

URBAN ECOLOGIES AND KEY PROJECTS: INTERCONNECTED APPROACHES TO UNLOCK FRAGILE LOCAL-REGIONAL LANDSCAPES

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FRAGILE LOCAL-REGIONAL LANDSCAPES

Urbanisation processes involve progressions of both concentration and extension and affect the transformation of all categories of landscapes by changing the distribution of resources, competences and decision mandates (Brenner, 2013). Emerging changes in networks, decision-making and growth premises cause vulnerable situations, both in areas of economic growth and in so-called declining environments, and will be discussed here as *fragile urban landscapes*: local-regional spatial situations and contexts suffering from inability for adaptation and transformation, due to for instance rigid planning organisations, or that the physical landscape cannot pursue needed changes to adapt to new conditions and objectives (Björling, 2016). In Swedish contexts, fragile conditions may appear in larger cities and for instance limit transformative capacity due to conflicts of interest between actors or land use claims. In small towns, stagnating economy, decreasing population or other limitations of resources can prevent actual changes. This study examines approaches that can provide planning practice with support to develop future directions for fragile situations and formulate alternative goals or objectives.

The research project has developed through an architectural, design-driven approach and extensive collaboration with local-regional planning practice in the Skaraborg region in Sweden. Participation with planning practice in smaller municipalities has made obvious that urban planning practice needs new concepts to describe and rethink current socio-spatial processes of urbanisation, and tools that support re-negotiation of the urban landscape in its full spectrum and from a multitude of centralities to implement relevant and resource-efficient change.

Our aim here is to clarify problem settings related to fragile urban landscapes and demonstrate how the concepts of *urban ecologies* as complex productive configurations and, through one small example, how *key projects* as specific strategic interventions have been used in the local-regional planning situations at stake to expand the local space of action and to establish conditions for transformations of physical space. This implies partly new mapping processes to identify and combine local resources, bridge gaps between planning and realisation of change, and to formulate development scenarios that involve well-grounded, local potentials and display alternative objectives.

Critical Swedish and international research show that planning and development has a dominating

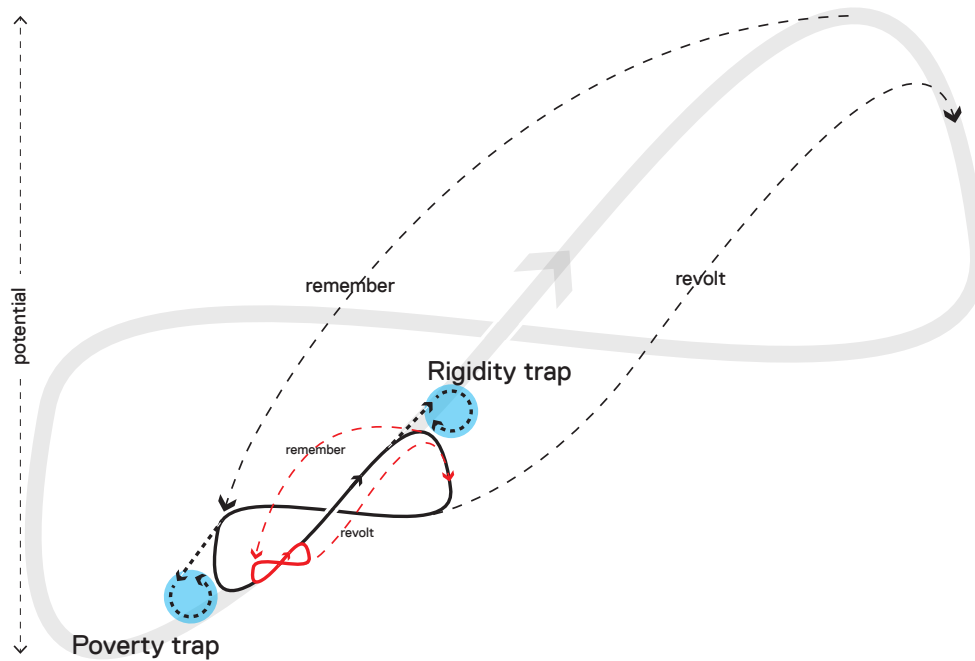


FIGURE 1. (Illustration by Nils Björling, based on the adaptive cycle by Holling (2001))

