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Towards a Framework for Enhancing Destination Resilience: A Design Thinking Approach

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This paper is for Amelie and Sonja, who made the past four semesters an absolute joyride, both in and out of class.



Abstract

Destination management is a rapidly developing area of the tourism industry. It has slowly been transitioning to the concept of visitor economy, which focuses on a destination as a large system, where constant interaction between its visitors and residents takes place. Destination Management Organizations are usually at the center of a visitor economy. They are tasked with raising awareness for a destination based on the local market's needs, while they are key in enabling collaboration and involvement of the destination's stakeholders in tourism development. Design thinking, a creative problem-solving approach based on empathy and humancentric iterative implementation processes, is a mentality that can be used as a collaborative tool within a visitor economy. It facilitates innovation and makes socially sustainable impact, while it can be linked with the experience economy and service-dominant logic. As a vulnerable social-ecological system, a destination is exposed to several risks and external stress factors. Using its repetitive functions and learnings from past crises, a system can develop its adaptive capacity, which equips it with the ability to recognize and mitigate its vulnerability and ultimately achieve long-term resilience. Especially after the outbreak of COVID-19, developing resilience has gained importance in destinations worldwide. Design thinking, when applied by a DMO, is a promising mindset that can be adopted to enhance a destination's resilience. Qualitative research with expert interviews showed that design thinking principles can be applied to enhance complex systems' adaptive capacity and resilience, mainly through empathy, participation, and long-term iterative planning. This paper employs learnings from academic literature and empirical findings to create a destination and systemic design framework for DMOs. The framework acts as a process guide to building a system's resilience and enhancing its visitor economy by applying principles of design thinking. A prerequisite for DMOs is to transition into design organizations themselves, in order to facilitate adaptive capacity and, consequently, resilience within their system. This paper enables further research using the proposed framework, but also suggests examining different factors' individual contribution to destination resilience.

Keywords: Design thinking; destination; framework; resilience; social-ecological system; visitor economy Destinationsmanagement ist ein schnell wachsender Bereich im Tourismus, der graduell zum Konzept der Visitor Economy übergeht. Visitor Economy sieht eine Destination als ein großes System an, wo stetige Interaktion zwischen Besucher:innen und Einwohner:innen stattfindet. Destinationsmanagement-Organisationen haben meist eine zentrale Role in einer Visitor Economy. Sie haben die Aufgabe, ausgehend von den Bedürfnissen des lokalen Markts, die Wahrnehmung rund um die Destination zu stärken, aber auch die Kollaboration und Beteiligung von Interessensgruppen in der Tourismusentwicklung zu ermöglichen. Design Thinking ist ein kreativer Problemlösungsansatz, der auf Empathie und iterativen Implementierungsprozessen basiert ist und ist eine Mentalität, die als kollaboratives Instrument in der Visitor Economy angewendet werden kann. Es ermöglicht Innovation und hat sozial nachhaltigen Einfluss, während es mit der Erlebnisökonomie und der dienstaustauschzentrierten Logik verbunden werden kann. Als ein vewundbares sozioökologisches System, ist eine Destination einigen Risiken und extenen Einflussfaktoren ausgesetzt. Mit Verwendung seiner wiederholenden Funktionen sowie von vergangenen Erkenntissen, kann das System sein Anpassungsvermögen entwickeln. Dies rüstet das System mit der Fähigkeit, seine Verwundbarkeit zu erkennen und zu begrenzen und langfristige Resilienz zu erreichen. Besonders nach Ausbruch von COVID-19, ist die Entwicklung von Resilienz ein zentraler Punkt in Destinationen weltweit geworden. Design Thinking, wenn es von einer DMO angewendet wird, ist eine vielversprechende Denkweise, die zur Stärkung der Resilienz einer Destination verwendet werden kann. Qualitative Recherche mit Expert: inneninterviews hat gezeigt, dass Prinzipien aus Design Thinking angewendet werden können, um das Anpassungsvermögen und Resilienz von komplexen Systemen zu stärken, hauptsächlich mit Empathie, Partizipation und langfristiger iterativer Planung. Diese Arbeit nützt Erkenntnisse aus akademischer Literatur und empirischer Recherche, um einen konzeptionellen Rahmen für Destinations- und systemischen Design für DMOs zu erstellen. Dieser Rahmen dient als Prozessleitfaden, wie Design Thinking Prinzipien angewendet werden können, um Systemresilienz aufzubauen und die Visitor Economy zu stärken. Eine Grundvoraussetzung für DMOs ist deren Übergang zu Designorganisationen, um das Anpassungsvermögen und daraufhin die Resilienz innerhalb deren Systems zu ermöglichen. Diese Arbeit bietet die Gelegenheit weitere Recherche mit Verwendung des konzeptionellen Rahmens durchzuführen, aber empfiehlt auch die Untersuchung vom Beitrag diverser Einzelfaktoren zur Resilienz einer Destination.

Stichwörter: Design Thinking; Destination; konzeptioneller Rahmen; Resilienz; Sozioökologisches System; Visitor Economy

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List of abbreviations

DMO(s)	Destination Management Organization(s)		
	Destination Marketing Organization(s)		
e.g.	exempli gratia ¹		
ICT	Information and Communications Technology		
i.e.	id est ²		
1.	transcript line number		
MICE	Meetings, Incentives, Conferences and Events		
NGO(s)	Non-Governmental Organization(s)		
S.	see		
SME(s)	Small and medium-sized enterprise(s)		
UNWTO	United Nations World Tourism Organization		
USP	Unique Selling Proposition		

 $^{^{1} =}$ for example

 $^{^{2}}$ = that is

1 Introduction

Large-scale tourism is a phenomenon dating back to ancient civilizations. It has experienced virtually uninterrupted prosperity since the end of World War II. Being facilitated by advancements in economy and infrastructure, especially motorized transport solutions, tourism has come to be the multi-billion dollar industry it is nowadays, in turn becoming a significant contributor to the burgeoning economies that shaped the second half of the 20th century (Butcher, 2017; Harrison & Sharpley, 2017a). The gradual liberalization of commercial aviation in Europe and the United States that was completed in 1997 was an important step in achieving significant tourism growth (Donzelli, 2010; Tretheway, 2004). This led Clancy (1998, p. 123) to describe tourism as "the largest non-financial service activity in the world today."

Indeed, a quarter century later, Clancy's statement remains relevant. In a way, every person can be seen as a tourist nowadays, being part of a system that constantly enables affordable, secure and fast mobility "en masse" to anywhere in the world (Harrison & Sharpley, 2017a, p. 7). The tourism trade has managed to become one of the most powerful in terms of business volume, while most communities it serves, especially in less economically developed countries, benefit immensely from it (UNWTO, 2022b). These communities are usually called destinations, and they are the places where the activity of visitors and businesses serving them takes place (Pamfilie & Croitoru, 2018). The growth of tourist destinations often takes place on account of a place's DMO. DMOs are local, usually non-profit, organizations, who have the task to initiate and coordinate partnerships among a destination's stakeholders, such as accommodation facilities, transport companies, culinary institutions, and popular attractions. Such stakeholders are usually part of a very competitive environment, but, as Wang (2011, p. 17) elucidates, communicating and cooperating on certain aspects is paramount for the benefit of the community which all serve.

Tourism-related services are omnipresent nowadays, and because of that they have come to be characterized as commodities, i.e., standardized, or undifferentiated goods or services. Every consumer can access them for a specific price, while they are considered an important part of today's economy. This includes tourism (Bieger & Wittmer, 2006). The internet is one of the biggest enablers of commodification, even turning experiences into commodities, according to Pine and Gilmore (2013) and Gnoth (2017).

Although successful, the tourism industry is very prone to external shocks, mostly non-predictable occurrences that can act as a short- or long-term inhibitors of tourist activity. Good examples of such shocks evolving into significant crises for tourism are the Gulf War of the 1990s, the 9/11 terrorist attacks in 2001, as well as the 2002 Bali bombings (Evans & Elphick, 2005; Gurtner, 2007). The financial crisis of 2008 has been linked with negative consequences for stakeholders in tourism destinations as well (Dobruszkes & van Hamme, 2011). Also, with the eruption of Eyjafjallajökull in 2010, more than 20 European countries were forced to close their airspaces for over a week, with significant effects to the respective travel industries (Mazzocchi et al., 2010).

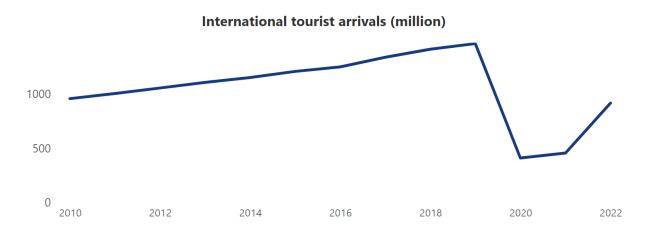


Figure 1: International tourist arrivals between 2010 and 2022. (UNWTO, 2023)

Although many crises have shocked the industry, its growth was not affected in the long term and grave negative effects have usually been geographically and temporally limited. Figure 1 confirms the assumption, with visitor arrivals steadily growing until the end of last decade. The status quo came to be changed by the COVID-19 pandemic outbreak in 2020. Restrictions limiting movement of people and goods caused unprecedented disruption of interdependent global value chains (Barua, 2020). As a result, operations in tourism organizations were put on hold too (G. D. Sharma et al., 2021).

Since the outbreak of the pandemic, destination management structures have been questioned, while the complexity of the tourism system has been highlighted even more, with not only environmental, social and economic realities shifting, but also with DMOs' potential role in facilitating innovation and sustainable development growing (Rivera et al., 2021).

1.1 Problem description

Nowadays, instability in business organizations and their operations seems to be the norm, with high uncertainty and risks arising because of natural disasters, terrorism, financial hardships and internal irregularities (Pessina, 2021). Indeed, risks have always seemed to be ubiquitous and are the main reason why our financial system is so elaborate (Yilmaz & Flouris, 2017). Every tourism destination certainly has different norms in risk management and crisis response, but the necessity of risk management structures is indisputable, especially in the post-COVID-19 era (Pessina, 2021; Yilmaz & Flouris, 2017).

At the height of the pandemic-related irregularities, a mere 20 % hotel occupancy rate and aviation job cuts close to 90 % were recorded (Pessina, 2021). With accommodation services and commercial aviation being two of the most important industries in tourism and major stakeholders in a destination (Clancy, 1998; Harrison & Sharpley, 2017a; Pamfilie & Croitoru, 2018; Yilmaz & Flouris, 2017), the significance of the pandemic's impact is undeniable. In fact, on the way to full COVID-19 recovery, the question of which direction is the best for the survival of tourism destinations is still being raised (Matteucci et al., 2022).

Change in tourism is being favorized on several levels. The industry's structures have come to be questioned by its commodification and the crises that have tested it over the years. Before COVID-19, mass tourism was a grave concern, also in academic circles; Harrison and Sharpley (2017a) saw intense visitor flows and noticeable seasonal fluctuations as main characteristics of destinations affected by mass tourism, while they also noticed the large impact that multinational corporations have on local tourism industries; Combined with lacking authenticity, extensive standardization, as well as environmental, social, and economic hardships, the disadvantages brought about by uncontrollable growth seem to be endless. According to Calgaro et al. (2014), a destination is an inherently vulnerable social-ecological system. The authors also see seasonality as a risk factor, while little contingency planning and changes in visitors' perceptions of a destination are also considered issues in this context. Globalization and its effects on local and transnational socioeconomic realities is focused upon as well. This trend was already recognized by Clancy at the end of the last century (1998).

The pandemic also brought new realities that had already become issues before the outbreak to broad attention and forced destinations to confront them; Global change and impact caused by megatrends like climate change, digitalization, as well as local populations' increasing will to participate in tourism development were put to the forefront (Volgger et al., 2021; Zukunftsinstitut, 2022). Also, making sure that a destination is prepared to mitigate the effects of a crisis, adequately respond to a crisis outbreak and that it is able to recover with as little a loss as possible, i.e., developing long-term resilience, is of interest to tourism scholars and longestablished institutions alike (Matteucci et al., 2022; World Bank, 2020).

In an environment with many different stakeholders, a big part of which are often SMEs (Gardiner & Scott, 2016; Stickdorn & Zehrer, 2009), there are differing individual perceptions on crisis management approaches to such challenges (Pechlaner et al., 2019). In other words, when examining tourism services, the vagueness and subjectivity of their interpretation poses a hurdle on the way to finding holistic solutions (Clancy, 1998). Creating structures that will enable a place's resilience in the long run, especially while enabling participation and cooperation of local stakeholders not only with a DMO, but also among each other, is an issue that seems to be gaining importance. This is why it also forms the starting point of research for this thesis.

1.2 Research context

The effectiveness of risk and crisis response strategies cannot be underestimated. However, the pandemic has shown that pre-crisis readiness is key. In the context of crisis management and crisis recovery, resilience is often presented as a holistic approach that ensures preparedness of a destination for a crisis (Gurtner, 2007). While researching Bali's recovery from the 2002 bombings, Gurtner (2007) realized that a destination's stakeholders, including governing parties, are required to apply adequate contingency planning to build up its resilience. In light of COVID-19, building resilience in the tourism industry is identified as the most important step in facilitating post-crisis recovery (G. D. Sharma et al., 2021). This concept has been the subject of extensive debates (Gurtner, 2007; Hall, 2018; Pessina, 2021). In the volatile system that is tourism, conceiving sufficient solutions is becoming more demanding, especially with the links and interdependence of stakeholders growing stronger (Peters, 2017; G. D. Sharma et al., 2021).

In order to establish resilience and to understand what can be done to make a destination and its entities grasp the concept, deep understanding of the factors that make a destination vulnerable, and to what extent, is necessary (Calgaro et al., 2014). Empathy is an important factor that helps to comprehend the mentalities of different stakeholders and to ultimately create processes where every entity feels accommodated. Deeper collaborative relationships among industry stakeholders can prove to be key solutions to achieving long-term resilience and can also have synergy effects in a destination. Ultimately, collaboration seems to be the main component of resilience after COVID-19 (Medel et al., 2020). However, literature shows its prevalence among stakeholders is limited; existing cooperations are usually formed in small circles and not as part of a common strategy (Baggio, 2011). With the links between stakeholders in tourist destinations becoming stronger, especially after the COVID-19 outbreak, establishing a holistic approach to the industry can contribute to a deeper understanding of the industry. Thus, the idea of destination management is evolving to the concept of visitor economy (Binder & Aubke, 2022), while design thinking is emerging as a popular paradigm in literature relevant to solution-seeking in tourism and destination management (Ericson et al., 2016; Gnoth, 2017; Hernández et al., 2018; Kotler et al., 2021; Pamfilie & Croitoru, 2018; Stickdorn & Zehrer, 2009), in innovation management (Auernhammer & Roth, 2021), as well as in building resilience (Cochrane, 2010; Volgger et al., 2021).

The capacity and ability of a place's DMO to lead and coordinate a collaborative process using design thinking from a holistic visitor economy perspective is an interesting point. The possibility that this paradigm could enable such participatory structures more easily within each market is an intriguing outlook. Through the upcoming literature review, the main hypothesis will thus be the effectiveness of design thinking in destination management, with respect to its problem-solving, creative, and impactful nature. As design is a multidisciplinary competence, the main assumption will be that it has the potential to facilitate participatory structures and involve all related stakeholders to its problem-solving process through empathy, process readjustments and through empowering all involved stakeholders.

The following literature review focuses on destination management and visitor economy, design thinking, as well as risk and resilience management in tourism. Concepts like the servicedominant logic, co-creation, innovation, impact, and complex adaptive systems, among others, come up as part of this research project and form the basis for further empirical research.

2 Approaches to destination management

Destinations and the management or marketing thereof have been defined in different ways, usually depending on researchers' point of view as well as the time and place where ideas were conceived. As destinations tend to be the centerpiece of visitors' experiences (Calgaro et al., 2014; Fyall & Garrod, 2020), one can find interpretations that focus on their behavioral patterns within a destination. Other characterizations connect destinations with experience and service design, while others abide by generic and widely accepted approaches; For instance, the UN-WTO (2022a) defines a destination as the place that revolves around the decision to take a trip and to be outside of one's home area. Pamfilie and Croitoru (2018), however, see it as a location where tourism is a vital business sector and benefits its economy.

There is no universally accepted statement that describes a tourist destination, as different stakeholders, viewpoints and areas of interest make for several ambiguous and easily modifiable definitions (Wang, 2011). The visitor-based view focused on by the UNWTO (2022a) and the economics-based view presented by Pamfilie and Croitoru (2018) are two popular approaches. Peters (2017) also sees a destination as another social system, i.e., a complex interaction of several stakeholders. Generally, when defining a destination, seemingly everyone has a different perspective, especially when design gets involved, as will be demonstrated later in this paper. These perspectives are more than can be accurately outlined or categorized. This fact is one of the few ones that resonate with the majority of the examined literature on tourism and destination management. It could also justify the scarcity of scholarly material on destinations (Fyall, 2011), especially when compared to other areas of hospitality, like commercial aviation.

In discussions on development and growth of tourist destinations, the terms *destination management* and *destination marketing* are used almost interchangeably. These functions, although little different, are usually taken up by one entity; Destination management refers to coordinating political affairs, HR and financing, as well as crisis management and stakeholder relations, whereas destination marketing applies to communication, brand and product management, as well as service design (Adeyinka-Ojo et al., 2014; Buhalis & Park, 2021; Pearce, 2015).

What is certain is that destination management and marketing are challenging ventures that require in-depth work and focus on specific parameters. The overall concept and USP of the destination, its relationship with its stakeholders, and its crisis response plans, among others, are such parameters that tourism professionals are tasked with undertaking (Wang, 2011). As

both the marketing and management approach can be understood using the term *destination management*, this will be the one used throughout this thesis to include both approaches, unless stated otherwise.

2.1 Visitor economy

Visitor economy is still a rather fluid notion, seen either as an evolution of destination management (Binder & Aubke, 2022; Stickdorn & Zehrer, 2009) or an evolution of the concept of tourism (Reddy, 2006), sometimes even as a mix of both (Y. R. Kim et al., 2022). Whereas tourism can be characterized as a set of experiences that visitors have before, during and after the consumption of relevant services (Stickdorn & Zehrer, 2009) and counts people as mere arrival numbers with monetary value (Reddy, 2006), visitor economy is a concept that seeks to involve all stakeholders of a destination in its design, especially when it comes to its local population (Reddy, 2006; Volgger et al., 2021). Such a holistic approach is necessary when observing tourism product performance (Stickdorn & Zehrer, 2009).

The development of visitor economy is based on the idea that for a destination to keep reporting success, its focus needs to shift onto the more abstract elements that make it prosperous. In that sense, Reddy (2006) argues that a visitor economy is comprised of three main characteristics; First, everything that a potential visitor can find interesting and see as an incentive to visit. This can be anything from archaeological sites and cultural activities to shopping and nightlife. The list can be as long as the list of prospective visitors themselves and can be seen as a set of subjective motivators. Second, infrastructure that enables potential visitors to visit and easily navigate through a place. Third, public and private service providers that make for a comfortable stay and for increased spending patterns. These characteristics have started to question the widely established six-A model, which shows a stricter business-centric approach and summarizes a destination's plethora of characteristics under Attractions, Accessibility, Amenities, Available packages, Activities and Ancillaries (Stickdorn & Zehrer, 2009).

Reddy's ideas have similarities to other explorations of destination management and value creation in a visitor economy. The author's description of visitors can be linked with several scholarly ideas on the modern consumer; a person who begins to value experiences more than tangible products. Pre-defined and standardized services like all-inclusive packages used to be the norm, with limited diversification bringing about limited and mundane experiences. Because of that, more personalization has started to be requested (Gardiner & Scott, 2016). Visitors nowadays actively seek authentic experiences that will help them enrich their knowledge and give them emotional satisfaction (Gnoth, 2017). Magnini (2017, p. 163) contends that so-called "positive script-deviations", i.e., customizing otherwise standardized services, not only help draw visitors' attention to otherwise uninteresting activities, but also manage to raise their satisfaction levels.

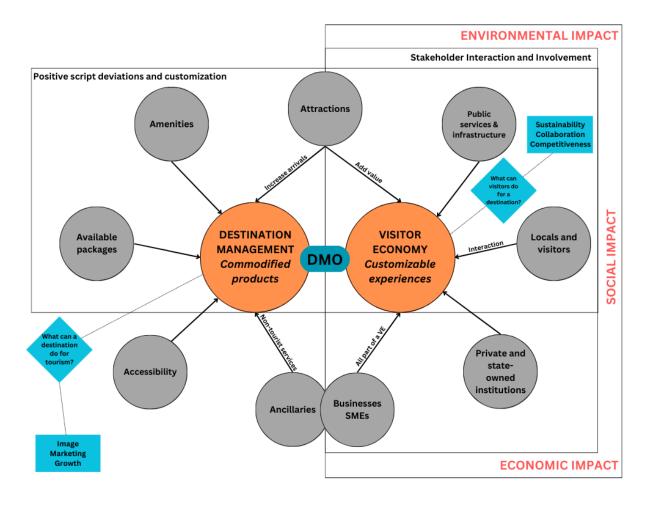


Figure 2: From destination management to visitor economy. (own illustration based on review of Binder & Aubke, 2022; Gnoth, 2017; Magnini, 2017; Pine & Gilmore, 2013; Reddy, 2006; Stickdorn & Zehrer, 2009)

Script deviations cannot only be achieved with the existence of classic destination features like attractions, but through pronounced customer service around such features. According to Gnoth (2017), a series of actions that enables such high-quality service is the basis of competitiveness. Unexpectedness and surprise are increasingly being valued by today's visitors. The local populations' role and needs should, however, be taken into equal consideration in a visitor economy. After all, they also make use of tourism-related services, experience the aftermath of visitors' stays and are equally important to modern visitors who wish to interact with them (Binder & Aubke, 2022).

In an era where several, predominantly urban, destinations suffer from the effects of uncontrollable visitor number growth, finding the balance between locals' and visitors' satisfaction could prove beneficial for all stakeholders (Binder & Aubke, 2022; Y. R. Kim et al., 2022; Reddy, 2006). What is important, is the inclusion of the local population in the process of their living space's development, as issues related to mass tourism in many destination have turned the relationship between residents and visitors into a rather constrained and superficial one (Harrison & Sharpley, 2017b). A visitor's short getaway is also a resident's home, both with different but equally valid needs and priorities. Involving locals to the desired extent is a difficult endeavor, especially in places where participation is barely encouraged or even non-existent and where residents' pleas have systematically been ignored (Bichler, 2019; Volgger et al., 2021). This is, however, something worth striving for. Local stakeholders and visitors' contribution helps to create relevant and appealing experiences that add value to a destination and its offering (Tomej & Xiang, 2020). Furthermore, it helps minder negative social, economic, and environmental effects, in that more points of view and more efficient collaboration help turn such impact into manageable and sustainable effects. Figure 2 visualizes the development of visitor economy and highlights some differences with destination management starting with a comparison of the six A's and the different clusters that are to be found in a visitor economy.

The concept of visitor economy is still far from being a dominant perspective in tourism academic contexts (Binder & Aubke, 2022) and it is still missing a widely accepted definition (Hristov, 2015). Initial research for this paper has also shown that not many destinations are adapting to the new paradigm. However, the inclusion and involvement of all stakeholders in a holistic value exchange and value co-creation process has already been discussed (Buhalis & Park, 2021; Magnini, 2017; G. D. Sharma et al., 2021; Volgger et al., 2021), with a place's DMO usually being at the center of such a process (Nguyen et al., 2021; Pechlaner et al., 2019). The ways in which a DMO can function and add value to a visitor economy will be explored in the next section.

2.2 Destination Management Organizations

In most destinations where tourism is of economic value, there are organizational structures that focus on upkeeping this value and overcoming difficulties that arise in the process (Pechlaner et al., 2019). Such structures exist in the form of DMOs, tourist boards, Convention and Visitor Bureaus; They are created through governance frameworks established with the cooperation of government institutions, NGOs, local representatives, chambers of commerce and

scholars (Pamfilie & Croitoru, 2018). Many DMOs have been operating, either in their current or past forms for at least half a century and are undeniably an important aspect of a destination's tourism design. As they are usually financed by public funds and their activities are often scrutinized, their purpose in a destination is questioned when results do not meet or even exceed authorities' expectations. Thus, their overall necessity often ends up being disputed (Hall & Veer, 2016; Rivera et al., 2021). Since the outbreak of COVID-19, however, DMOs have been put to the forefront of efforts to facilitate the standard of sustainable tourism, putting the local populations' rights above those of visitors and have thus received newfound recognition (Rivera et al., 2021).

