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To the Graduate Council:

I am submitting herewith a dissertation written by George Michael Thweatt entitled "The experience of being lost." I have examined the final electronic copy of this dissertation for form and content and recommend that it be accepted in partial fulfillment of the requirements for the degree of Doctor of Philosophy, with a major in Psychology.

Howard Pollio, Major Professor

We have read this dissertation and recommend its acceptance:

Warren Jones, Stephen Handel, Thomas Bell

Accepted for the Council:

Carolyn R. Hodges

Vice Provost and Dean of the Graduate School

(Original signatures are on file with official student records.)

To the Graduate Council:

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Dr. Warren Jones

Dr. Stephen Handel

Dr. Thomas Bell

Accepted for the Council:

essmukel

Associate Vice Chancellor and Dean of the Graduate School

THE EXPERIENCE OF BEING LOST

A Dissertation
Presented for the
Doctor of Philosophy Degree
The University of Tennessee, Knoxville

George Michael Thweatt May 2000

ABSTRACT

In this study, the experience of being lost was explored through phenomenological interviews and essays submissions from 55 participants from the University of Tennessee. When asked to talk and write about some times when they were lost, participants described situations ranging from being geographically lost while hiking or driving, to being psychologically lost while going through a divorce or after the death of someone close. Several participants also discussed feeling spiritually lost, describing a loss of purpose or a lack of meaning in their lives. In each of these situations, participants reported similar emotional reactions which were organized into two reciprocally figural thematic structures: the experience of the self when lost -- lonely, confused, changed, and helpless, and the experience of the world when lost - no landmarks, unfamiliar, different and dangerous. Both the situational categories and the thematic structures are presented with appropriate supportive interview and essay excerpts and these results are discussed in terms of metaphoric and therapeutic implications.

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INTRODUCTION

"Would you tell me please,
which way I ought to go from here?" said Alice.
"That depends a great deal on
where you want to go," said the Cat.
"I don't much care where --" said Alice.
"Then it doesn't matter which way you go," said the Cat.
" -- so long as I get somewhere," Alice added as an explanation.

Alice in Wonderland
(Carroll, 1942)

When Alice asks the Cheshire Cat for directions, the only destination she has in mind is "somewhere." Obviously, Alice is asking for more than a simple geographical route -- she is asking for a reason to care about which way she goes -- a reason why the destination justifies the journey. Like Alice, many people use geographical language to discuss personal confusion and disorientation. In fact, this type of linguistic usage is so routine that is often unclear whether "which way ought I go?" is to be taken as a straightforward geographical question or a geographical metaphor for a more significant question. Lakoff and Johnson (1980) describe the essence of metaphor as "understanding and experiencing one kind of thing in terms of another" (p. 5). Typically, a simple or common experience is used to represent a more difficult or complex experience. For example, the "life is a container" metaphor

makes use of an assumed familiarity with physical containers as a way of enabling a discussion of life's complexities: "I've had a full life" and "my life is empty without her" both structure the broad experience of "life" as a container. In a similar way, the "life is a card game" metaphor takes advantage of an assumed familiarity with gambling as a way of translating and structuring life situations. "I've got an ace up my sleeve" and "you've got to play the cards your dealt" are metaphors that structure life experiences as a series of gambles, comparable to chances taken in poker. Both the container and card game phrases are considered "fixed form expressions" or "phrasal lexical items" -- meaning that each set is structured by a single enduring metaphorical concept. Speaking in this way is so common that it is usually not understood as metaphorical but simply "using the normal everyday language appropriate to the situation" (Lakoff and Johnson, 1980, p. 51). In a similar way, the language describing the complex psychological experience of being lost derives from a single spatial metaphor: "life is a journey."

A metaphor such as "life is a journey" is not used randomly -- its effectiveness as a vehicle for understanding other expressions rests on the universal experience of mobility, which enables both great and small

journeys. By referring to our own history of journeys and wayfinding difficulties, we can relate instantly to another person who describes, for example, their lack of a career goal by saying: "I'm going around in circles again." In the same way, a backsliding alcoholic may be described as "straying from the path." In both cases we understand, via the "life is a journey" metaphor, that these individuals are lost. Even without living through career indecision or alcohol addiction, it is possible to have an understanding of these experiences.

From a clinical perspective, understanding and speaking metaphorically may be essential to therapeutic success. Barker (1996) describes the effectiveness of an indirect metaphorical approach in psychotherapy:

A general, planning a military operation, is often confronted with the choice of mounting a frontal attack or outflanking the enemy. Hitler and his generals chose the outflanking option in the face of the Maginot Line. While I do not regard my clients as "the enemy," there is something to be learned from this metaphor. Sometimes the direct, frontal approach is not the best one. Our Maginot Lines or psychological fortifications -- often called, as military fortifications are: "defenses" -- are too powerful. (Barker, 1996, p. 13).

Metaphors allow therapists and client to communicate by creating a "shared phenomenological world" (p. 69) which bypasses normal

defenses. In other words, metaphorical language provides a mutually understood conceptual referent that allows dialogical partners to engage in a "safe" and potentially therapeutic conversation.

In the symbolic, protected space of metaphors — in the area of "imaginative play" — metaphor facilitates transference, the process in which a person's thoughts and feelings shift from their previous object to the therapist. Etymologically, "metaphor" and "transference" are very similar: the Greek *metaphorein* means "to carry over;" the Latin *transferre* means "to bear across" (Siegelman, 1990). Metaphors allow us to "carry over" the experiences from one domain to another — to talk about life as "just a game" or a "journey" and this indirect, allegorical mode creates a safe haven for someone to "bear across" their feelings to a place where they can be confronted and dealt with:

And in this space of illusion, the projections or projective identifications are allowed and held until the patient can realize that the therapists is *not* his alcoholic father, his depressed mother, his hated sibling, of his magic savior. (Siegelman, 1990, p. 156).

For the many "lost" persons looking for a meaningful direction, for friends and therapists trying to help them "find the way," a deeper understanding of the geographical experience of being lost may provide a

more sophisticated and nuanced language capable of supplementing and strengthening the processes of healing, guidance and therapeutic wayfinding. The present study will attempt to facilitate such an understanding by exploring how people get lost, what it feels like to be lost, and why people feel lost, as detailed in the chapter summaries below.

Chapter 2. Literature Review: How people get geographically lost.

As a prelude to exploring the experience of being lost, Chapter 2
examines several processes capable of enabling geographical
disorientation. Specifically, common navigational biases, spatial disorders
and zero visibility weather events will be discussed.

<u>Chapter 3. Methodology</u>. In this chapter, the rationale and justification of phenomenological and hermeneutical analysis in this project will be discussed. Secondly, a detailed explanation of the specific procedures used will be presented.

<u>Chapter 4. Results.</u> Situational analysis and thematic structure of essay and dialogical interview data will be presented and supported by relevant excerpts from participants.

<u>Chapter 5. Discussion</u>. Initially, the current project was designed to explore the disruption of normal relationships between a person and the

world which occur when we become geographically lost. Because participant responses included many relational themes -- "I felt lost when my parent's were divorced; I felt lost when my father died" " I felt lost without Jesus"-- this section will begin with a secondary literature review, exploring the metaphorical understanding of the word "lost" as interpersonal and spiritual disconnection. Specifically, early parent-child separations will be discussed through an overview of the separation anxiety literature. Separation through estrangement will be discussed by reviewing several influential theorists concerned with self-image and divorce. Separation through death will be discussed in terms of theoretical models of bereavement. Separation through critical transitions will be discussed through a review Bridge's (1985) notion of life transitions. Spiritual disorientation will be discussed in terms of the rise of the secular culture and the influence of scientific theories such as the theory of evolution.

In the final section of Chapter 5, the thematic structure of being lost will be discussed in terms of the disconnection from the stabilizing grounds of other people, certainty, continuity and control. This will be followed by a discussion of the process of wayfinding.

CHAPTER 1: LITERATURE REVIEW

In November of 1983, Richard Dailey and Steven McCoy were deer hunting on horseback in the wilderness of Cuddy Mountain near the Utah-Oregon border. While descending from the summit, only a few miles from their truck, darkness fell, the snow increased and a dense fog settled on the mountain: "land and sky merged in a whiteout...with no landmarks...I had no idea in which direction to head..." (D'aulaire, 1984, p. 87). The two men were hopelessly lost and rapidly becoming hypothermic. In a final, gruesome attempt to stay alive, they shot their horses and survived the night desperately huddled in the carved-out carcasses of the animals. The next morning the weather cleared and they made it back to their truck.

Obviously, Dailey and McCoy's temporary inability to get from the mountain summit to their truck proved to be nearly fatal. To put it simply: getting lost almost killed them. While not all experiences of being lost are as dramatic and dangerous, none are very much fun. Stories of being geographically lost range from the panic and fear of wilderness survival accounts (Byrd 1938; Callahan, 1986; Kirwan, 1960; Scott, 1993) to the

everyday frustration and anxiety of getting lost while driving to the shopping mall.

Considering the frequency with which people report being lost, it is important to understand how we *become* lost. To this end, three processes associated with problems in human wayfinding will be discussed:

- 1. <u>Navigational biases</u>. Personal representations of space are frequently inaccurate because of several well-documented cognitive biases. These biases and their deleterious effects on human navigation will be discussed.
- 2. <u>Spatial disorders</u>. Spatial disorders, such as topographic disorientation, and Balint's syndrome will be discussed in terms of their effect on human navigation.
- 3. Zero-visibility weather events. Dense fogs, blizzards, and sandstorms can effectively shield any view of the surrounding environment, blocking visual access to orienting landmarks. Each of these weather events has proven disastrous to human navigation across various forms of locomotion: driving, walking, and flying. The ongoing calamity of these weather events will be illustrated by news accounts, specifically focused on each of these modes of locomotion. For example, in the case

of driving in the fog, several accounts of recent multi-car collisions will be presented as a way of introducing and emphasizing the *human* impact of zero visibility road conditions. The particular accounts presented were selected for their relevance, recency, and drama. Following introductory accounts, summary statistics on each of the major event/locomotion situations will be presented to provide a more quantitative perspective. Finally, relevant research and recurring themes of being lost in zero visibility will be discussed.

Navigational biases.

In the following sections, the development of human navigation and theories concerning spatial knowledge and representation will be discussed as an introduction to common navigational biases.

Developmental navigational models. Drawing upon earlier work by Piaget, as well as their own studies, Hart and Moore (1971) identify three spatial reference systems that develop sequentially in a child: egocentric, fixed external points, and abstract/coordinate. The egocentric system of reference occurs during Piaget's "preoperational" period (approximately 2 to 7 years old). Lacking reversibility, preoperational children cannot mentally "backtrack" along a route to the point of origin —

only by tracing a continuous, circular route, can they arrive at their beginning. In essence, the route can only be remembered as it is sequentially traversed, with all spatial representations tied to the child's point of view (Piaget, Inhelder, and Szeminska, 1960). Shemyakin (1962) was the first to describe these egocentric topographic representations as "route" maps; she also noted that such route knowledge usually was sufficient for simple navigational tasks.

Around the ages of 8, the child enters what Piaget called the "stage of operational thinking," in which spatial information can be manipulated on the basis of logical operations. At this stage, the child begins to realize the utility of establishing direction and distance in relation to a fixed object in the environment, as opposed to an exclusively self-referencing navigation. These fixed objects, however, are used in reference to discrete local areas — the children can not understand the totality of relations between landmarks and the environment. In other words, they still lack a global and abstract spatial representation of the environment (Piaget, Inhelder, and Szeminska, 1960).

An abstract coordinate system of reference is not achieved until the child enters Piaget's stage of "formal operations" (at 12 years or older).

This transition from a fixed to a "freely transferable" system is crucial for all future large-scale navigations:

Children at this level of development were able to take into account the projective and Euclidian relationships of proportional reduction to scale, accuracy of distance, and metric coordinates...once a child becomes capable of operating on spatial relations completely removed from any actions upon phenomena in space, he or she can enter into a space of ideas with a multitude of spatial possibilities. (Hart and Moore, 1981, p. 201).

At this stage, the child has become an "external" map maker and map reader who can produce global and unified environmental representations. Needless to say, none of these navigational systems precludes the possibility of wayfinding difficulties — after "graduating" from child to adult perspectives, people still continue to utilize egocentric, fixed external points, and abstract /coordinate references — and they still get lost.

Spatial knowledge and representation. For the most part, human beings have no problem negotiating the journey from point A to point B. In fact, there is often an "automaticity" to such navigations. People drive to work, making all the correct turns seemingly without thinking about it on a conscious level — the correct path is such deeply ingrained procedural knowledge that it never has to become figural — we "just do it"

while focusing on other things. Thorndyke and Hayes-Roth (1982) describe procedural knowledge as "spatial knowledge gained from direct navigational experience." This kind of automatic, personal "route" knowledge is considered *primary* knowledge, in contrast with the more indirect, "survey" knowledge from map reading, which is considered a *secondary* knowledge of the spatial environment (Presson and Hazelrigg, 1984; Presson, DeLang and Hazelrigg, 1989). Survey knowledge is acquired only after route knowledge fails or is insufficient for navigation. In short, you don't buy a map if you already know the way.

Both primary (route) knowledge and secondary (survey) source knowledge help create organized representations of the environment commonly known as "cognitive maps" (Downs and Stea, 1977, p. 6). Primary cognitive maps derive from personal navigational experiences and are necessarily constructed in egocentric space. In egocentric space, which continues to be a reference system long after Piaget's "preoperational" stage, the body provides a defining frame of reference that directly guides action. Both children and adults naturally define spatial position in relation to "loci on the body" (Pick and Lockman, 1981, p. 39). In simple terms, up, down, left, right, front and behind are all

extensions from the fundamental understanding of "here" as the body.

Although such an egocentric frame of reference allows us to initiate action — motion in space — we are unable to establish position, primarily because position cannot be established in one dimension, from a single point of reference. To put it in terms of *secondary* navigational knowledge, only by knowing both latitude and longitude can we know position; in a similar fashion, primary navigation also requires fixed points external to the egocentric position of the body.

In an attempt to describe the mechanisms of fixed point primary navigation, Wilkie and Palfrey (1987) trained rats to swim to a platform hidden in an opaque liquid. It is presumed that when the animal is at the platform it records a cognitive map of the distance to various distinctive landmarks. During subsequent return trips to the platform, the rat moves in such a way as to achieve the correct relatively distant from several fixed points. In other word, the rat is able to remember the distance relationship from each reference point to the platform.

Obviously this navigation technique, commonly referred to as "triangulation" depends on the stability of cognitive maps over time.

Unlike the rat in the experiment, which is trying to get back to a recently

visited goal (the platform), animals attempting triangulation after a long passage of time may simply no longer remember the goal-to-reference points distances. If the relative distances of fixed triangulation points in relation to the goal space are not remembered or are remembered incorrectly, it will be difficult or impossible to get back to the goal. (Campbell, 1994).

In the *slope-centroid* model, it is assumed that the navigating animal constructs an axis anchored on a fixed notational point designated as the "centroid." The centroid need not be centered on any distinctive feature or landmark, as long as it is fixed and motionless. Direction is then established by understanding the vector or "slope" one is making with the axis (Campbell, 1994). In effect, a natural compass is constructed, with an allocentric (external) frame of reference. In this case, the frame is centered on the centroid and not on the body.

While the triangulation model depends on the stability of reference point memory, the slope-centroid depends on the stability of the reference point itself. In typical modern human application, the centroid may well be an artificial, unstable landmark. When the centroid, which anchors the axis is removed (building or landmark torn down) or changed (renovated),

the "allocentric compass" is damaged and we are vulnerable to becoming lost (Lynch, 1960).

Even insects display a dependence on centroids and external reference points in wayfinding. To demonstrate this dependence, Tinbergen (1951) placed a ring of pine cones around the entrance of a digger wasp burrow. After the insects became familiar with the presence of the cones around the entrance, they were shifted a few feet away—upon returning from their next foraging expedition, the wasps flew to the ring of cones, not to the entrance of the burrow, indicating that their navigation was based on the total pattern of surrounding landmarks. When this pattern was altered by moving some of the reference points, the wasps became lost (Tinbergen, 1951, cited in Downs and Stea, 1977, p 31).

In addition to the memory and reference point instability of "external fixed point" primary navigation, there are many kinds of primary and secondary navigational biases that may also cause people to become lost. Primary navigational biases emerge from inaccurate cognitive processing of the environment, resulting in misrepresentations of "route" knowledge. Similarly, secondary navigational biases emerge from inaccurate cognitive processing of cartographic maps, resulting in

misrepresentations of "survey" knowledge (Campbell, 1994). These "misrepresentations" cause cognitive map distortion and the result can be quite traumatic:

To become completely lost is perhaps a rather rare experience for most people in the modern city. We are supported by the presence of others and by special way-finding devices: maps, street numbers, route signs, bus placards. But let the mishap of disorientation occur, and the sense of anxiety and even terror that accompanies it reveals to us how closely it is linked to our sense of balance and well-being. The very word "lost' in our language means much more than simple geographic uncertainty: it carries a tone of utter disaster (Lynch, 1960, p. 5).

<u>Primary Navigational Biases.</u> In the following section two main types of primary navigation biases will be discussed: distance estimate distortion and reference point bias.

Distance estimate distortion. Around AD 150, Ptolmey is credited with explaining the so-called "moon illusion" -- the tendency for the moon to appear larger when it is near the horizon. Ptolmey's explanation was that intervening objects on the landscape -- trees, houses, mountains -- create a "filled space" full of depth cues in front of the moon as it sets, thereby creating the strong impression that it is further away and somehow has grown larger. This same "filled-distance" law of perception is used to explain how navigational problems can result from

environmental variations. For example, researchers have documented a strong tendency for people to exaggerate estimates of distance in the presence of environmental barriers (Cohen, Baldwin, and Sherman, 1978; Kosslyn, Pick, and Fariello, 1974; Thorndike, 1981).

In a study assessing the effect of natural barriers on cognitive maps (Cohen, Baldwin, and Sherman, 1978) distance estimates of locations in a familiar camp setting were obtained from 9 and 10 year old campers and their adult supervisors. Interestingly, there were no statistical differences between the adults and the children -- both groups consistently overestimated distance when hills and buildings intervened. In short, estimations of straight line distance are dramatically influenced by the ease of travel and the experience of the detoured path that winds around the barriers. Imaginations of distance reckoned by "how the crow flies" are not independent of "how the human walks." Our experience as human beings who must walk around buildings and up mountains inevitably biases cognitive representations of straight line distances. The straight line is still the quickest way between Point A and Point B, although its hard to arrive at this Euclidian ideal when there are obstacles along the route.

In a similar study involving secondary navigation, it was demonstrated that the amount of *clutter* along a map route increases estimates of the routes distance. In a series of experiments, Thorndyke (1981) presented fictional maps to participants, who were first asked to memorize city pairs along different routes. In both recall and direct map reading conditions, on all routes, the estimated distance increased as a linear trend due to the clutter variable, which accounted for 98% of the variance. In this study, "clutter" was operationally defined as the number of cities *between* the recalled city pairs. Increases in the number of these intervening points were shown to be directly related to increases in distance estimates.

Reference Point Bias. Another way of conceptualizing spatial representations is in terms of reference points. Reference points are those places in a region whose locations are well known. The "reference point hypothesis" assumes that spatial representations are organized around known reference points -- in other words, the spatial locations of nonreference points are defined in terms of their relationship to a much smaller set of reference

locations. An extension of these initial assumptions is the asymmetry hypothesis which predicts that judged distances between a reference point and a nonreference point will be less when reference points are anchors. Put another way, the *order* in which points are considered affects distance estimates between them.

Sadalla, Burroughs and Staplin (1988) examined this hypothesis by asking students to choose from a series of paired campus locations to complete the sentence frame "_______is close to _____." A previous familiarity rating was used to determine the 14 best known locations.

These 14 familiar locations were paired with every other location to yield 91 pairs, counterbalanced for word order and presentation effects, from which the students chose to complete the sentence. There was a significant tendency for the students to place more familiar locations in the first blank of the sentence. This finding is taken to suggest that spatial reference points provide an organizational structure that helps us locate adjacent points in space. The implication is that there is a reference point priority bias which makes cognitive maps dissimilar to cartographic ones.

Secondary navigational biases. Secondary navigational experiences with cartographic maps can also produce limitations in the

construction of cognitive maps, making people vulnerable to becoming lost. Three main types of secondary navigational biases will be discussed in the section below: orientation, prototype, and spatial container bias.

Orientation bias. By convention, most cartographic maps are constructed with north on top and it is assumed that cognitive maps based solely on cartographic information will be stored in this same north-on-top way, creating confusion if we are facing another direction. To test this assumption, Evans and Pezdek (1980) presented subjects with four different orientation displays of three US cities: Chicago, Denver and Atlanta. The displays were rotated in 90 degree increments so that the first display featured north on top, the second had east on top, the third had south on top and the fourth had west on top. The experimental task was to decide if the presentation was a mirror or correct version.

If the cognitive version of the standard US map was orientation free, the reaction time to choose mirror or correct should be the same for each orientation. Results of this study indicated that greater degrees of rotation away from north-at-top were directly related to greater reaction time; north at top had the shortest reaction time, whereas south-at-top had the longest reaction time. In this case, unlike the reference point hypothesis, it

is *similarity* to cartographic maps that makes cognitive maps confusing
-- actual navigations through the landscape can occur at any given
orientation and to the extent that we rely on a memory of a north-on-top
map, confusion is a possibility -- when traveling due south even with a
map in front of oneself -- cartographic left turns need to be translated into
navigational right turns; it may even may be necessary to turn the map
upside down -- to orient it, not as "the cartographer sits," but as "the car
drives" to avoid getting lost (Lloyd, 1997).

Prototype bias. It is usually more efficient to encode a prototype as a representation of a category, avoiding the often unnecessary details of each individual instance of that category. Occasionally such heuristics backfire — and when we try to create cognitive maps with too many "mental shortcuts," there can be sufficient distortion to cause us to become lost. For example, research on urban cognitive maps (Byrne, 1979; Moar and Bower, 1983; Tversky, 1981) has indicated that even when streets and intersections are known, the precise angle of the intersection is often unknown; in this case we often use a 90 degree prototype to fill in missing information. In a similar way, it is often believed that east-west and north-south roads run parallel with each other

because they are intentionally constructed along these directional axes. It would make navigation easier, but this is often not the case. Of course, given sufficient knowledge of the order of landmarks and the sequence of left or right turns it is still possible to navigate through a street network: impromptu short-cuts or quickly drawn directional maps for a friend can be highly inaccurate if based on these right angle and parallel prototypes (Lloyd, 1997). Unfortunately, the geometry of the city is not usually as precise as our personal maps of it.

