# A LIVED HERMETIC OF PEOPLE AND PLACE:

phenomenology and space syntax



## **David Seamon**

Kansas State University, USA

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David Seamon
Department of Architecture
Kansas State University
211 Seaton Hall
Manhattan, KS 66506-2901 USA
triad@ksu.edu

#### **Abstract**

This paper examines ways in which a phenomenological approach might contribute to space syntax research, drawing on three themes that mark the heart of phenomenological investigation: (1) understanding grounded in real-world experience; (2) human immersion in world; and (3) describing the lifeworld—a person or group's everyday world of taken-for-grantedness of which the person or group is typically unaware. A major phenomenological question is how space syntax concepts, particularly the spatial configuration of the "deformed grid," point toward a particular kind of place structure in which the spatial-temporal regularity of individual participants potentially coalesces into a larger environmental dynamic—what is termed "place ballet"—that both sustains and is sustained by an attachment to and a sense of place.

#### Introduction

As an outsider who greatly admires space syntax research, I am honored to be invited to speak at this international conference. I assume my invitation arose because of my participation on the space syntax list serve and a series of articles in which I explored potential connections between space syntax and phenomenology (Seamon 1994, 2002, 2004, 2007). In this paper, I highlight a number of ways in which phenomenology might contribute to space syntax, both conceptually and empirically.

For the moment, let me define phenomenology as the careful description and interpretation of human experience. The focus is on *phenomena*—i.e., things or experiences as people experience those things or experiences. The aim is to describe any phenomenon in its own terms—in other words, as it is as an experience, situation, or event in the real lives of real human beings in real times and places. The goal is not idiosyncratic explication, however, but the identification of underlying lived structures common to many specific experienced instances of the phenomenon.

Phenomena central to space syntax include the nature of everyday spatial movement; the lived foundation of how, in fact, such movement can even happen; the ways in which people, as they move about, are aware or not aware of their environment and other people co-present; the ways in which people, as they move about, attentively encounter each other (or do not). Hovering beneath these themes is the central phenomenon of space syntax: the ways in which the particular spatial configuration of pathways afford particular patterns of movement and encounter and how those patterns, in turn, contribute to and over time sometimes shift pathway spatial configuration.

As a phenomenologist, I am most interested in how these phenomena of space syntax might relate to a particular kind of place structure and situation in which the spatial-temporal regularity of individuals potentially coalesces into some larger environmental dynamic that both sustains and is sustained by an attachment to and a sense of place (Seamon 2007). I want to suggest here that such a place structure is intimated analytically through the axial grid but, as far as I know, has so far received little direct attention in space syntax research, partly because the nature of this place structure is lived and thus perhaps better described and understood through a phenomenological rather than an analytical approach.

As a means to arrive at this particular kind of place structure—what I have called in other work a *place ballet*—I, first, lay out three central phenomenological themes; second, explain how my phenomenological work led to an interest in space syntax; and, third, return to the three phenomenological themes as they relate to space syntax and the possibility of place ballet.

## Three Phenomenological Themes

The phenomenological perspective I represent is what has come to be called *existential phenomenology*—i.e., a way of phenomenology developed by such thinkers as Martin Heidegger and Maurice Merleau-Ponty that moves away from phenomenological founder Edmund Husserl's focus on pure intellectual consciousness and moves toward a reflexive understanding of everyday human life and its lived meanings<sup>ii</sup>. So that I can suggest connections to space syntax research, I want to highlight three important themes in existential-phenomenological research: (1) understanding grounded in real-world experience; (2) people immersed in world; and (3) describing and understanding lifeworld. Here, I describe each briefly in turn and later discuss connections with space syntax.

# Understanding Grounded in Experience

Existential phenomenologists argue that, if we are to understand ourselves as human beings and the worlds in which we live, we must ground that understanding in a conception and language that arise from and return to human experience and meaning. There is no world "beneath" or "behind" the world of primordial lived experience, and existential phenomenologists are skeptical of any conceptual system that transcribes human life, actions, and experience into secondhand, reason-based presentations—for example, positivist-analytical accounts that necessarily convert experience and meaning into tangible, measurable units and relationships that are claimed to represent some empirical trace of their original lived source. Clearly, most space syntax research approaches its subject of study in analytical fashion, and any link with phenomenological study might seem conceptually inappropriate—a matter I'll return to below.

## People Immersed in World

Human experience, awareness, and action are always *intentional*—i.e., necessarily oriented toward and finding their significance in a world of emergent meaning. Human beings are not just aware but aware *of something*, whether an object, living thing, idea, environmental situation, or the like. This ever-present quality of intentionality means that human beings are inescapably immersed and enmeshed in their world, and one central lived aspect of this immersion is what French phenomenologist Maurice Merleau-Ponty called "body-subject"—corporeal, prereflective awareness and intelligence expressed through intentional but, typically, unself-conscious bodily movement. Shortly, I want to address what peoples' intimate melding with the world through the lived body might mean for space syntax.

