Learning to design cultural districts and learning from designing them

Alberto Francesconi (a) and Claudia Dossena (b)

(a) Department of Economics and Management (Dipartimento di Scienze Economiche e Aziendali), University of Pavia, Pavia, Italy;
(b) Catholic University (Università Cattolica del Sacro Cuore), Milano, Italy

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CONTACT Alberto Francesconi alberto.francesconi@unipv.it

Abstract

Cultural districts are becoming an important field of study to promote a growing number of initiatives for local development. Despite substantial research in this field, knowledge gaps remain, especially with regard to initiatives at supra-urban level. Many policy-makers, funding agencies, local administrators and managers still face important designing issues. This paper contributes to the developing body of theory on cultural districts in two ways. Firstly, focusing on concepts from complexity theory, it expands the debate on the conception of cultural districts as complex adaptive systems. Secondly, it highlights the dysfunctional tensions that can arise from conflicting ways of conceiving organizations, organizing and designing among 'promoters' and designers. We have been involved for three years in a large project aimed at designing a wide supra-urban cultural district in Italy, financed by a major banking foundation. Adopting an organizational perspective and through participative action research, we develop an explorative case study. Our core argument is that a linear, predictable and deterministic approach to analysis and design presents many limitations for such complex projects, offering learning opportunities from the designing experience.

Introduction

The competitiveness of actors is increasingly dependent on the development policies of the surrounding socio-economic and territorial systems. Cultural heritage has acquired a fundamental role (Bakhsi & Throsby, 2010; Porter, 1990) and cultural policies have expanded as a means of achieving further aims of spatial and socio-economic revitalization, attractiveness and global competitiveness (Jakob, 2010; Pierantoni, 2014).

A wide debate has emerged on the concept of the Cultural District (CD), promoting potentially ground-breaking initiatives, even if most of the literature has concentrated on urban clusters, cities of art and cities of culture (Cooke & Lazzeretti, 2008; Richards & Wilson, 2007).

This paper contributes to developing theory on CDs as a development model for local production systems (Garofoli, 1994), where the term 'district' refers to supra-urban and system-wide CDs (Sacco, Tavano Blessi, & Nuccio, 2008).

The aim of the paper is to open up debate on design issues for system-wide CDs inspired by concepts from complexity theory. Our core argument is that a linear approach to analysis and design exhibits many limitations. We argue that the potential benefits of taking a Complex Adaptive Systems' (CASs) viewpoint are as much theoretical as analytical and practical. We hope our work will provoke interest in this fertile and underexplored area of research and stimulate innovative, deep insights into organizational design and cultural policy-making. What follows is neither a complete model nor the study of the entire life cycle of a CAS, exercises far beyond our current aims. The originality of this work concerns the juxtaposition we experienced, as project 'insiders', between a deterministic design approach and an emergent process of design 'in action'.

We have been involved for three years in a large Italian project to design a system-wide CD. We experienced a dysfunctional tension with ineffectiveness and inefficiency deriving from different ways of conceiving organizations, organizing and designing between the donor foundation – despite the successful co-financing obtained – and the design group. Through Participatory Action Research (Chevalier & Buckles, 2013; Rahman, 2008), we developed our case study exploiting the intersection of complexity theory, CAS and organizational designing literature. To our knowledge, there are no previous similar studies.

The paper is structured as follows. We present the main theoretical concepts relating to CDs and CAS, and describe the context and the methodology used. A discussion of our field experience is then followed by conclusions in terms of suggestions and insights for further research, cultural policy-making and the designing and change of system-wide CDs.

Perspectives on cultural districts

In the relevant literature, the CD has been conceptualized in different ways. One conception views it as a direct extension of the industrial district, in terms of vertical integration of local cultural and tourism industries. Scott (2000), for example, analyses large cities as organizational forms similar to industrial districts, where individuality arises from the cultural nature of the goods produced. Here, the CD is seen as an industrial district oriented to cultural production, which emphasizes the value of creative industries in developing new economic opportunities for local areas (Scott & Leriche, 2005). In Italy, the industrial district theory (Becattini, 2000; Garofoli, 1994) represents a common departure point for almost all the studies on CD, but with very disparate consequences (Cinti, 2008).

Another stream of research (e.g. Frost-Kumpf, 1998; Landry, 2000; Stern & Seifert, 2007; Valentino, 2003; Zukin, 1995) sometimes overlaps with the previous stream, focusing on CDs within the context of urban planning policies. Most of the literature on CDs has focused on urban clusters, cities of art and cities of culture (Cooke & Lazzeretti, 2008; Lorenzini, 2011). For example, Frost-Kumpf (1998, p. 4) defines a CD as 'a well-recognised, labelled, mixed-use area of a city in which a high concentration of cultural facilities serves as the anchor of attraction'. CDs are often seen as tools in the hands of urban planning authorities for fostering the development of centres and revitalizing neighbourhoods in decline, relying on both production and consumption of culture (Landry, 2000). Valentino (2003) develops a similar approach, focusing on Italian art cities. Culture performs the tactical role of building a specific image of a city, to attract resources, tourists or a critical mass of professionals – as suggested by Florida's (2002) creative class model – and to gradually transform social life, norms and values (Currid, 2007). However, this type of planning can sometimes legitimize the separation of rich and poor areas (Zukin, 1995), gentrification and an

increase in economic inequality (Stern & Seifert, 2007), a tendency belatedly recognized by Florida (2005) himself.

A broader conceptualization of CDs is proposed by Santagata (2002), who describes them as geographically clustered networks of interdependent entities defined by the production of idiosyncratic goods based on creativity, culture and intellectual property, with a strong cultural link to the local community. He identifies four types of CDs: industrial and institutional (similar to the Marshallian industrial district) and museum and metropolitan (similar to models employed in the literature stream on urban planning policy).

Another view explores the contrast between top-down careful planning and bottom-up emergent patterns of development (Cinti, 2008). For example, in the Italian context, Valentino (2003) argues that the CD is an instrument of top-down government of territorial resources. The promoters of a CD – mainly local authorities – must define goals, identify resources and find an identification trademark and stakeholders. An agency for development can then act as coordinator and mediator of different interests and situations.

However, other positions exist. Hitters and Richards (2002) and the OECD (2005) consider that since territory, community, economy and culture are tightly linked, it is difficult to start from scratch and set up a CD while excluding most of the local community. Other authors adopt a model of the CD that places even less emphasis on top-down development, introducing the concept of 'natural' CDs (Stern & Seifert, 2007): spatially delimited areas where a variety of cultural assets are clustered in a more spontaneous and bottom-up way.

> This phenomenon occurs without policy intent and, because natural cultural districts are not planned from scratch but rely instead on the self-organized efforts of local actors they require tender care and a light hand. Natural cultural districts must be cultivated (Stern & Seifert, 2007, p. 3)

rather than imposed in a top-down way. In a rather similar way, Lazzeretti (2001, 2003) adopts an entirely bottom-up viewpoint. However, some successful experiences seem to arise as spontaneous forms of local development, while others develop through combination with the top-down method (Le Blanc, 2010).