Spatial container bias. A number of studies have indicated that our storage of spatial information is hierarchically ordered in a "nested" structured — a container metaphor is used to indicate our understanding that one thing is inside or another, which is inside another, etc. (Eastman, 1985; Stevens and Coupe, 1978; Wilton and File, 1975). Cartographic maps reinforce this metaphor by implying that a city is in a county which is in a state which is in a country. Cognitive map distortion can result when we assume that all attributes of a container are distributed to everything in the container. For example, when Stevens and Coupe (1978) asked subjects from San Diego, California the direction of Reno, Nevada, most said it was east of San Diego. Geograhically, Reno is west of San

Diego. While it is true that the larger "container" Nevada is east of California, it is not true that all cities within Nevada are east of California because much of their common border runs in a southeasterly direction.

In a more global perspective, people use rotational, alignment and climatic heuristics to simplify their cognitive map of the continents causing unintentional distortion. Tversky (1981) demonstrated that people draw Europe and Africa as shifted to the south so that Spain is roughly the same latitude as Florida; understandably, southern Europe and its climate are associated with the southern US and its climate.

Geographically speaking, Spain is about 40 degrees north latitude, the equivalent of northern New England. Another dramatic and common distortion is the tendency to align South America directly beneath North America – in geographical terms, the great majority of the South American continent is *east* of North America - the western edge of South America is longitude 80 degrees west which runs north through Miami.

Summary of navigational biases. The systematic distortions discussed above are common and hard to correct because they are based on routine cognitive processing. Strict reliance on distorted cognitive maps leaves us vulnerable to becoming lost. If our idea of how far Point

A is from Point B is inaccurate, if the assumed direction of Point B is incorrect because of a spatial container bias or prototype bias, we may never get to Point B. The common assumption that humans internalize a "God's eye" view of the landscape is not borne out in experience: cognitive maps are inevitably flawed. While it is possible for humans to understand the theory of an absolute Euclidian space, where a straight line is demonstrably the quickest route between Point A and Point B, it is not possible to consistently navigate this way in the "real" world of space anymore than it is possible to ascertain the "true" color of the sky: in each case the feet of the traveler and the eye of the beholder dictate what is real and, in the final analysis, we each have to find our own way.

Perhaps what Lynch (1960) called the "disaster" of geographical disorientation comes from a fundamental uncertainty, which is a reflection of the discrepancy between the ideal Euclidian path and the 'lived" path we walk, and our inability to distinguish the two. We are always somewhere between Point A and Point B -- that is, we are always going from somewhere toward somewhere else -- and we are always haunted by the possibility that there is a better way to get there, that our navigational

intuitions are flawed. When we come to believe that there is no way to reach our destination, we are lost.

Spatial disorders.

Unfortunately, navigational biases, resulting from our less-thanaccurate processing of environmental information, are only one of many
processes that relate to how people become lost. A second problem
involves brain disorders -- specifically, lesions, atrophy and tumors of the
right parietal lobe are blamed for many spatial disorders negatively
affecting human navigation. In the following section four of these
disorders will be discussed: topographic disorientation, right-left
disorientation, below-beyond disorientation and Balint's syndrome.

Topographical disorientation. Topographical disorientation is a disorder linked to trauma of the right parietal lobe which involves errors in forming spatial maps and in using them to determine location or solve topographical problems. Victims of this disorder may even have difficulty negotiating familiar environments, such as their home or neighborhood. It remains undetermined if this deficit represents a failure in *recalling* familiar environments or a failure in *using* imagery to solve the topographical problem. In many cases, topographic disorientation

occurs independently of other visual memories -- for instance, a person may recall other people perfectly but be unable to recall the streets or buildings of the neighborhood. Critchley (1953) describes several case studies which illustrate this problem:

....in the past week, he has become lost about the house on several occasions. He has often had difficulty in finding the toilet, or when he had succeeded, he might miss the pan and urinate on the floor beside (right parietal atrophy: verified) (p. 338)

Other patients with similar parietal problems became lost in their own familiar neighborhood:

....when visiting friends, he often went past their houses, although he knew them well. He took the wrong turning on coming to a road junction on his way to see a friend, along a route that he knew quite well (right parietal cyst: verified) (p. 338)

she went to visit a neighbor, but knocked on a door of another's house three doors away (right parietal astrocytoma: verified) (p. 339).

Right-left disorientation. Lesions of the left parietal lobe commonly result in right-left disorientation. In right-left disorientation the person has difficulty *recognizing* the right or left sides of the body, both his own and that of the examiner facing him. Patients who have right hemisphere lesions, often experience left-sided visual neglect and may have difficulty *locating* the right and left side of objects or themselves. Consequently they may misapply the right and left labels and are destined to have wayfinding difficulties.

Below-beyond disorientation. A similar problem to right/left disorientation is "below/behind disorientation." As the name suggests, this disorientation is characterized by an inability to distinguish the concepts of "below" and "behind." When asked to indicate which portion of a picture lies below, persons suffering from this type of confusion point to the back of a piece of paper. This defect is considered to be similar to the error of some young children who continue a pictorial scene on the reverse of a page -- another example of below/beyond confusion is a patient with a right parietal lobe tumor who wrote the first line of a letter in the usual way and then turned the paper over and wrote the second line on the back of the paper (Critchley, 1953).

<u>Balint's syndrome</u>. Balint's Syndrome results from an injury of both parietal lobes. It consists of three cardinal symptoms:

1. Peripheral neglect. The person has difficulty attending to the peripheral fields and remains focused on one central object. In effect, the victim of Balint's syndrome is wearing "blinders" that prevent access to all positional and directional cues that might lie to the side of the path, making locomotion and navigation problematic.

- 2. Lack of visual integration. In addition to peripheral neglect, persons with Balint's syndrome have great difficulty integrating information from different parts of the visual fields into a whole perception. For example, when shown a picture of a common scene such as a sporting event, they may describe only individual details, such as the clothing worn by one person. Although they might describe numerous such details, they will not recognize that the picture depicts a sporting event. This ability to describe and recognize details but inability to recognize the whole visual array is known as *simultanagnosia*.
- 3. Lack of spatial coordination. The lack of spatial coordination associated with Balint's syndrome is known as *optic ataxia*. Optic ataxia is manifested as a difficulty estimating distances in visual space and in coordinating actions consistent with the proper spatial arrangement. For example, if patients are asked to touch an object with a finger, they often point and miss. When asked to pour water from a pitcher to a glass, they invariably miss the glass. Clearly, someone with such disabilities would suffer ongoing navigational difficulties and be continually vulnerable to becoming lost: "Lost in space and stuck in a perceptual present containing only one object which he or she cannot find or grasp, the patient with

Balint syndrome is helpless in a visually chaotic world" (Bradshaw and Mattingley, 1995, p. 355).

Zero visibility weather events.

Certain types of weather effectively hide the environment. If conditions become severe enough, complete loss of visibility can occur. People caught in such "white-out" conditions are literally blinded, engulfed in a homogenous field that prevents any orientation with surrounding objects – and all too often they become lost and die. In the following section, three weather phenomena: (1) fog, (2) blizzards and (3) sandstorms, will be discussed.

Fog. According to poet Carl Sandburg, "The fog comes on little cat feet — it sits looking over harbor and city on silent haunches — and then moves on" (Sandburg, 1969). Put in more prosaic terms, fog's arrival is silent and delicate and it lingers to bewitch and bewilder the traveler. There is a mystical quality about fog that is haunting — it constricts horizons, obscures backgrounds, flows out and billows over the stage of dreams — but it also erases interstates, engulfs ships, overlays runways, and, in general, hides the path back home. Every year, unfortunate travelers get lost and die in the fog. In the following section.

three modes of transportation will be considered: driving in fog, walking in fog, and aviation and fog.

Driving in fog. Getting lost in fog and "losing" the road for only a few seconds may mean catastrophe. On May 6, 1980, rain and fog on Tampa's Sunshine Skyway bridge caused one of the worst traffic disasters in Florida history. The captain of the phosphate freighter Summit Venture set out early in the morning to go under the Skyway Bridge, as he had done 800 times before. Visibility was good as the ship passed the last set of buoys in Mullet Key Channel and then a squall line with blinding rain and 60 knot winds fell upon the Summit Venture -- the crew reported later that they could barely see the bow of the freighter. At 7:30 am, the ship plowed into one of the Skyway's huge concrete support piers and a section of the bridge's main span collapsed into the bay. Vehicles on the bridge, blinded by fog, drove into the gap and began plunging into the water. Before traffic was stopped, a Greyhound Bus, a pick-up truck, and six automobiles had dropped 150 ft. into Tampa Bay, killing 35 people (Miller, 1996).

Of course, areas other than Florida are conducive to the formation of dense, dangerous fog. Fog occurs often in places like the San Joaquin

and Sacramento Valleys and much of the northern and central coast of California. Large multi-car pileups in the dense fog on the California freeways happen annually. It is commonly reported that cars tailgate and continue to drive at normal speeds in almost zero visibility (Tips for Driving, 1998). Typically, the worst accidents occur when traffic runs into a wall of fog or dust with no warnings. Unfortunately, this phenomenon happens frequently in California's Central Valley. Drivers report not even seeing the fog or dust and then suddenly being thrust into blindness on the other side of the wall. This event was responsible for a massive pileup and more than a dozen deaths, several years ago on Interstate 5.

On November 25, 1995 at least 100 vehicles were involved in separate chain-reaction wrecks on I-5, near Oceanside, California. The California Highway Patrol reported that heavy fog had reduced visibility to 20 feet and people were driving too fast for the conditions. A survivor of the Oceanside pileup said the collisions happened suddenly: "...out of nowhere, the cars just stopped and we had no place to go and then, all of a sudden, we heard the screeching behind us of brakes and we braced for impact..." (Huge pileups jam fog-bound California, 1995, November 25)

The National Highway Cooperative Research Program (NHCRP) reports that between 1981 and 1989 traffic accidents where fog was present resulted in more than 6,000 deaths. In 1990 and 1991, four separate multi-car pileups triggered by fog on limited access highways, involved 240 vehicles and resulted in 21 fatalities and 90 injuries. (NHCRP, 1998). In 1996, the most recent year for which data are available, the Fatality Analysis Reporting System (FARS) attributed 594 traffic fatalities to fog (Fatal Crashes by Roadway, Function, and Atmospheric Condition, 1998).

Fog driving simulation studies. Current simulation research on driver reactions to fog confirms numerous field reports that people often accelerate in foggy conditions. Snowden, et al., (1998) used a virtual-environment driving simulator to demonstrate that as fog increases, the vehicle is experienced as moving slower and slower. Relying solely on the simulator's visual motion cues, participants were asked to maintain the same target speed as in the "clear condition" trial runs. As visibility was reduced and the virtual driving environment became foggier, driver speed increased. It has been suggested (Snowden, et. al, 1988) that this increase in speed occurs because the contrast of the moving environment

was reduced. In support of this view, Thompson (1993) reports that a pattern of moving grating appears to drift more slowly as contrast decreases. This contrast effect has been replicated and extended to other patterns (Blakemore and Snowden, 1996).

By contrast, some field studies suggest that inconsistency in driver response is a major ingredient in multi-vehicle collisions in fog. Following an investigation of a 99 vehicle chain reaction crash on fogshrouded I-75 near Cleveland, Tennessee, the National Highway Cooperative Research Program (NHCRP) concluded the primary cause was not speeding per se, but varying reactions of the motorists involved: some slowed down, others didn't; some pulled over and still others speeded up. Investigators at NHCRP believe that drivers see things differently in fog, noting that motorists in vehicles that sit high off the road tend to drive faster than those close to the ground presumably because they can see more. Other NHCRP accident reconstructions of fog driving behavior indicate that drivers are attracted to lights, such as emergency flashers, and tend to drive into them inadvertently -- this unfortunate tendency has been dubbed "the moth effect." (National Highway Cooperative Research Program, 1998). Surrounded by a

homogenous field of fog, people tend to drive toward the only thing that is figural -- tail lights.

Researchers in this area are hoping to systematically explore and eventually to prevent some of these troubling driver behaviors on the new \$34 million National Advanced Driving Simulator (NADS). The facility is currently being recently been constructed at the University of Iowa and is now fully operational. This new world-class driving simulator is expected to improve highway safety dramatically through a better understanding of "driver-centered human factors issues during the complex interaction of the driver, vehicle and highway environment." The NADS provides the "driver" with a virtual presentation of the driving environment that works in real time to provide a "repeatable, natural and undistorted representation of the visual, motion, auditory and control feel sensory cues associated with the complete driving environment." visual system of NADS produces realistic fields of view, including rear view mirror images, and a three-dimensional, photorealistic external driver view. The Visual System database now includes: current traffic signs, three dimensional objects, "high density" multiple lane traffic which interacts with the "virtual" car, common intersection types, and

roadway weather environment. (National Advanced Driving Simulator: Functional Overview, 1998).

Walking in fog. Needless to say, navigational problems caused by fog are not limited to drivers on highways -- ever year, many unfortunate pedestrians also become lost in fog -- understandably, the most extensively documented episodes involve life-threatening situations or fatalities -- typically hikers who have lost their way in hazardous places and become exposed to treacherous weather conditions.

On January 15, 1995, US Airforce officer Lieutenant Colonel Mike Couillard and his ten year old son were part of a Boy Scout skiing trip in Bolu, Turkey. When a dense fog rolled over the 6,000 ft. mountain, they became separated from the group and were unable to find their way back to the Kartalkaya Ski resort. For seven days, the two survived sub-zero temperatures, huddled in an icy rock crevasse with "nothing to eat but snow." Finally, Couillard decided he had to leave his son and go for help, if they were to survive. Couillard was discovered two days later by a forest worker and villagers; incredibly, he was still alive, in a remote cabin he had found and crawled into. The villagers then climbed up to the

crevasse and pulled out his son, who also survived the ordeal (U.S. Airman and Son Found Alive in Turkey, 1995, January 25).

Seven years earlier on October 11, 1988 four members of Gamma Phi Kappa fraternity started hiking to the top of the 6,228 ft. Mt. Washington about 2 p.m. About 3:30 one of the students, Noel Bouvier, decided to turn back, saying he did not have the proper foot gear. An hour later, the remaining three hikers, reached Tuckerman Ravine, about halfway to the summit. From that point upwards, they encountered severe fog and winds between 35 and 55 m.p.h., with gusts up to 70 m.p.h. -- as well as 4-foot snow drifts. Not long after reaching the top they went off the trail and were lost, walking in thick fog and snow that at times reached their chins. One of the students admitted: "I thought it was all over at this point -- I couldn't move my legs." The unprepared hikers eventually followed a creek to a clearing, managed to light a fire using credit cards and dollar bills as kindling and survived the minus 17 degree wind chill factors that night, wearing only light jackets and blue jeans. A search initiated by Bouvier failed to find the hikers. Fortunately, the next day they continued to follow the creek, which turned into a trail leading to Route 302 (Ribadeneira, 1988)

Walking in dense fog, without any directional cues, people have a tendency to walk in circles. Gatty (1958) reported that without guiding landmarks -- as any featureless environment -- most people walk a full circle in roughly half an hour. In this study, 55% of the participants walked to the right, in a clock-wise circle, whereas 45% walked to the left, in a counter-clockwise circle. This fairly even distribution is taken to indicate that an individual's 'handedness" -- right-handed or left-handed -is not the determining factor, since handedness is a much more skewed distribution. It is believed that assymetries in leg length are related both to the circling and the direction of the circle -- the shorter leg is closer toward the center of the circle, whereas the longer leg is closer to the circumference, meaning that a shorter left leg would induce a left-turning, counter clockwise direction and a shorter right leg would induce a rightturning, clockwise direction. Either way, it would be preferable to remain still, if half an hour of walking in zero visibility only succeeds in getting you back where you started.

Aviation and fog. Understandably, all things that fly are vulnerable to disorientation in fog. As poet W.S. Auden warned, fog is a "sworn foe to festination" and a "daunter of drivers and planes"

(Auden, 1972). Since their invention less than a hundred years ago, planes have crashed into enshrouded mountains, fogged-out runways, other aircraft, and even hidden skyscrapers. Becoming lost in the air, even briefly, can be fatal.

On February 5, 1998, Freddy Harrell Pate, 62, and his son, Freddy Harrell Pate II, 25, were flying to the Possum Kingdom Airport in Palo Pinto County, Texas. The people waiting for the flight on the ground heard the plane circling and assumed that the Pates were unable to land because fog had obscured the small airport's 3,200-foot runway. When the sound of the circling plane stopped, and the plane became "alarmingly over-due," flight instructor, John Whitmore, took off in the fog, knowing he could not spot the plane, but hoping he would pick up the planes emergency locator transmitter: "At first, I wasn't picking up any signals, and I was comforted — then I received the signal, and my heart just stopped."

About 6:30 a.m. the next morning two helicopter pilots from Arlington flew out to the area where Whitmore had picked up the signal and found the wreckage scattered over an acre of cedar brush, about five miles southwest of the airport. Despite more that 20,000 hours of flight

time, Fred Pate had crashed the seven-seat Piper into a fog-enshrouded hill near Possum Kingdom Lake. There were no survivors (Lunsford and Warren, 1998).

On June 22, 1998, the pilot of a small Cessna was killed when he crashed into the Ocean City (Maryland) Airport in heavy fog. At 10 p.m. the plane was spotted flying "in distress" and a massive ground search was initiated, but the plane was not discovered until 11:30 p.m.

Maryland Sate Police Spokesman Pete Piringer explained the rescuers problem: "The visibility was only about 10 feet -- fire and police personnel walked shoulder to shoulder, and it took them about an hour to locate the plane, which was not far from the end of the runway" (Pilot Killed in Crash at Ocean City Airport, 1998).

One of the most dramatic aviation fog crashes in US history occurred in New York City in the last days of World War II. Lt. Colonel William F. Smith, veteran of 34 bombing missions, was flying to Newark, New Jersey. Smith was advised to maintain an altitude of 1,500 ft. above New York City, but, for some reason, he entered the foggy air above the city 500 ft. too low. When the plane momentarily emerged from the fog, Smith found himself in a "nightmare maze of skyscraper tops." After

managing to zig-zag around several buildings, the 20 ton bomber smashed into the side of the Empire State Building at 9:49 a.m., Saturday, July 28, 1945 -- straight into the 79th floor, and through the offices of the National Catholic Welfare Council. It was reported by observers on the street that the flames burned like a torch on what was then the world's tallest building and the symbol of the city. The fog then closed in again, and there was only a bright orange haze.

An article in the *New York Daily News* describes the details of the crash:

The impact tore off the bomber's wings. One engine sliced through the building's north facade and ricocheted into an elevator shaft, piggy-backing on an empty cab and crashing with it into the basement. Pieces of airplane followed, clanking noisily downward. The second engine cut through the Empire State's outside wall, both sides of an elevator shaft, two firewalls and a partition before shooting out the south side and plummeting afire to the roof of 10 W. 33rd St. Fragments of glass, steel, brick, mortar and human beings sprayed out over midtown (Jamieson, 1998).

After weeks of investigation, it was speculated that Smith may have mistaken the East River for the Hudson in the fog and assumed he was safely over the New Jersey lowlands. Fourteen people died in the accident, including nine young women in the Catholic Offices who were incinerated while preparing care packages for the boys overseas.

In 1994, the most recent year for which cause/factor tables are available, fog was considered to be a factor in 35 aircraft accidents, with "obscuration" listed as a factor in 13 accidents and "whiteout" a cause or factor in 2 accidents.

As these episodes illustrate, certain human reactions to fog -being surprised, being unprepared and becoming impatient -- may lead to
catastrophe. For example in Tampa's Sunshine Bridge multi-car
collisions of May 1980, motorists were surprised by the suddenness of
the fog -- even though it is common on the bridge, they still were
unprepared for the rapid loss of visibility and continued to drive normally
-- they did not slow down.

In a similar fashion, drivers in California reported driving into a "virtual wall of fog or dust" with no warnings. Typically, the fog or dust "wall" is not even seen approaching and the drivers are "suddenly thrust into blindness on the other side of the wall." One driver involved in the massive collisions of November 25, 1995 near Oceanside, California, described the fog as emerging "...out of nowhere." As in Tampa, people continued to drive too fast for conditions, impatient to get to some destination, despite low visibility.

In every transportation mode mentioned above, even experienced veterans are caught by surprise and unprepared for the suddenness of fog: the pilot of the *Summit Venture* had navigated under the Sunshine Bridge 800 times before the sudden fog and blinding squall line caused him to crash into the moorings of the bridge; Fred Pate had accumulated 20,000 flight hours before crashing his Cessna in a thick Texas fog; Colonel Smith had flown 34 bombing missions before crashing into the Empire State Building. Perhaps there is no way to prepare for the complete loss of visibility in a thick fog, and the best we can do is try to avoid these situations through improved forecasting.

Blizzards. In 1898, young Vilhyalmur Stephasson — future arctic explorer — started a ranch in North Dakota with three of his friends. As they were celebrating their first Thanksgiving, a winter storm from Canada turned the world to "swirling white." Unfortunately, the boys had neglected to string a rope from house to barn, as was the custom in blizzard conditions. Stephasson became worried about the animals and decided to go to the barn, relying on the wind direction, confident that he could find the long building standing broadside to the house, a few hundred feet away. He almost didn't make it. When he finally found the

barn, drifting snow had covered the door, and he was forced to turn around and somehow managed to arrive safely back at his house. Many of his neighbors were less lucky that night. Stephasson reports that "20 men had gone in search of their barns, never found them, and been frozen to death." Years later, as a proven arctic veteran, Stephasson describes his attempt to find that barn that night as "one of the most foolhardy enterprises of a career that has been in considerable part devoted to similar things" (Stephasson, 1913).

