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Looking for the role of nature experiences in planning and decision making: a perspective from the Helsinki Metropolitan Area

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Public experiences of everyday environments influence well-being and quality of life and effective planning for these environments can promote social sustainability. This article discusses how residents’ values related to urban nature areas are as important as ecological and technical issues and can inform urban nature planning and decision making. We first provide a generic review of residents’ values and meanings regarding urban nature. We then outline practices for obtaining data on these values and meanings and present examples from the Helsinki (Finland) Metropolitan Area. The article concludes with a discussion of the challenges that nature experiences bring to planning and decision making and highlights why and how insights generated as a result of residents’ participation should be included in the knowledge base for planning decisions.

KEYWORDS: environmental planning, urban environments, quality of life, public involvement, public opinion

Introduction: Urban Nature as Everyday Landscape

The social aspects of sustainability are closely linked with the quality of human life, for which the experienced quality of the everyday environment is essential (Chiesura, 2004). Enjoyable and accessible nature environments, for instance, encourage people to spend their time outdoors and, according to surveys and physiological studies, these activities reduce stress and promote physical and mental well-being (Ulrich et al. 1991; Hartig et al. 2003; Tsunetsugu et al. 2007; Tyrväinen et al. 2007b). The strong link between natural environments and quality of life (Stubbs, 2008) has negative aspects as well—for instance, dark forests and poorly managed parks cause fear (Lyytimäki et al. 2008; Skår, 2010).

Experiencing the environment is at the heart of the interplay between the ecological and the social, the integration of which is fundamental for sustainability (Kemp & Martens, 2007). In urban environments, the links between local nature and the quality of life of current and future residents are bound up with the wider socioecological system, evolving with interrelated environmental and sociodemographic changes (James et al. 2009). To promote sustainability, planning and management of the everyday environment should follow principles of sufficiency and equity, meaning that everyone should have resources and preconditions for a decent life, including opportunities for positive nature-based experiences, without gaps between population groups and current and future generations (see Kemp & Martens, 2007).

In Finland, urban nature typically includes forests and meadows that were left at the urban fringe or between districts when the city was built (e.g., Bell et al. 2005; Hirvensalo, 2006). In Central Europe, urban nature more often consists of constructed parks purposely established to green the urban environment (Beatley, 1999; Forrest & Konijnendijk, 2005). Typical for such facilities are lawns, flower beds, single trees and bushes, and tree and bush groups, making intensive management more necessary than with, for instance, forests. In Finnish cities, constructed parks are part of urban nature together with forests, meadows, fields, water areas, and streams.

Residents’ opportunities to maintain their well-being and quality of life in cities can be supported by understanding the experiences and values that they attach to urban nature (see Janse & Konijnendijk, 2007). What kinds of areas are experienced as attractive, what kinds of areas are avoided, and what kinds of nature experiences do people, in general, need to maintain or enhance their well-being? Obtaining this knowledge makes it possible, among other things, to identify commonly shared values that can serve as reference criteria for local planners to envision more
sustainable urban design strategies (Chiesura, 2004). Developing environments that encourage physical activity requires understanding about not only the ways people use different places, but also their perceptions of engaging with places and processes (Herrick, 2009).

In this article, we focus on public experiences and values related to urban nature and treat them as having equal value to the technical, economic, and ecological dimensions of planning for urban nature areas. Equity here means that the insights generated as a result of residents’ participation should be treated as knowledge that is as important to the overall planning process as customary data on the technical, economic, and ecological qualities of urban nature. Consistent with Jensen (2005), we understand knowledge being built when information—organized data—is related to or used for a productive purpose in a certain context—in this case, a planning process. This article first looks at the experienced dimension of nature. Second, practices of planning for nature areas are reviewed with examples from the Helsinki Metropolitan Area. We study connections among different levels of planning and practices for obtaining information and discuss where, in planning processes, the experienced dimension of nature should be present. Finally, we sum up with a discussion of the challenges that considering the experienced dimension of nature brings to practices of planning and its information base.

In Finland, legislation has enabled residents to influence their living environments and has mandated opportunities to participate in decision making (see Kettunen, 2002; Jauhiainen & Niemennmaa, 2006). The national constitution (1999/731, 20§) requires public authorities to create mechanisms that allow residents to shape the future of their living environments and, by extension, their own well-being. The Land Use and Building Act that came into force in 2000 gives special attention to resident participation in land-use planning. These opportunities, however, differ substantially across cities (see Pikkala, 2006; Mikkola et al. 2008), which still, regardless of the legislation, continue to hold primary responsibility for organizing local participation. The practices of specific municipalities also reflect varying interpretations of dominant theories of planning and public participation. In the city of Espoo, for example, each district has a board that initiates open district-level forum activities. Espoo thus employs the approach that the stakeholders may agree on certain issues and respectfully agree to disagree on others, which is the idea of agonistic planning (Hillier, 2002; Bäcklund & Mäntysalo, 2010). The city of Vantaa, instead, has district boards based on party political representativeness, in line with aggregative planning relying on voting as the central instrument of decision making. Helsinki does not have district boards and different sectoral departments have various orientations in relation to theoretical ideas about planning and democracy (Bäcklund & Mäntysalo, 2010).