Other scholars (e.g. Arnaboldi & Spiller, 2011; Lazzeretti, 2012; Sacco, Ferilli, Blessi, & Nuccio, 2013; Sacco et al., 2008) emphasize the complex and dynamic horizontal integration among different industries. Analysing various types of cultural-led developments, Sacco et al. (2008) distinguish, as the most advanced type, the system-wide CD. This is 'an idiosyncratic mix of top-down planned elements and emergent, self-organised activities coalescing into a model of local development in which cultural activity displays significant strategic complementarities with other production chains within typical post-industrial contexts' (Sacco et al., 2008, p. 3). This model aims at generating synergies, complementarities and opportunities for local socio-economic development in a dynamic way, nurturing the experience of the new and of the non-familiar. Culture is the 'connective tissue' which 'can generate opportunities for training, learning, innovation, and creativity even in non-closely related cultural sectors' (Sacco et al., 2013).

Stern and Seifert (2007) argue that if we consider the newly indistinct barrier between cultural producers and consumers, it might make sense to think of the cultural and other related sectors as a wider ecosystem, in which different parts might be self-organizing and interdependent. The benefit seems to be that the greater the cross-sector interdependencies, the more idiosyncratic the identity of the CD, providing a strong position for firms and products (Desrochers, 2001; Hilpert, 2006) and emerging opportunities for creative cross-fertilization and development. In general, a link between diversity and innovative or creative behaviour has been reasonably well established in literature (Anderson, 1999; Martin & Sunley, 2006). Lazzeretti, Capone, and Boix (2012) show that

interconnected variety in local systems encourages the clustering of creative industries, due to cross-fertilization, new combinations, geographical proximities and the innovation produced by spill over processes. Cooke (2012) indicates that fruitful innovation increasingly occurs at the interfaces among firms, sectors and clusters, where cross-fertilization of ideas may either produce new unforeseen innovations, or result in the application of old knowledge in new ways to tackle complex or wicked problems. However, as argued by Stern and Seifert (2007), the connection between diversity and culture still needs better understanding.

The complexity of cultural districts

Drawing on the contributions outlined above and, in particular, on the definition by Sacco et al. (2008), we can argue that at supra-urban or regional level the complexity of a CD is even more marked than at urban level, due to potential interdependencies among a greater multitude of actors (Trist, 1983). We argue that a useful approach towards a deeper understanding can be to conceive system-wide CDs as CAS, as already suggested in terms of tourism (Arnaboldi & Spiller, 2011; Farrell & Twining-Ward, 2004). From an organizational point of view, complexity is definitely not a management fad and fashion, a mere metaphor or methodology, but a deeper perception of reality (Lewin, 1999). Organizations are classically seen as purpose-driven entities with a structural form, exhibiting a certain degree of order and determinism. Such a linear top-down approach to analysis and design, however, exhibits many limitations when used for organizational settings characterized by a complex web of interdependencies.

Complex systems are made up of a large number of constituent entities interacting with each other and with the environment (Gell-Mann, 1995; Mansfield, 2010; McMillan, 2004), as open systems. They change inputs to outputs in a nonlinear way (Casti, 1994) because of webs of feedback loops (Anderson, 1999). Changes to just one part can cause unpredictable interactions (Anderson, 1999) with cascades that can either dissipate or propagate, causing massive change (Mansfield, 2010). A complex system cannot be understood using a linear, reductionist approach. Complexity suggests that individuals, societies, organizations and networks can be conceived as CAS when they have the ability to transform themselves to adapt to changing circumstances (Kilduff, Tsai, & Hanke, 2006).

A CAS is a complex system, exhibiting certain behaviours, such as learning, self-organization, emergence and co-evolution to the edge of chaos, common across a variety of systems – ant colonies, human settlements, organizations and economic landscapes, to name but a few.

CASs are adaptive because they interact with the environment, learn from the experience and adapt to events as a result (Gell-Mann, 1995). Learning determines the 'aliveness' of CAS and sets them apart from other complex and complicated systems (McMillan, 2004). Indeed, adaptation and learning are seen at the core of system-wide CDs (Sacco et al., 2013).

CASs are able to create emergent outcomes through self-organization, often leading to new, possibly more sophisticated and complex forms (McMillan, 2004). Ants create colonies, and similarly, urbanites create neighbourhoods. No single component dictates the collective behaviour (Anderson, 1999), although it does require the import of energy (Prigogine & Stengers, 1984). Indeed, different conceptions of CDs include self-organization and emergence in different degrees (e.g. Lazzeretti, 2003; Le Blanc, 2010; Sacco et al., 2013; Stern & Seifert, 2007). Many authors argue that districtualization is essentially spontaneous and that the conditions for formation can be recognized and sustained, not created from the top (Lazzeretti, 2003; Stern & Seifert, 2007). 'External' funding can be considered as an import of energy, a spark plug that can trigger or sustain the process.

An important behaviour of a CAS is that the more adaptive agents are incorporated, the more frequent are emergent phenomena, and the more the repertoire of possible system behaviours expands (McMillan, 2004). For example, as new partners or stakeholders become involved in a CD, self-organized and informal coalitions can emerge along with new ideas, alternative aims and patterns of development, as we experienced in our case study. Agents must have some level of autonomy and the ability to process information and to adapt their behaviour. The added complexity of the agents' behaviours gives the system the ability to perform more complicated tasks, leading to the emergence of increasingly complex phenomena, but making the system harder to understand and predict (Miller & Page, 2007). On a larger scale and at different levels of the system, many adaptive agents simultaneously adjust their behaviour, based upon the local level behaviour of other agents within the system (Mansfield, 2010). For example, in a CD, the adaptive agents (e.g. designers, cultural operators and users, administrators, residents and other stakeholders) are the basic building blocks. Changing their – especially cultural – awareness and behaviours through cultural engagement is one of the objectives of a system-wide CD (Sacco et al., 2013). The experiential learning of different stakeholders can be recombined in an interacting network with feedback loops potentially influencing each other, often spontaneously. This is desirable for a CD.

However, it is typical for events to cascade through the system and the 'wave of effects' can propagate in unpredictable ways (Mansfield, 2010). This is very similar to the concept of positive and negative externalities or unintended consequences in CDs, often barely predictable, as highlighted in urban settings (e.g. Stern & Seifert, 2007).

CASs are able to live on the edge of chaos, doing so by constantly learning, exploring and adapting. Certain conditions may help a CAS to fulfil its potential; others will not, and the system may move along the spectrum towards and away from equilibrium during its lifetime (McMillan, 2004). Success lies in sustaining a system on the borders between stability and instability – the edge of chaos. For example, if a system-wide CD, which was created to learn, innovate and change, is pulled too far towards stability (e.g. building heavy and bureaucratic organizational processes and structures), it will likely reify and ossify, becoming less able to change and innovate. If it is pulled too far towards instability, it will likely disintegrate. Within a CD, the organizational phenomena of chaos can be represented, for example, by actors without formal authority but with power, exerting a large influence on its development.

The view of a CD as a CAS suggests new ideas and approaches for policy-makers, designers and managers. It also opens up debate on issues of organizational design and change. The following parts of the paper enrich, particularly, the design debate, exploiting our experience as project insiders.