## Describing and Understanding Lifeworlds

The everyday structure through which this lived reciprocity unfolds is the *lifeworld*—a person or group's day-to-day world of taken-for-grantedness that is normally unnoticed and therefore concealed as a phenomenon. In turn, the unquestioned acceptance of the things and experiences of the lifeworld is what phenomenologists call the *natural attitude*. One aim of existential-phenomenological study is to disclose and describe the various lived structures and dynamics of the natural attitude and the lifeworld, which always include spatial, environmental, and place dimensions. One of the most intriguing discoveries of space syntax research is the suggestion that topological structure plays a major role in the lived fact that a lifeworld is one way rather than another in terms of environmental and place experience. More on this point shortly.

## **An Environmental Phenomenology**

I next want to explain how I became involved with existential phenomenology so that I can then connect space syntax with these three themes, particularly as they relate to the notions of body-subject and place ballet. As an environment-behavior researcher in a department of architecture, my main teaching and research emphasis relates to the nature of environmental behavior, action, and experience, especially in terms of the built environment. I am particularly interested in why places are important to people and how architecture and environmental design can be a vehicle for urban place making.

I became involved with the nature of place and place making when I was working on my doctorate in behavioral geography at Clark University in Worcester, Massachusetts, in the 1970s. My dissertation, revised and published in 1979 as *A Geography of the Lifeworld* (Seamon 1979), focused on a wide-ranging phenomenon that I called *everyday environmental experience*—the sum total of peoples' firsthand involvements with their everyday places, spaces, and environments. My source of experiential descriptions was *environmental experience groups*, small groups of volunteer participants who were willing to meet weekly to examine in their own daily experience such themes as the nature of everyday movement, emotions relating to place, the nature of noticing and attention, the meaning of home and at-homeness, places for things, deciding where to go when, and so forth.

Through a phenomenological explication of some 1,500 personal observations offered in these environmental experience groups, I eventually arrived at three overarching themes—*movement*, *rest*, and *encounter*—that appeared to mark the essential core of everyday environmental experience. The book's section on movement examined the habitual nature of everyday environmental behaviors

and actions, while the section on rest explored people's attachment to place and gave particular attention to at-homeness and positive affective relationships with places and environments. The final section, on encounter, considered the multifaceted ways in which people make attentive contact with their world and identified such modes of awareness as watching, noticing, and more intense kinds of attention to the world at hand.

## Body-Subject, Time-Space Routines, and Place Ballet

To explain how my concerns in *Geography of the Lifeworld* eventually led to an interest in space syntax, I want to summarize the book's conclusions on everyday movement. One of the first themes that came forth in the environmental experience groups was the importance of habitual action in everyday life. Group observations suggested that, regardless of the particular environmental scale at which they happen, many movements are conducted by some preconscious impulse that guides behaviors without the person's need to be consciously aware of their happening.

Body-subject is the term that French phenomenologist Maurice Merleau-Ponty used in his *Phenomenology of Perception* to describe the intentional but taken-for-granted intelligence of the body. "Consciousness," he wrote (Merleau-Ponty 1941/1962, pp. 138-39) "is being toward the thing through the intermediary of the body. A movement is learned when the body has understood it, that is, when it has incorporated it into its 'world', and to move one's body is to aim at things through it; it is to allow oneself to respond to their call."

Though Merleau-Ponty said very little about larger-scale actions of body-subject in *Phenomenology of Perception*, observations from the environmental experience groups pointed to its versatility as expressed in more complex movements and behaviors extending over time and space<sup>iii</sup>. One such behavior indicated by group observations is what I called *body routine*—a set of integrated gestures, behaviors, and actions that sustain a particular task or aim, for example, preparing a meal, driving a car, doing home repair, and so forth. Also identified was what I labeled a *time-space routine*—a set of more or less habitual bodily actions that extends through a considerable portion of time—for example, a getting-up routine or a weekday going-to-lunch routine.

Most pertinent to space syntax, group observations suggested that, in a supportive physical environment, individual time-space routines and body routines may fuse together in a larger time-space whole, creating an environmental dynamic that I called, after the earlier observations of urban critic Jane Jacobs (1961, p. 50), a place ballet—an interaction of body and time-space routines rooted in a particular environment, which often becomes an important place of interpersonal and communal exchange, meaning, and attachment.

One ingredient of place ballet is familiarity arising from routine, since regular actions of individuals meet together in space, which becomes a place of familiarity and perhaps attachment (Seamon & Nordin 1980). The regularity of place ballet is unintentional and only comes about through time and many repeated "accidental" meetings. At its base is the habitual force of body-subject, which supports a time-space continuity grounded on bodily patterns of the past (ibid.).

Group observations indicated that places founded in place ballet are more than locations and space to be traversed. Each comes to house a dynamism that has arisen naturally without directed intervention. These spaces take on the quality that phenomenological geographer Edward Relph (1976), in his seminal phenomenology of place, *Place and Placelessness*, called *existential insideness*—a situation in which

"a place is experienced without deliberate and self-conscious reflection yet is full with significances" (p. 55). Relph argued that existential insideness is the very foundation of place experience, and this point is echoed in place ballet. Through habitual patterns meeting in time and space, an environment can become a place shared by the people who come into spatial-temporal contact there. The dynamism of that place is largely in proportion to the number of people who share in its space and thereby create and share in its tempo and activity (Seamon and Nordin 1980).