Urban planning and decision making have traditionally been based on such factors as hydrology and soil conditions and the costs of municipal engineering, construction, and nature management (Taylor, 1998). In recent years, the ecological dimensions, such as the appearance of different species and endangered habitats, have increasingly been used in planning. This information has generally been available in relatively exact form (e.g., species lists, numbers of species, habitat descriptions) and has thus been easy to handle with various data-management tools. In the interviews by Yli-Pelkonen (2006), for instance, decision makers of the Helsinki Metropolitan Area regarded these data as most useful for decision making.

The dominant role of ecological, technical, and economic factors in planning can, however, bypass nature’s experiential dimension. Quality criteria for a positive nature experience can arise from very different interpretative frames and also be internally contradictory (e.g., Bonnes et al. 2007; see also Van Herzele, 2004). In a study on the stream Rekolanloja in the city of Vantaa, for instance, some residents wanted the surrounding environment to be more natural, while others preferred a managed park (Yli-Pelkonen et al. 2006). Also, in a survey in Rome, residents appreciated the abundance of natural areas in their neighborhoods, but increasing biodiversity did not necessarily improve their perceived levels of satisfaction (Bonnes et al. 2007). In most cases, however, large natural areas can be preserved only on the basis of ecological arguments, and natural areas that hold unique significance for people’s everyday lives are not equally valued. In contrast, recreation areas are often established exclusively on the basis of economic and technical arguments, without assessing their functionality and attractiveness in terms of users’ experience. The fact that everyday experiences of urban nature are “ignored” can be partly explained by legislation that does not impose punishments for land-use decisions that dilute recreational or landscape values in the same way that it does for those diluting ecological and cultural values.

We define urban nature areas here as places, located in or close to a city, where people can experience nature: smell the scent of forest, listen to ducks play in a pond, or just revel in a green view. Nature and the built environment are bound up with each other: even a rock, a group of trees, or a green median strip can evoke feelings of nature and thus provide natural experiences, even in a densely built envi-
environment (see McIntyre et al. 2000; Yli-Pelkonen & Niemelä, 2005; Ross, 2006). Opportunities for nature experiences can also be provided by sites reserved for construction that has not yet started, or by private yards and gardens. As experienced in the field, nature areas may appear to be continuous entities, but administratively they often are a complicated mix of various spheres of responsibilities under the jurisdiction of different landowners and authorities. In this article, the focus is on areas owned by municipal governments such as urban forests, parks, and shores, the future of which urban residents should have a say in determining. In Helsinki, for example, the municipal government owns about 70% of the land.

We conceptualize planning for urban nature areas as covering all decision-making processes knowingly aimed at influencing the development of such lands (see Burayidi, 2000; Staffans, 2004; Jauhiainen & Niemenmaa, 2006). The essential processes of planning for this purpose in Finland fall under the aegis of land-use and nature-area policy and include principles for land acquisition and the conversion of land to different uses, master planning and the development of detailed land-use plans, and specialized forms of planning focused on nature areas only, such as strategic nature-management planning. Planning in cities across the country is guided by goals set at the state, regional, and eventually sub-regional levels. In the Helsinki Metropolitan Area, this framework includes the national land-use guidelines, the land-use plan for the Uusimaa region, and the metropolitan policy set by the state government, each of which addresses the potential for nature experiences. Land-use planning influences, among other things, the quantity, type, and size of nature areas available in different parts of the city. The planning of nature areas, in turn, guides their management and development and shapes in more detail the specific natural features, for instance the formation of spaces, routes, and views in forests and parks.

Urban nature areas are especially complex entities for planning because of the need to consider the roles not only of people, but of other species, and the protection of biodiversity. These circumstances necessitate consideration of several types of data, varying from local ecological characteristics and residents’ experiences to international agreements and climate forecasts (Figure 1). Planning for urban nature areas also has to fulfill requirements for biodiversity conservation (for instance the Finnish Nature Conservation Act 1096/1996 and the EC Council Directives 92/43/EEC and 79/409/EEC). Moreover, planning for nature areas needs to consider nature’s functional ecological role in the urban environment more widely. For instance, changes in a vegetated area can influence the surrounding region by, for example, increasing the risk of flooding.

Even though built areas and urban nature areas are not clearly separable, it is somewhat different to try to influence built areas in comparison to nature areas. People can influence the development of nature only within the limits of nature itself: large trees cannot be created rapidly and bogs or rocky forests cannot easily be brought to a place where soil or local climate is unsuitable. The use of nature areas as building sites irreversibly changes the ecosystem and opportunities for human beings to experience nature. Certain kinds of nature can be reproduced with landscaping, but the opportunities of future generations to experience, for instance, untrammeled forests, can be ensured only if construction is prohibited from these areas.