Context and methodology
The authors have been involved for three years in phases 2 and 3 (Figure 1) of a large project aimed at designing a CD, as part of a larger intervention financed by a major Italian banking foundation to create six CDs in Northern Italy, with a total investment of 20 million Euros.
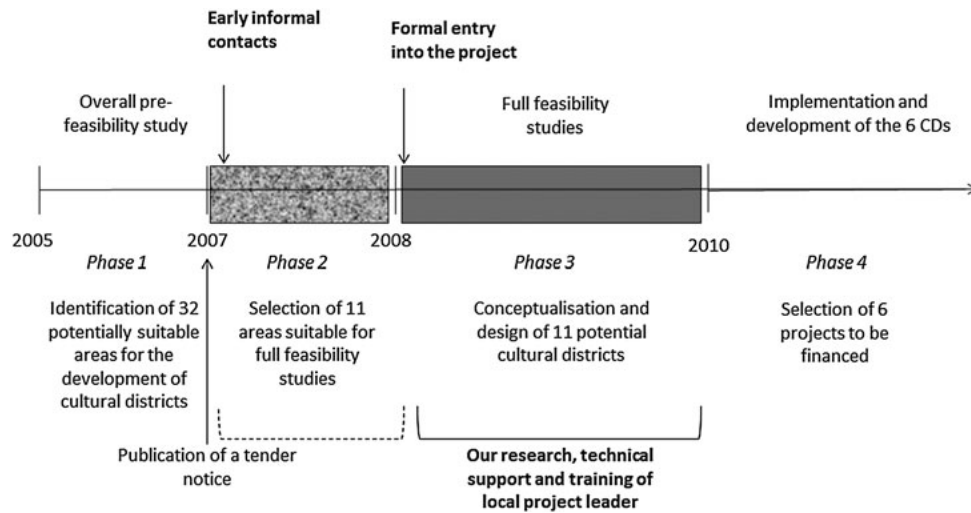
Figure 1. Main phases of intervention and our participation

Phase 1 was dedicated to a general pre-feasibility study to identify 32 suitable areas (2005–2006). Phase 2 included the publication of a tender notice and the selection of 11 areas for full feasibility studies (2007–2008). Phase 3 was intended for the development of 11 full feasibility studies (2008–2010). In phase 4, six projects, including ours, were successfully selected to be co-financed for the implementation of the CDs.

Even if each projected CD tried to draw on its unique cultural heritage (e.g. music, terracing, agricultural and industrial traditions of the early twentieth century, royal palaces, rock art, etc.), it is possible to find some common cornerstones of development: firstly, a strong synergy between the cultural sector and some local production sectors, particularly crafts, food and wine, and tourism; secondly, the conception of landscaping as a fundamental resource to protect and enhance. The final cornerstone is the support of local entrepreneurship and innovation, conceiving culture as a driver of the socio-economic development of the territories. Other commonalities concern a willingness to create a strong public–private partnership and the pre-identification of a governance model to support control and coordination tasks, as explicitly required by the donor foundation. In the end they diverged significantly from an organizational point of view (including local foundations, associations, a consortium of municipalities, offices in a public institution). All projected CDs were supra-urban, but the size and number of inhabitants vary greatly, from a minimum of 400 to over 3000 km2, from 5 to 42 municipalities, and from 80,000 to over 300,000 inhabitants. Even the presence of pre-existing cultural systems ranged from low, to medium (as in our case), to high (only one case). In brief, the context represented quite heterogeneous settings.

Access to the specific context and to data as a research environment has been 'opportunistic' (Weick, 1990, 1993) and limited to phases 2 and 3, here referred to as 'conceptualization and design', representing the inception of the CD. Despite our project being selected for phase 4 and the CD implementation, starting in 2011, we are aware that full understanding of the entire CD's life cycle – and related outcomes and externalities – is still premature. Firstly, because it can take many years to manifest results and therefore we argue that a 10-year (and maybe longer) perspective is more appropriate. Moreover, at the time of writing, the only official public sources report insufficient information to assess outcomes and externalities. However, such an exercise is far beyond the aims of this paper, since we are more interested and focused on considering the initial conceptualization and design.

To collect data, we conducted many formal and informal interviews with key local players and project partners and attended many meetings with the donor foundation, local project members

and the lead actor (the province). We produced a 5000-page document analysis of previous local projects potentially related to the CD and about 700 pages of related documentation, including all minutes of meetings. Most importantly, we exploited our field experience as researchers and 'insiders' to develop this case study and to juxtapose what we have seen and lived with what was suggested by the donor foundation through tender notices, guidelines and formal meetings. We combined direct observation and participation with document research and analysis to support our arguments. Our opinions come from the interweaving of practice and reflexivity, thus through Participatory Action Research (Chevalier & Buckles, 2013; Rahman, 2008). More generally, this study follows a post-positivist paradigm 'that can be participative, collaborative, inductive, idiographic and exploratory' (O'Leary, 2010, p. 4) as opposed to positivist research design, which tests a hypothesis. This study does not state a major hypothesis; it is exploratory, aiming at increased understanding of the problem of CD inception and designing.

Discussion

In 2007, the foundation published guidelines, which included the conditions a potential area would need to meet to develop a CD, and some methodological criteria. These excerpts (tender notice, pp. 27–29) are typical (emphasis added by authors):

> In the *CD*, landscaping, monumental and artistic heritage has a central significance for the development strategy of the area […] interventions on tangible heritage aim at human capital growth, the production and dissemination of knowledge, the updating and the consolidation of both individual and collective sensibilities […] The delimitation of the potential district is firstly related to the identification and recognition of a territory by its own inhabitants […] and affects the composition of the group of stakeholders involved […] the active role of the local community is crucial for the construction of a district […] the *CD* is not simply guided by marketing strategies […] the operations of social inclusion and those of vocational training linked to new cultural and technological activities become important […] the true economic benefit of investments in culture is the creation of a favourable climate for innovation, in all fields […] the model of a mono-thematic district, specialised around a single value chain, responds to a limited extent to the search for the best ways to enhance the cultural heritage in its systemic correlation with the territory […] in general it is required that a body, with powers and competencies on the area, should take charge of the project and assume the role of overseer of the establishment of partnerships and of implementation mechanisms of planned interventions […]

These conditions reflect a conception of the CD similar to the system-wide model devised by Sacco et al. (2008) and Sacco et al. (2013), in particular in terms of learning and innovation perspectives, which are intended as fundamental elements, despite the greater emphasis placed by the foundation on tangible heritage, which arises from the guidelines and the meetings.

In the same guidelines, the foundation published minimum information requirements for a feasibility study to support the final selection and co-financing, in six sequential sections: first, a detailed assessment of the local context as a potential CD. This assessment would highlight socio-economic and cultural peculiarities of the area, and the system of relationships among key stakeholders; second, the precise definition of the strategic objectives, and the system of actions for economic development of the territory. This section would include the strategic plan for territorial integration and the partners to be involved; third, a detailed description of interventions in both tangible and intangible assets, and a detailed communication guideline for inner and outer stakeholders; fourth, an analytical definition of management methods, governance models,

management plans and the reasons underlying these choices, as well as their sustainability from an organizational and financial perspective; fifth, the definition of the financial plan and a cost–benefit analysis of actions, assessing all investments and direct and indirect economic impacts referring to the mid-range period (5–10 years) and finally, a detailed time schedule for the required actions and the CD development.

