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Migraine: An Existential Phenomenological Study

Jodie Eckenrod

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Migraine: An Existential Phenomenological Study

a Dissertation

Presented to the Faculty

of the Psychology Department

McAnulty College and Graduate School of Liberal Arts

Duquesne University

in partial fulfillment of

the requirements for the degree of

Doctor of Philosophy

By

Jodie Eckenrod, M.A.

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Acknowledgement

To Sean, Samantha and Jenna Eckenrod.

Abstract

This study examined the structure of the migraine headache experience. Three adult participants were asked to give a written answer to the question: “Please describe a time you experienced a migraine headache. Please explain what was happening before the headache, during the headache and how it was resolved.” The participants were then asked for an audio taped interview with the researcher, the purpose of which was to further explore unclear areas in the written response. The written response and audio taped interview comprised the data sets for phenomenological analysis. From the data from the three participants, a general narrative of the migraine experience was identified. The researcher attempted to understand the structural interrelationships of aspects of the phenomenon and also, by contextualizing themes in their relationships, to understand those themes that differed between participants.

Findings indicate that the experience of the migraine affected all aspects of the participants’ lives, including embodiment of pain, self-understanding, relationships, perception, and the migraines’ role as horizons for the individuals’ experiences. The migraines affected embodiment, as the participants felt alienated from their bodies and affected directly by perceived causative agents. Additionally, the migraines changed the participants’ understandings of themselves, understandings that changed over time depending on the amount of their lifetimes that were spent suffering with the experience. The migraines also altered relationships, as the headaches acted as isolating events that drew the participants into themselves and away from others in their lives. Moreover, the experience of perception transformed during a migraine to include not only perception of meaningful wholes, but also perception as a bombardment of the senses. Finally,

findings indicate that, for these participants, the migraine was not lived as a punctuated episode, but continued in the form of possible horizons. Overall, although in some ways the participants experienced themselves as objects affected by perceived causes or barraged by sensations, existential implications remained embedded in the experience, and meaning infused the lived experience of the migraine. Findings further indicate that while there were similarities in the participants' experiences, there were differences as well in terms of the meaning each of them assigned to the migraine experience.

Research findings led to: a) a demonstration of the efficacy of a descriptive methodology in understanding, while in extreme pain, the phenomenon of human embodiment; b) a reinterpretation of the concept of bodily "dys-appearance" as introduced in the work of phenomenological philosopher Drew Leder; c) a furthering of the understanding of perception as a complex phenomenon that can involve both an intentional perception of a meaningful world, as emphasized by phenomenology, and an experience of sensory reception or "bombardment" in the migraine state; and d) a redefining of the concept of "episode" with respect to a migraine headache, as the headache is not clearly conceptualized as having a strict temporal progression.

Introduction

This study on migraine headaches possesses a twofold rationale. For one, I have a professional interest, as both a pharmacist and an aspiring psychologist, to contribute to the growing area of research that combines the concerns of health care with those of psychology. In addition, I have a personal interest, having suffered with severe back pain, in contributing research on first-person experience with intense pain. Thus, the study's qualitative analysis employed first-person experience as a primary source of data. For the most part, the existing research on migraines works with a natural scientific model. I was, instead, interested in providing an opportunity for migraine sufferers to speak for themselves about the whole of their experience, not only on physiological symptoms. I wished to elucidate more than just one or two aspects of the experience, but instead come to a new understanding of the phenomenon of migraine headache as lived by a human being.

As the goal of phenomenological research does not center on finding causes of experiences, but illuminating the structure of the experience itself, my goal was not to reach conclusions about what causes a migraine headache or to prove that a particular method can ameliorate the affliction. Rather, I held an interest in allowing the phenomenon to speak for itself and to analyze the structure of that experience. In doing so, I hoped that other migraine sufferers could gain insight into their own experiences of migraine headaches and that the health care community could have a more complete understanding of the devastating effects of migraine headaches on the individual and his or her life world.

A pilot study conducted in a graduate-level psychology class showed the benefit of a phenomenological approach to research on migraine headaches. Participants were asked to respond, in writing, to the following question: “Please describe a time you experienced a migraine headache.” Upon reviewing the written descriptions from the pilot, I felt that the responses warranted further study on the topic using a phenomenological method. The responses provided the outline for a new understanding of migraines as conceptualized through such means as perception, embodiment, and time.

Yet, to arrive at the new understanding, the researcher has to become aware of preconceptions of the phenomenon under investigation. The research process is dialectical; thus, I tried to remember my own experiences, and continually became aware of how my experiences informed the research process and move beyond my own notions of such concepts as severe pain. Having suffered from severe pain, I had lived through, what I believed as, a similar experience to that of the migraineurs. Thus, at each stage of the process, I remained consciously aware of my assumptions regarding extreme pain. The aim of the study—the new understanding of migraine experiences—involved a hermeneutic process between the researcher and the data provided by the participants. While little data has been gathered from first-person experiences of migraine headaches, a vast literature on causes of migraines, symptoms, and stages of the migraines exists.

Since the dawn of recorded history, migraine headaches have manifested among humans of every culture. Such historical figures as Julius Caesar, Immanuel Kant, and Friedrich Nietzsche suffered from migraines. On a socioeconomic level, the United States economy currently loses approximately 13 billion dollars annually due to lost productivity and missed work from the more than 23 million Americans suffering from

migraines (Peebles, 2000). Researchers have made a number of notable generalities regarding migraines. For instance, an increased co-morbidity with psychiatric and physiologic disorders such as anxiety, depression, inflammatory bowel syndrome, epilepsy, hypertension, and hypotension has been observed. Gender and age also factor in the existence of migraines as well. Women between the ages of 35 and 45 years old most commonly suffer migraines, although a substantial number of men and people outside of the age range also experience the headaches. Generally, the migraine's onset occurs earlier in life for men than women.

The International Headache Society has specific guidelines to diagnose migraine and differentiate it from less severe headache pain. For a diagnosis of migraine, an individual must suffer from at least five attacks with the following characteristics:

1. The headache lasts for four to 72 hours if left untreated or if unsuccessfully treated;
2. The pain has two or more of the following characteristics: unilaterality, pulsating pain, moderate to severe intensity, and/or a worsening with physical activity;
3. The symptoms include one or more: nausea, vomiting, photophobia (avoidance of light), and phonophobia (avoidance of sound); and
4. Lack of evidence of a related organic illness (Peebles)

Moreover, a common understanding of migraine headaches presents them as occurring in four stages—although not all migraineurs suffer from all stages. The prodrome stage starts the experience and includes moodiness, drowsiness, hyperactivity, and decrease in concentration. Next, an aura stage, or disturbance in the visual field,

develops in 10 to 20% of patients. This second phase lasts less than an hour. The headache itself constitutes the third phase, characterized by the presence of several symptoms listed among the International Headache Society's guidelines. Finally, the resolution phase occurs after relief of pain. This phase can last up to 24 hours, marked by loss of appetite, fatigue, moodiness, and irritability.

While these guidelines and data present a useful method to diagnose migraine headaches, limitations exist in this system. In phenomenological analysis, one can attain a new understanding of the migraine headache as an experience for an individual, not merely a collection of symptoms or statistics. The literature review reveals the understanding of migraine headaches from the predominant biological perspective, as well as from the perspectives of health psychology and psychoanalysis. An examination of Oliver Sacks, a physician with an interest in the meaning of experience, will serve as a bridge between the aforementioned perspectives and that of phenomenology. A review of the existential phenomenological literature as it pertains to the experience of migraine headaches presents main currents in phenomenology that frame the study and provide it with theoretical content. Through juxtaposing the phenomenological perspective on lived experience with biological, health psychology, and psychoanalytic research on migraines, the limitations and strengths of each position aid in illustrating the need for a phenomenological study that brings together the concerns of physiological and psychological health.

Literature Review

Body as Object

Traditionally, the work done on migraine headaches treats the human body as an object among other objects in the world. Fixed limits or boundaries define the body and award it a place as a distinct part of the physical world. As a thing in the natural world, the body undergoes subjection to the laws of physical nature and, therefore, outside forces, such as external stimuli from the world, act upon the body. Objective thought does not regard the body as able to experience a meaningful world but, instead, examines the body's functionality. Although existentialist thinkers heavily criticize this view of the human body and the reductionism that inherently plagues objectivist theories, existentialist psychologists can learn from objectivists in studying the phenomenon of migraine headaches. For example, although the experience of migraine headache does not occur at a cellular or vascular level, a process happening on the neurological or vascular level must be considered; a physiological process remains part of the migraine and requires attention as part of the overall meaning of the experience. To begin the study with a review of the literature from biological, health psychology, and psychoanalytic perspectives aids in the illustration of how each perspective's strengths and limitations contribute to both the overall body of knowledge and an existential phenomenological view of migraines.