**Experienced Values and Meanings of Nature**

While being a part of nature themselves, people recognize nature in the first instance as trees, rocks, streams, birds, and other artifactual elements. This physical basis in turn provides the setting for nature as a field for human activities and as a symbolic world of experienced values and meanings (Figure 2). Although the tangible elements are linked with values and meanings, the latter cannot be mapped by inventories. Experienced nature can be understood as a third dimension, one that exists in addition to its physical and functional aspects.

The environment’s experiential dimensions have been studied from the perspectives of human geography, environmental psychology, and public health. In human geography, for instance, the environment is constructed through (inter)subjective meanings: an
individual does not interpret an outside reality, but rather constructs the world as real through different experiences (Tuan, 1974; Schulman, 1990; Waitt et al. 2009). The reality—including urban nature—then consists of meanings that are assembled out of both material and mental culture. The city and its nature are parts of everyone’s personal mindscape (Berger & Luckmann 1966; Tani, 1995; see also Van den Berg & Ter Heijne, 2005; Tyrväinen et al. 2007a).

If the relationship between an individual and the environment is understood as constituting this kind of sociocultural “reading” (e.g., Lapintie, 2003; Karjalainen, 2004), a view of a certain physical environment always bears socially shared interpretations of, among other things, elements of a good living environment. The influence of the sociocultural context, thus, is inherently present in subjective experiences of the environment (Tani 1995; Karjalainen, 2004; Waitt et al. 2009). An implicit assumption of this article is that experiencing urban nature is an intersubjective action. This phenomenon makes collective, shared experiences possible: the experienced dimension of nature is a weft of intersubjective meanings, bound with physical places and lived as real in one’s personal everyday life.

Personal life history and values, however, re-shape shared experiences. Different people can speak about the same things—forests, meadows, parks—but they still can have different meanings. Immigrants’ experiences of nature in Finnish cities, for instance, can be very different from those of native Finns (e.g., Virtanen, 2007). Urban nature areas can be places for rest, recreation, camaraderie, social interaction, or discomfort and fear, depending on the situation and the particular person (e.g., Koskela, 2003; Van den Berg & Ter Heijne, 2005; Seeland et al. 2009; Skár, 2010). The more diverse nature a city has, the better it can serve residents with various environmental preferences. Correspondingly, identifying groups of people with similar environmental preferences can help in planning the provision of different kinds of environments.

Tyrväinen et al. (2007b) classified the residents of two Finnish cities, Helsinki and Tampere, according to the appeal that natural environments hold for them compared to the attractions and services typically found in urban environments (Figure 3). According to this typology, residents can be true urbanites who strongly appreciate urban environments, normal urbanites, urban nature people, normal nature people, or true nature people who place a high value on natural environments. True urbanites especially appreciate proximity to the city center, and true nature people particularly appreciate peace and safety. The abundant nature valued by nature people can only be found at considerable distance from the urban core. Urbanites enjoy attractions that are easily accessible in the densely built environment.

In their study of the environmental preferences of urban residents in Italy, Scopelliti & Giuliani (2004) state that appreciation of urban environments is related to the lack of time in residents’ everyday lives, highlighting rapid accessibility as a criterion for choosing a particular environment. The perceived appeal of urban or natural environments can also vary along with, for instance, the phases of the life course. Tyrväinen et al. (2007b) assert that residents often cannot satisfy their preferences with respect to nature in their own residential areas, and most people have
increased their use of more distant nature. Many Finns seek to balance their relationship with nature in their annual rhythm by spending some time at a summer cottage away from the city.

### Shaping Experienced Nature by Planning

As people value nature in various ways, there is no environment that would likely be equally enjoyable for everyone. This is a challenge if planners are seen as capable of defining what is good for citizens, which is the case with a functional conception of the planning profession (Schön, 1991; Evans, 1995). Another view is that such a representation of the public good is not possible and such a conception can only be built along with consideration of diverse perspectives, not by serving the interest of all, but by serving no single individual's personal interest (Bäcklund, 2007). Serving the public good, then, means that the variety of ways to experience urban nature is integrated in policies and planning processes shaping it.

In normative planning guiding urban development on the general policy level, value-based goals are defined as guidelines for land policy and land use (Schulman, 1990) (Figure 4). In Finland, an example of normative planning for urban nature is city-level green area programs in Helsinki, Vantaa, and Tampere (Rantala & Koto, 1999; Leino et al. 2001; Huttunen, 2005). Green area programs are, at the same time, an example of nature-area policy that manages common issues as a part of urban policy (see Jauhiainen, 1995; Ottisch & Krott, 2005). In Helsinki, a nature-management strategy (Saukkonen, 2007) has recently replaced the green area program, with the aim of emphasizing the role of forests and other areas termed as natural over constructed parks. Helsinki’s management policy previously ignored forests even though they constitute the largest proportion of the city’s green areas (Saukkonen, 2007). A proper nature-area policy, one that coordinates plans in the long run, is, however, still rare in Finnish cities (see also Mikkola et al. 2008).

