take a more overarching perspective and reflect on the strategies and heritage approaches applied in this case.

5.4 Heritage approaches and strategies

5.4.1 Grünmetropole concept

The concept of the Grünmetropole was to connect the region and rehabilitate the mining past. A threefold goal was set up focusing on renewing the landscape, strengthening identity, and giving a touristic impulse (Bava et al., 2005). The selected goals as such were valued by the stakeholders. One interviewee especially liked the idea of overcoming cultural differences in the cross-border region: "I appreciate the overall intentions of this project to connect the region. In that regard it's a pity that the project failed" (GM2: policy officer, 2019). Other interviewees (e.g. GM1: tourist officer, 2019; GM3: policy officer, 2019) valued the project because it focused on one central topic, namely the region's mining past: "The Grünmetropole was one of the first projects that really put attention to a part of history that we tended to ignore until then. Until then we never paid attention to this part of our history; the Grünmetropole project tried to shift focus to this period of history" (GM3: policy officer, 2019). Another interviewee, however, questions whether the mining history is framed in a 'good way': "I can't hear people say what a 'cool history' because this history wasn't cool at all: people died because of 'miner's lungs', this story is unknown to the wider public" (GM13; former miner, 2019).

Focusing on three aspects appeared to be one of the pitfalls of the project. This is stated by one of the interviewees: "The project was too big, too complex. Historically speaking there was no connection, cooperation was contrived, and it was too comprehensive" (GM21: tour guide, 2019). Regarding the route itself, this interviewee thinks that this route was too complicated: "The route was just not well designed; I think it was too comprehensive and not well considered" (GM21: tour guide, 2019). Another person underlines this: "This project is not well thought-out: it is designed as a masterplan without having an overview of the project as a whole. As a result, not many people use the Grünmetropole route and this route does not help with explaining the region's mining past" (GM12: tour guide, 2019). In this regard, the approach of the project didn't help as it was foremost a nice plan that lacked links with other aspect, like local communities or existing spatial issues. Although one interviewee (GM1: tourist officer, 2019) states that "it would have been logical to address spatial issues as well", it turned out that this was not the case. "The Grünmetropole was too much on 'high-level', hence it wasn't able to really have impact on the local scale. It was an abstract masterplan, which was okay, but didn't lead to something. There was too much distance between this masterplan and reality" (GM19: policy officer, 2019). He adds: "I remember the study reports, which were in themselves quite interesting, but they didn't lead to a concrete, perceptible project, where we could work on at a local scale". The Grünmetropole had no, or only weak links with other projects or developments (GM2: policy officer, 2019): "The mining history is the most important factor to stimulate an endogenous potential including aspects like spatial planning, landscape, architecture, technique, and sociocultural aspects. I don't think these aspects were part of the Grünmetropole project" (GM16: heritage officer, 2019).

Thus, the potential of the project was recognised by various stakeholders at that time. But implementation was really a disappointment, because it was a promising project, but it remained only a well-designed promising plan (GM1: tourist officer, 2019). This quote (GM20: policy officer) summarises this discrepancy between the plan and the implementation: *"The Grünmetropole had some potential; there were some nice studies done at that time. It was an interesting approach, but it remained a theoretical story. When it was implemented, it was a rather pathetic implementation. There were only some signs, and some information signs, but these were located in weird locations. The Grünmetropole and the signs were like a weird UFO that landed here. Hence, the Grünmetropole is overlooked nowadays; I now only remember the name of the project".*

5.4.2 Governance and community

The discrepancy between the Grünmetropole plan and implementation was in a way disappointing. One reason for this could have been the governance approach used, which only had little room for incorporating stakeholders and communities' ideas. Various interviewees state that the Grünmetropole was a top-down organised project. One person explains that there was no room for participation and, referring to politicians and designers, said: "They remained deaf to what local citizen were saying" and "If you don't have academic titles, like professor or doctor, in front of your name, then they think you don't have any knowledge at all; they won't listen to you. But these people do in fact have the most valuable, local knowledge, way more important knowledge than people with academic titles like professor or doctor can ever acquire" (GM12: tour guide, 2019). Other interviewees underline this lack of community involvement, but do mention some other ways of participation: "I don't think there was community involvement; there were some discussion groups with local entrepreneurs who discussed the plans and decided to make a link with this project. And besides organisations such as the 'VVV Zuid Limburg' made proposals: did you consider this, or this, or this? But citizens did not make any proposals, no" (GM1: tourist officer, 2019). Also local nonprofessional heritage clubs were asked to propose objects or locations. But this was only a supporting role, without a decisive say about the design of the project. The lack of community involvement is seen as a major pitfall as this could have had an impact on the future development of the Grünmetropole: "There was a possibility to engage with citizens; if you don't do that at that moment you will never do that. Eventually however such a project has to be supported by citizens, because they are the potential users" (GM1: tourist officer, 2019). Hence, this led to a situation that the Grünmetropole does not live in the minds of the people (GM13: former miner, 2019).

At the same time, it should however be noted that the Grünmetropole project was developed and implemented in a period when community involvement was not a common practise at all. This is also recognised by the interviewees: "Nowadays I think there is more awareness of community involvement, especially in comparison to 20 or 10 years ago" (GM1: tourist officer, 2019). Indeed, now there is more interest in local stories and bottom-up developments. One person who works at a Dutch municipality in the area of the Grünmetropole, for example, explains that with regard to the mining history, they now initiate various projects to collect local stories and ideas: "Top-down projects, organised by a bigwig, don't work. Projects only work if local stories are

incorporated. You actively need to look for these stories and incorporate them into your projects" (GM4: policy officer, 2019). He mentions the project *'Jaar van de Mijnen'* (Year of the Mines), a year to commemorate the closing of the mines, which, according to him, was very successful because: *"This was not a top-down organised project, this project" was particularly interested in local stories. That was one of the strengths of this project"*. Also with regard to designing a route, like the Grünmetropole routes, these local stories and ideas should be taken into account. At least this is what a Belgian policy officer explains: *"It may sound logical to start from a regional story and then selects individual projects, but it works the other way round: you have to start with small entities, and then look for a connection within a certain area, or region, for example, the former mining region"* (GM20: policy officer, 2019).

5.4.3 Cross-border cooperation

Strengthening the region's identity and stimulating cooperation in the region was one of the three goals of the Grünmetropole project. The quotes from the interviewees showed a nuanced reflection on this cooperation. Cooperation in the border region is, in general, regarded as a good thing, but the cross-border aspect is mentioned as a complicating factor, and the link with tourism is regarded questionable.

Several interviewees state that cross-border cooperation is one of the main strengths of the Grünmetropole project (e.g., GM3: policy officer, 2019; GM19: policy officer, 2019). "The initial aim of this project was to present the mining history of the region, and to stimulate cross-border cooperation. Those are interesting things to focus on, and at that time, we saw some initiatives that indeed focused on cooperation. Of course, there was a language barrier, but still it was good to cooperate at a regional scale. This project helped start building these connections" (GM1: tourist officer, 2019). The Grünmetropole project is seen as a "valuable learning experience" (GM3: policy officer, 2019) and in fact led to cooperation: "Cooperation is nowadays quite good in this region. We work on several international projects" (GM1: tourist officer, 2019). Although cooperation led to some concrete results, the cooperation within the project Grünmetropole was not always fruitful. "International cooperation as such is a good goal to set and closer cooperation in this border region is really needed. Unfortunately, however, this project is not a good example of international cooperation. Maybe this region is just too big to really create cross-border cooperation, or maybe too many stakeholders were involved" (GM12: tour guide, 2019). Other reasons that cross-border cooperation never really came off the ground are mentioned by a former Dutch miner: "This region is characterised by the perils of village politics, each city has his own initiatives and the provincial government does not make guiding decisions, so nothing happens. Besides, regional and cross-border cooperation needs to be organised by the government. Yet, they don't pay attention to this topic because it is not interesting enough, electorally speaking" (GM13: former miner, 2019). Next, the cross-border aspect is mentioned as a complicating factor: "Historically speaking, there has never been a link between the Belgian, Dutch, and German mining regions. The Grünmetropole tried to make a link that's not there. If people want to make a link between the three countries they use Facebook to communicate with their German and Dutch friends, but not a route like this" (GM21: tour guide, 2019). And finally the touristic aspect is regarded as a complicating factor, as explained by both a German

and Dutch tourist officer: "Cross-border cooperation with regard to toursim doesn't work; there is always competition and different interests, and cross-border cooperation is simply very difficult to realise" (GM6: tourist officer, 2019). "Although there are some cross-border routes, we see that most routes end when they reach the border. Our policy is too much focused on individual regions and countries instead of connecting these routes by cross-border cooperation" (GM14: guide museum, 2019).

5.4.4 Activities: tourism

Within the Grünmetropole project, the goals of revitalising mining heritage, and stimulating tourism were intertwined. A touristic route was implemented to inform the public about the mining past in the region. This is also recognised by the interviewees who, however, state that it is important to inform the tourists about the heritage they encounter along the route: "Information leaflets and signs are needed to tell about the history and heritage of a particular region; it brings the objects 'alive' again" (GM2: policy officer, 2019). This is underlined by another interviewee, who questions whether tourists actually read the information that is provided: "People want to know about the history, or about what they see. Providing information along the route is important. At the same time, I don't think citizens know a lot about the routes in the landscape. I think you will be surprised" (GM1: tourist officer, 2019). Moreover, tourists are also misinformed or even fooled by touristic routes, as a Dutch policy officer elaborates: "The mining past cannot be linked to touristic activities since there are almost no visible relicts of the mining past. Stories are now made up at places where mining activities used to be, but this is not 'readable' for a tourist who comes here. Designing a new route about the mining past is a sign of a lack of creativity; if you run out of creativity, you *come up with a route*" (GM3: policy officer, 2019). He furthermore states: "I think we're putting too much attention to this mining past. If there is no link, you cannot make a link with the past".

Although some interviewees question whether the mining past can be linked to tourism, storytelling and region-branding are seen as important aspects of tourism: "We are constantly looking for new storylines to tell, to make and keep this region attractive for tourists" (GM7: tourist officer, 2019). That there are not much relicts from the mining past left doesn't seem to be a problem: "A location can be opened up to the broader audience by telling the stories of that place, objects are useful for that, but not necessary" (GM7: tourist officer, 2019). Hence tourism is a very important economic sector in the area of the Grunmetorpole, and branding touristic routes is an important aspect. This however also leads to competition, as a Dutch tourism officer explains: "Routes are really an issue in this region, we always promote that. But now there are so many projects, so many routes, we need to choose certain storylines. The Grünmetropole is also a storyline, and if we can, we will try to promote this route as well. In the region South-Limburg, however, there is more supply than just the Grünmetropole route: we can make various storylines about the Mergelandroute, the hills, the wine, the Burgundian lifestyle, our pies: there are about 15 powerful storylines that we can brand and promote. The mining history is a powerful storyline, absolutely, but we can't just focus on one storyline, as they did in the Aachen region, that we won't do, because our touristic supply is too important" (GM1: tourist officer, 2019).

5.4.5 Impact and evaluation

Focusing solely on the Grünmetropole routes would not be a good idea since the impact of the routes appears to be limited as various interviewees explain. "The Grünmetropole is history. I was surprised when I read that you are interested in the Grünmetropole. I didn't expect that anyone would still be interested in the *Grünmetropole*" (GM21: tour guide, 2019). This is underlined by two other interviewees. "The Grünmetropole is now heritage itself" (GM24: heritage officer, 2019). "That's already a couple of years ago, about 10 years ago, so I don't know exactly. I know about it because I remember some of the documents made. But I don't remember concrete results at this moment, except the information signs which can be found at all the mining sites in Limburg, but they are alienating, I think. I just remember the name of the project. Besides, the signs are still there, actually this morning I spotted a sign indicating the car route of the Grünmetropole project" (GM20: policy officer, 2019). The alienating effects of the route signs and the mistakes in the design of the routes itself are mentioned several times as reasons for the lack of impact of the Grünmetropole routes. "This project never functioned the way it was designed. The signs are useless; they are not well designed and, besides, they are located here in Eisden on a location where no tourist or cyclist will notice it. People maybe look on internet or websites about information about the mining past, but the cyclists who pass by here are either just looking for a place to have a drink or for some information, only some of them indeed stop and read the information. That's also due to practical aspects because this info sign is placed in the wrong direction; no cyclist will notice it" (GM21: tour guide, 2019). Another interviewee noticed that: "It is just stupid that this route goes from A to B; that does not work. It would have been interesting to make a round tour, especially because they want to promote cross-border tourism" (GM1: tourist officer, 2019). In addition, practical issues, such as money for maintenance works, are mentioned as reason for the lack of impact of the Grünmetropole routes. "Even before the project was well implemented, it turned out that there was no money available and that maintenance works could not be done anymore. This was really a disappointment, especially for local entrepreneurs" (GM1: tourist officer, 2019). All in all, this led to a situation where: "There are now nice maps, pictures, and information leaflets, but they are not very practical, so where did that bring us?" (GM12: tour guide, 2019). Various interviewees (e.g. GM1: tourist officer, 2019; GM11: tour guide, 2019; GM19: policy officer, 2019) indeed state that the information leaflets are not distributed any longer, and that the routes are rarely used.

5.5 **Reflection**

The above section provided a reflection on the Grünmetropole by considering the data from the case observation. Combining the data from the case study, with a comparison between the GM and other projects, and by underpinning the data with reflections in newspaper articles from different periods, it becomes clear that there are three main reasons that can explain the rather negative feeling about the Grünmetropole project. First of all, it's about practical aspects and the lack of practical agreements. As seen in the previous sections, interviewees mention that even at the time of the implementation there were questions about some practical aspects, like the placing of information signs and the design of the route itself. Moreover, interviewees mention the lack of practical agreements about funding, a plan for the Grünmetropole after implementation, and maintenance in the long term. These aspects have all had a negative impact on the success of the Grünmetropole. Nowadays, for example, some information signs as well as signs indicating the route, can still be found in the landscape whereas others are gone due to vandalism, renovation works, or changes in the spatial context (e.g., new infrastructure). The tourists who come to the region now can't possibly cycle the entire route as signs are missing, or they may wonder what this route and the signs are about. Maps or other information cannot be found anymore since the website is not maintained and information leaflets were never reprinted after they sold out. All in all, this resulted in a situation where the signs and the routes are 'alienating', as one of the interviewees called it. In fact, as is mentioned by several interviewees, the routes are only barely used nowadays, and the Grünmetropole is unknown to both locals and tourists.

A second reason explaining the negative perception of the Grünmetropole project can be identified by looking at the governance model applied, and more specifically the lack of community involvement. As stated by the interviewees the Grünmetropole was a top-down organised project. Although there were some forms of participation, decision making was done by the designers of the project. Local citizens were not included in the design and decision-making process at all. It is questionable whether the lack of community involvement should be regarded as a negative aspect since community involvement was not common practise at the time of designing this project. Yet at the same time it is mentioned that the lack of local knowledge had a negative impact because local stories and bottom-up developments were not included in the plans. This was yet another reason leading to a situation that the project didn't land at the local or individual level. Now, community involvement is a more common practise in spatial developments. Some of the interviewees named more recent projects (e.g., Jaar van de *Mijnen* project), that did incorporate local stories, thereby showing that these projects are better known among local citizens, but also catalysed new, bottom-up developments. The lack of community engagement within the Grünmetropole project can thus be partly explained by looking at the applied governance model. Linking the project to local bottom-up initiatives and incorporating community stories would probably have led to a more interesting route, and to more engagement at present day.

A third reason explaining the negative perception of the Grünmetropole project is the approach used within this project. It was not only a top-down plan in terms of governance model applied, but also in terms of how it was brought to this region. It was a high-level, abstract, visionary masterplan that had almost no links with the existing spatial issues, or sociocultural patterns in the region. The consequences of this are practical as it didn't lead to concrete, perceptible projects at the local scale, as one interviewee indicated. This plan was implemented in a way that it was just materialised in the landscape without having a concrete impact. It should also be noted that the method used (i.e., designing two touristic routes) didn't really address the issues the region was dealing with. Due to this approach, and the methods used, the Grünmetropole never became a catalyser for stimulating development in the region. In fact, because there were no concrete projects linked to the project, and because the project was not linked to other ongoing projects, the Grünmetropole never achieved the goal of renewing the landscape. Next, using this approach once more contributed to the mismatch between plan and local perception as it didn't help the region. As a result not many citizens know about this project or have a personal link with it. Also with regard to the goal of cross-border cooperation and connecting the mining regions in the three countries, it is questionable whether this plan really contributed to these goals. The overall impression from the interviews is that the project was more or less forced upon the region. Creating a common identity and organising cross-border cooperation are difficult processes in themselves, and should be developed over time, instead of forcing them on a region by implementing a plan like the Grünmetropole. In this regard, the most remarkable reflection to be made relates to the conceptualisation of heritage and related heritage management approaches. Designing a route along the relicts of the mining past in order to let tourists experience is an indicator that heritage is seen as a material object that can be exploited for reasons of tourism. This is not a comprehensive and adequate conceptualisation of heritage, since it is a selective understanding of which objects are understood as heritage and can thus to be incorporated into a route. When you ask local citizens what they understand as heritage, other -immaterial or more personal – ideas of heritage come up. Seeing heritage as an object that can be used for reasons of tourism contributes to a mismatch between design and reality since these projects don't connect with local stories or more personal ideas about heritage. Interviewees also stated that the mining past is not just about the physical relicts in the landscape or about the authorised stories that are told. It is more about the personal, immaterial aspects, and feelings – the feelings of being a miner. Without incorporating local conceptualisations of heritage, these aspects cannot be captured in the design of a touristic route that is designed from a top-down perspective, with a strong focus on material heritage objects.

The three abovementioned reasons summarising the negative perceptions of the Grünmetropole project are based on case observations (i.e., data from interviews and field observation). The case observations thus represent value judgements made at present day, more than ten years after the project was designed and implemented. But there are also more positive reflections about the project especially regarding the main stakeholders involved in the EuRegionale 2008 project (see Vos & Gottschalk, 2009, p. 40). These stakeholders see the Grünmetropole project as a successful project, especially regarding cross-border cooperation and the creation of the touristic routes. The fact that a cross-border route was developed and implemented is valued, and the high number of maps distributed is seen as an indicator for the success of the routes. At that time (2009), none of the stakeholders seemed to worry about the future of the route and maintenance activities. They saw the cross-border cooperation as a lasting activity that would ensure the future of the Grünmetropole project, and specifically of the routes (Vos & Gottschalk, 2009). Likewise, also in the booklet that discusses the ideas of the Grünmetropole (Heinrichs et al., 2008), the project is regarded as very successful. It is stated that the Grünmetropole contributed to a feeling of communality in the region, and that it stimulated cross-border exploration in the sense that both citizens and tourists started to get interested in the common history of the region. In newspaper articles of that time (e.g., De Standaard, 2006) some more sceptical remarks can be found. In an article of De Standaard (2006), concerns are shared that the Grünmetropole would be just a gushy, city-branding story, without concrete ideas or projects that would stimulate developments in the region. They condemned the lack of a well-thought-out concept underpinning this project as it is mainly framed as a nice region-branding story. Finally, they note that the Grünmetropole plans degenerated local citizens into users/tourists instead of seeing them as a potential source of input of local knowledge (De Standaard, 2006). In a local Belgian newspaper Het Belang van Limburg, we read critics that say that the Grünmetropole project was too much backwards looking instead of a driver for future developments (van den Revt, 2006). At the same time reporters in various newspapers noted that stakeholders, and especially those involved in the project, nevertheless expected a lot from the project (e.g., Swinnen, 2006; Swinnen, 2007; Van den Reyt, 2007). In 2011, a reporter of the online blog ZuiderLucht reflected on the Grünmetropole project by interviewing several stakeholders who were involved in the setup of the project (see van der Steen, 2011). Although the interviewees in this article name some positive aspects, the overall perception in 2011 (only four years after implementation) is rather negative. The concept of the project is criticised, the cross-border cooperation is mentioned as a failed attempt, and it is stated that the project doesn't live in the minds of the people (van der Steen, 2011). To sum up, although the project was initially evaluated rather positively, opinions changed over time into a more negative perception. Hence, both the reflections in the 2006/2007 as the one in 2011 show striking similarities with the remarks of the interviewees of today.

Nonetheless, it should be noted that at the time of implementation of the Grünmetropole project (between 2005 and 2008) the promotion of industrial heritage tourism gained popularity in a number of industrial areas in the European Union (Hospers, 2002), as industrial heritage tourism was seen as an effective means to preserve cultural heritage and save it from degradation for future generations (Szromek et al., 2021). Moreover, Hospers (2002) and Vargas-Sánchez (2015) noted that industrial tourist activities are said to preserve a region's identity and are a helpful tool for regional restructuring as it stimulates the formation of local service activities and employment. Yet in practise, the effects for regional restructuring appear to be often limited, especially since these projects are normally excessively subjective and dependent on designers' and developers' determination, giving little attentions to people's needs and desires (Loures, 2015). To overcome this, Loures (2015) noted that post-industrial land transformation projects should pay more attention to creating a more harmonious relationship among the project and its surroundings, and a better connection with the social and economic interests of the community.

In this regard, it is striking to see that even at the time of the Grünmetropole project, other projects dealing with the mining heritage were implemented in a similar manner. In the Belgian mining area, for example, a project called *'Masterplan Mijnstreek'* (Masterplan Mining area) dealt with the exact same spatial issues, such as bringing the relicts of the mining past alive again. This masterplan was also produced in 2008, yet there are no links made with the Grünmetropole project (Mols, 2008). But it is even more striking to see that even today projects are designed and implemented that address almost the same goals as the Grünmetropole project, and propose more or less similar measures with regard to spatial planning and tourism. A Dutch policy officer, for

example, elaborates on a project called 'Leisure Lane'. This project is about creating a touristic route that connects various attractions and informative stops. So, there is a similarity with the Grünmetropole project in the sense that it a route and stops are designed. Moreover, the interviewee explains that there are similarities in terms of governance model applied: "This is once more a top-down organised project, which are forced upon us. Maybe we should dust off the Grünmetropole project again, instead of making new projects" (GM2: policy officer, 2019). Another interviewee adds to this a project called 'Mijnspoor' (Mine trail). This project is about transforming a former mining railway into a cycling path that leads tourist along relicts of the mining past in the region. The interviewee states: "I'm wondering for whom these projects are intended. I think we're putting too much attention to the mining past. Designing a new route about the mining past is a sign of a lack of creativity; if you run out of creativity, you come up with a route" (GM3: policy officer, 2019). He is very skeptical about this route since the route – similar to the Grünmetropole routes – tries to make links that aren't there: "Tourists will wonder how this route links to the mining past because they can't see any relicts of the mining history. Tourist will say: where is this mine you're talking about?" (GM3: policy officer, 2019). Also in the Belgian part of the mining region, new routes around mining heritage are designed. A project called 'Kolenspoor' (coal trail) aims at exactly the same goals as the Grünmetropole project. The similarities in goals is not concealed by the interviewees as one of them says, "This route has the same aim as the former Grünmetropole project, since they both try to connect various mining regions and promote it as one entity; we try to link various mining sites by using a former mine trail" (GM18: tourist officer, 2019). Another interviewee adds: "Kolenspoor is again a quest to find each other and to cooperate, and it is once more a quest to link the former mining sites" (GM19: policy officer, 2019). Many other examples of (cross-border) touristic routes, in all three countries, could be named here. But the point is that these routes not only try to achieve more or less similar goals, but also use more or less similar principles such as designing a route, making links between mining areas, and attracting tourists to mining heritage sites.

Yet, by doing so the same missteps are made. Implementing top-down designed touristic routes keeps contributing to a mismatch since they are routes on a map that don't really land in practise and thus remain as nice plans only. Moreover, focusing on tourism can be a goal, but this goal can't easily be linked to other goals like renewal of the landscape and addressing spatial heritage issues. Hence, linking the development of a touristic route to the goal of addressing spatial issues seems to be doomed to failure from the start. In addition, designing touristic routes is not very creative, as there are many such routes being designed and implemented. It is also not very sustainable since it is adding new routes to the existing touristic supply, and designing a new route when another route doesn't work.

5.6 Conclusions

The analysis of the case presented in this chapter provides ingredients that contribute to an answer for the sub-research question of this chapter: how does a relational heritage approach manifest itself in present-day European heritage practises, and how is this relational approach sustained over time?

Within the region of the Grünmetropole we noted a discrepancy between the implemented project and the communities' understandings of heritage. Indeed, a policy officer made this clear by saying: "There is now a generation who is not familiar with the region's mining past, but who is nevertheless looking for their roots in order to understand developments in their living environment" (GM24: heritage officer, 2019). We observed that various local communities within the respective mining regions deployed small-scale initiatives related to the mining past, which were set up to address this issue. Such initiatives, we argue, can be regarded as co-evolutionary, as there is an interaction and relatedness of material and immaterial heritage assets, local and/or heritage communities and spatial (re)development. In the former mining employees' neighbourhood of Eisden (Flanders), for instance, citizens undertook all kinds of social activities aimed at strengthening the community, and also its identity. A small-scale museum was erected, documentaries were recorded, and art projects were launched, all about life in (a former) mining town. These initiatives were initiated and supported by the local community. Some of these activities particularly addressed the special character of the former Garden City-designed working-class neighbourhood. As part of an art project, trees in the neighbourhood were decorated with small statues of Saint Barbara, which referred to the mining past (as this saint is known as the patron saint of miners). A project was launched to plant new hedges in the neighbourhood. This was done to strengthen the Garden City design of this area, but also to teach new residents and the younger generation about the, for some unknown, history and identity of the neighbourhood. These projects were not necessarily linked to the preservation of an object, but were more about identity, practises, and immaterial aspects. These practises, or 'ways of doing' are rather informal dealings with heritage, and even the citizens themselves would not regard these as heritage management practises. Yet, these practises are an expression of how a community and individuals understand and value heritage. This is also underlined by a local tour guide who states: "Heritage is about symbols, it's about local stories, not just the authorised stories; that's what we try to do here, preserve local personal stories" (GM21: tour guide, 2019). Such personal engagements with heritage were, however, not incorporated into the Grünmetropole project. Nevertheless, these projects still linger on, and even inspires policy makers, not only in Eisden, but throughout the entire mining region.

Indeed, by reflecting on the case, it appears that the applied heritage management approaches in combination with the lack of stakeholder involvement led to a project where there was almost no room for incorporating more personal, or immaterial ideas of heritage. Heritage reuse practises, as well as spatial plans (like designing a touristic route) should address communities' and individuals' ideas of heritage in order to land in the existing physical, but also to land in the sociocultural or 'mental' landscape of the region. The Grünmetropole lacks this bottom-up perspective on heritage and regional sociocultural aspects. To incorporate communities' and individuals' ideas of heritage in regional, spatial but also socioeconomic developments, heritage management and design process should focus on creating connectedness, collaboration, and community engagement. This cannot be dealt with through a conventional top-down, organised, object-focused heritage approach alone. Also, in terms of interrelatedness of the various aspects of the heritage assemblage, it must be noted that the Grünmetropole project mainly addresses the relation between material heritage and spatial development/ identity. The relation between the local heritage communities and heritage values/ spatial developments was not really established. The Grünmetropole project did manage to establish an assemblage of smaller assemblages, as various heritage sites were linked to each other by the design of a route. Yet, this assemblage of assemblages was set up in a kind of 'vacuum'. The Grünmetropole never really got institutionalised, and the project was not embedded in a wider setting. Almost no relations were made with other, existing plans. It can be concluded that the fourth step of the translation of actor networks (mobilisation of allies) is almost not recognisable in the different phases of the Grünmetropole project.