A DMO's tasks generally include developing and raising awareness on a destination. As with destination management, there is no exact definition of the tasks of a DMO, as each organization responds to the local market's demands (Rivera et al., 2021; Wang, 2011). A tourist board mainly focuses on allocating responsibilities as well as taking the right strategic decisions for the development of the place or region it serves (Pechlaner et al., 2019) and it can be state-run or private. It is sometimes compared to a larger business firm tasked with fulfilling four regulatory functions. Usually, these functions are strategic planning, product development, interest representation and marketing of the destination (Stickdorn & Zehrer, 2009).

When DMOs started to be active in the tourism industry, they reflected local authorities' wishes to increase economic prosperity and create employment. Consequently, their activities were limited to politically motivated and marketing-oriented endeavors (Hall & Veer, 2016). Nowa-days, their roles have been expanded. They are important factors not only in enabling and preserving a destination's visibility on the market, but also in ensuring that it has the ability to innovate and stay competitive. In order to achieve that, a wide range of collaborative techniques are employed, so that the organizations understand how different stakeholders in a destination use their assets and how they interact with each other (Peters, 2017).

A DMO is therefore slowly turning into a stakeholder whose key responsibility is to nurture mutual support among and participation of the rest of the destination's stakeholders. Theirs being involved and staying in regular touch with the DMO is a key contributor to a place's success (Pamfilie & Croitoru, 2018; Wang, 2008), as highlighted in the next section.

2.3 Stakeholder interaction and involvement in a visitor economy

In the social-ecological system that is a tourist destination, where man-made economic and social systems are in constant interaction with their natural surroundings (Fountain & Cradock-Henry, 2020), there are many people and businesses whose survival depends on tourist activity. The multitude of these interest groups, combined with theirs being part of a highly complex system, poses a challenge for visitor economy management, since there are many forces that impact the system, both from the outside and the inside (Fyall & Garrod, 2020). Approaches to destination management can therefore often cause conflicts with a destination's stakeholders, as every party sees the purpose of a space differently (Stickdorn & Zehrer, 2009; Volgger et al., 2021).

The most commonly identified tourism stakeholders are hotels, airlines, travel agencies, tour operators, restaurant chains, press and government officials (Clancy, 1998; Ritchie, 2004), often also summarized as businesses in the areas of hospitality, transportation, MICE and other tourism goods and services (Ammirato et al., 2014). Such stakeholders have an important role in shaping a destination's tourism industry, subject to different organizational structures in each system. That being said, a large company that attracts a high number of yearly guests can be an equally efficient promoter of the local tourism industry as the local government or a DMO, a pivotal stakeholder in most destinations (Wang, 2008). However, a tourism system is more complex than a simple count of different entities with certain responsibility areas.

Although often forgotten by scholars, a DMO is often a central actor in the value exchange process in a visitor economy. Some researchers even go as far to state that the organizations should be the ones that have such a central and coordinative role (Nguyen et al., 2021; Rivera et al., 2021). The Vienna Tourist Board has conceived a visitor economy strategy with exactly this mindset, naming the city a "visitor economy ecosystem", which is nothing other than the positively constant interaction of people, both locals and residents, with every entity that is permanently or temporarily active in the visitor economy (Vienna Tourist Board, 2019, pp. 22–23). Figure 3 summarizes the city's ecosystem showing its diversity and multiple ways of stake-holder interplay. It is important to note that the DMO is put in the center of the ecosystem, just like in Figure 2, with locals and visitors being equally valued and represented. The fact that it is called ecosystem insinuates that the city is seen as a robust system that can deal with, accept and adapt to the majority of outside influences, both positive and negative, contributing to its long-term resilience (Hall, 2018).

The abundance of diverse SMEs is the case in most destinations, as is also the case in Vienna's visitor economy ecosystem. Although SMEs have been a relatively weak player in the global tourism market, new approaches in service quality and service design have given them considerable competitive advantage, also when facing larger competitors. This shift has largely been enabled by word-of-mouth marketing as well as online feedback platforms (Stickdorn & Zehrer, 2009). The fact that customizable experiences are now the main tourism product has involved SMEs even more, making them key stakeholders in destinations. The internet is of course even more important nowadays than it was when Stickdorn and Zehrer published, having introduced a fast change of mindset and behavior among potential visitors and being elevated to a main tool to reinvent tourism during COVID-19 and on the way to pandemic recovery (Ammirato et al., 2014; Pine & Gilmore, 2013; G. D. Sharma et al., 2021).

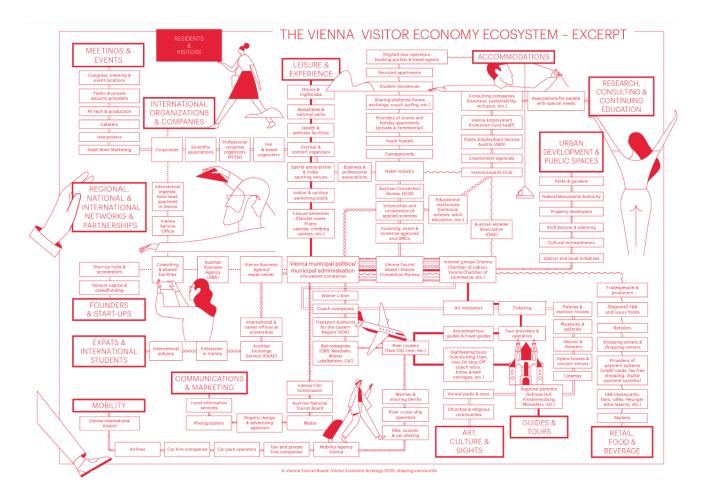


Figure 3: The Vienna Visitor Economy Ecosystem. (Vienna Tourist Board, 2019)

The role of the internet and of SMEs in a visitor economy is gaining importance and is also another indicator that the ecosystem of a destination is now based on collectivity and not individuality. It helps to improve visitors' attitudes towards individual service providers, under the condition that the latter have the capacity and know-how required (Cheng et al., 2023). What used to be a case for ruthless competition and depletion of resources is now a sustainable and cooperative environment that looks to make a destination viable for every stakeholder through open discussions and common strategies when it comes to problem-solving (Ammirato et al., 2014). Sharing experience and know-how within the industry to increase synergy and improve the destination's standing as part of a collaborative destination management strategy has shown to help local industries, especially SMEs (S. Sharma & Sharma, 2022; Wang, 2008, p. 191). This is also a key element of a socially, economically and environmentally sustainable visitor economy; long-lasting and effective communication and collaboration among different stake-holders and respect for their natural surroundings (Ammirato et al., 2014).

Although literature often names collaboration in tourism destinations as an important aspect of their positioning in the market, such attempts often fail. Many businesses and other industry representatives state lack of staff and time when asked why they do not engage in cooperations with the DMO, or similar campaigns organized by it. Daily business requirements also seem to pose a hurdle in the organization of and the participation in long-term collaborations, especially for SMEs (Wang, 2008). Moreover, and as already mentioned, several issues within a destination and its surroundings are subject to many interpretations. The same goes for approaches to its management, on how collaborations should be organized, how problems are to be identified and solved, and more aspects (Clancy, 1998).

Several modern challenges like the lack of up-to-date IT solutions, the megatrend of globalization and new types of visitors, as well as lack of sturdy and trusting relationships add to the list of inhibitors of collaborative destination management (Ivars-Baidal et al., 2019; Zukunftsinstitut, 2022). This is not only an issue because collaboration is becoming increasingly important in a visitor economy, but also because it counts as one of the most important aspects of a resilient entity, as seen by Cheer and Lew (2018), Gurtner (2007) and Medel et al. (2020).

A promising approach to enabling collaborations is design thinking. How design thinking can be approached and applied by DMOs and how it can help to achieve resilience in a destination will be explored in the next chapters.

3 Design thinking

Design pertains to several disciplines and is a very promising enabler of participation in destination management. In the past it was seen as the activity of developing and specifying the composition and manufacturing of tangible products and it is still often found to be a central aspect of engineering (Razzouk & Shute, 2021). It can be implemented in various contexts, both related to the construction of physical products, as well as to activities and processes.

The meaning of design has many dimensions and is used extensively in different scientific or professional contexts, as well as in daily language (Volgger et al., 2021). When examining regular consumer products, design is identified as one of the "more sophisticated and high value-added activities" in the process of creating an item (Clancy, 1998, p. 126). In general, design can be seen as a creative problem-solving process that looks to fulfil people's needs. Aesthetically pleasing results are usually part of design, which looks to accommodate needs with efficiency and functionality (Bertella et al., 2021; Glancey, 2022).

This chapter dives into the impact of design as a thinking process to solve problems creatively, while empowering involved parties to apply newly gained knowledge in order to increase value for their products and their surroundings. Its evolution from a purely materialistic approach to a more abstract one and how it can be used as a collaborative tool as well as to create impact, are all aspects of design that are being touched upon in this thesis.

3.1 Approaches to the design thinking process

Intangible products and experiences are coming to the forefront and designers concentrate more on creating processes that accommodate this development, with the internet being a milestone for such endeavors (Brown & Katz, 2011; Glancey, 2022). Here, both Brown and Katz (2011) and Hernández et al. (2018) find design to be turning into a kind of abundant and inventive thinking, simply called *design thinking*, a process that is also a prominent and popular subject in academic research, according to Chang et al. (2013) and Roumani (2018).

Design thinking, in that sense, can be defined as a process that wishes to bring about social impact through innovation. It is a human-based and experimentation-centric approach to solving problems that looks beyond mere technical specifications (Glancey, 2022; Hernández et al., 2018; Mahato et al., 2021). The main characteristic of design thinking is the fact that it can be applied to a wide range of fields. It is not only bound to creating objects with enticing qualities,

but also uses designers' know-how and perception to identify, understand and fulfil people's needs (Brown, 2008; Brown & Katz, 2011). This broad applicability is what makes it difficult to clearly identify what design can do for innovation (Hernández et al., 2018).

Design thinking differs significantly from a purely academic or critical mindset and one could assume that this is also the reason why trying to define it sometimes results to heated debate (Liedtka, 2015). Critical thinking, with its naturally pragmatic and analytical character, can hinder the development of new ideas. On the contrary, design thinking focuses on a desired solution to intricate problems and is based on creative ways to conceive it (Bertella et al., 2021; Razzouk & Shute, 2021). Here, emotion comes to the forefront, with the humans involved in the desired outcome being central to the development of new ideas. The problem is already known, and design thinking focuses on conceiving the most suitable solution through continuous testing and adjustments (Pamfilie & Croitoru, 2018).

It is important to keep in mind that design is a customizable notion and that it can be implemented in any area where change is needed in the way that problem-solving is approached. Visitor economy is one of those areas, while it is not considered too arbitrary to assume that it can also help develop long-term resilience.

Brown (2008) contends that designers do not necessarily have to have received formal education on the subject. Interdisciplinarity is what makes design so broadly applicable. The focus should lie on personality traits when looking for a good designer. The author goes on to define empathetic handling, integrative thinking, optimism as well as willingness to experiment and collaborate as basic criteria for finding a good design thinker. This mindset is also seen as the design thinker's basic characteristic by Ericson et al. (2016) as well as Hernández et al. (2018). The authors see design thinking as a helpful approach to problem identification and solution that focuses on experimenting and prototyping with the goal of bringing about product differentiation and innovation.

As a "creative problem solving" process, design thinking always seeks to find a solution using non-established methods. It can be applied by any and all individuals or companies willing to bring a specific set of innovative approaches into their product creation process (Volgger et al., 2021, p. 3). Design thinking differs from conventional business handling, in that there is no predefined set of actions to facilitate the desired change. Although such an abstract procedure

might frustrate, it is one that brings about results (Brown, 2008) and assists in breaking away from prejudiced thinking patterns (Langhe & Fernbach, 2019).

Brown (2008)	Brown & Katz (2011)	Du et al. (2012)	Hasso Plattner Institute (2010)	Liedtka (2018)	Vianna et al. (2013)
Empathy	Empathy	Issue	Empathize	Customer discovery	Immersion
Inspiration	Inspiration	Collaboration	Define		Analysis and synthesis
Ideation	Ideation	Option	Ideate	Idea generation	Ideation
Implementation	Implementation	Solution	Prototype		Prototyping
			Test	The testing experience	Transformation to business

Table 1: Comparing approaches to design thinking. (own illustration)

As inherently human-oriented, design sees people as the most knowledgeable ones regarding their problems, their businesses and their surroundings. Designers try to listen and to understand in order to test and implement innovative solutions (Ericson et al., 2016). This is why empathy is seen as one of the most important aspects in the process of design, particularly service design (Battarbee et al., 2014; Brown & Katz, 2011; Gardiner & Scott, 2016; Gnoth, 2017). What follows approaching the problem with empathy are three stages that Brown (2008) suggests as milestones in design thinking: inspiration, ideation and implementation. Similarly, Du et al. (2012) define such milestones as issue, option and solution, while they put focus on collaborative structures. In the works by Brown (2008), Brown and Katz (2011) and Brown and Wyatt (2010), the different stages of design are presented as so-called spaces, in order to clarify that there is no specific order of achieving the separate milestones.

What becomes evident after the review on design thinking, is that it is an iterative process, where creativity is a key element to reaching innovative results. The varying approaches to the different milestones in the design thinking process have been summarized in Table 1. Almost all reviewed authors see empathy as a core stage for facilitating design thinking, while ideation and prototyping are also prominent approaches. What is interesting, is the approach of the Hasso Plattner Institute of Design at Stanford (2010), which presents the process with calls to action, highlighting the more human nature of design. They are also the ones, who, together with Liedtka (2018) put an extra focus on testing the prototyped solutions. Finally, while every author deals with design in a wider business context, Vianna et al. (2013) are the only ones who see turning ideas into business as part of the main design process.

Designers are not afraid to make mistakes and to retry after testing their solutions (Brown, 2008). Figure 4 looks to visualize design as the iterative process that it is, suggesting that prototyping and reevaluating proposals is important to achieving long-term and effective solutions. As already discussed, the model is not to be seen as a linear procedure, but as a general framework that assists with setting milestones when looking to achieve solutions. These milestones should also be repeated and tested in various ways to see which approach is the best for the problem at hand (Hasso Plattner Institute of Design at Stanford, 2010).

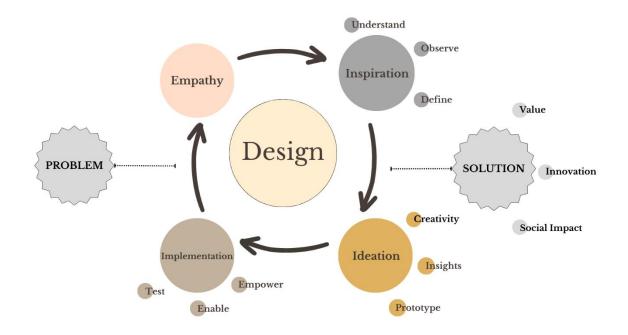


Figure 4: Solving problems using design thinking. (own illustration based on review of Brown, 2008; Brown & Katz, 2011; Hasso Plattner Institute of Design at Stanford, 2010; Robbins & Devitt, 2017)

All in all, the goal of design is to find ways to inspire its subjects and to empower them to take control of their own narrative and surroundings. This, of course, depends on the context or the industry in which design is applied, which is why there is not a specific way to approach it. The only undeniable view is that collaboration and open debate are key when applying design thinking (Volgger et al., 2021). Ultimately, this spirit of collaboration is what can help tourist destinations reach a point of resilience which will allow them to properly adapt to and recover from the next major disruption (Medel et al., 2020; World Bank, 2020).

3.2 Design thinking in tourism

The initial review on design thinking highlights the fact that design can be part of any industry. A designer can apply the widely accepted principles of empathy, ideation, inspiration, and implementation to their solution-seeking endeavors for any field, provided they have a profound understanding of the needs of that field and, most importantly, the people comprising it, as design is here to solve human problems (Kotler et al., 2021). This can also be the case for a visitor economy, where customization of services is the new norm, and where the needs of both visitors and residents are to be taken into equal consideration. Design seems to be a promising tool that facilitates not only seamless and peaceful interaction of all stakeholders, but also enables service providers to listen and to adapt to their consumers' increasingly demanding requirements. As a result, service design has come to be the basis of every stakeholder's activities in a tourism destination (Peters, 2017).

While design was long seen as an artistic touch to product and service management, it has slowly come to be a mentality that allows for offers to appeal to an even wider audience whose needs are being heard (Pamfilie & Croitoru, 2018). In a visitor economy, Fesenmaier and Xiang (2017, p. 4) identify design thinking as essential when innovation is strived for, while they consider "Design Science in Tourism" to be a shift in designing tourism experiences. Design Science does not only involve tangible items, but also abstract ideas and processes that contribute to a holistic approach to tourism. These abstract elements are needed, especially since consumer behavior, particularly regarding the experiences of tourists, has undergone significant changes and is now less predictable. Visitors now tend to look for inspiration online when they wish to take a trip. Their booking process, as well as the planning of their experiences at the destination take place with the help of ICT, the wide availability of which has made tailor-made and location-based recommendations the standard guide for modern visitors. This is also the way that memories are being collected and shared for the next potential visitors to discover (Ammirato et al., 2014).

Xiang et al. (2021) share the opinion on design science and visualize it by putting a visitor in the center of the tourism system. The visitor's intrinsic views and feelings are the ones that help create the means which in turn facilitate the design of a destination. Designing a destination is of course a process that is subject to constant prototyping and trials until a satisfactory result is reached, but ICT is a powerful means through which the voices of visitors can be heard. As design thinking is not part of a specific discipline or industry, designing a destination is no

exception, with the process including several perspectives from different areas which are then bundled to achieve optimal results (A. Sharma et al., 2021).

The design of a destination and what exactly it should entail is an ongoing conversation among experts. The seemingly endless principles that can be applied to approach the issue could form an array of incompatible points of view. However, involving stakeholders, nurturing the creation of experiences, as well as the use of ICT, seem to create an ecosystem where destination design can thrive and where the interaction of diverse ideas can help to achieve a deeper understanding of the destination and its needs (Volgger et al., 2021). With such deep understanding, empathy will be easier to achieve, hence enabling a more efficient design process. Applying design in a visitor economy and particularly destination management is an urgently needed measure; Incessant growth, untransparent transitions of power, as well as numerous crises have made responsible entities oblivious to the fact that the needs of the people using tourism services have been neglected (Higgins-Desbiolles et al., 2019). For that reason, implementing design thinking processes can create new perspectives for a visitor economy; Methods native to design as well as tourism destination management can contribute to rethinking how destination management and marketing is approached. (Volgger et al., 2021). The transdisciplinary nature of design is central to the exploration of the concept's role in complex adaptive systems later in this paper.

3.2.1 Product vs. service design

The progression from designing tangible products to design thinking shows that the conception of new processes to develop ideas, and to create lasting solutions and profound connections is a necessity for organizations nowadays (Brown & Katz, 2011). DMOs and stakeholders in a visitor economy also look to create new ways to attract and satisfy visitors through their products. In tourism, service design is the core product development process; People involved in service design are tasked with observing and bundling a series of human interactions into an experience, which then constitutes the product (Pamfilie & Croitoru, 2018).

On the differences between goods and services, Pine and Gilmore (2013) argue that the first are physical products based on standard procedures, while the latter are based on customizable ones. Services can also only be delivered on demand, while goods can be stored for later use. This is also the main difference between tangible and intangible products; Services do not make

up a product one can touch, feel, or even test. A service can only be produced when it is requested, and its quality can only be evaluated while it is being consumed or after the process is over. Co-creation, i.e., the necessary presence of both consumer and producer during service delivery, is the core of this idea and it is central to service design thinking (Fesenmaier & Xiang, 2017).

Although good infrastructure, financial stability and accessibility constitute basic attractiveness factors for a destination and contribute to an overall positive visitor experience, they are no longer reliable factors that ensure the destination's competitiveness. Diversifying offerings with customizable services is key nowadays, with a holistic, human-centered approach facilitated by design thinking forming the base of a destination's brand (Karayilan & Cetin, 2016; Pamfilie & Croitoru, 2018).

This diversification, according to Volgger et al. (2021), has become arduous as visitors are looking to participate more in the production of the services they consume. Apart from that, visitors perceive experiences in subjective ways, which means that overall visitor satisfaction may not coincide with the quality of activities themselves, but with intrinsic values and subjective expectations.

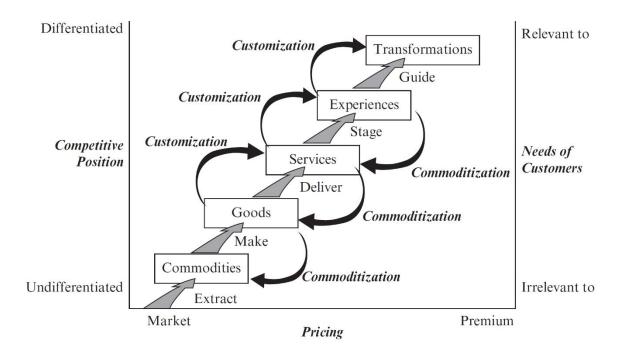


Figure 5: The progression of economic value. (Pine & Gilmore, 2013)

The result is that the same experience may be appraised differently by a visitor whose presence at the destination is the result of an informed decision, as opposed to another whose trip was a last-minute occurrence, a visit to friends and family, or a mere professional requirement, for instance. This is why the role of empathy in service design is to be stressed again. Offerings that fit people's state of mind are important to the creation of experiences. Understanding one's customer creates a dialogue that enables a destination to form long-lasting liaisons with its visitors (Gnoth, 2017).

Vargo and Lusch (2004) as well as Pine and Gilmore (2013) have elaborated extensively on the increasing importance of services and the experiences they help create during the value creation process. On the one hand, Vargo and Lusch (2004, p. 10) examined the transition from tangible products to services, introducing the "service-dominant logic", which entails that value is created predominantly by creative and gifted providers. On the other hand, Pine and Gilmore (2013, p. 33) present the shift from commodified standard offerings to "transformations", i.e., experiences that lead consumers to profound personal fulfilment and change, and call that shift "The Progression of Economic Value", seen on Figure 5. The authors describe it based on the economic output of each activity. That output is adjusted through customization, which entails increased prices, differentiation, and empathy. The contrary results in commodifization of the offerings.

Goods-dominant logic	Transition	Service-dominant logic
Goods	Services	Service
Products	Offerings	Experiences
Features	Benefits	Solution
Value-added	Co-production	Co-creation of value
Profit maximization	Financial engineering	Financial feedback/learn-
		ing
Price	Value delivery	Value proposition
Equilibrium systems	Dynamic systems	Complex adaptive systems
Supply chain	Value chain	Value creation network
Promotion	Integrated marketing com- munications	Dialogue
To market	Market to	Market with
Product orientation	Market orientation	Service orientation

Table 2: The transition from goods to services. (Kotler et al., 2021)

The transition from goods to services and into the service-dominant logic conceived by Vargo and Lusch (2004) has also been elaborated on by Kotler et al. (2021), who summarized that

transition as seen in Table 2. This thesis has already put focus on aspects of the service-dominant logic, namely services, experiences, and solutions, while aspects like co-creation and complex adaptive systems will be presented in the following chapters.

3.2.2 The complexity of service design in tourism

Approaches to the customer journey have changed considerably. What was seen as a predominantly data-based approach, has turned into a quest for the aspects that make a customer journey truly memorable, with ideas stemming from social sciences (Liedtka, 2018, p. 75). With a service-dominant logic, service design is considered to be a process of co-creation between businesses and customers (Edvardsson & Tronvoll, 2013; Kotler et al., 2021; Vargo & Lusch, 2004). In a tourist destination this process involves visitors and local stakeholders and is ideally initiated by a place's DMO (Karayilan & Cetin, 2016; Kotler et al., 2021). Design is essential to modern and innovative product development, and it is one of the most notable factors that ensure an organization's relevance in a market (Pamfilie & Croitoru, 2018). This is also the case for DMOs, which can have an instrumental role in attracting visitors (Karayilan & Cetin, 2016). However, the difference between regular consumer products and destinations, is that the latter is a product which not only focuses on attracting several markets simultaneously, but also has numerous dimensions and affected entities that can make the process of creating a brand promise somewhat challenging (Pike, 2005).

To avoid a clash of product dimensions and destination stakeholders, Peters (2017) proposes clear differentiation between visitors' and businesses' needs in order to start with the service design process. Once this process commences, experiences can be designed including adequate staff training to promote and internalize customer orientation and empathy. Furthermore, it is suggested that relevant visitor satisfaction data be collected to analyze and further develop the design, while the author suggests the creation of general service design schemes which can prove to be beneficial to start to understand one's target audience. Such a scheme plan is also suggested by Magnini (2017), who provides guidelines on how to achieve surprise culture within tourist organizations in a destination. Such surprise culture is seen as necessary to catch visitors' attention, who tend to lose focus on the service delivery when no script deviations occur. The author's so-called "service blueprint" (p. 166), outlines specific services and processes and has staff come up with ideas on how to surprise guests in each stage of the customer journey.