Therefore, the foundation required a very precise pattern from the earliest stages. This excerpt from the section 'definition of the strategic objectives' is typical (p. 8):

> The feasibility study *must clearly present* the project objectives in terms of: externalities of the system, coming from the new cultural ties that will be established among cultural assets involved in the project and among these and other cultural and non-cultural assets of the territory; consumption externalities, resulting from expected increases in terms of demand for the cultural offer; economies of scale and/or economies of scope, arising from potential economic benefits coming from the integration of functions and activities related to the processes of maintenance and enhancement of the cultural heritage of the area. (emphasis added by authors)

The guidelines depict a process of design that extols the virtues of full anticipation and completeness. Maybe this is understandable: large financial resources are involved, and there is a need for reporting and accountability. However, the feasibility study, according to the guidelines, appears quite similar to the steps of 'conception, initiation, analysis and design' used in highly structured physical environments such as construction of buildings, motorways and bridges. The guidelines implicitly depict an ideal process of design, driven by full rationality.

> Completeness allows for the pre-specification of a problem, the identification of pre-existing alternatives and the choice of the best solution. For such an approach to work, however, there needs to be a clear and stable boundary between the entity being designed and the context for which it is being designed. Such a boundary makes it possible to fix the purpose of a design based on a stable set of user preferences and performance expectations. (Garud, Jain, & Tuertscher, 2008, p. 351)

Nevertheless, a CD is undeniably socially constructed and steeped in social complexity. The boundary between the entity being designed and the social context is neither clear nor stable. The CD itself is intended to stimulate socio-economic changes. Indeed, during the 'conceptualization and design' phase, we faced a high degree of complexity and a need for openness and flexibility rather than full anticipation and completeness.

A first element of complexity we faced is derived from the general aims of a CD as a model for socio-economic development, as also required by the foundation. First of all, it includes the restoration of strategically located buildings and monuments, and then human capital growth, occasions of learning and the production and dissemination of knowledge, updating and consolidation of both individual and collective sensibilities, interrelations with various subsystems (cultural, tourism, economic, etc.) and the whole of the surrounding society, and the creation of a favourable climate for innovation, in all fields, through interdependencies among a multitude of actors in different sectors. Although more interdependencies can be useful for innovation and development aims, they also increase the complexity of a system (Trist, 1983) because of the web of feedback loops (Anderson, 1999). The references to related complex economic and tourism systems (Farrell & Twining-Ward, 2004) and to surrounding society would be sufficient alone to indicate the complexity of the CD.

The main initiatives planned at the beginning included: actions to develop the local culture (e.g. an initial conference to present the foundation project to the local community; interventions for the development of managerial competencies for local cultural and noncultural operators; interventions for the development of specific competencies related to a CD; periodic interventions disseminated in local schools; seminars and workshops for the promotion of integrated activities between the cultural and other characteristic sectors of the territory) and consolidation work or enhancement of cultural heritage (with particular focus on the recovery and restoration of artistic and architectural heritage, but also maintenance and enhancement of local ancient routes of historic and artistic relevance; the valorization of the local musical tradition and folklore; the realization of a digital historical atlas of the territory; a regional cultural information system; a unified website portal of culture for the whole territory; mapping and coordination of ancient roads to make them usable, with road signs, GPS and multimedia systems), in addition to a diffused and systematic information and promotion plan for tourism aims.

At the end of phase 3, the main purposes of the CD were specified as the enhancement of the terraced landscaping, the recovery and restoration of artistic and architectural heritage, the support of local food and wine industries through innovative technologies, and the improvement of knowledge and awareness of local cultural heritage, for both residents and tourists. Recent access to the CD's website shows, concisely, adjustments, refinements and brand new actions not previous planned.

The high number of interventions in tangible assets illustrated not only a complicated system, due to their connections within a coherent strategy, but also an element of complexity. Tangible cultural goods, monuments, buildings, ancient roads and land relating to industrial and agricultural activities, to name but a few, were often established many years ago and still characterize the territory in question. Their reproduction or modification cannot be seen as separate from the overall societal and more intangible conditions: tangible cultural heritage is the concomitant of intangible elements of a local culture, and vice versa (Cooke & Lazzeretti, 2008) and recursive feedback among tangible and intangible aspects cannot be isolated (Næss, 2015).

The geographic extent of the area (more than 3000 km2; more than 150,000 inhabitants), including an Alpine province and four mountain communities (with 18 local municipalities), added complexity. In fact, the district itself might well have its own long-term agenda, perhaps slightly at odds with the specific interests of the municipalities and the political short-term intentions of local representatives. For example, some local administrators, far more interested in local restructuring or maintenance interventions and restrained by years of funding shortfalls, pushed for interventions not strategically consistent with the overall CD's aims. Sometimes we perceived opportunistic behaviours hidden by the rhetoric of cultural policy (Belfiore, 2009).

Due to the huge financial investment (8 million Euros), the donor foundation called for equal co-financing from local partners and pushed for rigorous business plans and accountability. Most interestingly, in relation to the acceptance and selection of the whole project for phase 4, co-financing from the foundation would be disbursed fully, in accordance with pre-approved business plans. Awareness of this mechanism pushed to maximize the co-financing request, leading to a frantic search for local backers, taking up most of the effort and attention available. The problem that we often perceived was a dysfunctional transposition of means with ends.

Another element of complexity came from the increasing number of project partners involved (from 5 at the beginning to 17), including firms, banks, two foundations and the mountain communities representing many municipalities. As new partners were involved, self-organized and informal coalitions emerged, with new ideas and alternative aims of development. Most importantly, the vision and the main goals of the CD emerged more clearly only at the end of phase 3, along with some of the 'best' ideas, almost reversing the sequential process laid out in the

guidelines. This is coherent with the arguments made by scholars such as Næss (2015) – that goal-oriented planning might typically be conceived as a multiple-goal situation rather than the single-minded pursuit of one, or a few, goals – and Clegg (2000) – that design itself is systemic rather than linear, because all aspects of a system are interconnected – and Dunbar and Starbuck (2006) – that the design includes iterations and is essentially problematic and non-deterministic.

Concerning the inhabitants, what was stated by the foundation's guidelines and tender notices explicitly or implicitly referred to the issues of stakeholder engagement (Clarkson, 1995; Freeman, 1984; Friedman & Miles, 2006; Noland & Phillips, 2010) and communicative and participatory planning processes for goal formulation (Næss, 2015). On the one hand, wider engagement of stakeholders (as 'adaptive agents') gives a CD the potential to perform tasks that are more complicated, encouraging cross-fertilizations, knowledge exchange and innovation. On the other hand, wider stakeholder engagement leads to the emergence of increasingly complex phenomena because of potential interdependencies between greater multitudes of actors, sometimes with conflicting aims (Trist, 1983). As participant researchers, we were aware of the difficulties in aiming at consensus building among all stakeholders, as already argued in the literature (e.g. Fung, 2006; Næss, 2015). Nonetheless, the guidelines required wide stakeholder engagement during designing.

Fung (2006) describes six main ways of communication and decision-making in participatory settings, ranging from the least intense participation to the most intense degree: stakeholders…'Listen as spectator[s]', 'Express preferences', 'Develop preferences', 'Aggregate and Bargain', 'Deliberate and Negotiate', 'Deploy Technique and Expertise'. He distinguishes the selection of participants in decision-making ranging from the most exclusive – labelled 'State' (Expert Administrators and Elective Representatives) – to the middle level – labelled 'Mini-publics' (Professional Stakeholders, Lay Stakeholders, Randomly Selected, Open Targeted Recruited, Open Self-selected) – to the most inclusive – labelled 'Public' (Fung, 2006, pp. 68–69).