Overall, it must be concluded that the strategies and applied heritage approaches in this case did not lead to the implementation of a relational, let alone co-evolutionary, heritage approach. The lessons learned from this case is that a more local, open, and dynamic conceptualisation of heritage should be the starting point of a redevelopment process or spatial plans in order to be successful. Yet, it remains difficult to capture such dynamic and personal expressions of heritage in heritage approaches that either follow an object-oriented or process-oriented approach.



LINKING PAST AND PRESENT 2: PRAGA DISTRICT, WARSAW

In this chapter the analysis of the second single in-depth case study is presented. In this case, both steps of the analysis are applied: describing the assemblage, and identifying changes throughout time. The area of investigation in this chapter is the Praga district in Warsaw, Poland. It is one of the 18 districts of Warsaw, and is mostly a dense, working class neighbourhood. The Praga district, as many other Warsaw industrial quarters (e.g., Wola, Ursus), has suffered significant economic decline as a result of deindustrialisation after 1989 (Pawlikowska-Piechotka, 2010). For a long time, Praga remained an area outside the shelter of the developing city of Warsaw. In the last few years, however, Praga district made some very far-reaching changes in terms of modernisation of the built environment, the adaptation and reuse of heritage objects, and changes in the structure of the local community. As a matter of fact, the opening of the second line of Warsaw metro provided a gigantic stimulus for development. These developments may cause processes like gentrification and urbanisation, which in turn can override the dynamism of the district. Therefore questions can be raised about how the heritage in the district can be reused in conjunction with local and/or heritage communities and ongoing issues of spatial (re)development.

This chapter aims to answer the sub-research questions: How does a relational heritage approach manifest itself in present-day European heritage practises? And how is this relational approach sustained over time? First, the heritage assemblage of Praga district is described in order to illustrate the complex situation of Praga's heritage and community at present day. This section will also address the actors, factors, and institutions impacting each aspect of the assemblage. At the end of this chapter an example of an ongoing heritage reuse practise is provided, to illustrate how, and by which methods, tools, and heritage approaches, a specific actor in Praga district (i.e., PragaLab) tries to influence the complex heritage assemblage and social and institutional context. The chapter is finalised by answering the sub-research questions.

6.1 Introducing the case

Praga district is located in Poland's capital city, Warsaw. With 3 million residents, the Warsaw metropolitan region is today the ninth most-populated capital city in the EU (Dziemianowicz & Szlachta, 2019). It has undergone a series of far-reaching changes over the past 50 years to attain this status. In fact, as a result of the Second World War, Warsaw lost the position of a leading cultural metropolis that it had held within Europe during the interwar period. This was caused, among other things, by the catastrophic destruction of the city's physical infrastructure and the extermination of large parts of the population during the two uprisings in 1943 and 1944 (see Figure 15). For these reasons, the idea emerged to relocate the Polish capital to the city of Łódź, which had been damaged to a much lesser extent (Vetter, 2020). But from January 1945, people started to return to the ashes of Warsaw, and Communist authorities decided to join them in efforts to rebuild the city as the capital (Vetter, 2020). Reconstruction of Warsaw within the confines of a centrally planned economy had its limitations, as a consequence of the existing political structures, which included weak municipal economic management, the abolition of territorial self-governments, and cancelation of participatory decision-making in city planning (Dziemianowicz & Szlachta, 2019).

When Warsaw returned to a neoliberal market economy in the 1990s, it inherited a unique set of conditions. These included poorly organised and poorly integrated public transport, ubiquitous prefabricated housing blocks, a distinct lack of single-family homes, numerous empty spaces, a very complex ownership pattern with hundreds of historic property owners demanding restitution from the new state, and almost no legal or regulatory instruments to prevent sprawl (Dziemianowicz & Szlachta, 2019). This in turn led to a cycle of haphazard development, sprawl, and a proliferation of low-density suburbs (Dziemianowicz & Szlachta, 2019). Since the empowering of territorial local governments that occurred at the beginning of the 1990s in connection with the system transformation towards a neoliberal market economy, and Poland's accession to the European Union in 2004, Warsaw has become one of the fastest developing cities in Europe (Sadowy & Lisiecki, 2019; Vetter, 2020). In particular, urban tourism has become of increasing importance in Warsaw during the last two decades (Pawlikowska-Piechotka, 2010). Yet, it must be noted that most of the developments took place in the districts on the left bank of the Vistula river, and not necessarily in districts like Praga on the right bank.

6.1.1 Praga district

Praga District is one of the 18 districts of Warsaw; it is a constituting independent commune and has a population of about 185,000 inhabitants (Warsaw has approximately 1.8 million) (Central Statistical Office in Warsaw, 2020; Statistical Office in Warszawa, 2021). The district is a densely populated, working class neighbourhood covering an area of 22.4 square kilometres (Warsaw constitutes 516.9 square kilometres) with a population density of 8,329 inhabitants per square kilometre (Warsaw has a density of 3,275 inhabitants per square kilometre) (Central Statistical Office in Warsaw, 2020) (see Figure 13). Today, there are two districts in the administrative division: Praga-Północ in the north and Praga-Południe in the south.

The name of the district Praga is used for a territory without clear borders, and Praga can mean different things to different people (Czeredys et al., 2020). Indeed, residents, town planners, activists, and heritage specialists note that the name Praga can mean different territories; it sometimes refers just to Praga-Północ and Praga-Południe, and sometimes covers the entire area east of the Vistula River– some Warsaw inhabitants refer to the entire right bank part of the city as Praga (see Figure 14) (Dominika et al., 2020; Sadowy & Lisiecki, 2019).

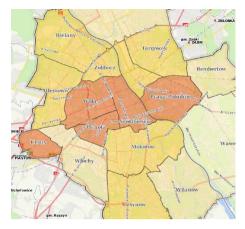


Figure 13 Map showing the population density in districts of Warsaw in 2019 (persons/km²), the darker the colour, the higher the population density. Map source https://mapa.um.warszawa.pl/



Figure 14 Location of the Praga districts in Warsaw (map source Sadowy & Lisiecki, 2019).

6.1.2 Praga history

In their book on Praga, Czeredys et al. (2020) included an overview of Praga district's history which is summarised below in order to provide an introduction on the development of the urban structure and heritage of the neighbourhood.

The first mentioning of Praga dates back to 1432 when it was one of over a dozen villages owned by the nobility or dukes on the right bank of the river. The economic growth in this area began in the mid-sixteenth century, when Warsaw was chosen as the seat of the rulers of the Polish-Lithuanian Commonwealth. It was then that a bridge was built that connected the city with the right bank which in turn led to the investments in various buildings: malt houses, brickworks, a brewery, and a salt mine. As a result, by the second half of the eighteenth century, a sizeable settlement conglomerate was existing in Praga. The next step in the process of incorporating right-bank settlements into Warsaw was the erection of the Lubomirski Ramparts in 1770, an earthwork intended as a sanitary measure to stop the plague epidemics raving Europe at that time. Due to the Polish-Russian war of 1831 and other tragic events, the nineteenth century in Poland was a time of slowly rising from ruins and, at the same time, of grand remodelling. It was the emperor Napoleon who decided that Praga fortresses would be extended into the Warsaw Fortified Area. At the time Praga housed a fortified encampment surrounded by a circumvallation and eight redoubts, an abutment, and an open field of fire. For these ramparts, houses needed to be demolished. As a result, the neighbourhood changed its character: the vibrant suburb – full of people, inns, and residences – turned into a sleepy city with a more pronounced agricultural character (Sadowy, 2019). The number of residents fell by approximately three thousand.

During the period of Congress Poland, when Napoleonic fortifications lost their importance, a number of urban planning ideas emerged with views to the district's regulation and reconstruction. Jakub Kubicki's plan from 1817 is the best known. The plan focused on integrating Praga with the rest of Warsaw by creating a central axis and various facilities like markets and offices for administration. Despite having been developed in a comprehensive manner, the plan was never completely realised. Future plans, however, clearly drew on its ideas. In 1864 a new spatial plan was launched, which referred to the concept of radial streets from the Kubicki's project. Thanks to the construction of dozens of factories, a permanent bridge over the Vistula River, and two railway connections, Praga was finally able to compete with other districts.

The railway investments of the 1860s indeed marked a breakthrough in Praga's history. The opening of two stations in Praga provided a major stimulus for the district's further development. On the newly designated plots in the vicinity of the station, private owners built elegant tenement houses. In the last decades of the nineteenth century, all kinds of developments took place, and new and important institutions sprang up in Praga, including a hospital, schools, and the first academic institution on the right bank of the river. Also Targowa Street underwent a thorough transformation around 1880, when this muddy market street turned into a spacious, elegant boulevard. Traditional trade moved from the streets into the courtyards. This is also the period that the most famous market in Praga, Różycki Bazaar, came into being (Czeredys et al., 2020). The vicinity of railway lines also marked the industrialisation of the district. The railways linked Praga to other places, and low land prices stimulated this process of industrialisation even more (Sadowy, 2019). In addition to small craft enterprises, hidden in the backyards of densely located tenement houses, relatively large factories were built (Dominika et al., 2020). Among the biggest and most widely recognised Praga factories were a vodka factory on Zabkowska Street (today known as Koneser), the premises of Joint Stock Company of the Linen and Jute Manufacturer (today Soho Factory on Mińska Street), and the Schicht-Lever SA Fat Industry Factory on Szwedzka Street (Czeredys et al., 2020).

The turn of the twentieth century was a time of modernisation and building development; new tenement houses up to five floors tall dominated Warsaw, including Praga. After the First World War, the area of Praga suffered from a lack of investment. The 1916, the Preliminary Draft of the City of Warsaw Regulation Plan developed by the Architects Club aimed at transforming the entire military grounds located on the north of Listopada Street into a modern residential estate. Ultimately, only houses for officers were built, whereas numerous other projects for the public remined unrealised. Nevertheless, in this period, large investments to modernise the entire Warsaw were envisaged, of which some were realised in Praga as well; the Praski Hospital, the Praski Port, the zoological garden, a large tram depot on Kawęczyńska Street, and modern school complexes.

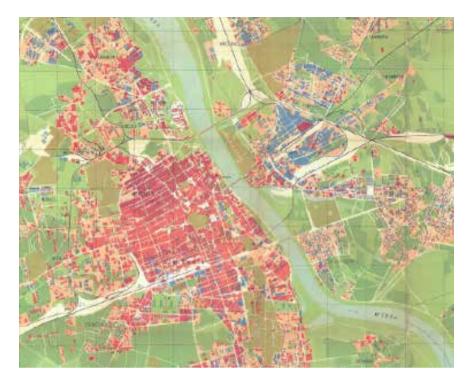


Figure 15 Damage after WWII. During WWII, Warsaw was heavily attacked. In 1948, the war damage was mapped by Biuro Odbudowy Stolicy, (i.e., the Office for Capital Reconstruction). In red are the parts of the city that are completely destroyed by attacks (bombing and fires) during the war. In blue we see the districts where the buildings are only partly damaged. The map convincingly indicates that Praga district was significantly less damaged than other parts of the city of Warsaw. It is for this reason that a lot of the industrial heritage of the industrialisation period is still present in Praga. Map source: Inventory of Damage caused during 1939–1945 (from aerial photographs in 1945 by Soviet pilots) (1948) – L. Kowalski F. Piątkowsk in Casteels et al. (2020).

Since Praga was not heavily damaged as a result of WW2 warfare (see Figure 15), the municipal and state administration chose it as their seat. And yet Praga's old tenement houses were in danger once again, as these houses did not align with the ideas of the new political system. In the language of propaganda, these were seen as 'a difficult legacy of the bourgeois era' and as such were soon to give way to modern housing estates full of sun and greenery. Hence, in the time of the People's Polish Republic various projects were implemented: the Praga cinema, a modern railway station, and Warszawa Wschodnia – a half-kilometer-long block of apartments opposite the Warszawa Wschodnia Railway station. In line with the guidelines of the Association of Polish Architects, this building blocked the sight of the old tenement houses – which were not seen as a source of pride – from the eyes of passengers passing Warszawa Wschodnia Railway station.

The post-1989 period was marked by the decrease of numerous factories operating in Praga (Czeredys et al., 2020). The transition period coincided with the trends encompassing Europe and many developed countries. It was the transformation from the economy of production to the intangible economies – digital, knowledge-based, and services-driven. In Poland the scale of deindustrialisation was one of the most significant in Europe, not only in well-known industrial centers such as Lodz and Silesia, but also in the capital city (Sadowy & Lisiecki, 2019). Between 1994 and 2001 in Warsaw, the per cent of inhabitants employed in the production sector decreased from 25.6 per cent of the total labor force to 14.8 per cent (Gorzelak and Jałowiecki, 2007 in Sadowy & Lisiecki, 2019).

However, this decline was accompanied by a proliferation of small enterprises. This especially suited Praga; hence, it continued to serve the role of a supplier of goods for Warsaw, and beyond. After 2000, a gradual transformation of abandoned places into exclusive residential estates began. Opening the second line of the Warsaw metro provided a gigantic stimulus for these developments. The former vodka factory, for instance, was transformed into a new luxurious flagship for the entire district, and was hailed as the essence of Praga district and pure tradition (Czeredys et al., 2020).

Summarising the above history of Praga, we can conclude that Praga is a testimony of rapid economic change and a variety of economic activities but also an area with poor living and working conditions. Indeed, the character of Praga can best be described as a working-class district. In Praga living conditions used to be poor, with waterlines constructed in 1880s but operating for only 61 per cent of housing sites and sewage system being introduced as late as the early twentieth century (Hummel, 2018, in Sadowy, 2019). Indeed, at present day, the poor technical state of the district and the image of the working-class district is still reflected in the public opinion of Praga. Characteristic nineteenth-century tenant houses with inner courtyards, mixed with former factories, barracks, and industrial mansions still characterise the urban atmosphere. These buildings survived World War II and – contrary to the left bank – the authentic pre-war character is preserved in Praga.

This is where the right and left bank of Warsaw is fundamentally different – in Praga, the myth of a city rebuilt from rubble does not appear as powerful and formative (Czeredys et al., 2020). The district instead has its own formative narrative cultivated, based on spirit, dialect, a notorious image, a gritty reputation due to the high crime rate, and being an isolated area (Pawlikowska-Piechotka, 2010). However, over the past decade Praga has partly shaken off its image and has become an integrated part of Warsaw. Today, Warsaw, as well as Praga, are places of rapid spatial and social development. Therefore questions can be raised about how the heritage in the district can be reused in conjunction with local and/or heritage communities and ongoing issues of spatial (re)development.

6.2 **The heritage assemblage**

In Praga district spatial developments lead not only to a physical change of the landscape, but also influence the socio-demographic characteristics of the district. In this section we will describe how heritage is constituted by describing the elements of the heritage assemblage.

6.2.1 Material heritage

The heritage of Praga is often perceived in the context of the whole city of Warsaw, as Praga is – opposite to the rest of Warsaw – mostly an authentic, historic area that survived the destruction of World War II (see Figure 15). Sadowy (2019), in fact, notes that it is exactly this historic authenticity that is no doubt one of Praga's greatest values. For most of the interviews, the material elements relating to this nineteenth-century period, as well as this pre-war atmosphere related to these buildings, are the first things people mention when being asked about material heritage elements in Praga. Indeed, Praga interview 9 (2021) mentions that the tangible aspects are mostly connected to the nineteenth and twentieth centuries, and concentrated in a high density in a compact area: *"It is not like one building somewhere, like Hochwarts, but it is the streets – they have this feeling and landscape of a nineteenth or early twentieth century street"*. Praga interview 3 (2021) adds that it is buildings like shops along the streets that really give Praga this pre-war atmosphere. A first, and very omnipresent aspect of Praga's material heritage assemblage is the urban fabric of a nineteenth century district.



Figure 16 Extract from the map with registered heritage sites, zooming in on Targowa Street and its near surroundings, as an illustration of the high density of registered heritage objects (either registered on a local level (purple) or on national level (red)). Map source: https://mapa.um.warszawa.pl

When discussing material elements that are part of the heritage assemblage, more references to this pre-war period are made: *"Like most people, I foremost see the material heritage values that are still very present. Like pre-war buildings, tenement houses, historic street patterns, streets in its original state, courtyards and the like all are from the pre-war period"* (Praga interview 6, 2021). This interviewee's introductory

overview of material heritage values consists of many elements that are frequently mentioned by other interviewees as well. Interviewee 1, for instance, also talks about tenement houses, memorial sites, places related to trade and industry, as well as street layouts that are a reminder of the former functionality of some areas of the district (Praga interview 1, 2021). The synagogue – built in 1836 – and the small Jewish prayer houses are also part of the material heritage assemblage. But it is the tenement houses especially that are often mentioned as a distinctive aspect of Praga's heritage assemblage.

At the same time, this rich material heritage collection of Praga's contains a paradox - the material heritage is at the same time being both appreciated and forfeited, and the elements that have always made Praga unique are being gradually lost (Czeredys et al., 2020). These material elements are indeed appreciated for their rare authenticity and at the same time criticised due to their humble character and poor technical state (Sadowy, 2019). This is especially true for the tenement houses, where there is a problematic situation related to the building conditions, which also affects the living conditions of the residents. Praga interview 7 (2021) notes that many tenement houses are actually completely falling apart: "The facades are sometimes falling off, there are just bare bricks, the roofs are not always watertight so people get floods in their apartments, there is no heating, there is a lot of humidity which makes it very difficult for people to live there. There is also a lot of sickness related to that". Since the nineteenth-century tenement houses in this working-class district were not build to be elegant and long-standing, they were built in a much cheaper way that has resulted in poor conditions. Therefore, Praga's material heritage is either loved or hated. An original urban fabric and atmosphere survived the war, but its heritage has been neglected over years. Yet, although many places look very bad today, their architectural, historical, cultural, and scientific values are still recognisable and visible (Praga interview 1, 2021). Praga's material heritage assemblage is quite distinctive, yet due to the bad condition of some of the material heritage elements, some might argue that Praga is better off without some of the heritage buildings (especially the tenement houses).

Although Praga's heritage is very representative for this nineteenth[•] or twentiethcentury post-industrial transformation, the heritage assemblage of Praga exists of heritage objects representing more recent periods as well. Praga interview 3 (2021) notes that one of the strongest heritages of Praga are the little Maria chapels which can be found in every courtyard. These chapels were only erected in Praga in the 1950s or 1960s, but nevertheless have become part of the heritage of Praga. Praga interview 8 (2021) argues that more attention should be paid to these buildings, as they can still be interesting: *"Those buildings from the 70s or 80s are not so popular, but they still represent values. We, for instance, have the longest building in Warsaw. This is maybe not a very interesting building by design, but it is a kind of symbol; you will always see it when you arrive at the train station"*. Finally, Praga interview 9 (2021) mentions that the richness of heritage in Praga is not only in the most well-known buildings, as it can also be other small-scale objects or other elements, including immaterial elements.



Figure 17 Map with registered heritage sites, buildings, and assets in Praga district, with protected buildings on national (red) level and local (purple) level. Map source: https://mapa.um.warszawa.pl/

6.2.2 Immaterial heritage

When describing the immaterial heritage values of Praga, again references are made to this pre-war atmosphere, but even more to the fact that Praga used to be a working-class district. Very specific elements related to identity or behavior are mentioned, and the uniqueness of Praga's immaterial heritage is highlighted by most of the interviewees: *"Praga has a special state of mind and spirit"* (Praga interview 1, 2021). *"There is this special culture about this district"* (Praga interview 7, 2021). *"There is certainly a special identity of Praga"* (Praga interview 12, 2021).

One of the elements of this special identity is the pre-war atmosphere. This atmosphere is mostly related to social aspects. Interviewee 6 mentions that there is a particular social atmosphere in the neighbourhood, a feeling of people knowing each other, helping each other, and meeting on the streets. Praga interview 3 (2021) states: *"It is more a village atmosphere here. The thing is that if you walk through Praga you say hello to people, something that usually doesn't happen in the center of a city"*. According to Praga interview 12 (2021), it is indeed very special for Praga that people are so much connected to their neighbourhood – as she didn't experience this kind of connection to the neighbourhood in other districts where she lived. Yet, there are also some peculiar examples of this strong connection to the neighbourhood: *"I know a teacher who has kids of ten years old in the classroom who actually never visited the other side of the Vistula River, they only know the reality of the Praga district and never visited other parts of the city"* (Praga interview 6, 2021).

Other elements that are mentioned by the interviewees as being part of the immaterial heritage assemblage of Praga are an artists' vibe in some parts of Praga, the remains of the Warsaw dialect which is still in use, the different tone of the voice (a bit of a singing voice), local names for streets and buildings, and the street life and the naturalness of organising things on a street level – for instance, a kindergarten. Also a distinct culture

and mindset is mentioned as an element of the immaterial assemblage: "Here in Praga people do like people with a certain character. People are more direct here, less Polish, I would say. Sometimes this might feel a bit aggressive, but it is a way of expressing yourself" (Praga interview 7, 2021). Praga interview 11 (2021) adds that there is a certain sense of pride of being from Praga district, that there are strong social bonds between neighbours, and that there is a feeling of authenticity in this old part of the city of Warsaw.

This feeling of authentic immaterial heritage is also very much linked to the idea of a working-class district, although it must be noted that this is in a way a stereotypical image of the neighbourhood. Praga interview 9 (2021) elaborates that Praga used to be a working-class district; it used to be a poorer area, with poorer people and an overall a kind of ghetto style. It is especially this image that people from the other side of the river (i.e., right bank of Warsaw) use to have of Praga. Praga interview 6 (2021): "People from Warsaw use to have this pathology about people from Praga, but they never really explored the neighbourhood". At the same time, the people of Praga are very much conscious of the kind of stereotypes that others have of them. Praga interview 5 (2021) notes that: "I have the impression that they very much build their identify based on the stereotype image that some people have - like this is a dangerous district - and also very much delineated their identity and their aroup so that Praga keeps its image of an old, industrial district – although this is not so explicit". This is underlined by Praga interview 3 (2021) who states that Praga people are quite proud of the spaces and about where they live, so they keep up this bad reputation for themselves to feel safer. Yet, Praga interview 4 (2021) argues that this identity and current situation of Praga should not be so much idealised, as Praga used to be famous for its prostitutes, beggers, and other bad things, which he argues are not aspects to be particularly proud of.

Until now, however, Praga has done quite well in keeping its immaterial heritage values, as these values are only very slowly changing. Although Sadowy (2019) notes that the radical change of the character of the district is a threat as many immaterial values are disappearing, Praga interview 3 (2021) partly invalidates this as he states that this will only change slowly, where some things will be lost, but that this is a natural process in a changing city.

6.2.3 Community

There are various angles to describe the community of Praga and how this relates to Praga's assemblage. It is a multicultural, diverse group of people, but at the same time distinctive and consistent with the unique atmosphere of Praga – as described previously. Today the composition of the population is changing as a lot of new inhabitants come to live in Praga. Czeredys et al. (2020) notes that Praga has always been multicultural, inhabited by communities of different religious denominations and speaking different languages. Since the mid-nineteenth century, the presence of Russians has become very pronounced. The Mary Magdalena Orthodox Church remains as a reminder of that. Also, the Catholics were very present, and built a church in 1886, after years of striving. Historically, the Jewish community had a strong representation in Praga, but the Jewish community is not there anymore.

When describing the community of Praga, other distinctive characteristics are mentioned by interviewees, such as those related to social aspects, local identity, and a specific way of living in Praga. One aspect that is often mentioned is that the local community in Praga is, in many cases, formed in small areas like a courtyard or a certain street (Praga interview 1, 2021). Many of these small communities are organised around the church, or around local schools or similar things. Or they are the inhabitants of one building (often a tenement house) where these small communities have strong social relations and a lot of familiarity among the people who lived here all their lives or even for generations (Praga interview 3, 2021; Praga interview 5, 2021). Praga interview 9 (2021) underlines this: "There is this very strong community within a building, this familiarity is auite visible. The children, for instance, call their neighbours aunt or uncle". According to interviewee 6, this also partly has to do with the particular image that Praga has: "These strong bonds among inhabitants create more social acceptance for criminal activities; it could be that your neighbour is a drug dealer. One day I saw a shop where you could buy illegal cigarettes; this is not uncommon, as there is much more social acceptance for these kinds of activities". Praga interview 3 (2021) indeed states that local gangster organisations, drugs dealers, and drunken people around the night shops are typical for these kinds of districts, but also just part of city street life.

These above-described characteristics related to social aspects and local identity are typical for the so-called 'real Praga' or 'old Praga' people. These so-called 'real Praga people' are the people from Praga that have always been living there and who are proud of their way of living. This group is, according to various interviewees, still more than half, or even up to two-thirds of the inhabitants of Praga. The district composition is however changing now.

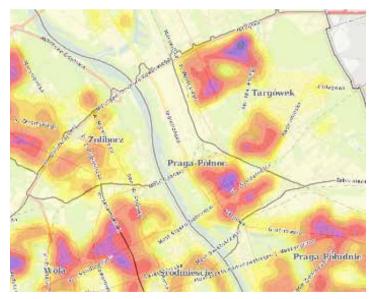


Figure 18 Extract from a heat map shows the population density in Warsaw in 2019 (persons/km²): the darker the colour, the higher the population density. Map source https://mapa.um.warszawa.pl/

Praga interview 3 (2021) explains that fifteen years ago no one from the left bank of Warsaw would even think about coming to Praga. Now people are more and more interested in living in Praga, and up to one-third of the people living in Praga are now 'new Praga people', who are often simply referred to as 'newcomers'. Many interviewees refer to this process of change in the district's composition, as a big (social) change leads to a mixture of people and potentially a division in society (e.g., Praga interview 3, 2021; Praga interview 4, 2021). Praga interview 4 (2021) elaborates: "You now have this strange mixture of people being there for many years, but who did not really succeed in life, and a group of successful new inhabitants that come to live here". Praga interview 10 (2021) gives a good insight into this group of newcomers. She says that "newcomers are pretty visible nowadays and create a kind of separate reality in Praga. It is a rather homogeneous group of mostly middle-class people of between 30 and 50 years, some of them with kids, and the economic status seems to be very much the same for most of the people. This differs greatly from the group of original inhabitants who are much more varied, with people from lower middle class, with less education and some social problems". It must, however, be noted that objective data to check this specific claim on 'real Praga people' and 'newcomers' is not available.

Praga interviewee 5 (2021) – who actually mentions that there has not been in-depth research on this topic of newcomers, and that her remarks are based on observations, rather than in-depth research – still recognises this kind of division between newcomers and people living in Praga as she observed that these new people tend to close themselves up in new buildings. Members of the local community she spoke to also mentioned that they had the feeling that everything that is happening, all the changes, are not happening for them, but rather for other people from other districts – for the new inhabitants.