Existing urban nature is also a continuum of views of an appropriate interplay between nature and the built environment that prevailed in planning in different periods. Hirvensalo (2006), in her study on the planning of housing areas in Finland, has identified three main periods of planning: the period of unity (1920–1963), the periods of alienation (1964–1979), and the period of reconnecting (1980–2000). During the period of unity, planning aimed to connect nature and the urban in a harmonious unity, using nature as a socially equalizing element of planning, providing recreation areas for all citizens near their homes. During the period of alienation, housing areas were planned with trimmed lawns in the spirit of structuralism. “Real nature” was seen to belong outside of cities. During the period of reconnecting, nature was used in planning in multiple ways, with room for an idea of spontaneously growing “wild nature.”

The period of reconnecting probably still continues. In recent years, urban nature has increasingly been regarded as an (aesthetized) commodity. At the same time, ecological aspects and the experienced quality of nature have gained more attention (Hirvensalo, 2006; James et al. 2009). During the 1990s, debates on the ecological city elevated environmental problems as a key starting point for planning (e.g., Bealey, 1999). In the current decade, planning for urban nature is constrained, especially by the global need to address climate change and to mitigate its effects in urban areas.

In strategic land-use planning, concretizing the normative goals, including the amount, size, and location of nature areas, is addressed in particular by a local master plan. Nature management and other development of nature areas, such as park construction, are implemented within the framework of land-use plans. This environmental planning can also include strategic and operative phases, for instance strategic planning for a ten-year period and more detailed annual operational planning. Strategic nature-management plans can be prepared for a certain nature area or by city districts. The planning of nature areas can also be connected with street planning. In Helsinki, for instance, strategic area plans have encompassed both nature areas and streets in one or several districts for the past decade (Saukkonen, 2007).

The kind of information appropriate for planning for nature areas is determined by a particular project’s scale and objectives. Normative goals for...
urban development are value choices concerning all the city’s residents. From the perspective of municipal self-government, such choices need to be based on residents’ views of what makes good quality urban nature and how the quality should be pursued: here it is essential to make different nature experiences visible. This is supported by information-acquisition processes that allow residents to freely express their concerns. Under such circumstances, residents can identify issues they see as important in planning for nature areas. Shared understanding about the meanings attached to nature can be sought in face-to-face discussions, and, to a certain extent, also in web-based exchanges (Leino & Bamberg, 2007).

As operative planning relies on predefined values, the assembly of information is focused on finding solutions for implementing the goals that follow from these values. In this phase, it is useful to link experiences related to nature with physical places, making it possible to assess the relational importance of different nature areas for residents, qualities they appreciate in different places, and opportunities for developing these capabilities. In planning a certain nature area, information will likely be needed, for instance, on users’ experiences with the functionality of trail networks, on feelings attached to certain sites within the area, as well as on observations by local ecologists about, for example, the occurrence of butterfly and other species in the area’s meadows.

A practical example of obtaining information on residents’ experiences for normative land-use planning is the web-based discussion organized in connection with formulation of the strategies of the Helsinki City Council for its term of office 2005–2008 (Table 1). A discussion forum was opened on the municipal website to encourage residents to candidly express their views on future challenges for the city. This process, at least in principle, gave the residents an opportunity to take part in defining the present state of the urban environment and anticipated problems. In the normative planning of nature areas, in turn, experiences of Helsinki residents have been studied, among other approaches, with group discussions. In deciding Helsinki’s nature-management strategy, local neighborhood associations belonging to the Helsinki Neighborhood Association (HELKA) were sent a draft of the strategy and invited to a discussion with planners (Saukkonen, 2007). The participants brought out, among other things, that forest management should take into account that the feeling of forest is lost if trees are cut making visible what is behind the forest. After the meeting, one of the organizers summarized that the discussion brought understanding especially of the experiential aspect of nature management.

In Helsinki, strategic land-use planning has also used residents’ experiences, even their imagined stories about the future! In the planning of a new housing and business district, “Kuninkaantammi,” a resident group was established, the members of which imagined themselves as future residents of the district and produced stories about an ideal life there. The stories included ideas of winter gardens flourishing with the help of warm air circulating from the refrigeration system, local allotment gardens where residents could keep foster sheep, maintain sport- and nature-oriented schools, and share responsibilities for decorating the neighborhood for feast days (Mattila, 2008). Another example for generating such insights derives from the preparation of the Helsinki Master Plan 2002, in which local neighborhood associations were asked to make a SWOT (strengths, opportunities, weaknesses, and threats) analysis of their district. The associations were asked to sum up their views on the present state of, and future opportunities and threats for, the district.