We constantly negotiated within the design group an approach aimed at least to collect ideas, suggestions and preferences from 'mini-publics', not underestimating the role of young people and social media. For example, a real issue was not so much to attract talents or the creative class but rather to curb the escape from the mountains of the younger generation. We initially suggested a preliminary workshop to discuss the foundation project with the public and a survey on a statistically significant sample of 1000 inhabitants, but we were forced to reduce the sample to 200 inhabitants and then to reduce the initiative to 50 interviews with key opinion leaders. In the end, the methods 'Listen as spectators' – through seminars and workshops on decisions already taken – and 'State' were followed in phases 2 and 3. An interpretation of this can be rooted in the fact that the design group tried to reduce complexity (Boisot & Child, 1999), limiting the number of agents whose input could influence decision-making, thus allowing decision-making to be more 'controllable' at the cost of openness and 'bottom-up emergence'.

Both theory and our direct experience support our arguments that a system-wide CD can be usefully conceived as a CAS.

By focusing our attention on designing, we want to highlight a central issue we lived through, the perception of a definite and dysfunctional tension arising between the linear and deterministic perspective driven by the foundation's requirements and guidelines and the actual process of design as we experienced it (Table 1) during the 'conceptualization and design' phase.

In our opinion, inspired by the Scott and Davis' (2007, pp. 28–32) classification, this tension is firstly characteristic of different ways of conceiving organizations, organizing and designing and, in sum, of the structure–agency relationship (Archer, 2000).

Table 1. The tension between the formal process and the process in action.

The formal process (as depicted in the guidelines)	The process in action (as we experienced it)
A sequential scheme of 'next steps'. The approval of the feasibility study was intended to unlock the entire co-financing of the foundation	The phases of the feasibility study were carried out in parallel. The financial plan represented the first real starting point, often with a transposition of means with ends
No reference to the possibility of conflicts and complex negotiations in the definition of the strategic objectives (nor how to address and report them)	The 'conception, initiation, analysis and design' of the CD arose from complex power negotiations among a few stakeholders, conflicts, ongoing reviews of problems and alternative solutions, with important processes of reflection and learning by doing and by interacting
A clear vision of the project required from the earliest stages	Some fundamental aspects of the project emerged only at the end
Identification and widest possible involvement of stakeholders, but no reference to alternatives of participatory design	The designing of participation mechanisms is a complex task itself. In the end, only a few important stakeholders were involved administrators and agencies for local development)
'Completeness' required in all parts. The feasibility study would lead to the conception, initiation, analysis and design of a CD, to be then constructed (like a reified object, a building, a bridge)	The project constantly evolved over time, like a living being (e.g. in terms of goals and actions). New actions, initiatives, linkages with other projects, etc., as inferred from the limited sources of official information available at the time of writing, were added later, during phase 4
The feasibility study would clearly present the project objectives in terms of cultural externalities of the systems, consumption externalities, and economies of scale and/or economies of scope	Many outputs, outcomes and externalities of the project could only be estimated very roughly, being mostly unpredictable. A set of indicators of 'cultural districtualization' was proposed, but with little success. At the time of writing, there is no evidence of public information about these or similar indicators
The guidelines seemed to hypothesize an 'absolute' rationality of the designer	We experienced in the field a very 'bounded' rationality and a nexus of social relationships which diverges from absolutely rational behaviours

The rational perspective conceives organizations as instruments to achieve rational goals, with rational calculation and clear preferences, goal specificity, formalized planning and translation of plans into specific objectives, formalization of structure and processes to make behaviours predictable by standardizing and regulating them.

The natural perspective emphasizes that organizations are collectives whose participants are pursuing multiple interests, both disparate and common, but who recognize the value of perpetuating the organization as an important resource. Organizations are social groups attempting to survive, and goal complexity arises due to the contextual presence of formal and informal structures, 'stated vs. real goals' and parallel goals.

The open perspective sees organizations as conglomerations of interdependent flows and activities linking shifting coalitions of participants, embedded in wider material resource and institutional environments.

Combining this classification with closure and openness, Scott and Davis (2007) propose four predominant systems: closed-rational, closed-natural, open-rational and open-natural. Theories and approaches under the first perspective conceive organizations as 'tools to achieve pre-set ends' and largely ignore the feedbacks of the 'environment'. They prescribe guidelines for how to govern activity and achieve rationality. Many of the classic organizational design approaches fall under this perspective (Scott & Davis, 2007).

However, we can safely argue that the concept of a CD is closer to that of an open system. Notably, a constitutive approach for a system-wide CD, that is learning, falls into the open-natural systems cross-classification. From this perspective, organizations learn from experience though they often suffer from poor information processing, which is also due to the important time lag between the influence of surroundings on actions and vice versa (Næss, 2015). Actions can even precede rather than follow goals, within the context of imprecise or unstable preferences (Scott & Davis, 2007), as we experienced in the field.

In short, we argue that a primary element of the tension we lived came from the erratic juxtaposition made by the foundation between two very far perspectives. The first conceives a CD as a learning-oriented open system to facilitate opportunities for training, learning, innovation, creativeness, emergence of the unexpected and non-familiar, and change, and it is coherent with the conception of a system-wide CD. The second pushes an approach to analysis and design as if a CD were a rational system, a reified and fairly stable object. Paraphrasing Farrell and Twining-Ward (2004, p. 277), we lived out a tension between a linear, predictable, deterministic, cause-and-effect approach forced to operate in an area that is largely nonlinear, integrative, generally unpredictable, qualitative and characterized by the potential for multiple outcomes.

This tension was dysfunctional in terms of, for example: inefficiencies and redundancy of activities (e.g. delays, wasting time and resources); transpositions of means with ends and defocusing from project aims (e.g. the frantic search for local financing); the opacity and elitism of decision-making (e.g. lack of transparency and narrow stakeholder engagement). Such 'dysfunctional tension' is symptomatic of a wicked problem (Rittel & Webber, 1973), and of a forced post-hoc formalization of a different resultant design, to comply with the formal requirements.

Recently, the concept of wicked problems has gained attention in many design circles. Often, using the term 'wicked' to describe design problems means that design itself is viewed as a complex activity. Based on our experience, we argue that a system-wide CD is too complex to be constrained by an overly rationalistic designing approach. Complexity theory and CAS can be seen as a useful collection of ideas that suggest a more holistic and bottom-up approach to understanding and designing complex organizations.

If the conception of a CD as a CAS were accepted, as our explorative aim would suggest, we argue that the design process would be conceived as something more flexible, dynamic and in evolution. Indeed, we found ourselves uncomfortable when forced into using a linear and deterministic approach and would be more at ease with suggestions from recent literature on organizational design, which emphasizes pragmatic implementation, creative experimentation and contextual learning occurring at the same time (e.g. Dunbar and Starbuck, 2006; Romme, 2003). As we experienced directly, designing is essentially problematic and non-deterministic, and often starts from 'open', 'incomplete' and 'multiple' goals (Dunbar & Starbuck, 2006; Næss, 2015). Dunbar and Starbuck (2006) argue that since designers almost always misunderstand to some degree, their efforts become experiments that might not turn out as predicted.