In line with the pre-war material heritage relicts, and the atmosphere and identity which are regarded as immaterial heritage, the composition of the community in Praga district appears to be rather distinct as well.

6.2.4 Spatial redevelopment/identity

When describing the current spatial situation in Praga, there are the more or less obvious aspects related to the visible layout of the district. Some interviewees mention that the neighbourhood is designed in a 'pretty way', with a lot of green areas and squares. Praga interview 10 (2021) also mentions the variety of scale – as she calls it – as an important element of Praga's urban environment: *"You used to have this mixture of places of work and residential areas and workshops, and residential buildings next to each other, or even within one building"*. Other interviewees also mention the investments being done as important for the present layout of Praga, investments like the new metro line, railway infrastructure, and the city investing in public spaces and municipal-owned buildings like community meeting houses. These investments have an ambiguous impact on Praga; these are investments that raise the profile of the district and are also of benefit to the local community as there is a better connection and buildings are used again. But at the same time these developments made the

district, in only five years, go from the lowest prices on the market to one of the highest in the city (Praga interview 8, 2021).

New investments are increasingly arising in Praga. In fact, lately there have been three cases of heritage reuse that are stirring controversy. These cases are Koneser in the center of old Praga; Port Praski – which is close to the Vistula river bank; and the Bohema development project in the northeast section of Praga district. These investments are received with mixed feelings. Many interviewees observe changes in the spatial situation of the district, often without judging the impact of these changes. Some interviewees note: "Some people complained because places got cut off from them or something became private or the like, and they could no longer play there or spend time there, that is why we need to think more about our public space, and our society" (Praga interview 5, 2021). "New investments arising within the historical tissue often do not correspond to it, thus creating an impression of artificiality. This distorts the landscape and often tries to dominate the surroundings, which is detrimental to the care of heritage" (Praga interview 1, 2021). Interviewee 2 adds that architecture relates to urbanisation as it plays a role in making a society. He argues: "We have to take care that new investments fit the historic city, that they have respect for the historic environment". Other interviewees are worried about preservation of Praga's heritage in a broader, more urban, sense. Interviewee 2 states about this: "You have the historic city, and you have the new and nice, clean places. They don't fit each other. Therefore, I appeal to developers and architects, to see architecture as related to urbanisation, and to see its role in making a society, by creating places where you want to live, so that it doesn't becomes an 'empty' place". Similar comments can be heard from Praga interviewee 3 (2021): "When developments are going too fast, the spirit of place will disappear. You can now walk here and you would feel the same as if you would walk through a renovated space in other European cities. This alobalisation is one of the worst things that is happening in Praga". These interviewees might sound rather critical about the investments and developments being made in Praga, but other interviewees mention that development is part of a city, as a city is continually changing. Even interviewee 3 acknowledges this: "Having experience in other capitals in Europe, we knew that Praga was the place that will be developed in the next years to come. And now indeed a lot is happening and it's going faster and faster". Similar to this, interviewee 4 says that there are various projects in Praga that will reshape the identity of the district, but that there are also still many more projects to come. He states: "When you walk in Praga, I would say, there is still a long way to go. This is not like a 5 year's process, but more like a decade or two".

Also for the local community itself it is difficult to judge about these spatial developments as interviewee 6 notes that some inhabitants of Praga are happy with the developments, whereas other complain about the problems caused by the rapid developments of the last years. All in all this is not unambiguous; Praga's current spatial situation is changing due to increasing transformations in the neighbourhood, but the scale of the consequences of these transformations cannot fully be experienced at present day.

6.2.5 Wrap-up

When describing the assemblage of Praga district, distinct aspects like a special atmosphere, a close-knit community, and an authentic urban and heritage layout that are often mentioned. To summarise, Praga's assemblage consist of pre-war material heritage relicts including nineteenth-century tenement houses in an urban working-class scenery, combined with close-knit communities that aim to uphold the special identity and atmosphere of the district. Yet, it must be noted that all these individual aspects of the assemblage are changing; material heritage is being reused and repurposed, immaterial values including a special identity and atmosphere are vanishing; the composition of the community is changing due to newcomers, and the distinct urban layout of the district is changing due to new investments and the increased connection of Praga with the rest of the city of Warsaw.

Sadowy (2019) notes that nowadays the inherited urban environment is more and more perceived as an important testimony of the past, a precious heritage that should be preserved and remain at least partly unchanged. She argues that the heritage of Praga is not defined only in terms of sites protected by the legal instruments, but by the built environment created in the past, with values that are, among others, continuity and identity of the city (Sadowy, 2019). Holuj (2017) adds that public spaces not only contain the material cultural heritage, but, in the minds of the inhabitants, they are saturated with historical connections, personal meanings, and feelings.

To illustrate this in more detail, we will refer to specific cases of heritage reuse in Praga. In Warsaw there are several big development projects going on at the moment. In Praga there are three big developments: Koneser – in the center of old Praga; Port Praski – which is close to the Vistula river bank; and the Bohema development project. These developments (see Figure 19) are examples of large-scale heritage reuse projects where old factories and other heritage buildings are repurposed into luxurious residential buildings. These developments are, by many of the interviewees, at least seen as a challenge, not to mention a problem, especially when it comes to a project of reuse of industrial heritage such as Koneser. A UFO, a spaceship that landed, or a kind of Disneyland are the type of descriptions interviewees literally use to describe this example of heritage reuse.

Two interviewees were largely positive about this project. Interviewee 12 calls it "one of the best examples where many building details are preserved, and where the atmosphere of the place is also preserved". Interviewee 14 notes that Koneser has been an example project for similar buildings in Warsaw as the characteristic old brick industrial building is kept and given a new function with a vodka museum, restaurants, communal center, stores, and new houses. Likewise, other interviewees are positive about the way the renovation has been done and refer to the good quality of the materials used, the quality of the architecture, the infrastructure they have done, and how they combine it with the rest of the buildings (e.g., Praga interview 4, 2021). Having said that, most of the interviewees refer to negative consequences, especially when describing the impact of the project on the local community, on heritage values, and on the neighbourhood in general. This ambiguity can be found in the following quote:



Figure 19 Map showing former industrial complexes in Praga (in green, transformed into a residential complex; in blue, transformed into a cultural venue; in red, decayed/ruined; in grey, other functions/ unknown. Map source: https://warszawa.wyborcza.pl/rewitalizacjapragi

"Center Koneser is an impressive place, very nicely done. If I take friends there they are very much impressed about these beautiful buildings. So there are some positive things about Koneser, but I do recognise a tremendous gap between initiatives like Koneser and the inhabitants of Praga" (Praga interview 6, 2021). Interviewee 11 who calls Koneser 'a kind of spaceship that landed in Praga' sees an enormous contrast between the surroundings and the buildings and activities in Koneser. This contrast is enlarged because Koneser is the kind of development you can find anywhere around the world and is not particularly linked to the history of Praga. "What is missing in Koneser is the spirit of the place. You would walk through there and you would feel the same as if you would walk through a renovated space in other European cities. " What is important for me is to create spiritual places, when developments go too fast the spirit is lost. When you take for instance the vodka factory, Koneser, it is very fast and very brutal creation of 70,000 or 100,000 square meters of living, commercial and offices, the spirit of the place is lost here" (Praga interview 3, 2021).

Other arguments are that the investments do not take current conditions into account, conditions related to the spatial layout as well as to the community. Interviewee 1 mentions: "New investments often distorts the landscape, instead these investments should also adapt to the current conditions (i.e., they should include the construction of new access roads, parking lots, nurseries, and kindergartens) and adaptations must be done with the art of conservation". The impact on the neighbourhood should not be underestimated, as with these big projects, suddenly more people come to Praga

and use streets, parking places, parks, and so on (Praga interview 8, 2021). About the disconnection to the local community interviewee 4 notes: "On the one hand, I would say Koneser is an enormous success, but I am not sure that they are preserving the voice of Praga. I don't think the community had anything to do with this. It is basically a closed Disneyland; so you go in there and there is only one story that they sell you, drink vodka, and that is it" (Praga interview 4, 2021).

So, although developments like Koneser do not seem to be the main issue in itself (some interviewees are even rather positive about the quality of the investments, for instance), many interviewees are concerned about the impact of these developments on the neighbourhood as well as the disconnection to the local community. To overcome this, it is important to attract developers that see heritage as an additional value and that renovate a place with respect to the heritage and its surrounding instead of destroying the heritage: "Some of the developers are smarter and they bring architecture that quite matches the old buildings; they have respect for the historic environment. These developers also relate to urbanisation and society" (Praga interview 2, 2021). "I think we should do everything to prevent destruction of these old buildings, and instead try to make the best efforts to renovate these places and to look for new functions" (Praga Interview 14, 2021). Interviewee 3, who is a developer himself, has some ideas how to reach this. He argues that architects and developers should see themselves more as urbanists who not only focus on architecture and renovation, but on creating a kind of a city around a building thereby paying attention to the people living with it. He says, "The first thing we do in each building we enter is to invite as many people as we can on side, by different ways, like happenings, exhibitions, discussions about urbanism, meetings with the neighbours, and things like that. That is the main way to meet with the expectations of the people around you and also to create a good atmosphere around the project. I can't imagine a project that is 'brutal' and does not take into account the feelings of the people around and the way it will be lived by the people in the picture around you" (Praga interview 3, 2021). Once more, an active, open, and flexible attitude to the inhabitants seems to be of importance here in order to not only renovate a building or site but to make sure that it is connected to its surroundings and the local community.

6.3 **Context: factors, actors, and institutions**

In the previous sections we saw that there are various processes of change within the four aspects part of Praga's heritage assemblage. How the specific broader social and institutional context contributes to or constrains the specific assemblage of Praga into becoming is not yet described. In this section, we focus on factors, actors, and institutions in specific spatiotemporal situations to see how a notion of heritage is (re)constituted in its surroundings.

Factors generally refer to nonhuman actors, actors to groups of people playing a role in Praga district, and institutions are mainly policies, legislations, rules, and regulations (Boelens, 2010). These three elements are described in the following section to give an impression of the spatiotemporal social and institutional context of Praga. It is important to note that these three elements are not to be seen as closed, but always in a state of becoming and therefore continually changing. Hence, factors, actors, and institutions (re)constitute each other in a specific spatiotemporal setting. Or as Sadowy (2019) notes: a city and its heritage adapt to the needs of its stakeholders by constantly remodeling its space and built environment within the framework of existing legal, technical, and financial restrictions.

6.3.1 Factors

Factors can refer to the more physical contextual elements like geography and infrastructure, but also to the spatial layout of the area and the presence of listed heritage buildings. However, these latter two elements have been described previously and extensively already in discussing Praga's assemblage. In this research project, factors are defined as the more physical elements like geography, infrastructure, the spatial layout of the area etc. that determine (at least the setting of) heritage (i.e., make it accessible, prominent, important, etc.), as they influence those features/factors of importance in return, and the presence of listed heritage buildings, as well as the impact of events, transitions, and historical events.

In this regard, it is good to turn to the historic overview again, to see some of the historical implications that still impact Praga's present-day layout. When we look at Warsaw, Praga is a rather special district as it is an authentic district. The Warsaw Uprising of 1944 only lasted two days in Praga-North, and Praga was also quite early occupied by Soviets troops, in September 1944. As a consequence, the Germans did not have the chance to destroy this part of Praga, as they did with the other parts of Warsaw. This resulted in a district with buildings of the nineteenth century and early twentieth century, as well as many architectural buildings from the interbellum period. In the following communist period, out of ideologic reasons, this architecture, and especially the nineteenth-century tenement houses, were seen as a reminder of capitalist period, and as a result no investments were made in Praga - as this was seen as a secondary city district. There were, for instance, no Communist officers and government officials located in Praga and no official delegations visited Praga; everything happened on the left bank of Warsaw only. In the east part of the city, investments in buildings were made, as this part needed to be a representative part of Warsaw and look nice for the delegations visiting Warsaw. No investments were made in Praga, and this part of the city became a somewhat neglected area.

This deprived background still influences present-day Praga, and it is a factor of importance. Interviewee 14 elaborates: *"Here in Poland, we adopted 'Die Wende' with a lot of hope, as if our dreams would come true after a period of Iron Curtain and Communism. We had this dream and hope that this Western culture would grow here, but unfortunately, it is still not what we expected and what we hoped"*. He explains that the Communist period limited the development of society as well as spatial development, as there was no private ownership, only limited freedom, almost no societal structures, and no connection to Western ideas and Western city planning. He even argues that these structures of the Communist period still continue to have an impact on present-day society: *"Poland is still like a third-world country. People think*

and feel that the government, and especially the local government, doesn't serve the inhabitants, doesn't serve local self-government, but instead serves the rich people and the investors and the like" (Praga Interview 14, 2021). He argues that there are still strong powers that shape present-day Warsaw and its society, like in the days of Communism. In other spatial domains the impact of this period is still recognisable. For example, in the housing market more than half of the houses and buildings in the city are under ownership of the city due to a long-lasting housing market system from the Communist era (Coudroy de Lille, 2013).

Yet, the end of Communism in Poland was also a factor of importance in that sense that it led to a lot of changes. Present-day Warsaw is, according to several interviewees, a very neoliberal city: *"This neoliberalism is a child of Polish transformation after 1980 when instead of public investments, everything turned upside-down, and is now dominated by private investments, especially in the housing market and real estate development"* (Praga interview 9, 2021). Before the collapse of Communism, the main investor in the real estate market, housing and industry alike, was the state. Now the main investor in real estate is the private sector, and Warsaw is one of the biggest building sites of Europe with big investments by private developers (Dominika et al., 2020). As described previously, Praga district is now more and more interesting for real estate developers and many developments take place accordingly, which results in some threats to Praga's heritage as well: *"We now live in what are actually the best times for Poland ever, economically speaking, but we have to be aware that this 'building boom', which is a result of these times, could destroy all our heritage"* (Praga Interview 14, 2021).

Events, a changing discourse, or marketing can also be regarded as factors of importance. One interviewee, for instance, gives an example from the countryside of Masuria where there were a lot of historical buildings in a derelict state. These buildings were rather unwanted as they were regarded as German heritage instead of part of Polish cultural heritage. This interviewee states that this has now changed as people started to understand that although it is not Polish heritage, these historical buildings create the landscape and they have historical (and thus socioeconomic) values (Praga interview 3, 2021). This example is included here just to illustrate that discourse can change just as attention can shift towards a certain period or scale.

An often-mentioned factor by the interviewees is the ongoing COVID-19 pandemic situation that hit the world during the period that this research was conducted. Interviewees mention challenges such as reaching out to local communities, and organising activities with preventive measures such as social distancing and lockdowns. Some positive aspects are also mentioned such as a renewed attention to the local scale and local production of goods, and a stronger community spirit. However, as this is an ongoing pandemic situation, it is impossible to say whether this can be regarded as a factor of importance as it is yet unclear to what extent the COVID-19 pandemic leads to radical changes.

In sum, the above-mentioned factors of importance impact heritage reuse initiatives to a large extent. The effects of Poland's Communist past are still impacting society at present day as there is a certain level of passiveness in Polish civic society. The apparent lack of forms of self-organisation within the community in combination with a reluctant government leads to a situation where there is not much common ground for cooperation in the domain of heritage and urban planning. Other factors of importance, like a changing discourse or the ongoing COVID-19 pandemic might even enhance this discrepancy, and in short, the factor context of Praga does not animate community-heritage engagement.

6.3.2 Actors

Actors refer to groups of people playing a role in Praga district, such as the local community, local organisations, active citizen collectives, NGOs, politicians, and the interaction between these various groups of people. Some of these groups have been described previously; the composition of Praga's community has, for instance, been discussed in section 6.2.3. Moreover, based on the interviews, it appears active citizen collectives are a particularly important actor in Praga with regard to community-heritage engagement. It is for this reason that this section on actors will address community groups, NGOs, and active citizen collectives, in particular.

What we also already noticed is that there is quite an active community in Praga organising all kind of small-scale communal activities. If we explore this a bit more, it appears that there are indeed many local organisations and nongovernmental organisations in Praga. Various interviewees explain that Praga is well known for its active citizen collectives, and that these active citizen collectives represent the local communities as they are locally based and concerned with topical issues for Praga. Oftentimes these active citizen collectives were established in response to issues in various spatial domains, like a renting crisis, or the threat of destruction of large parts of Praga's heritage. Interviewee 7 explains [about this renting crisis]: "A lot of people in the neighbourhood were kind of angry about this and they were gathering spontaneously on the streets and just being angry about this. So this was for us an indication that there is a need to get involved in community organising" (Praga interview 7, 2021). This is a very present feeling in Praga, that people want to organise themselves in order to counter some (societal) problems: "I have never been a kind of activist, but as you move to Praga, you cannot just pretend you are an activist, there are so many problems and so many issues that need to be solved, that you have to get involved" (Praga interview 11, 2021). As a result of the plurality of societal and spatial issues in Praga, the topics addressed by the active citizen collectives cover a wide range. Some of them work on very specific topics such as saving heritage buildings, environmental issues, or green areas in the district. Others focus on problems that impact the lives of citizens directly by addressing the effects of housing policy. Active citizen collectives like the 'Association for Praga district' are among the best-known organisations in Praga, and act as a kind of umbrella organisation in the district. The activities undertaken by the active citizen collectives also vary, but include at least making some problems visible, by bringing attention to certain topics, providing publications, reaching out to the media, or creating some kind of scandal atmosphere around certain issues (Praga interview 7, 2021; Praga interview 11, 2021).

To sum up, a reflection by interviewee 11 is inserted that shows the role and impact of NGOs and active citizen collectives in Praga: "The role of these kinds of NGOs and bottom-up organisations in Praga, and more general in Warsaw, is very important nowadays. I by myself am actually quite impressed by the activities, by the number of issues that are being discussed by all these organisations, and the impact they can have on policies, both on the local level as well as on the state level. It is very important for Praga district to have these kinds of bodies as that can really navigate between the different difficult policy structures".

Although the role of these active citizen collectives cannot be underestimated, there are some elements that obstruct the functioning of these collectives. Most of these collectives are rather small organisations, limiting their possible impact. Moreover, people in Praga sometimes do have less social capital and are sometimes less educated (Praga interview 5, 2021) and there is a certain level of passiveness in Polish society, where people expect other people to fix things for them and do not get involved themselves (Praga interview 7, 2021). As a result, many local organisations have to start with empowering the local community and organising some form of civil society. "As much as we would like local organisations to be self-organised, and come from the bottom-up without any intervention, it doesn't always work this way as there is a huge problem with civil society in Poland" (Praga interview 7, 2021). Other interviewees warn of the overkill of local organisations, and say that there is not always good cooperation between the different organisations. "They are all working a bit in their own world. Everyone wants to be famous; everyone wants to have a local political impact. I think they could gather all together to make a stronger organisation, but instead it is a bit of pit and spit" (Praga interview 3, 2021). Finally, these local organisations have to hold up in an arena of various dominant forces, like international development companies, lobbying groups, (in some cases, corrupt) civil servants, and various governmental organisations (Praga Interview 14, 2021).

On this latter aspect of interaction with various governmental organisations, it must be noted that active citizen collectives are not much welcomed, but instead need to find their own ways to get in. Other interviewees also complain that the municipality is very obstructing and delays the processes initiated by local organisations (e.g. Praga interview 5, 2021). Yet, as there are many activists and people that are concerned, there is a lot of social pressure on the municipality, of which the municipality itself is aware. A municipal officer explains that they follow Facebook pages like 'We live in Praga district', to get an impression on topical issues, or even to do a kind of consultation as they propose certain ideas on these Facebook pages to see how people respond to it (Praga interview 8, 2021). Nevertheless, another interviewee, who runs an active citizen collective himself, refutes this as he says that this kind of consultation and the regular meetings with the municipality are quite unsatisfactory: "The city government is really not interested in hearing the voices of the NGOs and local organisations. They are instead just forcing their own projects and just looking for us to support it. They are doing these meetings just for show, as they resist everything that we propose" (Praga interview 7, 2021).

To sum up, whereas some complain about the lack of recognition by the municipality, others highlight the importance of this kind of organisation for the Praga district. Interviewee 11, who lived and worked in Sweden before, compares the situation to Sweden and notes that: *"When I compare Poland to Sweden, I would say that the local NGOs here in Warsaw are much more engaged and more effective, despite the much more difficult political situation, and despite the conservative environment"* (Praga interview 11, 2021). What can be said is that there are many NGOs and local organisations in Praga, that, although addressing various topics and applying different methods, play quite an important role in organising civil society. In fact, these organisations try to establish interrelations between local communities, heritage, and other spatial issues. The effectiveness of these organisations can, however, be reduced or stimulated in interaction with other stakeholders, most notably in the interaction with governmental organisations and other institutions.

6.3.3 Institutions

The third element are the institutions. Institutions refer to a large set of formal and informal rules, regulations, policies, and legislations. It is thus a combination of the more formal guidelines, rules, and policies of various governmental organisations, but also more informal 'rules of the game' such as certain ways of dealing with policy or the way a society is organised (for instance very hierarchical or just the opposite). As institutions address quite a few aspects, this section on institutions, for reasons of clarity, is divided into a part on heritage policy, a part on urban policy (including revitalisation), and a part on more informal rules of the game (which is called institutional organisation).

Heritage policy

Poland has a well-founded system of heritage protection. The most important form of heritage protection is the register of monuments, which is conducted at the national, regional (voivodship) and local level (Dominika et al., 2020). The entry in the register of monuments provides a very strict control from the regional and municipal heritage authorities. The entry in the communal, local record of monuments should ensure that at least the external appearance of the buildings will be preserved. However, legal heritage protection regards only the architectural and strictly aesthetic values (Sadowy & Lisiecki, 2019). The main act regulating heritage buildings and sites is UOZiOZ (Act on Monument Protection and Monument Care), which focuses on the conservation and protection of existing heritage. It provides definitions of conservation and restoration works, and regulations on the development or new use of monuments (OpenHeritage, 2019a). Heritage policy and heritage reuse is, for a significant part, regulated by spatial planning policy as well. Decision making on heritage management is divided on two levels: The General Monument Conservative Officer (GKZ) acts on the national level and prepares guidelines for the regional Monument Conservative Officer. The amendment to the act UOZiOZ in 2018 strengthened the position of the GKZ, who may overrule the decision of the voivodeship level of the conservation officer and who can even demand the change of the head of this office (OpenHeritage, 2019a). There is no separate heritage protection program for Prague district itself, although some interviewees argue that this might be something to consider, especially in the light of the large number of monuments, the specificity of the district, and the original urban tissue from the beginning of the twentieth century.

Heritage in Polish policy is mostly understood as architectural, with a strong emphasis on an authentic, historical value: "In this respect I think that the municipality is a bit neoliberal, as they also recognise the marketing value of heritage. If it looks old, and if it looks authentic, then it is fine for them" (Praga interview 10, 2021). Preservation of the (appearance of) material values of heritage dominates more incorporating, more personal, or emotional heritage values. On this aspect, Sadowy and Lisiecki (2019) note that heritage management is often based on a very traditional and conservative way of thinking and does not provide the framework for more innovative and contemporary approaches to heritage, as it mostly focuses on the preservation of tangible elements of architecture. Overall, most interviewees endorse this way of valuing as they state that "those buildings listed by the government are the monuments for us" (Praga interview 12, 2021). Yet various interviewees argue to broaden this way of valuing heritage, by, for instance, advocating for inclusion of architecture from more recent times, or by protecting buildings that do not have that much architectural or aesthetic values but nonetheless tell an important story. There are also pleas to adopt another type of protection, focusing on heritage areas, such as the option of a 'cultural park'. This is a form of monument protection in Poland, protecting heritage in an area including the broader context.

Although it might seem that there is a well-founded system of heritage care, mostly based on material, architectural values, there are some critical remarks to discuss. Interviewee 3 (who is, in general, very sceptical of the government) notes that "the regional Monument Conservative Office is a tragic organisation with guite low competencies, often long-lasting discussions, and a very slow way of working". This sometimes leads to a situation where the conservator says that a certain building should not be destroyed, but the owner nevertheless destroys that building. In fact, "one out of three times, the architect, the developer, or the owner makes his own decisions without the agreement of the conservator simply because he wants to do something. If you have to wait for a positive decision from the conservation office you have to wait for one, or one-and-a-half years, which is senseless. So if a developer wants to demolish a historic building, he will do it, since it is more attractive for him compared to another year of waiting" (Praga interview 3, 2021). So, the question rises as to how much impact the conservator office actually has. Also, various other interviewees state that the instrumental way of working, the slow way of working, and the lack of sufficient budget are aspects that limit the effectiveness of heritage management in Poland (e.g. Praga interview 4, 2021; Praga interview 12, 2021; Praga Interview 14, 2021).

Spatial planning law

When talking about heritage policy, it must be noted that spatial planning laws also impact heritage management to a large extent. The Act on Spatial Planning, and the 2015 Act on Revitalisation influence heritage areas in Poland (OpenHeritage, 2019a). The revitalisation act is related to degraded areas (in terms of economic, environmental, infrastructural, or technical nature). Praga district has its own revitalisation program (see Figure 20), and here, too, economic and social degradation are deemed the most challenging issues. The priorities were: renovation of urban space (including water, gas, and heating infrastructure in old houses); revitalisation of ground floor space in terms of social, commercial, and service functions; support of professionals and local enterprises, including craftsmen; and participation of residents in planning activities for local development as well as educational and promotional campaigns (Dominika et al., 2020). Revitalisation of Praga district officially started in 2015, although some minor revitalisation works had been done since 2000. So far, not many improvements in the district have been implemented: "In 2015 when we started revitalisation works it was the golden time in Poland, all this European money and a lot of money due to quick developments. Those were good times for Warsaw, but now our budget is more restricted, so it isn't easy to develop much in this area. We just haven't yet reached the point where the area is really improved" (Praga interview 8, 2021). Until now, results from this revitalisation plan are disappointing as there appears to be little room for participation of the local community (Sadowy & Brodowicz, 2019), little attention for cultural heritage (Praga interview 6, 2021), and limited funds and models to implement the program (Praga interview 8, 2021). It is for these reasons that the program will probably continue after 2022.



Figure 20 Map showing the areas in Praga that are being revitalized as part of the 2015 Act on Revitalization. Map source: https://mapa.um.warszawa.pl/

The lack of effective implementation of spatial planning policy is an often-heard criticism. Sadowy and Lisiecki (2019) who analysed post-industrial sites in Praga note a lack of coherent and strategic urban policy regarding this part of Warsaw as well as former industrial areas in general. Despite the presence of strategic documents and programs, it is not possible to find any consistency in the use of municipal-owned sites, their former privatisation or current use, they argue. In addition, they note that urban policies have been, to a great extent, a zero-one nature, either giving a free hand to the market forces or taking the whole responsibility. Dominika et al. (2020) further notes a lack of effective policy, a lack of tools to implement policy, as well as a lack of sufficient numbers of employees to implement urban policy. Interviewee 14 states that there is "no city planning in Warsaw at all. Nowadays people are fed up with this way of politics and start to initiate bottom-up initiatives". Despite this apparent lack of effective urban policy, some spatial planning policy actually led to changes in the district. A program focusing on 'arts-led' regeneration and the creation of 'culture clusters' led to the upgrade of historic courtyards, the development of tourist routes, and the establishment of the Praga Museum of Warsaw as part of the Museum of Warsaw (Pawlikowska-Piechotka, 2010).