## **Place Ballet and Space Syntax**

A Geography of the Lifeworld was published in 1979, and at that time I had only a limited understanding of the way in which the world, particularly its physical, potentially designable qualities, might sustain and enhance the facility of body-subject, especially place ballet. Once I became a faculty member in a department of architecture in the early 1980s, I became more involved with how qualities of physical space and environment might contribute to place ballet, since such understanding might lead to design and policy that would support place ballet rather than inhibit or undermine it (Seamon 1991). A number of studies contributed to this understanding (though none using an explicit phenomenological conception or language), including the work of Christopher Alexander (Alexander 2002-05; et al., 1977, 1987), Jane Jacobs (1961), Oscar Newman (1973, 1980), and William Whyte (1980).

Of all these studies, I became especially interested in space syntax research because it seemed to provide powerful conceptual and empirical support for the phenomenological claim of a reciprocal relationship between human action—i.e., everyday spatial movement and qualities of the physical-spatial environment—i.e., the world's underlying pathway structure, or spatial configuration. Although Hillier and colleagues had no intentional aim to make links with a phenomenological perspective, I immediately recognized significant parallels, since space syntax appeared to demonstrate conclusively that human movements are always integrally enmeshed in the world, particularly through the particular configurational structure of a pathway network. To lay out more clearly some of the parallels between the phenomenological perspective and space syntax, I want to return to the three phenomenological themes I highlighted earlier and discuss them more fully in regard to space syntax as it might be interpreted through an "environmental and architectural phenomenology."

## Understanding grounded in experience

At first glance, one might expect the phenomenologist to oppose space syntax research, since its approach is largely analytical and dependent on various topological and mathematical concepts and procedures that transform the lived richness of environmental and architecture experiences, actions, and situations into tangible, measurable indicators that can be readily seen and compared numerically and graphically. For example, a well-used street is interpreted as a highly integrated axial line. Or a well used city square or piazza is interpreted as a convex space intersected by well integrated axial lines marking major pedestrian flows through that particular city district. Or what potentially might be a robust neighborhood place ballet is interpreted as a well shaped deformed grid.

But what is admirable phenomenologically about so many of the analytical concepts and procedures of space syntax is that they appear to arise from and accurately point toward real-world aspects of environmental and place experience. For example, the simple but elegant recognition that any outdoor urban space incorporates both

convex and axial dimensions has immediate correspondence with a central tenet in environmental phenomenology—viz., that, from one vantage point, human life can be understood as the tension between movement and rest and such related lived opposites as dwelling/journey, home/horizon, and continuity/change (Jager 1975; Seamon 1979).

In this sense, axial and convex spaces are an accurate analytical rendition of the movement/rest dialectic, they provide a simple way to consider how physical and spatial qualities might contribute to lived aspects of movement and rest. On one hand, convex space can be said to relate to "rest," since the two-dimensional, "fat" quality of convex space readily allows for local places—e.g., the site of a weekly market, a place where teenagers play soccer, or gathering spot for old people to sit in the sun. On the other hand, axial space relates more to the one-dimensional, "moving" quality of open space and to a wider-scaled, global relationship—the way the particular spatial configuration of the pathway fabric lays out a potential movement field that draws people together or keeps them apart and also assists or hinders newcomers as they attempt to get around an unfamiliar place.

Both convex and axial spaces can involve co-presence, co-awareness, informal interpersonal encounters, and robust place activity; and both aspects of urban space no doubt both contribute, but in somewhat different ways, to the physical foundation of place ballet. Experientially and phenomenologically, it is probably the case that the kind of place ballet arising out of axial-space structure—e.g., the deformed grid—is different in its spatial and temporal dynamics than kind of place ballets associated with convex spaces.

Ultimately, in a robust urban district, one might expect to find a nesting of place regularity that ranges from interior "third places" (e.g., cafés and pubs) to regular outdoor events linked to spaces working in a convex way (e.g., a weekly flea market) to the more amorphous place ballets of sidewalks and streets, the lively activity of which is generated largely through qualities of axial space and a well-formed deformed grid (Read & Budiarto 2003). This nested quality of urban place founded in pathway structure reminds me of Jane Jacobs' contention that the best-working street neighborhoods

have no beginnings and ends setting them apart as distinct units. The size even differs for different people from the same spot, because some people range farther, or hang around more, or extend their street acquaintance farther than others. Indeed, a great part of the success of these neighborhoods... depends on their overlapping and interweaving, turning the corners (Jacobs 1961, 120).

My larger point here is that space syntax research has developed a remarkable range of concepts and measures, many of which seem to arise from and reflect environmental actions and experiences. Granted, most of these concepts and measures are reductive renditions of the lifeworld situations that found the analytical categories and portraits, and one request I have is phenomenological studies that explore the lived aspects of axial spaces, depth, shallowness, the deformed grid, and so forth—more on that below.

I also repeat here a request I made a while back on the space syntax list serve: That someday Hillier, Hanson, and other key space syntax figures write a detailed historical account of how space syntax theory and its various concepts and methods arose, since they are such a powerful example of analytical research that serves to allow the phenomenon to emerge (rather than to distort, misrepresent, or arbitrarily correlate, as so much analytical work typically seems to do).