On the one hand, Magnini and Peters' approach seems to be an efficient way to involve staff in creating surprise experiences, especially since a rewards system is also suggested. On the other hand, however, this raises the question of how workers can keep up with the pressure of having to conceive new tactics during each new customer interaction. One could argue that such creativity on demand could lead back to standardized generic services with predictable surprise factors resulting from categorizing different types of visitors and applying pre-defined patterns when designing their experiences. Indeed, amplifying general assumptions about different customer groups is not only troubling, but can also result in distorted perceptions of their actual needs (Langhe & Fernbach, 2019).

Empathizing profoundly with potential customers instead of interacting based on patterns helps to facilitate dialogue (Kotler et al., 2021). This dialogue can then help DMOs and cooperating stakeholders to take prospects' needs into consideration when creating a service. In order to design services in tourist destinations, informed decisions need to be made in order to achieve the best possible result. This result should reflect potential visitors' needs and experiences to date, as those are the ones using the service. Thus, the affordances designed should facilitate the overall satisfaction of visitors since they form an integral part of the product design. Affordances should not be constrained to one type of design. Hence, if a DMO wishes to provide F&B recommendation to customers, the process can take place in several ways, e.g., by publishing a blog post, creating brochures, and presenting the options on social media, among others (Tomej & Xiang, 2020).

When enabling relevant affordances, designed experiences look to fulfil expectations. After the service period, overall satisfaction is evaluated and communicated accordingly. However simple the description may sound, the complexity of the visitor experience is a hurdle for destinations wishing to conduct in-depth analyses of customer experiences (Stickdorn & Zehrer, 2009), as research on visitor satisfaction needs to go into deep detail to understand individual experiences during the consumption process (Gnoth, 2017). Luckily, ICT enables real-time monitoring of experiences that allows short-term adjustments to their design (J. Kim & Fesenmaier, 2017). Here, one could argue that such technologies make the prototyping and testing spaces of design easier to carry out and help to create sustainable solutions quicklier. This is also something that can be helpful in times of crisis, as knowing how to address irregularities to the benefit of people experiencing them will reduce the risks of fearing for an organization's existence (Pechlaner et al., 2019).

In general, design is an ever-evolving field which looks to facilitate process optimization, even during ongoing processes. This is not only because of its nature as an empathetic and trial-based tool, but also because it creates the space for constant development and cooperation (Battarbee et al., 2014; Liedtka, 2018; Volgger et al., 2021).

3.3 Design as a collaborative tool in tourism

The tourism industry has a long record of enabling or attempting to enable participation of its stakeholders, particularly during a crisis (Buhalis & Park, 2021; A. Sharma et al., 2021). Although DMOs and other providers in a destination are separate entities, the role of governmental institutions, one of them often being the DMO, should not be underestimated in designing a holistic experience. Cooperation between DMOs and other stakeholders is necessary when in the process of creating satisfying experiences for visitors (Karayilan & Cetin, 2016).

In our increasingly globalized society, local initiatives that boost and improve collaboration among tourism stakeholders gain ground. Such strategies are advantageous not only to the larger organizations that initiate them, but to smaller providers as well (Ammirato et al., 2014). In modern service design, customers are treated as co-creators, as they are the ones who are most aware of their needs. Proactively inviting them to participate in the value creation process is becoming a necessity for service providers. Such an exchange has started to happen with sharing economy platforms, where people are invited to utilize each other's properties in order to enable a more sustainable way of life, among others (Patrício et al., 2018).

At the center of every DMO activity that looks to improve the local experience are the destination's stakeholders, whose cooperation is key for the successful development of a destination. Adequate participatory structures are an asset to both DMO and stakeholders, as product and brand development are integrated in a seamless process that enhances a destination's image and thus not only increases its arrivals, but also the prosperity of its residents (Adeyinka-Ojo et al., 2014). The creation of holistic experiences is therefore the result of such effective collaborations. Visitors as well as residents should be incentivized to participate in the conceptualization and use of the destination's offerings. Locals play a pivotal role, as interaction with visitors in an authentic and genuine way will result in the latter's return. Hence DMOs can focus on ways to create such unique experiences that improve coexistence and create value for visitors and residents alike (Karayilan & Cetin, 2016). Facilitating participatory structures is one of the main challenges a DMO faces when looking to create a collaborative environment; Getting the support of the local industry and creating lasting relationships between the organization and the different stakeholders is not an effortless task (Wang, 2008). It requires broad exchange between the stakeholders and discussions to discover commonalities and to determine mutually beneficial goals (Bertella et al., 2021). Achieving that is an important accomplishment, as a number of marketing activities can take place with the help of collaborative networks. These activities can result in synergy effects for the involved parties, which in turn help get their involvement in more visitor economy planning strategies and increase the industry's shared understanding of the destination's and visitors' needs (Ammirato et al., 2014; Nguyen et al., 2021).

Collaborative endeavors need to be ruled by a spirit of fairness and equality, while stakeholders all need to have similar worldviews and comprehend the issue at hand in order for a strategy to succeed (Du et al., 2012; Khalizadeh & Wang, 2018). Although setting up participatory frameworks in a destination has impactful advantages to destination management, barriers are often faced in the process (Khalizadeh & Wang, 2018; Wang, 2008). This is why design as a thinking and processing tool can be helpful here.

In some circles, design thinking is seen as a collaborative tool for stakeholders in a social system (Hernández et al., 2018). Creating a common, interconnected service concept is a process which can be made possible with the use of design thinking (Peters, 2017). The only problem is that not all professionals in the tourism industry seem to value design; In research conducted by Pamfilie and Croitoru (2018), about a quarter of respondents said that design thinking was to be implemented only at the final stages of the service creation. This reluctance can be traced to organizations' lack of know-how on applying design thinking. To use it properly, it is not only necessary to be able to create a safe collaborative environment, but also to know how to handle different situations within complex and vulnerable social systems, as is a destination. The assumption that a system can never be affected by external influences is not valid (Roumani, 2018). Grasping the concept of co-creation is also helpful, as nowadays consumers like and are to be encouraged to contribute to the design of services that will later generate value for them (Edvardsson & Tronvoll, 2013).

When examining design as a collaborative tool, the principles of design as an empathetic iterative process remain at its core. Although scholars look to optimize the iterative aspect of design to avoid as many repetitions as possible, it is not entirely discredited (Zheng et al., 2021). Stakeholders entering cooperations that are to be facilitated by design thinking need to show deep understanding of the problem that a solution is being sought for. Apart from that, respectful discussions and cohesive argumentation assist in discovering necessary action fields (Du et al., 2012). Also, treating other participants with respect and proactively seeking interaction are necessary for building better relationships (Campos et al., 2018; Liedtka, 2018). This interaction can prove to be more than helpful to SMEs, where the expertise and the resources needed to implement design in the service creation process are rather limited (Design Council, 2011).

In their quest to define the collaborative aspects of design, Du et al. (2012) argue that the stages of issue, option and solution are the basis for any design-based solution approach. When the approach turns into a collaborative project the design milestones are good argumentation, refining the topic following constructive feedback and discussions, finding common ground with other ideas, and combining the strongest elements of each concept to come up with the best solution. The ideas of finding mutual understanding and creating inclusive products are necessary for the cooperation process. This is because a visitor economy is an ecosystem where different entities constantly and closely interact on several levels (Campos et al., 2018).

Hernández et al. (2018) carried out extensive research to come to the conclusion that design can assume a variety of roles, especially when it comes to facilitating innovation. Such roles see design as a method to implement ideas, to carry out research, and to ease a market into innovation. With innovation steadily turning into a necessity for businesses nowadays, its human aspect is being focused on (Kotler et al., 2021). Furthermore, there are approaches that see innovation as the main goal of the design thinking process. Brown and Katz (2011, p. 381), for instance, call their presented milestones the "three spaces of innovation", while the Hasso Plattner Institute of Design at Stanford (2010) sees innovation as a main business goal and design as an enabler that raises the possibility of achieving that goal. Details on innovation, especially in a visitor economy, are discussed in the following chapter.

3.4 Design for innovation and social impact in tourism

Innovation is a pivotal benchmark that measures an organization's financial strength and overall position on a market. Tourist destinations are no exception (Ericson et al., 2016). Especially in a visitor economy, innovation is gaining ground and is seen as essential for business survival. On the one hand, innovation is instrumental for a destination's competitiveness, while on the

other hand, SMEs are the main initiators of innovative offerings (Gardiner & Scott, 2016; Souto, 2015). Though SMEs' importance is not to be underestimated, their resources, both financial and competence-based are often lacking and hinder them from unleashing their full potential when designing their products (Gardiner & Scott, 2016).

Interestingly, the definitions of innovation vary considerably between scholars, exactly as is the case with design, i.e., depending on the context of research. Patrício et al. (2018) specifically highlight how innovation, together with service design, still lack broad acceptance and understanding and are based on several methods that have yet to be combined into a broader consensus. So, while Langhe and Fernbach (2019) see innovation as the result of escaping categorical thinking structures, Pine and Gilmore (2013) argue it is an urgently needed mindset to facilitate transformation and provide consumers with true fulfillment during the progression of economic value (s. Figure 5). The two approaches can be seen as complimentary, however, as facilitating broad customization entails breaking away from thinking categorically and enabling designers to approach their products with the empathy required to create experiences that shape people's lives.

When it comes to innovation's role within design and vice versa, the Design Council (2011) suggests that innovation is facilitated by the participation of every stakeholder that wishes to contribute with a creative idea. It helps to add new perspectives into the product development process, thus creating more qualitative and popular products which result in added value for an organization. Liedtka (2018) also argues that design thinking works as a creative push to innovation which helps people involved to rethink established methods and improve their procedures. The author goes on to present the opinion that design helps innovation succeed by making it easier to achieve the most important goals, these being the creation of long-lasting solutions, minimizing risks, and facilitating acceptance of change within employee circles. Brown and Katz (2011) have also presented a similar view, once again stressing the importance of empathy.

Based on organizations or destinations' needs and resources, innovation can have different levels of originality and new approaches. As already mentioned, categorical observations and increasing service standardization can make it hard to facilitate innovation and thus recognize an organization or destination's USP. So, brand management, however costly, is an integral part of innovation through service design, as different brand values are what help consumers differentiate between similar products. Employer branding, in particular, with front-line employees being the first and sometimes only physical customer touchpoint, is an area that every HR department should focus on nowadays (Pamfilie & Croitoru, 2018).

The idea of employer branding might seem out of place at first, but with co-creation being a core concept in a service-dominant logic, satisfied staff contribute to a more efficient and socially sustainable service delivery that cares for innovation. In that sense, Souto (2015) differentiates between incremental and radical innovation; Incremental is the type where less risks are taken, and radical innovation the one where thorough and sudden changes happen and are seen as important to economic progress. Gardiner and Scott (2018) base their work on incremental and radical innovation, visualizing the different grades of innovation in their destination innovation matrix seen on Figure 6. Destinations who choose to take few risks, i.e., apply incremental innovation try to establish few novelties, while risk-taking destinations usher in more impactful changes.

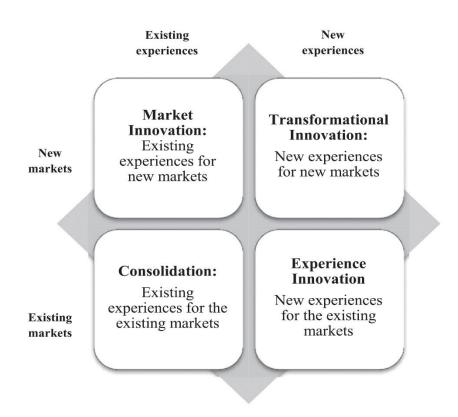


Figure 6: Destination Innovation Matrix. (Gardiner & Scott, 2018)

While innovation is often seen as a hurdle on the way to sustainability, the two values are highly nuanced and sometimes even complement each other, especially when it comes to their social aspects (Gnoth, 2017). Design thinking is instrumental when wishing to facilitate innovation in a company or other entities, as the design process and the creation of new experiences helps an

organization stand out and gain competitive advantage (Brown, 2008; Hernández et al., 2018). Coming to a new finished concept can be a lengthy endeavor, but it does not mean it has to be very different from people's daily life. Remembering that an empathetic approach is key to designing can help to create value both for an organization and for a customer (Brown, 2008). This is also the case for tourist destinations, where innovation in experience design helps enhance a place's competitiveness (Gardiner & Scott, 2016).

For such a competitive advantage to be felt in an organization, the use of new technologies seems to be a necessity (Edvardsson & Tronvoll, 2013). In a social system like tourism (Fountain & Cradock-Henry, 2020), where the service-dominant logic prevails and co-creation is the standard path to product design, taking both consumers' and businesses' needs into consideration will enhance the innovation process. Interaction of all stakeholders creates a new role for visitors, who are not only in a destination to consume and relish, but also to shape a new social order, where values are shared and constantly updated after considerable exchange among all parties involved; consumers now know what their requirements are and communicate them accordingly, while a place's social structures govern these interactions. This, according to Edvardsson and Tronvoll (2013, p. 27) and Patrício et al. (2018, p. 3) is service innovation.

One can note that innovation and design are favorably linked. In a visitor economy, especially during an era when both visitors and tourism professionals try to avoid mass tourism patterns, cultural and social aspects of tourism are being reimagined. Visitors are now offered services covering a wide spectrum which help them experience a place in a holistic way (Ammirato et al., 2014). The empathy and creativity employed to create transformational experiences are what have brought about the term *destination design*. It can be used to approach destination development not only using long-standing methods, but also applying technological and artistic values. In this paradigm, new ways to achieve successful destination development can be conceived, while connections to issues like sustainability and transformation emerge "organically" (Volgger et al., 2021, p. 2).

In Vienna, Austria, for example, the city's DMO managed to initiate dialogue with various stakeholder groups in order to develop its visitor economy strategy, thus upholding the values of empathy and co-creation. Issues like sustainability and interactions between stakeholders are central to the development of the visitor economy, which looks to facilitate innovation through services designed specifically to accommodate sustainable development and fair allocation of space and resources to residents and visitors alike (Vienna Tourist Board, 2019).

It is important to understand that design is not a complex process. Its mission is to employ empathy to achieve deep understanding of complex issues. This allows designers to make targeted observations that will generate ideas which will help to find solutions that improve the human experience. This is also how innovation happens. The only difficult part is determining who, when and where to observe (Brown & Katz, 2011).

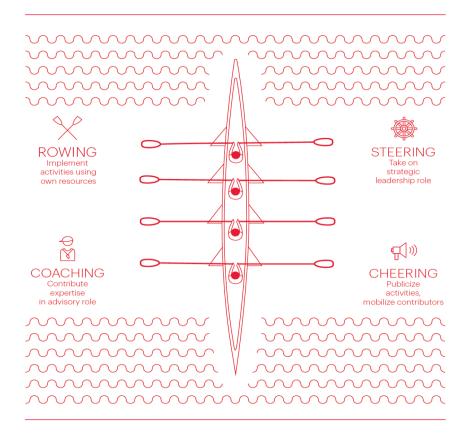


Figure 7: The DMO's roles in a visitor economy. (Vienna Tourist Board, 2019)

Moreover, Roumani (2018) contends that design thinking seems to be a helpful tool in coping with societal problems. Through destination design, tourism can be seen as an industry with the purpose of satisfying human needs, all during an era when uncontrollable growth is being avoided. DMOs and other stakeholders can use design to implement environmentally and socially sustainable practices to build and maintain a visitor economy. This can happen through consistent collaboration and updates to the process following stakeholders' needs (Barua, 2020; Higgins-Desbiolles et al., 2019).

The DMO's role in a visitor economy is visualized as a "rowing analogy" by the Vienna Tourist Board (2019, pp. 40–41), where the interaction with the rest of the participating stakeholders is taken into account. In that analogy, which can be seen in Figure 7, stakeholders' long-term

involvement in the development of the destination is seen as an important step in increasing awareness and know-how in the visitor economy. This know-how is to be transmitted with the help of the DMO, which takes a leadership role in the strategic management of the destination. Finally, publicly presenting and celebrating fruitful endeavors increases participation among stakeholders. This participation turns the visitor economy into a strong collaborative network, as seen by Ammirato et al. (2014).

Through this brief review of innovation, one thing that remains clear is that innovation is not about all-new creations. It is about how one can use existing knowledge, existing structures, and existing relationships to reassess their potential in a visitor economy. Understanding the role and intentions of different stakeholders and making sure that they are enabled to participate and be heard seems to be the key to ushering in innovation, which is what will make destinations socially sustainable. Design thinking, being based on empathy, observation, and empowerment can be instrumental to enable that necessary collaboration which will make visitor economies thrive. Thriving, of course, does not only include uninterrupted prosperity and growth. It also means that destinations are able to adequately prepare for and overcome any challenge that might come to question their structures. According to Volgger et al. (2021), destination design and design thinking help develop links to resilience, the particularities of which will be explored in the next chapter.

4 Risk and resilience management in tourism

Resilience is often at the center of attention during or in the aftermath of a crisis, as crises are not necessarily a frequent occurrence, but do dominate media outlets when they take place. The same applies to academia, with the topic being touched upon when a current or potential challenge needs to be addressed (Hall, 2018). This observation is not entirely false, as one can note that several well-established works on crisis management and resilience were published during or shortly after periods of unrest and crisis, where tourism was particularly affected. Examples are Cochrane (2010), Faulkner (2001), Gurtner (2007), Mazzocchi et al. (2010), Pessina (2021), Ritchie (2004) and G. D. Sharma et al. (2021), among others. Tourism can be affected by world affairs, like political unrest or war. Such instances, though they might only be affecting specific countries or communities, can act as a deterrent of visiting the broader region, thus even creating space for new destinations to emerge (Cheer & Lew, 2018).

The understanding of risk and contingency planning is usually based on individual or organizational level, with the resilience approach seeking to combine the factors of learning to live with uncertainty and of reducing sensibility to outside influences (Berkes, 2007). Thus, resilience is widely regarded as "[...] the capacity to deal with change and continue to develop." (Stockholm Resilience Centre [SRC], 2022). This perception might seem to be illustrating a mere compromise. Large systems, however, which are easily susceptible to crises and instability, can be entirely transformed by seemingly insignificant occurrences (Cochrane, 2010).

In the context of social-ecological systems, resilience is seen as a system's capability to maintain its core purpose while undergoing and adapting to changes caused by factors outside its sphere of influence (Walker et al., 2004). In light of the COVID-19 pandemic, this approach was enriched with the idea that resilience is closely connected to unpredictability and looks to equip a system with long-term capacity to prepare for and counteract risks, as well as assimilate to and bounce back from crises (Pessina, 2021; G. D. Sharma et al., 2021).

While the concept of resilience has become a popular staple in tourism academic research, its extensive use has led to its over-simplification (Hall, 2018). Contrary to resilience of socialeconomic systems, the resilience of enterprises is generally easier to define in terms of key measurements and boundaries (Cheer & Lew, 2018), as it usually entails the measures taken in response to effects with grave consequences and the businesses' abilities to change in the face of a new, disruptive reality (Dahles & Susilowati, 2015). All in all, resilience is an idea that has undergone multiple research and extensive adaptations over the years, reaching a state of broad application and inclusion of several sub-topics, just like sustainability. This can be a good thing, but practice has shown that it can lead to overuse and little understanding of what the concept actually entails (Hall, 2018). Resilience needs to be seen as a thinking process that works as the basis for crisis management, but takes a deeper look in the systems where crises take place and the exact aspects of these systems which need to adapt to a new reality (Cochrane, 2010).

4.1 Understanding risks and vulnerability

It is no secret that the international tourism industry is particularly vulnerable to certain factors which can have grave impact when left unreacted to. Vulnerability in tourism is generally regarded as the imminence of dangers to an organization (Berkes, 2007). According to Calgaro et al. (2014), the vulnerability of a destination can be enhanced by factors such as inadequate contingency planning, seasonality, geopolitics, environment, and many more. Whether environmental, economic and political difficulties or war and public health issues, tourism and destinations have often been impacted by the short- or long-term consequences brought about by such irregularities, whether they affect the destination itself, markets that are important for the destination or even other destinations (Prideaux et al., 2003; Sharpley, 2005).

Based on a destination's social, economic and environmental standing, vulnerability to external effects can have varying intensity (Dogru et al., 2019). Factors that can disrupt regular visitor arrivals are summarized by Prideaux et al. (2003) as crises, disasters and trends. Crises are seen by the authors as the inability of management of organizations to adequately respond to irregularities of daily operations, a view that is shared by Faulkner (2001). This characteristic also poses the main difference to disasters, which are defined as unforeseeable and independent of human handling and can only be treated reactively or by implementing contingency plans. Trends are also considered an impactful occurrence, where certain tendencies can change the course of tourism flows and have a negative toll on a destination if no response is planned.

Efficient response to crises, disasters, and trends requires proper understanding of the risks that can bring about such events so that organizations can deploy adequate mitigation strategies. Yilmaz and Flouris (2017) contend that risks are usually perceived based on the possibility, the potential and the likelihood they have of causing a type of disruption. What the different perceptions exactly entail can be read up on in Table 3.

Risk perceptions		
Possibility	Something could be lost on account of an unexpected incident or bad luck.	
Potential	A negative impact could occur. The exact magnitude, timeframe and na- ture are unknown.	
Likelihood	A risk has already arisen. Analytics deployed to assess the impact and how the damage can be repaired.	

Table 3: Concepts of risk perception. (own illustration based on Yilmaz and Flouris 2017)

What is important to note is that a risk can have both negative and positive consequences, generating threats and opportunities respectively. Adequate risk management structures can thus help to avoid unexpected threats but require close observation of any factor that might affect an organization. Using analytical processes to define risks is essential to building up resilience in an organization (Pessina, 2021). Since risks can also have positive effects, recognizing their nature in time can help an entity act accordingly (Boghean, 2015). Based on that principle Yilmaz and Flouris (2017) have also identified and categorized different types of risks that can affect an organization, those being strategic, operational and financial. The details are summarized in Table 4.

Knowing what risks are potentially harmful for an organization or a system does not automatically mean that adequate response to change is going to take place. Especially in tourism, where relevant research has only gained ground in the last few years, resilience concepts are presented in limited ways, usually based on ecological or socio-ecological perspectives (Hall, 2018).

Types of risks		
Strategic	Business environment, brand and commercial relationships, organiza- tional and governance design, reputation.	
Operational	Operational requirements like energy consumption and efficiency, HR management, IT solutions, ethics, compliance, and natural risks.	
Financial	Price changes, financial products, cash flow, overall economic prosper- ity.	

Table 4: Types of organizational risks. (own illustration based on Yilmaz & Flouris, 2017)

A more profound understanding of resilience is required so that relevant strategies can be applied in an adequate manner and face issues with better knowledge and more confidence. Risk management is a step for building resilience, as it helps to grasp how an organization's goals can be hindered by unexpected factors (Pessina, 2021, p. 32). How resilience is to be approached and how important it is for a visitor economy will be dealt with in the following chapters.

4.2 Resilience in complex systems

Resilience is the antipodal point of vulnerability, and it is what helps organizations face unpredictable impending occurrences (Berkes, 2007). As a theory, it combines elements from different social-ecological systems, including society, economics, and the environment in order to facilitate a holistic and sustainable approach. The concept of resilience sees systems as complex iterative processes, the characteristics of which vary according to different circumstances. The repetitiveness of a system's function is what helps it build its so-called adaptive capacity, i.e., the ability to recognize its vulnerability to certain stress or shock factors and apply resistance when triggered (Cochrane, 2010). This is a similarity to design, where trying out solutions and prototyping until an optimal solution is found is the core idea (s. Figure 4).

Resilience is often seen in conjunction with a system's performance against external threats. A system is a group of unified complex parts that are interlinked and in constant interaction (Cochrane, 2010). In this paper, the focus lies on social-ecological systems. Such systems are complex structures, with emphasis on the fact that the interaction of humans and nature is natural and omnipresent. Thus, dealing with social-ecological systems as separate concepts, i.e., social systems and ecological systems is seen as "artificial and arbitrary" (SRC, 2022). Tourism is a social-ecological system as well, as human-made structures constantly come to contact with and are partly based on natural resources (Fountain & Cradock-Henry, 2020). One can note the application of systems thinking within the majority of literature related to resilience. Indeed, in order for an entity to develop resilience, systems thinking needs to be cultivated as a mentality and as an overall approach to tackling disturbances. Systems thinking is what can then lead to resilience thinking being established within an organization (Pisano, 2012; Simonsen et al., 2015; Wright et al., 2012).

With the influence of issues like globalization, climate change, population growth and food scarcity growing, such structures and their interaction with their natural surroundings are increasingly being challenged. Tourism, like every other economic activity, is based on patterns that encourage and enable uncontrollable growth. This results in the growing perception that potential risks are closer to becoming reality. Resilience is one of the main characteristics that has to be nurtured in societies, so dangers can be mitigated in a collaborative manner between populations, the environment and governance authorities (Cheer & Lew, 2018).