Finally, there are housing policies and homeownership models that influence the district and create a kind of 'no-man's land'. Praga used to be a district of rental units and social housing. After World War II, however, ideology entered the sphere of spatial planning and housing policy, and much of the land in Warsaw was nationalised (i.e., Bierut decree) meant to facilitate a new socialist metropolitan space on the territory of the country's capital (Dziemianowicz & Szlachta, 2019). After the fall of the Soviet Union, much of the land which had been nationalised since WWII became privatised again. Another method through which dwellings have become reprivatised are the so-called restitution claims through the Bierut decree. While this part of the decree was initially devised to allow landowners willing to repair their homes themselves to be exempt from the post-War nationalisation of all Warsaw land (for the duration of the repairs) and thus speed up reconstruction while saving the state money, it ended up becoming the legal framework for people to reclaim land in the late twentieth and into the early twenty-first century. Presently there are ongoing complicated discussions about these reprivatisation issues (Praga interview 11, 2021) that not only constitute a barrier to wider development (Dziemianowicz & Szlachta, 2019), but also lead to all kinds of shabby business dealings and the blocking of land, as the city is not willing to invest in those buildings where there is a claim for reprivatisation (Praga interview 9, 2021).

Institutional organisation

The final aspect of institutions concerns the way Polish institutions work. Many interviewees refer to difficult situations in eastern Europe countries, especially with regard to issues such as corruption, the political situation, and the way politics work. On this latter aspect, interviewee 9 notes that the political system in Poland is very much based on short-term interests and the self-interest of politicians, as getting votes in the next election is deemed more important than solid policy making. Another aspect that influences the effectiveness of institutions is that there is little dialogue in Poland. Interviewee 4 notes that Poland has historically grown into a country of punishment

rather than a country of encouragement, due to this lack of dialogue. According to this interviewee this leads to a situation of neglecting the government: "In order to avoid those punishment you could either try to cheat the government, or try to do something else, and basically abandon the government" (Praga interview 4, 2021). Moreover, this situation of forbidding and punishment leads to inertia of the government as they are not able to think beyond laws. "The municipality will always look for a way to forbid something. By now we know that sometimes you should not ask the municipality if it is legal or not to do something, you just do it, and then you see how you can fix it with the law" (Praga interview 4, 2021). This however leads to a situation that a lot of people are skeptical about the municipality or certain governmental initiatives like public-private partnerships. This scepticism towards the government is further fuelled due to the complicated political situation in Warsaw. Over the past decade, Warsaw has been the center of a political clash between the city government and the national government. The national government in Poland is very conservative, whereas the city of Warsaw and the mayor of Warsaw are ruled by the Liberals. This leads to a political clash that is particularly visible in the city of Warsaw. Various interviewees mention that this political clash complicates and impacts various domains of policy, including heritage management. Various interviewees indicate that conservatives are more likely to support heritage restoration instead of contemporary culture. But this is also a matter of a certain political narrative being dominant, either a narrative around identity, past, and heritage, or a narrative around supporting commercial developments where the heritage is usually instrumentalised.

The city of Warsaw is, for instance, more interested in modern ideas to demonstrate opposition to the national government (Praga Interview 14, 2021). Indeed, since 2018 the General Monument Conservative Officer (supported by the national government) has had more power over the position of the regional Monument Conservative Officer (supported by the city government). Instead of dialogue and cooperation, these institutions now use heritage policy to fight their political conflict. Sometimes certain policies are purposely not implemented at the local level, or plans for a change in policy are not incorporated by the national government (Praga interview 11, 2021). An interesting example is illustrated in the commemoration monuments of important historic events. Recently the national party wanted to create a statue to commemorate the flight accident. But the site to place this monument was owned by the local city and was under the protection of local heritage policy. What the government then did was take this part of land from the city, remove it from the list of protected sites, and put it under the organisation of the national government (Praga interview 11, 2021). "This is really psycho, you cannot be sure of anything nowadays, because when it is of certain importance to the government, they can just do anything they want" (Praga interview 11, 2021).

Regarding Praga, it must be noted that voters in Praga are more oriented to vote for conservative candidates. The results of the 2018 elections show that the conservative ruling party in Poland got 28 per cent of the votes, whereas the liberal ruling party in Warsaw got 26 per cent of the votes.

In sum, Praga's institutional context puts a challenge to the aim of creating community-heritage engagement. In fact, regarding the three topics discussed in this section (heritage policy, revitalisation, and institutional organisation) we notice that there is little room for community participation or for incorporating heritage values identified by the local community. Poland's heritage policy is mainly material oriented, and urban policy is for a large extent lacking, resulting in a situation where it is not the government nor the local community who is 'doing' heritage reuse or heritage management, but instead international developers who see the industrial heritage of Praga as an asset in creating new residential areas or office spaces. This in turn, however, might strengthen the process of estrangement of the local community and Praga's heritage.

6.3.4 Wrap-up

The factor-actor-institution context of Praga district has been described above. The interplay of factors, actors, and institutions gives direction to the co-evolution of community-heritage engagement in Praga. This co-evolution can go in different ways as the interplay of factors, actors, and institutions is dynamic and evolving. In Poland however – and in Praga as well – we see that this factor-actor-institution context impacts the role of communities in heritage issues in a rather negative way.

Indeed, the room for community participation or for incorporating heritage values identified by the local community is limited. Partly, this can be explained because of the aftermath of the Communist period in Poland. To some extent the effects of this period are still recognisable in present-day society; e.g., in (the lack of) certain policy documents, or housing policies from that period (Bierut decree). Moreover, heritage policy is strongly material oriented without recognising more emotional, communal values. Indeed, community-led heritage care is only slightly recognised. Regarding spatial planning, the negative impact of policy is even more present. A laissez-faire urban policy in Warsaw leads to a situation where heritage is regarded as a burden rather than an asset, and room is given for developers and international investors to construct new buildings instead of reusing the existing buildings. This situation of a lack of effective policy, and a general scepticism towards the government leads to a situation where more and more bottom-up initiatives are established and the local community starts to organise itself in all kinds of local organisations and NGOs. Although the role of these organisations is already quite large in Praga, they are still only partly recognised by governmental organisations, and the room for participation in policy making is still limited. All in all, community-led heritage reuse practises are to a great extent impacted by the factor-actor-institution context in a way that is rather constraining.

6.4 Heritage approaches and strategies

After having elaborated on the context of Praga district, it is now time to take a more overarching perspective and reflect on the strategies and heritage approaches applied in this case. In the previous sections, we saw that there is a relation between the different aspects of the heritage assemblage. For instance, many of the interviewees described links between material heritage and immaterial heritage. They also noticed the links between the needs of the local community and heritage values, be it urban patterns, or the state of the nineteenth-century tenement houses, as discussed in the examples above. The following section describes the interrelations between the different aspects of the heritage, and puts attention to the ways in which these interrelations are established and which heritage approaches and strategies are used to create an interaction between two or more aspects.

6.4.1 Expressing material and immaterial heritage values through use

As already state in the previous sections, one of the most discernable interrelations is the one between material and immaterial heritage. Indeed, Sadowy (2019) notes that the architectural and urban heritage is a material representation of an immaterial heritage related to labor and economic development. Various interviewees elaborate further on this relation and argue that the rather abstract immaterial values only become present by an active use of the material representation of the immaterial values. This sounds rather vague but the interviewees mean that there should be a kind of consistency between a building, its surrounding (including a local community), and the history and story that this building represents. Interviewees, for instance, refer to the way courtyards between the tenement houses are used for all kind of social activities, and that these communal habits are closely related to the layout of the neighbourhood. Even more, they mention that the feeling of identity, or identification with the district as the old buildings, which are in a bad shape, can nevertheless still have a special meaning and importance for the Praga inhabitants (e.g. Praga interview 5, 2021). Interviewee 10 states this in an even bolder way: "Even if people do not recognise what is really valuable or important in terms of the history of architecture. they love the places, as they spend their whole life there" (Praga interview 10, 2021). One of the best examples of the interrelatedness of material and immaterial heritage, also in connection to the habits of the local community, is provided by interviewee 9 who argues that it is the use of material heritage that tells us about the immaterial values that are of importance for the local community (whether related to the material heritage or not). This interviewee describes how this interrelatedness is, particularly in Praga, very strongly present as the immaterial values are still very visible. "Take, for instance, the religious symbols in Praga. There are a lot of religious people and they care about the symbols. So they will manifest in material things that they are religious. There are, for instance, a lot of statues of St. Mary in Praga. But you only know about the immaterial values if you observe how people react to these statues. Because if they pray to those statues, or if they care about it as a light is lighted there, or if there are fresh flowers, then you understand that this object also represents immaterial values. This is why I think that the use of something is the best way to simply explore those immaterial aspects of the material heritage" (Praga interview 9, 2021).

Yet immaterial values (as all values) can change over time, and exploring the use of material objects to identify immaterial values might not be enough to keep this interrelatedness of material and immaterial heritage. This is recognised by the Praga Museum of Warsaw, which informs the public about the relation between immaterial and material heritage (Praga Interview 13, 2021). Obviously, a museum not only presents certain objects, but also informs the public about the stories connected to these objects. But, more than that, the museum of Praga tries to be a platform where certain immaterial heritage values are passed on from old, 'original' Praga people – for instance the craftsmen – to the younger generation as well as to the newcomers. To this end, they organise exhibitions, tour guides, programs for students, workshops, and try to be a platform to interpret and reinterpret heritage to bring it to the twenty-first century so that the heritage connects the original, autochthone people of Praga and those who want to live in Praga (Praga interview 2, 2021). In doing so, the Praga Museum of Warsaw has an important role in Praga as is acknowledged by many of the interviewees who go there themselves to engage in discussions on heritage, or who organise meetings there to connect to Praga's local community.

6.4.2 Care for the surroundings; small-scale initiatives

The interrelatedness between the community and spatial developments is also quite recognisable, although this seems more difficult to comprehend. Various interviewees mention that there is not really an active civic community in Poland. This was historically grown this way, but also has to do with the political situation. At the same time, inhabitants of Praga seem to be active as they care about their heritage and their identity. "Socially speaking, people living in Praga are more engaged, they want to meet, they act, they want to make a difference in the district together. What I strongly recognise is that people are very much connected to the neighbourhood, but also to the neighbourhood as it is today; they take care that the district won't change too fast or too much" (Praga interview 6, 2021). Also when it comes to changes in the surrounding due to spatial developments, the local community acts in order to make sure that the surroundings remain connected to the community. At present day, the urban structure creates this close community, close in the sense of construction, but also close in the sense of tight relationships, because of those inner courtyards where life is taking place. This is something that the local community is worried about: "Some people complained that some places got cut off from them because something was built there, or became private or the like, they could no longer play there or spend time there" (Praga interview 5, 2021). This example shows that inhabitants want to preserve something when they have the feeling that it is taken away from them. Not only for the reason that it is taken away, but more so because they are used to having this strong connection between the surroundings and the local community, which they now feel is impacted by all kinds of spatial developments. This is underlined by interviewee 1 who states that Praga inhabitants often inform about their neighbourhood, or ask social organisations for help, mainly out of concern for their surroundings. At the same time she warns that "it should be remembered that Praga is very much gentrified, which means that the new immigrant population does not have the same view on urban space and tissue as the 'old' residents. In this regard, actions are necessary to raise awareness and historical sensitivity of new residents" (Praga interview 1, 2021). Other interviewees warn that the local community is quite often asked about many things, so that they become a little bit tired about being involved. Nevertheless, Praga inhabitants do take care that their surroundings keep their relevance for the local community.

This is often achieved by organising all kinds of more spontaneous, small-scale, communal activities close to the buildings where people live in order to improve the quality of the surroundings. Interviewee 5 explains that there are a lot of these kinds of initiatives, like organising something in the garden for kids, get-togethers to paint walls in the neighbourhood, planting trees in the area, or making squares and green areas out of parking places, and other small-scale interventions to make their buildings and surroundings look better. All activities are undertaken to raise the profile of the district and for the benefit of all the people in the district. Interviewee 5 – who actually is involved in these kinds of activities herself – explains that the community undertakes these kinds of actions to provide an example of what public space could look like, or because the municipality was not doing anything to make the buildings and the neighbourhood look better. Now, she explains, these initiatives are recognised by the municipality and you can even apply for (financial) support for these kinds of activities, but people in Praga were doing this even before it was recognised as such.

6.4.3 Recognising material heritage values; educating the community

The material heritage values are omnipresent in Praga and widely recognised by the local community, even if this is sometimes a bit romanticised: "Architecture has an impact on society, see, for instance, the little societies within the tenant's houses. *Therefore it is very important to preserve some architecture*" (Praga interview 2, 2021). "Of course people love the historical heritage. Maybe it is a bit romantic, because some people like derelict buildings as they are, and wish they could forever stay that way, but there is no way like this" (Praga interview 3, 2021). Interviewee 7 furthermore points at the negative consequences when all the old buildings are either collapsed or destroyed: "What is left if you let all the old buildings go down and be collapsed or destroyed and you drive all the inhabitants out of it. Then it is not the same neighbourhood anymore, as nothing is left" (interview 7). These quotes clearly indicate that people are aware of the material heritage values and the relation this has on the local community. However, the local community is not always that united about recognising certain heritage values, especially when it comes to the reuse of old (industrial) buildings. Praga interview 2 (2021) explains: "As always, there is a lot of conflict. Some of the people want to preserve heritage and use it by adding a new function. But some of them have no problem with destroying these places, because oftentimes nothing is happening with those places; it makes the prices of buildings lower and the neighbourhood more dangerous as unsafe places are created in the area" (Praga interview 2, 2021). Praga interview 11 (2021) states this even bolder: "For the people, the heritage is not so much in the buildings, as they probably don't even know about the historic information that is behind a facade. It is an important part of their lives though; they do care if something is falling apart or is being destroyed or something like this". At the same time, however, Dominika et al. (2020) notes that particularly with regard to reusing former industrial sites, it is of importance to not only focus on the material investments, but especially also to integrate all kinds of stakeholders and activities. In that regard, it is important that the local community recognises that their voice can be of importance when it comes to finding new functions for old buildings. Without doing so, sites of heritage reuse might not be available to local residents anymore as they are commercially appropriated and become excluded from the local community (Praga interview 1, 2021).

In order to improve the awareness of the local community with regard to the importance of material heritage values, various activities are organised. Different interviewees refer to publications or booklets that they made or that they know about, which are about heritage reuse, heritage values of Praga, and the like. Recently an 'Illustrated atlas of Praga architecture' was launched, including 60 examples of the rich tangible elements and monuments in Praga (see Czeredys et al., 2020). Also different NGOs and local organisations publish booklets with descriptions on how to renovate buildings in a proper way, including concrete instructions on how you can treat buildings and how to renovate it. People can get these booklets for free and many use them, especially housing organisations and the like. This is apparently quite important, as one interviewee notes: "The mechanism is quite easy, we have to try to talk to inhabitants, to give them some 'education'. There are many different things we can do, we do, for instance, exercises to make people look different about a building, we tell them the history of the place. We try to make them more aware, we try to bring them more knowledge about this place" (Praga interview 2, 2021). The aforementioned Praga Museum of Warsaw plays a vital role in this process too, as they are the platform where all kinds of groups of society come and get information about the history of Praga district and its heritage objects. Finally, there are all kinds of local organisations, groups of people, and NGOs that inform and educate the people of Praga. The Association of Time Collectors (Stowarzyszenie KoleADjonerzy *Czasu*), for instance, is guite well known in Praga, but also in Warsaw itself. It is an organisation that deals with the protection of the national heritage thereby especially focusing on the war period and postwar period. This organisation aims to educate residents is achieved by organising educational walks, lectures, exhibitions, and the like. Organisations like NaPradze focus on inventories, documentaries, photographs, and research on monuments, all with the aim to educate people about the value of a place. All in all, there are many groups and organisations that use different methods and tools, but all with the same goal of educating the Praga people about heritage values so that they recognise them and act accordingly, in order to preserve the unique interaction between heritage values, the local community, and the surroundings.

6.4.4 Wrap-up

In Praga, various processes of change impact the way heritage (both material and immaterial) is perceived and how this impacts the local community. In the previous sections on interrelatedness of the various aspects, we recognised a strong commitment of the local community in spatial and/or (immaterial) heritage matters. The local community cares about small-scale immaterial heritage assets, as well as the reuse of larger heritage objects that have an impact on the neighbourhood. By organising all kinds of small-scale initiatives, members of the local community even try to enhance the involvement of the local community. Indeed, it is important that the local community recognises that their voice can be of importance when it comes to finding new functions for old buildings. Without doing so, sites of heritage reuse might not be available to local residents anymore as these sites are commercially appropriated and become excluded from the local community. However, this is exactly what seems to be happening in Praga. Despite a fair level of community interest and care about heritage, increasingly elusive processes like gentrification, migration, and urbanisation seem to override the dynamism of the district. Where, for instance, the local community organises activities to keep small-scale, more immaterial, heritage assets like statues of St. Mary or street patterns and green areas, big investments companies seem to lack interest in the local community as their investments do not take the needs of the local community into account.

To wrap up, although it became clear that there is some overlap between the different aspects, especially between material and immaterial heritage, and between the local community and heritage values, and although various methods and tools are applied to strengthen these interactions – methods like communal activities and different tools to educate the local community about the heritage values of the district – it must be noted that only some aspects of the heritage assemblage interact with other aspects, and the interactions are mostly one directional instead of bidirectional.

6.5 **The example of PragaLab**

In this section the example of PragaLab is introduced. In the analysis that follows, both steps of the analysis will be taken into account: describing the interactions between the various elements of the heritage assemblage, and identifying changes throughout time by taking the various phases of ANT into account.

6.5.1 Introduction

As described previously, the Praga district in Warsaw has undergone many changes in recent years. Of special concern has been the architectural interventions by international investment companies that although they say they pay attention to the heritage values of places, often ignore many characteristics of the neighbourhood, including the local community, resulting in processes like gentrification. It is against this background that a project called PragaLab was established.

According to their website, PragaLab is "an experimental space. PragaLab seeks effective ways to combine the district's heritage with the development of local economy and clear-cut solutions to reduce barriers to the development of initiatives. We test new models for connecting active people with unused places". Since June 2019, over the course of four years, the PragaLab team looked for effective ways to address the district's heritage with the development of local economy and clear-cut solutions for community-led initiatives. PragaLab is set up within the European research project called OpenHeritage; the project partner in Warsaw is the Warsaw branch of the Association of Polish Architects 'OW SARP'. OW SAPR is responsible for running PragaLab, and the team operating PragaLab consist of three architects, who are supported by an advisory board of four people who supports PragaLab's activities. Again, according to PragaLab's website, their mission is to "support the development of circular social economy in Poland by sharing knowledge, facilitating cooperation, and building innovative models of adapting the space and locations while preserving and exposing the value of heritage and putting it into use". In fact, starting from the immaterial and material heritage values related to work and traditions, PragaLab aims at implementing other types of

investment strategies based on two principles: limited investment funds and the room to include the community in the process of heritage adaptation (OpenHeritage, 2019c). In short, PragaLab is a mediator between citizens where new models for connecting active people with unused places will be tested (OpenHeritage, 2019c).

However, when discussing PragaLab with some interviewees, some additional aims were mentioned as well. Interviewee 4, for instance, argues that PragaLab is especially aiming at heritage preservation, by developing a model for cooperation between the local government and local community for the benefit of reuse of industrial heritage. This is underlined by the PragaLab members who elaborate that *"these models of adaptive reuse should respect the heritage values of the space, both material and immaterial, but also need to be somehow related to the needs of the community, and local (economic) development of Praga"* (Praga interview 9, 2021). Interviewee 10 notes that it is not just about preserving architectural heritage values, but also stories and identity related to 'work' and 'production', in order to recognise this kind of heritage too. Likewise, interviewee 6 mentions that it is about finding a model or tool to calculate not only the financial values, but also nonfinancial values like social values, and values for inhabitants and the local community.



Figure 21 Map showing the location of Piekarnia in Warsaw's Praga district. Map source: (Sadowy et al., 2021)



Figure 22 Piekarnia in Praga, Warsaw (source: Sadowy, Brodowicz, & Czeredys, 2021)).

All in all, a variety of goals and aims are identified by the interviewees. Nevertheless, the main aim of PragaLab can be summarised as developing and implementing strategies of adaptive heritage reuse based on limited investment funds and the needs of the local community (Sadowy et al., 2021). To this end, various methods and tools are applied, and various processes implemented to achieve this goal. Alongside processes such as mapping heritage values, design workshops, and a project called 'Made in Praga', PragaLab is especially focusing on a former bakery complex building – called in Polish 'Piekarnia' – and tries to develop and implement models for community-led heritage practises in the context of this bakery. This complex consists of a former manufacturing facility of the old bakery and a residential building that is connected to it (see Figure 21). This Bakery complex is located in the middle of a part of Praga that is

developing quickly; social housing buildings can be found here as well as regular building and shiny modern flats (see Figure 22). The bakery itself was, until recently, still in production and is now listed as a regional heritage site as these places of production are more and more disappearing.

The interest in the bakery building started when PragaLab was looking for a topic for a workshop; the bakery turned out to be a perfect subject of analysis. PragaLab then dedicated a design workshop on the bakery to identify its heritage values and the local community for whom the preservation and adaptation of the bakery may potentially be of great importance, and to suggest new uses which will enhance the local, communal, and economic potential. By now, PragaLab sees Bakery not only as an intellectual experiment of suggesting models and potential uses, they also try to implement these models. Indeed, interviewee 15 mentions that the Bakery project is now trying to make the building open for the local community, by organising all kinds of activities like workshops and open hours, to get the local community involved.

In a neighbourhood where heritage values are often ignored by large-scale developers, PragaLab, and especially the Bakery project, aims to illustrate alternative heritage reuse paths that particularly pay attention to the needs and values identified by the local community. Moreover, by doing so, PragaLab tries to be a source of inspiration that might even impact other actors or institutions in Praga. PragaLab's activities, therefore, can be regarded as a physical space in which to solve societal challenges, by bringing together various stakeholders for collaboration and collective ideation.

6.5.2 Strategies

In order to do this PragaLab implements various strategies (or tools and methods) to achieve their goals.

Recognising heritage values (material and immaterial)

Recognising a variety of heritage values is one of the ways in which PragaLab tries to connect to other activities in the neighbourhood, and especially to the local community and its identity. One main strategy is to continue on a historic narrative of production which is very characteristic for Praga district. Part of PragaLab is a special project called 'Made in Praga', which focusses on supporting small entrepreneurs in the district and their production (see Figure 23). Made in Praga aims to keep small-scale production in Praga and accordingly helps entrepreneurs by giving advice on branding their products, marketing, and on improving production (OpenHeritage, 2019c). This is done to emphasise the long history and richness of craftwork and individual entrepreneurship in the context of the physical heritage of the district in order to connect people (entrepreneurs and artists) with the tangible and intangible heritage of places (OpenHeritage, 2020). Interviewee 10 explains: "It is about playing up some heritage values of production, the aesthetics, but not in a superficial way, just using the values that are there, even if it is not so elegant". In this regard, PragaLab tries to show that it is not about big-scale investments and clustering small spaces into one space. Instead, it is the small-scale entrepreneurs who continue a tradition of work that comes forth from the urban structure and the heritage values of the district.



Figure 23 Map showing crafts entrepreneurs in the vicinity of Piekarnia. Map source (Sadowy et al., 2021).

Made in Praga works as a kind of network of cooperation, which in fact emerges from the urban structure of the area where there are clusters of a lot of small entrepreneurs on the same street or very nearby (see Figure 23). Interviewee 10 further elaborates: *"So aesthetics, the urban structure, and networks of cooperation, I think these three are heritage based, but very much modern and needed"*. Finally, it must be noted that the Made in Praga project is also another way of educating people about heritage values, and as such links to other initiatives in Praga, like the Museum of Praga, which particularly focuses on this crafts heritage as well.

Recognising, educating, and stimulating immaterial and material heritage values can be a valuable strategy to enhance community-heritage engagement. The methods and tools applied by PragaLab to achieve this (by means of Made in Praga) are creating a network of cooperation to stimulate small-scale local production, by promoting a storyline of production as immaterial heritage, and to educate the local community about these heritage values. As such these methods could contribute to a co-evolutionary approach that stimulates community-heritage engagement, most notably as these methods aim to create connections between material and immaterial heritage, and the local community. Sadowy et al. (2021), however, notes that despite these methods, craftwork and small-scale production is disappearing: "Unfortunately, bottom-up initiatives of artistic and artisanal clusters are disappearing from former factories, service premises on ground floors, or outbuildings within tenement houses, which makes the process of creation of new works of art and products isolated and conducted behind closed doors, at an increasing distance from the city center" (Sadowy et al., 2021, p. 14). In sum, although recognising that a variety of heritage values is an important aspect with regard to community-heritage engagement, it is questionable whether these methods actually help in preserving immaterial heritage values, especially in a district that is undergoing major changes.

This strategy corresponds with the problematisation phase, step 1 in the translation of actor networks as identified by Callon (1986). In this phase, PragaLab is identifying the problem at stake, and explores who is interested in joining a network of cooperation, and on which base (i.e., which values are recognised). Also the main issues to address are identified in this phase, as PragaLab is identifying some of the key topics to focus on.

Partnerships and cooperation

Apart from the cooperation with the Museum of Praga to promote the crafts heritage, many partnerships and cooperations are set up, mainly with the aim to connect as much as possible to the local community. Interviewee 11 explains: "*PragaLab is a kind of platform (a kind of mediator), an important platform, because this is a kind of umbrella, or independent organisation which is trying to create cooperation, they try to connect different groups, the local community, different stakeholders, and they have to deal with different representatives, from the city council and even sometimes from the state institutions*". When discussing this list of stakeholders with the interviewees, it indeed appears that there is a lot of contact with people from various departments of the city administration, including but not limited to neighbourhood councilors, the office of conservation, and the vice president of the municipality.



Figure 24 Map showing NGOs located near Piekarnia. Map source (Sadowy et al., 2021).

On creating community involvement and cooperation it seems that these methods work. Interviewee 10 explains: "It grows constantly. And stakeholders are really deeply involved. We try not to just ask a question and then drop these people out of our minds. Instead, we try to keep them in the loop, or keep them involved in a way. So we hope to strengthen this kind of community for after the project. Some cooperation already existed before, but this could be wrapped up in PragaLab. It is not our aim to create a new body, a new institution or anything like that, we rather support what is already in place" (Praga interview 10, 2021). Meetings are set up to not only spark the interest, but also to see how to deal with the formal limitations and institutional barriers (related to law and policy) that PragaLab is facing (Praga interview 6, 2021). Interviewee 15 notes, however, that it is still a challenge to find the best way to cooperate with the municipality and to find a model to include the local community in public private partnerships.