Moreover, patterns and progressions of ideas exist within the body of literature in question, biology, health psychology, and psychoanalysis. For one, all three perspectives take up the body as an object. To expand on this generality, the literature progresses from a high level of objectivism (biology) toward an understanding and valuing of

meaning (psychoanalysis). Each discipline reveals one important aspect of the phenomenon of migraine headache and each contributes to therapeutic methods for headache treatment. As an aspiring existential psychologist investigating various interventions based on the findings of the natural science disciplines, I find them both helpful and meaningful to the migraine sufferer.

Biological Perspective

The biological perspective views the body in terms of empiricist assumptions. When viewed through a biological lens, the body is an object that is a passive recipient of stimulus from an external world. Knowledge comes through sensation, defined as stimuli impinging themselves upon sense organs. Combining groups of sensations creates perceptions. From this angle, the subject receives stimuli from the world as bombarding him or her. Moreover, the body, as a thing that bears observation, undergoes measurement and quantification. Generally, the assumptions from which biological researchers work focus on symptoms of the migraine, a search for its physical causes and, based on the causes, a search for ways to cure or ameliorate the symptoms.

The biological perspective thus considers migraine headaches a primarily physiological disorder, although scientists do not know the exact mechanism leading to their manifestation. Studies performed by Guyton (1991) and DiPiro et al. (1993) supporting the view of migraines as a vascular disorder discuss the existence of a “prodrome” period that occurs 15 minutes to one hour before the actual headache begins. Several symptoms occur during this phase, including nausea, loss of sight in part of the visual field, aura, and other sensory hallucinations (Guyton, 1991). Additionally, mood

and motor disturbances can occur in the prodrome phase (DiPiro et al., 1993). According to DiPiro's (1993) work, the "classic migraine" is distinguished from the "complicated migraine" when the prodrome phase appears distinct from the headache phase itself; in the "complicated migraine," the prodrome symptoms persist into the headache. No prodrome occurs in the "common migraine," although some researchers believe that the migraine sufferer may not realize the prodrome exists (DiPiro et al., 1993).

Furthermore, the biological studies such as that performed by DiPiro et al. have found that migraines usually begin in the early morning hours and generally peak an hour after onset. The migraine's duration can last from several hours to several days, and migraines can occur every day to once every several weeks (DiPiro et al., 1993). The locus of incapacitating pain associated with migraine headaches usually falls behind or around the eye. Once the headache resolves, a soreness of the cranial muscles and exhaustion result (DiPiro et al., 1993).

Aside from symptoms and their duration and manifestation, the biological perspective provides several hypotheses to explain migraine headaches. The vascular hypothesis assigns the cause of the headache to the vasospasm of the cranial arteries. The vasospasm causes ischemia, which leads to the manifestation of the prodromal symptoms (Guyton, 1991). Prolonged lack of blood creates flaccid blood vessel walls for 24 to 48 hours, creating a pulsating feeling in the head. When the vessel walls stretch, the extreme pain of the migraine begins. Controversy exists as to whether vasospasm in the intracranial arteries, extracranial arteries, or both brings on the migraine pain; however, current research by Shevel and Spierings (2004) suggests the extracranial arteries originate the pain in some migraine sufferers.

The second most common hypothesis deals with serotonin mediation and holds similar elements to the hypothesis of migraines as a vascular disorder. In this theory, vasoconstriction does not occur. Instead, a dysregulation of serotonin, a neurotransmitter that stimulates the trigeminal nerve, arises. The stimulation of the trigeminal nerve causes a release of chemicals called vaso peptides, substances that bring about vasodilation—a stretching of the arteries. Dilation subsequently leads to inflammation and pain that characterize the migraine headache (Peebles & McAuley, 2000). The vascular theories generated by Guyton, DiPiro et al., and Peebles and McAuley are most widely accepted to explain the symptoms of migraines. Most pharmacologic treatment and prophylaxis is based on the preceding theories (Diamond & Wenzel, 2002; Wilkinson et al., 1995).

However, other theories point to evidence that stimulation of the trigeminal nerve plays a role in the development of the migraine headache. Current findings by researchers such as Nardone and Tezzon (2004) indicate that stimulation of the trigeminal nerve contributes to the pathogenesis of migraine. The researchers in this study measured responses in the sternocleidomastoid muscles after stimulation of the trigeminal nerve. Nardone and Tezzon's work (2004) proposes a bilateral location of the trigeminal system suggestive of a centrally located dysfunction in the brain stem. This study shows that a component of the central nervous system contributes to the pathogenesis of migraine, not simply a vascular disorder.

While the vast majority of research in the field of migraine studies fall into the arena of biology, there still seems to be little consensus on the physiological facts of the event. Some researchers take it up as a vascular event while others look to the central

nervous system to explain the occurrence of migraine. Further, the conclusions that do exist from the physiological studies are faulty because the methods of the biological research are faulty. For example, studies such as those done by Guyton and DePiro et al. rely heavily on symptom checklists for the results on the progression of a migraine headache. The use of the checklists can result in misleading conclusions, however. The lists can be limiting since the categories are predetermined. If one were to ask subjects about their experiences with migraines, their symptoms may not fall neatly into the categories of symptoms that the researchers had defined ahead of time. A checklist does not arrive at the meaning of the experience of the migraine as a life event.

Studies that do not rely on symptom checklists, but instead study subjects in laboratory conditions are even more reductionistic. For example, Nardone and Tezzon studied subjects' sternocleidomastoid muscles in order to arrive at their results. Without a life context and an exploration of the migraineur's world, however, the conclusions of the study are meaningless. It seems unlikely that a migraineur was experiencing changes in her sternocleidomastoid muscle during a migraine, but was instead living her body differently. It is the living of her body that interested me for the current study. I wondered how the participants would experience themselves as they lived through the symptoms of the migraine. How might they live their bodies when confronted with extreme head pain or nausea, for example? Would they live their bodies as a burden when living through these symptoms? Perhaps it would be a different experience for them to live their bodies on an explicit level at all. None of these questions can be addressed by reducing a life experience to a symptoms checklist or the stimulation of a muscle.

While there are gaps in the physiological studies, I still found some value in this research. Migraineurs do not experience cellular or vascular changes, but they do experience severe head pain, nausea or sensitivity to light. Therefore, I was most interested in the biological studies when the researchers ventured into the arena of experience by using symptom checklists. While providing me with some information about migraines, I found the lists to be oversimplified. The researchers utilizing these lists assume that the symptoms, which they define ahead of the time of the study, remain static during the course of one migraine or from a single participant's experiences with various migraines. There is no room in this research for the possibility that a participant could experience a different group of symptoms from one migraine to the next. The researchers also assume that when the migraine ends, the symptoms cease as well. What about the possibility that participants may continue to live those symptoms once the migraine has ended in the form of anticipation of the next headache event? Even though research utilizing symptom checklists yields incomplete results, a working knowledge of those symptoms assisted me in creating potential questions for the participants.

In order to formulate questions about any life event, one must have an initial sense of that topic. Biological research informed me about the basic elements of a migraine headache. Knowledge of the general course of a migraine, including duration and severity of symptoms, was necessary so that I could ask the participants questions about their experiences. Once learning about the participants' symptoms, I could then probe them about the meaning of those experiences. Since I was interested in how the migraine impacted the participants' lives, I was not looking for a mere listing of symptoms. However, knowing some basic facts about the process of a migraine from a

physiological perspective was necessary for me to speak to the participants about their experiences. The physiological studies dealing with symptoms of migraine gave me that initial sense by providing me with possibilities in terms of symptoms that participants could experience. In this way, these studies were worthwhile and informative of the current study even though the studies are lacking.

In addition to identifying physiological processes that occur during the migraine, another goal of biological researchers is to find ways to ameliorate the symptoms. Researchers have also learned about the pathophysiology of migraines by studying the medicinal chemistry of the pharmacological migraine therapies. However, even this method has failed to bring about significant understanding of the biological dimensions of migraine headaches. The field of pharmacology most commonly deals with migraine cures and relief.

Three categories of pharmacological intervention for migraine headaches exist: prophylactic, abortive, and symptom relief. Prophylactic treatment consists of the migraine sufferer taking a maintenance dose of medication every day to prevent a migraine from occurring. The classes of drugs used in prophylaxis vary from medications that affect blood vessels to mood stabilizers and tricyclic antidepressants. The mechanisms of action for the various drug classes are poorly understood; however, migraine sufferers have experienced success in controlling migraine headaches with each of the drug classes (Gallagher, Mueller & Freitag, 2002; Zizelman, et al., 1992). Moreover, abortive treatment employs a relatively newer class of medications called triptans. From a pharmacologic perspective, the advent of triptans has revolutionized migraine treatment by providing migraineurs the opportunity to abort an attack before it

progresses into a full migraine (Lipton, Bigal & Goadsby, 2004; Pascual, 2003). Finally, to relieve symptoms, migraineurs can take medications such as analgesics and anti-nausea agents once a migraine has begun. Migraine sufferers will often take a complex regimen of medications from each of the three different categories named to control the severity and frequency of the headaches.