problem focus set on larger city problems and particularly historic city centres (Massey, 2007; Tunström, 2009; Robinson, 2013; Fredriksson, 2014). The needs for more specific knowledge about sustainable development and integration of smaller municipalities to a post-industrial economy and sustainable development are therefore often neglected. Structural changes cause severe challenges when industry moves to new locations, adjusted to a global market of production and consumption and expansions of local-regional labour markets with direct focus to larger communities as hubs for regional economic growth. There is also a tendency that the economic growth paradigm regards redevelopment processes of smaller municipalities as part of the built-in creative destruction of advanced capitalism, thereby leaving the smaller units in a downgraded socio-economic spiral both on national and regional level. All together these changes form a discursive and material gap between experienced needs to change in order to match with, on the one hand, images of sustainability and success, often asserted as synonymous to the dense and multifunctional city (Tunström, 2009) and, on the other hand, the real preconditions to change the existing urban landscape. Here, *lock-ins* for spatial transformation as part of fragile urban landscapes indicate central problems in the ambitions to set requirements for sustainable development with resilient capacity to handle both immediate and longterm changes.

Fragile urban landscapes derive from site specific conditions but can be generalized as combinations of scarcity of resources, competences and decision mandates and rigidity in current organization. These characteristics can be clarified with the adaptive cycles of a systems, as described by ecologist C.S. Holling (2001), concerning how sustainable change develops in cycles where phases of exploitation and conservation alternate with re-organisation, but that the continuity may also get stuck in two types of exclusions: On the one hand a state of shortage where lack of resources prevents a process to recapture its phase of construction. On the other hand there may be a state of rigidity where the present organization does not open for release and re-organisation. (Figure 1) At the same time, Holling's account for adjustment and "healthy" adaptive cycles must be dealt with carefully when transferred to democratic governmental rights and welfare society's values of for example equality, gender balance and solidarity. Important questions then arise concerning who has the privilege of interpretation and whose adjustment capacity and redevelopment processes will be prioritized (Purcell, 2002).

Of central concern, then, will be that planning processes can visualize how the urban landscapes are articulated and described and how they are concretely assembled, giving different geographical areas preconditions and limitations. The productive capacity of the urban landscape will thereby be a question of how it is arranged and what processes keep it together (Guattari 1989; DeLanda 2006). The urban landscape, as shown by Banham's (2001) seminal work on Los Angeles, can be made visible as over-layered ecologies that establish conditions for society and individuals, and dictate spatial changes and localisations of various functions and programs.

URBAN ECOLOGIES AND KEY PROJECTS

Influenced by Banham (2001) as well as works by Guattari (1989), urban ecologies have been used in our work to expose specific configurations of various components in the urban landscape with the intent to clarify and reveal its productive capacities. In mapping processes, components and relations can be tested in various configurations, and thereby shed light on different possibilities and constraints for transformation. (Figure 2) In this way urban ecologies can be a tool for sorting out capacities as well as limitations of the urban landscape for making changes. At the same time urban ecologies alter the modes in which the urban landscape is valued and what resources emerge, generating a two-way interplay between how the urban landscape and urban ecologies are produced and produce society's and individuals' abilities.