Moreover, PragaLab reaches out and connects to a wide variety of stakeholders, including but not limited to local entrepreneurs, various active citizen collectives, NGOs who act in Praga, and cultural institutions like the Museum of Praga (Praga interview 2, 2021) (see Figure 24). When working on a specific project or process (for instance the Bakery building) the group of stakeholders can even be bigger and include local and national heritage officers, the heritage community, investors and financial institutions (Praga interview 9, 2021). This is not surprising because PragaLab works as a kind of platform/mediator where there are always a lot of stakeholders involved. Furthermore, there is special attention for knowledge sharing, both within PragaLab (as a variety of experts are part of PragaLab's advisory board) and beyond (e.g., within a program for local centers in the city of Warsaw, or within various European research projects).

Knowledge sharing and organising all kinds of meetings are methods applied by PragaLab to create community involvement. Involving the local community as an important actor is recognised by PragaLab, but not yet so much by other involved institutional actors. Although PragaLab aims to impact this institutional context and change the discourse on reuse of industrial heritage in Praga, it is questionable to what extent PragaLab is actually succeeding to do so. Heritage management approaches in Praga are still mostly based on the opinion of heritage experts rather than the local community.

This strategy corresponds to the interest phase, but also to the mobilisation of allies' phase. PragaLab is not only setting up all kinds of relations with different stakeholders – thereby being very outwards oriented –, it also tries to be embedded in a wider setting, and tries to get embedded in the institutional context. These are characteristics of the phase mobilisation of allies, as the initiative is becoming part of something bigger.

Community involvement

A special group to reach out to is the local heritage community, as it is a vital element of PragaLab's goal to include the local community in heritage reuse projects. The group, which is called the local heritage community, exists of different people, and can vary. Interviewee 9 states: *"We think of a heritage community as those people who are interested in heritage, it has a certain value to them ... "This can be various kinds of people. For instance, those who are active in the field of heritage care, mostly activists or people that studied Warsaw's history, society and culture. Sometimes, these people are experts as they are professionally trained as historians and the like, but oftentimes it is just a hobby for those people that are really interested in the history of Warsaw. Actually, it is these people that are usually quite active in terms of heritage care" (Praga interview 9, 2021). Two other groups that are mentioned by this interviewee are the journalists who write about contemporary developments in various city districts and are thus an* important mediator to reach out to the community, and the general public who is not always involved in activism, but will nevertheless support initiatives like PragaLab.

About this last group, interviewee 2 notes that the input of this group from the local community is the most important as they live next to you, they are your neighbours, and it is very important not to disturb them. It is for this reason that PragaLab goes out and asks these people: "We ask questions like; what do you think about the history? What are the memories about this place? What do you like to have inside?" (Praga interview 2, 2021). The information gathered is incorporated in the heritage reuse plans for buildings like the Bakery (OpenHeritage, 2020). Gathering information from the local community is not always easy as some people are "very closed and already asked so many times that they are tired about it" (Praga interview 2, 2021) or they, for instance, lack the skills to do a Zoom meeting (especially the older people). It is for this reason that community involvement is done layer by layer, as interviewee 10 explains: "We don't go directly to the broad community of the area, but we involve people who are important players and are involved with the heritage. For a lot of people the way a street looks has already a lot of emotional value, but they cannot recognise or discuss in detail the architectural values of the area. So we involve people who are activists – some of them are acting for the heritage itself, some more socially oriented" (Praga interview 10, 2021).

To reach out to the local community and to a broad audience, a strategy that is used within PragaLab is to use various methods for getting in touch with as many people as possible. Interviewee 9 provides a summary: social media, meetings, discussions, panel discussion, mailings, and also providing some publications such as a recently published book about the Bakery. One of the main methods to reach out – a method that is also regarded as a community building tool – is organising various workshops where a small group of people work on a specific subject (OpenHeritage, 2020). This dissemination is mainly done with the goal to reach out to an audience who are possible interested. Interviewee 9 explains that it is sometimes difficult due to privacy policy to get in touch with people and that PragaLab, for that reason, usually collaborates with people they already know. Yet, interviewee 10 states that PragaLab also does open calls to *"not only to follow our link with whom we know, but also to find new people and try to get them involved"*.

Community involvement is not only at the heart of PragaLab, but also an important aspect of a co-evolutionary heritage approach. As such, the various strategies applied for reaching out to the local heritage community can be seen as enabling with regard to implementing a co-evolutionary heritage approach. Yet, in Praga district, it remains a challenge to formalise community involvement, and as PragaLab shows, sometimes it works better to reach out to local activists instead of to the community as a whole.

This strategy corresponds to the enrolment phase, the third step in the translation of actor networks. In the enrolment phase an initiative gains robustness by binding together the components of the heritage assemblage and by binding actors together so that relations are sustained over time. By reaching out to the local community, PragaLab tries to reach out to an audience who are possible interested and tries to bind them to their initiative.

Flexibility, adjusting and experimenting

As explained in the introduction of this section, the main aim of PragaLab is to develop a model for heritage reuse for the benefit of the community by adding a new layer of value. It must, however, be noted that such kind of model does not yet exist in Poland and accordingly many interviewees see PragaLab as a kind of laboratory where there is room for experimentation, adjustments, and a flexible approach.

Interviewee 2 elaborates that "there is often no time for mistakes in either politics, business, and institutions. So these kinds of laboratory methods give us a space to make experiments". Laboratory in this regard means that: "PragaLab does not think that they know the solution. That is very important. Because people and the municipality are often very sure that their solutions are the only ones, but, in fact, there are so many solutions. When you are open you can be more innovative. So I really appreciate that PragaLab takes this risk and can make mistakes" (Praga interview 2, 2021). Moreover, interviewee 11 appreciates the fact that: "PragaLab experiments to develop a kind of a model that can really work, something that is not totally abstract or kind of utopian vision, but something that can be really useful for a certain place, a certain building, but also for a whole district". She notes that this is not only a very important aspect for the PragaLab team. It can also be of benefit to local NGOs and active citizen collectives, and for similar places in Praga (as there are about 40 old factory buildings in Praga, of which some are in anticipation of a new use (see Figure 25). Indeed, one interviewee explains that developing a flexible model only makes sense if it is applicable in other places and districts as well, as each district has its specific problems: "In some districts, like Praga, there are hundreds of old buildings. So it is very important to make the model flexible so that it will fit in other places in Warsaw and even other places in Poland" (Praga interview 2, 2021).

In order to make the model also interesting for other districts in Warsaw, it is important to maintain good cooperation with various city institutions (OpenHeritage, 2020). It is for this reason that PragaLab tries to inspire and convince the municipality – among other actors – to act differently. They do so by presenting good examples from around the world or by bringing new inspiration and using the language of benefits. Interviewee 2 mentions that: *"Luckily, some people at the municipality are more open and they search with us for other ways of doing things, but some of them justwon't listen"* (Praga interview 2, 2021). Interviewee 9 underlines this and states that the municipality is very open and it is already quite positive that they participate in the workshops, because they are interested. Also interviewee 6 who works herself for the department of economic development of the city of Warsaw argues that the municipality is open for new ideas, and tries to support PragaLab in looking for ways forward together. This interviewee however acknowledges that it is difficult to just incorporate all the proposals made by PragaLab.



Figure 25 Map showing new investments in the close proximity to Piekarnia [elaborated by mamArchitekci]. Map source: (Sadowy et al., 2021).

Indeed, based on the interviews with the members of PragaLab it appears that it is quite challenging to convince the municipality about models for heritage reuse. Interviewee 9 notices that cooperating with the municipality is a very slow and uncertain process, with a lot of political struggles and conflict: "You are never sure, because suddenly the director of a division can lose his/her job or somebody will be replaced due to changes of competencies, or sometimes even collusion between some parts of municipality". Furthermore, he notes that the municipality has to deal with limited public finances that have to be spent in a transparent way through all kind of procedures. Interviewee 10 sees some challenges in cooperation with the municipality as it is very difficult to make the municipality more focused on the local level: "They always think in terms of Warsaw and Warsaw being an important city in Europe or even beyond. I always say, okay but you have hundreds or dozens of local entrepreneurs, are you not interested in them? They are true assets; you don't have to look for them abroad, you already have them" (Praga interview 10, 2021).

Flexibility and adaptability are important aspects to assure that a model for heritage reuse is applicable in a variety of context, in Praga district and abroad. Being flexible and adaptive is, however, oftentimes not incorporated in municipalities' policies or part of their practises. Experimenting and being flexible and adaptive is in this regard just the way for PragaLab to impact the institutional context in Praga and even beyond. In the previous section (describing Praga's institutional context), we saw that institutions in Praga are quite inflexible and change very slowly, and that the institutional organisation is rather complicated. In this regard, it is questionable to what extent new and unprecedent flexible models for community-led heritage practises will find resonance within the context of Praga. This strategy corresponds with the fourth phase of mobilisation of allies (Callon, 1986). PragaLab tries to create support for the expected

outcomes and tries to embed the initiative in a wider setting, including the municipal government. Moreover, characteristics of the enrolment phase can be identified, as different actors are geared towards the same goal of developing models for heritage reuse practises.

6.6 **Reflection**

Praga district is going through a rapid and extensive process of transformation resulting in the danger of losing several forms of material and immaterial heritage. The aim of PragaLab is to identify and incorporate these heritage values and to make policies and initiatives of entrepreneurs more heritage oriented (OpenHeritage, 2020). Indeed, PragaLab's aim is to develop and test a heritage reuse model that will raise renewed attention for the immaterial heritage of the local community, one that will challenge the neoliberal paradigm of making profit out of urban development.

That these are rather ambitious goals is also recognised by the members of PragaLab themselves, as they note: "We understand our power to really change something is limited. We can only challenge some processes or put attention on some aspects. by provide knowledge or tools" (Praga interview 9, 2021). Various other interviewees also warn of aims that are too ambitious. Interviewee 3, for instance, warns about the long-term costs of small-scale community initiatives, and the risk of being taken over by a developer or investors. Interviewee 4 warns of not neglecting the forces that currently steer Praga's developments, as he argues that private developers can just level out community-led development initiatives: "There are a lot of projects in Warsaw that are on a much bigger scale than what PragaLab is doing, and there is much more money involved, and much stronger forces. But, then again, these are market forces rather than local community forces. In that regard, PragaLab is a unique chance to show how it can be done" (Praga interview 4, 2021). The success of PragaLab thus partly depends on the extent to which the outcomes are translatable from a small-scale project to large scale and an actually applicable model. Then PragaLab is even interesting for the municipal government as interviewee 8 – project leader at the city of Warsaw – explains: "After finishing this project, I would like to see and learn how to use this model and knowledge. how to translate it from small scale to large scale. Of course, when there are one or two small-scale projects you are focused on, it is easier to go on details, but when you go on a district level and when you have hundreds of buildings to do, obviously you can't do it in this kind of precise way. So it is a matter of knowing how deep you can and should go in one project. We should try to use this knowledge and experience to transform it to something new and something else that we can use" (Praga interview 8, 2021). Nevertheless, PragaLab keeps on working as an experimentation room for creating a model that addresses nonfinancial values and is of benefit to the local community. Interviewee 15 states: "It is nevertheless important to start conversations, to cooperate, and to show that there are different ways to deal with heritage, rather than just leaving heritage empty or selling it to private investors who make fancy lofts there".

When reflecting on PragaLab's own aims of 'supporting the development of circular economy in Poland by sharing knowledge, facilitating cooperation and building innovative models of adapting spaces and locations while preserving and exposing the value of heritage' it must be noted that there are actually already multiple aims outlined; it is about recognising and exposing heritage values, cooperation, flexible models for heritage reuse, and community engagement. With regard to this first aspect of recognising a variety of heritage values, and exposing them, this thesis concludes that this is an important element, especially in the light of stimulating community-heritage engagement. If communities recognise and value their heritage in their neighbourhood, the support for the protection and management of this heritage will probably be bigger, which is of importance in a district that is undergoing major changes. With regard to the second aspect of creating cooperation, we conclude that there are some signs that PragaLab is on the way to creating all kind of connections, and to stimulating cooperation by organising all kinds of activities, ranging from making publications, to actively reaching out to citizens groups or NGOs. However, the question is whether there is a real impact so far, for instance, with regard to getting recognised by institutions like the municipality, and being able to impact their policy in turn. One must ask whether this is even possible given the difficult and complex institutional context in Praga. Indeed, although PragaLab aims to impact the institutional context and change the discourse on reuse of industrial heritage, heritage management approaches in Praga are still mostly based on the opinion of heritage experts rather than the local community. For that reason, we suggest that PragaLab should focus more on its role as mediator and act as a key element for linking all kinds of cooperation, especially between the local community, entrepreneurs, politicians, and policy makers. Regarding testing models for heritage reuse, we conclude that this is a very noble and interesting ambition, but that this probably goes beyond the capacity of PragaLab. Indeed, the ambition to also implement these models in actual cases (i.e., the Bakery) is still without any concrete outcomes yet. And even if there were concrete results, it is good to reflect whether this is the most logical thing to focus on, as increasingly elusive processes like gentrification and urbanisation seem to determine what heritage reuse models are applied in the district (mostly profit-oriented). Moreover, as institutions in Praga are quite inflexible and complex, and change very slowly, it is questionable to what extent new, and unprecedent flexible models for community-led heritage practises will find resonance within the context of Praga. In line with the aforementioned recommendation for PragaLab to focus more on its role as a mediator, we suggest they focus less on the actual implementation and testing of models, and more on trying to influence the policies in Praga, to shape conditions so that heritage reuse models can be implemented in the future. It is more important that alternative heritage reuse models be implemented in the future at different locations across Warsaw, instead of having one example in the case of the Bakery that doesn't have much impact or inspiration for other locations. Finally, with regard to community engagement, we conclude that community involvement is not only at the heart of PragaLab, but also an important aspect of a relational heritage approach. As such, we suggest that PragaLab sees this as the main path to follow for the future. At present, there is already an active community in Praga, but it remains a challenge to formalise community involvement, and the means are lacking to make the voice of the local community heard louder at the level of institutions or investors in Praga. Here, too, we see a role for Praga to act as a mediator, and

to really stimulate community engagement as this is key to protecting and keeping the heritage of the district, and therefore also for keeping the unique spirit of Praga.

Based on the observations made in this case study, it must be noted that PragaLab's emphasis on community involvement has potential and could be highlighted as the main aim to focus on. PragaLab has the potential to act as a mediator and shape conditions, inform institutions, and ask question in order to change the conditions so that community engagement can become a common practise in heritage reuse in Praga. The focus on community involvement has potential, and there are already examples that community engagement is key for the care for heritage. That is why we advise PragaLab to highlight community engagement as their main aim, and to search for means to purpurate and enhance involvement of local communities in Praga.

6.7 **Conclusion**

The analysis of the case presented in this chapter provides ingredients that contribute to an answer for the sub-research question of this chapter: how does a relational heritage approach manifest itself in present-day European heritage practises, and how is this relational approach sustained over time?

At present, Praga's heritage assemblage is described as an urban working-class district with pre-war material heritage relicts including nineteenth century tenement houses, combined with close-knit communities that aim to uphold the special identity and atmosphere of the district. If we look at the extent to which interrelations between the various aspects of the heritage assemblage are established and maintained over time, it must be noted that various processes of change impact the way heritage (both material and immaterial) is perceived and how this impacts the local community. Various process of change impact all the individual aspects of this assemblage; interventions and reuse of material heritage relicts often ignore many characteristics of the neighbourhood, including the local community, resulting in processes like gentrification; immaterial values and the special atmosphere of the neighbourhood are disappearing due to the influx of newcomers to the district; and the growing attractiveness of the neighbourhood leads to new big investments which in turn even enhance the process of change in the neighbourhood. These processes seem to constrain a process of co-evolution. Indeed, when material heritage is either in a process of decay or being repurposed, there is a potential that it will lose its role in the local community. Likewise, the district's identity and atmosphere will change as the composition of the local community changes and big investments will not only impact the urban heritage and atmosphere but eventually also the community and its identity. Nevertheless, the local community cares about small-scale immaterial heritage assets, as well as the reuse of larger heritage objects that have an impact on the neighbourhood. By organising all kinds of small-scale initiatives, members of the local community try to even enhance the involvement of the local community. Indeed, it is important that the local community recognises that their voice can be of importance when it comes to finding new functions for old buildings. Without doing so, sites of heritage reuse might not be available to local residents

anymore as these sites become commercially appropriated and excluded from the local community.

Specific local actors like PragaLab try to raise awareness on specific aspects such as (im)material heritage, or it tries to establish relations that are not yet or only partly present in Praga, relations between the community and its heritage for instance. Moreover – and this is also an indicator of co-evolution – PragaLab tries to adapt to changes in its broader social and institutional context, and to evoke changes to this context as well. Yet, we saw that the factor-actor-institution context of Praga impacts the role of communities in heritage issues in a rather negative way and leaves limited room for new heritage approaches that offer more room for community-led heritage practises. Therefore, it must be concluded that although the tools and methods applied by PragaLab are mostly effective with regard to enhancing community-heritage engagement, these methods are only partly able to cope - let alone to evoke change with the complex factor-actor-institution context of Praga or with major contemporary processes like gentrification and urbanisation. The case of Praga district therefore shows that co-evolution is not just a matter of (re)connecting various aspects of the heritage assemblage, such as the community to its heritage. The impact on and the ability to change the broader social and institutional context are an essential element of co-evolution, and, as we have seen in Praga (and in PragaLab), key to creating an environment where community-heritage engagement can flourish.

Indeed, in rapidly changing districts like Praga, local communities and others are struggling to compete process of change that impact their heritage, and the engagement with it. The small-scale initiatives in the neighbourhood that aim to connect the local community to the district's heritage are an effective way to show local communities that their voice can be of importance when it comes to finding new functions for old buildings. However, despite a fair level of community interest and care about heritage, increasingly elusive processes like gentrification, migration, and urbanisation seem to override the dynamism of the district. Where, for instance, the local community organises activities to keep small-scale, more immaterial, heritage assets like statues of St. Mary or street patterns and green areas, architectural interventions by international investment often lack interest in the local communities. This process is exacerbated by Praga's institutional context that is characterised by laissez-faire policy, a strong entrepreneurial attitude, the lack of leading governmental actors, and a reluctant attitude towards new ideas, such as models for community-led heritage management. It must be concluded that community-led heritage reuse practises are to a great extent impacted by the factor-actor-institution context in a way that is rather constraining.



CONCLUSIONS

7.1 **Opening up to dynamism and multiplicity**

This thesis started from the observation that heritage is increasingly induced with various aims such as community engagement in heritage matters and the observation that a further integration of heritage and spatial planning is pivotal for enhancing more resilient and sustainable spatial programs for the future. Both across European policy contexts and in heritage scholarly domain, the heritage debate is now paying more attention to these new aims, yet without exploring in much detail what the engagement of communities in heritage matters means with regard to heritage approaches. Nevertheless, a further integration of heritage and spatial planning and working closely with (heritage) communities – each with their own, but interrelated interests and understandings of heritage – means that multiple perspectives will be present in the continuous production of heritage. Based on an analysis of the theoretical assumptions and the subsequent heritage management practises of current dominant heritage approaches, it is shown that both the object-oriented and process-oriented heritage approaches have difficulties in connecting heritage with spatial developments and accommodating community engagement.

An object-oriented approach to heritage is a mainstream approach in heritage practise to preserve heritage objects in good physical condition, yet with an overriding emphasis on a kind of fixed, inherent, idea of heritage, resulting in a situation that heritage objects easily remain distanced from societal dynamics. A process-oriented approach does pay particular attention to the ways in which heritage comes about, yet by doing so, heritage might become a source of contestation and conflict, as a variety of stakeholders shares a plurality of heritage values. Moreover, the dynamism and multiplicity of heritage valuation by communities is not fully captured in this approach. At the same time, heritage management becomes more interwoven with spatial developments, yet with an unfortunate tendency towards isolation of heritage assets from its immaterial aspects. And although various scholars argue to incorporate individual or communal notions about affectivity with heritage, current heritage approaches tend to work towards single, agreed-upon ideas of heritage in which communities do not necessarily recognise themselves.

From here, this thesis argued that as community engagement in heritage matters and the integration of heritage and spatial planning is becoming more important, heritage approaches should become more receptive towards dynamism and multiplicity, due to the variety of stakeholders involved and values attributed. Most of the current heritage management approaches are however either object or process-oriented, and thus strive towards single or fixed heritage values – the first by focusing on the physical heritage asset, the second by focusing on an overall heritage narrative – and thus leave little room for this dynamism and multiplicity. Based on a theoretical analysis of current dominant heritage approaches, it becomes clear that there is a need to explore additional theoretical conceptualisations to view heritage relational, so that new approaches can be articulated that address the dynamism and multiplicity that come with community-heritage engagement and integration of heritage as a resource in spatial developments more profoundly. In line with this observation, the objective of this thesis was to explore heritage approaches, that address dynamism and multiplicity in order to deal with an ongoing heritage valuation process by communities and other stakeholders. To address and understand heritage practises at present day, this thesis proposed to focus more on a situational and relational performance of heritage. The research hypothesis of this thesis was that relational approaches can help us to overcome the abovementioned of the limits inherent to an object-oriented or process-oriented approach and open up to the dynamism and multiplicity that come with community-heritage engagement. Indeed, it was hypothesised that such relational approaches would see heritage not as constrained, but open and full of interpretations and reinterpretations. As such, these approaches might help to better and more precisely explain communities' and individual's ideas and values of heritage.

Theories on assemblage theory and co-evolution have been used to gain insights in the situational and relational performance of heritage in time and place, allowing us to see that heritage comes alive in an ongoing valuation process by communities and other stakeholders. These two theoretical notions - assemblage theory and co-evolution – are used to describe how heritage is constituted, and analyse and processes and patterns of change over time, for the better or the worse. This concluding chapter reflects on the research objective and research hypothesis, and formulates answers to the research questions by combining theory and overall analysis.

7.2 Answering the research questions

7.2.1 Theoretical reflections

In line with the above, this dissertation explored theoretical conceptualisations that see heritage as a manifestation of continually changing and interrelated processes of valuation and revaluation. Post-structural notions – such as relational notions of space and place, and assemblage theory – appeared to be useful to understand interrelatedness and interdependency. Assemblage theory was used to describe how heritage is constituted. Co-evolution is used to reveal the dynamism and change over time. Co-evolution namely not only places emphasis on the reciprocal interactions between two or more evolving systems, but also on the interactions in and to a specific dynamic context. In other words, co-evolution takes place within a broader evolving social and institutional context. Although the concept of co-evolution has hitherto mainly been theoretically elaborated with regard to heritage, various heritage scholars have hinted at a transformational and relational view on heritage, where heritage is seen as continuously changing and evolving.

Addressing interrelatedness and changes over time – a combination of assemblage theory and co-evolution – brought us a theoretical conceptualisation that allowed to see heritage as a manifestation of continuously processes of valuation and revaluation; influenced by reconsiderations and therefore always moving. The meaning of heritage then is not to be regarded intrinsic, but relational, while receiving meaning only from

the context and from other subjects, and influencing them in turn. Adopting this theoretical notion helps to overcome some of the limits of the object- oriented and process-oriented heritage approaches, as these were rather fixed approaches that have difficulties in accommodating multiplicity and dynamism that community-engagement and integration of heritage in spatial developments, would require. A relational approach explicitly addresses the multiplicity of various elements, the interactions and changes among them, and the evolution over time.

Thus, to answer the first research question; a relational approach with regard to heritage management, would see material and immaterial heritage assets, local and/or heritage communities and spatial (re)development, as continually and mutually related and responding to each other's changes. Such a relational heritage approach starts from the notion that heritage is an open and responsive system in which many actors and ideas - as subsystems - act in parallel, and in unforeseen, nonlinear, and spontaneous ways due to changing circumstances. This thesis conceptualised the heritage assemblage as consisting of four connected subsystems: material heritage, immaterial heritage, local heritage communities and spatial development/identity. With regard to these four aspects part of the heritage assemblage, we saw in the literature that only relations between some aspects (or subsystems) are extensively described. In particular the links between material heritage and spatial development, between community and spatial development, and the link between community, immaterial and material heritage are mentioned. It must however be noted that some of these relations are discussed only in one direction and the mutual relation between aspects is only discussed in some studies. Yet, assemblage theory is a gathering process, meaning to focus particularly on the interrelatedness of the different aspects of an assemblage. An assemblage approach would therefore see material and immaterial heritage assets, local heritage communities and spatial development/identity as continually and mutually related and responding to each other's changes. Indeed, it is not just one of these aspects that should be part of the assemblage, or a combination of several aspects. Instead, it is of particular significance to address the interrelatedness and interconnectivity of all four aspects.

7.2.2 Empirical reflections

But how could such a relational heritage approach manifest itself in present-day European heritage practises, and/or would it indeed lead to a heritage approach that is able to accommodate dynamism and multiplicity? For that purpose, this dissertation observed and analyzed several specific cases on community-heritage engagement in the light of the theories of assemblage and co-evolution.

Within the empirical studies conducted for this thesis we saw a great variety in the ways and extent in how a relational heritage approach manifests itself. Analysing fifteen projects of heritage reuse throughout Europe, revealed major differences between the driving forces behind these projects, and the heritage assemblages of the cases (see Table 6). In most cases, various aspects of the assemblage were present (this is shown in the first column of Table 6), yet the interrelation between these aspects turned out to be only occasionally supportive. The arrows in the first column of Table 6 indicate the main interactions between the different parts of the heritage assemblage. By doing so, it is indicated that the relation between material heritage and spatial development/ identity is frequently strong in the projects. Community-heritage engagement and incorporating communities' and individual's ideas of (immaterial) heritage on the other hand, appeared to be rather context-dependent and strongly influenced by national heritage policy. The case-studies revealed, that developing a local heritage community around the site from an earlier moment in the process, might be a way to make sure that the restored buildings become part of the community, and are taken care of as such in the future. From the start of the initiative to reuse Stará Tržnica, linking heritage to the community has been a key aspect, the reuse initiative started from a proposal with the support from various communities, who were convinced that the reuse project would serve their purpose in many ways. This support also helped to convince the municipality about the public interest in their reuse plan. Rather than starting with renovation works and only find occupants later on (as was the case in Potocki Palace and Alba Iulia). engaging with the local heritage community - in not only an early stage of the heritage reuse project, but in a continuous stage - helps to establish links between the local community and the material heritage object; and therewith the goal of resilient heritage management.

The analysis of cases also shows that it is important to explore and reflect on the different understandings of heritage. In some countries the 'public' nature of heritage means public authorities have the main responsibility (example: Potocki Palace). This can mean a fairly inflexible approach to (formally designated) heritage assets, following an inflexible legal system, and focusing on materiality, aesthetics, and a very narrow set of values. Opposite to this, and in order to also address and incorporate immaterial heritage values, cases where a cocreative process was followed to explore heritage meanings, a sense of belonging was created and this process raised awareness of heritage values that go beyond the material ones alone.