In South America, the word for blizzard is "el tormento" — an appropriate label for the anguish and death that blizzards inflict every winter. Blizzards present a formidable, often insurmountable, challenge to human navigation: "white-out" conditions can blot out the closest and most familiar of landmarks. Throughout history, winter travelers have been unprepared for the blindness, freezing cold, and even the *suffocation* that occurs in blizzard conditions. In her book, *Snow*, Ruth Kirk (1977) warns: "...snow may fall so thick that it is hard even to breathe without sucking in its flakes. If the temperature is low enough under these conditions, the snow is fine and dry and sifts into any loose opening.." (Kirk, 1977, p. 178) Blizzards engulf and invade their victims —

especially in frigid conditions. Frank Debenham, a geologist on Scott's tragic second expedition describes his experiences during an antarctic blizzard: "If you have a tiny pin hole in your tent, for instance, and watch it during a cold blizzard, you can see the fine trickle of snow dust coming through it, looking exactly like the trickle of fine sand running through the hour glass" (Denham, 1961, p. 179).

Although blizzards occur in many parts of the world, they are *most* common in the midlatitude interiors of North America and Eurasia. In the U.S., The National Weather Services issues blizzard warnings when wind speeds reach 35 miles per hour, combined with considerable amounts of falling or blowing snow, and "dangerously restricted" visibility (Ebert, 1993). Like fog, blizzards may create zero visibility conditions on the road and airport runways causing drivers and pilots to become disoriented and crash. Unlike fog, blizzards *also* produce deadly wind chills and slippery surfaces making it difficult to isolate "disorientation in zero visibility" as the sole cause of automobile and aircraft accidents. For this reason, this section will focus on pedestrian navigational difficulties in blizzards.

Hiking and blizzards. As is the case with fog, blizzards are most deadly when unexpected. A recent news report illustrates that inexperienced winter hikers consistently underestimate the potential for winter weather in early spring and are unprepared for sudden blizzard conditions. Some are lucky enough to be rescued after a miserable night or two. Many get lost and die.

On April 6, 1998, five students from England were climbing Sgurr Dearg, one of the most dangerous peaks of the Cuillins mountain range in Scotland. They got lost in the swirling mists of an unexpected blizzard, took a wrong turn and found themselves on a ledge above a 900 ft. drop. Accumulating snow and ice on the rocks made it impossible for the students to relocate the trail. They spent the next 21 hours, huddled in a tent and shivering from the cold before rescuers found them. Scottish mountaineer Hamish MacInnes said that it was common for climbing groups from England not to appreciate the severity of weather on Scottish mountains in April: "People do not realize that winter is extended here and that it is quite common to have full winter conditions in April (Mowat and Lawson, 1998).

Of course, blizzards are most dangerous when they are accompanied by extremely low temperatures. On New Year's Eve 1998 - Paula Macklin and Justin Creasy were at 20,000 ft. on the Himalayan peak known as Thorong La. As darkness fell, temperatures plummeted to -40C, a blizzard struck and they wandered around blindly for hours.

Justin still remembers the event clearly: "All the landmarks had been obliterated by the blizzard -- I had hoped we just had about three hours walking before we reached civilization that morning. In fact, is was seven of the hardest hours I have ever endured before we finally came upon a mountain village where we were able to recuperate" (Frost, 1998).

Blizzards are the most dangerous and violent type of winter storm. The strong winds, low temperatures and poor visibility of a blizzard often are a fatal combination. In one of the largest single storm death tolls, the blizzard of 1812 left 112 dead in the Northern Plain States of the US and Canada. Forty-four years later, one of the most dramatic blizzard episodes in US history occurred. On October 28, 1856, one hundred persons migrating from Springfield, Illinois to California reached the Sierra Nevada mountain range when a violent, blinding snowstorm hit. An eight day blizzard followed by additional storms left the Donner Party

trapped in waist high snow and bitter cold. They soon ran out of supplies and killed the cattle, horses and even dogs to survive. By mid-December the remaining survivors were starving to death and some of them were said to have eaten the flesh of those who had died (Ebert, 1993).

In March, 1888, a tremendous blizzard struck the North East, killing 400 people, 200 in New York City alone. More recently, a 1941 blizzard was blamed for 39 deaths in eastern North Dakota (Gray and Male, 1981). One of the worst years was 1958, with 345 snow-related deaths. In 1960, 354 persons died of snow-related causes. In January, 1977, the worst blizzard in its history struck hit the Buffalo area of western New York. The storm raged at full intensity for 17 hours eventually adding to the December snow accumulations for a total of 93 inches. The storm is reported to have advanced on Buffalo like a "white wall." Visibility officially remained at zero from 11:30 am Friday to 12:50 am Saturday, January 29. Many people became disoriented and abandoned their cars, seeking shelter wherever possible.

In the United States alone, there are around 90 snow related deaths each year, most of them attributable to blizzards. The National Oceanic

and Atmospheric Administration (NOAA) reports that one-third of all blizzard victims are killed in traffic accidents (NOAA, 1975).

Sandstorms. In 1922, explorer Hasseim Bey was halfway between the Libyan desert village of Jaghbub, headed for nearby Jalo when the first sandstorm struck:

It is as though the surface were underlaid with steam-pipes, with thousands of orifices through which tiny jets of steam are puffing out. The sand leaps in little spurts and whirls. Inch by inch the disturbance rises in obedience to some upthrusting force beneath. Larger pebbles strike against the shin, the knees, the thighs. The sand-grains climb the body till it strikes the face and goes over the head. The sky is shut out, all but the nearest camels fade from view, the universe is filled with hurtling, pelting, stinging, biting legions of torment. The traveler can scarcely keep his eyes open, and yet he dare not close them, for one thing worse than the stinging of sand grains is to lose one's way (Bey, 1922, p. 280-281).

Unlike blizzards, in which the unfortunate traveler is advised to stop and wait if possible, halting in a sandstorm is often fatal. Bey warns desert travelers that sand accumulates quickly around any stationary object, leaving only a smooth rounded heap: "if it is torture to go on, it is death itself to stop" (p. 281). It is reported that even camels have learned that it is death to stop and they will continue to inch forward slowly even when the storm is at its fiercest. This necessity of continuous motion in a sandstorm is echoed in the recent novel, *The English Patient:* "Even when

we were in trucks in later years, we would have to keep driving with no vision. We had to keep moving. If you pause, sand builds up around you as it would anything stationary and locks you in. You are lost forever" (Ondaatje, 1992, p. 137).

Unable to stop, forced to moved forward in blindness -- desert walkers are at the mercy of the blowing sand. Sandstorms engulf, invade, and suffocate their victims, much like the fine snow particles in especially cold blizzards:

The storm drives the sand into everything one possesses. It fills clothes, food, baggage, instruments, everything. It searches out every weak spot in one's armour. One feels it, breathes it, eats it, drinks it, lives it — and hates it. The finest particles even penetrate the pores of the skin... (Bey, 1922, p. 281).

Two basic conditions are necessary for a sandstorm: a sufficient supply of detachable surface material and a wind system powerful enough to lift this material into the atmosphere. The "sand" in the typical sandstorm is medium sized silt (.03 mm) and smaller particles of clay (.002 mm). The "detachability" of this material depends on the moisture content of the soil and the amount of cementing organic and mineral matter. For this reason, these storms are common in areas that have been "denuded" of plants because of overgrazing, radical deforestation, or

extremely dry climates which cannot support plant life, like deserts (Ebert, 1993). In low latitude desert environments, where the air is unstable and the atmosphere has sharp temperature drops with elevation, dust may be lifted to 15,000 ft., obscuring the sky, and spreading over wide areas. These low latitude storms are known as the *khamasins*, an Arabic word meaning "50," which refers to the roughly 50 day Egyptian "sand season" which begins in March.

Recent Middle East Sandstorms. The Egyptian/Libyan desert region produces some of the strongest and most devastating sandstorms on the planet. Like other natural hazards, these "catastrophes" seem magnified in modern times because of instantaneous international reporting and population growth in vulnerable areas. For example, on March 16, 1998, the 16 million inhabitants of Cairo, veterans of many sandstorms, were stunned by the sheer magnitude of a storm that enveloped the city. By lunchtime, the sky turned an ominous brownyellow. By mid-afternoon, visibility at the city's international airport was reduced to 200 meters. The storm, which originated in the Egyptian-Libyan desert led to the collision of two ships in the Suez Canal. In nearby Lebanon, a Beirut seaside ferris wheel, a city landmark that

survived even the 1975-1990 civil war, was blown over around dawn.

When the storm finally ended after three days, four people were killed and 70 injured in road accidents throughout the region. Authorities in Egypt closed the country's main road to Aswan and the desert route east to the Sinai peninsula (Jenkins, 1998).

In the previous year's khamasin season, on May 4, 1997, a series of powerful Egyptian sandstorms killed 22 people in accidents ranging from fallen trees to collapsed walls. As the first storm roared in from the Libyan desert in midafternoon, the sky turned from gray to red to "eerie white," from the wind and sand. The Egyptian Interior Ministry said 12 provinces were affected by the series of storms, which blinded drivers and sparked fires by downing electrical lines. The storms briefly grounded air traffic at Cairo International Airport and plunged the capital into darkness for about an hour. The Egyptian Meteorological Authority reported winds of 68 miles per hour and described these the sandstorms as the worst in three decades (Blinding sandstorm claims 22 lives, 1998).

The dust bowl. Sandstorms are not limited to the Middle East.

Another area vulnerable to this type of weather event is the Southern

Plains of the United States. The Southern Plains, which includes large

parts of Kansas, Colorado, New Mexico, Oklahoma, and Texas, are designated as "semi-arid," -- meaning they are a few inches of rain per year shy of a desert. During the 1920s, the plains were extensively plowed in preparation for wide-spread planting of wheat. This uncontrolled "sodbusting" soon proved to be an ecological disaster. By ignoring the area's naturally propensity toward drought and wind, farmers were providing additional "fuel" for future duststorms:

the storms were mainly the result of stripping the landscape of its natural vegetation to such an extent that there was no defense against the dry winds, no sod to hold the sandy, powdery dirt. The sod had been destroyed to make farms, to grow wheat, to make cash (Worster, 1979, p. 13).

In the 1930s a cruel 10 year drought hit the plains and it did not surprise meteorologists to see a few small dust storms throughout 1932 and 1933. No one, however, was prepared for the magnitude of the blow of May 1933, which "swept in a new dark age." On May 9, 1933, an estimated 350 million tons of dirt were sucked up into the airstream -- by late afternoon, the storm reached Dubuque and Madison; by evening, the dust was falling like brown snow over Chicago -- the next day it reached the urban centers of the east coast -- Boston and New York.

These "black blizzards" were triggered by polar air masses which lifted the dirt into a cold boil of rolling turbulence that resembled a "long wall of muddy water" that reached heights of 8,000 ft. The giant duststorms continued for the better part of the 1930s - day after day, year after year, the dirt and sand flew, bringing despair. Surviving plains residents remember 1935 as the blackest year. On March 15th of that year, another of the monster storms hit Kansas City. A seven year old boy was lost in the gloom and was later found suffocated in a drift of sand. Worster (1979) interviewed long-time Plains residence Nate White who remembers leaving the movie theater on that day: "it was as if someone put blindfolds over my eyes" (p. 16). He describes bumping into a telephone pole, skinning his shins, and eventually crawling on his hands and knees along the curb toward a dim house light. A reporter from the Kansas City Times claimed that "Lady Godiva could ride through streets without even the horse seeing her" (Kansas City Times, 1935, cited in Worster, 1979, p. 17).

As horrible as the March 15th storm was, it was not the worst of the season -- that "honor" is reserved for the spectacular finale on April 14, 1935 -- a day that has come to be known as "Black Sunday." At noon on

that day the skies were so clear and blue across all the plains that everyone was seduced outside on picnics, planting gardens, visiting neighbors. By midafternoon, the temperature dropped 50 degrees, birds flew into yards "nervously chattering as though fleeing some unseen enemy" (Worster, 1979, p. 18) and then it appeared on the northern horizon, an immense duststorm, moving toward the Plains. The black wall hit Dodge City at 2:40 p.m. John Garret, who lived in Dodge City at the time of the storm, was interviewed by Worster. Garret reports thinking he could beat the storm home. He lost the race. When the storm enveloped the car, Garret and his wife were forced to abandon it and grope the fence wire "hand over hand" to reach their door. Rebekah Ellsaesser, who lived in Sublette, Kansas at the time of the storm, was also interviewed by Worster. Ellsaessar remembers being "unable to see even the winged hood ornament of the car" (p. 19). When the static electricity from the dust shorted out her ignition, she tried to walk the remaining three-quarter mile home and stumbled into a near-by field with "absolutely no sense of direction." Her husband eventually found her "gasping for air and near collapse" (p. 20).

Songwriter Woody Guthrie described the apocalyptic feelings of despair that accompanied these storms in his song, *The Great Dust Storm*:

"It fell across our city like a curtain of black rolled down; We thought it was our judgment, we thought it was our doom" (Guthrie, 1968). The darkening skies of the dustbowl storms created a surreal atmosphere in which people imagined the weather as an instrument of divine wrath.

Street-corner sects sprung up in Topeka and Hill City, Kansas warning pedestrians to "watch for the Second Coming of Christ." For many Plains residence caught in the inescapable dust, even sleep brought no relief and it seemed like the end of the world was near:

All day long you could hear the wind moaning around the eves, the fine, soft talc sifting in the keyholes, the sky a coppery gloom; and when you went to bed, with a washcloth over your nose, the acrid dust crept into your dreams (Worster, 1979, p. 23).

The Soil Conservation Service provided a profile of the decade by compiling a yearly chart of all regional duststorms in which visibility was cut to less than a mile: In 1932, there were only 14 such storms; in 1933 there were 38; in 1934 - 22; in 1935 - 40; in 1936 - 68; in 1937 -72; in 1938 - 61; in 1939 - 39; in 1940 - 17, in 1941 - 17. By this criteria, 1937 was the worst overall year. By another criteria -- total number of

hours of dust per year, 1937 was also the worst year, with 550 hours of dust (Worster, 1979).

Attempts to stop or to moderate the dust and prevent future dustbowls were began in 1935. President Roosevelt initiated the shelterbelt program designed to create a buffer zone, protecting the east from the duststorms. Eventually trees were planted in a narrow 100 mile zone stretching from Childress, Texas to the Canadian border in the transition between the tall grass prairie and the short grass plains. Unfortunately, this zone was too far east to stop the duststorms. In addition, farming techniques such as terracing and contour plowing, created multi-level furrows which were better able to withstand wind erosion, but these practices were expensive and time consuming and not wide-spread. The problem remained one of greed and short term profit taking -- farmers were willing to take chances, winning in good seasons and risking ecological disaster in seasons of drought and wind. In the 1950s another severe drought struck the region and the dust storms started to happen again. In 1952, there were 10 major dust storms. In March, 1954, basketball games were canceled because of dirt on the court, streetlights came on at mid day as they had in 35, and a man blinded by

blowing sand smashed his car into a bridge abutment, cattle choked to death on the dust, and unfortunate tourists became lost and stranded (Worster, 1979).

Meteorological records indicate that approximately every 20 years, severe drought develops in the Plains. After "Dust Bowl II" in the 50's, there was another drought in the 1970s. In 1974, the dirt began to blow again. By February, 1976 the Soil Conservation Service estimated that over 10 million acres from Texas to the Dakotas were vulnerable to serious wind damage. Red dust coated grain elevators in Texahoma. Colorado's Interstate 70 was blocked to prevent travelers from "driving into a nightmare." Farmers wore ski masks, and began "deep plowing" to pile up protective lines of earth to check the wind — but it wasn't until the rain came back at the end of the summer of 1997 that "Dust Bowl III" came to an end.

Summary of zero visibility weather events.

The situations described above repeatedly demonstrate that the world is not a separate arena that assails helpless, passive humans -- rather, it is the human-world interaction that accounts for much of the wayfinding difficulties and tragedy of zero visibility weather events.

Fog, blizzards, sandstorms and dust storms are not malevolent forces of nature, intent on inflicting disorientation and death on those whom they blind and enshroud -- it is the combination of human impatience, persistence of motion, and lack of preparation in the face of a blinding weather event that causes catastrophe. Patience and retreat defeat fog. Seeking nearby shelter and waiting for clearing can enable survival in a blizzard. Long term planning and ecological sensitivity prevent conditions capable of leading to dust storms. Heeding forecasts and warning will help us avoid hazardous weather. Ultimately, it is the human decision to live and travel in areas prone to visibility problems that enables the possibility of becoming lost. Since little can be done to effect the weather, what must be changed is human navigational behavior in the presence of the low and zero visibility events. As always, the problem does not lie exclusively with the world nor with us -- but both with us and the world. Summary of perspectives on how people get lost.

Navigational biases, spatial disorders, and zero visibility weather conditions all contribute to human wayfinding difficulties. In the case of navigational biases, human processing of route and survey environmental information becomes distorted through mental heuristics that tend to

"smooth-over" the less-than-smooth world: in the landscape of
"cognitive maps," all intersections are 90 degrees, all north-south roads
run parallel, and South America lies directly under North America -- in
short, the world of the mind is a more regular place than the world of
nature. Reliance on such cognitive "short-cuts" can lead to navigational
disaster.

In additions to navigational biases, traumas to the parietal lobes have also been linked to wayfinding difficulties. These traumas can result in spatial disorders such as topographical disorientation and Balint's syndrome, which often leave the patient confused, disoriented and lost. If one were inclined toward paranoia, it might appear that both our minds and our brains were designed with basic flaws that make getting lost inevitable. To utilized the computer metaphor of cognitive psychology, both our "software" and our "hardware" exhibit tendencies toward systematic errors that ensure some degree of navigational confusion.

At times, the world itself also seems to conspire against human travels by concocting fogs, blizzards and sandstorms that disorient the unprepared traveler. Once engulfed in a homogenous weather field -- whether composed of fog, snow, or sand -- there can be no directional

cues concerning which way to precede and there is no reason to prefer one direction over another. A person quickly becomes hopelessly lost:

.... and truly I think if all our wits were to issue out of one skull, they would fly east, west, north, south, and their consent of one direct way should be at once to all the points o' the compass (Shakespeare, 1968, Coriolanus, Act 2, Scene 3)

In zero visibility conditions, we are blind to the natural world. As the anonymous "third citizen" in Shakespeare's *Coriolanus* observes, it is indeed a desperate situation when the accumulated wisdom of "all our wits" can provide no better navigational advice than to go everywhere at once -- if that were possible -- with the hope of finding some place beyond the "placeless" void.

Upon considering the ubiquity and possible tragedy of these "navigationally impairing" processes, it may be difficult to imagine how a person *ever* successfully negotiates the potentially treacherous journey from point A to point B. It is *not* difficult, however, to imagine the traumatic impact that being lost might have on the person disoriented by a cognitive bias, suffering from Balint's syndrome, or lost in a blizzard. It is also not difficult to imagine the metaphorical significance that being

geographically lost '-- for whatever reason -- might have on other aspects of the self-world relationship.

Having just reviewed some of the many ways in which people may become lost, it is now time to turn toward the central focus of this study -- the task of exploring when people are aware of being lost and what they are aware of in these circumstances. Such a descriptive exploration of the experience of being lost was conducted utilizing an existential-phenomenological methodology, which will be discussed in detail in Chapter 3.

Dilthey (1976) was the first to develop a systematic contrast between *Naturwissenschaften* (the natural or physical sciences) and *Geiteswissenschaften* (the human sciences). For Dilthey, the difference between these two sciences could be characterized by the object of study. Natural science studies things, natural events and the way objects behave. Human science studies persons or beings with consciousness that act purposefully in the world to create meaning.

From a linguistic perspective, the difference between natural and human science is revealed in the labels each applies to human beings: natural science is concerned with "subjects" and "individuals" whereas human science involves "participants" and "persons." W.H. Auden (1967) observed that "individual" is primarily a biological term used to classify solitary organisms such as a tree, a horse, a man, or a woman, whereas "person" refers to the uniqueness of each human being: "as persons we are incomparable, unclassifiable, uncountable, irreplaceable."

In terms of research techniques, psychology as a natural science continues to use the procedures of experimentation and quantitative

measurement in an attempt to predict probabilistically the behavior of people. Psychology as a human science emphasizes description and interpretation as a means of *understanding* the lived meaning of experience. The particular human science methodology of existential phenomenology is used in this study to explore the experience of being lost.

Existential Phenomenology

As the name suggests, existential-phenomenology is a combination of existentialism and phenomenology. Existentialism seeks to portray a person as emerging and becoming, not as an aggregate of compounds, or as a pattern of behaviors:

....no matter how interesting or theoretically true is the fact that I am composed of such and such chemicals or act by such and such mechanisms, the crucial question is always that I happen to exist at this given moment in time and space, and my problem is how I am to be aware of that fact and what I shall do about it (May, 1983, p. 50).

In other words, existentialism is concerned with the basic question of existence -- why something is -- as opposed to the question of essences -- what something is. Existentialism is generally reckoned to have begun with Kierkegaard in the mid-nineteenth century whereas the philosophy of phenomenology began at the close of that century with the work of

Husserl. While Kierkegaard, and later Nietzsche, focused on the concrete existence of individual human beings, Husserl's aim was more theoretical -- it might be described as an attempt to formulate an existential methodology.

....phenomenology meant the rigorous and unbiased study of things as they appear so that one might come to an essential understanding of human consciousness and experience. The development of specific methods for studying human experience is one of the primary contributions of phenomenology (Valle and Halling, 1989, p. 6).

Van Manen (1990) describes five general characteristics of phenomenological research:

- 1. Phenomenological research involves the description of lived experience; that is, it seeks to describe the world we experience before it is taxonomized, classified or abstracted.
- 2. Phenomenological research is retrospective. It is assumed that a person cannot reflect on a lived experience while living through the experience. This implies that phenomenological reflection is never introspective but necessarily recollective or retrospective toward a prior experience.

- 3. Phenomenological research is the study of essences.

 Phenomenology is a systematic attempt to uncover universal structures that are revealed in particular manifestations of the phenomenon.
- 4. Phenomenological research is concerned with personal meaning. It seeks meaning in the life world of individuals, not in reference to particular external referents, as is the case with many other disciplines. For example, sociology is concerned with individuals as they interact in and with social groups, whereas phenomenology stays centered on the meanings in an individual's everyday existence.
- 5. Phenomenology is systematic, explicit and self-critical.

 Phenomenology systematically engages in rigorous modes of questioning, reflecting, focusing and interpreting. It attempts to articulate the content and form of text, as opposed to leaving the meaning implicit as sometimes happens in poetry or literary works. Finally, phenomenology is self-critical in that it continually questions its own methods and goals to understand its strengths and weaknesses (Van Manen, 1990).