The concept of ecologies is used to emphasize that planning strategies need to consider humans as part of the ecosystems and to operate activities in our environments of both biological and cultural resources (Reed and Lister, 2014). Ecologies also address the need for an understanding of order, control and limitations emerging from dynamic relationships instead of static conditions, and in the navigations and renegotiations that appear in these situations. This reconnects

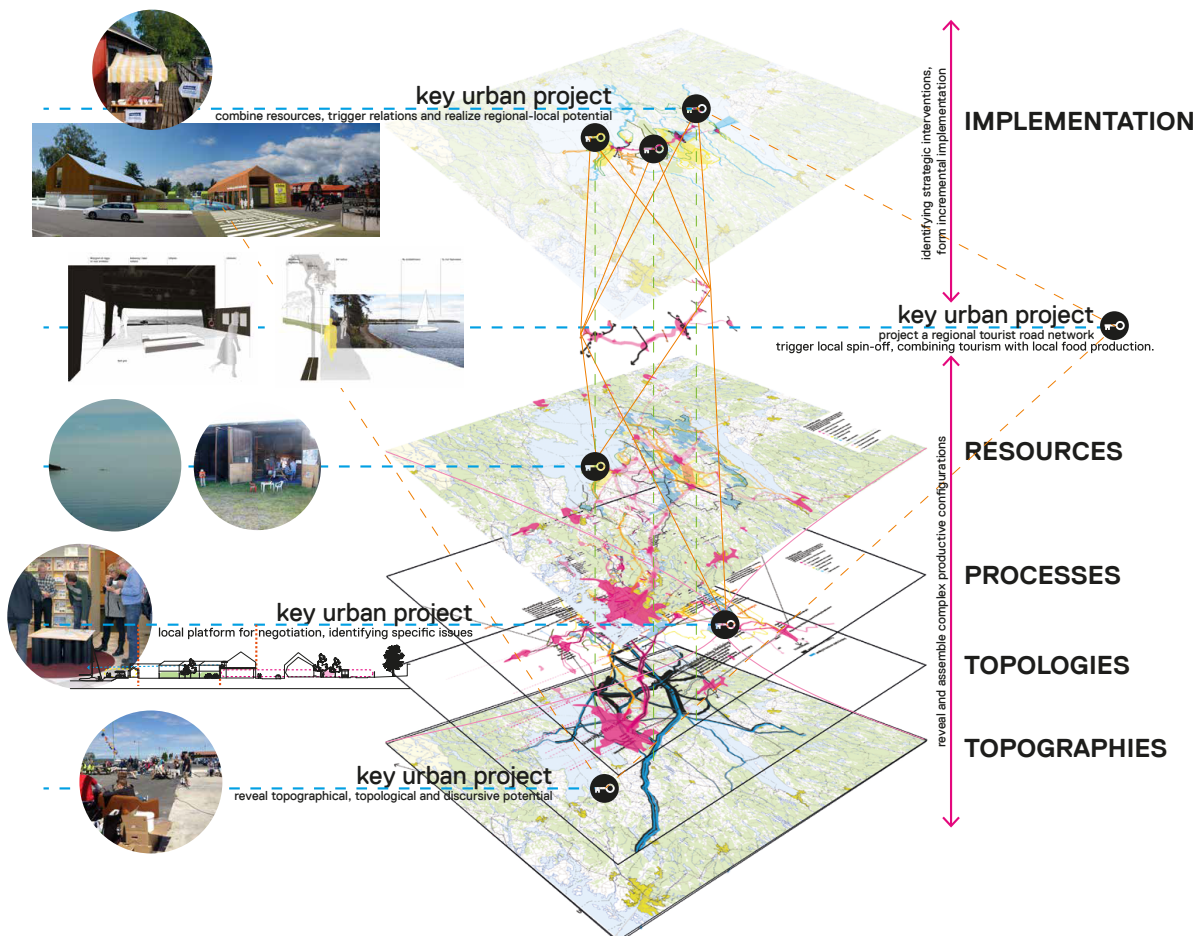


FIGURE 2. (Illustration by Nils Björling)

to recognizing that knowledge about what generates fragile urban landscapes becomes a challenge for urban planning in several ways, for instance because adaptive capacity is connected to stability thresholds measures where also small changes can cause radical systemic changes and an adaptable system conceals what is adapted by including it. Obvious signals of the system's overall need for adjustment is thereby limited and this calls for approaches that can shift scales and perspectives (Holling and Goldberg, 2014).