In Social Logic of Space, Hillier and Hanson (1984) claim that the empathy and accuracy of their concepts and measures arose because they were "trying to describe an order that is already present in the system" (p. 45). I agree with this characterization and would like to know more about how they came to see that order and how they came to mark out an interconnected conceptual system of which so many of the parts seem to really interrelate, shed bright light on each other, and arise from the realm of lived environmental and place experience. Thoughtful, thorough accounts of the genesis and stages in this creative discovery process would say much about a phenomenology of seeing and understanding as well as a phenomenology of architectural and urban place.

## **Human Beings Immersed in World**

From a phenomenological vantage point, one of the most powerful aspects of space syntax is the way it demonstrates that everyday environmental movement and action are intentional in the sense of a lived synchronicity between human movement and the pathway structure through which that movement unfolds. I would argue that a phenomenological perspective says much about the experiential foundation of this lived synchronicity by pointing out that, typically, the person traverses the environment in a way that is unself-consciously intentional in that there is no question that, through the moving, the body will get to where it needs to go. The urban environment is normally a tacit context providing the taken-for-granted sidewalks, paths, and streets that deliver the person to his or her destination more or less automatically.

As I've already explained, this taken-for-granted fit between human movement and world is interpreted phenomenologically in terms of bodily intentionality or what Merleau-Ponty identified as *body-subject*—the lived ability of the body to move intelligently and thus act as a special kind of subject expressing awareness in a pre-conscious way usually described by such words as "mechanical," or "habitual."

In the natural attitude, we are rarely aware of body-subject, since its actions usually meld with the environment at hand, and we have the freedom to get on with the more significant events of daily life. In terms of intentionality, it is crucial to understand that the knowledge of body-subject is a knowledge that is only forthcoming in effort of the movement, which in turn is only forthcoming because of an already-learned bodily knowledge of the physical world in which the movement unfolds. As Merleau-Ponty (1941/1962, p. 144) makes the point: "It is knowledge in the [body], which is forthcoming only when bodily effort has been made, and cannot be formulated in detachment from that effort." In this sense, body-subject is the lived foundation of the geographical lifeworld.

I want to emphasize that body-subject is not an arbitrary, intellectually-generated concept but a simple, lived aspect of all human beings' lives normally given no attention at all but working at a wide range of bodily and environmental scales—e.g., the easy flow of my hand writing as it marks out letters and words; the tacit awareness by which arms reach for dishes in the drying rack and automatically set them in their right place in the cupboard; the unquestioned ease with which I walk between my home and work place each day. In each case, intentional bodily movements smoothly mesh with the world at hand, illustrating, from a phenomenological perspective, one lived dimension of human-immersion-in-world.

I believe it very important for all researchers interested in way finding and spatial behavior to become self-consciously aware *in his or her own everyday experience* of the web of intentionality fusing body-subject and world. For example, move a thing that has a place to a different place, or

make the effort to travel to a usual destination by a route different than usual. The aim is carefully to observe and record the resulting experiences and to ask what bodily intelligibility in relation to environment might mean for an understanding of way finding and spatial behavior iv.

In examining the space syntax literature, I've noticed that in the last few years there has been considerable effort to draw links among space-syntax structures, way finding, and environmental cognition, whether through quantitative correlational relationships (Hillier & Iida 2005), virtual simulations of way finding (Conroy 2000), research subjects' learning to traverse a real-world environment (Haq & Zimring 2003), or space-syntax reinterpretations of cognitive mapping (Dalton & Bafna 2005). For example, Hillier (2005, p. 9) concludes that "topological and geometric intuitions are used by human minds to form pictures of the complex spatial networks in cities."

As a phenomenologist, one problem I have with this effort to link mental structures and environmental actions is that the supposed connection may largely be beside the point in terms of much real-world everyday environmental experience. Regardless if whether the representational process is Euclidean or topological, any cognitive approach assumes that individuals moving through the city draw on some sort of cerebral representation or awareness as a means to find their way. People are likened to navigators and are assumed to use navigational elements and devices, whether visual elements, least distance, fewest turns, paths of least angle, visual elements, or an internal topographical grid, to consciously decipher where they are in relation to where they wish to be and move accordingly.

As both way-finding (e.g., Golledge, R. G. 1999) and space-syntax (e.g., Conroy 2000, Haq & Zimring 2004) studies have demonstrated, there is no doubt that a mode of conscious environmental attention is important when a person is learning a new environment and literally "finding his or her way," but this situation of environmental novelty is perhaps better articulated and understood in lifeworld terms as a particular mode of place experience—what Edward Relph (1976) identifies as *behavioral insideness*—i.e., a situation involving a deliberate attending to place as it can be represented consciously as some set of objects, views, relationships, or activities. Way finding is an integral part of behavioral insideness in that, through efforts and actions over time, the person figures out how particular paths, districts, landmarks, and other environmental elements cohere into one place, either through some stepwise route imaging or some path-grounded topological imaging.