All of the studies cited above utilized headache journals and patient reports to measure the efficacy of various medications. These reports, however, consist of rating frequency and severity of migraine symptoms on a numbered scale. Thus, the studies yield incomplete results since the full meaning of changes in headache severity or frequency is not explored. My interest in these studies was in those patient reports, while incomplete, and not on the specific mechanisms of action of the drugs. I wondered how the availability of medication to ameliorate symptoms changed the experience of living through the migraine? Would the different classes of drugs hold different meanings for participants? For example, would participants take up maintenance medication to prevent attacks from happening differently than medication that was to be taken once a migraine was underway? Would there be a sense of urgency to taking medications once experience an episode? Further, I wondered about the meaning of medications if they were ineffective or if a medication had lost effectiveness. None of these questions can be answered using a rating scale as those employed by biological researchers.

I further wondered about the meaning of an entirely new drug class revolutionizing the treatment of migraine headaches to the headache sufferers themselves. To those who suffered from the headaches, what was the meaning of the introduction of a new class of drugs? As new drugs were introduced, how might the

meaning of medications they had been taking change? Experientially, what occurred when a person transitions from experiencing severe migraine symptoms to symptom relief? A simple rating scale or series of yes/no questions can not capture the meaning of the headache as a life event. However, I did not see the studies on pharmacological treatment as insignificant since they have led to the development of medications that have revolutionized treatment of migraineurs. I also found value in these studies personally since my study was conducted in a pharmacy with participants who all took medications to treat migraine headaches. I wanted to be well versed in the various medications that could be used, their side effect profile and the length of availability in the marketplace so that I could ask the participants informed questions.

To summarize, the goal of biological research is not to understand the human being as a whole or to examine the structure of the migraine headache experience, but to discover the biological mechanisms that contribute to the existence, intensity, and frequency of the headaches. For example, researchers, such as Waeber and Moskowitz (2003), studying the genetic component of migraine hope to determine the cause of every patient's condition based on the patient's genes and therefore be able to prescribe appropriate prophylactic medication (Waeber & Moskowitz, 2003). Once researchers uncover the etiology of the migraines, they can make recommendations based on what they define as causes of the headaches and help relieve the symptoms. The potential relief of migraines is by no means unimportant.

Great strides have been made in the pharmacologic treatment of migraine headaches in the last two decades and, although based on the assumption of the body as an object, these findings cannot be dismissed as insignificant. The migraine headache, as

a physical phenomenon, requires an essential understanding of the physical symptoms and their impact upon the individual. Furthermore, the meaning of effective pharmacologic treatment can not be discounted, as effective medication can have a significant place in a migraineur's life world, freeing him or her from the symptoms and grip the migraine has on the individual's life.

Yet, researchers have not demonstrated the ability to adequately explain the phenomenon of migraine headache utilizing only the language of biology. Even the more widely accepted hypothesis connecting migraines to vascular disorder have not proved to fully explain migraine headaches (Lemmroth et al., 1996; Parsons & Strijbos, 2003; Dahlof & Hargreaves, 1998). Even when taking these studies on their terms, it seems that a migraine headache can not be distilled to a single physiological factor or cause. The migraine is a more complex human event.

Existential phenomenologists view the body as unaffected by external stimuli in a separate physical world but as revelatory of meaningful experience. As such, studying only physical causes in a laboratory setting removed from any meaning for the migraine sufferer is reductionistic. By attempting to study one cause or one physiological process, biological researchers may overlook the complexity of the phenomenon and, therefore, become unable to adequately address the question of why finding a solitary reason migraine headaches occur holds importance. Although findings from biology reveal aspects of the phenomenon—the physical symptoms—biology provides an incomplete understanding of the headaches.

Conclusions – Biological Perspective

The biological model is the most common way migraines are understood; therefore the vast majority of research falls into this category. Because research and treatment of migraine is primarily rooted in the biological model, participants understood their migraines in these terms. Therefore, I needed to be able to enter a discussion with the participants equipped with the language of biology. Having learned about the physiological process, I did not expect participants to report experiences of changes on the trigeminal nerve; however I did expect them to experience symptoms. My interest was in the lived experience, however to get to that experience, I needed to understand the biological model.

Health Psychology Perspective

In addition to the biological perspective, migraines have also been studied by researchers in the field of health psychology. The category of health psychology defines a broad field involving cognitive, behavioral, and stress theories. According to the journal Health Psychology, researchers in this field hold an interest in understanding the scientific relationships between behavioral principles, and physical health and illness. The American Psychology Association Division of Health Psychology defines the discipline as follows:

Health psychology is the aggregate of specific educational, scientific, and professional contributions of the discipline of psychology to the promotion and maintenance of health, the prevention and treatment of illness, and the identification of etiologic and diagnostic correlates of health, illness and

related dysfunction, and to the analysis and improvement of the health care system and health policy formation. (www.apa.org)

Using behaviorism and cognitive theory, researchers in health psychology bring together assumptions from empiricism (biology) and idealism. Idealism designates knowledge and reality in terms of thought or consciousness in a disembodied mind separate in some ways from the physical body. In this view, perception—an interpretive rather than passive (empiricist) process—provides knowledge of the world. Perception and, thus, knowledge require judgment on the part of the active subject. While perception does not bombard the subject, as in empiricism, idealism reveals itself as similarly inadequate in its address of the meaning-infused relationship between the person and his or her world. In using findings from behaviorism and cognitive theory, health psychology combines empiricism and idealism.

Based upon assumptions from empiricism, the behavioral theory component of health psychology defines behavior in terms of action elicited by external stimuli. The subject learns through a conditioned stimulus response action wherein the external world impinges upon him or her. This causal paradigm assumes the subject does not actively participate in the world, but that the world provides stimuli to which the individual necessarily responds. The assumptions used by cognitive psychologists differ from those of empiricism but, like empiricism, lead to an inadequate view of the human being. Behaviorism suspends the individual from judging and interpreting before acting; the individual in the behaviorist paradigm simply responds without complex cognitive processes.

Health psychology recognizes the limitations of strictly adhering to the assumptions of behaviorism and thus combines it with cognitive psychology. Cognitive psychologists study cognitive structures and focus on the way individuals think about problems or experiences. Psychologists that hold to this view believe that changing the way an individual thinks about a particular situation shifts the locus of control to an internal, yet disembodied, space. In shifting the locus of control from an external base, in which the individual possesses no control over how life unfolds, to an internal base, the individual can change his or her interpretation of problems or experiences. Internal locus of control emphasizes choice; the individual gathers information about situations in an attempt to cope with and control outcomes. However, individuals possessing an external locus of control place power with the world, not within themselves; the world is something that “happens” to them, rather than something they can cognitively mediate. However, neither the external perspective of behaviorism nor the internal view presented in cognitive theory, center on the meaning a subject gives to her world; rather, these views see the subject as somehow separate or distinct from the world. While both behaviorism and cognitive theory employ problematic assumptions, each works for further analysis of migraine headaches. Migraine sufferers have found relief by learning new behaviors (conditioning) and learning new ways of thinking about their headaches (cognitive therapy).

Taken alone, health psychology does not account for the meaning of the migraine experience, as its central focus falls on behaviors and cognitive strategies to deal with the headache. However, existential psychologists can learn even more about the complex phenomenon by reviewing the information gleaned from other perspectives such as the

various fields of thought covered in health psychology and biology. For example, stress presents a large component of the experience of migraine for many sufferers. Health psychologists have worked with migraineurs to teach them new behaviors and cognitive strategies to manage the stress with which they regularly contend. Migraine sufferers greatly value these techniques and, as such, an existential phenomenological approach, such as that heralded in this study, should not dismiss them simply because of their anchoring in the assumptions of empiricism and idealism. In a way, the use of behaviorism and cognitive theory reveals the overall experience of the migraine as a physiological process as well as a process that is entwined with the experience of stress. The way the migraineur takes up the migraine headache and behaves during the headache reveals yet another important aspect of the phenomenon.

Behavioral Approaches

Some studies within the field of health psychology focus on equipping migraine sufferers with appropriate behavioral tools to use in migraines and have led to various behavioral interventions that migraine headache sufferers can learn to ease the pain and incidence of migraine headache (Astin, 2004). Relaxation techniques, including hypnosis and progressive muscle relaxation, affect bodily systems and migraine sufferers can easily learn these methods (Blanchard et al., 1990; King & Arena, 1984). Martin (1993) found that with various types of relaxation training, symptoms of migraine decreased. Treatments, including biofeedback and relaxation training, have led to a decrease in frequency and severity of both tension and migraine headaches (McGrady et al., 1999; Andrasik, 2003; Penzein, Rains & Andrasik, 2002). Use of these behavioral methods

also reduces medication consumption and feelings of depression and anxiety. Headache sufferers experience increased feelings of efficacy in dealing with the headaches found to continue for as long as six years (McGrady et al., 1999; Andrasik, 2003; Penzein, Rains & Andrasik, 2002). In addition, Sorbi, Tellegen, and DuLong (1989) conducted a study utilizing various behavioral techniques. The researchers examined the long-term effects of relaxation training and stress coping techniques for migraine sufferers. The authors hypothesized that the participants who learned relaxation techniques would experience improvement in their migraines; evidence in this study of long-term maintenance pointed to positive effects induced by the relaxation techniques. The participants in Sorbi, Tellegen, and DuLong's study equipped migraineurs with tools to help them reduce headache pain, leading them to become more proactive regarding their own health.