Phenomenology offers an approach to understanding human beings that rejects both a "subjective" first-person consciousness and an "objective" third-person consciousness, in favor of a second-person or

dialogical method. In other words, phenomenologists assert that consciousness is neither entirely in the mind, nor entirely in the world, but in a continuing and perpetual dialogue with the world:

...consciousness is viewed as neither self-sufficient, nor as located in the unreachable interior of a thinking subject but, rather, as a relationship between the living subject and his or her world (Pollio, Henley, and Thompson, 1997, p. 4).

The German philosopher Martin Heidegger, a student of Husserl, was one of the first to combine the concerns of existentialism with the methodology of phenomenology to forge what became known as existential phenomenology. In psychology, existential phenomenology utilizes the procedure of interpersonal dialogue as an essential method for describing human experience. Since experience is necessarily personal, access to one person's experience by another can only be accomplished on the basis of language and dialogue. In this way, one partner to such a dialogue assumes the role of "investigator" whereas the other member of the dialogic pair is the "expert" whose experience is being shared in a way that increases understanding for both parties. This type of dialogue requires the expert informant to describe his or her experience in such a

way that it is clarified for both the person and an involved other, the investigator.

The phenomenological interview. The purpose of a phenomenological interview is to obtain first-person descriptions of a particular experience, with only a few open-ended questions to guide the dialogue. Typically, an initial question is asked that allows for the description of several different situations that exemplify the experience in question -- for example, a researcher interested in the human experience of the body might simply ask: "can you talk about some times when you were aware of your body?" The idea is to allow the respondent to describe his or her personal experience of the phenomenon under investigation without prompting or "leading" questions. The researcher/interviewer's task is only to ask questions that emerge from the ensuing dialogue, with the purpose keeping the respondent focused on specific and detailed descriptions of their own experience.

Not surprisingly, the methodological validity of the phenomenological interview as a psychological research tool has been criticized by natural science researchers. Assuming the existence of some

"true" internal representation of experience, these researcher view the interview descriptions as involving two basic levels of distortion:

- 1. Respondent distortion. The respondent distorts the "authentic" representation of the original experience because of inherent limitations in language and memory -- i.e., it is presumptuous, for example, to describe the experience of "love" since words are inadequate and recollections are biased by nostalgia, etc.; Furthermore, the respondent's descriptions are biased by the very presence of the interviewer who inevitably creates "demand characteristics" -- in other words, despite attempts at neutrality, the respondent comes to understand what the interviewer wants to hear and attempts to conform to this understanding.
- 2. Interviewer distortion. The interviewer/researcher adds distortion in his or her attempt to understand the already distorted descriptions of the respondent. In short, the researcher has the impossible task of rendering an "objective" account of the respondent's "subjective" world.

One rejoinder to these criticisms concerns the underlying assumption of a "true" internal representation of experience:

Considering ... interview data as necessarily distorted arises from a theoretical way of picturing the world. In this case, the picture is of

knowledge existing in some "ideal form," independent of its specific contextual manifestations. Within such a picture, contextual specifications are "errors" that obscure the true nature of the phenomenon. The "real" is decontextualized, paradoxically seeking applications to all contexts but not uniquely and totally specified by any (Pollio, Henley, and Thompson, 1997, p. 31).

In contrast to this perspective, existential-phenomenology assumes all knowledge is contextualized and rejects the concept of decontextualized truth. Given the assumption of an ongoing and inescapable social construction of knowledge and reality, the description of an experience as it emerges in the context of an interview is openly conceded to be conditional truth, for conditional truths are all we have. Data from phenomenological interviews are understood to be constructions informed by both the initial experience under investigation and by the "on-line" experience of the interview itself.

Under these circumstances of "dialogical relativity," critics of phenomenological methodology have suggested that comparison across interviews within a given study is not warranted, since there is no reason to assume consistency. Kvale (1983) described the general perception of this problem: "...everything appears to be permitted with a minimum control over an arbitrary subjectivity...the interview as an engaged human discourse is so *complex* and varied that it is not possible, at least so far, to

develop any general theory for the interview" (p. 172). Despite these concerns, existential phenomenology offers two responses for making comparisons between dialogues:

- 1. A person's experiential field is organized rather than chaotic.

 The fact that most individual's organize personal experience into a coherent meaning structure implies the possibility of a systematic relationship with other people's meaning structures, especially concerning the same phenomenon (Giorgi, 1989).
- 2. Dialogic remembering of experiences involves a similar process across individuals and does not necessarily result in "contextually idiosyncratic" descriptions that make comparison across interviews untenable: "...the act of remembering brings about a temporal fusion of the past and the present in which a personal historical understanding is revised to accommodate a present perspective, and in which the present perspective is contextualized by one's history" (Pollio, Henley, and Thompson, 1997, p. 34.) In other words, there is a consistency in the dynamics of remembering an experience the past influences the present because it is necessarily the contextual "prologue," and the present

influences the memory of the past, because the past is inevitably "seen" through the hindsight of accumulated experience.

Procedures in current project.

The current project involving the experience of being lost was investigated in two separate studies. In the following section, specific procedures for each study, including selection and demographics of participants, interview and essay questions, and interpretation and analysis of transcripts are presented.

Study 1.

Participants. Fifteen participants were recruited for this study. Ten participants were students enrolled in a Social Psychology course at the University of Tennessee. Each student received extra course credit for his or her participation. Five participants were individuals interested in the project, recruited through personal connections with the investigator. Four participants were men, who ranged in age from 20 to 64 years; eleven participants were women, who ranged in age from 20 to 62.

Interview Procedure. Participants were asked: "Can you talk about some specific times in your life when you were lost?" No further clarification of the word "lost" was offered by the investigator, and each

participant was free to describe his or her own personal understanding of being lost. Additional questions were limited to the purposes of clarification and elaboration of the narratives. Typically, two or three different lost situations were discussed and the interview was concluded when no further situations were mentioned by the participant. Each interview was audio recorded and later transcribed by the investigator so that typed texts were available for interpretation and analysis.

Interpretation of transcripts. Two interpretive procedures – (1) bracketing and (2) the hermeneutic circle -- were utilized in this study. The central purpose of both procedures is to ensure that abstract explanatory interpretations of transcripts are avoided and to ensure that investigator interpretation remains focused on the lived experience described by participants

1. Bracketing. Husserl (1913/1931, 1954/1970) first introduced bracketing as a process that involved a suspension of preconceptions that might be imposed on the description of some phenomenon. Assuming a self-contained subjectivity that was unable to distinguish "real" experience from "illusion" or a dream, Husserl called for the suspension of the question of reality, focusing instead on general

rules of consciousness that applied both to real and imaginary objects.

In this way, ontological concerns were "bracketed," and the phenomenological task was to focus on the structure of consciousness rather than on a judgment of whether something was "real" or not.

Husserl thus considered preconceptions about what was real and what was not as beside the point — the important thing is that consciousness is always directed toward some object, regardless of its "reality" status. For example, it is not phenomenologically problematic that a participant's description of a particular "lost" episode is "imaginary" rather than an independently verifiable historic event.

In addition to ontological bracketing of this type, the term has also come to be understood as a suspension of theoretical frameworks and of personal value judgments that might be imposed on interview data.

Although complete suspension of such presuppostions is the ideal interpretive attitude, it is generally conceded that "perfect" bracketing is impossible to achieve -- no one can completely suspend previously held beliefs. Given this fact, the best we can hope for is the explicit recognition and acknowledgement of presuppositions about a particular phenomenon *before* engaging in a phenomenological exploration of the

subject. In this way, presuppositions are made figural -- the researcher is obliged to "put them on the table" which, presumably, mitigates their influence on subsequent interpretations.

Two procedures are commonly used in phenomenological research to implement the concept of bracketing: the bracketing interview and the use of participant vocabulary in the analysis of transcripts. In the bracketing interview, the researcher typically is the first person interviewed concerning the phenomenon under investigation. In the current study, I participated in a bracketing interview concerning personal experiences of being lost. By clarifying my own understanding of being lost, it is hoped that demands and leading questions that might have solicited participants to corroborate personal assumptions were avoided.

In addition to a bracketing interview, the participants' own words are used to formulate the situational and thematic content of interview transcripts. In this way, abstract, theoretical terminology -- which often implies the imposition of an *a priori* framework -- is avoided, and the vocabulary of the analysis remains close to the original experiential level of description. For example, in the present study, participants repeatedly described similar patterns of emotions -- such as being "scared," and

"confused" -- across many of the different "lost" situations reported.

For this reason, these specific terms were taken to represent themes common to all participants in describing their experience of being lost. In general, it is advisable to use the participant's "body words" relating to the corporeality of the experience under investigation, because these are often the closest to the experience.

2. The hermeneutic circle. The hermeneutic circle refers to an interpretative process that involves a reciprocal and continuous comparison of parts of the text to the whole of the text. In this way, any particular passage is understood in its relation to the whole and vice-versa in a dynamic process:

....the closer determination of the global meaning of the separate parts may come to change the originally anticipated meaning of the totality, and this again influences the meaning of the separate parts, etc. In principle, such a hermeneutic explication of the text is an infinite process which ends in practice when one has reached a sensible meaning, a valid unitary meaning...this circularity is not viewed as a "vicious circle," but rather as a "circulus fructuosis" or spiral, which implies the possibility of a continuously deepened understanding of meaning. (Kvale, 1983, p. 185).

In the current study, three specific hermeneutic techniques were used to interpret the interview transcripts: idiographic interpretation, nomothetic interpretation and group interpretation. During each of these

interpretive processes the task is to describe thematic aspects of the interview transcripts under consideration. Van Manen (1990) describes phenomenological themes in the following terms:

....phenomenological themes are not objects or generalizations; metaphorically speaking, they are more like the knots in the web of our existence, around which certain lived experiences are spun and thus lived through as meaningful wholes. Themes are the stars that make up the universe of meaning we live through. By the light of these themes we can navigate and explore such universes (p. 90).

In idiographic interpretation, individual transcripts are analyzed by the primary researcher in an approach that resembles a clinical case study. Unlike the case study, however, the focus is on the phenomenon and not the person. It is not the goal of idiographic interpretation to reach therapeutic conclusions but simply to summarize the thematic structure of the experience as described by an individual participant.

In the current study, the process of idiographic interpretation began with the acquisition of a deep familiarity with the language and emotions expressed by each of the participants. This familiarity was facilitated by multiple exposures to the interview data; first, during the live interview, second, during the transcription of the interviews, and finally, during multiple readings of the text.

After acquiring this familiarity, the subsequent analysis of individual transcripts was a two-step process consisting of categorizing *types* of lost episodes, followed by a thematic analysis deemed to summarize descriptions across situations. For example, one participant described separate situational episodes involving being lost on the way to the shopping mall and being lost when her father died; in both situations, themes of confusion and uncertainty were discerned. In other words, the thematic analysis of interview transcripts in this study was facilitated by an initial situational analysis, which enabled an overview of certain recurring "lost" scenarios across interviews. Within these situations, broad themes were identified by choosing statements from participants as representative exemplars of a theme.

In contrast to the individual transcript focus of idiographic interpretation, nomothetic interpretation involves comparisons made *across* transcripts with the goal of arriving at a thematic structure broad enough to include all interviews. It is the task of nomothetic interpretation to formulate a thematic structure broad enough to summarize the *collective* descriptions of experiences required within a study.

In group interpretation, selected transcripts are read publicly, with frequent pauses to discuss themes that stand out to various members of the group. This process provides multiple perspectives on the meaning of a phenomenon as it emerges from interview transcripts. In the current study, seven of the 15 interview transcripts were read and analyzed by the Wednesday Night Phenomenology Group at the University of Tennessee. This group provided useful insights and different perspectives on the transcripts that supplemented and augmented the primary researcher's understanding of the protocols.

These three interpretative procedures are not to be thought of as sequential but as reciprocal. Idiographic interpretations informs monothetic interpretation; group interpretation may alter the researcher's monothetic interpretation, which is then resubmitted back to the group, and so on. The pattern of interpretative procedures constitute an ongoing feedback loop designed to enable a deepening understanding of the transcripts.

Study 2.

Purpose. The purpose of Study 2 was to gain additional descriptions of the experience of being lost from a different group of

participants, using a different procedure. In Study 1, dialogic interviews permitted instant feedback, clarification and correction as the conversation progressed between participant and interviewer. Study 2 employed an essay format which produced written descriptions with no opportunity for feedback and clarification.

Participants. Forty participants were recruited from an undergraduate psychology course at the University of Tennessee.

Participants were offered extra credit for their participation in this study.

Of the total participants, 11 were male and 29 were female. Participant ranged in age from 19 to 23.

Procedure. Participants were asked to respond in writing to the following request: "Please describe, in as much detail as possible, some specific episodes when you were lost." As in Study 1, no additional clarification of the word "lost" was offered, leaving each participant free to describe his or her own understanding of being lost. Several different situations were described by most participants, and responses averaged two single-spaced type written pages in length.

These essay responses were analyzed in terms of the same procedures utilized in Study 1 -- both a situational and thematic analysis

was conducted within idiographic, nomothetic and group interpretive procedures. The essays, like the interview transcripts, were subjected to two levels of analysis. The first level involved an analysis of when participants reported being aware of being lost. During this analysis, specific episodes and events described by participants were coded by the investigator in such a way as to allow them to be placed into general categories. The second descriptive level involved an analysis of what participants were aware of during their experience of being lost. During this analysis, similar reactions and affective descriptions that were reported across situations — such as "being confused" and "being scared" — were grouped into a thematic structure, supported by specific excerpts from various essays.

Validity. In traditional social science research, controlled experiments or measuring instruments such as behavioral observational schemas or attitude questionnaires produce data that can be analyzed statistically. Within a more quantitative framework, researchers are concerned with three types of validity: construct validity, internal validity, and external validity. Construct validity refers to the degree to which a study measures and manipulates the underlying concepts the researcher

claims. Utilizing appropriate statistical techniques, it is possible to obtain a mathematically justifiable confidence that the measuring instruments are accurate and appropriate for the intended purpose. External validity refers to the degree to which research results can be generalized to different subjects, settings and times. This type of validity depends on the representativeness of the sample group -- if effective random sampling procedures are utilized, then generalizations for the population from which the sample was drawn are justified. Internal validity refers to the determination of cause-effect relationships between the independent and dependent variables in a given study. Internal validity can be determined probabilistically on the basis of statistical procedures. By standard convention, if it is determined that the results have less that a 5 % probability of occurring by chance, the experiment is deemed to have internal validity.

Unlike a natural science approach, the validity of phenomenological research findings does not depend on a statistical evaluation of appropriateness of measurement, generalizability of sample, or probability of causation; it depends on the *believability* of the

interpretation, given the particular methodological approach of the researcher:

For the purposes of phenomenological interpretation, the criterion of validity becomes whether a reader, adopting the world view articulated by the researcher, would be able to see the textual evidence supporting the interpretation, and whether the goal of providing a first-person understanding was attained. This criteria does not preclude the existence of alternative interpretations nor does it require the reader to believe that the present interpretation is the only or even the "best" one (Pollio, Henley, and Thompson, 1997, p. 53).

The believability or credibility of phenomenological interpretation rests on the fulfillment of four methodological criteria: rigor, appropriateness, plausibility and illumination. A rigorous study may be generally understood as one that is strict, methodical, and comprehensive — however, because the term "rigor" is broad enough to include both quantitative and phenomenological approaches to research, it cannot stand as the sole criteria for phenomenological validity — the research must also be *appropriate* for the task of describing lived experience. This means that the research must be properly oriented toward the phenomenon under investigation. For example, a highly structured interview may consist of a series of pre-formulated questions that are strict, methodical and comprehensive in pursuing a specific topic, but because of the abstract

appropriate method for examining lived experience. This type of structured approach would direct the respondent and might influence his or her answers to such an extent that a subsequent interpretation might lack credibility as a legitimate description of the first-hand world of the participant.

In addition to rigor and appropriateness, the credibility of a phenomenological study is also determined by its plausibility and illumination. Plausibility refers to the reader's perception of a relationship between the interpretation and the data. Put as a simple question: is it believable that the researcher's interpretation emerged from the data of the study? As discussed in the section on bracketing techniques, the use of extensive textual support, including the participants general descriptive vocabulary as well as specific quotes, helps to establish the "first-person credibility" of the researcher's interpretation.

Illumination refers to the ability of the researcher's interpretation to bring a different understanding or new awareness of the phenomenon to the reader. Early Gestalt researchers (Koffka, 1935; Kohler, 1947) described illumination as a sudden event in which a meaningful pattern is

instantaneously apprehended. In successful phenomenological research, this type of sudden insight is conveyed to the reader (Pollio, Henley, and Thompson, 1997).

As is the case with idiographic, nomothetic, and group interpretive procedures, these criteria have a reciprocal relationship to one another: the more rigorous and appropriate the methods are perceived to be, the more likely is the perception of plausibility and illumination in the interpretation. In the current study, the case for validity, as in all phenomenological studies, depends on the reader's reaction to the methodological techniques described above and their synchrony with the interpretive results, which are presented in the next chapter.

CHAPTER 3: RESULTS

The current study is concerned with the way people describe what it means to "be lost" in their lives. These description were organized in terms of *when* participants were aware of being lost and *what* they were aware of in those situations. In other words, the first task was to compile and categorize an inventory of lost situations and the second task was to develop a thematic structure that summarized the experiences common to these situations. To accomplish these tasks, two separate studies were conducted. Since specific procedures were discussed in the previous chapter, this chapter will present the results of these studies.

The use of phenomenological interviewing in Study 1 resulted in descriptions of a wide variety of "lost" situations. These descriptions were organized into three general categories: geographical disorientation, interpersonal disconnection, and spiritual disorientation. Table 1 (p. 86) presents a frequency count and percentage rates of the different types of lost situations described by participants. Percentages represent the number of situations in each category divided by the total number of situations. Following this table, each of the general situational categories and related sub-categories will be described in somewhat more detail.

Table 1. Frequency count of categories and situations described by participants in Study 1.

	N	%
I. Geographical Disorientation	24	64.9 %
 Lost In Wilderness or Woods 	8	21.6 %
2. Moving to a new place *	7	19.0 %
3. Lost from mom or dad as a child *	5	13.5 %
4. Lost While Driving	4	10.8 %
II. Interpersonal Disconnection	10	27.0 %
 Relationship Breakups 	9	24.3 %
2. Death of a Loved One	1	2.7 %
III. Spiritual Disorientation	3	8.1 %
Total Situations	37	100 %

Note: The percentages in this table represent the number of situations in each category divided by the total number of situations.

^{*} The situations entitled "lost from mom and dad" and "moving to a new place" both involve interpersonal as well as geographical elements; for present purposes, they were judged to be primarily geographical in nature.

Lost Situations in Study 1.

Geographical disorientation situations. Disorientation is the loss of one's sense of location, direction or relationships to one's surroundings; to be disoriented is to not know where you are and/or to be unable to get to where you are going. The situations described by participants in the interviews involve being spatially dislocated and can be grouped into two sub-categories based on setting and mode of transportation: lost while hiking in the wilderness or woods and lost while driving. Two additional sub-categories include being lost from parents as a young child, and feeling lost after moving to a new location. As noted in Table 1, each of these last two subcategories have interpersonal dimensions but were deemed to be *primarily* geographic in nature and therefore were included under the category of geographic disorientation.

Lost in the wilderness or woods. In these descriptions, the participant is on foot and becomes lost after going off the trail or losing track of orientating landmarks. This situation was mentioned eight times by the participants in Study 1.

Interview excerpt.

P-8 (F-37) Lost in the Woods Behind Her House (at age 11).

... I mean, the woods had just taken over... I mean, you could some times find an old bottle that had been part of a trash heap, but it was not.. it was just completely woods, nothing, no landmarks, no anything and luckily for me, my grandfather was quite a woodsman, quite an outdoorsman and I spent a lot of time in the woods, so I didn't really panic but I was completely lost, I had no idea how to get home, and all the folklore of the Appalachians that had been given to me by my grandfather and that I had read in the Foxfire books: the moss is on the north side of the tree kind of a thing really had no bearing because I had no clue if I was north, south, east or west from my home and what routes I would need to follow..

Moving to a new place. These descriptions concern separation from familiar places and ways, as well as the experience of unfamiliar and uncomfortable circumstances. Episodes in this category include moving to a new culture

and encountering a foreign language, moving from a small hometown to big university, and going away on a trip where you don't fit in.

Interview excerpt.

P-14 (F-20) Felt Lost in Moving to Knoxville to Attend UTK
when I came to school in Tennessee I felt completely lost, because I
had grown up in the mid-west and for me to go to school in
Tennessee, not knowing a single person, I felt kinda lost, but here
I am and I'm looking in on the world, I felt...completely different
from all the people that I came in contact with, at first.

Lost from mom or dad as a child. Early child/parent separation were mentioned 5 times by participants. These separations were often the first episode in a series of stories described by the participants. This presentation sequence seems to suggest a chronological and/or and emotional ordering of lost episodes. Certainly, the separation from mother -- which involved children ranging from ages 4 to 12 -- is always among the earliest episodes of being lost, and often was described as being extremely traumatic (see excerpt below). These situations were frequently intense for the child because of an accompanying perception of permanent abandonment. Several participants reported believing that they had been left behind intentionally and that they would be lost from mom (or significant caretaker) forever.

Interview excerpt.

P- 5 (F-40) Lost Riding Escalators in a Department Store (age 4).
...we couldn't find our way to find them and we were up to the top and there was no other escalator to go anywhere...and we were just...horrified...we were crying, screaming ...and I mean, at that age when you are...distanced and you feel abandoned from your parents and here are all of these strangers and you can't find your way back to get to them...of course, you automatically feel like that they can't find you either... if you can't find them, they can't find you. We were just...lost.

Lost while driving. These situations involve trying to find some location in a new city or in an unfamiliar region or neighborhood.

Although these episodes also involve confusion similar to that reported in getting lost while hiking, the mode of transportation and the nature of the environment were judged to constitute a separate category from stories concerning being lost on foot. Four episodes of getting lost while driving were reported by participants in Study 1.

Interview excerpt.

P-8 (F-37) Lost Trying to Drive to the Kennedy Space Center.
...we were within five miles of the Kennedy Space Center for five hours...we drove around side roads and roads that dead-end, they dead-end! ...I felt frustration and lack of control, which leads to frustration... its not being able to be in control, you're not in control of what's going on, you can't find... its self-doubt: you know you're intelligent, you know that you've been there, its possible to get there, wherever "there" may be....