One can assume that uncontrollable growth patterns were halted by the COVID-19 pandemic outbreak. At least in line with the argument by Fath et al. (2015) that a system which can grasp resilience is not one that can return to its pre-crisis status, but one that can adapt to and deal with each stage of the adaptive cycle of resilience. The authors extensively elaborate on the adaptive cycle, similar to Cheer and Lew (2018) and Cochrane (2010).

In social-ecological systems, resilience has four characteristics, these being latitude, resistance, precariousness and panarchy. Latitude illustrates how often a system can undergo changes before its adaptive capacity gets depleted. Resistance builds up on latitude and showcases the grade of difficulty with which change can take place in a system. Precariousness demonstrates how close a system is to reaching its limits or even collapsing. Finally, panarchy illustrates the interdependency of global value chains, in that a system's resilience relies on effects of disruptive events in other systems (Walker et al., 2004).

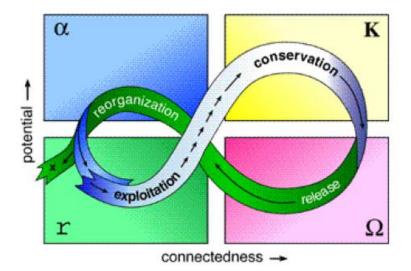


Figure 8: The adaptive cycle of resilience. (Cochrane, 2010)

The volatility of social-economic systems, including tourism, becomes evident through these characteristics, as the boundaries between a system's limits and its recovery are always very thin. This is why resilience frameworks can be applied in order to understand how such a volatile system, together with all its subsystems, can build adaptive capacity (Cochrane, 2010; Fath et al., 2015).

With uncertainty around potential risks getting higher, resilience should be seen as the natural progression from uncertainty. This is the case especially in tourism, where worldwide connectivity is dependent on social, political, and financial norms. Indeed, a visitor economy is directly affected by change in a community, and its degree of resilience can demonstrate how well the

community can adjust (Cheer & Lew, 2018). Generally, to be resilient, an understanding of the complexity of human systems is needed. This understanding is what helps these systems return to a stable state and reestablish balance that has been disrupted (Cochrane, 2010).

The degree of resilience can be grasped with the help of the adaptive cycle of resilience, illustrated on Figure 8. According to Cochrane (2010), Cheer and Lew (2018) and Fath et al. (2015), organizations undergo different stages when trying to adjust and stabilize after a period of unrest: The resilience cycle defines those stages as release (Ω), reorganization (α), exploitation (r) and conservation (K). The stage of release sees the system affected by external disturbances and its basic functions being questioned. Reorganization is the quick adaptation of a system and the introduction of new approaches as a response to instability. Exploitation is the next logical phase of adaptation, with reorganization of existing systems, emerging of new ones, and new social, political, and cultural norms. The stage of conservation sees lessons learned and renewal slowly being established and contributing to the creation of a rejuvenated, more stable, and more flexible system that leads to its reorganization.

The adaptive cycle of resilience, like design thinking, is clearly an iterative process that entails constant reassessing and testing of new ideas and processes. The immense complexity of social-ecological systems is a factor that must be taken into serious consideration when attempting to reorganize them to their core. This naturally includes listening to and involving the system's stakeholders, who are the ones that keep a visitor economy afloat. Empathizing and understand-ing the degree to which a disturbing event has influenced not only stakeholders' day-to-day operations, but also their long-term outlook, will lead to a holistic solution when trying to adapt to emerging sociopolitical realities. This realization helps to understand that resilience, together with innovation, needs to be part of a holistic visitor economy management. The feasibility of that assumption will be explored in the following section.

4.3 Resilience as a management tool

Crises, disasters and trends are unavoidable occurrences which only validate the idea that a visitor economy is an inherently vulnerable system (Berkes, 2007; Faulkner, 2001; Prideaux et al., 2003). This is why enabling the participation of a destination's stakeholders in contingency planning poses one of the few viable solutions that facilitate their understanding of external impact and thus of possible mitigation strategies (Matteucci et al., 2022; World Bank, 2020). So, even if events with detrimental consequences cannot be forecasted or stalled, as was the

case with, e.g., the Bali bombings or the COVID-19 outbreak, experience has shown that stakeholders can be adequately involved, educated and prepared to keep negative impact to a minimum (Gurtner, 2007; Medel et al., 2020), i.e., to build and maintain the system's adaptive capacity.

Social-ecological systems are constantly susceptible to external influences, which is why using previous incidents can help build their resilience. A tourism system is an interaction between leadership, stakeholder cooperation, as well as being aware of external market forces, which need to be used to the fullest in order for the system to remain intact. The optimal state of this interaction is sustainability, while creating and maintaining adaptive capacity is at the core of sustainable development (Cochrane, 2010; World Bank, 2020). Especially since the latest pandemic outbreak, enabling agility and creativity is an inseparable component that allows organizations to be prepared for long-term survival (Pessina, 2021; Wooten & James, 2008).

Resilience depends on an organization's size and length of operation, overall condition of the area they operate in, general human development in that area, as well as motivation of staff and visitors (Biggs, 2011). Leadership is thus crucial in overcoming crises (Pechlaner et al., 2019). However, leadership-related research in the context of resilience remains scarce (Bekdash, 2019). Enabling communication, creativity and risk assessment is one of the most important factors that is needed to facilitate adequate collaborative structures and ensure a destination's resilience (Pechlaner et al., 2019; Ritchie, 2004; Wooten & James, 2008). A good leader does not only have to try and build resilience for an upcoming challenge, but also try and understand the organization in which they work, its surroundings and what the most crucial influences are (James & Wooten, 2005).

Leadership characteristics can also be assumed by a DMO, which is tasked with creating the space and the opportunity for the destination's stakeholders to express their concerns and make suggestions on how to reach a certain level of resilience. Leadership in a destination helps enhance the feeling of collectiveness and thus make stakeholders find common ground when facing a common threat. Research has even shown that what can bring motivation to stakeholders are not hierarchies and process management, but inspiring them to contribute to the destination design (Volgger et al., 2021).

With stakeholders and service providers being prepared to contribute to building a place's resilience, visitors and residents can then adequately cope with irregularities. This ability needs to be empowered by stakeholders in a destination, who have to provide accurate and coherent information, as well as bridge the gap between tourists and the local population to ensure frictionless cooperation (Fountain & Cradock-Henry, 2020). Here, locals are to be educated and involved accordingly by the destination and/or its DMO, in order to enhance their resilience as well. This is what will make them ready to cope with instability in their own space (Fontanari & Berger-Risthaus, 2020). The large number of stakeholders involved once again highlight the complexity of visitor economy management, in terms of allocating resources and responsibilities as well as ensuring communication and healthy interactions (Jenkins et al., 2011).

Enhancing a place's resilience can happen with a variety of approaches. Resilience can have an engineering, an ecological, an evolutionary and a sociological character (Cheer & Lew, 2018; Davoudi et al., 2012; Peterson et al., 1998; SRC, 2022). All these characteristics can be seen as standalones. However, linearity and categorical thinking are somewhat counterproductive when dealing with iterative processes, like design and resilience (Langhe & Fernbach, 2019). The characteristics of resilience are briefly described and evaluated below:

Engineering resilience

A system looks to return to its initial state after a period of unrest (Peterson et al., 1998). The engineering approach can immediately be seen as problematic for the evolving and interconnected visitor economies in our globalized world, while intending to reach an identical state insinuates that all possible results of a crisis be accurately forecasted. In theory, risk management processes can be standardized, with several frameworks setting respective guidelines (Boghean, 2015), but whether standardized risk management helps predict all possible outcomes of a crisis remains questionable.

Ecological resilience

According to Peterson et al. (1998), ecological resilience is based on the idea that a system can return to a state of stability and balance, similar to engineering resilience. The difference here is that systems are seen as a self-organizing set of several structures that support and complement each other. Here, the danger lies in the idea that some structures might still be seen as necessary, albeit outdated and not of much use to the function of the system. New structures are still questioned in the ecological approach.

Sociological resilience

Sociological resilience starts focusing on the human aspect of resilience, with people's capacity to endure environmental, socioeconomic, and political challenges becoming the main issue. After all, human well-being and development is based on systems evolving and learning during and after each crisis (SRC, 2022). Here, a sense of community is created, while adaptability and coming to terms with changes is key to facilitating the resilience of system areas that are still relevant (Walker et al., 2004).

Evolutionary resilience

Evolutionary resilience is the most disruptive approach to resilience. The idea of a balanced state is questioned, while a system's willingness and necessity to change is not only part of a crisis, but also a natural progression. Here, resilience is not seen as the return to a stable state, but the ability of systems to make changes, to adapt and to learn after each stress period that challenges an ecological, social and economic status quo (Davoudi et al., 2012). Such changes, adaptations and learnings are what contribute to a system's transformation and the creation of utterly new structures to accommodate a new reality (Walker et al., 2004). Evolutionary resilience is an opportunity for a system to redefine itself and come out of a crisis with more strength and better knowledge of its surroundings. A system that has such capabilities is defined as an ecosystem by Hall (2018).

Resilience must be understood as a trait to be strived for proactively by organizations. It is not achievable during a crisis or immediately after one, but during contingency planning, i.e., organizations need to be resilient before a crisis hits. This does not only help to robustly tackle a crisis, but also to get a strategic advantage when developing businesses and tourism destinations. Being resilient is also what will ensure a destination's sustainable development (Pechlaner et al., 2019; World Bank, 2020). Furthermore, human resources are one of the most important factors to ensure the resilience of a tourism organization. This comes to contrast the fact that many firms refrain from investing in trainings that will facilitate their survival when crises arise (Biggs, 2011). After all, optimal collaboration among stakeholders can only be reached with adequate internal preparation and training.

To build resilience in a region, its stakeholders need to learn how to cope with uncertainty and be open to change, while continuous learning is of paramount importance. Resources need to be made available for stakeholders to communicate with each other, exchange ideas and interact peacefully during challenging periods (Berkes, 2007). In academia, there are several frameworks that look to enable and teach resilience to systems affected by irregularities. A good resilience framework needs to show how to identify and focus on the most important issues and how to think of and suggest measures to tackle any problem. In other words, resilience frameworks are here to adequately prepare a system to at least be able to respond to a stressor immediately after it arises (Cochrane, 2010).

The three horizons framework as presented by Sharpe et al. (2016), for instance, poses a good example of a framework that can guide stakeholders through a conversation to reach a mutually beneficial consensus. The framework is visualized with lines representing a particular process or function of an entity through a time period, called a horizon. The first horizon is seen as the way processes are being carried out currently, the third horizon is presented as a promising future state, while the second horizon represents a somewhat unsettling transition between the first and the third horizon. The framework can be used as a tool to document process changes and transitions over time, while also being used as a projection of future goals.

Resilience in tourism directly contemplates how broad changes in social norms are and how impactful such changes can be on tourism. The examples of Hajj to Mecca as well as pilgrimages to Santiago de Compostela, Spain, show how immense popularity on the one hand and change from a purely religious to leisure-based destination on the other question tourism structures and how well these can adapt to an exponential increase in visitor numbers or a complete shift of their service design (Cheer & Lew, 2018). The same should apply to COVID-19 and the impact it caused on visitor economies worldwide. How such ecosystems can recover and build their adaptive capacity in the face of tourism's most challenging crisis to date, will be touched upon in the following section.

4.4 Building resilience after COVID-19

COVID-19 caused a disruption of virtually every well-established process in destination management. The pandemic caused political, social and economic upheaval that were unseen before its outbreak (Baum & Hai, 2020). Crisis management processes were questioned, while governance structures diverging from pre-pandemic processes are now deemed necessary to secure a sustainable future for tourism (Matteucci et al., 2022). The new, current reality shows that in the post-COVID-19 era, more focus is to be put on residents' wellbeing, while inequalities that were highlighted during the pandemic need to be institutionally and structurally addressed. Furthermore, in an age of advanced globalization, the way forward after forced degrowth is crucial to facilitate sustainability, while new geopolitical dynamics have been underway since the establishment of widespread pandemic-related restrictions (Brouder et al., 2020).

Destinations now have to face environmental and technological developments, while market performance combined with resilience will constitute a destination's competitiveness, which in turn enhances the overall experience of visitors (Fyall & Garrod, 2020). Medel et al. (2020) recognized the most important constructs of resilience in the post-COVID-19 era, a ranked summary of which is found in Table 5. What is important to note is that collaboration is found to be the most important construct of a resilient destination. Indeed, both G. D. Sharma et al. (2021) and the World Bank (2020) also contend that the participation of all stakeholders in a visitor economy can increase the industry's resilience. This raises the question of how such collaboration is to be applied most effectively in a social-ecological system. The fact that several stakeholders have a strong say in destination development and that subjective views are prevalent puts pressure on businesses within a destination to try and operate to the benefit of every affected party (Pechlaner et al., 2019).

The complexity of systems like a visitor economy makes it difficult to accurately forecast and fully understand them. This is why Berkes (2007, p. 285) urges the development of new ideas to deal with unpredictable occurrences, while Vandenbroeck et al. (2016, p. 1) suggest establishing "systemic design", i.e., thorough collaboration between people pertaining to design thinking and systems thinking. Such implementations are instrumental to increasing a system's adaptive capacity (Cheer & Lew, 2018). Past events have proven that tourism is a fast-adapting industry and crisis recovery usually takes place quickly (G. D. Sharma et al., 2021).

Although COVID-19-related restrictions are not a large burden anymore, destinations have to face the current financial situation, which has caused some pessimism when it comes to recovery predictions (UNWTO, 2022c). A design-thinking approach to building resilience after COVID-19 is not an unthinkable one, as empathy and empowerment of surrounding actors can help to facilitate more robust resilience with processes that have been tested and readjusted and thus make crisis recovery even faster and smoother.

G. D. Sharma et al. (2021) created a resilience-based framework to facilitate the industry's recovery in the post-COVID-19 era; With the pandemic ushering in a major challenge for the global tourism value chain, resilience needs to be achieved through governmental support, technological advancements, creating a sense of community in different societies, as well as ensuring consumers and employees' wellbeing. Similarly, Pessina (2021, p. 36) proposes a crisis management framework that focuses on preparation, i.e., contingency planning and not shortterm mitigation. It is suggested that uncertainty be accepted as the norm and organizational planning be adapted around this mindset. This way, an organization's adaptive capacity and, in the long run, resilience can be ensured in what is becoming an increasingly unstable environment for tourism. The necessity of ensuring a destination's resilience prior to a crisis also became evident in Bali after the 2002 bombings (Gurtner, 2007).

Constructs of resilience		
1 Collaboration	11 Preparedness	
2 Velocity	12 HR Management	
3 Visibility	13 Sustainability	
4 Flexibility	14 Transparency	
5 Robustness	15 Culture	
6 Anticipation	16 Innovativeness	
7 Adaptability	17 Trust	
8 Risk Management	18 Data Analytics	
9 Recovery	19 Futureproofing	
10 Knowledge Management		

Table 5: The constructs of resilience in the post-COVID-19 era, ranked. (Medel et al., 2020)

With increasing instability, especially in the post COVID-19 era, tourism destinations require new governance structures. Destinations should not return to large-scale tourism and could instead focus on reducing demand, increasing residents' involvement, and launching "third places", i.e., spaces outside of home or work, first and second place respectively, where the social aspects of human interaction are being focused on. Involving locals can prove to be especially beneficial in creating a resilient destination (Matteucci et al., 2022, pp. 175–176). This holistic approach, where stakeholders are proactively encouraged to participate in the value creation process has been suggested by Gurtner (2007) as well.

Since the pandemic outbreak, the industry has realized that incessant growth patterns are not viable when looking at long-term developments. A visitor economy can only function properly and sustainably, if its ecological surroundings and its people are treated well and only if resilience is ensured before a crisis hits (Brouder et al., 2020).

The World Bank (2020) conceived the so-called resilience building cycle, seen in Figure 9, which seeks to guide destinations through the process of building up resilience. The cycle shows that building resilience is a clear iterative process, from ensuring preparedness, to disaster response, to recovery. The stage of recovery might be interpreted as the most significant one, as it is the one that facilitates the system's reorganization (α) stage of the adaptive cycle and thus its enrichment with innovative approaches to dealing with imbalance. With the resilience building cycle in mind, Walker et al.'s (2004) characteristics of resilience could also be measured, with a system's precariousness, for example, being dependent on its response and reorganization.

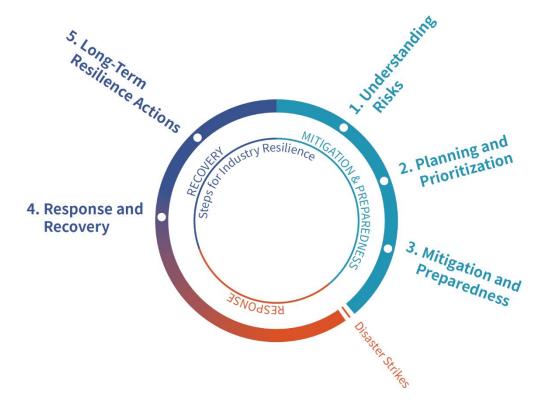


Figure 9: Tourism resilience building cycle. (World Bank, 2020)

G. D. Sharma et al. (2021) compiled a theme overview regarding the tourism industry, its COVID-19 response, and the focus areas on the way to recovery from the pandemic: Going into the new reality, focus needs to lie on sustainability, societal well-being, action against global warming, as well as caring for local communities. Within those areas, resilience in tour-ism can be ensured through adequate governmental intervention, technological advancements, a sense of belonging at the local level, as well as a sense of confidence among tourism employ-ees and visitors. The latter is particularly important, as at the height of the pandemic, both public and private policies reduced the possibilities consumers had to access their preferred hospitality

services (Baum & Hai, 2020). Risk assessment is therefore also a key step in understanding how resilient a destination is and how potential risks can influence a system (Dogru et al., 2019).

The review on resilience has shown that it is a multi-faceted concept that is not to only be associated with crisis management or mere crisis response. Resilience is a general process and capability in organizations and social-ecological systems. It must be built methodically while making sure that all involved stakeholders are aware of the factors that could lead to them needing to develop resilience. Periods of instability and uncertainty are probably too late a point in time to start considering resilience-building endeavors. Relevant strategies have to be nurtured within business-as-usual processes, and using methods applicable to the specific industry, economy and organization in order to facilitate adequate crisis response and mitigation (Dogru et al., 2019).

With the literature review coming to an end, significant knowledge on destination management, design and resilience has been acquired. This knowledge raises several questions on the progress of academia on these issues, especially the development of resilience with the help of design thinking. More thoughts and, ultimately, a research question will be shared in the coming chapter.

5 Research design

Especially in the post-pandemic era, all participants in a visitor economy have stronger, interdependent relationships, while building resilience is gaining importance in a destination. Furthermore, although visitor economy as a concept is not a subject of wide academic discourse, holistic approaches to destination management have been put in context, with resilience often being the subject of relevant discussions and design being used as a concept that facilitates holistic approaches to tourism.

DMOs' role in facilitating stakeholder interaction is undeniable, with the issue of whether such organizations have the capacity to encourage broad collaboration to achieve synergy and to enable resilience raising interest as well. Throughout the literature review, the impression was created that resilience, especially evolutionary resilience, and design are inextricably linked. Both processes look to introduce impactful change within a system that is constantly reevaluated and adjusted according to external influences and current trends. Whereas resilience is a specific competence that gets to be built up within a system and looks to prepare a system for irregularities, design is a collection of over-arching thinking patterns that allow countless innovative processes to be initiated in a system, resilience certainly being one of them. The role of design in building resilience through enabling participation and how a DMO can adapt to a potentially more effective process is to be explored in the research to follow.

5.1 Research aim and research question

The concepts of visitor economy, design and resilience have been examined in depth and the result of the review of relevant scholarly sources shows that several links can be created between these concepts. The problem is that the issues are usually treated as separate research contexts. Although design and resilience do play a role in destination management and do appear in relevant literature, they are most often found treated as standalone concepts, with relationships to each other barely being mentioned. So, since resilience and design both have important functions in a visitor economy, how can design thinking be integrated in research and policies looking to develop a destination's resilience? Its potential to help adjust mindsets and create collaborative structures is to be examined. Whether this potential can then facilitate a foundation for building adaptive capacity and thus making a destination more resilient, sums up the aim of this research project. In order to achieve the aforementioned goal, the following research question will be the base of the exploration of the issue at hand:

Is design thinking a viable tool that can be used by a DMO to develop a destination's resilience and enhance its visitor economy in the post-COVID-19 era?

The pandemic was set as a reference point, as it is a pivotal point in tourism history, while the question will be explored using data sourced through qualitative research.

5.2 Methodology

This paper's research design is based on the qualitative approach. With design thinking and visitor economy being not only relatively new, but also concepts more known within industry circles rather than among the general public, and with the research question being open for interpretation, meeting with experts on these topics and conducting in-depth interviews seemed to be the most viable solution, especially within the scope of this thesis. The first part, with chapters 1-4, is based on extensive literature review, while the second part, from chapter 6 onwards, deals with evidence collected through qualitative research. After the data collection and evaluation, an application of acquired knowledge follows in chapter 7. There, an attempt to create a design thinking framework on how to facilitate resilience and enhance a destination's visitor economy is presented.

Qualitative research was deemed to be the most suitable approach for answering the research question. This research design will follow the four general steps presented by Green et al. (2007, p. 545): "[...] constructing a theoretical framework; sampling and data collection; data analysis; and reporting the study." Although the methods of analyzing data can vary in each project, the aim of qualitative research is to deeply understand the issue (Green et al., 2007), which is also the goal in this research project.

It is important to note that, although presented in a logical order, qualitative research is a process of constant rethinking and evaluating. The steps suggested are not to be followed in a specific order. Qualitative data analysis is a laborious endeavor that needs the researcher to be flexible between the proposed steps. Analyzing qualitative data, just like design thinking, is an iterative process that requires constant reassessments and comparisons with newly acquired information, which sometimes entails going back steps and doing adjustments (Green et al., 2007; Saldaña, 2013).

5.2.1 Constructing a theoretical framework

According to Gibbs et al. (2007), an issue needs to be defined through extensive literature research in order to create thorough theoretical background, according to which empirical evidence is to be sought. Indeed, this thesis has started with a literature review on the topics visitor economy, i.e., destination management, design thinking, and risk and resilience management within complex (social-ecological) systems.

Putting the theory into a COVID-19 context can be achieved mainly through tourism-related data sources and recent news reports. There are scholarly sources examining the topic at hand through the pandemic lens, but the majority of relevant literature examined was published before the outbreak, which is why a combination with high-quality, albeit non-academic sources on the matter was deemed appropriate.

Spending a considerable amount of time with relevant theoretical concepts is important when setting the path for empirical research. Having good knowledge of the current state of research is a helpful tool when creating materials used on the field, and it also helps in reacting to unforeseen discoveries during research (Gibbs et al., 2007). The sources that helped with familiarization with the topic were searched for in online scholarly search engines, journal databases, tourism industry databases, as well as university libraries, namely the ones in 3AMK/Haaga-Helia University of Applied Sciences and FHWien der WKW University of Applied Sciences.

5.2.2 Sampling and data collection

Sampling is also a process that is under constant redesign during qualitative research (Gibbs et al., 2007). It is a choice of individuals representing the different facets of the issue being researched. There is no specific method to be followed during the choice of participants, nor is there a minimum or maximum size that samples need to have during qualitative research. The size of a sample depends on the research question, sampling and data analysis methods, as well as the extent of the theoretical basis upon which the interviews are being carried out (Berger-Grabner, 2016). Achieving saturation, i.e., the data collected is starting to repeat itself and no new knowledge is noticeable, is not the goal of qualitative research. Here, deep understanding of an issue is strived for (Gibbs et al., 2007).

The method chosen to collect the necessary data is the qualitative interview. After all, "[m]ost of qualitative research involves forming questions and asking them." (Willis, 2007, p. 244).

Interviews are one of the most common and powerful tools in qualitative research. They are open, confidential discussions that provide in-depth knowledge, as they traditionally take place with smaller samples and allow for more time with experts (Berger-Grabner, 2016). Interviews can have little to no structure, but also be highly structured or open (Berger-Grabner, 2016; Willis, 2007).

According to Berger-Grabner (2016), problem-centered interviews are the more structured interview variant, as interview guides are commonly used. Here, research is focused on a specific question, which has ideally already been underpinned by literature research. The goal of such interviews is to grasp subjective views on the topic, which can be corroborated with and/or complemented by theoretical insights. The degree of structure given to an interview is subject to several factors like the type of data aimed at, the budget, and the number of people participating, both as interviewers and as interviewees (Willis, 2007).