As I explained earlier, however, people in their everyday taken-forgranted places mostly exist in *existential insideness*—that mode of place experience in which the environment is only occasionally an object of cognitive attention and is much more often just a tacit medium through which the person's lived body moves easily and automatically. In other words, the lived grounding of everyday movement is only minimally some sort of cognitive mapping and much more regularly the nondiscursive synchronicity of habitual body in tune with physical world.

Merleau-Ponty (1941/1962, p. 130) clarifies this body-world coupling well when he describes his own bodily mastery of his apartment: "My flat is, for me, not a set of closely associated images. It remains a familiar domain round about me only as long as I still have 'in my hands' or 'in my legs' the main distances and directions involved, and as long as from my body intentional threads run out towards it." It is this same unselfconscious awareness "in the hands" and "in the legs," extended over wider spatial and temporal scales, which is the lived foundation of our everyday bodily actions, from the placing of a cup on its proper shelf in the cupboard to the daily walk to work that includes

stopping for a to-go coffee at the nearby café to the weekly drive to the organic supermarket.

Some cognitive scientists, drawing on Merleau-Ponty's phenomenological insights, have recognized the importance of bodily intentionality in human decision and action (Gibbs 2006). Analytically, the question is asked as to the relative role of cognition and body, and some cognitive scientists have sought to integrate the significance of bodily intentionality through what has come to be called "embodied cognition" (Gibbs 2006) or an "enactive approach"—in other words, the claim that the human mind understands the world only by virtue of the way the body can act relative to it (Ellis 2006). As cognitive scientist Raymond Gibbs (2006, p. 9) makes the point:

We must not assume cognition to be purely internal, symbolic, computational, and disembodied, but seek out the gross and detailed ways that language and thought are inextricably shaped by embodied action.

Hillier (2005, p. 5) may be correct when he suggests that this embodied-mind perspective can "free our understanding of the relations between minds, bodies and world" from "the conceptual frameworks imposed by society and by science," particularly if central phenomenological notions like bodily intentionality are recast in scientific terms. As a phenomenologist originally trained in analytical social science, I have no argument with such reformulation as long as it is clearly grounded in lifeworld experience.

I emphasize, however, that such a lived reformulation of "environmental getting about" may need to dispatch cognitive processes to a less significant role because the undercurrent of body-subject is so pervasive in directing everyday life. One productive avenue might be a phenomenology of attention and the lived ways that it draws or does not draw people into a bond of awareness with the world in which they find themselves.

In A Geography of the Lifeworld, I identified, besides movement and rest, a third lived component of environmental experience that I termed *encounter*—any situation of attentive contact between person and the world. Observations from the environmental experience groups indicated that, much of the time, we have no self-conscious attention directed to the world at hand with the result that we are oblivious and more attuned to internal goings-on such as imaginings, feelings, worries, bodily states, and the like. At other times, our attention is attracted by some thing or event in the world and we become caught up in that experience—for example, watching a talented street performer or taking in the beauty of the plantings in a handsomely designed plaza. But very little of the time do we encounter the world through the directed attention that cognition assumes and requires, nor do we often draw on that cognition for everyday needs and situations, including environmental orientation and way finding vi.

#### Describing and Understanding Lifeworld

Last, I want to comment on the potential links between space syntax and the third phenomenological theme—describing and understanding the lifeworld. In our daily life, we normally give little reflexive attention to what our world is or how moment-to-moment experience unfolds. Concealed by the natural attitude, the lifeworld is just there, taken-for-granted, with situations, events, and experiences just happening. There is normally no explicit consideration as to why experience happens as it does, whether it could happen differently, or of what larger lived structure the happening of experience might be a part. In this sense, the lifeworld is out of sight as a phenomenon, and a major aim of phenomenological investigation is

to make the lifeworld, natural attitude, and their taken-for-grantedness an object of direct scholarly attention.

One integral aspect of the lifeworld is place and emplacement, which have become a major research focus in environmental and architectural phenomenology (Casey 1994, 1996; Malpas 1999, 2006; Mugerauer 1994; Relph 1976, 1981; Seamon 1993, 2000, 2007; Seamon & Mugerauer 1985, Stefanovic 2000). Always and already, people find themselves in place—always and already given over to and involved with the things, persons, and situations that both arise from and afford that place. Heideggerian philosopher Jeff Malpas explains that to be a human being is to be "'placed' in a certain way, and, typically, such 'placing' involves an orientation such that one's surroundings are configured in a particular way and in a particular relation to oneself—just as one is also related in a particular way to those surroundings.... We find ourselves already in a situation, already living a certain life, already given over to a particular existence—and as such we find ourselves already involved with things, already engaged in a world" (Malpas 2006, p. 40, p 43).

As is demonstrated in both research and practice, space syntax offers a striking picture of how the physical world—specifically, its configurational qualities—contributes to place experience and place making, particularly the discovery that the relative place vitality of an urban district or city appears to be grounded in a particular pathway structure that Hillier calls the deformed grid (e.g., Hillier 1996, ch. 4). Analytically, the physical core of this grid is the most integrated pathways—i.e., those that have many other pathways feeding into them and thus the potential for being alive with street activity, public life, and commerce. In between are segregated pathways that have few or no other pathways feeding into them and are thus potentially less active with street life and more often residential pockets of seclusion and quiet.