Interpersonal Disconnection Situations. In Study 1, participants reported 10 episodes that were characterized as interpersonal disconnection, and 27% of the episodes described by interview participants concerned being lost in *relational* terms. The category of interpersonal disconnected was divided into two subcategories which seemed to capture the nature of the episodes described by participants: relationship break-ups and death of a loved one.

Relationship breakups. These situations involve various processes serving to separate one person from another. The participants' descriptions were generally concerned with emotional separation from significant others. Included in this category were: divorces, relationship breakups, child abuse, and other situations that result in a general disruption of friend and family relationships.

Interview excerpt.

P-4 (F-33) Felt Lost during her Divorce.

... the most important time to me, when I felt like I was lost was when I was going through my divorce I felt very lost, I felt like a failure, I've never felt so lost in my whole life than when I told my husband that he needed to leave and it made me feel that's a major, major step to take and I had a child involved and I didn't know what my son and I were gonna do and where we were going to go, I felt very very alone and lost. It felt very devastating, I felt like my whole world was out of control....

Death of a loved one. In the interviews for this study, only one participant reported feeling lost because of the death of some significant other. She described feeling her sense of personal identity being threatened because of permanent disruptions in her social network.

Interview excerpt.

P-11 (F-20) - Felt Lost when a Friend Died in Motorcycle Accident.

I think it made me feel lost because one of my "base" people was gone..this person that I could talk to about anything, you know, and it was a guy, so he was almost like a brother, but, you know, he

was a friend...I mean, normally, if something like this had happened to somebody else then I could have gone to him and been really upset and he would have, you know, held my hand through it..but he was gone, and I was very disoriented....it was strange, I don't know how to explain it...

Spiritual disorientation. This last group of situations are characterized by a loss of purpose combined with the experience of having no goal or destination in life. All persons who described a spiritual disorientation specifically mentioned religion and/or God -- this includes the perception of being "lost in sin," as well as a separation from God or Christ.

Interview excerpt.

P-11 (F-20) Feels lost without a sense of Purpose.

Yeah, I have to have meanings. See, I want definite. You know, I want to know why my friend died, I want to know if there is a God or not. I wanna know where I'm gonna be in twenty years so I don't have to worry about it now...and there's so many...you know, there's no answers to these questions, so your continually asking why...some times I just feel like I'm floating in this big abyss of nothingness..its just like: you know, where am I gonna go? What am I gonna do when I graduate? That's kind of overwhelming to me, trying to figure out what I'm supposed to do with the next 80 years of my life. If I don't have a purpose or know where I'm going from point A to point B, I'm scattered, its just....out of control.

Interconnection of situations. All of the lost situations described above seem overlapping and interconnected. They were described by the participants as occurring simultaneously and sequentially. For example, the situations characterized as "geographical disorientation were almost never restricted to a purely "physical" lost - there nearly always was an emotional component - in effect, being lost is at once a geographical and a psychological situation. Considering such simultaneity, the present set of categories should be considered an organizational convenience -- not an attempt to fragment the complex gestalt of being lost. For example, the situations of early separation from mom or dad could be categorized as either a spatial or a relational problem or as a combination of the two, and each perspective could be justified and supported by descriptions in the interviews.

Thematic analysis of Study 1.

In this study, the actual language of the participants varied from "self-oriented" to "world-oriented" descriptions of being lost. In other words, descriptions were concerned both with how participants felt when they were lost as well as what the world was like when they were lost. For this reason, it seems appropriate to consider the complete thematic

structure of the experience of being lost as consisting of two alternately or simultaneously figural sets of concerns: the experience of self when lost and the experience of world when lost.

The experience of self when lost. The following four themes provide a general summary of the experience of the self when lost as described by participants: lonely, changed, confused, and helpless.

Lonely. The experience of being lost was characterized as a fundamental break from the normal connections of geographical and personal existence — the narratives reported in this study frequently concern disconnections from other people. Participants said they felt dejected when important relationships were broken. Regardless of the situation — estrangement, moving away, both interpersonal and geographic isolation — loneliness was experienced as an unavoidable consequence.

Interview excerpts.

P-10 (F-20) - I think **lonely** can be such a small thing or it can be such a big thing - like, yeah I was lonely...Friday night, or whatever because I didn't have anything to do - but that's not really lonely in the big sense - I think in the big sense - it could be "lost" in some

words but I really need to add to that... you're just in despair, you don't know what you're supposed to do - you're lonely - you feel like nobody likes you or you don't have a place or you don't fit in - you don't fit in anywhere, you're lonely - you kinda feel like you against the world - you're lost - and that's so extreme - I don't really feel like I've been that.. this year, any at all - I mean, yeah, lonely for a few hours - but not lost - lost is real extreme.

- P-4 (F-33) You're **lonely** -- you feel like nobody likes you or you don't have a place or you don't fit in.
- P-2 (F-27) ... whenever I feel lost... I feel loneliness major loneliness...
- P-10 (F-20) Well, I believe that we are made to long for something and we are made with just a void space and as humans we can fill it with anything but nothing is really going to satisfy us, until we fill it with God. ... I kept trying to fill loneliness and being lost with other things—I would try to fill it with friends or I would try to fill it with being in the right student council, anything you never can do enough its like I kept falling on my face...
- P-9 (F-22) I didn't recognize anybody and I just felt absolutely and utterly **alone.**
- P-10 (F-20) you're just in despair...you don't know what you're supposed to do -you're **lonely** you feel like nobody likes you or you don't have a place or you don't fit in anywhere, you're lonely you feel kinda like you against the world you're lost.

Changed. Participants reported a feeling of discontinuity with normal time and space, describing themselves as "not the same" as they were before being lost. They also reported being changed from a secure person living in a known world to an insecure person living in a suddenly

unknown world. The intensity of this experienced change was heightened by a suspicion that it may be permanent -- that there was no way back to the way things were before becoming lost.

Interview Excerpts.

- P-9 (F-20) I really thought she had left me and I thought: this is the way its gonna be I'm gonna be stuck in the Kroger all my life and no one's ever gonna find me...
- P-5 (F-40) we were just horrified that this was it forever you know, when you're young you don't see the future and you don't understand "later" and "tomorrow" and things like that "here" is now, and now is all there is and that's where we were and that's all there was.. I felt like my life had been **changed** forever and there was no going back...
- P-8 (F-37) ... and I was probably gone from...no more than four hours, but it seemed like I was gone for a day or more and when I came home, I expected the prodigal son returns greeting but instead it was: where the hell have you been?

Confused. In describing the experience of being lost, participants often reported feeling disoriented and not knowing which way to go.

They were confused regarding their location and direction and were unable to proceed or formulate a plan of action that would extricate them from being lost. A frequent adjective mentioned by participants is "bewilderment" in reference to a general uncertainty about where to go or what to do.

- Interview Excerpts.
- P-1 (M-31) ...so after a while, I got **confused** about what line I was supposed to be in and there was a bus getting ready to leave and I started to get nervous, and I didn't know where I was going to end up..
- P-2 (F-27)...my definition of being lost being in a place where you don't know where you are, you don't know how you're gonna take care of yourself, you don't know how your gonna survive...
- P-3 (M-26) -- he pointed to it a point on the map and said: "this is where you're going." I said I'd find it and he left. I didn't realize that I didn't know exactly what point on the map I was at the time.
- P-8 (F-37) ... I had no idea how to get home, and all the folklore of the Appalachians that had been given me by my grandfather and that I had read in Foxfire books: the moss is on the north side of the tree kind of a thing really had no bearing because I had no clue if I was north, south, east or west from my home and what routes I would need to follow. I was very **confused** and lost.

Helpless. Participants frequently described geographic and psychological disorientation severe enough to trigger a feeling that there was no solution to their navigational difficulties -- put simply, they perceived no way out of being lost back to being "found."

Understandably, such an experience brings feelings of fear, despair and helplessness at their lack of control in the situation.

- Interview Excerpts.
- P-13 (F-20). To me being lost is...feeling **helpless** because you're not in tune, you're not in charge of what you're trying to accomplish and what you need something's in the way
- P-2 (F-27) I guess being lost is not having control, or not knowing what's going on control is real important.
- P-6 (M-19) Anytime I feel like I'd been manipulated I'd felt like I'd been out of control and I felt lost.
- P- 8 (F-27) As an adult, the cases of getting lost, the frustration...was actually a symptom of the losing of control, of being helpless.

The experience of the world when lost. In addition to changes in the experience of self when lost, participants also described what the world was like when they were lost. The following four themes offer a general summary of

of the experience of the world when lost as described by participants: no landmarks, different, unfamiliar, and dangerous.

No Landmarks. In describing their world when lost, participants report that nothing is available to help them find the way -- they experience themselves in a space that cannot be navigated because it has become, in effect, a homogenous field, in which neither signposts nor guides are available to provide direction. In short, nothing is figural -- there are no landmarks to show the way -- nothing stands out. The

uncertainty of this "homogeneous disorientation" can occur in psychological and geographical space, as indicated by the possibility of both identity and navigational confusion in the simple phrases: "I don't know where I am" and "I don't know where I am going / I don't know how to get to where I am going." The lost person is uncertain of location and direction. Depending on the judged seriousness of the particular situation in which the person is lost, previous goals are seen as either temporarily or permanently unattainable.

Interview Excerpts.

- P-8 (F-27) I mean, the woods had just taken over...you could sometimes find an old bottle that had been part of a trash heap, but other than that, it was just completely woods, nothing, **no landmarks**, no anything.
- P-9 (F-22) All of a sudden, I couldn't find anything...I know there's trails, but I got lost trying to find the trail, and I ended up getting off and I couldn't find anybody and I was hollerin' for them and nobody found me.
- P-15 (F-62) ...its very thick and if you go off the trails, where all the spruce are going down, you can sink below the branches and disappear...and I went off the trail, and, damn it, it was getting late afternoon and I couldn't find my way back.
- P-13 (F-20) ...it was just horrible because I felt like I couldn't talk to anyone near there to get directions.

Different. Participants described the world as being different when they were lost. Typically, this difference was a result of moving to a new location such as college in which different places and different people made the participant feel lost.

Interview excerpts.

- P-7 (M-65) ...it as a completely different culture...they spoke a different language -- I was used to hearing Spanish spoken, but not constantly...it was a bit of a shock at first, because I felt lost....it felt like I was in a **different** world..
- P-14 (F-20)when I came to school in Tennessee, I felt completely lost, because I had grown up in the mid-west and for me to go to school in Tennessee, not knowing a single person...I felt kinda lost -- here I am looking in on the world -- I felt completely **different** from all the people that I came in contact with, at first...
- P-10 (F-20) ...college -- parts of it were hard -- like different groups I went into alone -- like becoming a member of a sorority.

Unfamiliar. In reporting their experiences of being lost, participants also described the world as no longer recognizable — it was suddenly an unfamiliar place, a strange and "unknown" land — and it is within the alien landscape, this "terra incognitae," that the wayward traveler finds his or herself trapped.

Interview excerpts.

P-13 (F-20) I couldn't concentrate because I was so worried about the test...I was so upset -- I felt very lost -- not knowing what was

- going on, so many unfamiliar questions, I mean, it could have been Chinese for all I knew.
- P-5 (F-40) It was almost like we had kept going somewhere that had taken us into an unknown land -- everything had become unfamiliar...
- P-8 (F-37) I was going up and down hills and into hollers and around trees and crossing over branches and it was all so unfamiliar...

Dangerous. In addition to experiencing the world as without landmarks, different and unfamiliar, participants also described the world as dangerous when they were lost. Besides being disorienting and confusing, the world became threatening — it no longer was simply thwarting a goal or destination but was now experienced as openly hostile. This sense of danger is illustrated in the excerpts below.

Interview excerpts.

- P-13 (F-20) I began to feel lost because I was there by myself and our motion detector lights kept coming on and I didn't know if it was just a cat or someone outside looking in...
- P-11 (F-27) I knew it was that serious because I'm a lone little white girl and I know its black town and I'm smart enough to know that there's major trouble...and I'm lost, you know, and its dark and its late and, you know, a **dangerous** situation, to me...
- P-14 (F-20) I drove and drove and finally, I gave out of gas...I knew I was going to have to stay there until morning and it was cold -- it was February in Nebraska: it was cold! and I thought:

I'm gonna get murdered...and I was getting very frantic...

P-8 (F-37) ... I was walking and trying to keep myself in a straight line and I heard dogs, wild dogs...there were wild dogs -- people would throw dogs out and they would live in the woods and they would become kind of feral...that's when I got scared.

Because of the situational and thematic similarities between Study 1 and Study 2, a description of the integrated thematic structure of the experience of being lost will be included at the end of the following section in which the results of Study 2 will be presented.

Lost situations in study 2.

The purpose of study 2 was to secure additional descriptions of the experience of being lost from a different group of participants, using a different procedure. In contrast with Study 1, which used dialogical interviews, Study 2 employed an essay format which produced shorter, written descriptions with no opportunity for feedback and clarification. Because specific research procedures were described in Chapter 3, this section will begin with a presentation of relevant results.

The use of an open-ended essay question produced descriptions of situations and themes that were similar to those produced from phenomenological interviews. Situational descriptions in Study 2 were

organized into the same three categories as were utilized in Study 1: geographical disorientation, interpersonal disconnection and spiritual disorientation. Table 2 (below) presents a frequency count of the different types of situations described by participants in Study 2. Each of the situations occurring in Study 1 was also noted in Study 2. As might be expected, nearly all categories showed a noticeable increase in episodes reported for Study 2 (40 participants) compared to Study 1 (15 participants).

Table 2. Frequency count of categories and situations described by participants in Study 2.

	N	%
I. Geographical Disorientation	48	59.2 %
1. Lost from mom or dad as a child	20	24.7 %
2. Moving to a new place	13	16.0 %
3. Lost While Driving	13	16.0 %
4. Lost In Wilderness or Woods	2	2.5 %
II. Interpersonal Disconnection	19	23.5 %
 Death of a Loved One 	14	17.3 %
2. Relationship Breakups	5	6.2 %
III. Spiritual Disorientation	14	17.3 %
 Lost from God and religion 	12	14.8 %
2. Lost from meaning and purpose	2	2.5 %
Total Situations	81	100 %

However, reports of being lost in the woods or wilderness and reports of relationship breakups showed a noticeable *decrease* in number and percentage of total episodes in comparison to Study 1. More specifically, in Study 1, 8 episodes out of a total of 37 -- 21.6% -- were concerned with being lost in woods or wilderness; in Study 2, two out of 81 episodes -- only 2.5 % -- were concerned with being lost in woods or wilderness. Relationship breakup episodes were mentioned nine times out of 37 total episodes in Study 1 -- 24.3%, but only five times out of 81 total episodes in Study 2 -- only 6.2%.

Another point of interest is the dramatic increase in descriptions of the death of a loved one reported in Study 2. In Study 1, face to face with the investigator, only one participant described "feeling lost" because of the death of a loved one. In Study 2, 14 participants (17.3%) described in detail feelings of being lost when some one close to them passed away. In the following section, each of these situational categories and related subcategories are supported by essay excerpts that were chosen as representative examples of each situation.

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Geographical disorientation situations. As in the first study, these situations involved episodes involving uncertainty of physical location and direction.

Lost from mom or dad as a child. As in Study 1, these descriptions focused on becoming lost from mom in a public place and often were characterized by intense reactions. This situation was described as simultaneously geographical and psychological -- the child is physically separated from his or her parents and the experience is one of emotional distress. Unlike Study 1, these early parent-child separations were the most commonly mentioned circumstance of geographical disorientation.

Nearly a quarter (24.7%) of all situations reported in Study 2-- 20 episodes -- involved being lost from a parent.

Essay excerpts.

P-32 (F-20) Lost shopping with mother in Gatlinburg
...when I went to find my mother to ask for a coin, I realized she
was no longer in the store where I had left her. I frantically
wandered around looking for her and calling her name but to no
avail. I began to cry out in fear as I was only a small child and
wanted the security of my mother and father to comfort me as I felt
so alone in a strange place.

P-35 (M-20) Lost from mom at the mall. I went back to the department store where my mom was and she wasn't there. I was so scared. I had no idea what to do. So, I tried to look for my parents and sister. I swear I went into every store in

the mall and I couldn't find anyone. So after about 2 hours of intense searching, I had no other choice. The thing little boys didn't dare to do - cry. I cried for so long. After crying forever, I heard my name announced over the loud speaker. They told me to come to the customer service desk because my parents were waiting.

Moving to a new place. As was the case in Study 1, many participants mentioned moving to a new place as an instance of feeling lost. Understandably, since all participants in this study were students at the University of Tennessee, one of the most commonly described circumstances was moving away from a "sheltered life" in a small hometown to attend a big university.

Essay excerpts.

- P-18 (F-20) I feel lost because my life is in a time when there are a lot of changes, and I don't know how to deal with it. School I hate UTK and I don't have a major. Friends they are six hours away and most of them are not doing very well. Boyfriend also six hours away, possibly moving to California to pursue a career in movies.
- P-29 (F-20) This semester I think I have been more lost than I ever have been in my whole life. I had to leave all my family, my boyfriend, and most of my family. My soul felt lost. I had to start over with all new classes at a new caliber, new living environment, and a new lonely/lost feeling in my stomach.

Lost while driving. With 13 episodes described in this study, this category, along with "moving to a new place" was the second most frequently mentioned situations. Typically, the person reported driving in

an unfamiliar area, being careless in paying attention or receiving misleading or insufficient directions. As illustrated by these excerpts, the result is often panic and fear.

Essay excerpts.

- P-22 (F-20) ...I took a wrong exit coming back to school and ended up in a wrong section of town...at the moment it was a very frightening experience when I realized I had no idea where I was, and I saw people around me, I was very scared
- P-26 (F-21) I had forgotten to write down the directions my father gave to me, so I was pretty much guessing my way. I decided to go to Asheville, North Carolina. Well, I was about 30 minutes down the road and I started to see signs for Pigeon Forge. I started freaking out.

Lost in wilderness or woods. There were only two descriptions of being lost in wilderness or woods in Study 2. Understandably, this mode of locomotion is not nearly as ubiquitous as driving, which may explain the infrequency of this type of situation.

Essay excerpts.

P-37 (F-21) We were all out by the falls and were about to return to our camper. My whole family was walking back and we got close to where we were staying, and my parents had to go to the bathroom. They let me and my siblings walk back to the camper. We were doing fine, but me and my brother disagreed with my sister on the right way back to the camper. She thought it was one way and we thought it was a completely opposite way. So, instead of all going together, we split up. It turned out that me and my brother were wrong and we got lost. Erin, my sister had been right. The next

thing I know, we are both terrified because we don't know where we are.

P-17 (F-20) Another time that I was physically lost was while I was in the jungles of Costa Rica last summer. The people that I had been staying with lived in a house on top of a mountain. Their house was about a four-hour walk through the jungle to the closest city. After hiking this trail a few times I thought that I knew the way well enough to hike it myself. I decided that I would hike down the trail to the grocery store in order to get some items that were needed in the house. After walking for about an hour the trail did not look familiar to me anymore. I was not very sure so I kept going to see if it looked any more familiar up the trail. I came to a place in the trail that had been washed out by a landslide because of all of the recent rain. A sense of panic arose inside of me because I realized that I was completely lost. I knew that there were not very many people in the area and I had no idea what to do. I kept picturing myself dying in the jungles of Costa Rica because no one would be able to find me. Not knowing what else to do I sat on a rock and cried while feeling completely helpless.

Interpersonal disconnection situations. As in Study 1, approximately twenty-five percent of all episodes involved some type of interpersonal disconnection. The percentages of this type of situations in both studies were very similar (27% in Study 1; 23.5% in Study 2). The category of interpersonal disconnection was composed of two classes of situations: relationship breakups andthe death of a loved one.

Relationship Breakups. Descriptions of relationship breakups comprised only 6.2% of the episodes of being lost reported in Study 2.

(five episodes). This is in contrast to Study 1, in which 24.3% of the episodes described by participants involved relationship breakups.

As illustrated in the excerpts below, these episodes range from parental divorce situations to personal relationship dissolution.

Essay excerpts.

- P-34 (F-20) I think in some way I blamed my mom for the divorce, feeling that she had taken me away from my dad. I was awful for the first little while. I treated her like crap, cursing at her and telling her how much I hated her. She told me dad, of course, and he was very pissed off at me for acting that way towards her. Still, even with him telling me to straighten up, I only continued to get worse. I guess that I made my mom's life hell for awhile, and a couple of times, I even threatened her.
- P-37 (F-21) I have been emotionally lost. I dated this guy for five years. He and I made plans to get married and spend the rest of our lives together. He spontaneously up and slept with this married woman and blamed it on me because I would not have sex with him. I was very young and in love so I apologized for my wrong and had sex with him. He was very abusive and controlling. His temper was outrageous.

Death of a loved one. In Study 2, fourteen of the 81 episodes described by participants involved death of a loved one (17.3%).

The excerpts below illustrate the emotional trauma and the accompanying feeling of being lost during and after the separation from a significant other in death.

Essay excerpts.

- P-32 (F-23) It was Christmas Eve, the day that my family celebrates by having dinner and opening up gifts. At Around 8:00, my uncle discovered my mom lying on the bathroom floor, unconscious. Despite the desperate attempts of reviving her, she died. Life as I knew it had changed...forever. That figure that had been in my life for twelve years was gone, and I had no one else who knew me so completely, not even my dad or brother. The following summer I experienced what every girl around the age of twelve experiences, and I had no one to talk to about it. The feeling of being lost increased as I got older. Another aspect of my life that changed shortly after my mom died was my ability or inability to make friends. I found myself preaching at other teenagers to not yell at their mothers, "or they would regret it." This was just something that you don't do to others around that age. I went through a period where I didn't have any real friends, just acquaintances, and I wanted it that way. I almost experienced what some may call depression. I did not look forward to anything. I just wanted to hide in my room, away from the outside world and social pressures.
- P-34 (F-20) He told her that he wanted to see me one more time before he died. So, the next night I went over to his house to see him one last time. By this point, he couldn't respond to anything, he was just laying there with his mouth open. I just lay my head on his chest and cried forever. I can't explain how bad this felt. It was the worst moment in my life, to see my dad like that. I just constantly kept telling him how much I loved him because I knew that I would never see him alive again. It was at this point that I felt hopelessly lost. I didn't know how my life was going to continue without the most important person to me in the world.