In the strategic planning of nature areas, residents’ experiences have been mapped with postal questionnaires and other techniques. In the making of the green area plan for Kontula, Mellumäki, and Vartioharju, 2005–2014, researchers mapped positive and negative values of nature areas—such as peace and quiet, scariness, and opportunities for activities—with a postal questionnaire and summarized the results on thematic maps (Tyrväinen et al. 2007a). Social values for youth were also mapped based on results from questionnaires researchers delivered at schools (Mäkinen & Tyrväinen, 2008). Also, for the area plan for the district of Lauttasaari, values, uses, and developing needs for nature areas and streets were mapped with a questionnaire that the local pub-

**Table 1** Examples of normative and strategic planning in Helsinki.

| Land-use Planning | Planning of Nature Areas |
|-------------------|--------------------------|
| **Normative**     | Helsinki nature-management strategy |
| Strategies of the Helsinki City Council for its term of office 2005–2008 | |
| **Strategic**     | Green area plan for Kontula, Mellumäki, and Vartioharju 2005–2014 |
| Partial master plan for Kuninkaantammi | Area plan for Lauttasaari 2009–2018 |
| Master plan for Helsinki 2002 | |

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Glicken (1999) has usefully classified the information needed in planning and decision making with the help of three perspectives: cognitive that relies on technical expertise, personal experience-based, and value-based that concerns the community. Figure 5 illustrates how these dimensions of information are emphasized at the different planning levels. In making normative and strategic choices, there are no guaranteed technical solutions to help define the direction, only justified views and feelings (see, e.g., Sotarauta, 1996). Decision making, then, is essentially determined by the value- and experience-based dimensions of information (see Glicken, 1999). The technical dimension, in turn, is emphasized in more operative planning, as information is needed on issues such as the location of residents’ favorite places or the proportion of residents of a certain district satisfied with the accessibility of nature areas there.

Does Information Acquisition Fulfill Its Purpose?

If planners and decision makers want urban nature to contribute to social sustainability through residents’ well-being and quality of life, they need to consider the experienced dimension of nature (Chiesura, 2004). Knowledge of how to give residents opportunities for the nature experiences they appreciate makes it possible, at the same time, to preserve conditions for a good life for future generations. Recent studies in Finland have found that urban children regard shopping malls as more pleasant than nature (Kanervo, 2007; Stenvall, 2009) and their most popular way to spend free time is to play on a computer (Kytä & Kahila, 2009). Whether this is due to a wider cultural change or to ignoring children’s needs in planning nature areas is important for the future of urban nature areas. What kinds of environments will the current generation, one that has largely grown up in shopping malls, plan in the future?

Positive nature experiences should be studied over the long term. Follow-up information on possible changes in residents’ relationships with nature is necessary, especially in normative and strategic planning for the far future. The need to recognize residents’ values related to urban nature is highlighted along with change and diversification of the urban population. In the Helsinki Metropolitan Area, as in many other metropolitan regions, the need to understand how people with different cultural backgrounds interpret the meanings of nature areas will become even more important in the future. Sociocultural changes interweaving with changes in the physical environment, and nature in particular, can modify values by reflecting the state of the ecological basis for nature experiences and human well-being. The complexity of sociocultural and ecological processes makes it challenging to forecast future generations’ environmental preferences, but recognizing processes that sustain the valued experiences today provides grounding for understanding possible ways to an ecologically sustainable and socially flexible future.

In normative planning for nature areas—in defining the will—nature experiences do not necessarily need to be attached to exact places identifiable on maps. Studying residents’ general values related to nature, as in Figure 3, helps planning by giving form to ways to promote opportunities for nature experiences. Where should the aim be on natural settings and where should it be on park-like environments? How should routes and opportunities for activities be improved in general, and what factors influence residents’ feeling of safety? Maps, graphs, and images can be useful material for discussion and as supporting tools for planning. In strategic and operative planning, locating information is necessary. Today, more and more methods and technical tools are available to illustrate experiences of the everyday environment, for instance, on maps (e.g., Kytä & Jahila, 2006; Tyrväinen et al. 2007a). Information attached to exact places is necessary in prioritizing nature areas, for instance, where cutting an urban forest and replacing it with a housing area would cause potential conflicts and what areas provide multiple positive nature experiences for different population groups and thus serve the community efficiently.