Hillier (1996, p. 171) appears to demonstrate conclusively that most urban pathway systems have traditionally been an integrated fabric of deformed grids usually associated with identifiable neighborhoods and districts, the most integrated pathways of which interlock to form a much larger deformed grid that sustained the robustness of the city as a whole. He also points out that 20<sup>th</sup>-century urban design and planning regularly replaced integrated pathway configurations with treelike systems of segregated pathways that destroyed the intimate relationship between local and global integration. The long-term result is that these "spatial designs create serious lacunas in natural movement," which in turn undermines the informal sociability of streets and neighborhoods and may in time attract "anti-social uses and behaviors" (ibid., p. 178).

From a place ballet perspective, Hillier's critique of modernist design and planning suggests that the possibility of individual habitual bodies easily coming together in co-presence has been greatly compromised because the particular pathway configuration does not channel the movements of many people into and along more integrated pathways. In other words, pathway structure holds habitual bodies apart rather than brings them together. Bodies that otherwise might belong together if they could present themselves to each other physically—a situation that the deformed grid readily affords—are separated and cannot meet in the everyday, taken-for-granted co-presence and encounter founded in the tacit ease of bodily regularity. There is much less chance for what humanistic geographer Yi-Fu Tuan has called a *field of care*—i.e., a place that comes to be known affectionately through prolonged, recurring, interpersonal exchanges and experience viii (Tuan 1974).

The ways that the lived belonging-in-place is sustained by the deformed grid's bringing people together along pathways is perhaps the most

their place through various modes of encounter. I can imagine, for example, a phenomenologically-inspired space-syntax study of real-world neighborhoods in terms of who encounters whom in what way and how often and how these encounters contribute to participants' place attachment and to the ambience of the place. I can also imagine a phenomenologically-inspired space-syntax computer game that would allow players to manipulate pathway configuration, functions, densities, and human characters to simulate virtual neighborhoods that are bustling with street life or empty and dead. What a learning tool to demonstrate the significant relationship between physical design and

Rightly, Hillier (1996, p. 151) has criticized much of the research and design focusing on place and place making as involving a one-point perspective that speaks to "the local and apparently tractable at the expense of the global and intractable in cities." He is also absolutely correct when he emphasizes that "[p]laces are not local things" but "moments in large-scale things, the large-scale things we call cities" (ibid.).

human life!

significant and intriguing insight that space syntax offers environmental phenomenology. Belonging, here, no doubt has a range of lived possibilities, but a core phenomenon would be the ways in which people, meeting together in co-presence, become attuned to each other and

Ironically, in his 2005 Proceedings article on phenomenology and social physics, Hillier (2005) uses this localist criticism to argue that a phenomenological approach will never be able to understand cities holistically because they can be experienced "only a part at a time" (ibid., p. 6). He explains: "Because phenomenologists are preoccupied with experience, they are by definition preoccupied with the parts, and seem satisfied with [an abstracted] picture of the physical whole" (ibid.). The result, he suggests, is that phenomenology can offer no account of the lived structure of the deformed grid nor of the singularity of ambience that makes a particular city or urban district distinctive. As he explains,

The defining dimension of our urban experience is of how the parts form some kind of complex whole. This is what we mean when we say 'Boston' or 'London' or 'Sidney'. The greatest phenomenological puzzle about the city is perhaps what we mean by these names (ibid., p. 6).

I hope I have demonstrated that, in fact, Hillier is mistaken here and that the notion of place ballet demonstrates one potential means by which a phenomenological approach might explore and identify a lived place structure that is both local and global in its dynamics and results. In vital urban neighborhoods and districts, as I pointed out earlier, there are probably multiple nestings and overlaps of places and place ballets that range from the daily goings-on of "third places" (Oldenburg 1989) to the sidewalk encounters of neighborhood regulars to the serendipitous appearance of outsiders passing through the neighborhood on their way to somewhere else (Jacobs 1961). More than likely, the deformed grid is a foundation for this intricate web of connections among people and people and people and place. In turn, this web both affords and is afforded by a particular district character, ambience, and sense of place (Vaughan 2006).

In sum, as illustrated schematically in figure 1, there is a threefold, mutually sustaining structure of urban place marked by: (1) topological and functional qualities; (2) lived qualities, including place ballets, grounded in and arising from peoples' actions and encounters in and with place; and (3) a particular environmental and place ambience typically associated with a particular place name (e.g., "East Village," "Soho," "San Francisco," or "London"). The analytical-topological tools of space syntax offer extraordinary assistance for laying out the physical

groundings of these structures and relationships just as a phenomenological approach provides one means for probing these structures and relationships as they illuminate human experiences-in-place and *genius loci*, both locally *and* globally. Most broadly, I'm suggesting that urban vitality can be understood in terms of a synergistic commingling among physical world, people, and place.