However, this does not suggest inhibiting any attempt at prediction or planning. At the level of analysis and development (left side of Figure 2), the use of qualitative analysis and rough estimations and/or agent-based modelling can represent a fertile ground for both future research and managerial/policy-making implications. It is also a necessary condition for system-wide CDs' designers that the impact of proposed solutions can be predicted, to some extent. However, the thin red line is represented by what we mean by 'to some extent'. As suggested by Næss (2015), designers' predictions about the impact of alternative solutions are of a 'softer' nature when compared with the predictions made, for instance, by traffic engineers. Most often, alternative solutions can be discussed and compared only qualitatively, or are at least limited to simple calculations and crude estimates, due to the social phenomena involved (Næss, 2015).
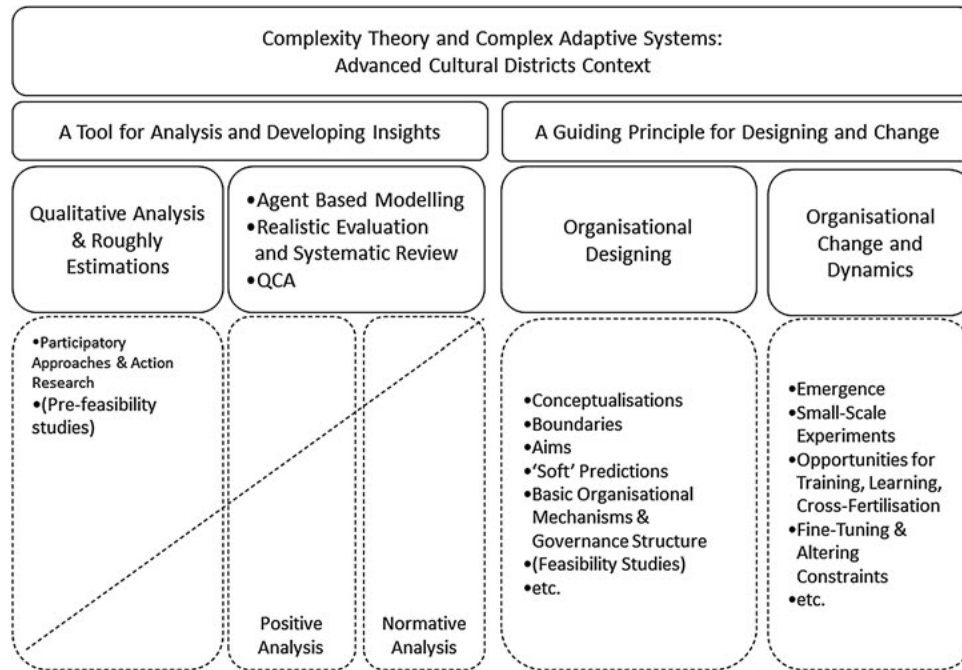
Figure 2. Examples of applicability of complexity theory and CAS approach in the context of CD. Source: Adapted from Gupta and Anish (2009).

In our experience, many outputs, outcomes and externalities of the project could be estimated only very roughly, being practically unpredictable (Table 1). Moreover, of the multiple outcome/performance indicators required by the foundation – and roughly assessed at the beginning – there is no trace, to date, within publicly available information on the website of the CD in question.

Another promising approach to understanding and analysing CAS is Realistic Evaluation and Systematic Review, which has its roots in complexity theory and critical realism and considers social interventions to be 'complex systems thrust amidst complex systems' (Pawson, 2006, p. 25). Another possible method, Qualitative Comparative Analysis, facilitates the analysis of empirical social data to explore how in different cases social factors combine in different configurations in different contexts to produce different patterns of outcomes (Byrne & Ragin, 2010).

Conclusions

In this work, we emphasized the dysfunctional tension that can arise in the case of incongruence between analytical frameworks of linear causality that extol the virtues of anticipation and completeness, and the actual and very different designing in action. We highlighted the main elements of ineffectiveness and inefficiency due to the erratic juxtaposition made by the donor foundation between the concept of a CD as a learning oriented open system – intended also to valorize the unexpected and the non-familiar (i.e. emergence) – and approaching analysis and design as if a system-wide CD were a rational system. Then we proposed that complexity theory and CAS should move understanding of system-wide CDs towards a more holistic and bottom-up approach.

In a CAS, agents must have some level of autonomy and the ability to process information and to adapt their behaviour. This also means that agents must have 'access' to information. Since a CD's heart should be represented by initiatives involving the local community, the issue of stakeholder engagement arises. Human diversity is the key to the creation of richer patterns of interactivity,

leading, for example, to enhanced creativity and innovation (Lazzeretti et al., 2012; McMillan, 2004). Therefore, we suggest:

> Proposition 1: For system-wide CD aims, designers, policymakers and managers should recognize and nurture relationships between individuals, groups and organizations, promoting opportunities for engagement, training, learning and cross-fertilization between cultural and non-cultural sectors.

Future studies would inform us better, not only in terms of 'Analysis and Developing Insights' (left side of Figure 2) but also in terms of 'Designing and Change' principles (right side of Figure 2) with regard to CDs, with particular reference to innovation and stakeholder engagement. In the cultural domain, the widest possible participation of communities, groups and individuals is encouraged by UNESCO (2003, Art. 15). Nevertheless, how can we avoid the paradox between the need to open up the design and change processes to local stakeholders and the inevitable conflicts that may arise as the 'exclusive design advisory circle' is extended? We think this is an issue in some ways similar to the one successfully faced in other 'innovative' contexts of product/service design through open and user-driven innovation approaches (Baldwin & von Hippel, 2011; Chesbrough, Vanhaverbeke, & West, 2006; von Hippel, 2005; Lee, Hwang, & Choi, 2012), which encourage participation and greater permeability of boundaries between organizations, designers and stakeholders. Insights for further studies and policy-making could therefore come from these research fields. Moreover, as argued by Fung (2006, p. 67), the mechanisms of direct participation are not a strict alternative to political representation or expertise, but instead complement them. For example, in defining the vision of a CD, the broad involvement of inhabitants can be useful, democratic and legitimizing. With regard to engineering choices when restructuring a historic building, it might be more appropriate to involve experts firstly, and then encourage the engagement of inhabitants through workshops. Other authors (e.g. Bryson, Quick, Slotterback, & Crosby, 2013) suggest that effective public participation processes are grounded in analysing the context closely, identifying the purposes of the participation effort, and iteratively designing and redesigning the process accordingly.

Since the success of a CAS lies in the borders between stability and instability (Stacey, 1996), we suggest:

> Proposition 2: System-wide districtualization is a never-ending process, and must not be conceived as a 'turnkey' project delivered by external experts.

This is specifically related to the previous proposition, and to emergence and incompleteness. We agree with Næss (2009) that, since conditions and impacts are often highly context-dependent and vary between stakeholder groups, theoretical expert knowledge should be supplemented with local knowledge and the direct experiences of different stakeholder groups. We suggest avoiding a 'turnkey' project approach from consultants and theoretical experts, although the temptation can be strong, as demonstrated by our direct experience. Future studies would inform us better about this specific issue.

Since agents within a CAS are unable to control the long-term future (McMillan, 2004), we suggest:

> Proposition 3: The use of small-scale experiments and 'prototypes' might be a more plausible way to introduce changes, rather than fast large-scale interventions for system-wide districtualization.