Another behavioral intervention that has proved useful in treating migraine is biofeedback. This method entails an educational process that attempts to produce within the individual the ability to control certain normally involuntary physiological processes. Therapists use biofeedback to treat attention deficit disorder, depression, epilepsy, sleep disorders, and panic attacks in addition to migraine headaches. Several studies, including one by Kropp et al. (1997), examine the efficacy of biofeedback in migraineurs. Kropp et al. (1997) studied a group of 38 migraine sufferers. The researchers divided the participants into two groups; one group received biofeedback training and, subsequently, psychotherapy and the other received the same treatments in reverse. The group who received biofeedback training first showed superior results. The researchers thus concluded that biofeedback provides people with the ability to understand the influence

of their thoughts on physiological processes, preparing them for successful psychotherapy (Kropp et al., 1997).

Using behavioral theory, psychologists have developed several effective methods to teach migraineurs behaviors that can help decrease migraine activity. Researchers from the health psychology perspective utilize cognitive theory in conjunction with behavioral therapies and show that cognitive theory's emphasis on people's ability to actively participate in mental processes combined with behaviorism's emphasis on the effects of external stimuli produce viable therapies for migraine sufferers, leading them to think differently about their circumstances and ways to adapt to their surroundings.

While the methods and assumptions of the behavioral approach are reductionistic, this research informed me for my current study. As with many of the studies from the biological perspective, methods in this area involved the use of symptom checklists or observation in a laboratory setting. While these researchers do not take into account the entire context of the life of a migraine sufferer, these studies moved to a more psychological level than the biological researchers. The researchers in biology analyzed the migraine as a physiological occurrence, whereas the behavioral researchers take into account that an individual is experiencing the migraine. These studies dealt with how people acted once they learned behavioral methods to address the migraine headaches. As a phenomenological researcher, I was interested in this added level of discourse, which helped me formulate questions about my own participants. These questions primarily focused on the idea of how taking some sort of action that proved to be helpful might inform how the participants took up the experience of the migraine headache. I was not sure if I would encounter a participant who learned biofeedback, for example;

however I did wonder how learning any way to deal with the migraines might change the meaning of that experience.

Cognitive Approaches

Cognitive theory underlies a wide range of therapeutic techniques used to treat migraines. Martin (1993) suggests offering a number of cognitive strategies to headache patients to try, as no single method has proved superior to others. Overall, however, any treatment brings about positive outcomes when compared with a lack of treatment. The techniques surveyed in the following review center on the assumption that changing the thought process makes it possible to change reactions under particular circumstances. Such methods teach headache sufferers to think differently about their headache pain and, thus, alleviate the symptoms.

Cognitive therapists use a range of therapeutic methods to treat migraines; this review covers a sampling of these methods. One of the most widely used therapies is that of mental imagery, comprised of two categories—incompatible and transformative (Fernandez, 1986). Incompatible emotive imagery consists of utilizing inhibitory emotions, such as pride, humor, or self-assertion; whereas, incompatible sensory imagery employs visual or auditory images incompatible with pain, such as a blue sky or grassy meadow. The use of incompatible emotive imagery assumes that if one is experiencing an emotion that is incompatible with pain, that the presence of the emotion will inhibit the pain response. For example, it is more difficult to experience pain when one is laughing than not. Transformative imagery alters specific aspects of the headache. For example, if the patient experiences the pain as a tight band, the individual can visualize

the band loosening. Martin (1993) found these imagery techniques successful in reducing frequency and severity of headaches and recommended that therapists teach headache sufferers to use imagery.

A third cognitive technique is thermal feedback. In thermal feedback, migraineurs learn to conceptualize the migraine pain as heat and to “move” the heat to different parts of the body. For this method, the migraineurs can think of such images as warm hands and cool head, decreasing the migraine pain as they imagine their heads becoming cool and their hands gaining warmth (Martin, 1993). Sargent, Green, and Walters (1972) observed significant temperature changes from the head to the right index finger when migraine sufferers utilized this technique; this shift in temperature coincided with decreased headache severity. Other studies have reversed this technique, moving the “heat” to the head; the reverse method also demonstrated success in decreasing headaches (Gauthier et al., 1981). Martin (1993) offers a number of possible interpretations for the seemingly contradictory results. First, he speculates that a placebo effect might factor into the findings. Second, possibly any stabilization in the vasculature could reduce headache activity. Finally, a cool head might help at some points in the migraine cycle, while a warm head might ease the pain at another point. Overall, thermal feedback, in addition to cognitive methods like imagery, has demonstrated a successful method of pain relief for migraine sufferers.

Moreover, as migraines influence all aspects of a person’s life including work, family, and social life, studies by researchers such Dahlof and Solomon (1998) find that the profound changes in a person’s life caused by migraines result in ineffective coping strategies. Dahlof and Solomon (1998) believe that migraineurs need to learn new ways

of thinking about themselves and their headaches that make them feel less incapacitated. For example, instead of migraine sufferers living in fear of migraines, expecting ruinous results in life projects because of the attacks, they can begin to think of themselves as able to handle life situations should a migraine occur; the migraineur hence gains an internal locus of control. A migraineur can thus go to a social function and experience a feeling of confidence in the ability to use therapeutic techniques, if necessary, to minimize migraine symptoms.

According to researchers in the field of health psychology, not only do people inherently possess the ability to deal with the stress of the potential migraine, but they can also deal more effectively with a migraine once it occurs. Martin's (1993) finding that most of these cognitive and behavioral techniques hold equal efficacy in reducing headache activity and medicine consumption, decreasing verbal and nonverbal complaints, and engaging in avoidant behavior, illustrates the potential within health psychology to provide effective solutions to control migraines. Through changing behavior and thought patterns at the onset of a migraine, health psychology researchers believe sufferers can experience beneficial results.

The health psychology research examining cognitive techniques, while useful for the current study, is limited. In the same way the researchers from the biological perspective investigate only one slice of the migraine experience, so too do the researchers in health psychology. In biology, the researchers study the physiology of the headache, while cognitive psychologists focus on the thoughts of the migraineur. The cognitive psychologists do not adequately address issues beyond cognitions and therefore omit aspects of the experience including the complexities of emotion, relationships with

others and the meaning of the migraine to the individual. Despite its limitations, however, the research did lead me to reflect upon the relevance of migraineurs' thoughts about the experience. I wished to explore how the participants thought about themselves as well as how other dimensions of the experience contextualized the thoughts. For instance, I imagined suffering through a migraine would be an emotionally charged experience; that participants would not think about headaches in a detached way, but that the participants would experience emotions about the experience intertwined with thoughts. It seemed to me addressing emotions such as fear, anger, frustration or even relief would be essential to understanding the overall phenomenon.

In addition to exploring the emotions associated with migraines, I also wanted to examine migraineurs' understandings of themselves. Upon reviewing the research on migraines, I began to reflect more about the term "migraine sufferer" as the cognitive psychologists use it.

I wondered how being identified as a migraine sufferer might alter dimensions of participants' experiences. I imagined that being given this label or diagnosis might have an impact upon how they would themselves up as well as how they would take up their headaches. For example, once given the label "migraine sufferer," participants might think about themselves as having a disability or be confused by what having the diagnosis will mean. Being given the label could alter participant's relationships with others since they might think of themselves as needing care. Further, the meaning of the headache itself might change once being given the label. Perhaps the participants would feel more of a sense of control once they understand they are suffering from migraine headaches. There could even be a sense of relief that the experience is migraine and not something

else such as a brain tumor, for example. Cognitive psychologists define migraine sufferer in quantitative terms, however I was interested in understanding the impact of being given that label on my participants.

Once reviewing the cognitive psychology literature, I not only reflected in general terms about how the participants took themselves up as migraine sufferers, but I also began thinking more specifically about aspects of the migraine experience. It became clear to me that there was a link between migraines and having a sense of control. I wondered how my participants might take up the issue of control and how issues of control might influence the experience of the phenomenon. Researchers in health psychology define control as something quantifiable, i.e. if the migraineur has “more” control over the migraine, the headache has “less” control over the individual. The issue of control seemed to be more complex, however, than the cognitive psychologists suggest. I began with a basic question: what would “control” mean to each of the participants? I wondered if control would be an issue primarily related to the migraine headaches or if it would be an overall theme in the participants’ lives. I further wondered what it might be like for each person who experienced control in various aspects of her life to be suddenly overtaken by the pains of the migraines. Would it be a traumatic event to lose a sense of control or might it even be a relief to not have to be in control while experiencing the migraine? From the health psychology research, there appears to be a relationship between migraine and control; I wanted to study that relationship as it would be experienced by my participants.