To formulate and model alternatives to reveal potentials and spatial lock-ins concealed by current situation urban ecologies have been linked to what is here discussed as key projects, i.e. specific strategic interventions with the agency to enhance combined resources. Together these tools have proved to be useful to (i) clarify urban processes, (ii) identify assemblages of relevant contingencies and meaning for specific situations, (iii) reveal local-regional potentials and identify interventions that (iv) combine, re-combine and enhance available local-regional resources (Björling, 2016). Crucial here is to understand key projects from their projective and proformative capacity, that is, their ability to catalyze the change related to intentions in the modelled architectonic project (Cuff and Scherman, 2011). The project must therefore be regarded with outset in a continuously ongoing societal redevelopment process where interventions can be realized in limited time scope but where their effect may have far wider consequences in both time and space. The concept *key* is used to signify the capacity to open preconditions, start processes but also to lock transformations and ensure implementation. It also indicates the need to perform site specific projects for the unique preconditions of each situation, as general strategies lack the precision needed for the diversity of spatial situations.

SKARABORG, GRÄSTORP AND MARIESTAD

The empirical work is based on extensive collaboration with local-regional planning practice in the Skaraborg sub-region in Sweden. This regional area, which constitutes the overall geographical context for the study, is located between the two largest lakes in Sweden and consists of 15 municipalities with altogether 250 000 inhabitants. Since 1998 Skaraborg is part of West Sweden region, *Västra Götalandsregionen*. Due to demographic challenges like ageing population, low education and stagnation of economic growth Skaraborg is in a fragile condition to for example sustain welfare-systems, provide access to new infrastructure and affect directions for future change.

Mapping processes have been conducted continually in the work. Dialogue meetings with all municipalities have been essential to make visible regional differences and reach specific knowledge on resources, relations and barriers. The key projects have in this process been used as adapters between scales and to model alternatives depending on identified problems. By formulating alternatives, resources that are unrecognized in the present context can be disclosed. A central question in continuous dialogues with regional actors and the municipalities has been to clarify the 'concealed' preconditions: If the indicated resources exist, why are they not realized? This shift in perspective has often clarified what kind of spatial lock-ins are occurring and thereafter opened to specify what key projects need to be implemented.

The work has also revealed that aims and objectives for the regional development are directed by the larger cities' challenges and by economic growth as general objectives for planning and governance. Political visions are clearly not grounded in real planning conditions but are shaped as wishing lists for future economic and demographic growth. Planning is therefore based on the dominating economic growth logics which forms Skaraborg as a fragile urban landscape. Instead of formulating alternative development strategies based on accessible resources, the gap is reproduced between future visions and present situation, with the consequences that available resources are suboptimized. At the same time Skaraborg is characterized by extensive exchange between municipalities concerning work, education and recreational activities, also including in-between rural areas. And so, alternative centralities and peripheries can be clarified if city-oriented mapping is challenged by other themes such as biological diversity, tourism or food production as well as