To achieve the aim of this thesis, the sample chosen had to be relevant to the objective. Participants were to fulfil some, ideally most of the criteria listed in Table 6. It should be noted that this table posed an initial brainstorming that helped with finding the right contacts. The goal was to have a sample where experience with design and experience with destination management was equally distributed, so insights from both points of view can be collected.

Ideal characteristics/background of interview partners	
Tourism professional (DMO, aviation, hotel, F&B)	
Experience in destination management	
Experience in tourism consultancy	
Experience with design, service design, design for social impact	
Experience in innovation management	
Professional experience before/during/after a crisis	

Table 6: Ideal traits of interviewees for this research project. (own illustration)

In order to achieve the objective, six individuals and six organizations from different backgrounds were contacted between April 3 and May 15, 2023, to arrange interviews. A total of seven people agreed to take part. The talks all took place online between April 17 and May 23, 2023, in English and German. One interview lasted 42 minutes, the rest between 50 and 60 minutes. The talks were confidential, with interviewees being reassured that their personal information and professional affiliations would not be made available. However, the interviewees agreed on their respective capacity being made available to serve the purpose of the research. In this thesis, the designator IP will be used for the interviewees, followed by a randomly assigned number. Their individual traits can be found in Table 7.

IP	Characteristics
1	Academic and consultant with experience in sustainable destination management working on resilience
2	Academic on hospitality service design, background in industrial design, imagineering
3	DMO market manager
4	Academic on service design, specialist in destination branding, service brand manage- ment, and innovation
5	DMO marketing analyst working on strategic destination development
6	Strategic designer with experience in DMO consulting, transdisciplinary approaches working on resilience
7	Strategic designer working in global health and development

Table 7: Actual interviewee characteristics. (own illustration)

Not many destination management professionals or organizations responded or agreed to interview invites, which is why people dedicated to a DMO are underrepresented in the sample. Unexpectedly, several academics with hands-on experience took part, which was seen as an adequate characteristic not considered when compiling the ideal traits seen in Table 6. The total number of interviews is less than what was strived for, but the knowledge gained provided a more than satisfactory base for the upcoming discussion and framework development. Saturation is not the goal of qualitative research after all (Gibbs et al., 2007), so the number of participants is not seen as an impediment.

The method chosen to conduct the interviews is the problem-centered interview method as defined by Berger-Grabner (2016); A fairly unstructured interview guide facilitated discussions leading to insights relevant to the theoretical background. This, of course, does not mean that the talks did not have to change course when interviewees raised topics that added value to the research. The interview guide created a fictional problem scenario that the participants were tasked with solving. Following the futures wheel method as defined by Bengston (2016) and Glenn (2009), the scenario was developed to provoke thoughts on current risks, trends and their potential impact, as well as to be a guide to brainstorming a solution and the process thereto, and to see where interviewees identified system interdependencies and action fields. What also acted as a constant reminder during the interviews, was the possibility of making people from other disciplines momentarily think like designers and whether viable results can be conceived in the limited amount of time that it takes to carry out an interview (Ericson et al., 2016). The scenario, seen in Appendix A, covered common problems that several destinations faced before COVID-19 with the pandemic acting as a catalyst for openly debating them. It was purposefully created as an extreme case, while three relatively generic questions were asked at the end. During the interviews, a guide was shared with interviewees. This guide can be found in Appendix A.

The case was not shared beforehand, only the topic, research question, and general interview idea were communicated. In the spirit of observing interviewees' general mindset and approach to the issue, no specifications were made after sharing the scenario and the questions. Only if they asked were they reassured that there were no right or wrong answers and that they could take the discussion in the direction they saw fit, even ignoring the questions if they wished to. The same went for terminology, with no explanations or definitions being shared, if the interviewee didn't ask. After all, the aim of the talks was to leave room for interpretation and ask follow-up questions that either sought to clarify proposed measures or help the interviewee with their brainstorming.

Indeed, the approaches to the problem were very diverse and gave insights on different mentalities used to tackle the issue. For instance, some interviewees immediately started sharing their general thoughts and theories, while others used the questions as their detailed guide throughout the interview. Most of the responses related to real-life professional experiences and expertise, making the scenario more of a prompt than a specific case to work on. More details on the approaches and the results are shared in the discussion in chapter 6.

What is worth mentioning regarding the data collection is that the futures wheel mentality on first-, second- and third-order consequences (Bengston, 2016) was instrumental to conducting the discussions. After each interview, new knowledge was acquired, which was then used as a base for follow-up questions on upcoming interviews to grasp the understanding of people with different mentalities for potential consequences, results, or processes. The process provided by the Systemic Design Toolkit (2023) was also helpful in guiding the discussions.

5.2.3 Data analysis

Analysis of qualitative data entails thorough understanding of the data and, according to Green et al. (2007, p. 546), follows "four key steps: immersion in the data, coding, creating categories, and the identification of themes." According to the authors, the latter three steps are often used

to define the same thing, which many researchers struggle to verbalize, but there are notable differences in each process. The data analysis is another iterative cycle within the whole qualitative analysis process (Saldaña, 2013).

Immersion is the idea that researchers spend long periods of time with their interviewees and the data collected after the interviews, be it while transcribing, reading, understanding, or clarifying underlying issues. Upon transcription, coding is the next logical step. It entails labelling statements that prove useful to the research. These codes can then be linked to form categories, upon which underlying themes can be more easily recognized. Ideally, those themes can then be linked with theoretical background knowledge achieved during the literature review (Green et al., 2007).

The process visualized by Green et al. (2007), clearly follows an inductive reasoning approach, which means that a theory is built upon collecting the data. Deductive reasoning and creating categories in advance in qualitative studies is also possible. However, this can be unfavorable for a research project, as statements by interviewees might not be easy to code and categorize (Kuckartz, 2018). Also, the risks of generally thinking in categories and unfairly favoring certain aspects or categories over others pose a legitimate concern (Langhe & Fernbach, 2019). More specifically, Willis (2007, pp. 211–216) calls for "holistic" qualitative research, while thinking outside of mere inductive and deductive reasoning is recommended.

For this thesis, the principles of inductive reasoning were employed, albeit with the constant reminder of Langhe and Fernbach (2019) and Willis's (2007) positions towards categorical thinking and a holistic approach. Upon transcription, which followed Dresing and Pehl's (2015) guidelines on simple transcriptions, the texts were refined so that only parts relevant to the research could be used for data generation, thus leaving out small-talk, general information on data processing as well as opening and closing remarks.

Coding was processed in two cycles, as defined by Saldaña (2013). The first cycle used the author's Initial Coding method, which poses a simple immersion into the data on a line-by-line basis to identify and highlight main statements and ideas. After the initial codes a second cycle of coding dealt with developing "a sense of categorical, thematical, conceptual, and/or theoret-ical organization" from the initial line-by-line codes (Saldaña, 2013, p. 207). During that second cycle, Saldaña's Focused Coding method was used, according to which the initial codes can not

only be summarized into broader concepts, but also compared to codes on other data material to match and harmonize, if possible.

After coding, categories and subcategories were assigned. The first interview's codes were categorized first. These categories were used as a basis to create the second interview's categories, and the categories for the second interview were used to compare with and refine the first's categories. This iterative process was applied to assign categories to every code, until a homogenous category and subcategory overview for all interviews was created. This overview can be found in Appendix B. Building categories during this limited-scope research project was deemed appropriate, although the mentioned constraints regarding categorical thinking were prominent throughout the process. The principle followed was that the category assigned would be the one most suitable to the respective code. To make the categorization as inclusive as possible, it was decided to use subcategories interchangeably, and not strictly with their assigned main categories. This is the reason why the Appendix B overview is not numbered, but only thematically structured.

5.2.4 Reporting the study

This step of qualitative research refers to a full account of the research results (Gibbs et al., 2007). Indeed, upon completion of the data analysis, a presentation of the results and a discussion were written in chapter 6. The goal was not only to clearly state the outcomes and evaluate them, but also to generate a discussion that compared the empirical knowledge with the literature review. It was decided to proceed with the two simultaneously, so that every presented result is immediately followed by a discussion point. This makes for more dynamic and interesting text, clear structure, and helps to avoid repetitions.

The goal of the final report is to realize whether design thinking approaches can be implemented by a DMO to enhance a tourist destination's resilience, ultimately attempting to answer the research question. This final report, i.e., discussion of the results, is the penultimate stage of the thesis, providing a thorough understanding of the issue at hand and leading to the creation of a design thinking resilience framework in chapter 7. Although presented in this order, discussion and framework creation took place simultaneously. Conclusion and limitations follow as the final chapter of this paper.

6 Research results and discussion

This chapter will provide a detailed account of the research results and create a discussion on the topics raised during the interviews, comparing those insights to the ones gained during the literature review. As already mentioned, seven people from different backgrounds in design, destination management and academia agreed to take part in interviews, during which a scenario with a problem on destination management was shared. The discussions took place on the premise that anonymity would be guaranteed. Therefore, every mention of interview partners will be made using the abbreviation IP followed by their assigned numbers: IP1, IP2, IP3, IP4, IP5, IP6 and IP7. Citations will include the transcript line number after the IP indicator.

The scenario and its questions, the details of which can be read upon in Appendix A, were communicated without further comments at the start of each interview. Terminology definitions were given when asked for. Also, if interviewees inquired on how to approach the issue after listening to the scenario and questions, they were told that there were no correct or false responses, nor were they expected to answer the given questions in detail, if they felt they had to take the response in another direction.

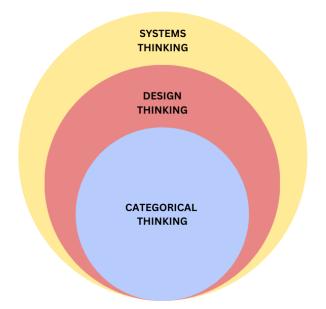


Figure 10: The different mentalities observed during research. (own illustration)

The goal of the research was to observe the participants' mentalities in order to be able to create a framework that integrates different approaches to resilience within destination management. Therefore, these ways of thinking, visualized in Figure 10, also pose the underlying themes of the empirical findings: "Categorical thinking", used by Langhe and Fernbach (2019) and adopted to serve the purpose of this research, indicates how certain conscious or unconscious biases can hinder one's ability to innovate or integrate more points of view in an important decision. Design thinking is seen as the human-centric and creative approach to solving problems that was extensively discussed in chapter 3, while systems thinking is interpreted as the overlying perspective which can facilitate the inclusion of every human and non-human aspect of the city in attempting to make the place more resilient.

All interviews which took place started with the problem scenario on destination management. The scenario presented a relatively exaggerated case of a European metropolis suffering during the aftermath of COVID-19. Overtourism, a disoriented DMO, difficulties in infrastructure and resident irritation were put at the core of the problems that the pandemic brought to light. The imaginary city was based on the real-life example of Rome, Italy. The city that inspired the scenario was purposefully not shared to avoid any biases during the discussions. Several news reports recount some of the issues raised in the scenario (Carlo, 2021; Kaniadakis, 2020), while Rome is part of the 100 resilient cities initiative (100 Resilient Cities, 2022), providing a good example to base this problem on.

This chapter is organized, starting with an overall description of the perspectives adopted by each interviewee when discussing the issue. Subchapters follow thematic touchpoints of the interviews, with interviewee statements being cited accordingly and compared with already reviewed academic material.

6.1 Scenario reactions and individual perspectives

At the end of the scenario, three questions were asked, and the interviewees were then requested to start with their input. These questions resonated differently with the interviewees. However, everybody used them as a guideline during the interviews, albeit with one person calling them "fundamentally not answerable" (IP1, 1. 104) and another identifying them as "old-design style" (IP2, 1. 75). IP6 (1. 55-126) immediately went on to base their answer on a real-life project, while the other interviewees used the questions as their strict guide during the talks. Also, in general, the scenario acted more as a prompt and thought-provoking input than a specific case to work on. It gave the interviewees a general foundation upon which they based their responses. So, IP1 (1. 113-114), IP2 (1. 100) and IP3 (1. 177) were the only people to make substantial references to COVID-19, but only as a catalyst for changing a status that had been underway before the pandemic outbreak on the one hand, and as an initiator of more sustainable

practices on the other. All other interviewees made no direct mention of the pandemic or its impact on the worldwide tourism industry. However, Medel et al.'s (2020) post-pandemic resilience constructs came up often, with participatory planning, knowledge management and sustainability being touched upon by all people who were interviewed. IP3, IP4, IP6 and IP7 put special focus on these constructs. As the questions required recommendations to be given to a DMO, the input came from different mindsets. Several different perspectives were employed, with similarities among the interviewees, but different people also put a different perspective at the center of their responses.

IP1 suggested that a mentality shift is needed when discussing the problems put forward in the scenario. They viewed current discussions as being too focused on the problems themselves, rather than the way such issues are approached. Their recommendation was to change the order that the questions at the end of the scenario were asked, in order to initiate better understanding of a destination and its product before talking about which stakeholders to involve in its development. They characteristically mentioned that "we shouldn't be thinking about the problem, we should be thinking about how we're thinking about the problem" (IP1, 1. 492-493). The statement is not to be taken lightly; Problems are already prominent and known facts, so more focus needs to be put on the way to create their solutions and who to include in these endeavors, as there can be more than one approaches to the same problem (Pamfilie & Croitoru, 2018).

Contrary to IP1's approach, IP3 seemed to predominantly think about the problem in the way IP1 advised not to. Many viable solutions were conceived, all made from a lens of thinking in categorical structures. The person identified the DMO as an entity which needs to play an active role in preserving a visitor economy, but also recognized that DMOs are often dependent on who funds them and usually try to maintain an illusion of controlling their destination (IP3, 1. 244-251; 281-292). The latter also poses a concern for IP2 (l. 136-141) and IP6 (300-315). IP3 made use of branding as a strategy to reshape an area's visitor economy as well, with IP4 and IP7 putting the largest part of their focus on this aspect of destination management.

IP4 and IP7 are designers who approached the issue mainly from a design thinking perspective, pointing to many integrative approaches, one of them being strong and consistent branding (IP4, 1. 137; IP7, 1. 211-213). Both participants asked for clarifications on certain keywords and concepts used while explaining the scenario. IP4 used their perspective and experience in past projects to talk about how a strong brand contributes to a successful destination. IP7, not having a background in tourism, asked for the most definitions during the interview. They clarified that

they were to contribute to the project by suggesting a set of processes and general ways to think about the problem (IP7, 1. 70-75), showing similarities to IP1's thought process.

As one of the two interviewees pertaining to a DMO, IP5 made a DMO's structure and purpose within a visitor economy central to their response (IP5, 1. 68). The person came back to the subject often, noting that DMOs can have different jurisdictions and motives, depending on their position within a place's political framework and the entity that funds them, among others (IP5, 1. 67-78).

IP2 (1. 82) and IP6 (1. 100) were the interviewees who identified systems thinking as the more suitable perspective for approaching the issue at hand. Viewing destinations as the complex systems that they are, IP2 (1. 73-82) approached systems thinking using imagineering, while IP6 (1. 99-106) used systems thinking to elucidate how this perspective helps with finding solutions to a problem that has several layers in a similarly multi-faceted system. It should be noted here, that IP6 has extensive experience consulting DMOs and working on resilience, while IP2 (1. 70-71), although an academic within tourism, said that they do not see themselves as an expert in destination management.

As systems thinking was presented as the more inclusive approach and examines a system as a whole and the relationships between its parts, it was decided to build the resilience framework from that perspective, so design and categorical thinking could also be included. The discussion to follow will focus on the role of the DMO based on the interviewees' feedback, as well as the different mentalities which can be applied on the way to enhancing a destination's resilience.

6.2 The DMO

The stand of a DMO in a visitor economy and its role in facilitating a destination's functionality using design thinking as a participatory tool were central to the scenario and the empirical research. The research brought to light more layers to the functionality of a DMO, not just as a facilitator of stakeholder involvement and participatory planning, but also as an entity which has the possibility of acting as a bridge between the public and the private sector, as well as a community manager not only within its destination, but also in the markets that it wishes to attract.

The interviewees identified DMOs as entities with various working patterns and responsibilities, which were often related to a DMO's structure and purpose within a destination. IP5, in particular, based the majority of their responses on the fact that the way a DMO is funded and run is catalyzing to its day-to-day functionality, tasks, interests and jurisdiction (IP5, l. 67-78; 175-188; 317-328; 452-455). The same applies to IP4 (73-76), whose first follow-up question related to the DMO's ownership, with the organization's role being central to its effectiveness, especially when looking to facilitate stakeholder interaction (IP4, l. 111-119). IP3 (l. 266-268) also referred to tourist boards' purpose being based on who funds them, while IP1 (l. 510-513) stressed the fact that there are significant differences between DMOs throughout the world, with their overall structure and funding determining how they are run. The necessity of DMOs did not seem to be questioned by any person who was interviewed, thus validating Rivera et al.'s (2021) affirmation that DMOs are gaining importance in a place in the post-COVID-19 era.

On product development and adjustment to avoid being too dependent on visitors, the majority of the interviewees did not make specific recommendations. IP1 (l. 136-138; 355-373; 526-534) suggested carrying out product-destination fits, in order to be able to identify the factors that can contribute to the satisfaction of both locals and visitors. Determining a good market fit and developing a product based on that market can not only help to control crowd flows, but also to attract people who can have the desired effect on the destination. IP2 (l. 106-118) also disagreed with getting the DMO to specify alterations. Instead, they said that the DMO's role in product adjustments should be to incite change by inspiring stakeholder groups to do so, as the destination's stakeholders are the ones who are to enjoy the product first. IP5 (l. 136-146), coming from a DMO, talked about how product performance needs to be examined and adapted based on crowd flows, even switching to offering experiences as an alternative. Here, direct parallels can be drawn to the transition from physical products to transforming experiences as presented by Pine and Gilmore (2013) and Vargo and Lusch (2004).

The service-dominant logic was also noted on IP7's responses. They also mentioned experiences throughout the discussion and associated them with a strong brand, as did IP3 (l. 154-162), who saw creating experiences as a branding tool to tackle seasonal overcrowding. IP4 (l. 119-137) directly associated product adjustments with a good brand as well. Interviewees' input on branding is discussed extensively later in this chapter. IP6 (l. 77-87) also mentioned using less frequented seasons to market a destination. Also, it was suggested to enhance value by applying engineering solutions like pricing tools, infrastructure development for even crowd distribution, and limiting site capacity to make experiences bearable for locals and visitors. The importance of DMOs' learning how to coordinate and feel for the communities they serve was stressed by IP1 (l. 163-171). This is necessary for DMOs to be able to identify the sources of their problems and to contribute to enhancing the place's resilience to future stressors. The interviewee sees the organization as responsible for monitoring and understanding a place's carrying capacity to create the optimal environment for visitors from different markets and residents to coexist. However, they identify monetary values as the ones that offerings are mistakenly based on, mentioning the example of Vienna and the issues caused by adjusting products to markets with higher per-capita spending patterns (IP1, l. 124-150). Similarly, IP2 (l. 124-141) sees monitoring of the developments as an important DMO task and names Amsterdam as an example of how non-functioning monitoring systems can lead to the issues central to overtourism, namely overcrowded cities, unruly visitors, and irritated residents.

6.2.1 Branding

During the discussions, branding seemed to play an important role in almost all interviewees' mindset when examining the DMO's role in enhancing a destination's resilience. For this reason, it was decided to assign the topic to the codes as a standalone category, rather than have it be reduced to a subcategory. A strong brand was identified as a prerequisite to designing resilient destinations, as it creates a sense of belonging, first and foremost among the city's own population. IP2 (1. 86-98; 233-240) mentioned Antwerp as an example of developing such a common identity, which then helps to initiate outwards popularity. As already discussed, DMO structures are often instrumental for the effectiveness of its endeavors. Branding is no exception; Being dependent on public funds and political decisions, DMOs are subject to arrangements and outside influences that often have a negative effect on their branding strategies. (Pike, 2005).

IP3 (l. 146-162; 214-219; 324-225) also focused on a strong brand during the discussion, recommending that aspects of a destination that have "iconic value" be included in messaging campaigns, with experiences being built upon such icons, which then help develop a common identity. A place's artistic community is also seen as an important factor within a visitor economy, especially combined with the growth of social media. A DMO could promote artists who have a large following, using the place as a backdrop. Where many DMOs seem to disconnect from a common identity, is when they try to take ownership of the brand, creating lengthy and costly single-message campaigns, only to realize that the city's own people associate it with the simplest things. This realization bears significance, especially since IP3 is part of a DMO. IP6 (1. 340-350) verbalizes the issue in a very similar manner:

"[...] massive amounts of budget go into creating those big brands to go into tourism trade shows. Tourists aren't at the trade shows, tour operators are. Right? So, it's very insular, they talk to each other. But the actual traveler? Like, I don't go to India because it's called 'Incredible India'. I go to India because I watched Slumdog Millionaire and I wanna go visit a rowdy slum. Or because I love Indian food, or yoga, or it's my dream to go on a motorbike route because I saw someone do that on a travel show who [*sic*] I watched, you know? Or there's an influencer. And I saw them post. So, I think it's completely, like, disassociated. From, like, people who travel."

IP6 uses this as an example to illustrate how travelers' real motives often remain unrecognized within messaging campaigns and industry circles. This fact goes back to DMOs having to empathize with their communities in order to create a socially sustainable product (IP1, 1. 163-171). Both IP3 (1. 357-389) and IP6 (1. 351-366) identify a disassociation between what industry experts want and what their actual visitors and locals actually desire. They both give examples of long-standing consumer brands which have been able to captivate their audiences because they listened to those audiences. Long-term PR work is deemed important to create a sustainable brand, while the complexity of a destination should not be reduced to single-messaging, trademarking, or advertising agency ad-hoc creativity. DMOs should be delving into the history of a place and its people and using them to adapt the brand to something that the locals can identify with, so that the visitors have a fulfilling experience. Buhalis and Park (2021) share the interviewees' opinions, as they also see the people and traditions of a destination being instrumental on how a brand is regarded.

Looking a little more into the power of a brand to bring about value without overcrowding, IP4 (l. 137-168) said that a cleverly developed brand is one which can be sold across destination borders and help develop products that can be used without visiting a destination. IP7 (l. 179-182; 211-217) expressed the same view, naming Finnish design and Finnish awkwardness as examples of constructs that only have a specific aesthetic but provide many possibilities when it comes to increasing awareness for a specific place. What is also important when developing a brand in a destination, is making sure that the people who are involved in upkeeping it, from SME owners to public servants, are aware of the brand and can understand its relevance for their daily life and work (IP4, l. 294-299).

In a comparable manner, IP5 (l. 107-115) contends that a destination needs to make sure that there is coherence between communication, marketing, and demand. Otherwise, the aforementioned disconnect happens again, with the destination losing relevance among its market fit. Hence, a DMO needs to ask itself how a destination can become relevant for its stakeholders, and how it can create value and use through tourism to make its stakeholders and its partners more successful. This also includes working with city authorities to make sure that certain infrastructural requirements are met, from street cleaning and safety, to accessibility and green spaces (Karayilan & Cetin, 2016).

The interviewees' statements on branding and how the destination's stakeholders need to be heard, serve as a reminder of the prominence of co-creation in service design, especially in tourism, and the fact that it still is an aspect of branding which a lot of markets still struggle with while recovering from the pandemic's effects (Buhalis & Park, 2021). With the destination's stakeholders being at the center of many processes facilitated by the DMO, it is necessary to make sure that adequate participatory planning structures are in place (Adeyinka-Ojo et al., 2014). The following section focuses on participation and stakeholder involvement, also a major aspect of the scenario that was communicated to the participants.

6.2.2 Participatory planning

Participation and collaboration of a city's stakeholders is important for a tourist destination to thrive (Buhalis & Park, 2021; Karayilan & Cetin, 2016; A. Sharma et al., 2021). As opposed to branding, which emerged organically during the talks as a main DMO competence to increase resilience, the topic of collaboration was intentionally explored during the interviews, as the prospect of design being used as a collaborative tool is not only an intriguing subject by itself, but also one of the main exploration points of this thesis. A strong brand and stakeholder involvement were often recognized as complementary values during the interviews.

A question was asked regarding stakeholder involvement. It can be interpreted as asking participants to name specific stakeholder groups to be involved in reshaping the city's visitor economy. Most of the interviewees talked more about the process of defining who to involve, though, rather than making extensive stakeholder lists. On the one hand, IP3 (l. 79-116), being the person identified to be using categorical thinking more than the rest, is the main exception. They named a place's arts and culture communities as an important actor with a non-tourist perspective who can give critical feedback on the stand of the city's industry. Accommodation, transport providers and other infrastructure operators like airport authorities were mentioned as well. IP4 (l. 66-72; 88-96) also made minor categorical references, naming all businesses with direct and indirect economic benefit from tourism, as well as city administration, resident representation, raw material providers and wholesalers as stakeholders to be involved in a visitor economy. Interestingly, they also mentioned the gravity of the artistic and cultural sectors.