There have been attempts to come to grips with experienced nature using exact, quantitative methods (e.g. Tyrväinen, 2007a; 2007b). Such approaches are justified from the perspective of the intersubjectivity...
of personal experiences; quantitative methods can reveal the culture they embed. Sociocultural—intersubjective—values linked with subjective experiences related to urban nature become visible in large surveys. In Finland, for example, surveys have often shown that proximity to nature is appreciated in housing and residents usually favor natural environments (Kyttä & Kahila, 2006; Korpela & Ylen, 2007; Tyrväinen et al., 2007b). This kind of information helps in outlining general urban planning guidelines and the cultural perspectives framing subjective experiences. The usability of data from questionnaires can be hindered by the fact that the terms used—such as “green area,” “wasteland,” or “proximity to nature”—can mean very different things as everyday experiences for respondents. For one, the proximity to nature is the seaview from a balcony, for another a rural landscape at the urban fringe. The terms cannot be returned to any abstract and commensurable urban experience as residents define them with their own interpretive frames (Goffman, 1959), although planners have to use such general expressions in attempting to deal with the diverse framings. Intersubjectivity always includes a subjective, unique dimension that can also change as a person moves through the phases of life.

From the perspective of residents’ well-being and quality of life, planners of nature areas need understanding both of socioculturally shared meanings and subjective experiences bound with exact places. Understanding both of these “levels” and making them visible are key roles for planning to support the well-being and quality of life of different population groups.

In addition to the insights generated through quantitative methods, it is necessary to employ a research approach that delves deeply into individual perspectives to be able to increase understanding of the grounds and restrictions of quantitative generalizations: without understanding what is being measured, the measuring is pointless. The experience of nature cannot be translated into exact numbers without losing something essential in the uniqueness of the experiences. Focusing on individual experiences is not sufficient either. Without measuring, it is impossible to understand the size of the population being affected by the decisions. Forester’s (1993) division of two dimensions of planning—uncertainty and ambiguity—reminds us that in different levels and phases of planning, different questions are being responded to: in addition to what and where it is necessary to ask also what kind of and how. Certainty can be sought with increased technical knowledge, while ambiguity calls for understanding, making experience-based and value-based knowledge indispensable.

**Conclusion: Taking Promotion of Residents’ Well-Being and Quality Of Life as a Goal of Urban Nature**

Even though residents’ world of experiences is, as such, recognized as an important perspective in planning in Finland (e.g., Bäcklund, 2007), using their experiences remains problematic. Staffans (2004) and Niemenmaa (2005), among others, have stated that the insights produced through public participation are easily discredited as “non-information,” as it is regarded as only representing the subjective views of a small part of the population. The intersubjectivity of nature experiences, however, means that views of even a small group of active residents on preserving a local park, for example, reveal something about the valued qualities attached to a good urban environment (see Ernstson et al. 2008). Perceiving an individual experience attached to an exact place also as translocal—revealing cultural aspects that play a role for other places as well—would make it possible for these individual perspectives to play an important role in reflecting the normative goals of planning (see Bäcklund, 2007). Although the views of the minority of “park defenders” cannot and should not be generalized, individual comments can have an essential role to play in formation of self-understanding of planning for nature areas.

The participation of urban residents in planning nature areas has not been adequately considered from the viewpoint of how information produced through such approaches could, in addition to ecological, technical, and economic data, best serve the cultivation of public preferences and the goals of planning (e.g., Janse & Konijnendijk, 2007). Current participation practices do not necessarily efficiently support knowledge construction on the different levels of planning; different types of questions require different ways to obtain data. This may explain, for instance, the result of a survey on strategic nature-area planning in Helsinki in which, although the participatory processes generally satisfied residents and authorities, both groups thought that the participants had been given the idea that they would be able to influence planning more than they actually could (Hipila & Tyrväinen, 2005). If the information produced through participatory processes is regarded only as an assemblage of personal opinions and not equivalent to, say, urban ecological data, planning and decision making are missing an essential element regarding residents’ understandings of their own well-being and quality of life.

Many scholars have regarded integrating ecological and sociocultural values as one of the key problems in planning and decision making about nature (e.g., Yli-Pelkonen & Niemelä, 2005; see also
Koontz, 2006). Effective planning should be able to accept the incommensurability of various logics of knowing and still be capable of recognizing the role of the obtained data, which is the complementarity of knowing (Bäcklund, 2007; see also Andersson, 2006).

Lee & Roth (2006), in their study on a waterway conflict in Canada, discuss that in a democratic society, no single form of knowledge can be privileged at the expense of other forms. This can also be seen as an interpretation of equity as a sustainability principle (Kemp & Martens, 2007). In addition, Amin (2006) has emphasized that such commensurable criteria with which a good city could be built do not exist and it is exactly this point of recognition that could open the doors for equitable planning. A criterion for good planning for nature areas could thus be awareness of the different people and groups whose nature experiences are affected and with what consequences.

Recognizing the meanings of nature areas for residents is the first prerequisite for nature experiences, alongside ecology and other more established viewpoints, to contribute to the normative goals and concrete actions that guide planning. The greatest challenge in accounting for the experiential dimensions of nature is related to the interpretations of criteria for usable information for planning and to the ability of the planning process to manage various forms of information at the same time. Ecological criteria cannot be used to determine what kind of opportunities for experiences a nature area provides for residents, nor can the suitability of an area for recreation determine its value from an ecological point of view.