Figure 1:

iii-12

Lived relationships among physical city, people and place

#### Topological & Functional Qualities

- ·Spatial configuration
- Convex spaces
- Interface map
- Axial spaces
- Axial map
- Integration & other measures
- Deformed grid
- ■Physical & visual permeability
- •Natural movement
- •Inatural movement
- Virtual community
- •Functional diversity (mixture of primary & secondary uses—Jacobs 1961)
- ■Range of building types (Jacobs 1961)
- Appropriate density (Jacobs 1961)
- Responsive environment (Bentley 1985)





#### Lived Qualities: People-Immersed-in-Place

- Body-subjectBody routines
- ■Time-space routines
- Nested place ballets
- ■Indoor place ballets (e.g., 3<sup>rd</sup> places—Oldenburg 1989)
- Indoor-outdoor place balletsConvex-space place ballets
- Shorter-segment-axial place
- ■Weblike-axial place ballets
- "eyes on street" (Jacobs 1961)Fields of care (Tuan 1974)
- existential insideness (Relph
- 1976)

#### Lived Qualities: Environment as Place

- Neighborhood characterDistrict sense of place
- ■Environmental robustness & well being
- ■Place ambience & uniqueness
- Environmental singularityWholeness & life (Alexander 2002-05)
- City's genius loci (Norberg-Schulz 1980)

## A Lived Hermetic of People and Place

I've titled this paper "the lived hermetic of people and place" by which I mean the everyday way in which human beings are intimately and inescapably conjoined with the world in which they find themselves. What is analytically thought of as two—people and world—is existentially understood as one—being-in-world. From a phenomenological perspective, space syntax is such an invaluable theory and method because it provides a conceptual and analytical language to identify and understand ways in which spatial configuration contributes to particular lived modes of being-in-the-world. In turn, phenomenological studies grounded in a space-syntax perspective might offer helpful accounts of the experiential structures and situations of these lived modes, particularly as they facilitate place making and place. Hillier (2005, p. 12) has described the potential result well when he says that we might much better understand "the full richness and diversity of human experience of the environment."

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- i. In the last few years, there has been some discussion by space syntax practitioners of the contribution that phenomenology might offer space syntax (Hillier 2005, Turner 2003, Read & Budiarto 2003). Hillier (ibid., p. 4) claims that a phenomenological approach seeks "to show how the physical city is reflected in human experience and behavior." He contrasts this "humanistic" aim with the "scientific" aim of what he calls social physics—the study of "how the physical city both embodies and shapes the human city" (ibid.). He argues that space syntax offers a conceptual and applied way to bridge phenomenological and analytical understandings of the city through the structures and dynamics of spatial configuration. I shall say more about Hillier's presentation of phenomenology as the paper proceeds.
- ii. 2. For reviews of phenomenological research on environmental and architectural themes, see Graumann 2002; Seamon 2000.
- iii. 3. Useful efforts to relate body-subject to larger environmental scales include Allen 2005, Hill 1985, Toombs 1995. Grasping the nature of body-subject intellectually is difficult because it is pre-reflective and thus non-representational. Keeping (2006, p. 181) provides a helpful portrait of bodily movement at the scale of room that can be generalized to larger-scaled environmental movements, including pathway behaviors: "[I]n navigating a room full of obstacles while consumed with some intellectual problem, the things in our path are not thematized for consciousness, we are not aware of them in any clear or articulate way, yet we are able to avoid them without difficulty. This is because they are present to us in a motile way, to our motor body, as permutations of the motor field of our being. The room presents to our motor body a field of possibilities, for movement or obstruction, freedom or constriction. We do not navigate it by reproducing a map or representation of it 'in our heads,' but by interacting with it in a dynamic way and feeling the ongoing relationship between the objects in the room and our body as it changes from moment to moment. Nor are these possibilities experienced as neutral possibilities, each one exchangeable for the other. Instead they are felt as 'affective vectors,' pushes and pulls of varying affective tone...."

Note here Keeping's suggestion that integral to this "motor body" is an affective awareness that in *Geography of the Lifeworld* (Seamon 1979) I termed "feeling-subject." This affective strand of intentionality may say much about why and how people establish emotional attachment to place and why environmental phenomenology often evokes the notion of *genius loci*—sense of place (Norberg-Shulz 1980).

iv. 4. We so much take for granted the intentionality of body-subject and its actions that its presence and dynamics are entirely out of sight in daily living, except when body-subject and the world at hand go "out of kilter" in some way—for example, our route to a favorite place is closed because of road construction and we must go another way. In this sense, body-subject is the lived foundation of what Martin Heidegger calls "readiness-to-hand—a situation whereby one's relation to the world is established through use, thus meaning is gained through everyday living (Relph 1985, pp. 17-18). As the opposite of readiness-to-hand, Heidegger speaks of "presence-to-hand"—a situation whereby one's relationship to the world is established by conscious attention and the world thus becomes an explicit object of attention. Heidegger argued that readiness-to-hand is more primary to human existence than presence-to-hand because readiness-to-hand is required to live.