All of these issues, the experience of emotions related to migraines, the impact of being labeled a migraine sufferer as well as issues related to control were of interest to

me as I entered data collection. Reviewing the literature from the cognitive health psychologists assisted me in clarifying my questions about these issues.

Stress

The relationship of stress to physical illnesses, including migraine headaches, has undergone a wide range of investigation in health psychology circles. The traditional literature covered in this review understands stress as one cause of migraine headaches; therefore, the research holds the assumption that, if the individual manages stress properly, headache severity and frequency will decrease. The physiological perspective of stress defines it in terms of physical changes, including increased heart rate, respiratory rate, and galvanic skin response (Feuerstin, Bush & Corbisiero, 1982; Kandure-Grzybowska et al., 2003). Health psychology researchers focus not only on the body's reaction to external stimulus, but to cognitive structures that work to manage stress as well. A goal of the research, then, is to discover triggers for migraines so that health psychologists can formulate strategies to better deal with these triggers.

A review of the traditional research on migraine headaches reveals a large number of studies dealing with precipitating factors of the headaches. Among factors such as weather changes, dietary intake and amount of sleep, participants often report mental stress as a common cause of migraine headaches. Chabriat, Danshot, Michel, Joire and Henry conducted a study comparing migraineurs to nonmigraineurs in an effort to screen for precipitating factors of headache in both groups. Each group kept a diary for three months detailing perceived triggers of headaches as well as the frequency and duration of them. While the headache parameters were greater in the migrainuer group, the

researchers found that stress was a common precipitating factor to both groups. The researchers concluded that “endogenous factors” such as stress can precipitate headache in both migraineurs as well as nonmigraineurs (Chabriat, Danchot, Michel, Joire, Henry, 1999). In a study by Fernandez and Sheffield, researchers found stress to be not only one cause among many, but the single most common cause of migraine headaches in a sample of 261 participants. The participants completed a survey that assessed demographics, headache parameters, headache medication use as well as perceived causes of headaches. Mental stress was the most prevalent perceived cause of all of the headaches, both migraine and tension type (Fernandez and Sheffield, 1996). Another study conducted by Turner, Molgaard, Gardner, Rothrock and Stang found that not only mental stress to be a commonly reported cause of migraine headaches, but “post crisis letdown” was considered a cause as well. Researchers asked participants in this study to report specific trigger factors as well as presence of other medical conditions. This study reports that not only can stress itself be considered a trigger for migraines, but the period after the stress has ended can be a precipitating factor as well (Turner, Molgaard, Gardner, Rothrock, Stang, 1995). Finally, Stout examined participants in an effort to study not only triggering factors, but how the participants viewed themselves. Participants responded to the Rathus Assertiveness Schedule as well as the Fear Survey Schedule. Further, Stout formulated his own questions regarding participants’ attitudes toward stress. The self reports revealed that the migraineurs did not consider themselves overly reactive to uncertainty or major life changes; however they did experience mental stress over evaluation and small life changes and had a concern with perfectionism (Stout, 1984). While the study only included eighteen participants, the results gave a

more detailed description of how the participants viewed themselves and did not simply report how many participants considered each of a number of factors to be causes of migraine headaches. This study comes closer to a goal of the current study, which is to understand how the participants would view themselves as well as to learn about the context out of which migraines might arise.

Stress is one context out of which a migraine can arise and I believed it was worthy of exploration with my participants. There is a large body of traditional literature positing that stress causes migraines. My goal was not to assign causal factors to participants' experiences of migraines, but instead to understand the participants' experiences of stress as related to migraine experiences. I wondered what each of the participants would mean by "stress." The term is used widely in research on migraines; however, I wanted to learn from my participants what stress would be for them. Once understanding the meaning of stress for the participants, I wished to explore the connection, if there was one, between stress and their experiences of migraine headaches. How might stress inform the meaning of a migraine headache? I wondered if the participants would experience a connection between the two and if there would be a connection, I wanted to explore the meaning of it.

Not only is stress a context for migraines, migraines can also be a context for stress. In cognitive psychology, researchers examine how the existence of migraines can create stress. After beginning to suffer from migraine headaches, a vicious cycle of stress and negative emotions—including depression and anxiety related to headaches—can result. Stress may or may not precede the headaches, but the existence of the headaches creates a stressful situation on its own. Researchers have found that migraine sufferers

manage stress differently than non-sufferers. For example, a study undertaken by Donias, Peiglou-Harmoussi, Georgiadis, and Manos (1991) examined the cognitive screening process of migraineurs. The research team found that the group who suffered from migraines reacted more easily to stress than the non-suffering control group. Additionally, in a laboratory setting, Hassinger (1999) studied migraineurs' patterns of dealing with stress. Hassinger exposed participants to various conditions defined by the researchers as stressful. Migraineurs ranked these situations as more stressful than non-migraineurs. From this study, Hassinger concluded that people who suffer from migraines do not demonstrate the same capability to handle stressful situations as non-sufferers. Using the data from Hassinger's observations, cognitive psychologists can assist migraineurs in thinking differently about the migraines and the associated stress.

However, Martin (1993) uses the transactional model of stress to assist patients encountering the cycle of stress, negative emotions, and headaches. In the transactional model, the person feels overwhelmed when experiencing an imbalance of demands and resources available to cope with the demands. The cognitive therapist assists patients in interpreting the stressful event and the extent to which they perceive their internal resources as sufficient to deal with the stressful situation. Martin's study thus suggests that stress results when a person experiences the demands put upon them as exceeding the resources they have available. From these findings, one might extrapolate that cognitive therapy's goal not only hinges upon helping individuals to think differently about the stressful event and, as such, make it less demanding, but also centers on increasing the resources available to individuals encountering stress.

A further study by Martin (1993) showed it helpful for migraine sufferers to undergo a shift toward an internal locus of control to increase resources available for coping with the stress of migraine. Increased self-efficacy in dealing with headaches moves away from migraineurs thinking of themselves as victims of a physiological attack. Martin examined migraineurs' thoughts and beliefs, targeting maladaptive thought patterns and underlying beliefs. He uncovered the migraineurs' beliefs about themselves and their headaches, as well as conceptualizations of stress that, in some patients, seemed to cause the migraines. He questioned what the participants perceived as stress and pointed out various logical errors in their thought processes. For example, in questioning people who tended to view stress in terms of catastrophe—or people believing themselves to be in great danger, but in reality are not—he found that this group experienced greater levels of anxiety and, hence, higher incidence of avoiding the anxiety-provoking situation. In his examination of the “catastrophizing” behavior of his patients, Martin believed the subjects would gain insight into their illogical thinking about the headaches. Cognitive therapies aid in identifying and challenging maladaptive thought patterns, helping people to understand their conditions. Through altering their cognitive reactions, the migraine sufferers thought about the headaches differently (Martin, 1993). A decrease in catastrophizing appeared to occur, as well as an increase in efficacy and control. Changing thought patterns regarding the headaches and themselves helped eliminate the cognitive distortions.

The study of stress figures prominently in the field of health psychology. After reviewing the studies I was still left with two basic questions: what do the researchers specifically mean by stress and how are researchers' definitions relevant to how they

understand the migraine? Because I still had these questions, it seemed to me that this literature was inadequate in addressing the relationship of stress and migraine. For my study, I wanted to examine what stress specifically meant for the participants.

Researchers use the term stress to mean a variety of things from a physiological reaction to a sense of feeling out of control. I wanted to examine the meaning of stress as experienced by the participants in my study, not only to accept “stress” as a concept that exists as an objective fact. The research on stress helped me to clarify that one of my goals should be to closely understand what each of the participants meant by “stress” and to be aware of my own preconceived notions of stress.

I further wondered about the way the relationships between stress and migraine might change over time for the participants. For example, they might move from a perceived higher stress level to a lower one with a change in a life circumstance. Might a change in stress level influence the meaning of the migraine for the participants? I assumed that the more stress a participant experienced, the more problematic the migraines would be for them; however I wanted to examine the participants’ experiences without assuming such a relationship existed.

Stress and migraines are in relationship. For this study, I wanted to learn about the specific way stress and migraines were related for my participants. Once reviewing the literature in health psychology, I felt compelled to ask the participants in my study the most basic questions: what is stress for you and what role if any does stress have in your experience of migraine headaches?

Conclusions – Health Psychology

Health psychology, a broad area that includes various disciplines, primarily focuses on behavioral and cognitive theories. Researchers from this perspective move closer to a more complete understanding of the experience of the migraineur than researchers from the biological perspective, whose primary concern centers on physiological processes. However, the views advanced by health psychology do not fully address issues related to meaning and the nature of the relationship a person has with the world.