Residents have experience-based knowledge that planners lack, but the need to involve residents in planning is not only based on this expertise. As the accessibility and quality of nature areas affects residents’ mental and physical well-being, they should have an authority role in planning their own living environments. With the concept of authority we emphasize, consistent with Burman & Säätelä (1991), the right of residents to be involved in defining the criteria for a good living environment and the goals of planning. This role also includes responsibilities for the common environment and for forthcoming generations. Taking residents seriously, as co-producers of essential knowledge in planning and decision making, addresses a way for futures where urban environments are shaped and used in a sustainable way via both joint decisions and individual everyday activities.

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References

Amin, A. 2006. The good city. Urban Studies 43(5–6):1009–1023.
Andersson, E. 2006. Urban landscapes and sustainable cities. Ecology & Society 11(1):34.
Bäcklund, P. 2007. Tietämispolitiikka: Kokemuseläiset tieto ja tietämisen hallinnassa (Politics of Knowing: Experiential Knowledge in Municipal Governance). Doctoral Dissertation. Department of Geography, University of Helsinki, Finland (in Finnish).
Bäcklund, P. & Mäntysalo, R. 2010. Agonism and institutional ambiguity: ideas on democracy and the role of participation in the development of planning theory and practice—the case of Finland. Planning Theory 9(4):333–350.
Beatley, T. 1999. Green Urbanism: Learning from European Cities. Washington, DC: Island Press.
Bell, S., Blom, D., Rautamäki, M., Castel-Branco, C., Simson, A., & Olsen, I. 2005. Design of urban forests. In C. Konijnendijk, K. Nilsson, T. Randrup, & J. Schipperijn (Eds.), Urban Forests and Trees: A Reference Book. pp. 149–186. New York: Springer.
Berger, P. & Luckmann, T. 1966. The Social Construction of Reality: A Treatise in the Sociology of Knowledge. New York: Anchor Books.
Bonnes, M., Uzzell, D., Carrus, G., & Kelay, T. 2007. Inhabitants’ and experts’ assessments of environmental quality for urban sustainability. Journal of Social Issues 63(1):59–78.
Burayidi, M. 2000. Urban planning as a multicultural canon. In M. Burayidi (Ed.), Urban Planning in a Multicultural Society. pp. 1–15. Westport, CT: Praeger.
Burman, C. & Säätelä, S. 1991. Rakennetuun ympäristön laatutaso: käsitteenvielfi kielolioppo (Quality standard of the built living environment: grammar of the concept). In P. von Bonsdorff, C. Burman, H. Lehtonen, M. Norvuo, J. Rautsi, Y. Sepänmaa, S. Säätelä, & P. Vuorela (Eds.), Rakennetuun ympäristön kquaeneus ja laatu (Beauty and Quality of the Built Environment). pp. 72–91. Espoo, Finland: VTT Technical Research Centre of Finland (in Finnish).
Chiesura, A. 2004. The role of urban parks for the sustainable city. Landscape & Urban Planning 68(1):129–138.
Ernsson, H., Sörin, S., & Elmqvist, T. 2008. Social movements and ecosystem services: the role of social network structure in protecting and managing urban green areas in Stockholm. Ecology & Society 13(2):39.
Evans, B. 1995. Experts and Environmental Planning. Hants, Aldershot: Avebury.
Forest, J. 1993. Critical Theory, Public Policy, and Planning Practice. Albany: State University of New York Press.
Forrest, M. & Konijnendijk, C. 2005. A history of urban forests and trees in Europe. In C. Konijnendijk, K. Nilsson, T. Randrup, & J. Schipperijn (Eds.), Urban Forests and Trees: A Reference Book. pp. 23–48. New York: Springer.
Glicken, J. 1999. Effective public involvement in public decisions. Science Communication 20(3):298–327.
Goffman, E. 1959. The Presentation of Self in Everyday Life. New York: Doubleday.
Hartig, T., Evans, G., Jamner, L., Davis, D., & Gärling, T. 2003. Tracking restoration in natural and urban field settings. Journal of Environmental Psychology 23(2):109–123.
Herrick, C. 2009. Designing the fit city: public health, active lives, and the (re)instrumentalization of urban space. Environment and Planning A 41(10):2437–2454.
Hillier, J. 2002. Shadows of Power. New York: Routledge.
Saukkonen, T. 2007. *Helsingin Luonnontarvetta* (Helsinki Nature Management Strategy). Helsinki: Public Works Department (in Finnish).

Schön, D. 1991. *The Reflective Practitioner. How Professionals Think in Action?* New York: Basic Books.

Schulman, H. 1990. *Alueelliset Todellisuudet ja Visiöt: Helsingin Keihäys ja Keihätäminen 1900-luvulla* (Realities and Visions: Regional Development and Planning Policy in Helsinki During the 20th Century). Espoo: Urban and Regional Research and Training Centre (in Finnish).