On the other hand, IP2 (l. 97-98; 111-112; 210-216) insinuated that every person who lives, works, and visits a city is to be considered a stakeholder, while they warned that there might be stakeholders who could be involved but the DMO is unaware of. The creative industry was also mentioned as a promising stakeholder group when facilitating participation. According to IP3 (l. 106-110), the bigger a place, the more the stakeholders that have an interest in its sustainable development. To tackle not only the vagueness, but also the uncertainty of having a plenitude of stakeholders, IP7's (l. 94-108) process of determining them is a method that can be applied here. The interviewee suggested creating stakeholder maps as a common service design practice. Building them with the main issue in mind and from a specific actor's point of view, e.g., a DMO or a visitor, people with a deep understanding of the subject are to be mapped, which also helps understand the relationships of the stakeholders with each other.

While a systems thinking approach which looks to map all the complex dependencies of a system's stakeholders is common practice, it is seen as somewhat counterproductive by IP7 during the initial stages of deciding who to involve. A few moments into the interview, the participant also mentioned that in a context like described in the scenario, it is more meaningful to include entities and people who are actually affected by the issue discussed. Proactively bringing highlevel institutions and executives into the discussion can be unnecessary, as they do not feel the effects as intensely as front-line stakeholders.

Although IP7 was the only person to have elaborated on the stakeholder map, the method seems to be well established within design circles as well as participatory planning. The visitor economy ecosystem in Figure 3 is also an indicator that mapping interest groups is a common first step in determining who to involve, while IP1, IP4 and IP6 elaborated on kinds of participatory planning workshops that had the premise of knowing who to involve. Such workshops pose a tool to determine not only who can be involved, but also who wants to be involved. IP4 (l. 181-195) also mentioned the fact that no stakeholder wants to view participatory planning workshops as a waste of time, so it is important to make sure that such meetings provide value to the participants.

IP3 (l. 111-119) said that several cities managed to redefine their management by initiating continuous dialogue and setting common goals with their stakeholders. IP1 (l. 163-164; 196-223) stated that key industry stakeholders as well as locals are to be involved, while every stakeholder, from hotel associations to cultural institutions, can be considered as a valuable participant. At the initial stage of a participatory planning process, organizers "[...] actually literally don't care who shows up". However, the entities that do take part are the ones which can spread the positive results after a session, which can then increase the will to participate in follow-up meetings.

IP6 (1. 63-68) shows a similar mindset, also suggesting that stakeholders from different backgrounds be involved. However, what usually happens is that when a DMO organizes a workshop, they often invite industry trade associations or other entities that are the organization's main investors. This has the result of decision-making that only benefits the actual financial beneficiaries, thus excluding other entities from the conversation. To avoid that, the interviewee presented the idea that workshops not only need to take place regularly, but also ensure that stakeholders understand how important their voice is in facilitating a resilient ecosystem. Moreover, workshops should ideally take place outside the city hotspots, have a less restrictive character, and incorporate points of view of local communities and associations, thus contributing to decentralizing decision-making and empathizing with those who experience the largest impact of tourism (IP6, l. 134-148). This is in no way an easy undertaking, as Wang (2008) also contends. Stakeholders must be convinced that they are useful and valuable to a place's design, so that long-lasting relationships can be built with them. "[...] you have to make it personal", in order to start a constructive conversation (IP6, 1. 149-152). Stakeholders cannot be forced into participation, but they can be given many opportunities to do so, and when they participate, their value will come from a place of actual interest for the system's well-being (IP1, 1. 163-171).

Both IP1 and IP6's approaches to organizing workshops have an open-ended character. So, a discussion might take place on account of a specific catalyst, but follow-up sessions turn the meeting into a continuous interaction between stakeholders and the DMO. This idea upkeeps the iterative character of design, where compassion, idea generation and quick-win testing contribute to establishing robust long-term solutions. A comparable approach to such workshops is the set-up of knowledge management systems described by IP4 (1. 196-205) and IP7 (1. 119-135). On the one hand, IP4 visualized such a system as a collective dashboard set up by the DMO, which can be fed with every type of information related to a certain topic and can be

accessed by virtually every stakeholder who wishes to comment. IP7's approach restricts knowledge management to visitors' point of view but is also seen as a regular feedback loop, both virtual and face-to-face, where specific questions can be answered continuously, and solutions can be conceived based on those answers. Such a feedback loop was also ideated by IP1 (1. 300-309), who put it in the wider context of making sure that communication is constant and iterative to facilitate resilience.

For IP5 (I. 87-115), like many processes within a destination, the purpose and structure of a DMO are the first things to consider when trying to facilitate participation. Looking for and defining stakeholders and their potential for participation is the first step, while thinking about the geographical distance of potential visitors and how they can be included in placemaking is also important. For IP5, it is important to know who and where to involve, as although there might be willing parties, their potential within a specific goal might be limited. The interviewee argues that participation within a destination is valuable, but they also contend that there are political entities and structures that are already looking to enable stakeholder involvement. No matter how an organization chooses to approach participation, it is important to include stakeholders who are already established within the system and function as gatekeepers, as they are the ones who can initiate substantial change.

While talking about collaborative structures, IP3 (l. 209-219) mentioned that certain stakeholder groups can be involved through their respective representative organs within city governments. As many stakeholders who are not directly associated with tourism are oblivious to their contribution to a visitor economy or their popularity among visitors, it is the DMO's task to communicate their weight within the system. Also, the visitors' importance was stressed. Upon a follow-up question on whether visitors should be involved in the conversations and how, incentivizing repeat visits was IP3's suggestion. By mentioning the example of an international hotel conglomerate, the interviewee stressed the power of loyalty programs and how the accommodation industry with its satisfaction surveys plays a significant role in creating an image of the visitor structure and facilitating guests' return visits.

On a different perspective, IP2 (l. 293-309; 351-377) saw the creation of a general feeling of belonging and a spirit of trust as the way to enable cooperation of stakeholders in the destination design. The interviewee identified raising awareness, showing trust, and giving people responsibility as key factors to not only involve a city's stakeholders in its processes, but also to enhance its resilience.

What was interesting within the responses regarding stakeholder interaction, was IP3's (l. 226-237) suggestion of creating a generational forum to facilitate participation of a city's younger generation; No matter the personal convictions, the younger generation tends to act united if the purpose serves a common good. Common ambitions can be communicated within such a forum, with a DMO implementing change not only initiated by the more powerful stakeholders. The latter might make it difficult for a DMO to not cater to their every wish, but enabling opinions from stakeholders with different backgrounds also allows for integrating more perspectives into a process. More characteristics of the younger generation were not defined.

There is a consensus among all interviewees that establishing collaborative networks and building long-term relationships is key to building a resilient destination. Nguyen et al. (2021) also value collaboration among stakeholders, as common goals increase communication, making for more stable and stronger relationships within a system, which can then deal with disruptions in a more organized manner. What has to be kept in mind, according to IP7 (1. 332-337), is that participation is an inherently complicated process, as people have their own personal and professional lives and will not take the time for a cause they don't feel attached to. The topic of ownership is important, as allowing participants to actively take part in initiating something is what will also motivate them to come back and be part of an iterative discussion.

Finally, the power of social media nowadays and the opportunities they present to DMOs came up by IP1 (l. 432-459) and IP3 (l. 140-145; 166-173). IP3 presented the importance of using user-generated content produced within the city and its stakeholders, in order to create messages that are not only more authentic but come from the people who make up the destination that is being marketed. They also warned against extensive use of social media when trying to reduce overcrowding, as social media can be a multiplicator which creates hotspots that cannot be relieved of any excesses. IP1 argued that the power of social media is being underestimated by DMOs, who do not realize that the way destinations are being consumed is directly affected by their image on social media platforms, with the DMOs practically losing control of who gains awareness about the destination and how. With regards to that shift, the interviewee has never worked with a DMO who has wholeheartedly embraced the change, while they consider social media management, consistent monitoring, developing empathy and social listening skills through social media interactions basic requirements for DMOs to help increase their popularity.

6.3 Perspectives leading to resilience

This subchapter is organized using the three mentalities as titles, with the order corresponding to the Figure 10 ranking. However, there are aspects of each mindset to be found within the others, so this subchapter organization serves as an overview on the observations made, as well as to provide some clarity on the discussion content, and not as a definite differentiation between the mentalities or the contents discussed. Every interviewee had their core perspective, as already discussed, but, of course, other perspectives were also observed. Systems and design thinking were the core mentalities at almost every interview, while categorical thinking was also noted in parts.

On preparation for the interviews, design thinking was the main process that was to be used and examined, but already during the first interview did it become clear that systems and categorical thinking are also very much in place as valid mindsets, each to their specific extent. Of course, the literature review touches upon systems thinking for resilience. Categorical thinking, or the more negative aspects thereof, are also touched upon, but important insights on these mentalities were gained during the personal discussions as well.

6.3.1 Systems thinking

Systems thinking emerged as a suitable approach when looking to enhance a social-ecological system's resilience, especially after the input by IP2 (1. 82) and IP6 (1. 100). No interviewee elaborated extensively on systems thinking and its content or relationship to design, but everybody had substantial input when asked about looking at the destination as a social-ecological system. Resilience, of course, poses this paper's main subject, a fact that was not kept from the interviewees. This is also interpreted as the reason why it was an omnipresent concept during the majority of the discussions, often also in conjunction with sustainability and participatory planning.

IP1 (l. 163-171; 224-229) saw community management and participation as main aspects of resilience and repeatedly mentioned the necessity of open communication platforms to be able to grasp real-time stakeholder sentiment. Just like A. Sharma et al. (2021), IP1's input on digitalization shows how ICT has brought about endless opportunities to get in touch with interest groups. However, DMOs have only been sparely using such opportunities, missing a lot of possibilities because they simply do not recognize them, or even because of lacking resources

and know-how. The latter is indeed a common issue, with IP6 (l. 195-197) recognizing high staff turnover within DMOs as a significant factor why organizations lack agility, a trait seen as paramount to have resilience. High turnover was not mentioned by the participants who work for DMOs. Whether the issue simply did not come up organically, or whether their respective DMOs do not have that struggle cannot be evaluated based on the current data.

Community management was also presented by IP2 (1. 403-411) as an aspect that helps to make an organization agile and resistant to external stressors. They used the example of bees to show how a collective sense of community is especially needed when dealing with external influences, as this is not only when the system needs cooperation and effective communication the most, but also when it needs it the quickliest. Community management is also at the center of IP4's (l. 170-214) input on resilience. Complex systems like tourist destinations have an immense amount of information, which can be organized with the help of a well-functioning knowledge management system. With such systems, the need can be created for the usually fragmented data to be organized and analyzed to serve the destination's well-being, thus enhancing the system's learning capability and adaptive capacity. On adaptive capacity, IP6 (l. 185-188) took the chance to say that DMOs have to take the time and learn not only how their system changes, but also which relationships there are among its elements. Knowing what influences the system can make an organization more agile, which then helps with developing adaptive capacity. The same view is shared by Cochrane (2010).

IP2 and IP7 were the only participants to ask how resilience is being defined for the purpose of the thesis. The response given was based on Walker et al. (2004), with resilience being defined as a system's capacity to prepare for, learn from and adapt to external stress factors. The latter are seen as circumstances that disrupt the system's usual functions. Whether circumstantial after the definition given or not, both participants suggested scenario work as a method to enhance resilience in a destination. On the one hand, IP2 (l. 152-162) gave the example of a past project where stakeholders from different cities came together and brainstormed on an issue based on a scenario. The interviewee identified that there might be difficulties in real-life implementation when stakeholders know they are being observed as part of a scenario. However, they do note the effectiveness of such an approach in terms of preparation and of observing which different mentalities are in place within the system.

IP7's (l. 261-305) approach, on the other hand, sees strategic foresight methodology as an adequate approach to initiate the process according to the definition of resilience that they received. The method is not about predicting the future, of course, as this is a virtually impossible undertaking. What it entails, however, is stakeholders ideating on the least predictable and most impactful occurrences, upon which contingency plans can be developed. This is in line with Berkes (2007) and Cheer and Lew (2018), who see ideation as the way to understanding a system and developing its adaptive capacity. Participatory planning here needs to take into consideration the fact that collaborators have to be highly knowledgeable and experienced within the industry, so that scenarios can be as realistic as possible. With as much stakeholder input as possible, the potential for disruption can then be refined into a matrix and to at least four worstcase scenarios, upon which solutions can be brainstormed on.

IP3's (l. 174-193; 264-265) approach to resilience had a destination promote economic, social and environmental sustainability in tourism, as per the UN's sustainable development goals (United Nations, 2023). These goals are also to be followed during rebranding of destinations, as human-centric destination management and marketing includes making decisions that are to the benefit of the people who keep a visitor economy running (Bowen & Sotomayor, 2021).

Also, in line with Calgaro et al. (2014) extensive contingency planning was identified by IP3 as a way for the DMO to enhance the place's resilience. A specific measure was identified as the promotion of domestic tourism, with COVID-19 having shown that inbound tourism from abroad is never to be taken for granted. The promotion of domestic tourism can also help locals and DMOs, as well as other stakeholders redefine their perception of value. According to IP3, up to the outbreak of the pandemic, value was seen as the increasing influx of guests from abroad, with domestic tourism being either irrelevant or not an important indication of a destination's performance.

For IP5 (1. 79-82), it is important to look at the history of tourism in a city and examine the destination's dependencies to see where the focus of the discussion should lie. The scenario city had the issue of being overdependent on visitor flows. So, demand was its core dependency and discussions on how to tackle it need to be carried out with stakeholders who are the most affected by that dependency. IP5 (1. 127-135) also mentioned sustainability, saying that the very idea of tourism entails the movement of people, which makes it environmentally unsustainable by default. They recognized how tourism can be seen as a challenge to climate change and be confronted with skepticism. However, they also contended that ecological unsustainability might be the price to pay for social and economic sustainability within a visitor economy. Also,

recognizing potential risks was seen as a core competency needed on the way to resilience. Here, similarities to Yilmaz and Flouris (2017) were observed.

6.3.2 Design thinking

The design thinking methodology which was reviewed in chapter 3 was predominantly used by IP1, IP4, IP6 and IP7, all designers with experience in human-centric projects within tourism and other contexts. Design thinking is also part of the category system created during the data analysis, with its main components according to the chapter 3 findings, empathy, ideation, implementation, and iteration being part of the subcategories.

Stages		Tools	
IP1	IP6	IP4	IP7
	Empathy	Workshops	Questionnaires, interviews
Ideation	Ideation		Value proposition map
Design for context			
Design for people	Participation	Feedback dashboard	Knowledge management
Design for implementation	Implementation		
Prototype	Prototype		
Test	Test		

Table 8: Design thinking process stages and tools according to interviewees. (own illustration)

While IP1 and IP6 talked more about both the stages of design and what each stage actually entails within the scenario context, IP4 and IP7 focused more on the tools used during each stage in the process. IP1 even noted that they approach the design thinking process from a destination management perspective. All observations are summarized in Table 8. The stages presented show similarities to the ones developed by Du et al. (2012) and the Hasso Plattner Institute of Design at Stanford (2010) and are all seen as having a goal to create a prototype which can be tested in order to find the optimal solution for the stakeholders. Of course, the table is in no way a definitive illustration, nor is the interviewees' expertise being reduced to include only the table contents. Among others, the table also serves as a reminder of the fact that design can have multiple ad-hoc approaches.

Empathy was explicitly defined as the first stage of design thinking, with IP6 (l. 69-76; 367-389) having noted that understanding locals and their point of view is an important step in comprehending the impact of tourism in a destination and interpreting the opportunities which might be hidden in that impact. Applying methods of social listening while dissecting the nuances of each destination, its people and its culture were seen as needful steps in empathizing. IP7 (l. 410-414; 434-443) warned against forgetting to understand the "problem creators", i.e., visitors themselves. Although they are the most fleeting element in a destination (IP1, l. 348-349), tourism takes place because of their perspective and they do not only need to be studied, but also be made aware of their contribution to a place, be that negative or positive.

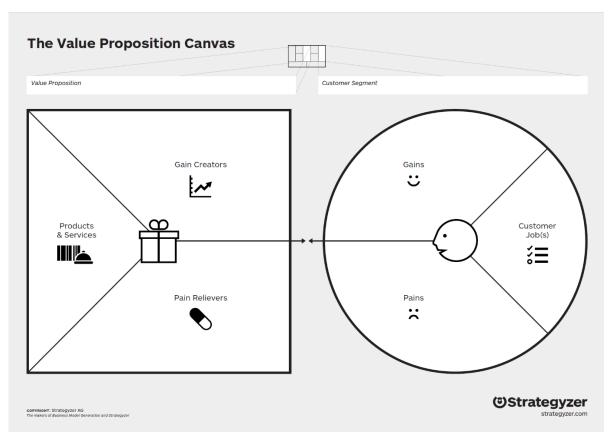


Figure 11: Value Proposition Canvas template. (Strategyzer, 2023)

IP1 (l.154-162) integrated empathy in ideation, which they saw as the first stage of a design thinking process. Here, the DMO has to start asking what it is that the destination wants and how the most impact can be initiated without harming the local population. After talking about empathy, IP6 (l. 77-96) went on to ideate as well, suggesting measures that the DMO could take not only to redistribute visitors both seasonally and geographically, but to increase the destination's openness to innovation as well as the availability and effectiveness of tourist infrastructure.

IP4 (l. 300-327) also talked about ideation in the context of stakeholder workshops. These workshops were organized in accordance with the city's long-term branding strategy. The interviewee had invited city stakeholders, both from tourism and from other backgrounds, in order to develop approaches to initiating change. What was interpreted as IP7's (l. 145-147; 156-187) process to ideate, was the application of a value proposition map, stemming from a template

called the business model canvas. This could also be seen as the start to a situational and market analysis, which IP1 (l. 104-105) suggested is necessary to be able to adequately address the scenario problem.

The process, which IP7 presented as a walk-through of a template similar to the one pictured in Figure 11, saw a destination's visitors and residents as the customer segments. Pains and gains are the things in a destination that are seen as problems and as positive developments from the point of view of each customer segment, representing the experiences that each segment has been having. These can be both present and potential aspects, while customer jobs illustrate the work which still needs to be carried out at a destination, i.e., the things that visitors can do and make use of during their stay, from transport possibilities to food and beverage offerings.

The value proposition is seen as the product mix, both current and potential. After realizing how the destination's customer segments relate to the offering and whether they are asking for change, the first step is comparing the current product mix with customer feedback, going on to introduce changes where discrepancies are noticed. Facilitating understanding of the pains and gains are touchpoints with the people involved, be that through street interviews, more organized questionnaires, or workshops. So, participation of the people involved will also contribute to developing empathy towards them.

Design for context is the next stage in destination management presented by IP1 (l. 172-185). It was explained as nothing other than making sure the ground is prepared and opportunity is provided for stakeholders to participate. Participation is not something to be forced upon stakeholders, but it is the DMO's job to make sure the environment provides enough triggers for people to partake. This view can be seen as a clash with IP5's (l. 299-316) opinion that when participation cannot be ensured, some form of escalation is necessary to create a sense of necessity for discussions to begin. Both approaches here are about creating a context for participation, nudging stakeholders in a specific direction to achieve the desired results. While IP5 sees meaning behind escalation, IP1's experience shows that forcing participation does not work.

Nudging stakeholders to partake in several city management processes is also a central aspect of IP2's (l. 318-378) approach. The examples communicated had trust as a main component, with populations being given the benefit of realizing the positive potential of their cooperation before forcing certain processes upon them via imposing fines, for example. Using small things related to a place's identity, from historical facts to childhood memories, and embracing certain anomalies to create ideas that are not only relatable, but also make people want to participate was seen as an important task. IP3 (l. 284-294) also considered nudging to be necessary sometimes, especially when it comes to preserving the DMO's relationship with political or regulating organs.

Upkeeping such a balance is also seen as important by other interviewees. IP1 (l. 468-491) said that designing for context when politics are involved is not easy, as trying to convince political entities has to start with theirs having an interest in what is being suggested in the first place, which is not always the case. What IP1 has found to be effective, is shifting the conversation to highlighting the benefits that elected officials can have from potential results. This comes back to IP1's conviction that the way in which a problem is approached and adjusting one's mindset to serve a specific purpose is of great importance.

Designing for people, i.e., facilitating participation, is the next logical step as presented in Table 8. Participatory planning and the tools which can facilitate participation have already been elaborated on. People are seen by IP1 (l. 186-205; 228-229) as the stakeholders in a destination are not only people working in tourism but also others who benefit from it or even only observe it. Making a destination a place people want to visit is of course the goal in tourism, but making sure that the place is adored by its locals is a basic requirement. Here, a disassociation is identified between the actual possibilities that DMOs have in terms of ICT resources to enable communication and theirs making very limited use of these possibilities.

Implementation is the final stage on the way to reaching a prototype. According to IP1 (l. 249-275), in destination management, approaching problems with design thinking is difficult. The involvement of political institutions often has a party be skeptical towards medium- and longterm suggestions, which automatically renders a strategy dysfunctional and acts as an inhibitor to developing resilience. This is why quick wins are used to demonstrate short-term success to political entities. Quick wins work as prototypes, "something that functions but not necessarily makes everyone happy", which can be tested on the way to full implementation. In other words, it is often about keeping the political side of a destination vested to the cause, which is why presenting quick wins will facilitate implementation, with longer-term goal gradually turning into prototypes that can be tested and keep stakeholders engaged. This iterative process can take place multiple times until the desired result is reached. After all, as IP6 (l. 227-254) argued, design is a fast-paced process which allows for short-term adjustments and tests following feedback or unpredictable circumstances. "It's design, test, iterate [...]. So, you need to test and iterate constantly and respond to feedback, so that you're agile". The interviewee also said that quick wins help develop the long-term goals, as the short-term results are the ones that can ensure financial and institutional support remain active. Figure 12 is an attempt to illustrate design for implementation based on IP1 and IP6's input. Often, the aforementioned feedback and constant iteration seem to be bypassed in favor of rather hasty developments. This is IP5's (l. 460-457) view, who mentioned that a design process needs to be one that is very well thought through. They gave examples of real estate projects which carry luxurious brands but seem to have nothing to do with their surroundings, providing little value to the living space and ignoring any attempt to be given feedback.

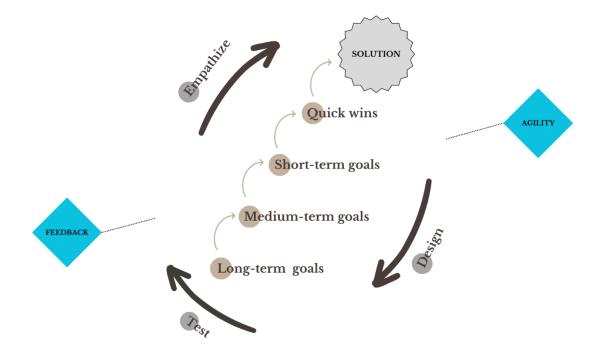


Figure 12: The iterative process of implementation. (own illustration)

The public sector and political institutions were also mentioned often by IP4 (l. 361-371) and IP5 (l. 116-126), in the context of speed and procedures during implementation. While private sector entities act faster and result-oriented, the public sector can often halt projects in favor of others and restart them after a significant period of time has elapsed. These "different conceptualizations of time", according to IP4 are something that DMOs need to consider when attempting to find a balance between the private sector and the public institutions in a destination. This balance was also valued by IP5, who gave the example of sprawling souvenir shops that

tamper with qualitative living spaces, arguing that, ideally, politics should not try to influence competitiveness, but be part of making a destination a quality living space first. While the public sector's contribution and facilitation were seen as necessary by IP6, private sector implementation was presented as indispensable, especially because of the fact that while DMOs would like to take over implementation, they lack the resources, both human and financial.

Design thinking has definitely been the dominant mentality throughout this thesis, as its potential within destination management and a visitor economy is also the basis of this research project. Categorical thinking as presented by Langhe and Fernbach (2019) was mainly seen as a hazard until the empirical research started. When they provided a trigger for the issue, interviewees were asked on categorical thinking, and the feedback provided an interesting new perspective on the mentality which, up to the start of the empirical research, was somewhat disparaged.

6.3.3 Categorical thinking

Langhe and Fernbach (2019) see categorical thinking as something leading to major misconceptions in decision-making. This was also the main idea during the interviews, which is why interviewees were always asked a question on categorical thinking, if a statement was made that raised this question. Interestingly, IP3, recognized as predominantly using this mentality, was not asked a question related to biased thoughts or overcategorizing. IP4 and IP6 also did not give any striking incentive to touch upon the subject.