Firstly, CASs are able to create emergent outcomes (McMillan, 2004) and, secondly, many authors argue that districtualization is basically spontaneous and it can only be recognized and sustained (Lazzeretti, 2003; Stern & Seifert, 2007). In addition to initial funding ('import of energy') acting as a spark plug that can trigger the process, we suggest that a certain tension over time can be useful to sustain it. For example, in our case study the approval of the feasibility study was intended to unlock the entire co-financing of the foundation, bringing about a dysfunctional transposition of means with ends (Table 1). A correction could be made, for example, by unlocking multiple separate tranches of the financing, based on both foreseen and emerging results actually achieved, subsequent to the initial funding. Further research is needed on this issue.

Since detailed strategic plans and goals should be avoided in a CAS, in favour of a focus on creating the right environment for emergence (McMillan, 2004), we suggest:

> Proposition 4: Strict hierarchical central controlling mechanisms might be replaced by network structures and distributed influences in system-wide districtualization.

Therefore, insights that might inform further studies and policy-making could come from research fields on the governance of public networks (e.g. Provan & Kenis, 2008).

We are aware of the limitations of our work. Firstly, our evidence comes from a single explorative case study. Secondly, our experience is necessarily limited to the 'conceptualization and design' phase. However, if the conception of a system-wide CD as a CAS is accepted, further opportunities for research, as suggested above, may arise, using ideas from complexity theory to inform theoretically grounded considerations about a CD's dynamic, or to provide new impetus to participatory approaches and action research. These new approaches might stress the role of local knowledge and action, and the negotiated nature of social change among multiple stakeholders. Crucially, this is not a position against planning or evidence, but a recognition of the limitations of what can be planned in detail.

Disclosure statement

References

Anderson, P. (1999). Perspective: Complexity theory and organization science. Organization Science, 10(3), 216–232. doi:10.1287/orsc.10.3.216

Archer, M. S. (2000). Being human. The problem of agency. Cambridge: Cambridge University Press.

Arnaboldi, M., & Spiller, N. (2011). Actor-network theory and stakeholder collaboration: The case of cultural districts. Tourism Management, 32(3), 641–654. doi:10.1016/j.tourman.2010.05.016

Bakhsi, H., & Throsby, D. (Eds.) (2010). Culture of innovation. An economic analysis of innovation in arts and cultural organisations. London: Nesta.

Baldwin, C., & von Hippel, E. (2011). Modeling a paradigm shift: From producer innovation to user and open collaborative innovation. Organization Science, 22(6), 1399–1417. doi:10.1287/orsc. 1100.0618

Becattini, G. (2000). Il distretto industriale. Un nuovo modo per interpretare il cambiamento economico. Turin: Rosenberg and Sellier.

Belfiore, E. (2009). On bullshit in cultural policy practice and research: Notes from the British case. International Journal of Cultural Policy, 15(3), 343–359. doi:10.1080/10286630902806080

Boisot, M., & Child, J. (1999). Organizations as adaptive systems in complex environments: The case of China. Organization Science, 10(3), 237–252. doi:10.1287/orsc.10.3.237

Bryson, J. M., Quick, K. S., Slotterback, C. S., & Crosby, B. C. (2013). Designing public participation processes. Public Administration Review, 73(3), 23–34. doi:10.1111/j.1540-6210.2012.02678.x

Byrne, D., & Ragin, C. (2010). A handbook of case based methods. London: Sage.

Casti, J. (1994). Complexification: Explaining a paradoxical world through the science of surprise. New York, NY: Harper Collins.

Chesbrough, H., Vanhaverbeke, W., & West, J. (Eds.). (2006). Open innovation: Researching a new paradigm. London: Oxford University Press.

Chevalier, J. M., & Buckles, D. J. (2013). Participatory action research: Theory and methods for engaged inquiry. London: Routledge.

Cinti, T. (2008). Cultural clusters and districts: The state of the art. In P. Cooke & L. Lazzeretti (Eds.), Creative cities, cultural clusters and local economic development (pp. 70–92). Cheltenham: Edward Elgar.

Clarkson, M. (1995). A stakeholder framework for analyzing and evaluating corporate social performance. Academy of Management Review, 20(1), 92–117. doi:10.5465/AMR.1995.9503271994

Clegg, C. W. (2000). Socio-technical principles for system design. Applied Ergonomics, 31, 463–477. doi:10.1016/S0003-6870(00)00009-0

Cooke, P. (2012). Complex adaptive innovation systems: Relatedness and transversality in the evolving region. Cheltenham: Edward Elgar.

Cooke, P., & Lazzeretti, L. (Eds.). (2008). Creative cities, cultural clusters and local economic development. Cheltenham: Edward Elgar.

Currid, E. (2007). The economics of a good party: Social mechanics and the legitimization of art/culture. Journal of Economics and Finance, 31(3), 386–394. doi:10.1007/BF02885728

Desrochers, P. (2001). Geographical proximity and the transmission of tacit knowledge. The Review of Austrian Economics, 14(1), 25–46. doi:10.1023/A:1007803520748

Dunbar, R. L. M., & Starbuck, W. H. (2006). Learning to design organizations and learning from designing them. Organization Science, 17(2), 171–178. doi:10.1287/orsc.1060.0181

Farrell, B., & Twining-Ward, L. (2004). Reconceptualizing tourism. Annals of Tourism Research, 31, 274–295. doi:10.1016/j.annals.2003.12.002

Florida, R. (2002). The rise of the creative class: And how it's transforming work, leisure, community and everyday life. New York, NY: Basic Books.

Florida, R. (2005). The flight of the creative class: The new global competition for talent. New York, NY: Harper Collins.

Freeman, R. E. (1984). Strategic management: A stakeholder approach. Boston, MA: Pitman.

Friedman, A. L., & Miles, S. (2006). Stakeholders: Theory and practice. Oxford: Oxford University Press.

Frost-Kumpf, H. A. (1998). Cultural districts handbook: The arts as a strategy for revitalizing our cities. Washington, DC: Americans for the Arts.

Fung, A. (2006). Varieties of participation in complex governance. Public Administration Review, 66, 66–75. doi:10.1111/j.1540-6210.2006.00667.x

Garofoli, G. (1994). Economic development, organisation of production and territory. In G. Garofoli & A. Vazquez Barquero (Eds.), Organization of production and territory: Local models of development (pp. 7–27). Pavia: Gianni Iuculano Editore.

Garud, R., Jain, S., & Tuertscher, P. (2008). Incomplete by design and designing for incompleteness. Organization Studies, 29(3), 351–371. doi:10.1177/0170840607088018

Gell-Mann, M. (1995). What is complexity? Remarks on simplicity and complexity by the Nobel prize-winning author of The Quark and the Jaguar. Complexity, 1(1), 16–19. doi:10.1002/cplx.6130010105

Gupta, A., & Anish, S. (2009, October). Insights from complexity theory: Understanding organizations better. tejas@IIMB. An initiative of IIMB Management Review. Retrieved from http://tejas.iimb.ac.in/articles/12.php

Hilpert, U. (2006). Knowledge in the region: Development based on tradition, culture and change. European Planning Studies, 14(5), 581–599. doi:10.1080/09654310500500213

von Hippel, E. (2005). Democratizing innovation. Cambridge: The MIT Press.