Spiritual disorientation situations. Episodes of spiritual disorientation were reported much more frequently in Study 2 (17.3%) than in Study 1 (8.1%). In the essay excerpts below, two subcategories

are illustrated: (a) "lost from God and religion" and (b) "lost from meaning and purpose."

Lost from God and religion. The category "lost from God and religion" refers to episodes in which there were specific references either to God or to some denominational faith. Interestingly, most of the spiritual disorientation episodes were in this category (12 episodes - 14.8% of total episodes).

Essay excerpts.

- P-16 (M-21). There was a part of my life when I was spiritually lost. By this I mean that I was not a Christian. At one point I believed the Bible but was not acting like I should have been. I had to sit down and pray to God and tell Him I accepted the Bible and His story. Something that comes to mind as I write this is the words from Amazing Grace: "I once was lost but now I'm found." Becoming a Christian had made a real difference in my life. It's like I moved from a world of sin to one of forgiveness. Even though I still do bad things, I know I will be forgiven. Before I was a Christian I did not have this reassurance.
- P-20 (M-20) I realize now that I was lost spiritually. I was not reading the Bible regularly. I had not received Christ into my life. I had no idea what kind of impact Jesus Christ could have in my life. This experience with being lost really frightened me. It scared me because of the consequences of being lost. I had no one to turn to with my problems. This experience was very deep and heartwrenching. This change would affect the rest of my life. If I remained a lost soul, I would go on living my life with an expected doom. Whereas, I live my life as God would have it and with him in my heart, I will have eternal life. The experience of being spiritually lost is a troubling experience. I greatly affects the way

way you live. You have no direction in life. You have nothing to turn to with your problems. Being lost, God does not hear your prayers so he cannot answer them.

Lost from purpose and meaning. In Study 2, only three participants (2.5%) mentioned being lost from purpose and meaning in a way that did not specifically refer to God or religion. As indicated above, the majority of spiritual disorientation descriptions did involve specific references to God and religion.

Essay excerpts.

- P- 28 (F-20) I was not lost in relation to directions, but just about life period. I did not really know what to believe in or what to trust. I did not care about the things that are now very dear to me. I was not too clear on who my friends really were, or even where I wanted to be in life. I was kind of living day-to-day and hoping something better would come along.
- P-33 (F-20) Every teenager feels lost when trying to form an identity. Every adult feels lost when trying to make life decisions. Being lost, not knowing which way to go, allows you to travel down different roads and try new things to until you find what fits you best.

Total Situations in Study 1 and Study 2.

At this point it is useful to combine the frequency of situations in Study 1 and Study 2. In this way, an overall picture of the combined studies and the percentages of each category and subcategory can be presented based on 118 lost episodes described in the interviews and essays. (See Table 3, p. 113)

Table 3. Frequency count of categories and situations described by participants in Study 1 and Study 2.

<u></u> -		N	%	
I.	Geographical Disorientation	72	61.0 %	
1.	Lost from mom or dad as a child	25	21.2 %	
2.	Moving to a new place	20	17.0 %	
3.	Lost While Driving	17	14.3 %	
4.	Lost In Wilderness or Woods	10	8.5 %	
II.	Interpersonal Disconnection	29	24.5 %	
1.	Death of a Loved One	15	12.6 %	
2.	Relationship Breakups	14	11.9 %	
III.	Spiritual Disorientation	17	14.5 %	
1.	Lost from God and religion	15	9.3 %	
2.	lost from purpose and meaning	2	5.2 %	
	Total Situations	118	100 %	

In combining the situations in Study 1 and Study 2, the frequency of situational categories remains consistence with the pattern noted in Table 1 and Table 2. Geographic disorientation is consistently the most common situation described, reported by 61% of participants across studies, as compared to 64.9% in Study 1 and 59.2% in Study 2. Interpersonal disconnection is the second most common situation described, reported by 24.5% of participants across studies as compared to 27% in Study 1 and 23.5% in Study 2. Spiritual disorientation is the

least common situation described, reported by 14.5% across studies, as compared to 8.1% in Study 1 and 17.3% in Study 2.

Thematic analysis of Study 2.

The descriptions in the essays, like those in the interviews, reflected a dual awareness of a troubled lost self and of a suddenly unfamiliar world encompassing that self. In the following section, both of these thematic structures concerning the world and the self will be discussed along with excerpts presented from the essays to support each theme. Following this, the thematic structures of Study 1 and Study 2 will be compared and an integrated structure will be presented.

The self when lost. The "self when lost" themes were: lonely, changed, confused, and helpless.

Lonely. As in Study 1, participants frequently described themselves as lonely. The excerpts below illustrate that reports of loneliness occur in a wide variety of situations, ranging from feeling "totally alone" when separated from mom as a child to feeling alone when moving to a new and unfamiliar place.

Essay excerpts.

P-16 (F-19) I remember running through *Target* screaming for my mom and dad, but getting no reply. The sense of being totally **alone** was

- terrible....though I was very young, I knew what it felt like to be alone in the world, and I did not enjoy it.
- P-19 (F-19) I'll never forget walking into my room in Morril Hall with my parents. It was bare and ugly. My parents left and I realized I was on my own. I felt very lost and alone. Who was I supposed to call and where was I supposed to go? I was in a whole new place with the freedom I had always wanted, yet I sat on my bed wondering what I was going to do.
- P-29 (F-20) I stopped to watch the puppet show and like most children, I forgot the world around me. When the show was over, I looked up and realized I was alone in a sea of strangers....suddenly I was aware of my loneliness and I became very frightened.
- P-41 (F-19) ... my dad was out of the house. And me, daddy's little girl, alone and lost without the completeness of my family.
- P-39 (F-20) I felt no one understood how I was feeling. It was the first time ever felt incomplete because I was missing a part of me someone I felt comfortable with and loved by. I felt lost from my parents, friends, and even myself.

Changed. In the present set of essays, as in the interviews, participants described themselves as changed when lost. Typically, this change is characterized as a sharp contrast between the way things were before being lost and they way things are after being lost. As illustrated in the excerpts below, one of the most common manifestation of this sense of change is a slowing down and/or freezing of the passage of time.

Essay excerpts.

- P-38 (M-22) I was driving aimlessly for only about twenty or thirty minutes but I remember it feeling like an **eternity**.
- P-34 (F-20)- I just lay my head on his chest and cried forever.
- P-39 (F-19) after a couple of months he started dating one of my friends. I was so devastated when I found out that all I did for a long time was lie in my room and cry endlessly.
- P-44 (M-20) my parents tell me that we were only lost for 30 minutes...I don't believe them in my mind, it was at least 2 hours.. it just seemed like time had somehow **changed**....
- P-52 (F-20) After what seemed an eternity of walking down the beach, I remember I threw the bucket of shells on the ground and started stomping...I could not find my parents.

Confused. Once again, participants in Study 2 reiterate a theme from Study 1 in describing themselves as confused. In the excerpts presented below, confusion occurs in situations ranging from identity issues at puberty to geographic disorientation concerning which way to go.

Essay excerpts.

- P-16 (F-19) We have all experienced times when we felt left out, confused or just plain lost in our everyday lives...
- P-24 (M-20) I could not plan things to do because it was so difficult to understand who I was and what I stood for. These were the scariest times of my life because I just didn't understand things that I needed to be understanding. For example, what was happening

to my body. This is a big time in a guy's life when they are really experiencing changes that make you a man. This was **confusing** to me, because there were already tough things happening in my life and then to have to deal with something like that was horrendous.

- P-33 (F-21) ... whenever I feel lost, I become disoriented and confused. I don't know which way to take to find my way to the right place.
- P-27 (F-20) we started in the direction the woman had told us and ended up in the same situation. We ended up in place where there weren't any street lights or cars coming by...by then we were in a state of bewilderment...
- P-34 (F-20) I felt that there was hundreds of paths to take to be what I want, but I didn't know which path would be the best one for me.
- P- 45 (M-20) I didn't know what kind of place I was going to.
- P-22 (F-20) I expected God to make sense and for life to be positive. None of this was happening and I felt betrayed and bewildered.

Helpless. A feeling of helplessness was a recurring theme in both Study 1 and Study 2. In the excerpts provided below, a lack of efficacy and the inability to extricate oneself from a lost situation result in feelings of frustration, helplessness and a "hopeless" despair that nothing — neither one's self resources or other's resources — can end the "lostness."

Essay excerpts.

P-49 (M-22) I hate being lost because you feel helpless. When frustration sets in, you know its gonna be a long day.

- P-17 (F-21) The word lost to me means not knowing where I am in my life. It is a feeling of complete confusion and helplessness.
- P-21 (F-23) I didn't know what to do. I felt so **helpless**, I couldn't get in touch with the only people I knew in this big, strange city.
- P-26 (F-21) ... by this time I was very frustrated. I once again turned back around and got on 40 East. I decided to stay on the interstate a little longer than before.
- P-34 (F-20) It was at this point that I felt hopelessly lost. I didn't know how my life was going to continue without the most important person in the world to me...
- P-37 (F-21) Little did I know while I was lost and hopelessly looking for a place to escape to...all I had to do the whole time was walk away from what was hurting the most.
- P-38 (M-22) As I came upon Pisgah Street, I realized I had been going in circles. I felt hopeless...

The world when lost. In the essay responses of Study 2, participants often focused directly on different aspects of world during the experience of being lost. After careful analysis of the protocols, the four themes in Study 1 seemed to be consistent with those emerging in this new data: when you are lost the world has no path, it is very different; it is unfamiliar and dangerous. In the section below, these themes will be discussed and supported by excerpts from the essays.

No Landmarks. As in Study 1, participants in Study 2 describe the world as providing nothing to help you find the way -- both the

environment and other people are characterized as non-supportive and neither offers any sense of direction.

Essay excerpts.

- (P-15) I went to Maine and I was wondering through the woods...but its very thick and if you go off the trails, where all the spruce go down, you can sink down below the branches and disappear...and I went off the trail and, damn it, it was getting late afternoon and I couldn't find my way back...
- (P-8) I mean, the woods had just taken over...you could some times find an old bottle that had been part of a trash heap, but other than that, it was just completely woods, nothing, *no landmarks*, no anything...
- (P-17) I came to a place in the trail that had been washed out by a landslide because of all the recent rain...a sense of panic arose inside of me because I realized I was completely lost...I kept picturing myself dying in the jungles of Costa Rica because no one would be able to find me.
- (P-44) things were going good for about a half hour until it was totally dark and the terrain was getting rough. We had no flashlights but we could tell we were on **no path**...
- (P-38) so I proceeded straight into the pitch darkness of the backroads of Edes County, a bumblefudge town outside of Memphis..I made right turns, I made left turns, but still no familiar street name came into view...
- (P-54)one of the earliest memories I have of being lost is in a Kroger in Nashville Tennessee. Now, one need not explain the scope of a Kroger store they are immense constructs, aisle after aisle of products and people...
 - (P-9) the "moss is on the north side of the tree" kind-of-a-thing

really had no bearing because I had **no clue** if I was north, south, east or west from my home and what routes I would need to follow.... I was frightened, extremely frightened and I started to run...just run and run and run and the branches were whipping me in the face and I...I completely lost sense of any direction, threw all caution to the wind and I just ran and ran and ran.

Different. As in Study 1, when lost, the person describes the world as different -- the environment was not the same as it was before and these new circumstances often trigger feelings of not knowing what to do or how to do it. This theme occurred frequently in reports of moving from a "small pond" hometown to the "big ocean" of a university campus.

Essay excerpts.

- (P-53) When I came to college, my whole world was different...I felt like a small fish in a big ocean ...I had always been the big fish in a small pond and this change was huge...I had never experienced walking outside and seeing people with different colored hair and ear rings in odd places...
- (P-7) the minute I got there...all these **different** people, it was a completely different culture, they spoke a different language and it was a...shock at first, because I wasn't used...I mean, I was used to hearing Spanish spoken, but not constantly...and so, it was a bit of a shock at first, because I felt lost.... it felt like I was in a **different** world...

Unfamiliar. "Different" refers to a temporal change; as such it implies a distinction between "then" and "now" -- a comparison of past with present. By contrast, "unfamiliar" is focused on the present

strangeness of the physical and psychological landscape. The world which was once know and recognizable is now described as unrecognizable -- it is unfamiliar.

Essay excerpts.

- P-48 (F-19) we were lost from **familiarity** and what we perceived to be safe had disappeared.
- P-32 (M-20) ... when I find myself in new environments and in different situations that are **unfamiliar** to me it causes me to feel out of place.
- P-43 (M-19) lost is being vulnerable to our surroundings
- P-48 (F-19) I see lost as being in an unfamiliar place of setting
- P-22 (F-20) I was completely alone, surrounded by **unfamiliar** faces and unfamiliar scenes the thing that scared me most, was not that I wouldn't find my way back, but what might happen before I find my way back...
- P-53 (F-20) the one time I really felt lost was when I first came to college...I had never experienced walking outside and seeing people with different colored hair and ear rings in odd places. Many of the things I saw that first week of school bothered me especially when I went to English class and the first word out of my professor's mouth was a cuss word. I had never heard a teacher say anything like that. I did not know how to react to anything around me... I felt totally lost.

Dangerous. Participants responding to the essay question in Study

2, described the world as being openly hostile and dangerous when they

were lost. Typically words like "bad" and "worst" were used to characterize a situation as dangerous.

Essay excerpts.

- (P-30) F-20. ...just recently, I went on a white water rafting trip and our guide told us that if he got scared, we should be terrified....I began to feel like it could become a very **dangerous** situation...
- (P-16) F-20. I got into a really, really **bad** neighborhood and I started freaking out, because I couldn't find my way because I'm really not good with directions in the first place and so... I stopped and tried to get directions and this really weird guy came up to me and was like, hitting on me, basically... I got really nervous....actually, I started crying in the car
- (P-49) M-22. During my journey, I made my way into the **worst** part of Baltimore. The worst part of this was I was driving around in a big Coors truck. I had someone throw a beer bottle at the truck which got me worried. I was scared to stop at red lights for obvious reasons.
- (P-42) F 20he followed me, he threatened me, he tried to kidnap my son and many, many weeks my son and I would play "hop the hotel" -- staying in different hotels, while the cops were sitting in my driveway, watching my house -- -- I couldn't go out for fear that he might find where we were at --I had to hide my car and it was just total chaos... I felt like any place I went was dangerous and the entire world had become unsafe.

Comparison of Study 1 and Study 2.

A comparison of descriptions produced in Study 1 and Study 2 indicates that there are advantages and disadvantages to each approach.

Written essay descriptions tended to involve disclosure of more intimate

material -- such as the death of a loved one -- and were often more formal and somewhat stiff in style; dialogic interview descriptions tended to offer less intimate disclosures -- such as getting lost while driving to the mall -- yet more were fluid and informal in style. Despite these differences in style and intimacy of disclosure, the thematic structure of the experience of being lost was consistent across both studies. In each study, the same personal aspects were repeatedly mentioned by participants in reference to the self when lost: they felt lonely, changed, helpless, and confused. In a similar fashion, participants in each study echoed the same descriptors to characterize the world when lost: it offers no path and provided no landmarks, it is different than it was before, it is potentially or inherently dangerous, and it has become unfamiliar.

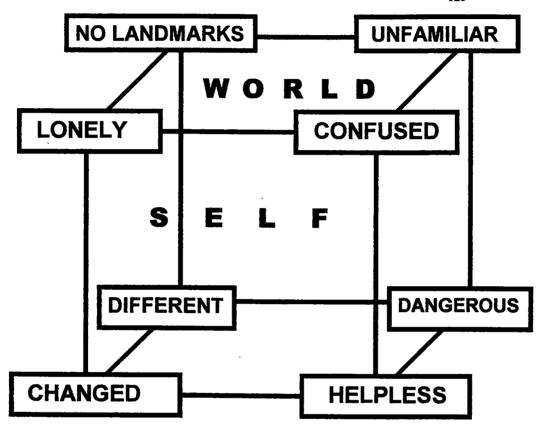
The Integrated Thematic Structure of the Experience of Being Lost.

Interviews and essay responses presented in Study 1 and Study 2 indicate that the experience of being lost is always contextualized. Just as "being" occurs in the context of the world (May, 1983), "being lost" also occurs in the context of the world; it is never restricted to a simple awareness of the self while lost, but inevitably includes an awareness of the world. The experience of being lost, like all experience, is thus

comprised of two aspects, one related to the self and the other to the world:

The existential man or woman is....viewed as having no existence apart from the world and the world as having no existence apart from the person...So it is with people and their world; if one is discarded the other has no meaning (Valle and Halling, 1989, p. 7).

In attempting to describe the relationship between "self when lost" and "world when lost" themes, an analogy might be drawn with a multistable phenomenon such as the Necker Cube -- just as the Necker Cube can be seen as two different, but simultaneous possibilities, the experience of being lost can be described from two figural perspectives: self and/or world. In Figure 1 (p. 125), the cluster of "self-when-lost" themes are indicated in red, as one possible plane to the Necker cube; the cluster of "world-when-lost" themes are indicated in blue, as another possible plane to the figure. At different times, one set of themes or specific individual themes may become the focus of the experience, as suggested by the possibility of alternative "fronts" to the figure. Another important aspect of the Necker cube presented in Figure 1 concerns the black diagonal lines which connect related themes between self and world.



WHEN I AM LOST ...

- I feel lonely and/or the world has no landmarks.
- I feel changed and/or the world is different.
- I feel helpless and/or the world is dangerous.
- I feel confused and/or the world is unfamiliar.

Figure 1. Integrated Thematic Structure of the Experience of Being Lost

In each of these connections, the world offers no support, but limits the primary project of becoming found. In the case of being lost, the world which limits our projects includes not only a disorienting physical environment, but is also a metaphorical construction created by experience:

Experience is visible in the world as a world. Consider the experience of anxiety, for example. Whatever else anxiety may be for a traditionally based psychology, it is also true that anxiety is a change in the face of the world...to live in the world as a world is to live the world metaphorically. A phenomenology of experience would reveal that human experience metaphors the world and that the structure of experience is that of metaphor (Valle and Halling, 1989, p. 29).

In a similar fashion, the experience of being lost changes the face of the world in a way that both reflects and supports the experience of a "lost" self. To illustrate and clarify this point, each of the four sets of connected themes -- indicated at the corners of Figure 1-- are discussed below.

Lonely / No landmarks. The project of being with others, which promises at least the potential for an end of loneliness, is limited by the nature of the world in which we are lost; it is a world that offers no path, no road, no landmarks toward a reunion with others. It is also a world

that offers no metaphorical path toward a psychological reconciliation from estrangement.

Changed / Different. As participants in both studies confirmed, a changed sense of identity is associated with moving to a different location such as going from a small town to a big city. Put simply, who we are is affected by where we are. In a related aspect of these connected themes, there is an awareness of before and after -- before I was lost, I was normal -- now that I am lost, I am anxious, apprehensive or changed in some way. In a similar fashion, before I was lost the world was normal, now it is different. One of the prominent characteristics mentioned by participants of this different, "lost" world, is a slowing down of events; what once occurred at a reasonable pace, now takes an "eternity." From this perspective, the experience of being lost involves an experience of discontinuity -- a break with normal time.

Helpless / Dangerous. Participants repeatedly mentioned feeling helpless, frustrated and even afraid when they were lost. Clearly, such feelings are associated with a world that is now dangerous. Being physically cut-off from other people and essential supplies could be a life-threatening situation in which helplessness and fear would seem

appropriate and inevitable reactions. Even situations of estrangement and spiritual disorientation may be construed as dangerous since they threaten our sense of self and leave us feeling helpless and out of control.

Confused / Unfamiliar. Participants described themselves as feeling confused as to which way to go, reflecting both navigational uncertainty and identity disorientation. In this context, identity is not changed into something new, as is often the case in an extended commitment to a new place; it is, instead, confused. This confusion is reflected and supported by an unfamiliar world, a strange world in which former foundations and reference points do not exist.

Just as self and world interpenetrate each other, self and world themes often are experienced simultaneously by participants: being lost is experienced at one and the same time as a state of affairs in the world, springing from a lack of knowledge of location and direction, as well as correlated feelings that accompany this lack of knowledge. In characterizing the comprehensive experiential gestalt of being lost it is necessary to keep in mind that neither the world nor the self qualify as independent phenomenon — the world and the self "co-constitute" each other — they enable one another's existence:

Far from being an "alien" presence, person and world co-determine each other even if Western thought is sometimes able to envision only one of these coordinates as existing independently of the other. The world, therefore, is as ambiguous as the being for whom it sets a context and a horizon (Pollio, Henley, and Thompson, 1997, p. 363).

CHAPTER 4: DISCUSSION

Whether one's destination be home, heaven or somewhere in between, finding the way from here to there is the essence of all human journeys. Wayfinding is the active attempt to go forward by moving purposefully through space and time toward some future goal; it is the struggle to *avoid* the often frustrating and possibly life-threatening experience of being lost:

Wayfinding is a necessary prerequisite for human survival at all spatial scales: within a house, neighborhood, city and so on...the spatial behavior patterns that result from wayfinding are the experiential skeleton for knowledge of the world around us (Downs & Stea, 197, p. 124)

The current study indicates that wayfinding situations include not only all spatial scales, but also interpersonal and spiritual ones: people try to find the way to others and to God and, failing to do so, consider themselves lost. Considering participants' wide-ranging descriptions of wayfinding attempts and failures, "the world around us" is not limited to the observable and traversable physical environment but must be expanded to include other experiential worlds:

It makes no sense, for example, to speak of man in his world (though we often do) as primarily a *spatial* relation...a person's world cannot be comprehended by describing the environment, no matter how complex we make our description...world is the structure of meaningful relationships in which a person exists and in the design of which he participates (May, 1983, p. 122).

Although wayfinding is usually considered a geographic exploration of the *natural* world, it is also an exploration of the worlds that we construct through relationships with others, ourselves and our religious beliefs.