Site	Heritage assemblage and main interactions between parts of the assemblage.				Institutio- nalization	Type of co-evolutionary interactions
	Material heritage	Immaterial heritage	Spatial develop- ment/ identity	Local heritage communi- ties	Formal/ informal	
	15 practi	ces of heritag	e reuse thro	ughout Europ	e e	
Cascina Roccafranca, Turin		<		\rightarrow	Formal	Symbiotic
Scugnizzo Liberato, Naples	<			\rightarrow	Formal	Symbiotic
Sargfabrik, Vienna			<i>←</i>	\rightarrow		Parasitism
Färgfabriken, Stockholm	<		\rightarrow		Informal	Symbiotic
Largo Rêsidencias, Lisbon	<			\rightarrow	Formal	Symbiotic
Jewish District, Budapest	<		\rightarrow			Parasitism
LaFábrika detodalavida, Maimona						Interferential
Halele Carol, Bucharest	<		\rightarrow			Interferential
Stará Tržnica, Bratislava		~ ~ ~		\rightarrow	Informal	Symbiotic
Potocki Palace, Radzyń Podlaski						Interferential
ExRotaprint, Berlin			<	\rightarrow	Formal	Symbiotic
St Clemens hospital, London		~		\rightarrow	Formal	Symbiotic
Jam Factory, Lviv						Interferential
Marineterrein, Amsterdam	<	\rightarrow				Parasitism
Citadel, Alba Iulia						Interferential
		2 in-d	epth cases			
Grünmetropole	<		\rightarrow			Parasitism
Praga district		<i>←</i>		\rightarrow		Parasitism

Table 6 Overview of the heritage assemblages of the various cases discussed in this thesis

Another important aspect is the creation of assemblages and the integration of a heritage site in its wider context (see third column of Table 6 for an overview of the process of institutionalization in the different cases). This can be done by incorporating an area-based approach in the reuse project, or by actively reaching out to existing structures, organizations and communities. It must be noted that out of the 15 cases, only two cases showed such a wider territorial approach: Largo Rêsidencias and Stará Tržnica. In these projects a relational approach to heritage is recognizable as heritage

is linked to the community, integrated in its wider (territorial) context. Moreover, multiple and different understandings of heritage are explored, and the reuse plans remained deliberately open and flexible (in terms of program) in order to adapt to future changes. Especially this openness and flexibility allow changes over time, and this makes that interrelations between various aspects of the assemblage remain connected over time. Indeed, a heritage approach based on these characteristics assures that heritage remains relevant in a complex world of multiple heritage values and different stakeholders involved. However, and based on the cases discussed, this establishment of relations between various aspects of the assemblage depends on the complex interplay of the actions of initiators and others in the heritage reuse projects, as well as the social/institutional system in which they operate. Indeed, the extent to which interrelations are established and maintained over time strongly depends on the initiatives of local actors and the extent to which their actions impact policy and institutions.

Grünmetropole

In the case of the Grünmetropole the heritage approaches applied were far from relational ones, mostly due to the large discrepancy between the implemented project design and the local communities' understandings of heritage (see visualization in Figure 26).

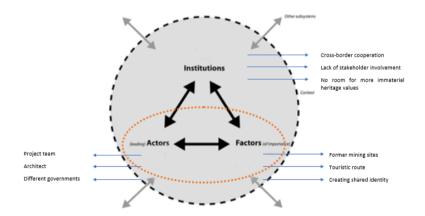


Figure 26 The actor-relational settings of heritage management for Grünmetropole.

Nevertheless, in detail we observed that various local communities within the respective mining regions deployed small scale initiatives related to the mining past, which were set up to address this issue. Such initiatives particularly aimed to create an interaction and relatedness of material and immaterial heritage assets, local and/or heritage communities and spatial (re-)development. In the former mining employees' neighbourhood of Eisden (Flanders) for instance, citizens undertook all kinds of social activities aimed at strengthening the community, and also its identity – being a former mining neighbourhood. A small-scale museum was erected, documentaries were recorded, and art projects were launched, all about life in a (former) mining town. These initiatives were initiated and supported by the local communities themselves. Some of these activities particularly addressed the special character of the former Garden City

working class neighbourhood. As part of an art-project, trees in the neighbourhoods were decorated with small statues of Saint Barbara, which referred to the mining past (as this saint is known as the patron saint of miners). Next, a project was launched to plant new hedges in the neighbourhood. This was done to strengthen the Garden City design of this area, but also to teach new residents and the younger generation about the, for some unknown, history and identity of the neighbourhood.

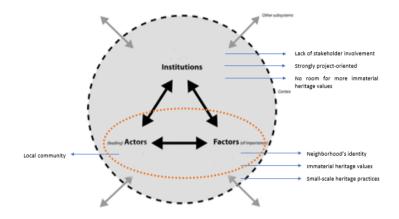


Figure 27 The actor-relational settings of heritage management for small-scale projects within Grünmetropole (i.e., Eisden)

These projects were not necessarily linked to the preservation of an object, but were more focused on the neighbourhood's identity, practices, immaterial aspects (see the actor-relational settings of these small-scale projects in Figure 27). These practices, or 'ways of doing', are rather informally dealing with heritage, although even the citizens themselves would not regard these as heritage management practices. Yet, these practices are an expression of how a community and individuals understand and value heritage. Such personal engagements with heritage were, however, not incorporated into the Grünmetropole project as a whole, but still linger on, and even inspire today's policy makers, not only in Eisden, but also elsewhere in the Grünmetropole region itself as elsewhere.

By reflecting on this case, it appears that the applied heritage management approaches in combination with the lack of stakeholder involvement led to a project where there was almost no room for incorporating more personal, or immaterial ideas of heritage. Also in terms of interrelatedness of the various aspects of the heritage assemblage, it must be noted that the Grünmetropole project itself mainly addresses the relation between material heritage and spatial development/identity. The relation between the local heritage communities, immaterial heritage and spatial developments was not really established. But the Grünmetropole project did manage to establish an assemblage of smaller assemblages, as various heritage sites were linked to each other by the design of a route. Yet, this assemblage of assemblages was not really embedded in a wider institutional setting and thus deranged over time. Indeed, within the Grünmetropole project, a governance plan for maintenance, management and future development on the long run was missing. As a result the different relations between the parts of the assemblage, as well in terms of cooperation, fell apart. Based on this case it can be concluded that heritage management approaches should pay more attention to the small-scale local heritage initiatives, and should pay more attention to governance models that ensure maintenance of projects in the long term and openness to potential readjustments. Reflecting on this case, it must therewith be concluded that the strategies and applied heritage approaches did not lead to the implementation of a relational, let alone co-evolutionary, heritage approach, but did inspire domestic sets within sets to come up with their own ideas about miners heritage.

Praga

In the case of Praga on the other hand, we saw indeed some examples of a relational approach to heritage in a wider (territorial) setting; although this approach was often hampered or manifested in an unintentional way. For instance, with regard to interrelatedness of the various aspects of the heritage assemblage, it must be concluded that small scale initiatives in the neighbourhood that aim at connecting the local community to the district's heritage, looked to be an effective way to show local communities that their voice can be of importance when it comes to finding new functions for old buildings. Moreover, various actors, like PragaLab, tried to institutionalize models for communityled heritage practices (see the actor-relational settings of PragaLab in Figure 28). However, despite a fair level of community interest and care about heritage, increasingly elusive processes like gentrification, migration, and urbanization, seem to override the dynamism of the district; partly just because the area was preserved and put on the agenda again. But where for instance the local community organizes activities to keep small-scale, more immaterial, heritage assets (like statues of St. Mary or street patterns and green areas), architectural interventions by international investments often lacked interest in these symbols of the local communities' identity and used them only for their own (entrepreneurial) sake. The Praga case therewith shows that the broader social and institutional context can form enabling or constraining conditions for the implementation of a relational heritage approach.

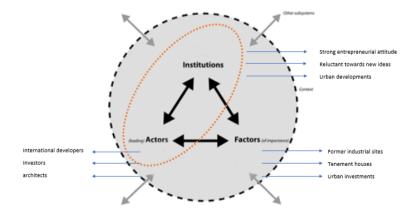


Figure 28 The actor-relational settings of heritage management for Praga district

Therewith, in the case of Praga, we noted that the ability to change the broader social and institutional context is an essential element to create an environment where relational approaches can manifest itself, and more general where community-heritage engagement can flourish within an appropriate institutional setting.

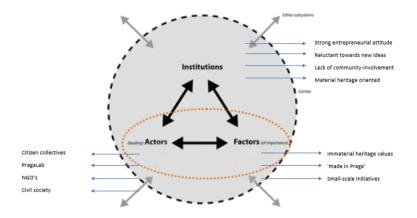


Figure 29 The actor-relational settings of heritage management for PragaLab.

In Praga, we saw that the institutional context is characterized by lasses-faire policies, a strong entrepreneurial attitude, the lack of leading governmental actors, and a reluctant attitude towards new ideas, such as models for community-led heritage management (see the actor-relational settings of Praga district in Figure 29). This is similar to what we saw in the case of the Grünmetropole. Here too, the institutional context worked rather constraining instead of enabling. It was a high-level, abstract, visionary masterplan which had almost no links with the existing spatial issues, or socio-cultural patterns in the region. Besides, it was a top-down plan in terms of governance model applied, which found only limited resonance in the region, in fact, it led to a mismatch between plan and local perception as it didn't help the project didn't really address the issues the region was dealing with. Moreover, there was a general lack of community-involvement in the project set-up of the overall Grünmetropole project.

Comparing both in-depth cases teaches us that the Grünmetropole project did inspire smaller assemblages, as various heritage sites were linked to each other by the design of a route. Yet, this assemblage of assemblages was set up in a kind of 'vacuum'. The Grünmetropole never really got institutionalised, and the project was not embedded in a wider setting of similar projects, or governance models for the long term. In this regard, PragaLab has the potential to act as a mediator and shape conditions, inform institutions, and ask question in order to change the conditions so that community engagement can become a common practice in heritage reuse in Praga. As a matter of fact, the focus on community involvement has potential, and there are already examples that community engagement is key for the care for heritage. That is why PragaLab should highlight community-engagement as their main aim; to not only search for means to purpurate and enhance involvement of local communities in Praga, but especially to embed their proposals in the wider institutional context. As such, both cases seemed to reflect in fact an assemblage of assemblages, whereby the Grünmetropole turned out to be relationally less successful in reference to the overall (inter)national storyline, but more effective in the local projects, and whereby the PragaLab turned out to be a relational amalgam of various projects, but where an overall story or identity in reference to the general policy of Warsaw is still missing. Here in both cases the institutional inclusion (formal/informal) seems to be pivotal, because the Grünmetropole was not able to include the heritage intentions cross-border, but on a local or regional levels; and PragaLab has for the moment not succeeded in an overall story-line for Praga as a whole, let alone in the bigger heritage policies of Warsaw and the Polish government.

Thus, to answer the third research question; the various cases show that a relational heritage approach is not just a matter of (re-)connecting various aspects, such as the community to its heritage, but also to remain open to the multiplicity and dynamism of those communities. The impact on and the ability to change, the broader social and institutional context are an essential element, and, as we have seen in Praga, key in order to creating an environment where community-heritage engagement can flourish. But what do these results now tell us? The cases discussed in this thesis were all located in an European context and selected within the scope of a European research project aimed at community engagement in adaptive heritage reuse projects. The quest for inclusive, participatory governance and management models is an issue that can be found in many cases in different geographical contexts from all over the world, and beyond the focus on heritage alone. The attention for the reuse of heritage, and its integration within a wider spatial context including local communities, might be a more Western concept. Indeed, even within the European cases discussed in this thesis, differences are identifiable between for instance the UK and the Netherlands – where specific governance structures and heritage conceptualizations that support heritage reuse – and more Eastern-European countries like Romania, where heritage is less seen as a valuable asset to be used for creating assemblages that can also be of benefit for other urban issues as well.

7.3 **Reflections and recommendations**

The integration of heritage as a resource in spatial planning, and the increasing calls for community-heritage engagement, bring several challenges for heritage management and for those dealing with heritage. Most notably while questions about the nature of heritage are being asked more often; what is heritage in a specific context? And what values does it represent? At the same time, multiple and changing perspectives on heritage will be present due to the involvement of ever more citizens or local heritage communities. This is something that can be recognized in many present-day heritage-discussions where the variety of heritage meanings and understandings lead to contestation or conflict. Indeed, many questions remain with regard to which heritage understandings to include, whose understandings? And what to do with the plurality of viewpoints, and potentially uncountable understandings of heritage? Community-heritage engagement nevertheless can be regarded as a sign

that heritage still lives strong to this day, but it also poses heritage management and heritage policy for a tough challenge to accommodate dynamism and multiplicity. This thesis has provided several clues about how such a heritage management could look like.

First, heritage management should be fundamentally community (and communities' values) oriented. In various cases discussed in this dissertation, we saw that local heritage communities are eager to share their stories, and heritage values, and want to see them included in spatial, reuse or redevelopment plans. In the case of Cascina di Roccafranca and Stará Tržnica for instance, we saw particular initiatives to not only identify and map communities' heritage values, but also to incorporate them in the heritage reuse plans. In those cases, incorporating communities' heritage values appeared to be a way to make heritage more resilient in a complex world of continuously changing values. This particularly becomes clear in comparison with cases like the Grünmetropole, where there was also local interest to share heritage values and tell stories about the mining past, but these values were not incorporated, leading to a project design that lacked support from the local community and therewith never really got adopted by the region and its inhabitants. It can be concluded that heritage (reuse) practices could start from the small-scale, local heritage values, and grow from there grow into locally embedded heritage that is also more future-proof in terms of values recognized. This small-scale, locally and community oriented approach has however implications for heritage management as heritage emerges as something much more vital, vibrant, nuanced and variable than formally understood. Here it is no longer possible to make a checklist of pre-identified criteria, in order to tick off the characteristics of heritage we thought to knew. The ideas of standardization (in terms of heritage values, heritage recognition, and decision-making structures) are in conflict with the communities' recognition of heritage. This tension should be recognized and discussed more often. It should be acknowledged that heritage is not only a reservoir of monuments, but also includes aspects of lived heritage; meaning recognized, practiced and values by local communities. Understanding these local, living values of heritage is something that has been recognized by the European Faro Convention. The Council of Europe's 'Framework' Convention on the Value of Cultural Heritage for Society, known as the Faro Convention (Council of Europe 2005) is unlike most heritage conventions not concerned with how to protect heritage, but why. Accordingly, Faro focusses on heritage in all its forms, practiced at different levels, and pays attention to questions like 'how heritage sustains our societies, what are the social and cultural benefits for societies, and what is the relationship between heritage and memory?' The Faro convention takes the broadest possible definition of cultural heritage: intangible as well as tangible, perceptual as well as physical, action, performance, custom and behavior as well as objects and buildings. For this convention, heritage is thus present within everyday ordinary life. It sees heritage as a continuing process of creating, constructing, using and modifying heritage. In this sense heritage is redefined by Faro as a verb, not a noun (Fairclough 2009, 29). This very much relates to a relational approach to heritage, as this approach helps to see heritage as an ongoing process of constructing, using and modifying heritage, as is argued in this thesis. Therefore, this dissertation suggests to further elaborate the Faro approach and further expand it in order to actually pay more attention to local, living heritage values, which, as this dissertation showed, are very important for the future of heritage.

Second, heritage management should be more flexible and adaptive. Flexible and adaptive not only in terms of better differentiation of policy and management, in order to incorporate differences in different contexts or locations. But also flexible and adaptive in terms of changing heritage values over time. The various cases discussed in this research showed that there is a wide variety in forms of community engagement and that community engagement is to a large extent different in different situations, depending on the social/institutional system in which communities operate. In that regard, European heritage policy as well national heritage policies and management, should be better differentiated so that heritage policy can become more focused on addressing different contextual aspects, as well as dynamism and multiplicity in society. Moreover - and this is particularly illustrated in the cases Largo Rêsidencias and Stará Tržnica – a deliberate open, adaptive and flexible approach (in terms of functions of the heritage building) allows to adapt to future changes, and assures that heritage remains relevant in a complex world of multiple (changing) heritage values and different stakeholders involved. At the same time, this means that heritage management needs to be able to adapt to future changing heritage values as well. Once more this is an argument to not any longer try to define heritage in a single, specific way, but to focus on changing expressions of heritage over time. It is challenging to apply this approach in practice. Yet, scholars like (Jones, 2017, p. 22) explored methods to capture "the dynamic, iterative and embodied nature of people's relationships with the historic environment in the present". Jones argued to make more use of qualitative methods derived from sociology and anthropology in order to gain understandings of communities' heritage values. Among various techniques like focus groups, qualitative interviews and participant observation, Jones argues that the most productive approach to identify communities' values lies in forms of collaborative coproduction that involve both professionals and members of relevant communities. Also Wells and Lixinski (2017) argue for the adoption of tools, such as dialogical democracy and participatory action research in order to come to an adaptive regulatory framework for heritage. In addition to new methods to deal with communities' heritage values, Wells and Stiefel (2018) argue for a better balance between professional heritage practice and the needs of everyday people in how the management of heritage is addressed. Indeed, in this regard, a relational heritage approach moves away from the idea of a central entity that 'manages' heritage towards a dynamic process of heritage governance in which many actors take part. The role of the heritage expert, therefore, becomes one of co-creating the conditions under which changes and evolutions can occur, as well as activating the involvement of different actors including local heritage communities.

Third (and in line with the above two), spatial (re-)developments should be more embedded in local histories, heritage values, and better connected to local communities' needs. In both the Grünmetropole case, and the Praga case heritage is strongly interrelated with spatial developments in respectively the region, and the neighbourhood. Yet, in both cases the heritage values are only partly taken up. In the case of the Grünmetropole a heritage narrative for touristic purposes was set up without having much attention for local stories, and in the case of Praga, heritage values are disappearing due to various spatial developments that neglect heritage of the local community. Indeed, those spatial developments (such as implementing a touristic route) are often more based on a kind of 'creating' or promoting heritage values of an object or place instead of maintaining the values that were there already. In this regard, spatial developments could be set up, and organized, the other way around; to start from locally embedded, community-driven, small-scale heritage projects, and to use them as a basis for future developments. These small-scale, locally embedded heritage projects are not only a way to connect the past of a neighbourhood or region, with the present, but these projects can also ensure that heritage is a source of inspiration for the future, thus, to connect past and future. Also in terms of assemblage building, it appears that heritage is an important element in assemblage building. Especially in the two in-depth cases, Praga district and the Grünmetropole, the importance of incorporating locally recognized heritage values becomes clear. Whether it is to preserve a certain identity, a region's historic narrative, or to counter processes like gentrification and urbanization, heritage appears to be an important aspect for local communities. In this process of assemblage building, heritage should not just be used for reasons of window-dressing, but should really be the starting point of creating an assemblage, that is also to be used for other urban issues as well. For that purpose, it is important to also guide the local communities in their processes of engagement. Both the Grünmetropole and the Praga case provides some clues on how to develop spatial plans that start from local heritage initiatives. Institutions, like local municipalities should offer room for flexibility, experimentation, and the implementation of new models for heritage reuse. Local initiators, community groups, or mediators, should receive enough room to get involved and to share and implement plans and ideas. Projects that are set-up, should think about their long-term goals, and the governance models to take care of these long-term goals as well as maintenance over time. And finally, once more, participatory models should be embraced in order to identify and incorporate communities' heritage values in spatial (re-)development plans. This all together could help to ensure that heritage can retain its value in changing neighbourhoods or regions.

7.4 Wrap up

The research hypothesis of this thesis was that a relational approach to heritage can help us to overcome some of the limits inherent to an object-oriented or process-oriented approach and opens up to the dynamism and multiplicity that come with community-heritage engagement. In this research project it became clear that a relational approach is not about providing a single, specific definition of heritage. Rather it focuses on expressions of heritage- such that heritage becomes a manifestation of continuous processes of valuation and re-valuation and as something that is always involved in the process of 'making'. As such, a relation view on heritage allows us to see heritage as an open and responsive system in which many actors – as subsystems - act in parallel, and in unforeseen, non-linear, and spontaneous ways, due to changing circumstances. Waterton and Watson (2013, p. 558) already noted that "there is much to be gained not only from looking beyond its things, but also beyond its representations and the discourses that use it, to encompass other relationships it might have with lived experience". Decentering heritage, and focusing on relations means that the character of heritage occurs relationally, multiply, fluidly and so on. Based on the cases presented in this research project it can be concluded that this indeed helps us to better

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and more precisely explain communities' and individual's ideas and values of heritage as it allows us to engage with the very real emotional and cultural work that the past does as heritage for individuals and communities.

A relational approach to heritage addresses some of these issues. Such an approach explores heritages instead of heritage, it is not a linear way of defining what to be called heritage and what not, but a nomadic quest for meaning and value. As heritage is made in acts and feelings of everyday living there is, perhaps, no closure in heritage: no full script, no controlled tour. Moreover, a relational approach is an approach in which adaptation and flexibility are an inherent element. This might sound like defining heritage becomes very difficult, but yet at the same time, evolution is not new to the domain of heritage. In fact, this is a heritage tradition in itself, to add new layers of meaning without removing the old ones. In a relational approach, defining heritage is not any longer about providing a single, specific definition of heritage. Rather it focuses on expressions of heritage- such that heritage becomes a manifestation of continuous processes of valuation and re-valuation and as something that is always involved in the process of 'making'.

Adopting such as relational approach, and creating locally embedded heritage assemblages is– as this thesis shows – conducive for enhancing engagement of local communities in heritage matters. This engagement could lead to a kind of cultural binding which in turn leads to a bigger engagement of local communities in other spatial issues as well. Several cases discussed in this thesis show that this cultural binding is pivotal for creating a sense of community and commitment to get engaged. Adopting a relational heritage approach therewith opens up heritage and links the management of heritage assets more overtly to other spatial issues as well. This fits within a broader trend in the heritage domain, to link heritage to other topics, such as sustainability. These are paths forward that help to ensure that heritage retains its value in a changing society.



APPENDICES

Appendix 1: Topics and interview guidelines for the 15 cases

1. Anthropological analysis

STORY

What is the story of the building / heritage site? What is the timeline of the interventions? How did you get involved yourself, when, why, and in what role? What were the main controversies in the project and how did you solve them?

ACTORS

Who are the protagonists of developing this project? How did the core group change with time? Who are the users and how do they use the place? How would you describe the community around the project? In what ways are people involved? What is important for them? What creates an attachment to the place?

PROCESS

Who initiated the project, who joined, who left? How do you manage the process? Is it a blueprint development or gradual/organic/adaptive process?

COMMUNICATION

Is there a communication plan? Who are your target groups? What communication channels do you use?

INFLUENCES

What ideas, methods, tools were helpful in the development of the project? What other experiences did you rely on? What were the main skills used in the process?

IDENTITY

What were the original objectives of the project and how did they change? How would you describe the identity of the project? What are the values represented by the project?

MEMORY

What layers of history are present in the site? How does the project build on these layers?

2. Architectural analysis

TYPOLOGIES

How would you describe the building? What size and what type? What kind of spaces does the site include? What is the relationship between the indoor and outdoor spaces?

CONDITIONS

In what conditions did you find the building and how did you improve? What architectural, structural interventions did you have to make? What is the infrastructural status of the site? (heating, insulation)

USES

What former uses did the building accommodate? Did the new functions collide with the building's prescriptions? What future uses do you envision? What reputation did the site have and how did it change? Did new uses imply the addition of new elements to the building?

ADAPTIVE REUSE

What were the design principles and criteria applied or implemented in the project? What were the main operational needs expressed by the community? What are the critical factors that affected the success of the adaptive reuse projects? How does this idea of use and reuse relate to your (changing) idea of heritage? How does this relate to other heritage reuse projects? Were there some examples, ideas, inspiring projects incorporated in your plan for reuse?

3. Geographical and Demographical analysis

LANDSCAPE

How is the built tissue around the site? What zoning and building permits characterise the area? What green areas or public spaces are around the site?

POSITION

What is the position of the site within the urban agglomeration/rural area? How accessible is the site within the broader area? What kind of transportation options are available?

DEMOGRAPHY

What demographical composition does the area have? (education, employment, income, safety, etc.)

ECONOMY

What kind of businesses and economic activities characterise the area? What real estate prices and trends characterise the area? What ownership structures characterise the area?

4. Legal, administrative and policy analysis

POLICIES & REGULATIONS

What regulations have an impact on your work? Are there any reuse / regeneration policies for the area? How did you interact with these policies? Did procedural times and public bureaucracy influence the project? What other regulations, policies would you need for the project?

HERITAGE PROTECTION

What kind of heritage protection is on the area? What is the level of heritage protection and what does it imply? What consequences does it have for your project?

ZONING

What zoning regulations apply for the site? What consequences do they have for your project? Were there any building code considerations enabling/preventing to start the initiative? Were there any planning provisions/zoning constraints enabling/preventing the initiative?

OWNERSHIP

What is the ownership structure of the site? What consequences does it have for your project?

PROCUREMENT

Was there a procurement process in place when you got access to the site? What consequences did it have for your project?

5. Resource analysis

FINANCIAL RESOURCES

What did you need most financial resources for? (Renovation, purchase, etc.) What were the renovation, purchase, etc. costs? What financial resources (grants, loans, investment) did you use for this? What public institutions were involved in financing the project? What financial actors were involved and with what conditions? What public subsidies did the project use? What private subsidies did the project use?

NONMONETARY RESOURCES

What nonmonetary resources did you use for the project? knowledge, volunteers, materials, marketing, barters, etc. What nonmonetary resources were mobilised by the core groups and the community?

BUSINESS PLAN

What is the idea of the site's business plan? What major expenses and revenues does the site have? What major economic activities take place at the site?

6. Stakeholder analysis

MAIN STAKEHOLDERS

What are the main individuals and organisations involved in the project? What is their role in the project? How do they contribute? In what stages were they involved and how did their roles change throughout the process?

Who had the dominant say at a certain time and did this change over time? What is the role of public, private, civic stakeholders?

GOVERNANCE

What is the governance structure of the cooperation? (contracts, regular meetings) What are the main conflicts that need to be addressed? Are there any mechanisms that regulate the relationships within the project?

What mechanisms would be needed?

7. Impact analysis

IMPACT

How would you describe the impact of the project? Impact on different scales? And on different groups? Is there a contrast between planned and achieved impact? What is the general impact of the project on economic activities? What is the general impact of the project on social and community activities? What kind of organisations /initiatives are hosted at the site?

RECEPTION

What is the reception of the project in the public opinion, the media, etc.? What are the different narratives of the project?

POLICIES

Did the project set a precedent in its field? Did the project generate new regulations/policies?

KNOWLEDGE

What did you learn from the project? What new skills were created throughout the process? What new jobs and professional roles did participants develop in the process? How do you share your practise and knowledge with other initiatives?

8. Heritage analysis

HERITAGE EFFECT

Why is this site regarded as heritage? Is there a disagreement concerning the heritage value of this site? What is the heritage value of the site? What is the importance of the heritage in the project? In what sense is heritage an advantage or disadvantage? Did your example of preserving heritage create a precedent for other buildings? Did your project have an influence on heritage policies? Has the idea of heritage been adjusted during the process – and why?