Hitters, E., & Richards, G. (2002). The creation and management of cultural clusters. Creativity and Innovation Management, 11(4), 234–247. doi:10.1111/1467-8691.00255

Jakob, D. (2010). Constructing the creative neighborhood: Hopes and limitations of creative city policies in Berlin. City, Culture and Society, 1(4), 193–198. doi:10.1016/j.ccs.2011.01.005

Kilduff, M., Tsai, W., & Hanke, R. (2006). A paradigm too far? A dynamic stability reconsideration of the social network research program. Academy of Management Review, 31(4), 1031–1048. doi:10.5465/AMR.2006.22528168

Landry, C. (2000). The creative city: A toolkit for urban innovators. London: Earthscan.

Lazzaretti, L. (2001). I processi di distrettualizzazione culturale della città d'arte: il cluster del restauro artistico di Firenze. Sviluppo Locale, 8(18), 61–85. sici:1974-2193(2001)8:18<61:IPDDCD>2.0.ZU;2-9

Lazzeretti, L. (2003). City of art as a HC local system and cultural districtualisation processes. The cluster of art-restoration in florence. International Journal of Urban and Regional Research, 27(3), 635–648. doi:10.1111/1468-2427.00470

Lazzeretti, L. (2012). Creative industries and innovation in Europe: Concepts, measures and comparative case studies. London: Routledge.

Lazzeretti, L., Capone, F., & Boix, R. (2012). Reasons for clustering of creative industries in Italy and Spain. European Planning Studies, 20(8), 1243–1262. doi:10.1080/09654313.2012.680585

Le Blanc, A. (2010). Cultural districts, a new strategy for regional development? The South-East cultural district in Sicily. Regional Studies, 44(7), 905–917. doi:10.1080/00343400903427936

Lee, S. M., Hwang, T., & Choi, D. (2012). Open innovation in the public sector of leading countries. Management Decision, 50(1), 147–162. doi:10.1108/00251741211194921

Lewin, A. Y. (1999). Application of complexity theory to organization science. Organization Science, 10(3), 215. doi:10.1287/orsc.10.3.215

Lorenzini, E. (2011). The extra-urban cultural district: An emerging local production system: Three Italian case studies. European Planning Studies, 19(8), 1441–1457. doi:10.1080/09654313.2011. 586179

Mansfield, J. (2010). Nature of change or the law of unintended consequences: An introductory text to designing complex systems and managing change. London: Imperial.

Martin, R., & Sunley, P. (2006). Path dependence and regional economic evolution. Journal of Economic Geography, 6(4), 395–437. doi:10.1093/jeg/lbl012

McMillan, E. (2004). Complexity, organizations and change. New York, NY: Routledge.

Miller, J. H., & Page, S. E. (2007). Complex adaptive systems: An introduction to computational models of social life. Princeton, NJ: Princeton University Press.

Næss, P. (2009). Residential self-selection and appropriate control variables in land use: Travel studies. Transport Reviews, 29(3), 293–324. doi:10.1080/01441640802710812

Næss, P. (2015). Critical realism, urban planning and urban research. European Planning Studies, 23(6), 1–17. doi:10.1080/09654313.2014.994091

Noland, J., & Phillips, R. (2010). Stakeholder engagement, discourse ethics and strategic management. International Journal of Management Reviews, 12(1), 39–49. doi:10.1111/j.1468-2370.2009.00279.x

OECD. (2005). Culture and local development. Paris. Retrieved from http://www.paca-online.org/cop/docs/OECD_Culture_and_Local_Development.pdf

O'Leary, Z. (2010). The essential guide to doing your research project. London: SAGE.

Pawson, R. (2006). Evidence-based policy: A realist perspective. London: Sage

Pierantoni, L. (2014). Governing regional development through culture and creativity: The case of the Veneto region. European Planning Studies, 23(5), 963–978. doi:10.1080/09654313.2014.915013

Porter, M. E. (1990). The competitive advantage of nations. New York, NY: The Free Press.

Prigogine, I., & Stengers, I. (1984). Order out of chaos: Man's new dialog with nature. New York, NY: Bantam Books.

Provan, K. G., & Kenis, P. (2008). Modes of network governance: Structure, management, and effectiveness. Journal of Public Administration Research and Theory, 18, 229–252. doi:10.1093/jopart/mum015

Rahman, M. A. (2008). Some trends in the praxis of participatory action research. In P. Reason & H. Bradbury (Eds.), The Sage handbook of action research: Participative inquiry and practice (pp.49–62). London: Sage.

Richards, G., & Wilson, J. (Eds.). (2007). Tourism, creativity and development. London: Routledge.

Rittel, H., & Webber, M. (1973). Dilemmas in a general theory of planning. Policy Sciences, 4(2), 155–169. doi:10.1007/BF01405730

Romme, A. G. L. (2003). Making a difference: Organization as design. Organization Science, 14, 558–573. doi:10.1287/orsc.14.5.558.16769

Sacco, P. L., Ferilli, G., Blessi, G. T., & Nuccio, M. (2013). Culture as an engine of local development processes: System-wide cultural districts I: Theory. Growth and Change, 44(4), 555–570. doi:10.1111/grow.12020

Sacco, P. L., Tavano Blessi, G., & Nuccio, M. (2008). Culture as an engine of local development processes: System-wide cultural districts (Art and Industrial Design Working Papers). University IUAV of Venice. Retrieved from http://www.researchgate.net/publication/234167196

Santagata, W. (2002). Cultural districts, property rights and sustainable economic growth. International Journal of Urban and Regional Research, 1(26), 9–23. doi:10.1111/1468-2427.00360

Scott, A. J. (2000). The cultural economy of Paris. International Journal of Urban and Regional Research, 24(3), 567–582. doi:10.1111/1468-2427.00266

Scott, A. J., & Leriche, F. (2005). Les Ressorts Géographiques de l'Économie Culturelle: Du Local au Mondial [Geographical springs cultural economy: From local to global]. L'Espace Géographique, 34(3), 207–222. ISBN: 9782701141657

Scott, R. W., & Davis, G. F. (2007). Organizations and organizing. Rational, natural, and open system perspectives. NJ: Pearson.

Stacey, R. D. (1996). Complexity and creativity in organizations. San Francisco, CA: Berrett-Koehler.

Stern, M. J., & Seifert, S. C. (2007). Cultivating "natural" cultural districts. Creativity & Change. Social Impact of the Arts Project, University of Pennsylvania's School of Social Policy & Practice. Retrieved from http://www.trfund.com/resource/downloads/creativity/NaturalCulturalDistricts.pdf

Trist, E. L. (1983). Referent organization and the development of interorganizational domains. Human Relations, 36, 269–284. doi:10.1177/001872678303600304

UNESCO. (2003, October 17). International convention for the safeguarding of the intangible cultural heritage, Paris. Retrieved from http://www.unesco.org/culture/ich/en/convention

Valentino, P. A. (2003). Le trame del territorio: politiche di sviluppo dei sistemi territoriali e distretti culturali. Milano: Sperling and Kupfer.

Weick, K. E. (1990). Technology as equivoque: Sensemaking in new technologies. In P. S. Goodman & L. Sproull (Eds.), Technology and organizations (pp. 1–44). San Francisco, CA: Jossey-Bass.

Weick, K. E. (1993). The collapse of sensemaking in organizations: The Mann Gulchdisaster. Administrative Science Quarterly, 38, 628–652. doi:10.2307/2393339

Zukin, S. (1995). The cultures of cities. Cambridge: Blackwell.