May (1983) discusses three simultaneous modes of experiencing world: *Umwelt*, *Mitwelt*, and *Eigenwelt*. The *Umwelt* is meant to represent the biological environment and there is no corresponding category in participants' description of being lost: they discuss being geographically lost in the physical environment not in the biological environment. May's other two modes of experiencing the world have close parallels in the current study. For example, the *Mitwelt* refers to the world of being with other human beings, the world of relationships with others. The lost situations obtained from participants in Study 1 and 2, characterized as "interpersonal disconnections," represent fundamental disruptions in the *Mitwelt*. For example, many participants talked about divorce as an example of being lost: "I've never felt so lost in my whole

life than when I told my husband that he needed to leave..." (P-4).

Another participant described a painful breakup with her boyfriend:

I knew that discussing it was useless and that I had lost him so I gave up. I just asked if I could have one last kiss. He kissed me and held me while my suppressed emotions finally took over. He whispered that I was beautiful and that he was sorry. Then I walked inside my house and collapsed two feet inside the door (P-7).

In these situations, the individual has become lost from the ordinary "world of others" in which important relationships were stable. Attempts at reconciliation have failed and the formerly comforting *Mitwelt* has become a confusing, unfamiliar world, in which finding one's way toward others is difficult if not impossible.

The third mode of being-in-the world discussed by May is the Eigenwelt — the world in which "the individual can be aware of the fate he alone at that moment is struggling with" (p. 132). The Eigenwelt is described as the world of "relationship to one's self" and May concedes that the concept of "self knowing itself" is a difficult unexplored frontier of psychological theory. Despite this difficulty, however, he contends that the Eigenwelt remains "closer to us than our breathing." (p. 130). Many of the situations described as "spiritual disorientation" in Study 1 and 2

could be viewed as wayfinding difficulties in the *Eigenwelt*, characterized by identity confusion and loss of purpose and direction. For example, a frequently mentioned class of episodes involves spiritual disorientation following the death of a loved one:

...last summer was so difficult for me to keep my faith. I had the hardest time trying to figure out why God was letting my grandfather go through all this pain. I was raised to believe that God ended suffering, and provided hope for those in need. All I could think was, Were was his hope? Were is my parent's hope? Why did God choose to conflict my family with this pain? How could a god that ends suffering, allow suffering to occur? So, many questions of disbelief filled my head, I too, became weak, and lost hope. I just figured that so many horrible things happen in the world, that there must not be any "light" or hope at all (P-42).

As the above excerpt illustrates, being lost often involves being lost in several "worlds" at once. Participant 42 describes a disrupted *Mitwelt* in which the relationship with his grandfather is forever lost in the finality of a painful death — this emotional, interpersonal disconnection leads the participant to a personal crisis of faith that "he alone struggles with," consistent with May's conceptualization of the *Eigenwelt*.

Regardless of the particular world being traversed, whether the navigational task is straightforward as finding the shopping mall, or as complex as finding a path that leads from estrangement to reconciliation

with another person, wayfinding is essentially a quest for safety and certainty: the refuge of home, the comfort of a lover's arms, the salvation of heaven. By contrast, wayfinding *problems* -- obstacles and situations that thwart the finding of the way -- disrupt the human quest for safety, make the world dangerous, and contribute to feelings of helplessness, confusion, and fear. For example, Participant 14 describes her reaction to running out of gas and getting lost in Nebraska: "...and I thought: something's gonna happen to me here -- I'm gonna get raped, I'm gonna get murdered...and I was getting very frantic..." In a similar fashion, Participant 8 describes a fearful reaction toward a suddenly dangerous world after getting lost in the forest behind her house:

...I was walking and trying to keep myself in a straight line and I heard dogs, wild dogs... people would throw dogs out and they would live in the woods and they would become kind of feral...that's when I got scared (P-8).

The ubiquity and scope of wayfinding failures, as indicated by participant descriptions, may be taken to suggest that the experience of being lost in a threatening world is an *inevitable* human event. Becker (1973) describes the dangers of the natural world as inherent, inescapable and overwhelming:

Man is reluctant to move out into the overwhelmingness of his world, the real dangers of it; he shrinks back from losing himself in the all-consuming appetites of others, from spinning out of control in the clutching and clawings of men, beasts, and machines. As an animal organism, man senses the kind of planet he has been put down on, the nightmarish, demonic frenzy in which nature has unleashed billions of individual organismic appetites of all kinds — not to mention earthquakes, meteors, and hurricanes, which seem to have their own hellish appetites. Each thing, in order to deliciously expand, is forever gobbling up others (Becker, 1973, p. 53).

If one accepts Becker's dramatic contrast between human vulnerability and an openly hostile world, wayfinding may be elevated to heroic movement across a terrain of death, an unrelenting seeking of meaning at the brink of annihilation, a willingness to overcome reluctance and to move forward into the "overwhelmingess" of the world.

Given the practical importance and psychological significance of wayfinding as a basic human quest, minor episodes of geographic confusion may be taken by the wayward traveler as intimations of deeper issues. It is little wonder that even participant descriptions of being temporarily lost while driving were accompanied by intense feelings of loneliness, change, helplessness and confusion.

In the following sections of this chapter, four basic types of wayfinding problems mentioned by participants will be discussed in terms

of relevant literature: geographic disorientation, interpersonal disconnection, moving to a new place, and spiritual disorientation.

Geographic disorientation.

In the initial discussion of how people might become geographically lost (Chapter 2), three different perspectives were explored: cognitive, biological, and environmental. From a cognitive perspective, navigational biases in processing spatial information, such as orientation, prototype biases and spatial container biases were discussed. From a biological perspective, organic spatial disorders, usually resulting from right parietal lobe trauma, were discussed. These disorders included topographic disorientation, right-left and below-beyond disorientation and Balint's syndrome. From an environmental perspective, zero visibility weather events such as fog, blizzards and sandstorms were discussed in terms of their impact on human navigation. Although each of these perspectives has been associated with geographical disorientation, none of these factors were cited by participants as contributing to a personal experience of being lost. Instead, participants mentioned lack of information, faulty information, and unreliable guides as reasons for getting lost. In the section below, these first-person understandings of

"how I got lost" will be presented as a counterpoint to contemporary theories of wayfinding and getting lost.

<u>First-person perspectives: How *I* got lost.</u>

Lack of information. Even though the correct navigational information is potentially available in many of the situations described, it was not used or even accessed by participants. For example, Participant 26 was given the correct information but failed to record it: "I had forgotten to write down the directions my father gave to me, so I was pretty much guessing the way" (P-26). Overconfidence in her unaided ability to navigate unfamiliar territory led to great anxiety and feelings of helplessness: "...I started freaking out....I was very frustrated" (P-26). Eventually, after "guessing" and driving the wrong way for 30 minutes, this participant pulled out an atlas that was "under all my luggage."

Faulty information. Another factor mentioned by participants as contributing to geographical disorientation is reliance on *incorrect* navigational information:

We started in the direction the woman had told us and ended in the same situation. We ended up in a place where there were not any street lights or cars going by. By then, we were in a state of bewilderment, how did we get lost again? (P-27).

In another example of incorrect navigational information,

Participant 29 describes asking for directions on how to get home:

So then I went into the gas station and asked for directions. The cashier looked confused, but told me to take 35 east. So I drove and I took 35 east, even though my better judgment told me to take 35 west, since it said "Dayton" on it. I thought that the guy gives directions all the time. Boy was he wrong! (P-29).

Participant 49 also attributes his wayfinding difficulties to faulty information:

I was given very vague directions of where to go once inside this large city. I went past the ballpark using landmarks given to find my way. I got on a one-way street headed in the opposite direction trying to make a simple circle. It was not this easy though. I ended up driving around for two hours (P-49).

Unreliable guides. Typically, the problem of unreliable guides involves following someone who presumably knows the way. In this scenario, the lead driver who knows the way, loses his or her navigationally dependent follower by getting too far ahead and making a turn that is not seen by the tailing car. In other words, some decision point involving a turn off the straight path, is taken by the guide, but not by the follower:

We had a caravan of cars..and we got on the interstate and because the person in front of me was going really fast, I didn't see him get off the interstate and get on another one. So I was just driving along and realized I was in a really bad part of Memphis (P-36).

Participant 38 describes a similar episode:

The roads were very slick from the storm so I followed behind their jeep very slowly. I had never driven home this way before. It was dark, wet, and my impatient friends began to pull to far ahead of me since I was driving so slow. As I approached a four-way stop, my friends were nowhere in sight.. and I began to panic since I had no idea where I was (P-38).

From these participants' perspective, the wayfinding problem is not the result of faulty information *processing*, but simply faulty information or guidance. The geographically lost person in these situations did not use distorted cognitive maps, but rather were aware of a lack of appropriate navigational information. Either the necessary information was not available (no map or directions), was unreliable (directions offered by someone prove to be inaccurate) or a trusted guide was not reliable.

Although several participants described themselves as having "no sense of direction," wayfinding problems are typically *not* attributed to the self, but to the world and others. Paraphrased in simple, first-person terms, these attributions could be stated as: "It is not my fault I am lost, they

blame could be construed as an attempt to mitigate personal responsibility for an unpleasant and even terrifying situation. As the following excerpts indicate, even simple episodes of geographic disorientation may be characterized by personal feelings of confusion, helplessness and fear.

One participant wrote: "I took a wrong exit coming back to school and ended up in the wrong section of town...at the moment, this was a very frightening experience" (P-22). In a similar reaction, Participant 38 describes feelings of panic: "I was in the dead center of the backroads of Edes, totally disoriented. I began to panic" (P-38). Another participant describes fear from being lost in a "really bad" part of town:

I had no idea what to do to get out of there. At the street corners there were lots of scary people, just looking at us and we were in the Explorer and I was really scared. We were really out of place and it showed. It was a really scary experience and I was scared to stop at the stop lights (P-36).

From an existential perspective, the intensity of these feelings reflect the basic anxiety associated with disruption of intentionality. The intention of simply getting to where one is going, the continuation of the quest — the inevitable human momentum toward the future — is thwarted

by what are perceived as uncontrollable circumstances outside the self, and the result is a sometimes devastating loss of efficacy.

...the more significant aspect of intention is its relation to meaning...Intent is "the turning of the mind toward an object," Webster's tells us in the first definition, "hence, a design, purpose."...all the way through this etymology is, of course, that little word "tend." It refers to movement toward something (May, 1969, p. 229).

Geographic wayfinding problems disrupt the movement toward some spatial destination and toward the future — they bring a radical change to our normal relationship with the world and time. In a similar fashion, interpersonal wayfinding difficulties, characterized as "interpersonal disconnections," disrupt the movement toward others and toward meaning and purpose thereby resulting in loneliness and personal confusion.

Interpersonal disconnection.

Results from both the dialogical interviews in Study 1 and essay responses in Study 2 indicate that many participants did *not* experience being lost exclusively in geographical terms. Instead, they described being lost as a separation from others: early parent-child separations, estrangement from others, such as relationship breakups and divorce, as

well as the death of someone close all were mentioned as a time when they were lost. These episodes do not involve losing one's way in the environment but losing one's *connection to others*; from this perspective, "being lost" involves disruption and disconnection of relationships. Put simply, it involves being lost from others, rather than being lost in the world.

It is probably impossible to overestimate the psychological significance of other people. The experience of others of our kind -- the powerful impact of fellow human beings -- is an ongoing, continuous backdrop to all other human experiences. Along with the body, time, and world, other people form the inevitable context within which human life occurs (Pollio, et al. 1997). Given the importance of other people as a foundational context for personal identity and human existence, it is not difficult to understand how any disruption of a relationship might be described as being "lost." Furthermore, assuming the psychological significance of mother as the primary and formative relationship (Bowlby, 1980; Freud, 1938; Klein, 1937), it is easy to understand how even a temporary separation might result in great anxiety and the feeling of being lost for a young child.

Early separation anxiety. Fully one-third of the participants in Study 1 mentioned an episode of early parent-child separation as an instance of being lost. In Study 2, similar episodes were described by 20 out of the 40 participants, for a total of 25 episodes across both studies. To provide a context for understanding the reported intensity of these incidents, it would seem helpful to review some of the theoretical perspectives concerned with the impact of early separation from mother. Bowlby (1980) identifies six theoretical approaches to separation anxiety, which he discusses in roughly chronological order. The dates associated with each author often reflect reprinted versions or compilations of work.

- 1. Transformed Libido Theory. Freud (1938) contends that when young children are separated from their mothers, the child's libido goes unsatisfied -- in other words, they are frustrated because the object of their desire has been removed. In such circumstances, the libido is transformed into anxiety. As the affection or, as Freud would have it, the sexual love of a child for its parent increases, the potential for infantile anxiety upon separation also increases.
- 2. Birth Trauma Theory. Otto Rank (1952) proposed that separation anxiety is an unconscious reaction to the original separation of

birth. Rank believed that all post-birth episodes of separation are experienced as a repetition of the original birth trauma which results in anxiety. In psychoanalytic terms, anxiety is an attempt to "abreact" the birth trauma more and more completely. During these abreactions, the individual attempts to release the repressed emotional anxiety of birth by "acting out" the separation situation. From this theoretical framework, episodes of being lost from mother take on an inflated significance for the child, because of the child's unconscious attempt to relive and purge the initial birth trauma.

3. Signal Theory. The "signal" theory was first postulated by Freud (1938) as he continued to revise his understanding of anxiety. In his original formulation, Freud assumed that sexual repression produced anxiety. Upon careful examination of clinical evidence over the years, however, Freud reversed his opinion and declared that anxiety produced repression. From this new perspective, Freud thought the child develops anxiety at separation as a "rescue signal" designed to warn of impending danger. Before anxiety can arise in this way, the child must be sufficiently developed to have some degree of foresight. In other words, the child

must have some expectation of the traumatic "helpless nonsatisfaction" that will result during mother's absence.

4. Depressive anxiety theory. Melanie Klein (1937) concluded that separation anxiety results from a young child's belief, during the absence of the mother, that he or she has somehow destroyed her causing her to be lost forever. In this scenario, the child has ambivalent feelings toward mother as both a "good" and "bad" object: she is "good" when present to his or her needs and "bad" when absent. In this way, a missing mother can only be a "bad" mother, which creates both normal "objective" anxiety and neurotic "depressive" anxiety. The child's dependence on the mother for satisfaction of needs and relief of tension is a fact, which naturally creates normal anxiety in her absence. The child's idea that the missing mother is "bad" creates a "depressive" anxiety which result's from the child's guilt over the belief that the mother has been destroyed by the child's own sadistic impulses. These destructive impulses toward the "bad" object contributes to the feeling that mother will never return.

This traumatic feeling of a permanent separation is echoed by Participant 4 from Study 1:

and so, you feel like this is it, forever, you know?...I mean, we are gonna be forever right here, in this spot, without our parents and

and so, you feel like this is *it*, forever, you know?...I mean, we are gonna be *forever* right here, in this spot, without our parents and here's all these strange people all around us...I mean, and we were just, I guess, going berserk, and some of the clerks started coming to us and asking us, you know, what was wrong, and we told them that we were lost and we couldn't find our way back to our parents and she wanted to know where they were, but we didn't know --(P-4)

5. Persecutory Anxiety Theory. Persecutory anxiety theory, also introduced by Klein (1937), proposes that child sees his/her mother's departure as a hostile retaliation against the child's own sadistic impulses. As in depressive anxiety, the child believe that the mother will never return or will do so only in a hostile mood. Obviously, this belief that mother has intentionally abandoned the child causes great anxiety.

Several participants in Study 1 and Study 2 describe "lost from mom" situations which could interpreted as examples of persecutory anxiety. In Study 1, a participant described feeling abandoned when she was separated from her mom in a Kroger grocery store:

...and I was like: oh, no! my mom left me! she used to threaten us with that...she would say: if you don't keep up, I'm gonna leave you -- so I got all in a panic, and I was running around the store and I couldn't find her...it lead to many years of clutching on her...I tried not to stray from her at all, it really bothered my a lot, and I remembered it for a long time. (P-9)

A participant in Study 2 also described similar feelings of being abandoned by his parents. In keeping with the theory of persecutory anxiety, the child assumed that he was being intentionally punished for some wrong doing:

I started to believe that they weren't coming back. All I could do was cry. I prayed to God a hundred times. I asked Him, that if they brought them back to me, that I wouldn't cause mom and dad any more trouble. My parents finally pulled back into the gas station. I ran out as fast as I could. My mom's face was full of tears. I told her that I thought that they didn't want me and I was so sorry (P-45).

6. Frustrated attachment theory. This perspective assumes that separation anxiety is a basic anxiety that arises simply from the removal of the primary pleasure of the mother — in other words, separation anxiety is not reducible to some more fundamental component such as birth trauma, but occurs as a result of the child's disrupted contact with the mother, which is assumed to be as primary as the child's need for food and warmth (Bowlby, 1988).

In addition to these specific theories, several more general perspectives have provided interesting accounts of separation anxiety.

From an ethological perspective, separation anxiety stems from a child's "biologically programmed" apprehension of the unfamiliar. Bowlby does

not suggest that this fear is present at birth, but once the child can discriminate the familiar from the unfamiliar the predisposition to fear the unknown will emerge. Ethologists view separation anxiety as natural and adaptive; it facilitates survival of a species by ensuring that young members stay near their caregivers.

From a cognitive-developmental viewpoint, Kagan (1972) suggests that infants not only develop schemes for familiar faces but also have schemes for familiar locations of these faces. Because of these schemes, when mom leaves and goes through a familiar door -- for example, to the kitchen -- the child is not alarmed, because this behavior fits into the familiar mom-in-kitchen scheme. However, if mother goes out the front door, a much less common behavior, the child protests. Certainly, in a strange environments as described in Study 1 and Study 2 -- a grocery store or department store -- the child has no scheme for the mother's location and becomes very anxious upon separation.

Taken as a body of work, these theories suggest that early separation from mother is often traumatic, for various reasons: guilt, depression, frustration, birth anxiety, etc. Each of these theories concerns the intensity of the parent-child bond and the meaning of that bond for the

child. Given this state of affairs, it is understandable why even brief separations from mother were characterized years later as examples of being lost. Despite the fact that the child is fully aware of their own location -- for example, in Krogers' or in some department store -- he or she remains lost *from* the anchor point -- mother -- and without this anchor, knowledge of personal location is little comfort.

Separation through estrangement: self-image and divorce.

Another type of "relationally lost" situation described by participants involves the alienation and distancing from another that occurs during various types of estrangement. For the purposes of this study, estrangement includes any situation that resulted in a lessening of intimacy between persons. In the following section, an overview of research in the area of divorce will be presented as a paradigmatic example of separation through estrangement.

The loss of a spouse through divorce has been likened to a bereavement process since both situations may have a devastating impact on the person. Herman (1974) compares the stages of divorce with the stages of grief developed by Kubler-Ross. (1969). Accordingly, it is only in the last stage of "acceptance" that a period of reckoning with who we

are now begins. Until this point of acceptance is reached, the divorcee may well consider himself or herself to be lost from a stable sense of self, since he or she cannot return to a "married self" and cannot yet envision a "post-divorce self."

Kessler (1975) also likens divorce to a bereavement process. In this model, the stages involved in adjusting to divorce are mourning and recovering. The mourning process serves the purpose of exorcising the ghost of one's spouse through grief over his or her loss. Mourning is accompanied by feelings of anger, depression, loneliness and helplessness. The recovery process occurs when the person admits that the marriage is over. Just as in the Herman model, adjustment and recovery from divorce — and relief from the feeling of being lost — depend on acceptance of the permanent separation.

Fiske and Chiriboga (1990) explored time-related changes in the self during the process of divorce and the subsequent stages of adjustment to divorce. The results of this study indicate that, for the most part, personal "resources" increased and personal deficits decreased when comparing the immediate post-separation responses to those in a follow-up study conducted three and a half years later. Personal resources were

identified as: desirable self, masterful self, socially-skilled self, and interviewer-respondent correlation, whereas personal deficits were identified as: negative self, dominant self, incompetent self, vulnerable self, hostile self, self-oriented, and ego diffusion. The one exception to the generally positive trend toward better adjustment in this study was an *increase* in ego-diffusion among women. In other words, women in this study, interviewed three and-a-half years after their divorce, were still uncertain how to describe themselves.

From the perspective of the current study, ego diffusion resembles identity confusion, which is characterized by participants as a continuing sense of being lost, long after the divorce.

....well, sometimes I feel lost because I'm still the single person in my family...I feel lost because they all have their families and they're stable and they look on me kind of like I'm an outsider and I feel like I'm isolated (P-4).

For this participant, acceptance of her new "single" role after the divorce was and is difficult. Because the rest of her family are married, she feels that she doesn't fit in with the "marital" identities of her siblings and parents. It seems fair to assume that this type of personal confusion is very common following divorce and that it is often described in simpler terms as feeling lost.

Separation through death: the process of bereavement. Another type of interpersonal disconnection discussed by participants involves episodes of separation through death. People described themselves as "lost" when someone close to them died:

It was the worst moment in my life, to see my dad like that. I just constantly kept telling him how much I loved him because I knew that I would never see him alive again. It was at this point that I felt hopelessly lost. I didn't know how my life was going to continue without the most important person to me in the world (P-34).

Because relationships with others create and confirm our sense of self, an agonizing degree of personal confusion is common when the relationship is broken forever, in death:

If life means relationship, the bereaved person has *literally* lost a part of him or herself. Persons are composed not only of body parts, but also of history and relationships. The bereaved person is wounded as truly as if blood were dripping from torn flesh (Morgan, 1995, p. 34).

In the following section, grief and mourning will be discussed in terms of the contributions of three major clinical theorists: Freud, Bowlby, and Parkes.

Freud. Freud (1917/1957) described the central features of natural mourning as "profoundly painful dejection," withdrawal from outside

world, and inability to love. The difficulty of mourning results from the conflict between the need to detach from the lost person and an extreme reluctance to abandon a strong emotional attachment. Originally, Freud considered the mourning process to be completed after the ego reviews memories and feelings of the lost object and finally lets go, becoming free from the object. Later, Freud revised this opinion recognizing that a lost love object can never be completely relinquished (Rando, 1995).

Bowlby. For Bowlby, "uncomplicated" mourning consists of four general phases: numbing, yearning and searching, disorganization and despair, and reorganization (Bowlby, 1980). Bowlby considered these phases to be substantially identical for older children and adults.

Numbing is characterized by disbelief, and feelings of unreality.

Often persons in this phase continue their life in a stunned, automatic way as if they were in a dream — although this calm may be shattered at any moment by "overwhelming attacks of panic." (p. 86).