Appendix 2: Semi-structured topics and questions for interviews on Grünmetropole

Introductie:

- Wie bent u en welke rol heeft u zelf gespeeld bij het project? Hoe en wanneer was dat?

Grünmetropole:

- Wat is het verhaal van de Grünmetropole?
- Hoe is dit project ontstaan? Met welk idee is dit project gestart? Waar kwam het initiatief voor dit project vandaan? Welke ruimtelijke vraagstukken werden geadresseerd met de uitvoering van dit plan?
- Wat waren de oorspronkelijke doelen van dit project (en hoe zijn deze veranderd?)
- Kunt u een chronologisch overzicht geven van het project?
- Welke problemen heeft het project gekend? En hoe is hiermee omgegaan?
- Kunt u een beschrijving geven van de routes en de locaties op deze routes?
 Hoe zijn deze routes tot stand gekomen? Welke locaties zijn er gekozen? En welke verhalen worden hier naar voren gebracht?

Context:

- Kunt u een beschrijving geven van de landschappelijke context? Bijv. wat betreft de locaties van de (voormalige mijngebieden) de locatie in de Euregio, en de koppeling met het landschap die de Grünmetropole-route probeert te bereiken.
- Kunt u een beschrijving geven van hoe het mijnverleden van deze streek de inspiratie heeft gevormd voor het Grünmetropole project?
- Kunt u een beschrijving geven van de demografische en economische situatie van het Grünmetropole-gebied?
- Kunt u een overzicht geven van de institutionele kaders en wet-en-regelgeving waarbinnen dit project tot stand is gekomen?

Betrokken actoren:

- Welke partijen zijn er betrokken geweest bij dit project? Wat is hun rol geweest?
- Welke partij had de doorslaggevende rol bij besluiten rondom dit project?
- Wie zijn de gebruikers en hoe gebruiken zij dit project?
- Op welke manier zijn actoren/burgers betrokken bij dit project? En waarom?
 Hoe beschrijft u de gemeenschap die gebruik maakt van dit project?
- Op welke manier is de gemeenschap betrokken bij het project en op welke manier hebben zij inspraak gehad?

Uitwerking:

- Heeft dit project ervoor gezorgd dat mensen zich onderdeel voelen van erfgoed, erbij betrokken zijn geraakt? Wat maakt dat mensen zich verbonden voelen tot dit project?
- Hoe verhoudt dit project zich tot de mijngeschiedenis en het gemeenschapsgevoel/identiteit
- Hoe verhoudt dit project zich tot andere projecten?
- Zou dit project een voorbeeld kunnen zijn voor andere projecten qua aanpak en methoden en instrumenten?
- Welke perceptie heeft het project in de publieke opinie (of in de media):
 Is dit veranderd doorheen de jaren?

Erfgoed:

- Is dit project een voorbeeld voor de omgang met erfgoed?
- Welke geschiedenis wordt met dit project naar voren gebracht?
- Wat is het belang van erfgoed bij dit project? Is dat een voor- of nadeel?
- Welk idee van erfgoed wordt hier uitgedragen? (Welke benadering: vooral toerisme/ of betrokkenheid community/ of nieuw leven in de brouwerij brengen?)
 - o In hoeverre worden veranderende ideeën over erfgoed meegenomen?
 - Hoe verhoudt dit ideeën van erfgoed zich tot andere ideeën voer erfgoed?
 - Welke methoden en instrumenten zijn er gebruikt om het ideeën van erfgoed te inventariseren?

Contactgegevens en informatie:

- Heeft u nog aanvullende informatie (documenten/websites e.d.)?
- Heeft u contactgegevens van andere betrokken partijen?

Appendix 3: Semi-structured topics and questions for interviews on Praga district

Introduction

- Could you introduce yourself/ your organization?
- What role do you/does your organization play in the Praga district?

Praga District: 4 aspects and relations

- How would you describe current spatial developments going on in Praga district?
- How are these spatial developments influencing your activities?
- How would you describe the community involved in Praga?
- Which heritage values (material and immaterial) do you think the Praga district has?
- How do these values influence your activities?
- How would you describe the material heritage in/of Praga?
- How would you describe the immaterial heritage in/of Praga?
- How do these values relate: conflicting/ supportive/....?

Praga Lab (Activities)

- What is your role in the Praga Lab?
- Who took the first initiative and what was the direct motivating factor to start the Praga Lab?
- Who were and are the leading actors in establishing the Praga Lab? Who was and is involved in organizing these activities/actions?
- What are the main aims of the Praga Lab? Who defined/defines them?
- Did these aims change over time, (what new activities or actions did you undertake, how do they differ from previous ones?)
- What values and perceptions about heritage did you incorporate in Praga Lab?
- What activities/actions did you undertake? Why? (in relation to location, heritage values, and the like)
- What did you do to set up these activities/actions?
- What would you describe as being the main method or approach of the Praga Lab?
- Can you describe some major events or controversies in the existence of Praga Lab?
- What went well in the process of initiating, establishing, and maintaining the Praga Lab; what worked and what could have been done better?
- What do you think are the major questions/issues that need to be worked out regarding Praga Lab?

- In what ways do you engage with other stakeholders?
- What are the binding factors between different stakeholders?
- Did some form of cooperation already exist before activities started (Praga Lab)?
- Did relations, organisations, or people involved change over time? How come? Did the activities in Praga Lab lead to a change in relations between actors?
- Who is the community involved in the project? Which groups are represented?
- How do you reach out to Praga's communities?
- How do you cooperate with community groups?
- How do you gain insights in the needs and perceptions of local residents?

Policy and regulations

- What is your perception of heritage policy in Praga?
- How is this policy contributing to heritage management in Praga?
- How is the Praga Lab related to its institutional context?
- What actors are involved in heritage management?
- How is the Praga Lab acknowledged by local authorities?
- What attention or outreach did you create with Praga Lab?
- Did Praga Lab inspire other projects?

Contact

– Do you have contact details of other people in Praga who might be interesting to speak to?

Appendix 4: Coding frameworks

 Table 7 Coding framework to assess the different aspects part of the heritage assemblage.

THEME	CRITERIA
Material heritage	Historical value and artistic value connected to the building or site; physical authenticity of the building; structural stability and technical state of the building; materials and decorations of the building (Wang & Zeng, 2010)
Immaterial heritage	Cultural value, value of identity, and the capacity of an object to interact with memory (Vecco, 2010)
Spatial develop- ment/identity	Site and situation; scenic/contextual value; land use plan or zoning; regional development policies, project plan (Wang & Zeng, 2010; Yung et al., 2017)
Local heritage community	Compatibility of newly introduced uses with existing; public interest; social value; increasing public awareness, involvement, and support; enhancing the role of communities (Wang & Zeng, 2010; Yung et al., 2017)

Next, we also specify the actor relational approach with regard to the domain of heritage research, and set up themes related to the aspects of actors, factors, and institutions (following and applying the work of Boelens (2010).

THEME	CRITERIA
Actors	Stakeholders involved varying from dominant or leading actors, to also more hidden or evolving networks of actors, such as the local community, local organisations, active citizen collectives, NGOs, politi- cians, and the interaction between these various groups of people.
Factors	The more physical contextual elements like geography, infrastructure, the spatial layout of the area, and the presence of listed heritage buildings, as well as the impact of events, transitions, and historical implications.
Institutions	Institutions refer to a large set of formal and informal rules, regulations, policies, and legislations; a combination of the more formal guidelines, rules, and policy of various governmental organisations, and more informal 'rules of the game'.

 Table 8 Coding framework to assess the themes of the actor relational approach.



REFERENCES

References

- Ahmad, Y. (2006). The Scope and Definitions of Heritage: From Tangible to Intangible. International Journal of Heritage Studies, 12(3), 292–300.
- Ames, K. (1996). Archaeology, style, and the theory of coevolution. In H. Maschner (Ed.), *Darwinian archaeologies* (pp. 109–131). Springer.
- Anderson, B. (1983). *Immagined Communities: Reflections on the origin and spread of nationalism*. London: Verso.
- Anderson, B., & McFarlane, C. (2011). Assemblage and geography. *Area*, 43(2), 124–127.
- Ashworth, G. (2008). Paradigms and paradoxes in planning the past. In M. Smith & L. Onderwater (Eds.), *Selling or Telling? Paradoxes in Tourism, Culture and Heritage, Association for Tourism and Leisure Education*. (pp. 22–34). Atlas reflections.
- Ashworth, G. (2011). Preservation, Conservation and Heritage: Approaches to the Past in the Present through the Built Environment. *Asian Anthropology*, 10(1), 1–18.
- Ashworth, G., & Graham, B. (2005). *Senses of Place: Senses of Time*. Oxon: Routledge.
- Ashworth, G., & Tunbridge, J. (2000). *The tourist-historic city*. London: Routledge.
- Baarveld, M., Smit, M., & Dewulf, G. (2013). Planning and commitment in cultural heritage projects. *Journal of Cultural Heritage Management and Sustainable Development*, 3(2), 163–174.
- Baeten, G., Swyngedouw, E., & Albrechts, L. (1999). Politics, Institutions and Regional Restructuring Processes: From Managed Growth to Planned Fragmentation in the Reconversion of Belgium's Last Coal Mining Region. *Regional Studies*, 33(3), 247–258.
- Bava, H., Behrens, E., Craig, S., & Wall, A. (Eds.). (2005). *Masterplan Grünmetropole; Industrielle Folgelandschaft des Nordraumes der Drei-Länder-Region*. EuRegionale 2008 Argentur GmbH.
- Beeksma, A., & De Cesari, C. (2019). Participatory heritage in a gentrifying neighbourhood: Amsterdam's Van Eesteren Museum as affective space of negotiations. *International Journal of Heritage Studies*, 25(9), 974–991.
- Bennet, J. (2005). The agency of assemblages and the North American blackout. *Public Culture*, *17*(3), 445–465.
- Bertolini, L. (2007). Evolutionary Urban Transportation Planning: An Exploration. *Environment and Planning A: Economy and Space*, 39(8), 1998–2019.
- Bertolini, L. (2010). Complex systems, evolutionary planning? In G. de Roo & E. Silva (Eds.), *A planner's encounter with complexity* (pp. 81–98). Ashgate Publishing.
- Beunen, R., Van Assche, K., & Duineveld, M. (2015). The search for evolutionary approaches to governance. In *Evolutionary governance theory: Theory and Applications* (pp. 3–17). Springer.
- Bille, M. (2012). Assembling heritage: investigating the UNESCO proclamation of Bedouin intangible heritage in Jordan. *International Journal of Heritage Studies*, 18(2), 107–123.
- Bizzarro, F., & Nijkamp, P. (1998). Cultural Heritage and Urban Revitalization: A Meta-Analytic Approach to Urban Sustainability. In N. Lichfield, A. Barbanente, D. Borri, A. Khakee, & A. Prat (Eds.), *Evaluation in Planning* (Vol. 47). Springer.
- BKR Aachen. (2005). Grensdal Wormdal: geschiedenis ervaren, werelden ontdekken, bruggen bouwen Masterplan. Aachen: kmk Aachen

- BKR Aachen. (2008). Wormdal zonder grenzen Wurmtal ohne Grenzen: Bruggen slaan, historie beleven, werelden ontdekken. Aachen: kmk Aachen
- Bloemers, T., Kars, H., Van der Valk, A., & Wijnen, M. (2010). *The cultural landscape* & heritage paradox: Protection and development of the Dutch archaeological– historical landscape and its European dimension. Amsterdam: Amsterdam University Press.
- Boeije, H. (2005). *Analyseren in kwalitatief onderzoek: denken en doen*. Den Haag: Boom onderwijs.
- Boelens, L. (2010). Theorizing practice and practising theory: Outlines for an actor-relational-approach in planning. *Planning theory*, *9*(1), 28–62.
- Boelens, L., & de Roo, G. (2016). Planning of undefined becoming: First encounters of planners beyond the plan. *Planning theory*, *15*(1), 42–67.
- Bosma, K. (2010). Heritage policy in spatial planning. In J. Bloemers, H. Kars,
 A. v. d. Valk, & M. Wijnen (Eds.), *The cultural landscape & heritage paradox:* Protection and development of the Dutch archaeological-historical landscape and its European dimension (pp. 641–652). Amsterdam University press.

Bovaird, T. (2008). Emergent strategic management and planning mechanisms in complex adaptive systems – The case of the UK best value initiative.
 Public Management Review, 10(3), 319–340.

Bucurescu, I. (2015). Managing tourism and cultural heritage in historic towns: Examples from Romania. *Journal of Heritage Tourism*, 10(3), 248–262.

- Buijs, J., Eshuis, J., & Byrne, D. (2009). Approaches to researching complexity in public management. In G. Teisman, M. van Buuren, & L. Gerrits (Eds.), *Managing complex* governance systems: Dynamics, self-organization and coevolution in public investments (pp. 37–55). Routledge.
- Bullen, P., & Love, P. (2009). Residential regeneration and adaptive reuse: learning from the experiences of Los Angeles. *Structural survey*, *27*(5), 351–360.
- Bullen, P., & Love, P. (2011). Adaptive reuse of heritage buildings. *Structural survey*, 29(5), 411–421.
- Bullen, P. A., & Love, P. E. D. (2010). The rhetoric of adaptive reuse or reality of demolition: Views from the field. *Cities*, *27*(4), 215–224.
- Callon, M. (1986). Some elements of a sociology of translation: domestication of the scallops and the fishermen of St Brieuc Bay. In J. Law (Ed.), *Power, Action and Belief, a new sociology of knowledge?* (pp. 196–229). Routledge & Kegan Paul.
- Carman, J. (2009). Where the Value Lies: the importance of materiality to the immaterial aspects of heritage. In L. Smith & E. Waterton (Eds.), *Taking archaeology out of heritage* (pp. 192–208). Cambridge Scholars Publishing.
- Casteels, N., Dobbelaere, E., Duyver, M., & Kleinhuis, A. (2020). Mapping Praga and Gentrbrugge: A research of 'lived heritage' in Poland and Belgium. In *Student report for the course Advanced Topics in Governance and Spatial Planning 2 – Faculty of Engingeering and Architecture Ghent University*.
- Central Statistical Office in Warsaw. (2020). *Statistical Yearbook of Warsaw*. Warsaw: GUS.
- CHCfE Consortium. (2015). *Cultural Heritage Counts for Europe*. Krakow: International Cultural Centre.

- Conejos, S., Langston, C., & Smith, J. (2011). *Improving the implementation of adaptive reuse strategies for historic buildings*. SAVE HERITAGE: Safeguard of Architectural, Visual, Environmental Heritage., Naples, Italy.
- Conejos, S., Langston, C., & Smith, J. (2013). AdaptSTAR model: A climate-friendly strategy to promote built environment sustainability. *Habitat International*, *37*, 95–103.
- Coudroy de Lille, L. (2013). Housing in the Polish People's Republic: From "Deficit" to "Crisis". *Le Mouvement Social*, 245(4), 109–122.
- Council of the European Union. (2011). *Action for a Changing Society: Framework Convention on the Value of Cultural Heritage for Society*. Strasbourg: Council of Europe Publishing.
- Council of the European Union. (2014a). *Council Conclusions on Cultural Heritage as a Strategic Resource for a Sustainable Europe*.
- Council of the European Union. (2014b). *Council Conclusions on Participatory Governance of Cultural Heritage*.
- Crabtree, B., & Miller, W. (1999). *Doing qualitative research*. London: Sage publications.

Cresswell, T., & Hoskins, G. (2008). Place, persistence, and practice: evaluating historical significance at Angel Island, San Francisco, and Maxwell Street, Chicago. *Annals of the Association of American Geographers*, *98*(2), 392–413.

- Creswell, J. (2009). *Research design: qualitative, quantitative, and mixed methods approaches*. Thousand Oaks: Sage Publications.
- Crooke, E. (2010). The politics of community heritage: motivations, authority and control. *International Journal of Heritage Studies*, 16(1–2), 16–29.
- Crouch, D. (2000). Places around us: embodied lay geographies in leisure and tourism. *Leisure Studies*, 19(2), 63–76.
- Crouch, D. (2010). The Perpetual Performance and Emergence of Heritage. In E. Waterton & S. Watson (Eds.), *Culture, Heritage and Representation: Perspectives on Visuality and the Past* (pp. 75–90). Routledge.
- Crouch, D. (2012). Meaning, encounter and performativity: threads and moments of spacetimes in doing tourism. In L. Smith, E. Waterton, & S. Watson (Eds.), *The Cultural Moment in Tourism* (pp. 19–37). Routledge.
- Crouch, D. (2015). Affect, Heritage, Feeling. In E. Waterton & S. Watson (Eds.), *The Palgrave handbook of contemporary heritage research* (pp. 177–190). Palgrave Macmillan.
- Crouch, D., & Parker, G. (2003). 'Digging-up' Utopia? Space, practice and land use heritage. *Geoforum*, *34*(3), 395–408.
- Czeredys, M., Ziajkowska, E., & Piowar, M. (2020). *Pra: an Illustrated Atlas of Praga Architecture*. Poznan: Drukmania s.c.
- Daniel, N., & Robin, R. (2016). Conservation of traditional agriculture as living knowledge systems, not cultural relics. *Journal of Resources and Ecology*, 7(3), 231–236.

Darwin, C. (1859). On the origin of species. London: John Murray.

- Darwin, C. (1888). *The descent of man: selection in relation to sex*. London: John Murray.
- Davison, G. (2008). Heritage: From Patrimony to Pastiche. In R. Fairclough & B. Graham (Eds.), *The Heritage Reader* (pp. 31–41). Routledge.

Dawkins, R. (1983). "Universal Darwinism". In D. Bendall (Ed.), *Evolution from Molecules to Man* (pp. 403–425). Cambridge University Press.

De Kleijn, M., Dias, E., & Burgers, G. J. (2016). The digital cultural biography, a tool for interdisciplinary knowledge exchange on the history and heritage of the urban landscape. *Journal of Cultural Heritage Management and Sustainable Development*, 6(1), 72–94.

De Rijck, T., & Van Meulder, G. (2000). *De ereburgers: een sociale geschiedenis van de Limburgse mijnwerkers*. Berchem: EPO.

De Roo, G. (2010). Planning and Complexity: An Introduction. In G. De Roo & E. Silva (Eds.), *A Planner's Encounter with Complexity* (pp. 1–18). Ashgate Publishing Ltd.

De Standaard. (2006, 17-10-2006). Groenmetropool voor "homo touristicus". *De Standaard*, 28.

- DeLanda, M. (2002). *Intensive Science and Virtual Philosophy*. London; New York: Continuum.
- DeLanda, M. (2006). A New Philosophy of Society. London; New York: Continuum.
- DeLanda, M. (2016). Assemblage Theory. Edinburgh: Edinburgh Universiy Press Ltd.

Delarbre, F., Jaspers, P., & Kohlbacher, J. (2009). Mijnerfgoed in Limburg: putten uit een eeuw steenkool. *Openbaar kunstbezit in Vlaanderen*, 47(2), 40.

Delbroek, B. (2008). Op zoek naar koolputters. *Tijdschrift voor sociale en economische geschiedenis*, 5(3), 80–103.

Della Torre, S. (2019). *A coevolutionary approach to the reuse of built cultural heritage*. Il Patrimonio Culturale in mutamento. Le sfide dell'uso, Bressanone.

Della Torre, S. (2020). A coevolutionary approach as the theoretical foundation of planned conservation of built cultural heritage. In A. Vandesande, E. Verstrynge, & K. van Balen (Eds.), *Preventive Conservation – From Climate and Damage Monitoring to a Systemic and Integrated Approach* (pp. 11–18). CRC Press/Balkema.

Dembski, S. (2006). Duitse Regionalen: succesverhaal voor regio's? *Rooilijn*, *39*(7), 388–395.

Dominika, B., Katarzyna, S., & Skłokina, I. (2020). (Post)przemysłowe dzielnice Warszawy i Lwowa: rola pamięci i dziedzictwa dla biznesu i przemysłu kreatywnego.

Douglas, J. (2006). Building adaptation. London: Butterworth Heinemann Publishing.

Dovey, K., & Ristic, M. (2017). Mapping urban assemblages: the production of spatial knowledge. *Journal of urbanism: international research on placemaking and urban sustainability*, 10(1), 15–28.

- Dubrow, G. (1998). Feminist and multicultural perspectives on preservation planning.
 In L. Sandercock (Ed.), *Making the invisible visible: A multicultural planning history* (pp. 57–77). University of California Press.
- Dudek-Mańkowska, S., & Iwańczak, B. (2018). Does gentrification of the Praga Północ district in Warsaw really exist? *Bulletin of Geography. Socio-economic Series*, 39(39), 21–30.
- Duineveld, M., van Assche, K., & Beunen, R. (2015). *Evolutionary Governance Theory: Theory and applications*. Berlin: Springer.
- Durham, W. (1991). *Coevolution: Genes, Culture, and Human Diversity*. Stanford: Stanford University Press.

- Dziemianowicz, W., & Szlachta, J. (2019). *Warsaw: Revival and realignment*. European Investment Bank.
- Ehrlich, P., & Raven, P. (1964). Butterflies and plants: a study in coevolution. *Evolution*, 18(4), 586–608.
- Eibler, L., Gilcher, E., & Ziener, K. (2014). Cross-border Cooperation The Example of the German-Dutch-Belgian Border Region "Groenmetropol". *PlanIt!*, *1*.

Eisenhardt, K., & Graebner, M. (2007). Theory building from cases: opportunities and challenges. *Academy of management journal*, *50*(1), 25–32.

English Heritage. (2000). *Power of Place: The Future of the Historic Environment*. London: English Heritage.

European Commission. (2016). Urban Agenda for the EU: Pact of Amsterdam.

European Commission. (2018). *Supporting cultural heritage*. Retrieved 22/06/2018 from https://ec.europa.eu/culture/policy/culture-policies/cultural-heritage.

European Commission. (2019). European Framework for action on Cultural Heritage.

- European Union. (2016). *Cultural statistics: 2016 edition*. Luxembourg: Publications Office of the European Union.
- European Union. (2017). *Decision (EU) 2017/864 of the Euopean Parliament and of the Council of 17 May 2017 on a European Year of Cultural Heritage (2018)*. Official Journal of the European Union.
- Fairclough, G. (2006). A New Landscape for Cultural Heritage Management: Characterisation as a Management Tool. In L. Lozny (Ed.), Landscapes Under Pressure: Theory and Practice of Cultural Heritage Research and Preservation (pp. 55–74). Springer.
- Fairclough, G. (2008). New heritage, an introductory essay people, landscape and change. In G. Fairclough, R. Harrison, J. Shofield, & J. Jameson (Eds.), *The heritage reader* (pp. 297–312). Routledge.
- Feddes, F., & Caspers, P. (1999). Nota Belvedere: beleidsnota over de relatie cultuurhistorie en ruimtelijke inrichting. Den Haag: VNG.

Felder, M., Duineveld, M., & van Assche, K. (2015). Absence/presence and the ontological politics of heritage: the case of Barrack 57. *International Journal of Heritage Studies*, 21(5), 460–475.

Futuyma, D. (1995). The Uses of Evolutionary Biology. *Science*, *267*(5194), 41–42.

Gerrits, L. (2008). The gentle art of Coevolution: a complexity theory perspective on decision making over estuaries in Germany, Belgium and the Netherlands [PhD thesis, Erasmus Universiteit Rotterdam]. Rotterdam.

Gerrits, L. (2011). A coevolutionary revision of decision making processes: An analysis of port extensions in Germany, Belgium and the Netherlands. *Public Administration Quarterly*, *35*(3), 309–341.

- Gerrits, L., Marks, P., & Van Buuren, A. (2009). Coevolution: A Constant in Non-Linearity. In G. Teisman, A. Van Buuren, & L. Gerrits (Eds.), *Managing Complex Governance Systems* (pp. 148–167). Routledge.
- Gerrits, L., & Teisman, G. (2012). Coevolutionary planning processes. In G. De Roo &
 J. Hillier (Eds.), *Complexity and Planning: Systems, Assemblages and Simulations* (pp. 199–219). Routledge.
- Ghiselin, M. (2003). *The Triumph of the Darwinian Method*. Berkeley; Los Angeles: University of California Press.

Gibson-Graham, J. (2000). Poststructural interventions. In E. Sheppard & T. Barnes (Eds.), *A companion to Economic Geography* (pp. 95–109). Blackwell.

Graham, B., Ashworth, G., & Tunbridge, J. (2000). *A geography of heritage: Power, Culture, and Economy*. London; New York: Arnold; Oxford University Press.

Graham, S., & Healey, P. (1999). Relational concepts of space and place: issues for planning theory and practice. *European Planning Studies*, *7*(5), 623–646.

Haldrup, M., & Bœrenholdt, J. (2015). Heritage as Performance. In E. Waterton & S. Watson (Eds.), *The Palgrave handbook of contemporary heritage research* (pp. 52–68). Palgrave Macmillan.

Hall, S. (1999). Whose heritage? Un settling 'the heritage', re imagining the post nation. *Third Text*, *1*3(49), 3–13.

Harris, A., & Matzat, W. (1959). The Aachen Coal Field. *Economic Geography*, 35(2), 164–171.

Harrison, R. (2010). What is heritage? In R. Harrison (Ed.), *Understanding the Politics of Heritage* (pp. 5–42). Manchester University Press.

Harrison, R. (2013a). Forgetting to remember, remembering to forget: late modern heritage practices, sustainability and the 'crisis' of accumulation of the past. *International Journal of Heritage Studies*, 19(6), 579–595.

Harrison, R. (2013b). *Heritage: Critical Approaches*. Milton Park, Abingdon; New York: Routledge.

Harrison, R. (2020). *Heritage futures: comparative approaches to natural and cultural heritage practices*: UCL press.

Harrison, R., & Rose, D. (2013). Intangible heritage. In R. Harrison (Ed.), *Heritage : critical approaches* (pp. 238–276). Routledge.

Harvey, D. (2001). Heritage Pasts and Heritage Presents: temporality, meaning and the scope of heritage studies. *International Journal of Heritage Studies*, *7*(4), 319–338.

Harvey, D. (2015). Heritage and Scale: settings, boundaries and relations. *International Journal of Heritage Studies*, *21*(6), 577–593.

Harvey, D., & Perry, J. (2015). *The future of heritage as climates change: loss, adaptation and creativity.* London: Routledge.

Hassink, R., Dankbaar, B., & Corvers, F. (1995). Technology networking in border regions: Case study of the Euregion Maas Rhine. *European Planning Studies*, *3*(1), 63–83.

Healey, P. (2006). Relational complexity and the imaginative power of strategic spatial planning. *European Planning Studies*, *14*(4), 525–546.

Heinrichs, J., Allgaier, R., & Schröder, R. (Eds.). (2008). *de Groenmetropool: Grenzen overschrijden* (Kees van Surksum, Trans.). Büro G29.

Het Nieuwsblad/Limburg. (2008). Uw gemeente elke dag in de krant. *Het Nieuwsblad/Limburg*, 28.

Hewison, R. (1987). *The heritage industry: Britain in a climate of decline*. London: Methuen Publishing.