Existential phenomenology provides a more complete understanding of the human being than either behaviorism or cognitive theory. Criticisms of behavioral theory show strong similarities to those of the biological perspective, as both theories ground themselves on the assumptions of empiricism. Like biologists, behaviorists take the body up as separate from an external physical world and propose no meaningful relationship between the subject and the world. Whereas, cognitive theory, based upon the assumptions of idealism, centers on the disembodied mind as the focus of study. These perspectives fail to address the idea that migraine headaches—and all human experiences—are fundamentally embodied phenomena. Therefore, a focus only on the mind or the body presents an insufficient explanation of experience.

In studies where the researchers attempt to isolate a single cause in a laboratory setting, problems arise similar to those encountered by supporters of the biological perspective. The nature of the migraine headache appears complex; thus, in attempting to isolate one causal factor in a laboratory or sterile environment, the phenomenon loses its meaning. The position in this study is not meant to discredit the findings from cognitive

or behavioral studies, as the results from these studies are useful for alleviating symptoms for the migraineur. However, cognitive and behavioral views remain inadequate when addressing the fundamental question of what it means to live through a migraine headache.

Findings gained through the application of cognitive and behavioral theories help in ameliorating migraine headaches and, therefore, resist dismissal. As with the biological perspective, the health psychology perspective reveals more characteristics of the migraine headache phenomenon. From a pragmatic standpoint, effective treatment utilizing behavioral and cognitive approaches holds a great deal of meaning to a migraineur by reducing or eliminating symptoms. The ways in which a person views the self and takes up his or her ability to manage the migraine surfaces is essential to understanding the overall phenomenon. While moving to a more experiential level, health psychologists do address issues, such as stress, that possess significant meaning for migraine patients. Health psychology addresses issues of the life world, unlike the primarily physiological focus of the biological perspective that deals with malfunctioning mechanisms in the body. Health psychology values relationships with others and how the migraineur experiences the world and his or her own ability to contend with stress that arises in the world surrounding the sufferer.

The findings of health psychology impacted my data collection by helping me gain an even further understanding of the experience. Before entering data collection, I had the perspective of health psychology as part of my understanding of the migraine headache. Even though the language of health psychology tends to objectify the human being, I did not want to dismiss the way potential participants thought about the

headaches or behaved differently in light of their existence in the participants' lives. In addition to understanding behavior and thought, stress seemed to be a crucial element to understanding the migraine headache. Therefore, I was aware that I wanted to learn from the participants how stress was involved in the experience of the migraine.

As far as the behavioral aspect of the migraine headache experience, I wanted to learn from the participants if their behavior was in fact impacted and if so, how. For example, I wanted to discover if the participants learned new behaviors or changed behaviors due to the existence of migraine headaches in their lives. Further, I wondered if they would have different behaviors overall in their lives (i.e. in both headache and non-headache states) or if they only changed behaviors once the headaches came upon them. If there were changes in behavior I not only wondered what those changes were and how they experienced them, but even more importantly, what those changes meant to each of the participants. I moved into the data looking for feelings about the potential changes in behavior such as relief, for example, or resentment. Would the participants be happy that they had found behavioral changes to be effective in reducing migraine headaches, if they were in fact effective, or would they resent having to stop participating in an activity due to the existence of migraines? If there were changes made in their lives, I also wondered if the changes would be consistent over time or if at some points the participants would make the changes and at other times if they would not. Overall, I was looking for meaning in the potential changes in behaviors the participants made, not just what the behaviors were.

In addition to behaviors, researchers in health psychology study how migraineurs think about the headaches. Because of the findings utilizing cognitive theory, I also

became attuned, in my effort to discover meaning, to how the migraineurs thought about their headaches. During the data collection and analysis, I wondered how the participants thought about themselves and the headaches as they experienced them and after the headache had concluded. I further wondered about the overall life context and the migraine headaches. For example, how did the person think about him or herself before migraines existed in the life world and how is it or is it different now that the person experiences migraines?

The information from the health psychology perspective also gave me a context in terms of how experiencing control can play a role in the experience of the migraine headache. I looked for how the participant's thought processes could impact the sense of control. Further, I examined the impact of the headache on feeling out of control. How did it make the participants feel to be out of control? What did it mean to each of the participants to feel out of control or did they feel out of control at all? I also wondered about how the feeling about control might be related to both behavioral changes as well as experiences of physical symptoms.

The last element of the health psychology perspective that I utilized was the concept of stress and its role in the context of the migraineurs' lives. As seen in the literature review above, there has been a progression in thought on the topic which I found useful in understanding the phenomenon in relation to migraines. While the theories and studies associated with stress still are reductionistic, they can shed light on how a person can experience stress and that stress is important at all to study when looking at a phenomenon such as migraine headache.

In terms of the data collection and analysis, I wondered how the participants themselves defined stress. The concept of stress, like the concept of migraine itself, seems to be unique to each person experiencing it. Therefore, I wanted to ask the participants specifically about stress and if it played a role in the experience of the migraine headache. Stress is not only a physical reaction that can be measured in controlled laboratory settings as many of the studies on stress suggest, but is instead an experience filled with meaning and having a context out of which it arises.

While none of the participants utilized common behavioral or cognitive methods in dealing with migraine headaches, the literature review in this arena gave me an even greater understanding of the potential meanings of the migraine headache. Not only is the migraine in part a physiological process, but it is also in part a phenomenon that includes how a person could potentially behave as well as how a person could think. There is a complex relationship among these elements of the experience of a migraine headache. The existence of the migraine itself can have an effect on how the person lives in terms of behaviors as well as how the person conceptualizes herself and her world. Further, how a person finds herself acting because of or thinking about the migraine can have an impact on the experience of the migraine itself. While not taking up the view that the person is a mere passive recipient of stimuli from a somehow external world, I was able to become attuned during the data collection and analysis of how changes in behaviors, for example, can have an impact on not only how the person views the headache, but how the person views his or her whole life.

Psychoanalytic Perspective

Like cognitive theory, psychoanalysis grounds itself in the assumptions of idealism. The body is still taken up as an object in this perspective, with the ego as the disembodied seat of emotion and experience. However, psychoanalysis moves toward a more psychologically-based, meaningful understanding of experience. When taken in conjunction with the ideas of psychosomatics, psychoanalysis makes an attempt to show how the mind and body are related.

In terms of illness, psychoanalytic thinkers focus on the psyche as it relates to bodily functions. Freud first proposed the concept of conversion hysteria, which emphasized the bodily expression of all psychic tendencies; he believed the conscious ego controls the voluntary muscle innervations, and the individual satisfies emotional needs biologically through such phenomena as blushing or crying. Modern psychoanalytic thinkers call conversion hysteria “conversion disorder,” and speak about a person’s ability to express emotional turmoil by converting it to a bodily symptom. Somatization holds similarities to conversion disorder; however, somatization is not as dramatic and appears involve a physiological process. Unlike conversion disorder, somatization acts as a secondary defense process, a variant of repression (McWilliams, 1994). Thus, according to psychoanalytic thought, somatization, as a defense mechanism, is by definition unconscious.

Furthermore, psychoanalysis conceptualizes physical impairments as related to emotional stress; the patient reverts to a “sick role” in times of stress (McWilliams, 1994, p. 121). These somatic complaints, one of which is a migraine headache, represent ways to deal with mental conflicts (Wolff, 1963). The migraineur uses the migraine to contend

with mental conflicts. Moreover, psychoanalytic thinkers take into account the personalities of those who suffer from migraines and the psychic tensions and unconscious conflicts that lead people to choose migraine as an expression of that tension.

Several psychoanalytic theorists have addressed migraine specifically and hold differing views on the phenomenon. For example, Fromm-Reichman (1937) conceptualized the headaches as expressed hostility against loved ones. According to this theory, people try to keep the hostility repressed, but it manifests itself as a bodily expression through a migraine (Fromm-Reichman, 1937). Migraines are conceptualized as chronic, intense, and vengeful attacks against people toward whom the migraine sufferer possesses strong emotional ties. Migraine allows the patient an opportunity to express negative emotions such as anger, hostility, and impatience. Another perspective, offered by Sperling (1964), understands the migraine as an unconscious killing of a frustrating object. The migraine, according to Sperling, represents a way to deal with destructive impulses or kill the object without guilt. For Sperling, “the onset of migraine in certain types of personalities ... occurs in a situation which provokes intense rage and at the same time does not permit the discharge of the rage in overt behavior” (Sperling, 1964, p. 551). Moreover, Stephen Appel’s (2001) paper on his own migraine headaches conceptualizes them as unconscious psychosomatic reactions to repressed feelings toward others. Thus, he does not limit the migraine to acting as a solution to one specific problem, as the other psychoanalytic thinkers, but views the migraine as potentially occurring in any kind of frustrating intersubjective experience. A slightly different understanding provided by Money-Kyrle (1963) does not focus on the intersubjective

experience, but defines a migraine as a defense against seeing something about oneself. People choose the migraine on an unconscious level as in the previously outlined conceptualizations; however, in Money-Kyrle's view, the migraine acts as a screen to hide something about oneself from oneself.