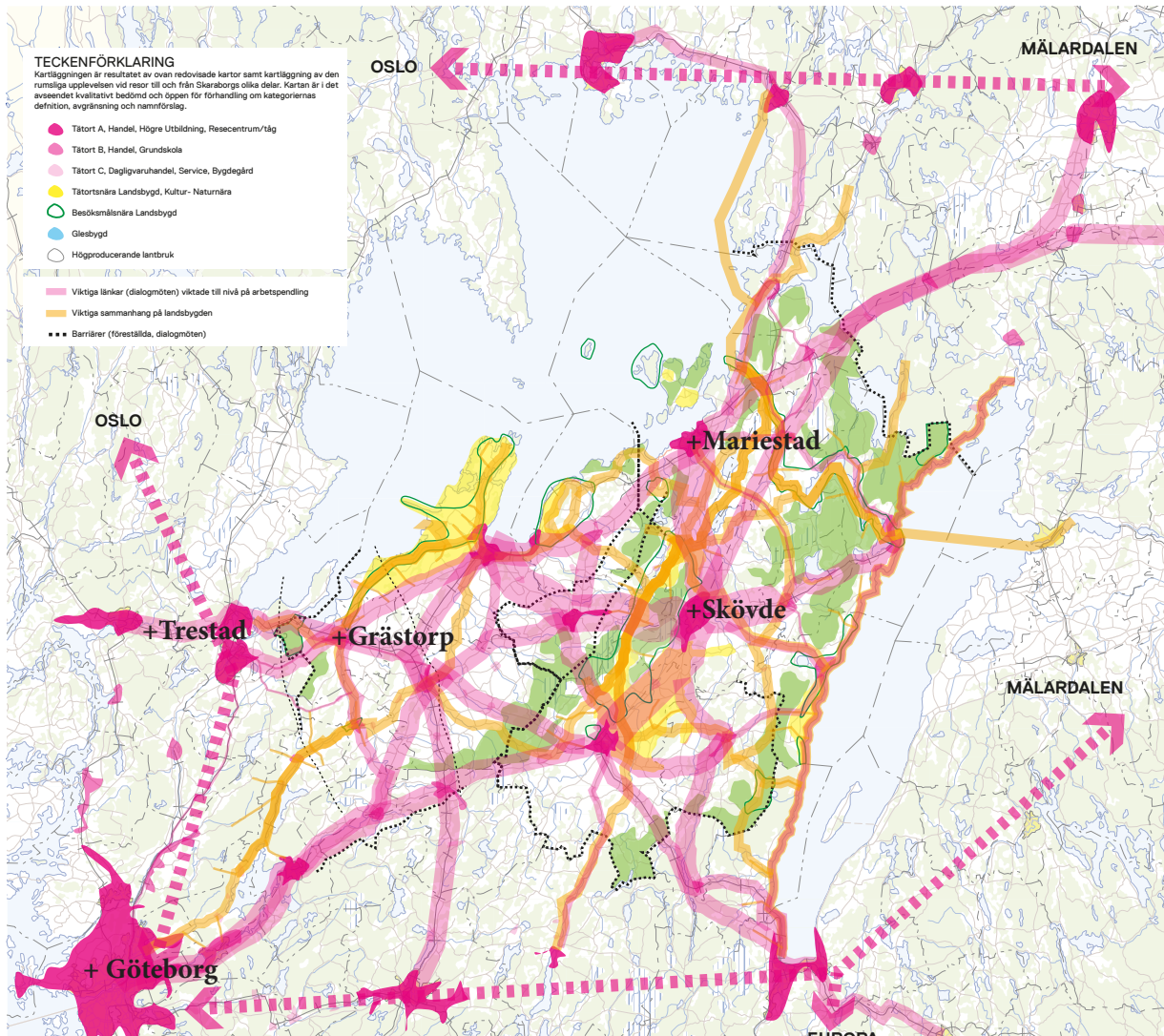


FIGURE 3. (Illustration by Nils Björling, based on mappings done during the project Strukturbild Skaraborg. Skaraborgs kommunalförbund (2014)).

if the mapping is differentiated with startingpoint in the various geographical locations of the 15 municipalities. When these different refocused mappings are superimposed, much more diversified images appear of several thematic contexts and barriers. Altogether, geographical (thematic) and historical mappings have presented the regional map as overlaid ecologies that render the various Skaraborg parts different conditions to develop and contribute to the shared development. (Figure 3) The map showing Skaraborg as a network region thus confronts perspectives on center and periphery and provides the different municipalities with opportunities to locally combine resources and potential from a range of ecologies. One example here is how the location and articulated potential of the small municipality of Grästorp changes depending on if it is regarded as a regional periphery or a link to adjacent Trestad labour market. By changing perspective in the description of Grästorp's local and regional contexts, it is also made visible as a connection between the network of towns and major relationships for actors within tourism and food production. In this way, the local space of action in the development process has become expanded by visualizing Grästorp as a hybrid between town and countryside, and thereby envisaging a broader spectrum of local resources with outset in local food production and informal local associations. Combinations of these resources have later been tested by more indepth local mappings, and by formulating a number of local key projects interconnecting resources from different urban ecologies. Dynamic interplays between urban ecologies and key projects have supported the renegotiation of the location of Grästorp and served to coordinate local and regional initiatives.