Bowlby characterized the second phase of the normal bereavement process as "yearning and searching." In this phase, the mourner begins to episodically register the reality of the loss which leads to "spasms of

distress and tearful sobbing" (p. 86). Accompanying these instances of intense grief, the person experiences restlessness, insomnia and preoccupation with the loss person. Vivid dreams of the loss person still alive are not uncommon.

While yearning results from the acceptance that death has occurred, seeking -- which often occurs during this same phase -- results from a continuing and paradoxical *denial* or disbelief of the death. Regardless of the perceived irrationality of the act, every bereaved "finds himself impelled to search and, if possible, to recover the person who is gone."

(p. 87). Anger and ingratitude toward comforters often accompany this seeking. The mourner, not ready to concede the finality of the loss, resents and may become angry with those comforters who urge acceptance before the bereaved is ready for acceptance. In describing her difficulties adjusting to the death of a close friend, Participant 22 wrote:

I began to hate people because they told me that her dying was God's will, and then people did not understand why I was not okay. It seemed as though everyone expected me to get over her death (P-22).

Bowlby characterizes this type response as typical of the "searching" process, which includes the rejection and disdain of consolation:

....thus, we see, restless searching, intermittent hope, repeated disappointment, weeping, anger, accusation, and ingratitude are all features of this second phase of mourning, and are to be understood as expressions of the strong urge to find and recover the loss person. Nevertheless, underlying these strong emotions, which erupt episodically and seem so perplexing, there is likely to coexist deep and pervasive sadness, a response to recognition that reunion is at best improbable (p. 92).

Although the intensity and duration of such seeking varies from person to person, it generally diminishes over time as the mourner learns to reconcile the two incompatible urges of yearning and seeking.

Bowlby characterized his third phase as "disorganization and despair." In this phase, frustration at the need to accept the loss and the desperate attempts at denial reaches a peak. At this point, it becomes clear that a redefinition of self and situation, however painful, is necessary and it is only when the bereaved person begins to abandon previous ways of thinking that the phase of disorganization and despair diminishes.

When the person successfully redefines the new post-bereavement world, the devastating feeling of "being lost" diminishes.

Especially in the case of bereavement following the death of a spouse, this "redefinition of self" involves the resumption of a social life with the opposite sex. Bowlby points out that attempts at rejuvenating a

social life, even on a superficial level, are difficult in our society:

firstly, there is the convention of "gender balancing" which usually means
pre-established "couples" are invited to social functions; unaccompanied
and single individuals are not included because it is assumed they would
feel like the awkward "third person." Because of this, many opportunities
to meet new people are not available to the widow or widower. By
contrast, another social convention involves occasions whose explicit
purpose is the mixing of persons who are "available" because they are
either single or divorced. For the recent widow or widower such "mixers"
often prove to be unwanted and painful reminders of the loss of his or her
partner.

Because of common conventions like these, emergence from the feeling of being lost after the death of a loved on is often a slow and painful process (Bowlby, 1980).

<u>Parkes</u>. Parkes argues that everyone should prepare themselves for grief because it is a universal experience that is a necessary consequence of love:

The pain of grief is just as much a part of life as the joy of love; it is perhaps, the price we pay for love, the cost of commitment. To ignore this fact of pretend it is nor so, is to put on emotional blinkers which leave us unprepared for the losses that will

blinkers which leave us unprepared for the losses that will inevitably occur in our lives and unprepared to help others to cope with the losses in theirs (Parkes, 1972, p. 26).

In addition to the inevitability of grief over a loved one's death,

Parkes identifies two factors that influence the overall process of

bereavement: stigma and deprivation. Stigma refers to the reaction of

others to the bereaved. It is not untypical for formerly friendly

interactions to become embarrassed or strained, as if the bereaved has

become tainted with the contagious disease of death. In many societies

this stigma takes the form of a ritualized taboo concerning the bereaved.

These taboos range from isolation to wide-spread ritual suicide: for

example, many societies found it preferable to send the widow into the

next world along with her husband, rather than face the reminder of death

that she represents.

Besides coping with stigma, the bereaved must also cope with deprivation. Parkes (1972) describes deprivation as the "absence of those essential supplies that were provided by the loss person" (p. 29). In addition to the loss of "instinctual supplies" such as "pair-mating" and "brood-rearing," deprivation may also include the loss of an entire world that was based on the continuation of the old relationship. The devastating

impact of loss — and the resulting feeling of *being* lost are attributed to a fundamental disruption of the mourner's "assumptive world," a schema containing everything a person holds to be true about the world and the self. Parkes concludes that in addition to the loss of a significant person, the bereaved experiences the loss of his or her *entire* concept of the world because that world was built around the presumption of the continuing existence of the deceased:

The circumstances of a death, the very fact that it occurred, or the sequelae that it engenders can shatter global assumptions the mourner maintains; for example, the mourner no longer believes the world is a safe, orderly place...(Rando, 1995, p. 217).

This loss of faith in the world is reflected by Participant 22, responding to the death of her mother:

All of a sudden, my ideas of a perfect, just world were turned upside-down. I didn't understand why bad things happened to good people and why even people in my church were giving me lame excuses: it happened for a reason (P-22).

As the excerpts in this section indicate, participants' responses confirm the bereavement models discussed above: separation from a loved one through death is experienced as being lost since it usually involves a difficult and complex process of finding the way from denial and disbelief to acceptance.

Moving to a new place.

Participants also discussed moving to a new place as an example of being lost. In these "dislocation" episodes, all three categories of wayfinding problems are present: geographic, interpersonal, and spiritual. For example, Participant 51 describes getting lost after moving from a familiar hometown to the unfamiliar campus of the University of Tennessee:

When I first came to the University of Tennessee, I would get lost walking around campus. I still get lost in the university library. I have a tendency to get lost while trying to get there, or after I have already gotten there (P-51).

Another participant echoes this same theme of being geographically lost after moving to the University of Tennessee:

The most recent time I remember being lost was August 27, 1997. The first day of classes here at UT. I didn't bother to find my classes before classes started, so, of course, I got lost that day. (P-21).

Moving to a new place also unavoidably separates one from friends and family. Several participants mentioned this aspect of their move from home to the university:

School -- I hate UTK and I don't have a major. Friends -- they are six hours away (Memphis) and most of them are not doing very well...Boyfriend -- also six hours away, possibly moving

to California to pursue a career in movies? (P-18).

Another participant reports feeling lost after leaving all her friends behind to come to the University of Tennessee:

The night before I left, my friends threw a party and I had to say goodbye to them. It was a very difficult thing to do. Then I came to Knoxville the next day...I felt lost and alone...Who was I going to call and where was I supposed to go? (P-19).

Moving to a new place is also associated by participants with feelings of personal confusion and loss of direction and purpose:

The most frustrating experience of being lost is the one I have had in college. I feel so lost about where I am, who I am, who I want to be, and what I want to do with my life...I thought I had everything figured out until I came here...After being put in such a large, new environment, everything I knew was thrown out the window. I was forced to re-evaluate myself. This left me lost and disoriented (P-33).

As these excerpts indicate, moving to a new place involves many different types of wayfinding difficulties. The dislocation of moving to college is clearly a critical transition whose significance effects even one's sense of identity. Bridges (1985) emphasizes that critical transitions reverse the normal sequencing of life events; they begin with the *ending* of the familiar, move through an in-between "neutral zone" of uncertainty, and end with the *beginning* of something new. Bridges discusses three

- different aspects of the "natural" transition experience: (1) disenchantment, (2) disengagement, and (3) disorientation.
- 1. Disenchantment. Bridges describes "disenchantment" as "the discovery that in some sense one's world is no longer real" (p. 98). In other words, the old world and all of its assumptions are shattered. Disenchantment is the reluctant and painful disillusionment that comes with detachment from former relationships; it occurs when we realize...

...that there is no Santa Claus; that parents sometimes lie and are afraid and make stupid mistakes and like silly things; that best friends let you down, but these disenchantments don't end with childhood ...the lifetime contains a long chain of disenchantments, many small and a few large: lovers who prove unfaithful, leaders who are corrupt, idols who turn out to be petty and dull, organizations that betrayed your trust. Worst of all, there are times when you yourself turned out to be what you said and even believed you were not. Disenchantment, you can quickly discover, is a recurrent experience throughout the lifetime of anyone who has the courage and trust to believe in the first place (p. 99).

What makes disenchantment so painful is the power of the original "enchantment" -- the spell cast by the past on the present. In order to change and successfully negotiate the critical transition, one must realize the constructed and impermanent nature of the "old reality," or the transitory nature of former attachments such as participants' attachment to old friends and family that had to be left behind. Clearly, the danger at

such transitional moments, is that disenchantment will become a bitter cynicism rather than a healthy skepticism. For example, the challenge of growing from youth to maturity is to abandon naivete and idealism without losing hope and trust.

- 2. Disengagement. Disengagement, according to Bridges, is any process that enables a "separation from one's familiar place in the social order" in preparation for a transition into some new place. The act of disengagement is often ritualized: the prospective shaman leaves the village on a journey of self discovery, the adolescent Native American engages in a "vision quest" to see his or her path in life, a young boy in the Jewish faith participates in the Bar Mitzvah ceremony, the high school and college graduate attends commencement ceremonies. These acts of disengagement represent symbolic rites of passage that serve as a social codification and recognition of a changing self-world relationship. Unfortunately, these rituals often are ineffective at easing personal confusion, and the experience of being lost during important changes, as indicated by the participant's descriptions in the current study.
- 3. Disorientation. The final phase of the natural ending process as discussed by Bridges is disorientation. In the unfamiliar, post-transitional

territory toward which one is moving, former means of orientation and movement toward the future no longer operate. Familiar signs of location are removed. In short, persons experiencing disorientation during critical transitions do not know where they are or where they are going anymore. As with other aspects of an ending process, most of us already know the disorientation experience. According to Bridges, we recognize the lost, confused, "I-don't-know-where-I-am" feeling that deepens as we become disengaged, and disenchanted. The old sense of life as "going somewhere" breaks down, and we feel like we are...

shipwrecked on some existential atoll...it is a time of confusion and emptiness when ordinary things have an unreal quality about them. Things that used to be important don't seem to matter much now. We feel stuck, dead, lost in some great, dark non-world.

Symbolically, the endings that occurs during critical life transitions are experiences of dying. Following divorce, a family member's death, or even moving to a new community, our sense of who we are may change so radically that it feels like our old self has died. Obviously, transitions are inevitable and necessary for growth, although the feelings of disengagement, disenchantment and disorientation can combine to create an overwhelming sensation of being lost. In a successful transition, the person may be symbolically "reborn" on the other side and life goes on

with a new renewed sense of identity and purpose. As T.S. Eliot says in *Little Gidding*: "What we call the beginning is often the end, and to make an end is often a beginning. The end is where we start from."

Spiritual disorientation.

Purpose is the thing that propels one toward the future. A sense of purpose justifies and authenticates existence. Without purpose, one direction is as good as another. Without direction, life's journey becomes endless and pointless. For many participants, being lost was experienced as a disconnection from purpose or meaning:

... I want to know if there is a God or not. I want to know where I'm gonna be in twenty years so I don't have to worry about it now...and there's so many...you know, there's no answers to these questions, so your continually asking why?...some times I just feel like I'm floating in this big abyss of nothingness...its just like: you know, where am I gonna go? (P-11)

Becker (1971) argues that as the secular increasingly replaces the sacred in our society, people tended to lose their sense of purpose and become more anxious, disillusioned and lost. In Becker's analysis, persons who are invested in the secular world are no longer able to "identify" with anything as perfect, everlasting and transcendental as God; instead, they identify with large organizations of society (the corporation, the party, the nation) or with broad humanistic abstractions such as science, ecology, and humanity. According to Becker, society is now

composed largely of individuals who live in a "profane" existence of attachment to transitory socially-constructed institutions and concepts. Eliade (1959) describes living in this "profane space" as a disorienting and disillusioning experience.

The profane experience...maintains the homogeneity and hence the relativity of space. No *true* orientation is now possible, for the fixed point no longer enjoys a unique ontological status; it appears and disappears along with the needs of the day. Properly speaking, there is no longer any world, there are only fragments of a shattered universe, an amorphous mass consisting of an infinite number of more or less neutral places in which man moves, governed and driven by the obligations of an existence incorporated into an industrial society (p. 24).

Like Eliade, Becker also warns that the "profane" secular world provides no meaningful orientation and the result is a "crisis of faith and hope of major proportions." For Becker, this crisis occurs when the "temporal fetishes" of the secular realm crumble. For example, communist who lost their party with the collapse of the Soviet Union, Wall Street brokers who lost their money in 1929, lovers who have lost each other. Each of these persons has invested in a desperately exaggerated attachment to passing things. In short, such individuals have mistaken the ephemeral for the eternal, and are left with nothing but "fragments of a shattered universe."

At the heart of the new secular world is a scientific epistemology which seems to exclude the possibility of purpose from the universe. As one participant put it: "As I have learned more about the physical makeup of our universe, traditional religious beliefs conflict with my knowledge of the development of the world and life itself" (P-40).

The implications of a random process of evolution and its conflict with the purposive creation of Christianity was mentioned by several participants as contributing to their feelings of spiritual disorientation.

For example, Participant 38 described a "struggle" to believe in religious stories of a divine Creation:

As I grew older I began understanding some things said, but at the same time had developed a mind that could question the things I wasn't suppose to question. The more I thought about the concepts and stories associated with the sermons and preachings, I began to be very confused. For me, being a scientifically minded person, it was a struggle sometimes to believe something in which facts were not concrete. By that I mean for instance Creation. I have always took the more scientific approach. I suppose being lost, to me, is not having a sense of forward direction, when life seems as if it is in a random pattern of events. This is why I think a lot of adolescents experience being lost a lot (P-38).

In a similar fashion, Participant 25 describes his own conflict concerning the theory of evolution and belief in God:

I think the main reason it is hard for me to believe that God

created man is because I strongly believe in evolution. It is not onlylogical but there have been so many studies that proven evolution to be valid. My thought on this whole situation is that evolution created man and man created God. Being the imperfect species that we are, we need something or someone to be able to turn to when things were going wrong (P-25).

Many theorists agree with these participants that evolutionary theory implies a random rather than a purposeful world. Cauthen (1969), echoing Becker, Eliadie and many others, describes a cold scientific picture of the world:

Life as an emergent by luck and happenstance, man as a product of the same purely natural mechanisms that produced the earthworm and the baboon, psychic occurrences as dependent on physiological processes, the earth as an infinitesimal speck in a vast sea of galactic space, the system to which we immediately belong as apparently headed for an inexorable heat death -- and all this full accountable for in wholly naturalistic terms...(Cauthen, 1969, p. 23).

In such a cosmos, there is no room left for God as orchestrator of a purposeful creation. This point was never made more succinctly than in the reported exchange between French mathematician Pierre Laplace and Napoleon. As the story goes, when Laplace presented Napoleon with the first edition of his work describing the universe as a perfectly self-regulating machine, Napoleon remarked - "Monsieur Laplace, they tell

me you have written this large book on the system of the universe, and have never even mentioned its Creator. "Laplace is reported to have replied: "I no longer have a need of that hypothesis" (Capra, 1984, p. 46).

Participant 6 also affirms the scientific contribution to the loss of certainty, describing how facts learned in anthropology classes contradict Biblical claims to a unique story, casting doubt in her mind about the certainty of God's existence:

I have to have meanings. See, I want definite. You know, I want to know why my friend died, I want to know if their is a God or not....I guess my latest "lost" issue would probably be religion...I don't know if there is a God, I don't know if there isn't a God...I do feel kinda lost on that issue because its so easy to say: yeah, there's a God, because my mom says so, and there's the Bible and there's the church and then when you look at facts, you know, its harder to see...like, I've taken a lot of Anthropology classes and they talk about how a lot of cultures have this same story that's in the Christian Bible, its just kind of revamped a little bit, and that kind of throws me off a little bit...'cause, you know, I'm going: well, maybe its just all an illusion so we're not so afraid of death...which..that's kinda scary....(P-6).

Although scientific assertions of relativity are frequently blamed for disrupting the previous certainty of a faith-centered world, Becker (1973) suggests that the new scientific mythos offers an immortality project that could serve to replace the now dysfunctional projects of organized religion. Scientific knowledge has stripped away the prideful

side of religious heroism, which claimed an unjustified cosmic uniqueness and significance for the human race. In the place of this false pride, science potentially offers "a mythical construction of victory over human limitations (p. 285)." Even if most people in today's secular world, like Laplace, no longer have a need for the "Creator hypothesis," we can still speculate, with some degree of hope, that imminent "miracles' of modern technology will prolong life, perhaps indefinitely. Although this may accurately be construed as continued wishful thinking and denial of death, it is, according to Becker, a necessary and unavoidable denial -a myth of heroic transcendence. In addition, the "scientific" denial of death has the advantage of being a credible one for our times: a medical cure for cancer and even death itself now seems much more likely than life everlasting in heaven.

Clearly, spiritual disorientation is not simply a problem of modern Western culture, but an inescapable aspect of human nature and, if Becker is correct, the best thing one can aspire to, the only solution to the existential fact of our being lost, is to construct some hope that provides a reason to keep walking down life's path toward a destination that may be only a dream:

It is no wonder that when therapies strip man down to his naked aloneness, to the real nature of experience and the problem of life, they slip into some kind of metaphysic of power and justification from beyond. How can the person be left there trembling and alone? Offer him the possibility of mystical contact with the void of creation, with the power of "It," his likeness to God, or at the very least the support of a guru who will vouch for these things in his own overpowering and harmonious-appearing person. Man must reach out for support to a dream, a metaphysic of hope that sustains him and makes life worthwhile (Becker, 1973, p. 275).

The Thematic Structure of Being Lost.

As the lost situations from the interviews and essays indicate, being lost is a disconnection from the normal way of being in the world. During this disconnection from normality, the self is described as lonely, changed, helpless, and confused and the world is described as different, dangerous, unfamiliar and as providing no landmarks. As discussed earlier, these sets of themes may be paired in the following way to describe the alternating figure-ground relationship of the self and the world during the experience of being lost: I feel lonely and/or the world provides no landmarks to help me find others. I feel changed and/or the world is different. I feel helpless and/or the world is dangerous. I feel confused and/or the world is unfamiliar. In the section below, each of these thematic pairs will be considered in terms of what one has lost.

Lonely/no landmarks. Being lonely involves a loss of other people. Because the "lost" world offers no landmarks to guide us toward others, there is no possibility of physical reunion and/or emotional reconcilliation. These themes occurred throughout the protocols in this study when participants discussed being separated from mother at an earlier age, relationship breakups and death of a loved one. Clearly, many people consider intense loneliness to be synonymous with being lost; for them, being lost is about disconnected relationships.

...you're just in despair...you don't know what you're supposed to do -you're lonely - you feel like nobody likes you or you don't have a place or you don't fit in anywhere, you're lonely - you feel kinda like you against the world -- you're lost (P-10).

Changed / different. Being "changed," involves a loss of temporal continuity: time no longer flows in the normal way and as long as the world remains different one has lost any chance for going back to the way things were. Typically, descriptions in this study involve time that is seemingly frozen -- the "not-lost" past is irretrievable and the "not-lost" future seems unreachable:

Life is simple if you go full speed ahead and do not look back...its the *moments when you slow down* and your mind takes over that lets you realize just how lost you are (P-48).

Helpless/dangerous. Being helpless involves a loss of control in a world that has become dangerous. Participants described an external locus of control in which their lost situation is attributed to a world which has rendered them helpless to find their way.

To me being lost is...feeling helpless because you're not in tune, you're not in charge of what you're trying to accomplish and what you need - something's in the way (F-20).

Confused / unfamiliar. Being confused involves a loss of certainty in a world that is unfamiliar. For a thing to be certain, it must be unfailingly dependable, and beyond question or doubt. Therefore, if a person is *certain* of where he or she should go and who he or she is -- if a person's understanding of direction and identity is beyond doubt -- being lost is an impossibility. Lacking this certainty, a person feels confused and the world seems unfamiliar.

...so after a while, I got confused about what line I was supposed to be in and there was a bus getting ready to leave and started to get nervous, and I didn't know where I was going to end up.. (P-1)

The often intense emotional response during the experience of being lost reflects the importance of four things one has been sundered from: other people, continuity, control, and certainty. Wayfinding is the project to reclaim these things.

Wayfinding.

Whether geographic, relational or spiritual situations are involved, the problem of being lost is always a problem of appropriate direction.

This problem is illustrated in Lewis Carroll's book, *Alice in Wonderland*. When Alice asks the Cheshire Cat "which way ought I go?," she discovers this disarmingly simple question may be difficult for someone to answer. The question is problematic because it requires another person to prescribe a direction for oneself. In asking the question, "which way ought I go?" one acknowledges two possible conditions: (1) uncertainty of how to get to a destination or (2) uncertainty of the destination itself.

Also, the question entails doubt in one's own ability to answer and, thus, a relinquishment of personal responsibility to determine the *appropriateness* of a possible direction.

As participants in this study have indicated, the question of which way one ought to go may be taken as a straightforward navigational inquiry involving geographical direction ("how do I get to the mall?") or as a metaphorical plea for spiritual direction:

If I don't have a purpose or know where I'm going from point A to point B, I'm scattered, its just....out of control...When I have a bad day and, you know, like a lot of stuff's going really wrong and I'm just in a really bad mood...then I don't really think...its kinda like: what is this all for? Am I just spinning my wheels for no reason? Is this just getting me nowhere? (P-6).

In this excerpt, the participant's unspoken question is an almost desperate plea for someone to provide a direction in which she "ought to go." It has not been the purpose of this study to proscribe a solution to such questions of spiritual and/or geographical direction: its purpose has been to describe the thematic structure of the experience of being lost, with the hope that such a description will provide insights into geographical, relational and spiritual wayfinding.

Certainly, the protocols in this study echo the wisdom of a familiar colloquial adage: "you don't know what you've got 'till its gone." When the familiar world is gone, when there is no way to connect with other people, when continuity is disrupted, when the world becomes a dangerous place, one comes to fully appreciate normal stability. Wayfinding is fueled by the need to return to this stability and it must be, ultimately, a personal quest. Perhaps, in the final analysis, being lost is an opportunity to learn about what it means to be found:

We all interpret the term "lost" differently. What may seem

trivial to someone else might be terrifying to another. Looking back over our lives we can all agree on one thing: being lost is not fun, and never will be. The important thing is that we learn from our experiences, and try to incorporate their lessons into the different aspects of our lives (P-16).

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