Generally, these psychoanalytic theorists understand migraine as a solution to an unconscious problem or conflict. The migraine sufferer does not consciously choose the migraine as a solution but, instead, becomes subject to the powers of the unconscious mind. Fromm-Reichmann (1937), Sperling (1964), and Appel (2003) view the migraine as arising out of a frustrating interpersonal situation; although, differing from the others, Appel understood migraine as able to occur in any situation that provokes rage. Fromm-Reichmann (1937) and Sperling (1964) believe the migraines to be a manifestation of unexpressed negative emotions toward other individuals that the sufferer could not directly voice. Money-Kyrle's (1963) perspective removes focus from the interpersonal and places the migraine in a position of a defense against understanding an aspect of the sufferer's self. All of the theorists view migraine as a way to defend against emotions toward others or knowledge about oneself difficult to contend with on a conscious level.

In the psychoanalytic view, the migraine represents a solution to a problem, such as an inability to adequately address interpersonal difficulties or an aspect of one's own shortcomings. The migraine can be viewed as a withdrawal or an attack, depending on the perspective of the researcher. Either way, however, the migraine in the psychoanalytic frame of reference is an unhealthy method of dealing with psychic pain. The isolating nature of the migraine headache prevents the migraineur from addressing the rage or hostility felt toward a loved one. In addition, the all-consuming nature of the

migraine prevents the migraineur from focusing on difficult-to-accept aspects of the self. The migraine represents a complex solution to one of many complex problems, but it allows the migraine sufferer to avoid painful confrontations possibly more painful than the severe symptoms of the migraine.

Upon review of the psychoanalytic literature, I further began to reflect upon the meaning of one's relationship with oneself. Money-Kyrle's position that migraines are a defense against an aspect of oneself was of particular interest to me. The idea of migraine as a way to hide from oneself led me to ask further questions about how the participants might experience themselves. While I do not believe that the migraine is "caused" by an "unconscious" motivation to defend against one's own shortcomings, I was intrigued by the relationship between the migraine and one's relationship with oneself. Money-Kyrle's idea of migraines being used to hide from oneself brought a different level of reflection to the exploration of what it means to be a migraine sufferer. After reviewing the health psychology literature, I began to flesh out the idea of learning about the meaning of identifying oneself as a "migraine sufferer." Money-Kyrle's position helped me to clarify my questions about my participant's experiences of themselves. Would they view themselves as competent individuals, as victims of the migraines or as something else? Further how might the way they took themselves up in general interplay with their identifications as "migraine sufferers?" While I did not believe I would be able to learn if the participants were hiding from themselves in the short time of data collection, I did begin to see the importance of looking at how the participants might take themselves up in a general way and how that might inform the meaning for each of them of being a "migraine sufferer."

In addition to talking about a migraineur's relationship to self, researchers from the psychoanalytic perspective bring into focus interpersonal relationships. The psychoanalytic thinkers move toward a more complete understanding of the migraine experience by examining the migraine sufferer in the context of relationships, unlike the biological and health psychology researchers who studied the individual headache sufferer. Before reviewing the psychoanalytic literature, I had thought of migraine headaches primarily as an experience one lives through alone. However, I realized the importance of bracketing that assumption and talking to the participants about the meaning of their relationships with other people.

The psychoanalytic thinkers, in addition to addressing relationships, also bring into focus the emotional aspect of the migraine experience. These researchers primarily focused on negative emotions such as rage or frustration. I wondered if the participants in my study would experience only these negative emotions with regard to migraines and interpersonal relationships. Could there be other emotions associated with the migraine experience such as a desire to be cared for or an enjoying of the concern given to them by others? It seemed that emotions were an important element of the overall phenomenon, focusing only on the negative emotions was too limiting. I therefore wished to look at all types of emotion the participants might experience.

Moreover, psychoanalytic theorists also take into account aspects of migraineurs' character patterns. Fromm-Reichman (1937), Gothell, and Weber, all discuss migraine sufferers as possessing specific neurotic character patterns that contribute to the occurrence of migraine headaches (Appel, 2003). Overall, the "migraine personality" as conceptualized by psychoanalytic thinkers includes aspects such as rigidity, over-

reactivity, and suppression of resentment (Martin, 1993). A study by Wolff (1963) demonstrated some of these qualities of the migraine personality. The study found that 24 hours before a migraine episode, most people had experienced some hostility or rage that they could not actively express. Wolff held that the migraine was a reaction to a life situation in which people could not effectively deal with anger. A person with neurotic character patterns has, according to psychoanalytic thinkers, an inability to express emotion. This observation matches the concept previously outlined regarding the migraineur's unconscious choice of the migraine over expression of negative emotion.

Additional studies have examined the relationship between personality factors and occurrence of migraine headaches. Objective studies with the Rorschach and Maudsley Personality Inventory (MPI) show neurotic traits among migraine sufferers (Wolff, 1963). These studies show a correlation between more permanent personality characteristics and migraine incidence. Wolff (1963) also found evidence indicating that migraineurs possess an increased likeliness to exhibit unconscious conflicts and ambivalent attitudes toward people in their lives. Wolff's evidence supports the theory that migraines present an effective way for some individuals to deal with their feelings.

However, Blanchard, Andrasik, and Arena (1984) performed an extensive review of psychoanalytic literature pertaining to migraines and found that the data do not support notion of a migraine personality. In this study, the researchers reviewed over 100 studies employing both observational data gathering and standardized psychological tests.

Although Blanchard et al. (1984) stated that headache sufferers are more psychologically distressed than non-sufferers, their study does not show strong support for the concept of a headache personality. Since the time of this study, more research has been conducted

in search of a migraine personality, but these studies have resulted in ambivalent conclusions.

Although some deviant personality characteristics surfaced among headache sufferers, Martin (1993) also questions the relationship between neurotic character patterns and the existence of headaches. Martin theorizes that increased levels of psychological distress result from suffering headache pain, rather than a migraine personality predisposing a person to headaches. Furthermore, chronic headache sufferers are not a homogenous group, pointing to the likelihood that neurotic character patterns represents a predisposing factor for some, but not for all sufferers. In general, the research seems to indicate that a migraineur's character pattern require evaluation in terms of the life world, including relationships with others.

I was interested in how the psychoanalytic thinkers took up the idea of neurotic character patterns in migraine sufferers. After reviewing the research, I was not convinced that a "migraine personality" existed; however it did awaken in me underlying assumptions I had about migraine sufferers. My assumptions centered around the idea of migraine sufferers being highly active, responsible people who experienced high levels of stress as I defined it. While I had not considered a specific migraine personality as studied in some of the psychoanalytic literature, I did have a picture of what I thought a migraine sufferer would be like. This particular area of research helped me explicate my assumptions before I entered data collection.

Conclusions - Psychoanalysis

Psychoanalytic thinkers face a dilemma similar to that of cognitive psychologists. Although each discipline contributes knowledge to the field of migraine study, cognitive and psychoanalytic thinkers confront the problem of trying to explain the impact of a disembodied mind on an embodied subject. Each of these perspectives views the person as a “ghost in the machine” and, therefore, encounters a conceptual hurdle when trying to explain how a disconnected mind and body that can affect one another. If a disembodied mind expresses unconscious emotions, how do these emotions manifest in physiological process such as a migraine headache?

Despite questions and criticisms, psychoanalysis moves toward a more complete understanding of migraine headache by awarding importance to emotions and the individual’s psychological life. Not only does intersubjective stress play a role in the existence of migraine headaches, but one’s personality interacts in the process. However, psychoanalytic studies lack clarity regarding predisposition to migraine headaches versus the existence of migraine headaches as creating the conditions under which one can exhibit deviant personality characteristics. Despite the shortcomings of the psychoanalytic approach, existential psychologists can see from the literature that relationships with others and with oneself hold an intrinsic involvement with migraine headaches.

In terms of the data collection and analysis, understanding the psychoanalytic perspective gave me a framework of understanding the importance of relationships in the phenomenon of migraine headache. The issue of relationships with others and self was emphasized here more than in the previous two perspectives. Health psychology began

to broach the subject of interactions with others in addressing stress as an issue, however did not specifically address how dealing with other people can have an impact on the migraineur. I used the psychoanalytic perspective to wonder about relationships with others and the self specifically with regard to the idea of hostility. I not only examined relationships in terms of how they played a role in the experience and meaning of the migraine headache, but also about the feelings the participants had toward others in their lives. Was there in fact an element of hostility in relationships that played a role in the development of the migraine headache? Further, I examined the relationship one had with oneself in studying the migraine headache. Did the participants, as Appel suggested, utilize the migraine to hide something about themselves? Was the migraine experience, at least in part, an escape from facing something they did not want to face? Was it possible to actually utilize the migraine headache for the purpose of hiding something from oneself?