In space syntax, the deformed grid could be considered as one aspect of "environmental readiness-to-hand"—i.e., the situation where, just by a particular pathway configuration's being what it is, a particular pattern of movements (Hillier's natural movement), co-presence, and co-awareness (virtual community) unfold. Space syntax research indicates that, traditionally, there was a kind of unself-conscious environmental readiness-to-hand of settlement pathway structure that fit that settlement's lifeworld like the intimate fit between hand and glove. One of the great questions of our time is whether that place/people intimacy of the past can be recreated self-consciously, through knowledgeable planning and design. Space syntax offers much in finding a practical answer to this question and, already, its diagnostic and design-planning achievements are impressive. See the space syntax website at: www.spacesyntax.com/.

v. 5. Ellis (2006, pp. 37-38) explains well how philosophers and cognitive scientists lost sight of and then rediscovered Merleau-Ponty's emphasis on bodily intentionality: "During the generation after Merleau-Ponty's death [in 1961], his self-organizational approach, with its emphasis on grounding cognition in the body's motility, was largely abandoned by neuroscientists and cognitive psychologists in favor of a mechanical and reductionistic framework. Information processing was now viewed as a passive receiving of input from the environment rather than as an understanding based on the action affordances of the environment. Consciousness was regarded as a final step in the processing stream, a causally irrelevant spinoff or byproduct... Philosophers of mind and cognitive theorists became obsessed with the computer metaphor and with an insistence on reducing 'the mental' to something scientifically (and 'physically') explainable. As is now well known, the resulting computational model of mind viewed consciousness as merely an epiphenomenon of unconscious computational processes in the brain. For a generation of traditionally oriented neurophilosophers and scientists, the attempt to understand those aspects of experiential systems such as human minds that are not analogous to computer functioning, or to billiard-ball mechanical systems, got swept under the rug....

"Phenomenologists were skeptical of the supposedly mechanical aspects of the non-conscious substrates emphasized by computationalists, and therefore shied away from neuroscience altogether. But the vast phenomenon of consciousness itself was too important for psychology to ignore, and thus was bound to re-emerge sooner or later. In order to do so, it had to be

understood in a new way—a way not dominated by a mechanical billiard-ball conceptualization, with its clunky attempts to accommodate the problem of intentional representation within a naïve empiricist epistemology (and consequently incommensurable languages describing the subjective and objective dimensions). For the first time in over a century, neurophysiology and cognitive psychology are again becoming phenomenology-friendly."

vi. 6. Even when we are oblivious to the world at hand, there is still present the pre-conscious perceptual awareness of body-subject—basic contact, as I called it in Geography of the Lifeworld (Seamon 1979, ch. 15). Basic contact is the pre-reflective perceptual facility of body subject, working in tandem with the body, helping to assure that its movements are in phase with the world at hand. The result is a continuous moment-to-moment reciprocity, whereby basic contact assists movement that, in turn, brings about a new perceptual field.

On the relationship among body-subject, attention, place, and technology, especially cyberspace, see Moores 2006; Seamon 2006.

vii. 7. In terms of lifeworld dynamics, it is not entirely clear how or why the pattern of physical movement generated by the deformed grid contributes to the larger environmental phenomenon of "lively district." One conjecture offered by Steadman (2005, p. 484) is that, practically, to save time, effort, and resources, people take the easiest routes, where "easiest" typically refers to physical convenience, sometimes in terms of shortest distance but perhaps more often in terms of connectedness and permeability. Large number of shortest paths run through the web marked out by the most integrated pathways in a specific urban district, thus along stretches of those most integrated pathways people in that district move and meet.

Certainly, such geographical convenience and connectedness may be necessary for transforming a physical environment into a working place, but the equally important phenomenological question is whether and how the physical togetherness of individual participants leads to communal attachment and place ambience. In short, how and why physical togetherness can become existential belonging.

Jane Jacobs (1961, p.129) argues that urban place identity is dependent on everyday use and place-to-place differences: "Most of us identify with a place in the city because we use it, and get to know it reasonably intimately. We take our two feet and move around in it and come to count on it. The only reason anyone does this much is that useful or interesting or convenient differences fairly near by exert an attraction. Almost nobody travels willingly from sameness to sameness and repetition to repetition, even if the physical effort required is trivial. Differences, *not duplications*, make for cross-use and hence for a person's identification with an area greater than his [or her] immediate street network."

Jacobs' brilliant work can fairly be called an implicit phenomenology of the city and urban experience (Seamon 1991). Her account of the street ballet is particularly good in delineating what natural movement and lively streets can lead to in terms of neighborhood lifeworld, particularly the possibility of local responsibility and self-government. In this regard, she identifies three everyday functions of robust streets: (1) "to weave webs of public surveillance and thus to protect strangers as well as [locals]"; (2) "to grow networks of small-scale, everyday public life and thus of trust and social control; and (3) "to help assimilate children into reasonably responsible and tolerant city life" (ibid., p. 119).

One important project is a synthesis of Jacobs and Hillier's understandings of what the city is and how it works. Vaughan's study of the London suburban town of Borehamwood is an instructive effort to synthesize space-syntax and place perspectives in a real-world context (Vaughan 2006). Organized in a way similar to the structure of Christopher Alexander's "pattern language" approach, *Responsive Environments* (Bentley et al. 1985) is one useful model for urban design as place making and, through its emphasis on physical and visual permeability, incorporates a space-syntax perspective, albeit in a somewhat simplified fashion.