Hodgson, G. (2005). Generalizing Darwinism to Social Evolution: Some early attempts. Journal of Economic Issues, 39(4), 899–914.

Hoekveld, J., & Bontje, M. (2016). Intra-Regional Differentiation of Population Development in Southern-Limburg, the Netherlands. *Tijdschrift voor economische* en sociale geografie, 107(3), 282–297. Holuj, D. (2017). Public spaces and cultural heritage in community projects – the example of Warsaw. *European Spatial Research and Policy*, 24(2), 127–144.

Hospers, G. (2002). Industrial heritage tourism and regional restructuring in the European Union. *European Planning Studies*, *10*(3), 397–404.

- Howard, P., & Ashworth, G. (1999). *European heritage, planning and management*. Exeter: Intellect Books.
- Janssen, J., Luiten, E., Renes, H., & Rouwendal, J. (2014). Heritage planning and spatial development in the Netherlands: changing policies and perspectives. *International Journal of Heritage Studies*, 20(1), 1–21.
- Janssen, J., Luiten, E., Renes, H., & Stegmeijer, E. (2017). Heritage as sector, factor and vector: conceptualizing the shifting relationship between heritage management and spatial planning. *European Planning Studies*, *25*(9), 1654–1672.
- Janzen, D. (1980). When is it coevolution? *Evolution*, *34*(3), 611–612.
- Jones, S. (2017). Wrestling with the Social Value of Heritage: Problems, Dilemmas and Opportunities. *Journal of Community Archaeology & Heritage*, 4(1), 21–37.
- Joyce, P., & Bennett, T. (2010). Material powers: introduction. In T. Bennett & P. Joyce (Eds.), *Material Powers: Cultural Studies, History and the Material Turn* (pp. 1–22). Routledge.
- Kallis, G. (2007). When is it coevolution? *Ecological Economics*, 62(1), 1–6.
- Kallis, G., & Norgaard, R. (2010). Coevolutionary ecological economics. *Ecological Economics*, *69*(4), 690–699.
- Kasper, H. (2012). The Aftermath of the Closure of the Dutch Coal Mines in South Limburg: Regional Economic and Social Reconstruction.
- Kasper, J., Faun, H., Gardenier, J., Knoops, S., Roels, L., Knotter, A., & Rutten, W. (2013). Na de mijnsluiting in Zuid-Limburg – 35 jaar herstructurering en reconversie 1965–2000 en een doorkijk naar 2010. Voerendaal: Schrijen-Lippertz.
- Kemp, R., Loorbach, D., & Rotmans, J. (2007). Transition management as a model for managing processes of co-evolution towards sustainable development. *International Journal of Sustainable Development & World Ecology*, 14(1), 78–91.

Keunen, P. (2010). *Mijn Cité: met de Mijncité naar de 21ste eeuw*. Genk: Stebo vzw

Kosunen, H., Atkova, I., & Hirvonen-Kantola, S. (2020). Co-Evolutionary Urban Planning of a Finnish City for its Low Growth Neighbourhoods. *Planning Theory & Practice*, 21(4), 552–569.

- Kumar, R. (2014). *Research methodology: a step-by-step guide for beginners*. Thousand Oaks: Sage Publicatons.
- Kuss, M., Meyer, C., & Reimer, M. (2010). Die REGIONALEN als Instrument regionalisierter Strukturpolitik in Nordrhein-Westfalen-das Beispiel der REGIONALE 2010
 Köln/Bonn. In B. Mielke & A. Munter (Eds.), *Neue Regionalisierungsansatzätze in Nordrhein-Westfalen* (pp. 117–139). ARL.
- Lähdesmäki, T. (2014). The EU'S Explicit and Implicit Heritage Politics. *European Societies*, *16*(3), 401–421.
- Langeweg, S. (2008). Bekende buren en verre vreemden Buitenlandse arbeiders in de Nederlandse steenkolenmijnen 1900–1974. *Tijdschrift voor sociale en economische geschiedenis*, 5(3), 53–79.
- Langeweg, S. (2011). Mijnbouw en arbeidsmarkt in Nederlands-Limburg: Herkomst, werving, mobiliteit en binding van mijnwerkers tussen 1900 en 1965 (Vol. 75).
 Hilversum: Uitgeverij Verloren.

REFERENCES

- Latour, B. (2005). *Reassembling the social. An introduction to actor-network-theory*. New York: Oxford University Press.
- Lewontin, R. (1970). The Units of Selection. *Annual Review of Ecology and Systematics*, 1(1), 1–18.
- Littler, J., & Naidoo, R. (2005). *The politics of heritage: the legacies of 'race'*. London; New York: Routledge.
- Logan, W. (2007). Closing Pandora's Box: Human Rights Conundrums in Cultural Heritage Protection. In H. Silverman & D. F. Ruggles (Eds.), *Cultural Heritage and Human Rights* (pp. 33–52). Springer.
- Loures, L. (2015). Post-industrial landscapes as drivers for urban redevelopment: Public versus expert perspectives towards the benefits and barriers of the reuse of post-industrial sites in urban areas. *Habitat International*, 45, 72–81.
- Lowenthal, D. (1985). *The past is a foreign country*. Cambridge: Cambridge University Press.
- Lowenthal, D. (1998). *The heritage crusade and the spoils of history*. Cambridge: Cambridge University Press.
- Ludwig, C. (2016). From bricks and mortar to social heritage: planning space for diversities in the AHD. *International Journal of Heritage Studies*, *22*(10), 811–827.
- Luhmann, N. (1970). Soziologische aufklärung. Frankfurt: Westdeutscher Verlag.
- Luhmann, N. (1997). Die Gesellschaft der Gesellschaft. Frankfurt: Suhrkamp.
- Macdonald, S. (2009). Reassembling Nuremberg, reassembling heritage. *Journal* of Cultural Economy, 2(1–2), 117–134.
- Mason, R. (2004). Fixing Historic Preservation: A Constructive Critique of "Significance". *Places Journal*, *16*(1).
- Massey, D. (2005). For space. London: Sage.
- McFarlane, C. (2009). Translocal assemblages: space, power and social movements. *Geoforum*, 40(4), 561–567.
- McFarlane, C. (2011). The city as assemblage: dwelling and urban space. *Environment* and Planning D: society and space, 29(4), 649–671.
- Mesoudi, A. (2011). *Cultural Evolution*. Chicago: The University of Chicago Press.
- Messing, F. (1988). *Geschiedenis van de mijnsluiting in Limburg*. Leiden: Matrinus Nijhoff.
- Misirlisoy, D., & Günçe, K. (2016). Adaptive reuse strategies for heritage buildings: A holistic approach. *Sustainable Cities and Society*, *26*, 91–98.
- Mitleton-Kelly, E. (2003). Ten principles of Complexity and Enabling Infrastructures. In E. Mitleton-Kelly (Ed.), *Complex systems and evolutionary perspectives on organisations: The application of complexity theory to organisations* (Sanches, R. ed., pp. 23–50). Elsevier Science Ltd.
- Mols, P. (2008). Masterplan Mijnstreek. Sambeek: ContraPunt.
- Murdoch, J. (2006). *Post-structuralist geography: a guide to relational space*. London: SAGE Publications Ltd.
- Murzyn-Kupisz, M., & Działek, J. (2013). Cultural heritage in building and enhancing social capital. *Journal of Cultural Heritage Management and Sustainable Development*, 3(1), 35–54.
- Mydland, L., & Grahn, W. (2012). Identifying heritage values in local communities. International Journal of Heritage Studies, 18(6), 564–587.

- Nasser, N. (2003). Planning for urban heritage places: reconciling conservation, tourism, and sustainable development. *Journal of planning literature*, 17(4), 467–479.
- Norgaard, R. (1984). Coevolutionary Development Potential. *Land economics*, *60*(2), 160–173.
- Olesen, K., & Richardson, T. (2011). The spatial politics of spatial representation: relationality as a medium for depoliticization? *International Planning Studies*, 16(4), 355–375.
- OpenHeritage. (2019a). Deliverable 1.2. 'Mapping of current heritage re-use policies and regulations in Europe: Complex policy overview of adaptive heritage re-use'.
- OpenHeritage. (2019b). *Deliverable 2.2 Individual Report on the Observatory Cases*. https://openheritage.eu/wp-content/uploads/2020/01/D2.2_Observatory_Cases_ Report.pdf.
- OpenHeritage. (2019c). Local Action Plan of the Warsaw CHL (Praga).
- OpenHeritage. (2020). Deliverable 4.6: Updated Local Action Plansof the Cooperative Heritage Labs.
- Paasi, A., & Zimmerbauer, K. (2016). Penumbral borders and planning paradoxes: relational thinking and the question of borders in spatial planning. *Environment and Planning A*, 48(1), 75–93.
- Parkinson, A., Scott, M., & Redmond, D. (2016). Competing discourses of built heritage: lay values in Irish conservation planning. *International Journal of Heritage Studies*, *22*(3), 261–273.
- Pawlikowska-Piechotka, A. (2010). Urban Tourism and Cultural Clusters (the Praga district in Warsaw experience). *Urban tourism*, *17*, 248–252.
- Peet, J. (2013). Mijnsluiting en herstructurering. In A. Knotter (Ed.), *Mijnwerkers in Limburg. Een Sociale Geschiedenis*. Vantilt.
- Pendlebury, J. (1999). The conservation of historic areas in the UK: A case study of "Grainger Town", Newcastle upon Tyne. *Cities*, 16(6), 423–433.
- Pendlebury, J. (2013). Conservation values, the authorised heritage discourse and the conservation-planning assemblage. *International Journal of Heritage Studies*, 19(7), 709–727.
- Pendlebury, J. (2015). Heritage and Policy. In E. Waterton & S. Watson (Eds.), *The Palgrave handbook of contemporary heritage research* (pp. 426–441). Palgrave Macmillan.
- Pendlebury, J., & Porfyriou, H. (2017). Heritage, urban regeneration and place-making. Journal of Urban Design, 22(4), 429–432.
- Pendlebury, J., Townshend, T., & Gilroy, R. (2004). The Conservation of English Cultural Built Heritage: A Force for Social Inclusion? *International Journal of Heritage Studies*, 10(1), 11–31.
- Perkin, C. (2010). Beyond the rhetoric: negotiating the politics and realising the potential of community-driven heritage engagement. *International Journal of Heritage Studies*, 16(1–2), 107–122.
- Plevoets, B., & Sowińska-Heim, J. (2018). Community initiatives as a catalyst for regeneration of heritage sites: Vernacular transformation and its influence on the formal adaptive reuse practice. *Cities*, *78*, 128–139.

- Plevoets, B., & Van Cleempoel, K. (2011). Adaptive reuse as a strategy towards conservation of cultural heritage: a literature review. *Structural studies, repairs and maintenance of heritage architecture XII, 118*(12), 155–163.
- Pocock, C., Collett, D., & Baulch, L. (2015). Assessing stories before sites: identifying the tangible from the intangible. *International Journal of Heritage Studies*, *21*(10), 962–982.
- Portugali, J., Meyer, H., Stolk, E., & Tan, E. (2012). *Complexity theories of cities have come of age: an overview with implications to urban planning and design*. Berlin; Heidelberg: Springer-Verlag.
- Reger, G., & Hassink, R. (1997). Strukturwandel, Technologiepolitik und grenzüberschreitende Technologiekooperation in der Euregio Maas-Rhein. *Zeitschrift für Wirtschaftsgeographie*, 41(1), 31–47.
- Ročak, M., Hospers, G., & Reverda, N. (2016). Searching for Social Sustainability: The Case of the Shrinking City of Heerlen, The Netherlands. *Sustainability*, 8(4), 382.
- Ruskin, J. (1849). The seven lamps of architecture. Memphis, Tennessee: LLC Publisher.
- Sadowy, K. (2019). Architecture and Labor. Heritage of Praga in Warsaw as a legacy of economic development. *ZNUV*, *66*(3), 41–50.
- Sadowy, K., & Brodowicz, D. (2019). Adaptive heritage re-use challenges for Praga in Warsaw. Between the image and the reality, between the past and the future
- Sadowy, K., Brodowicz, D., & Czeredys, M. (2021). *Piekarnia; In search of adaptive reuse models for architectural heritage*. Warsaw: The Warsaw Branch of the Association of Polish Architects (OW SARP).
- Sadowy, K., & Lisiecki, A. (2019). Post-industrial, post-socialist or new productive city? Case study of the spatial and functional change of the chosen Warsaw industrial sites after 1989. *City, Territory and Architecture*, 6(4).
- Salam, B. (2001). Strukturwandel in der Euregio Maas-Rhein; versuch einer Bewertung der Nationalen und Supranationalen Strategien zur uberwindung der Strukturkrise.
 In M. Waibel (Ed.), *Excursionsbericht Euregio Maas-Rhein*. Geographisches Institut der Georg-August-Universität Göttingen.
- Samuel, R. (1994). *Theatres of memory*. London; New York: Verso Books.

Sandercock, L. (1998). The death of modernist planning: Radical praxis for a postmodern age. In M. Douglas & J. Friedman (Eds.), *Cities for citizens: Planning and the rise of civil society in a global age* (pp. 163–184). Wiley.

- Sandercock, L. (2004). Towards a Planning Imagination for the 21st Century. *Journal of the American Planning Association*, 70(2), 133–141.
- Sanderson, S. (1990). Social evolutionism. Cambridge: Blackwell.

Seidel, H. (2014). Die Bergbaugewerkschaft und die "Gastarbeiter". *Vierteljahrshefte für Zeitgeschichte*, *62*(1), 35.

- Şen, F. (2003). The Historical Situation of Turkish Migrants in Germany. Immigrants & Minorities, 22(2–3), 208–227.
- Shen, L., & Langston, C. (2010). Adaptive reuse potential: An examination of differences between urban and non urban projects. *Facilities*, 28(1/2), 6–16.
- Silverman, D. (2010). *Doing qualitative research: a practical handbook*. London: Sage Publications.
- Smith, L. (2006). Uses of heritage. London; New York: Routledge.
- Soete, L., Hagenaars, M., & Wintjes, R. (2000). *Limburg op nieuwe kracht: een nieuwe economie, een nieuwe regio*. Maastricht: MERIT, Universiteit Maastricht

- Stake, R. (2005). Qualitative Case Studies. In *The Sage handbook of qualitative research* (pp. 443–466). Sage Publications.
- Statistical Office in Warszawa. (2021). *Statistical review of Warsaw*. Warszawa: Statistical Office in Warszawa,

Stegmeijer, E., & Veldpaus, L. (2021). *A Research Agenda for Heritage Planning: Perspectives from Europe*. Cheltenham; Northampton: Edward Elgar Publishing.

- Swinnen, S. (2006). Nieuwe toeristische routes stellen mijnstreek als een geheel voor. *Het Laatste Nieuws*, 14.
- Swinnen, S. (2007). Groenmetropool gaat open vanaf juni. *Het Laatste Nieuws/ Limburg*, 42.
- Swyngedouw, E. (1996). Reconstructing Citizenship, the Re-scaling of the State and the New Authoritarianism: Closing the Belgian Mines. *Urban Studies*, *33*(8), 1499–1521.
- Szromek, A., Herman, K., & Naramski, M. (2021). Sustainable development of industrial heritage tourism – A case study of the Industrial Monuments Route in Poland. *Tourism Management*, 83.
- Thorkildsen, A., & Ekman, M. (2013). The complexity of becoming: collaborative planning and cultural heritage. *Journal of Cultural Heritage Management and Sustainable Development*, 3(2), 148–162.
- Thrift, N. (2000). Afterwords. *Environment and Planning D: society and space*, 18(2), 213–255.
- Thrift, N. (2008). *Non-Representational Theory: Space, Politics, Affect*. London; New York: Routledge.
- Toonen, W. (1972). The economic restructuring of South Limburg between 1965 and 1971. *Tijdschrift voor economische en sociale geografie*, *63*(3), 180–189.
- Tweed, C., & Sutherland, M. (2007). Built cultural heritage and sustainable urban development. *Landscape and urban planning*, *8*₃(1), 62–69.
- UNESCO. (2006). *World Heritage*. Retrieved 22/06 from http://whc.unesco.org/en/ about/
- UNESCO. (2011). Recommendation on the Historic Urban Landscape.

Van Assche, K., Beunen, R., & Duineveld, M. (2017). Co-Evolutionary Planning Theory:
 Evolutionary Governance Theory and Its Relatives. In M. Gunder, A. Madanipour, &
 V. Watson (Eds.), *The Routledge Handbook of Planning Theory*. Routledge.

Van Bergen, F., Pagnier, H., & Van Tongeren, P. (2007). Peat, coal and coalbed methane. Geology of the Netherlands. Royal Netherlands Academy of Arts and Sciences, 265–282.

- van Cann, L. (2016). Marokkaanse mijnwerkers in de perceptie van autochtone Limburgers, 1963–1985. In L. van Cann (Ed.), *Publications de la Société Historique et Archéologique dans le Limbourg: Jaarboek 2016* (Vol. 152). Limburgs Geschieden Oudheidkundig Genootschap.
- van de Wijngaard, H., & Crompvoets, H. (1989). Mijnwerkersterminologie in de beide Limburgen: meer verscheidenheid dan eenheid. *Mededelingen van de Vereniging voor Limburgse Dialect- en Naamkunde*(51).
- van den Panhuyzen, W. (1989). De Financiele Historiek van de Kempense Steenkoolmijnen. *Economisch en Sociaal Tijdschrift*(1), 83–94.
- van den Reyt, C. (2006). Nieuwe routes verbinden mijnstreek van 3 landen. *Het Belang van Limburg*, 9.

- Van den Reyt, C. (2007). Grensoverschrijdende routes verbinden mijngemeenten. Het Belang van Limburg, 67.
- van der Heyden, M. (2008). Grünmetropole routeboek.
- van der Steen, P. (2011). Het echec van de Groenmetropool. ZuiderLucht.
- van der Wee, D. (1983). Structurele verklaringen voor de regionale werkgelegenheidsverschuivingen in Belgie. In L. Albrechts (Ed.), *Regionale Ontwikkeling: Raakvlak tussen Ruimtelijke en Economische planning* (pp. 55–100). ACCo.
- van Veldhoven, F. (2015). Post-Industrial Coal-Mining Landscapes and the Evolution of Mining Memory. In H. Renes, R. Hermans, & J. Kolen (Eds.), *Landscape biographies: geographical, historical and archaeological perspectives on the production and transmission of landcapes* (pp. 336). Amsterdam University Press.
- Vandenbussche, L., Edelenbos, J., & Eshuis, J. (2020). Plunging into the process: methodological reflections on a process-oriented study of stakeholders' relating dynamics. *Critical Policy Studies*, 14(1), 1–20.
- Vargas-Sánchez, A. (2015). Industrial heritage and tourism: A review of the literature. In E. Waterton & S. Watson (Eds.), *The Palgrave handbook of contemporary heritage research* (pp. 219–233). Palgrave Macmillan.
- Vecco, M. (2010). A definition of cultural heritage: From the tangible to the intangible. Journal of Cultural Heritage, 11(3), 321–324.
- Veldpaus, L., & Pendlebury, J. (2019). Heritage as a Vehicle for Development: The Case of Bigg Market, Newcastle upon Tyne. *Planning Practice & Research*, 1–15.
- Veldpaus, L., Pereira Roders, A., & Colenbrander, B. (2013). Urban heritage: putting the past into the future. *The Historic Environment: Policy & Practice*, 4(1), 3–18.
- Velthuis, K., & Spennemann, D. (2007). The future of defunct religious buildings: Dutch approaches to their adaptive re-use. *Cultural Trends*, *16*(1), 43–66.
- Vetter, R. (2020). Warschau im Sturm der Geschichte: Metamorphosen einer leidgepruften Stadt (Vol. 44). Baden-Baden: Tectum Verlag.
- Viollet-le-Duc, E. (1866). *Dictionnaire raisonné de l'architecture française du XIe au XVIe siècle* (Vol. 8): Morel.
- Vlaamse Overheid. (1987). *Toekomstcontract voor Limburg*. Brussel.

Vos, H., & Gottschalk, A. (2009). *Grenzen* Überschreiten – *Die Dokumentation Die EuRegionale 2008 in der Dreiländer-Region Aachen*. Aachen: EuRegionale 2008 Agentur GmbH.

Wang, H., & Zeng, Z. (2010). A multi-objective decision-making process for reuse selection of historic buildings. *Expert Systems with Applications*, *37*(2), 1241–1249.

Waterton, E., & Smith, L. (2010). The recognition and misrecognition of community heritage. *International Journal of Heritage Studies*, *16*(1–2), 4–15.

Waterton, E., & Watson, S. (2010). Heritage and community engagement. *International Journal of Heritage Studies*, 16(1–2), 1–3.

Waterton, E., & Watson, S. (2011). *Heritage and Community Engagement: Collaboration or Contestation?* London, New York: Routledge.

Waterton, E., & Watson, S. (2013). Framing theory: towards a critical imagination in heritage studies. *International Journal of Heritage Studies*, 19(6), 546–561.

- Waterton, E., & Watson, S. (2015). *The Palgrave Handbook of Contemporary Heritage Research*. Houndmills; Basingstoke; Hampshire: Palgrave Macmillan.
- Watson, S., & Waterton, E. (2010). Heritage and community engagement. International Journal of Heritage Studies, 16(1–2), 1–3.

- Wells, J., & Lixinski, L. (2016). Heritage values and legal rules: Identification and treatment of the historic environment via an adaptive regulatory framework (part 1). *Journal of Cultural Heritage Management and Sustainable Development*, 6(3), 345–364.
- Wells, J., & Lixinski, L. (2017). Heritage values and legal rules: identification and treatment of the historic environment via an adaptive regulatory framework (part 2). *Journal of Cultural Heritage Management and Sustainable Development*, 7(3), 345–363.
- Wells, J., & Stiefel, B. (2018). *Human-centered built environment heritage* preservation: Theory and evidence-based practice. New York: Routledge.
- Wilkinson, S., James, K., & Reed, R. (2009). Using building adaptation to deliver sustainability in Australia. *Structural survey*.
- Wright, P. (1985). *On living in an old country: the national past in contemporary Britain*. London: Verso Books.
- Yadollahi, S. (2017). Prospects of Applying Assemblage Thinking for Further Methodological Developments in Urban Conservation Planning. *The Historic Environment: Policy & Practice*, 8(4), 355–371.
- Yin, R. (2014). *Case study research: design and methods*. Thousand Oaks: Sage publications.
- Yung, E., & Chan, E. (2012). Implementation challenges to the adaptive reuse of heritage buildings: towards the goals of sustainable, low carbon cities. *Habitat International*, 36(3), 352–361.
- Yung, E., Chan, E., & Xu, Y. (2014). Community-initiated adaptive reuse of historic buildings and sustainable development in the inner city of Shanghai. *Journal of Urban Planning and Development*, 140(3).
- Yung, E., Zhang, Q., & Chan, E. (2017). Underlying social factors for evaluating heritage conservation in urban renewal districts. *Habitat International*, *66*, 135–148.
- Zabbini, E. (2012). Cultural Routes and Intangible Heritage. *Journal of Tourism*, *Culture and Territorial Development*, 3(5), 22.

Interviews

- GM1: tourist officer. (2019, 12-02-2019). *Interview with an employee at the tourist office 'VVV Zuid-Limburg'*, [Interview].
- GM2: policy officer. (2019, 13-02-2019). *Interview with a policy officer at the municipality of Landgraaf (The Netherlands)*, [Interview].
- GM3: policy officer. (2019, 15-02-2019). *Interview with a policy officer at the municipality of Brunssum (The Netherlands)*, [Interview].
- GM4: policy officer. (2019, 15-02-2019). *Interview with a policy officer at the municipality of Heerlen (The Netherlands)*, [Interview].
- GM5: guide museum. (2019, 27-02-2019). *Field observation: conversation with a guide at the pop-up migration museum in Heerlen (The Netherlands),* [Interview].
- GM6: tourist officer. (2019, 28-02-2019). *Field observation: conversation with an employee at the tourist office 'VVV Zuid-Limburg'*, [Interview].
- GM7: tourist officer. (2019, 28-02-2019). *Field observation: conversation with an employee at the tourist office 'VVV Zuid-Limburg'*, [Interview].

GM11: tour guide. (2019, 09-04-2019). *Field observation: conversation and guided tour with a guide at the mining city of Beringen (Belgium)*, [Interview].

GM12: tour guide. (2019, 09-04-2019). *Field observation: conversation with a guide at the Rolduc abbey in Kerkrade (The Netherlands)*, [Interview].

GM13: former miner. (2019, 09-04-2019). *Field observation: conversation with a former miner (Heerlen, The Netherlands),* [Interview].

GM14: guide museum. (2019, 10-04-2019). Field observation: conversation with an employee of the tourist office and museum 'Energeticon' in Alsdorf (Germany), [Interview].

GM15: guide museum. (2019, 09-04-2019). Field observation: conversation with a guide at the Dutch mining museum (Heerlen, the Netherlands), [Interview].

GM16: heritage officer. (2019). *Field observations: online questionaire send to an employee of 'VZW Het Vervolg'*, [Interview].

GM18: tourist officer. (2019, 10-04-2019). *Field observation: conversation with an employee of 'Tourism Limburg' (Belgium)*, [Interview].

GM19: policy officer. (2019, 09-04-2019). *Interview with a policy officer at the municipality of Beringen (Belgium)*, [Interview].

GM20: policy officer. (2019, 09-04-2019). *Interview with a policy officer at the municipality of Beringen (Belgium)*, [Interview].

GM21: tour guide. (2019, 10-04-2019). *Interview with a guide at the city of Eisden* (*Belgium*), [Interview].

GM24: heritage officer. (2019, 09-08-2019). *Interview with a policy officer at a regional heritage management organization in Genk (Belgium)*, [Interview].

Praga interview 1. (2021). Anna Datkowska; The Association of Time Collectors (Stowarzyszenie KoleaDjonerzy Czasu), [Interview].

- Praga interview 2. (2021). Adam Lisiecki; Museum of Warsaw, Praga [Interview].
- Praga interview 3. (2021). Gildas Boursain, architect [Interview].
- Praga interview 4. (2021). Tomasz Olejniczak; researcher [Interview].
- Praga interview 5. (2021). Iwona Bojadzijewa; researcher, activist [Interview].

Praga interview 6. (2021). *Katarzyna Wrońska; department of economic development of the city of Warsaw* [Interview].

- Praga interview 7. (2021). Jakub Zaczek; activist [Interview].
- Praga interview 8. (2021). Jacek Grunt-Meyer; city of Warsaw [Interview].
- Praga interview 9. (2021). Maciej Czeredys; PragaLab [Interview].
- Praga interview 10. (2021). Katarzyna Sadowy; PragaLab [Interview].

Praga interview 11. (2021). Anna Tomaszewska; PragaLab, activist [Interview].

Praga interview 12. (2021). Anna Szwalkiewicz; NaPradza organization [Interview].

Praga Interview 13. (2021). Katarzyna Chudyńska-Szuchnik, Museum of Praga [Interview].

Praga Interview 14. (2021). Tomasz Markiewicz, [Interview].

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