Scopelliti, M. & Giuliani, V. 2004. Choosing restorative environments across the lifespan: a matter of place experience. *Journal of Environmental Psychology* 24(4):423–437.

Seeland, K., Dübendorfer, S., & Hansmann, R. 2009. Making friends in Zurich’s urban forests and parks: the role of public green space for social inclusion of youth from different cultures. *Forest Policy and Economics* 11(1):10–17.

Sipilä, M. & Tyrväinen, L. 2005. Evaluation of collaborative urban forest planning in Helsinki, Finland. *Urban Forestry & Urban Greening* 4(19):1–12.

Skär, M. 2010. Forest dear and forest fear: dwellers’ relationships to their neighborhood forest. *Landscape & Urban Planning* 98(2):110–116.

Sotarauta, M. 1996. *Kehitys ja Kehittäminen 1900-luvulla* (Kohvi: 24(2):111–116). Helsinki: Public Works Department (in Finnish).

Staffans, A. 2004. *Vaihtoehtoa asukkaiden vuorovaikutuksessa ja paikallisuudessa: Helsingin kaupunkiasutusten ja paikallisuuden yhteydet* (Options in residents’ and local society interactions: Helsinki’s local communities and local society). Department of Architecture, Helsinki University of Technology, Espoo, Finland (in Finnish).

Stenvall, E. 2009. “Sellast ihan tavallist arkea:” Helsinkišiläisten 3–6-tykkaaisten arki ja ajankäyttö (“Such basic everyday life”: Everyday life and use of the time of the 3rd – 6th graders of Helsinki). *Helsinki City Urban Facts* 2:111 (in Finnish).

Stubbs, M. 2008. Natural green space and planning policy: devising a model for its delivery in regional spatial strategies. *Landscape Research* 33(1):119–139.

Tani, S. 1995. *Kaupunki Taikapeilissä: Helsinki–Elokuvien Mielensäjanemaat–Maantieteellisiä Taikintoja (City in the Magic Mirror: Mindscapes of Helsinki Movies–Geographical Interpretations)*. Unpublished Doctoral Dissertation. Department of Geography, University of Helsinki, Helsinki, Finland (in Finnish).

Taylor, N. 1998. *Urban Planning Theory Since 1945*. Thousand Oaks, CA: Sage.

Tsunetsugu, Y., Park, B.-J., Ishii, H., Hirano, H., Kagawa, T., & Miyazaki, Y. 2007. Physiological effects of shinrin-yoku (taking in the atmosphere of the forest) in an old-growth broadleaf forest in Yamagata Prefecture, Japan. *Journal of Physiological Anthropology* 26(2):135–142.

Tuan, Y.-F. 1974. *Topophilia: A Study of Environmental Perception, Attitudes and Values*. Englewood Cliffs, NJ: Prentice-Hall.

Tyrväinen, L., Mäkinen, K., & Schipperijn, J. 2007a. Tools for mapping social values of urban woodlands and other green areas. *Landscape & Urban Planning* 79(1):5–19.

Tyrväinen, L., Silvennoinen, H., Korpela, K., & Ylen, M. 2007b. *Luontomaatikka, Metsät ja Hyvinvointi: The Meaning of Nature for Urban Residents and Effects on Psychological Well-Being*. METLA Working Paper 52. Vantaa: Finnish Forest Research Institute. http://www.metla.fi/julkaisut/working papers/2007/mwp052.htm (in Finnish).

Ulrich, R., Simons, R., Losito, B., Fiorito, E., Miles, M., & Zelson, M. 1991. Stress recovery during exposure to natural and urban environments. *Journal of Environmental Psychology* 11(3):201–230.

Van den Berg, A. & Ter Heijne, M. 2005. Fear versus fascination: an exploration of emotional responses to natural threats. *Journal of Environmental Psychology* 25(3):261–272.

Van Herzele, A. 2004. Local knowledge in action: valuing nonprofessional reasoning in the planning process. *Journal of Planning Education & Research* 24(2):197–212.

Virtanen, H. 2007. Monietnistyvät lähiöt: suomalaisen asuinalueiden etninen erilaistumisprosessi ja siihen vaikuttavat tekijät (Multiethnic suburbs: ethnic segregation of Finnish residential areas and factors affecting it). *Finnish Journal of Urban Studies* 45(3):6–19 (in Finnish).

Waitt, G., Gill, N., & Head, L. 2009. Walking practice and suburban nature-talk. *Social & Cultural Geography* 10(1):41–60.

Yli-Pelkonen, V. & Niemelä, J. 2005. Linking ecological and social systems in cities: urban planning in Finland as a case. *Biodiversity & Conservation* 14(8):1947–1967.

Yli-Pelkonen, V., Pispä, K., & Helle, I. 2006. The role of stream ecosystems in urban planning: a case study from the stream Rekolanoja in Finland. *Management of Environmental Quality: An International Journal* 17(6):673–688.