With IP1 (l. 367-397), the topic was raised after their affirmation that destinations need to clearly define their market fit. They did recognize the idea of over-categorization leading to prejudiced thinking, but insisted on their idea that adapting one's mindset can help get over such thinking patterns. So, what used to be, and sometimes still is, typical and static segmentation needs to turn into thorough situational analyses based on popularity of points of interest, behavioral analysis, and visitor flows, based on grasping how people experience a destination and their time spent there. Traditional segmentation is often the cause of why DMOs are losing touch to their market fits, while it corresponds to their need to have a sense of control over who is visiting. Categories should therefore not be completely discredited, what should change is the way they are conceived, studied, and adapted.

IP2 (l. 165-216) talked about a past project when scenario work was applied during a discussion between stakeholders of different cities and where participants were observed while trying to come up with answers to pre-defined questions. For the interviewee, giving stakeholders "the freedom to experiment" is what can avoid amplifying differences between different elements in a system. And a way to do that as a DMO is to assist the progress of a process, and not of a specific result. What IP2 also mentioned was that often meetings with several stakeholders end up being debates between sectors of the industry, with participants often defending their own sectors, leaving little room for discussions and creative, integrative solutions. In this context, the importance of the artistic and cultural community of a city is highlighted, with them being keener on working on complex issues that require creativity. Interaction with this community can prove to be very useful for a visitor economy's socially sustainable development.

IP5 (1. 393-459) mentioned how the DMO in which they work provides stakeholders with a topic checklist regarding the city, on which they should share their thoughts and initiate discussion with the DMO. Based on that concept, the question on categorical thinking raised the issue of stakeholders putting their actual issues aside in favor of pre-defined problems that might not be relevant to them. The interviewee said that a DMO's pragmatic approach makes it difficult to completely neglect categories, but their use in combination with empathy and participation can be equally productive, as they help guide observations and the design of services based on such observations. A methodically more suitable but idealistic approach to the issue, according to IP5, was identified as the flow-based one. Here, a DMO is seen as getting involved and engaged into creating service chains, which then facilitates the development of connections between stakeholders to optimize their marketing and cooperations.

Finally, IP7 (1. 384-397) was asked to share their thoughts on categorical thinking, after suggesting that knowledge management and regular feedback loops be established by asking different stakeholders specific questions. The participant recognized the idea behind the question, but also contended that when specific problems are known, a set of feedback needs to be established regarding these problems, in order for the DMO to realize which aspects are the ones that influence the stay the most. Otherwise, organizations end up wasting budgets on surveys that make no sense for the destination or the problems it is currently facing. According to IP7, "if you want to identify factors and drivers", finding a balance and asking a combination of specific questions regarding the problems that are already present, as well as more open questions is the solution. Generic open-ended questions do not help much if a destination wishes to establish a regular feedback loop, since no common drivers can be identified. With the main points discussed during the interviews being presented, the next section makes closing remarks on how a system can achieve long-term resilience. This final discussion is based on interviewee feedback, of course, but the examined literature also plays a role in drawing final conclusions. This will lead up to the resilience framework presented in chapter 7.

6.4 Reaching resilience

Exactly like Matteucci et al. (2022), among others, who contend that stakeholder involvement is indeed an important step in facilitating resilience, it was noted during the interviews that participatory planning is a valued process. Whether with the city's creatives or with political institutions, productive cooperation seemed to resonate with all interviewees when it came to making a place more resilient. Here, the purpose and structure of a DMO have a central role, as each DMO comes with different powers, jurisdictions, and resources. This is why no exact approach to a DMO's role can be made, as individual organizations have different needs and permissions.

What was not prevalent in the interviewees' brainstorming, was the concept of leadership, i.e., the DMO assuming that role like James and Wooten (2005), Pechlaner et al. (2019) and Wooten and James (2008) describe. While often presented as a community manager and a facilitator who should look to inspire its stakeholders, the DMO is not seen as a leader by the industry experts who got interviewed. With stakeholders wishing to feel equal and not forced to get involved, this makes for a sensible sentiment. Even IP5's view of escalating to push participation did not fend off the idea of the DMO being a facilitator, with most interviewees communicating participatory planning similarly to Volgger et al. (2021).

For IP1 (l. 422-431), resilience is a question of mindset. The interviewee adopts the idea that evolutionary resilience should be strived for in order for a system to adapt to, learn and benefit from change, in line with the arguments made by Davoudi et al. (2012). IP2 (l. 247-276; 446-452) viewed the nurturing of a place's adaptive capacity as key to making it resilient, while they said that the way in which a system is defined from its entities is crucial for how it is perceived and managed. Most importantly, the interviewee asked "[...] where do you stop the system you are thinking about? And how does it relate to the rest of the ecology [...]? Does that mean that you're always looking for stability? Or do you also allow a certain collapse [...]?". The DMO's approach to system disruptions is what shapes its relationship with the place's stakeholders. These stakeholders can be from residents to daily commuters, people living in the

suburbs, neighboring provinces, bordering countries up to the rest of the world (IP6, l. 104-106).

Evolutionary resilience was also embraced by IP6 (l. 185-196), especially through the development of agility and adaptive capacity. The DMO must understand the interconnectedness of a system to help it evolve. Also, it has to ensure that agility be upkept after coming to terms with the fact that unpredictability, external influences, and staff shortages do not allow for other perspectives when it comes to how to run an organization.

This chapter marks the end of the discussion of the empirical evidence. With valuable insights from the interviews, as well as the vast knowledge that came with an intense literature review, an attempt was carried out to conceive a framework for enhancing destination resilience. The DMO is at the center of this framework, while design and systems thinking principles were applied to create it. More details on the framework and the process are shared in the following chapter.

7 Designing resilient destinations

The framework introduced in this chapter was created upon a detailed scholarly literature review on destination management, design thinking, as well as risk and resilience management. With evidence collected through qualitative expert interviews, the research, both theoretical and practical, was instrumental in creating this framework. To facilitate the process, a set of resources was vital for guidance in terms of the mentality to be followed. Firstly, the guidelines by Simonsen et al. (2015) on the principles of resilience thinking. Secondly, the methodology presented in the Systemic Design Toolkit (2023) and, finally, Vandenbroeck et al. (2016) and Wright et al.'s (2012) application of systems thinking and transdisciplinary approach in creating a framework for enterprise resilience.

Like most of the people who were interviewed, this framework approaches resilience with a set of processes, rather than specific solutions. The input of IP1, IP6 and IP7 was particularly useful in contemplating which analyses and processes to carry out and prioritize. What became clear after the interviews, is that every DMO differs fundamentally to its regional counterparts in terms of size, jurisdiction, funding, and structures, among others. This renders a process guide as the more suitable approach, as general guidelines and thinking patterns are easier to adapt to each DMO's and destination's needs. The framework consists of some visual conceptualizations of the processes within the social-ecological system that is a tourist destination and attempts to summarize the processes deemed necessary to evaluate, build and enhance a destination's resilience.

The results presented here were created following the principles of design thinking, while the process is being summarized in three core steps. These steps were inspired and built within the tourism resilience building cycle (World Bank, 2020), adaptive cycle of resilience (Cochrane, 2010), as well as the constructs of resilience (Medel et al., 2020) that were most prominent during theoretical and empirical research. The framework is conceptualized as a process guide and can be seen in Figure 13. The stages of the adaptive cycle and the tourism resilience building cycle are central to the process, as it revolves around making the system adaptable to change and establishing the mindset of complex adaptive systems. The World Bank's (2020) concept was seen as an approach that compliments the adaptive cycle. The latter's conservation (K) stage has been interpreted and visualized as the ideal state of a system, i.e., what the system's state should be when starting with mitigation and overcoming recovery. Based on the research results, the most important constructs by Medel et al. (2020) were integrated in the framework,

with knowledge management and futureproofing being especially helpful for system conservation. After all, reaching stability and adapting based on lessons learned are systems' basic requirements when trying to reorganize after a disruption. Moreover, scenario work and developing worst-case predictions were identified as important steps in the mitigation stage towards enhancing a destination's resilience.

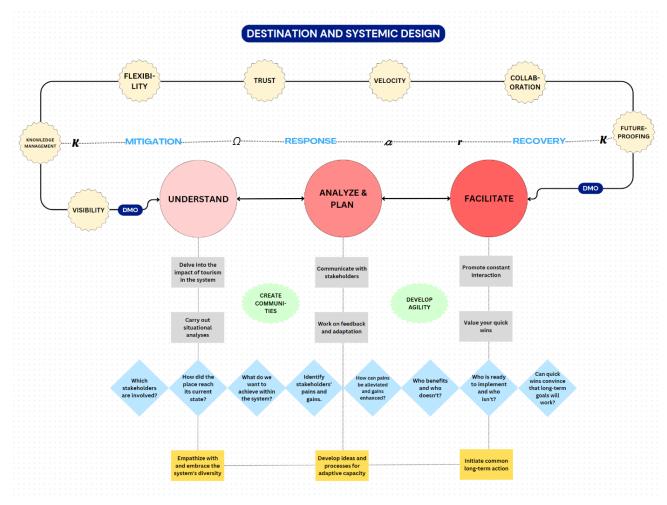


Figure 13: Designing resilient destinations. (own illustration)

With the framework being presented in Figure 13, a closer look will be taken into the three core stages presented, starting with understanding the system, followed by analysis and facilitation. These stages are not to be understood as a linear process, but a cycle of taking the proposed actions when needed. Going back to previous stages or applying the stage that fits best at a given moment is strongly encouraged, highlighting the flexibility and iterative testing nature of design. The process was purposefully created mostly with calls to action, to not only make for a more dynamic guide, but also to emphasize the human-centered nature of a visitor economy and of complex systems in general. Before elucidating the framework, the DMO's role and capacity in implementing design thinking will be briefly explored based on the gained knowledge.

7.1 The DMO's capacity to design

For a DMO to start using design thinking on the way to enhance the destination's resilience, the organization has to familiarize itself with the design mindset. As DMOs differ significantly in terms of structure, purpose, and funding, among others, it is difficult to develop a single method or process which will lead to universal application of design. Also, the issue of staff turnover and regularly lost expertise is raised here, which questions the very idea of even bringing up design within the DMO. As part of scenario work and setting future goals for the organization and the destination, it is suggested that a DMO which wishes to play an active role in enhancing its destination's resilience contemplate its future role within the visitor economy as a designer and facilitator, rather than a purely management and marketing organization. For that, the three horizons method can be applied to envision the future of the DMO's activities.

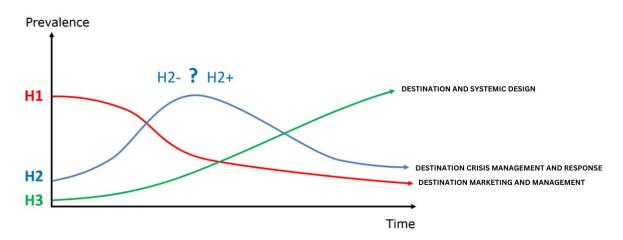


Figure 14: Three horizons framework. (graph by Sharpe et al., 2016, enhanced with DMO roles)

Here, Sharpe et al.'s (2016) interpretation is used. The illustration can be found in Figure 14, with the first horizon showing the DMO's current state, structure, and responsibilities, the third horizon its ideal future function and the second horizon the sometimes-tumultuous transition between the first and the third ones. Currently, the majority of DMOs are focused on commonplace destination marketing and management activities, revolving around developing a destination image, as described in chapter 2. The future of the DMO is seen as one entailing destination and systemic design, with a holistic participatory approach to placemaking that benefits both visitors and locals and facilitates collaboration, healthy coexistence, and long-term destination design. The transition period was conceived based on the COVID-19 pandemic outbreak. Its aftermath has been a critical turning point for tourist organizations, as reactive crisis management and few long-term solutions were the norm on account of the unpredictability of the virus and the socioeconomic consequences of its spread. With recovery from the pandemic being well underway and with the effects that it brought to light, it is believed that destinations are now in a transitional period, where adequate measures have to be taken in order to facilitate their resilience. With tourist destinations being complex social-ecological systems, establishing an evolutionary approach to resilience is key to making sure that the lessons learned from past crises are used to enhance crisis preparedness and make for more robust crisis response mechanisms. The evolutionary approach is also one that allows for crises to be seen as opportunities to learn and grow from, and not just problems to be solved and archived. This is why horizon three is envisioned as one involving design and systems thinking, as these are mentalities needed to understand the complex interactions and dynamics of a visitor economy, to empathize with its human elements, and to conceive the best possible future solutions.

Using the DMO's transition into the proposed third horizon as a main requirement, the Figure 13 process will be elaborated in the following subchapters.

7.2 Understanding the system

Developing profound awareness of the system is an important step in enhancing its resilience. This idea follows the design principle of empathy. Here, the visitor economy is the social-ecological system to be examined. It consists of several human constructs, from personal and familiar surroundings to community centers, state institutions, religious and archaeological sites, cultural and national icons, as well as the very natural environment where the system is located. These constructs, which are called subsystems here, can either be self-organized entities, SMEs, larger corporations, or governmental and non-governmental organizations. These subsystems compose the social-ecological system that is the visitor economy, and they all experience and make different impacts on their surroundings.

The center of the destination ecosystem presented here, and illustrated in Figure 15, is the DMO. It is important to note that the DMO is in the center of the system, as building its resilience is being approached through a DMO's point of view. In that sense, every stakeholder is at the center of the system when they see it from their own perspective. Here, the DMO serves as a guide to stakeholders in different subsystems and tries to influence them towards what the organization sees as beneficial for the destination. This, of course, does not always mean that what a DMO sees as beneficial is what is understood as such by residents. This was clear in the scenario example, as well as the real-life cases of Rome and Amsterdam, for instance.

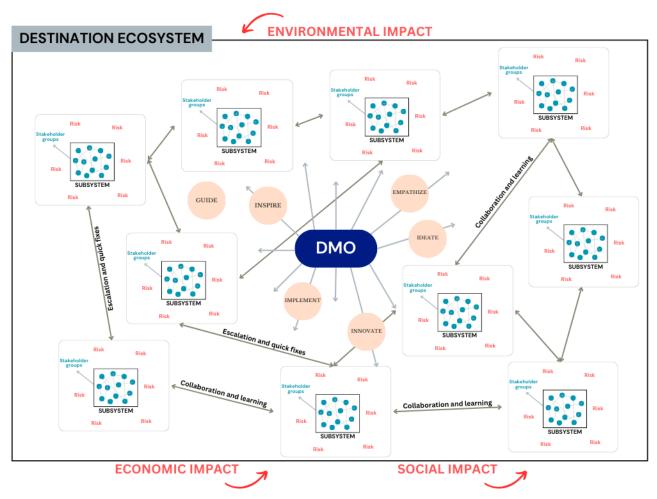


Figure 15: The destination ecosystem. (own illustration)

The different subsystems in the visitor economy also impact each other, ideally through collaboration and learning. Here, mutual understanding of what is best for the destination is prominent, while stakeholders are open to receiving knowledge from their counterparts within other subsystems. Interaction between subsystems and stakeholders can also come through escalation and quick fixes. In this case, a collaborative spirit is either non-existent or on the verge of collapse, with stakeholders halting cooperations in order to force action by their peers. Most importantly, however, the whole system receives and reacts to impact from economic, social, and environmental factors, which is also what is to be focused on when initiating participatory planning. The DMO's goal is to reach common ground through conversation and collaboration by trying to understand the systems' different actors and inspiring them to discuss, ideate and create solutions that will benefit the whole community. Here, the organization's role as a community manager comes to light. Mutual respect and connectivity are paramount, while embracing lessons learned is also a step that leads to peaceful interactions. These characteristics are also what facilitate evolutionary resilience, where the system does not shy away from the changes brought about by external stress factors but embraces and approaches them from different stakeholder perspectives. After all, outside influences having negative consequences on certain stakeholders or subsystems can have a positive impact on others. The DMO is here to empathize with both winners and losers during times of unrest, guiding both sides into using the impact to bring about innovation.

Initiating escalation is also an approach to participatory planning, which brings about disruptions that force participation. Such measures can have adverse effects, however, since they cause a chain of vindictive reactions that will make any conflict rapidly grow. This is where empathy also becomes key, as mutual understanding and learning from each other's behavior can lead to healthier system relationships. Systems that accept the differences between its actors and use that diversity to initiate positive change are also the ones which are bound to thrive, when compared to systems that categorically deny the interconnectedness of the system and thus lack the ability to adapt. A DMO adopting those principles can be a strong and competent guide of its system's components to successful mitigation of adverse effects.

Developing empathy and deep understanding of how the system is structured and realizing its never-ending interconnectedness is evaluated as the most important step when trying to enhance its resilience. Understanding the actors' problems, as well as the kind of impact tourism or visitors have on them will help to redesign the destination in order to improve that impact and make it something locals can receive long-lasting value from.

7.3 Analyzing and planning

This stage corresponds to ideation and designing for context as part of a wider situational analysis of the destination. Here, the DMO has to make sure that stakeholder participation is enabled. For instance, the organization must ask whether a widely accessible feedback and exchange platform is available for stakeholders to not only provide insights, but also to gain knowledge from their peers. If so, it is recommended to examine whether the right amount and nature of information is on, and if changes are to be made in the way that data is collected, aggregated, and analyzed. This platform can have both a virtual and physical form, the latter being an opportunity to bring people together for regular workshops. A value proposition canvas, which was brought up during the interviews, can also be applied here. After empathizing with the people who constitute the visitor economy, a value proposition helps to create a concrete overview of the pains and gains of the destination's stakeholders and what measures can be adopted to improve the status quo or keep the positive aspects afloat. This stage of analysis is seen as the main opportunity to start establishing participatory planning in a visitor economy. Involving stakeholders from all backgrounds within the destination will help a DMO gain deep knowledge of the societal patterns that make up the place and will assist in developing a stronger brand for the destination. Branding brings high value to the destination. The contribution of a high-quality brand is undeniable, especially when that brand can be easily exported and consumed outside the destination's physical boundaries. This will also help with product development and distribution that are synchronized with the destination's main identity, which, essentially, is its brand. Coming back to the idea of community, a brand should reflect the destination's tangible and intangible qualities and be developed in cooperation with the place's people. This co-creation process will add more value to any experience offering and will assist in establishing value creation networks within the destination.

Depending on their position within the visitor economy and their expertise, stakeholders' input can be collected in different ways, from questionnaires and street interviews to hour-long workshops and follow-up meetings. Whatever the method chosen, it is important to captivate the participants and make sure that they understand the value of their input, so that regular feedback loops are created, and information exchange happens efficiently, with the results being fed into the proposed platform. It is important for a DMO to make sure that every stakeholder who wishes to participate also has the opportunity to do so. Empathizing with the system also means developing an understanding of who has the expertise and the potential to provide value to the visitor economy. If the potential is there without the expertise or the willingness to participate, providing incentives and presenting the benefits of one's cooperation can help in getting people to at least listen to what the DMO and other participants suggest. Gaining the trust of stakeholders from different backgrounds will make any cooperation endeavor more effective and will create a sense of community which will be strengthened at times of crisis. This preparation of the feeling of community and the iterative information exchange is what will help develop the system's adaptive capacity.

The adaptive capacity can also be made stronger with scenario work. Strategic forecasts, for instance, are built upon ideas of potential risks that can lead to major disruptions. The main idea here is to work on establishing regular and seamless communication with stakeholders. Tourism

affects virtually everyone, and representation from every background is important when wishing to gain insights that will lead to holistic solutions. To develop such scenarios, it is vital to involve individuals with deep knowledge who understand the system's vulnerability and accept the potential of the worst case. This way, not only adequate contingency planning can take place, but the destination can also design its offering and communication around such scenarios, so the system can develop the agility it will need to respond to a crisis.

Based on the needs of each stakeholder group, information exchange is to be personalized accordingly. With the needs, looking at their expertise of the destination and how it functions as a system is also recommended. So, quantitative surveys and unstructured or semi-structured questionnaires can be an adequate method for visitors, while workshops and training might be more suitable for industry professionals and leaders. High-ranking visitor economy leadership might not be the most suitable partners, as front-line staff and organizations are the ones who can provide insightful and honest feedback. The people who can prove useful during the exchange are designers. Coming from academia or consulting, people with the design mindset can help in facilitating discussions and making people understand that developing a different mindset around problems is helpful.

The DMO or any organization that assists with the data collection needs to beware not to fall into categorical thinking spirals. It is important to know who and where to involve, but not based on demographics and arbitrary goals, but on people's behavior, social media exchanges, crowd flows, points of interest and current trends. Also, looking at people's needs will help to ask the right questions. Asking for feedback on issues that do not affect stakeholders will result in them amplifying problems that might not affect them as gravely, hence pushing their actual issues aside. Categorizing might help when wanting to define a specific action field, or the parameters around which this action field is to be examined.

The measures proposed here are not overly complex. In an inherently complex system, the processes that facilitate adequate communication should be simple and based on what the system, the destination, the people already have to offer. Simplicity is key in design, after all. Most of all, social listening, monitoring and honest exchange can help. What is not simple is getting everybody to recognize the value of honest exchange which will lead to strengthening the adaptive capacity. Initiating participation is an iterative process. Collaboration should not be forced upon, but rather made into something one would want to invest their valuable time in. The people who are prepared to cooperate will be the first ones to join, later presenting results to their peers, who also participate if they see positive developments through such results. The DMO should not see escalation as an immediate solution, but only as a last resort when grave mishandling is recognized, leaving no other choice than to risk compromising hard-built relationships with its stakeholders.

7.4 Facilitating change

Here, the implementation stage of design is taking place. The DMO is tasked with taking actions that will lead to stabilization of the industry after a major disruption. This disruption doesn't have to have happened yet. Scenario work and strategic forecasting is what will help the DMO envision the state of the system after an exogenous impact, so that it can implement while remaining agile and upholding anticipation. While conservation (K) is the desired and optimal state within the adaptive cycle of resilience, agility and anticipation are important, as release (Ω) can take place anytime. For the system to go through reorganization (α) and exploitation (r) seamlessly, the DMO needs to have a clear overview of all interdependencies, while making sure that exploitation on the way to recovery uses the learnings brought about by the disruption. This will ensure its adaptive capacity through the next crisis and facilitate the system's evolution on the way to reestablishing conservation.

The DMO's tasks that will facilitate the system's resilience have to be focused on strong internal and external communication, as well as investments and lobbying to provide incentives for participants of the visitor economy to become active again. Enabling strong and constant interactions is important, especially during the response and recovery phases of a crisis, as these do not only help enhance adaptive capacity, but also improve collaboration and facilitate velocity. Quick thinking is paramount in a fast-paced environment like a visitor economy, especially when that environment is challenged by unforeseen circumstances.

Although long-term measures are valuable and necessary to develop resilience, it is often difficult to convince participants of their effectiveness, as they have no immediate result to base their trust on. This is especially the case when working with political entities, which value shortterm results, particularly when elections are approaching. This is why the development of longterm solutions is to be related to quick wins that will lead to immediate results and bring participants to help futureproof the destination. With futureproofing and trust being important constructs of resilience in the post-COVID-19 era, such quick wins can be intermediate results based on the DMO's long-term goals and help gain the trust of entities which are difficult to convince. Gaining the trust of politics is particularly critical at an early stage, especially if they are instrumental in the funding and operations of the DMO.

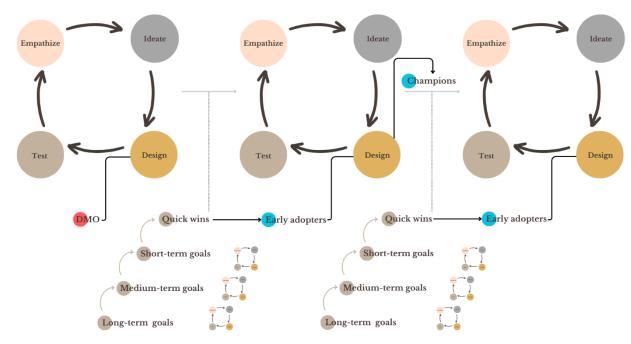


Figure 16: Iterative implementation process. (own illustration)

During research, the interviews helped with the realization that design is actually a fast-paced process; Complex adaptive systems are everything but predictable, so agility and velocity can only be ensured if the DMO is constantly on alert, testing its designs and making quick adjust-ments to accommodate needs that arise in the process. So, achieving quick wins is not unrealistic, because even if a test is not entirely successful, its results can still be helpful to at least some of the people who experience them. These quick wins help gain insights on finetuning the long-term strategies, but also bring in early adopters.