FIGURE 4: The Tidan Walkway project *Tidanpromenaden*. (Photos by Nils Björling)

Another example from participation in planning practice is the collaboration with the town of Mariestad that started in 2009. Mariestad has around 24000 inhabitants and was earlier the seat of county government and administrative centre for Skaraborg county. The new regional unification, implemented in 1998, changed Mariestad from being an administrative centre to periphery, also with geographical and topological consequences. At the same time new connectivity patterns, for example external trade establishments and closing of the commercial harbor, changed mobility patterns within, to and from the town of Mariestad which, in turn, has increased the urge to establish new links and collaborations in local and regional scale. One of the identified key projects is the realisation of *The Tidan Walkway* (*Tidanpromenaden*). The project aims to establish both a new connection and an accessible public space along the small river Tidan. In this way *Tidanpromenaden* constitutes a context that can prepare a more longterm redevelopment of earlier industrial areas along the river, to new use in a larger process of the industry's global structural transformation.

The realisation of the project has been a mode to test how local resources, in terms of how operative capacity of the municipal organization, knowledge in traditional carpentry and local building materials could be combined. (Figure 4) In this way the project, even if being a considerably small intervention, has had central significance to question present values of local nature resources and competences, establish a platform for negotiation about conflicts of changed land-use and addressing alternative ways of physical implementation.

CONCLUDING DISCUSSION: FORMULATED COMPOSITIONS

With experience from practice, fragile conditions can be transformed into possibilities to establish new alternative directions for development and to build consensus around a new shared strategy. The work in Skaraborg can in this perspective be understood as a process that has formulated a regional agenda for future development and established the region as a centrality of its own, with vast connectivity. The process of defining Skaraborg as a network-city with internal and external relations in all directions challenges the current understanding of Skaraborg as periphery to the dominant political and economic centers in West Sweden region. Instead, a network with multiple types of landscapes and dense links, internally and to surrounding regions, is envisioned.

In Mariestad, *Tidanpromenaden* is understood as an attempt to materialize a new way of articulating and combining local resources and logics from different urban ecologies, for instance the biological diversity of the river, skills taught at the university, knowledge about timber craftsmanship, and the implementation capacity of the municipality. The most concrete example in the project is how the point of departure in local oak-trees for the construction of *Tidanpromenaden* has

stressed the need to rethink the relationships between the spatial, biological and cultural qualities of the trees and timber as building material. The project thereby expanded its key capacity both because it elaborates the relationship between local resources and local development and because it is the first example where the municipality and the craftsmanship centre collaborated through the whole design process.

Returning to Holling's (2001) adaptive cycle, four alternatives have been identified that in combination can handle spatial lock-ins. First, resources, competences and mandates for decision-making can be added to a specific situation in order to bring it back into the adaptive cycle. A similar return to the adaptive cycle could be managed by breaking or reformulating rigidity. However, these two alternatives run the risk of leading back into the same fragile situation unless structural changes are also implemented. Instead, the third and fourth openings formulate a new composition that subsume the fragile condition in an alternative adaptive cycle. This can also be done by renegotiation of current organisations and current structures into a new coherence. We see here the potential to challenge a pre-dominant understanding of the urban landscape as adaptive selforganizing systems with an approach where the direction of these future alternatives of adaptation and self-organisation open as political negotiations and political questions about: Who is gaining and who is losing?

In order to secure a long-term, more balanced development there is need for a successive transformation that instead of choosing between society and nature, urban and rural, centre and periphery can develop hybrids. In this process urban ecologies as new layered configured projections, together with urban key projects that materialize these projections, can be used as conceptual tools to think beyond current situations and guide renegotiations that successively and continuously change society, and can open fragile urban landscapes.

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