Early adopters are the people who can be convinced of the feasibility of the implemented result, thus participating actively in the design process, and becoming its champions. The champions can then work together with the DMO in communicating the value of the quick wins and the long-term measures they are the base of. Once the quick wins are realized, they are replaced by the short-, medium- and long-term goals, which enables constant reassessments and strategy updates, based on newly acquired knowledge. These updates also take place within the same iterative design process, as each quick-win test brings knowledge that allows the adjustments. This can help to gain more early adopters and slowly develop a robust strategy with many champions from several backgrounds and with diverse needs, each of whom makes a different impact on the visitor economy. Many champions will also be reflected on the destination's

brand and overall image. The more people participate in the process, the more they can fascinate others to visit and have a holistic experience. The iterative implementation process described here is illustrated in Figure 16.

The framework presented on Figure 13 and analyzed in this final chapter was conceived as a process guide for DMOs to guide their system to resilience with the use of design thinking. The feasibility of that is not unrealistic but is something that requires the dedication of the organization in charge, as well as the know-how and the human and financial resources. First and foremost, however, the DMO needs to define the nature of its operations, as well as its purpose within a visitor economy in the years following the COVID-19 pandemic. Although the pandemic is not a threat anymore, it showed that agility and quick action are instrumental to keep the system afloat and its stakeholders engaged. Engagement is not to be strived for in leadership and investor circles, but mostly within the front line, the people who experience visitors and their impact daily and who have been disillusioned by the industry's pandemic response, leading to staff and know-how shortage. This framework also looks to serve as a guide for shortterm action during crisis response, which is built by a thorough process of empathizing with the system and designing for context. This way, proper crisis response mechanisms can be developed, which will replace disoriented and non-viable solutions that were the norm at the height of the pandemic-related disruptions. Such mechanisms can make the DMO and the system more agile and flexible, while upholding the values of participation, trust, and anticipation.

This point marks the end of this research project. Detailed literature review followed by qualitative research and a design thinking framework constitute the project, the goal of which was to examine the feasibility of a DMO applying design thinking to enhance its destination's resilience. The process is now at its end and the final conclusions, along with limitations and suggestions for future action and research will be presented in the next and final chapter.

8 Conclusion and limitations

Throughout this thesis, thorough literature review on destination management and visitor economy, design thinking, as well as risk and resilience management was carried out. With the insights gained through the examined literature, the following research question was set as a goal for the qualitative research project:

Is design thinking a viable tool that can be used by a DMO to develop a destination's resilience and enhance its visitor economy in the post-COVID-19 era?

Upon formulation of the research question, expert interviews were carried out in order to help with answering the question and creating a framework for designing resilient tourist destinations. A summary of the evidence from the literature review and the empirical research leading up to the framework's contribution to current theories and scholarly literature is found in this final chapter.

8.1 Final summary

Destination management can be approached with different mindsets. This can be a purely business and economics-related perspective, it can be seen as a visitor-centric activity, but also as part of a wider and complex social-ecological system. Aspects of destination management are related to enhancing a place's image through growth-oriented marketing activities that look to boost tourism. Commodified and more customized products have been at the core of destination management until recently, while categorical thinking structures have limited flexibility and integrative approaches. This especially relates to a place's stakeholders, with tourism- and nontourism-related people and entities being clearly defined and differentiated from each other.

While destination management has been the base of tourism development, a conceptual progression is noted, leading to destinations being redefined as visitor economies. Especially with the outbreak of the COVID-19 pandemic and the worldwide disruptions that acted as catalysts for fundamental changes within the tourism industry, a change in the way tourism development is perceived is well underway. The concept of visitor economy poses a more integrative approach to destination management. Here, more focus is put on the interaction among a place's residents and its visitors. The stakeholders are not defined as being strictly within or out of the tourism industry, but rather as part of a social-ecological system that collectively works towards its long-term well being. Everybody who is active within the system, either working, living, or visiting, can be considered a stakeholder. In a visitor economy, core values are sustainability in all its forms, collaboration, and competitiveness. These values look to strengthen the system and make it adapt to outside influences of environmental, economic, or social nature. Approaching the destination as a social-ecological system when trying to collaborate to enhance its long-term prosperity is the main idea towards developing adaptive capacity and, as a result, resilience.

The organizations that are usually at the center of a visitor economy and facilitate the interaction and involvement of its stakeholders are DMOs. They are tasked with raising awareness on a place and its offerings. DMOs can represent destinations of all scales in terms of population, popularity, and visitor numbers, and their main responsibilities are strategic planning, marketing, and product development. DMOs do not have a specific structure or purpose, as each destination has different needs and functions around different legal and societal norms. This is also the reason why when discussing about the DMO's role in a visitor economy, it is important to consider their purpose within the system they serve, together with their jurisdiction, funding, and know-how. This is because such organizations can pertain to the public sector and report to political entities, but sometimes also be powered by local trade associations or cooperatives between several entities within the industry. DMOs' role in enhancing the destination's resilience seems to be gaining importance in the post-COVID-19 era.

Within a visitor economy, where constant interaction takes place among the system's stakeholders, DMOs are often tasked with facilitating productive and peaceful collaboration, while also making sure to enable stakeholder involvement in solving problems that affect the whole destination. ICT and the rising prominence of SMEs in destinations are making this function as a coordinator more important, especially in the post-COVID-19 era. DMOs' responsibility has transitioned from a purely marketing-related one to community management, with the task of facilitating regular communication and feedback loops among the destination's stakeholders, in order to be able to facilitate collaboration on the way to achieving long-term resilience.

To make participation possible, achieve innovation, positive social impact and resilience within a destination, design thinking is a promising mentality to apply here. Although design is usually associated with practical and aesthetically pleasing physical creations, it is also a mindset which revolves around finding simple solutions to complex human-centric issues, usually with the use of deep empathy for the people affected by these issues. In tourism, it can be seen in conjunction with the transition to the service-dominant logic, where a visitor economy is seen as a complex adaptive system. In that system, the values of collaboration, co-creation and service orientation are central to a destination's success and resilience. Design also helps develop a different mentality around how problems are viewed. It is instrumental to the evolution from full reactive confrontations to adopting different ways of thinking about a problem, thus allowing for more flexibility and different perspectives when looking for a solution.

Developing empathy also entails understanding the risks associated with the system's daily functionality. Tourist destinations, in particular, are inherently vulnerable social-ecological systems, and analyzing the risks associated based on their possibility, likelihood and potential is paramount to knowing how to approach building its adaptive capacity and, as a result, the system's resilience. What follows empathy is ideation, i.e., initial brainstorming on how to approach the problem at hand. Participation is vital during ideation, as this is where different needs and perspectives are communicated, observed, and integrated on the way to reaching the optimal solution.

Mapping a destination's stakeholders and their interdependencies to know who and when to involve can be helpful in participatory planning, all the while making sure that no one is forced to take part in collaborative workshops or other formats. This, together with the assurance that meetings provide value to the participants can increase interest within the destination's stakeholders, which in turn increases productivity within talks and creates a prototype, i.e., a quick win to a solution that ideally benefits everyone. The solutions conceived ideally serve the destination in the long run, as long-term action is one of the main requirements when looking to enhance a system's adaptive capacity. However, with long-term action sometimes being difficult to grasp, especially when financial beneficiaries and political entities, are involved, it is recommendable to also work with quick wins. Quick wins are immediate, functioning results that do not necessarily satisfy every stakeholder. Quick wins form part of the long-term strategy and are result of continuous feedback which results in empathizing, designing for implementation and testing of those results. This iterative process takes place until the optimal solution is reached, all the while adjusting the long-term goals based on newly acquired knowledge after each test.

The repetitiveness of design is also a core indicator of its importance. Tests provide new insights on a measure's effectiveness, also helping in convincing distrustful parties. Such insights are then applied to empathize, adjust the design, go into implementation and test again, until the most beneficial solution is achieved. This allows not only to have confidence while solving a problem, but also to gain early adopters within a system. These are people who experience the benefits of a solution and ideally participate in the design process, then becoming champions of a cause and helping to optimize a solution in order to receive more early adopters. Such insights are then applied to empathize, adjust the design, go into implementation and test again, until the most beneficial solution is achieved. This iterative process allows not only to constantly reevaluate processes, but also enhance collaboration among the system's stakeholders, who gradually become bound to a common strategy.

The learning and optimization process of design is also what helps enhance a destination's resilience, especially its evolutionary resilience. Here, a system is willing to undergo change as part of a natural process, which is often accelerated by major disruptions. For evolutionary resilience to be achieved, change does not have to be seen as a threat, but rather as an opportunity to enhance a system's defense mechanisms against external threats. Accepting the omnipresence of risks and the system's vulnerability to exogenous economic, social, and environmental impact is a key first step to facilitating evolution, while constructs like collaboration, agility and futureproofing are important to ensure the system's adaptive capacity.

The role of the DMO in applying design thinking mechanisms to enhance a systems evolutionary resilience is a very interesting prospect. The DMO can increase its capability to design and then use that capability to strengthen the destination's adaptive capacity. Wider academic discourse lacks profound research on the issue. General frameworks which can be used as process guides to enhancing a destination's resilience with the use of design are also not widely available. In light of the COVID-19 pandemic outbreak and the fact that it was a pivotal moment for tourism and destination management, this paper has attempted to address this gap in tourism research by developing a model for enhancing destination resilience with the use of design thinking in the post-COVID-19 era. By applying the principles of empathy, ideation, implementation and testing, the presented framework looks at the DMO as a community manager and facilitator, i.e., an organization tasked with creating long-lasting relationships with and among the destination's stakeholders, in order to improve the system's agility and adaptive capacity.

This framework requires that DMOs transition into destination and systemic design organizations, making a transdisciplinary approach to tourism possible. It integrates the adaptive cycle of resilience and the tourism resilience building cycle into the process of destination and system design, which is led by the post-pandemic resilience constructs like futureproofing, knowledge management, trust and collaboration. The process to ensure adaptive capacity and reaching resilience has been visualized with three stages that correspond to empathy, ideation, and implementation. The framework has been visualized as an iterative process, suggesting that testing and reevaluations be made to achieve the best possible results, while the focus is lying on enhancing cooperation and creating a sense of community within the system.

Achieving resilience entails having deep knowledge of the system's current state, in order to be able to communicate and react to feedback accordingly. This can help to ideate effective measures that will enhance adaptive capacity and make the system more agile. At the implementation stage, showing appreciation for quick wins and promoting interaction within the system stakeholders assist in creating an atmosphere where every stakeholder feels trusted and welcome to participate in making the system more robust.

The framework created for the purpose of this thesis provides a starting point for further research and acts as an incentive for DMOs to rethink their collaborative endeavors, especially with regards to widening their scope and action fields. Applying design is seen as something feasible, as long as a DMO is prepared to initiate the much-needed shift in mentality that will facilitate the application of design thinking onto the strategic planning for the destination. With that mentality shift within a DMO as a prerequisite, the research question can be answered affirmatively; Design thinking is indeed a viable tool to be used by a DMO to develop a destination's resilience and enhance its visitor economy in the post-COVID-19 era. What can be suggested for DMOs for long-term socially sustainable visitor economy management, is to develop long-lasting relationships with their stakeholders. Holding regular meetings, collecting, managing, and publishing information, as well as adjusting long-term strategies to current needs and external influences are seen as paramount values that help to make a place resilient. Also, although the somewhat obstructive role of politics is undeniably influential and difficult to impact, it can be seen as an opportunity for a more public discourse on the role of political institutions in shaping the future of visitor economies.

Limitations to the research conducted as well as thoughts on further research opportunities will be shared in the next subchapter.

8.2 Limitations and recommendations for further research

This research project is the result of a long process comparing academic literature, conducting qualitative interviews, and creating a design thinking framework for enhancing destination resilience. Although the results can be seen as positive with regards to the feasibility of applying design thinking methodology to day-to-day DMO operations, the framework created might be interpreted as somewhat generic. This is indeed a weak point of this thesis, since the research did not focus on a specific region, city, or DMO which could have been used as a case study to build the framework on. However, the question is raised of how a framework based on one DMO example could be more widely applicable, since worldwide DMO structures and purposes differ significantly and there is no widely accepted blueprint on their responsibilities and jurisdiction.

The empirical research can be seen as lacking because of the relatively low number of participants. In the same context, not many DMO representatives were able or willing to join, resulting in a sample where DMOs are underrepresented. A larger total amount of interviewees, ideally with more DMO employees, would have been ideal to get a more well-rounded approach to the subject in question. Furthermore, an ideal research design would have had several rounds of interviews. After the first round, the results would be summarized into a solution for the problem scenario. Then, the interviewees would be called back to give feedback on the collective solution, with readjustments being made and a potential third round of feedback taking place. This iterative process would put design in practice and speak for the effectiveness of the mentality by itself. Also, branding, which was universally embraced by the interviewees, was not researched intensely during the literature review, which could have provided even more insights to the role of a strong brand in enhancing resilience.

Apart from branding, other unexplored issues were raised during the interviews. The role of the artistic and cultural community within the destination and nudging were particularly intriguing. Although both concepts were included in the result discussion, they did not receive as much attention to conclude that they are instrumental for achieving long-term resilience. This poses an intriguing question and a good starting point for further research projects focusing on the contribution of either specific behavioral aspects or of specific stakeholder groups to a destination's resilience.

Finally, what could be seen as an extension of the research results and the framework presented here, would be using the framework to research real-life cases of post-crisis visitor economy management. The main questions to ask while examining such cases can be whether participatory planning is taking place, whether system conservation strategies are in place and if the DMO is aware of the industry's transdisciplinary nature and the effectiveness of transdisciplinary action when trying to facilitate resilience.

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Appendix A

Interview guide I

Used as author guide and checklist

Introduction to the talk

- Welcoming the interviewee.
- Information on topic and approximate duration.
- Getting explicit consent to record interview.
- On-record information on handling of personal data:
 - The interview is confidential and anonymous.
 - All recordings will be deleted by June 27, 2023, at the latest.

Main part

Scenario

A large European metropolitan area with a rich history and population of over one million, has started to recover from COVID-19. The pandemic caused a lot of disruptions, like minimizing social interactions, significant decrease of visitor arrivals, as well as staff shortages. It got a lot of SMEs to cease operations and also brought to light several unsustainable practices which had been underway before the outbreak. Some of them are a waste disposal crisis, climate change, faulty infrastructure, and overdependence on visitor flows. The latter had the destination almost reach a state of overtourism in 2019, with residents feeling overwhelmed by the seemingly unceasing focus on tourists and reduction of their own quality of life.

The crisis response of the tourism industry was rather chaotic and uncoordinated, while no contingency plan was in place. Communication among stakeholders was lacking, while no participation was enabled to try and understand how recovery can be made easier for the whole industry. At the height of the pandemic, the DMO was largely busy trying to reactively tackle the short-term issues brought to light by the pandemic. The destination's residents started to feel the negative effects, especially in terms of being too dependent on increasing arrivals, both professionally and, as a result, socially. On the way to recovery from the pandemic, the DMO is struggling to define the city's stance and goals post-pandemic. It wants to reach its pre-pandemic popularity, but without the same level of overcrowding, while the next potential crisis should not find the city being overdependent on tourism flows.

Questions

Which stakeholders can be involved in reshaping the area's visitor economy strategy and can the DMO redefine the city's management to ensure every stakeholder's voice is heard?

Which product adjustments could help to avoid over-dependence on visitor but still reach pre-COVID-19 popularity?

How can the DMO enhance the city's resilience in the face of external stress factors?

Conclusion

- Thanking for participation.
- Answering open questions.
- Offer to provide interviewee with finished transcripts and thesis.

Interview guide II

Shared during the interview sessions

Your destination

- Large European City (>1M inhabitants).
- Unsustainable practices:
- Waste disposal crisis.
 Climate change.
- Climate change
 Eaulty infrastru
- Faulty infrastructure.
 COVID-19 disruption:
- Social distancing.
- Decrease in arrivals.
- Staff shortage.
- Almost in a state of overtourism in 2019:
 Over-dependence on visitor flows.
 - Over-dependence on visito
 High irritation of residents.

COVID-19 response

- Chaotic, uncoordinated.
- No contingency plan.Industry-wide communication and
- collaboration lacking.DMO response limited to reactions to
- short-term issues.
 Negative effects on locals:
 Social
 - Professional

COVID-19 aftermath and goals

- DMO wants the city to reach its former glory without the same levels of overcrowding.
- Next crisis should not find the destination overdependent on visitor flows.

Your recommendations

- Which stakeholders can be involved in reshaping the area's visitor economy and can the DMO redefine the city's management to ensure every stakeholder's voice is heard?
- Which product adjustments could help to avoid over-dependence on visitors but still reach pre-COVID-19 popularity?
- How can the DMO enhance the city's resilience in the face of external stress factors?

Deine Destination

- Große europäische Stadt (Bevölkerung >1M).
- Nicht nachhaltige Handlungen:
 Abfallentsorgungskrise.
 - Abfallentsorgui
 Klimawandel.
 - Klimawandel.
 Mangelhafte Infrastruktur.
- COVID-19 Störung:
 - Social distancing.
 - Minimierte Ankünfte.
 - Personalmangel.
- Fast ein Zustand von Overtourism in 2019:
- Starke Abhängigkeit von Besucher:innenströmen.
- Hohe Belastung der Einheimischen.

COVID-19 Reaktion

- Chaotisch, unkoordiniert.
- Keine Notfallplanung.
- Mangelhafte branchenweite Kommunikation und Kollaboration.
 Eher reaktive DMO Aktionen und
- Ener reaktive DMO Aktionen und kurzfristige Lösungen.
- Negative Effekte auf Einheimische:
 Sozial
 - Professionel

COVID-19 Nachwirkungen und Ziele

- Die DMO möchte, dass die Stadt das gleiche Niveau an Popularität erreicht, ohne den gleichen Menschenandrang.
- Bei der nächsten Krise sollte die Destination nicht gleich abhängig von Tourismus Ankünften sein.

Deine Empfehlungen

- Welche Stakeholders können in die Umformung der visitor economy der Stadt invloviert werden und wie kann die DMO das Management der Stadt umstrukturieren, um sicherzustellen, dass alle Stakeholders gehört werden?
- Welche Produktanpassungen könnten helfen, um zwar die Popularität von vor COVID-19 zu erreichen, aber die Überabhängigkeit von Ankünften zu minimieren?
- Wie kann die DMO die Resilienz der Stadt angesichts externer Stressfaktoren stärken?

Figure 17: Guides shared during the interviews, English and German. (own illustration)

Appendix B

Category and subcategory overview

The following categories are the result of immersion to the data collected during the qualitative interviews which took place as part of this research project. Upon transcription and two cycles of coding, the categories were assigned following inductive reasoning. No numbering is given to indicate the interconnected nature of the topics discussed and the integrative and transdisciplinary nature of design thinking and systems thinking.

Categories	Subcategories		
Mentality	-		
Branding	Early adopters		
	Champions		
Design thinking	Empathy		
	Ideation		
	Participation		
	Implementation		
	Nudging		
	Iteration		
Resilience	Community management		
	Sustainability		
	Value		
	Adaptive capacity		
	Agility		
	Evolutionary resilience		
	Scenario work		
	Defining success		
The DMO	DMO purpose/structure		
	Public vs. private sector		
	Product development		
	Stakeholder interaction		
	DMO sense of control		
	Catalysts		
Categorical thinking	-		

Table 9: Category and subcategory overview. (own illustration)

Appendix C

Transcript excerpt

The following excerpt serves as a sample of the transcript format that was followed for this research project:

(1): Right. Thank you so much. I wanna ask, you talked about bringing all the stakeholders together.
And trying to form those participatory, let's say frameworks, guidelines, so everybody can feel included,
but what if a DMO calls all the stakeholders, and there are stakeholders who are not even aware that
they can be part of tourism or they directly don't wanna be part of tourism. How can you initiate a shift
in that thinking of the stakeholders who on the one hand think they have nothing to do with it but and
also on the other hand think they will have no benefits from it and this is why they don't wanna get
involved? #00:15:29#

133

134 (IP): It's a really good question. Because, that's actually like, very often what happens. I was doing 135 these participatory planning workshops and specifically wanted young entrepreneurs in the room. But 136 the room was controlled by the gastronomy association and the hotel association. So, when it comes to 137 participatory planning, what often happens with a DMO, is that the groups that are called to the table 138 are the groups that invest and help finance the DMO. And they have a seat at the table. So, traditionally, 139 if you're not that and you do not invest, you do not have a say. And I think one of the ways a round, well, 140 one of the ways to combat that, one of the ways to create a more inclusive conversation is to plug into 141 community associations. To plug into the neighborhoods. And to look at potentially decentralizing your 142 workshops, so that what you're doing is you're taking it to the neighborhood associations. And you ask 143 them if they would agree to meet and share their concerns, their ideas, their thoughts. So instead of, 144 you know, calling everybody to you and having kind of a closed room and invite only, I think it's critical 145 to reverse that. And to really look at what are the groups of people there are that are, like, representative, 146 that you can start to have conversations with. And because they've never been involved, that takes work 147 to build a relationship. There needs to be engagement, it can't just be a once-off "Well, we sent you an 148 invite to a workshop and you didn't attend, so you don't wanna have a say", which is often how it works. 149 You need to build a relationship first, you need to open a door and need to start a conversation before 150 you can even invite excluded groups to a workshop. Because if they don't believe they are part of an 151 ecosystem, then they are like "I don't even know why I got this invite", like, "Delete". So, yeah, you have 152 to make it personal. #00:18:23#

All interview transcripts, or parts thereof, can be made available upon request.

Coding and categorization excerpt

The excerpt in Table 10 is a sample of the coding and categorizing process of the transcript excerpt above, which was followed for every interview carried out for this research project. The refined transcripts were copied with their respective line numbers onto a sheet, were the two coding cycles and the categorization were documented.

Interview Nr:	6	Designers					
Interviewee alias	Transcript line number	Transcript	Initial code	Focused code	Category	Subcategory 1	Subcategory 2 🖕
	126	Right. Thank you so much. I wanna ask, you talked about bringing all the stakeholders					
	127	together. And trying to form those participatory, let's say frameworks, guidelines, so everybody can feel					
	128	included, but what if a DMO calls all the stakeholders, and there are stakeholders who are not even					
	129	aware that they can be part of tourism or they directly don't wanna be part of tourism. How can you					
	130	initiate a shift in that thinking of the stakeholders who on the one hand think they have nothing to do					
	131	with it but and also on the other hand think they will have no benefits from it and this is why they don't					
	132	wanna get involved?					
	134	It's a really question. Because, that's actually like, very often what happens. I was planning,	Often stakeholders don't participate		Design thinking	Participation	
	135	doing these participatory planning workshops and specifically wanted young entrepreneurs in the	Example, young entrepreneurs wanted		Design thinking	Participation	
	136	room. But the room was controlled by the gastronomy association and the hotel association. So, when	Control by gastronomy and hotel association		Design thinking	Participation	
	137	it comes to participatory planning, what often happens with a DMO, is that the groups that are called to	DMO participatory planning		Design thinking	Participation	
	138	the table are the groups that invest and help finance the DMO. And they have a seat at the table. So,	Often DMO financiers only		Design thinking	Participation	
	139	traditionally, if you're not that and you do not invest, you do not have a say. And I think one of the ways	No investment, no say	-	Design thinking	Participation	
	140	around, well, one of the ways to combat that, one of the ways to create a more inclusive conversation	More inclusive conversations needed		Design thinking	Participation	
	141	is to plug into community associations. To plug into the neighborhoods. And to look at potentially	Neighborhoods and community associations		Design thinking	Participation	
	142	decentralizing your workshops, so that what you're doing is you're taking it to the neighborhood	Decentralizing workshops	Relationships for	Design thinking	Participation	
	143	associations. And you ask them if they would agree to meet and share their concerns, their ideas, their	Asking for meetings with neighborhood associations	participation	Design thinking	Participation	
	144	thoughts. So instead of, you know, calling everybody to you and having kind of a closed room and	No invitation-only workshops	participation	Design thinking	Participation	
	145	invite only, I think it's critical to reverse that. And to really look at what are the groups of people there	Reversing workshop style		Design thinking	Participation	
	146	are that are, like, representative, that you can start to have conversations with. And because they've	Examining representative groups		Design thinking	Participation	
	147	never been involved, that takes work to build a relationship. There needs to be engagement, it can't	Building a relationship		Design thinking	Participation	Nudging
	148	just be a once-off "Well, we sent you an invite to a workshop and you didn't attend, so you don't wanna	Engagement and many tries after one failed invite]	Design thinking	Participation	Nudging
	149	have a say", which is often how it works. You need to build a relationship first, you need to open a door	Building a relationship]	Design thinking	Participation	Nudging
	150	and need to start a conversation before you can even invite excluded groups to a workshop. Because	Start a conversations to include	-	Design thinking	Participation	Nudging
	151	if they don't believe they are part of an ecosystem, then they are like "I don't even know why I got this	Stakeholders join meeting if they feel included		Design thinking	Participation	Nudging
	152	invite", like, "Delete". So, yeah, you have to make it personal.	Making it personal		Design thinking	Participation	Nudging

Table 10: Coding and categorization excerpt. (own illustration)