In addition to studying relationships, researchers using the psychoanalytic perspective took into account personality traits and how personality might play a role in the development of migraine headaches. While the results of the studies on trait theory remain somewhat inconclusive, i.e. that there does not appear to exist a “migraine personality,” I did wonder as I began data collection if I would see some similarities among the participants. Would they possess similar characteristics? Further I was aware of wanting to learn, if possible, how their personalities might have changed with the occurrence of migraine headaches in their lives. For example, were they once outgoing, carefree individuals who then became fearful and reclusive once they began experiencing migraines? It was not my goal to support or refute the claims that psychoanalytic

thinkers have made regarding migraine headaches, however knowledge of trait theory helped to inform my thinking about the study's participants.

Oliver Sacks' Case Studies

A section dealing with Oliver Sacks (1992), a physician who suffered from migraines himself, serves as a bridge from the languages of natural science and psychoanalysis to the existential framework. Sacks was influenced by many of the ideas discussed thus far in the literature review, particularly concepts from psychoanalysis and, as a physician, the biological perspective on migraine headaches. As a natural scientist, Sacks uses clinical data from the over 1,000 of his migraine patients to yield an existential description of the experience. Sacks refers to the migraine as “the most complex of human creations” (Sacks, 1992, p. xxi.) and, as such, holds two primary views about migraines. These views define the migraine as, one, a physical phenomenon existing in the nervous system and, two, a psychological phenomenon used as a strategy to express emotional needs. Sacks believes the two views show a continuity between mind and body. He proposes using various types of discourse to explain the migraine—biology to describe the physiological process, and behavior and psychology to describe the migraine as a reaction to an emotional situation and as an experience in itself. According to Sacks, human beings need to experience illness for brief periods of time, and migraines represent a way to express “both physiological and emotional needs” to achieve a state of homeostasis (1992, p. 7). Sacks's theory creates a cohesive unity by bringing together the various veins of biological and psychological knowledge that, up to this point, have undergone separation by modern researchers in the various disciplines.

To assert the first of his two main theoretical views, Sacks uses the language of biology and addresses migraine as a physical event. In the twentieth century, migraine research focused on the quantitative aspects of the phenomenon. Sacks holds that a general understanding of the migraine phenomenon has been lost due to natural scientists' drive to isolate causes in a laboratory setting. Earlier studies on migraine performed by physicians in the eighteenth and nineteenth centuries more fully described the phenomenon, using clinical data that consisted of patients' perspectives on and descriptions of symptoms, life circumstances out of which the headache arose, and other factors highlighting the lived phenomenon of migraine headache. Sacks's work attempts to recapture the holistic sense present in these earlier accounts of migraine by analyzing the clinical data he gathered from his extensive work with migraine patients. Sacks's interests lie in the patient's point of view; therefore, he uses experiential data that holds value for the patients.

While valuing experiential data, Sacks also reviews the various scientific studies that attempt to isolate physical causes of migraines. Along with his faith in experiential data, Sacks retains his belief that all migraines have a cause, even if the patient does not directly experience this cause. However, since an almost an infinite number of causes seem to exist, Sacks purports that individuals never possess full awareness of all the factors. When outlining the various types of migraine headaches, he attempts to categorize the causes, but this task presents some difficulty, as such a variety of causes exist. At this point in his study, Sacks concludes that the essence of the migraine lies in its diversity; therefore, natural scientific methods employed to discover a single causative factor fall short. Sacks opts to review his clinical data to reach his conclusions, rather

than attempting to achieve laboratory conditions. He attempts to reach a more coherent and complete understanding of the phenomenon than modern studies in physiology have provided.

According to Sacks, individuals need multiple explanations for this complex phenomenon and isolating one or two causes presents an insufficient means to gain understanding. Physiological statements do not show subjects anything about the causes or effects; therefore, such statements do not contribute significantly to the overall understanding of the phenomenon. Due to his belief that migraines are “drenched with emotional significance,” Sacks takes this particular position (1992, p. xvii.).

Sacks takes this opportunity to move into the language of behaviors and psychology, pointing out that migraines indicate a reaction to emotions. The desire to fulfill an emotional need acts as the most powerful cause of migraine; the migraine is used as a tool for fulfillment and the fulfillment is experienced as pain. Moreover, Sacks reviews psychological literature, including Wolff’s (1963) study on migraine personality and psychoanalysis relating to migraines. He cites studies on personality theory as a superficial look at the psychosomatic component of illness. While admitting he is not an analyst, Sacks has the ability to meet with a great number of his migraine patients every other week for several months; thereby, he learns more about the patients than in a typical doctor-patient relationship. In his view, Sacks did not find psychoanalytic or biological conceptualizations manifesting themselves in any general sense. Sacks observed that the patients showed a wide variety of emotional disturbances that resisted categorization. Viewing the migraine as serving a variety of emotional needs, Sacks believes migraines have this purpose for a multiplicity of reasons; therefore, the migraine sufferer can

experience many types of emotional distress. Sacks points out, “As migraines may assume a remarkable diversity of forms, so they may carry as various a load of emotional implications. If they are the commonest of psychosomatic reactions, it is because they are the most versatile” (Sacks, 1992, p. 166). Sacks’ view hinges on the idea that a migraine should not be regarded as a purely physiological or a purely psychological event. He says parceling out the migraine into a list of causes and effects fails to facilitate understanding of the phenomenon—one must look at both. Asking both why the migraine takes the form it does and why it occurs when it does hold importance for Sacks. Ultimately, Sacks questions why human beings use the language of migraines to express emotions and concludes:

“...migraine may be regressive, but it will never be obsolete: in the words of Wittgenstein: ‘what *can* be known *can not* be said’ and ‘ the human body is the best picture of the human soul.’” (Sacks, 1992, p. 226).

Sacks’ work was quite helpful in preparing me for my data collection. His work reminded me that going to the patients themselves for information was how research was conducted in the 18th and 19th centuries. Sacks’ research also valued interrogation of first person experience, which was the focus of my data collection. However, Sacks’ fundamental assumptions are problematic. Despite his valuing of the patients’ experiences, he still looks at the phenomenon of migraine headache as though two separate phenomena exist – one that is physiological and one that is experienced. Sacks values both the physiological and experienced, but for him, they are still separate. I believed that there could be a unified perspective on the migraine headache and that an

examination of first person experience utilizing the framework of existentialism could provide that perspective.

Entering the data collection, I believed the migraine might be viewed and studied as a life experience, not only something that occurs on a physiological level or something that is “caused” by stress or something that is an attack on another person. The migraine is what it is to the individual experiencing it, no more and no less. It is this experience that intrigued me for this study and it is this experience I believe is valuable to consider.

Existential Phenomenological Framework

As Sacks points out, migraine headaches contain numerous complexities that encompass all areas of a person’s life. Using findings of the traditional literature, migraine, when seen as a physiological process, becomes defined by symptoms. Moreover, the types of migraine vary so widely that placing them all in a single category poses serious difficulty. In terms of cognitive and behavioral perspectives, migraines involve a complex psychological process with emotional components ranging from stress to repressed hostility. Other theories, such as the one by Sacks, conceptualize migraines as having both internal and external causes, or no causes at all. Additionally, psychoanalytic theory postulates the existence of migraine personalities and, while there some evidence of some psychic disturbance may exist, conclusions remain muddled in terms of the relationship between the migraine and these psychic disturbances. Each of the limitations presented helps to illustrate that by applying the natural science method to the phenomenon of migraine removes the overall essence or meaning of the experience, an experience that takes a variety of forms and arises from a variety of contexts. Where

other perspectives come up short, existential psychology can work to unify these various theories, as each present one aspect of the life world. By taking up a more inclusive framework of existentialism, a more full understanding of this complex human phenomenon can be reached.

The existentialist phenomenological conceptualization of human beings differs from other perspectives reviewed thus far in a number of ways. Existentialists, such as Maurice Merleau-Ponty and Medard Boss, do not understand human experience in terms of cause and effect, nor do they conceive of human beings as a collection of separate entities such as unconscious and conscious, or mind and body. In the case of a migraine headache, existentialists would understand this phenomenon as human beings suffering through migraines, not a migraine existing separately from people and their experiences. In other words, the concept of the migraine headaches existing would become a myth; the existentialist view instead depicts people experiencing the phenomenon of the headache.

This conceptualization, that a migraine can be understood only by looking at how the human being experiences it, appealed to me as a researcher and was how I viewed the participants when entering data collection. I did not view migraine headaches existing as an objective fact or entity that was somehow separate from the human being experiencing it. My goal in this research was to learn about the meaning of this experience to the human being living it.

Differing yet again from other perspectives reviewed, existentialists do not view human beings as objects among other objects. The individual is existence and, thus, is a fundamental openness to the world. The human being is oriented to the world and experiences it fully (Merleau-Ponty, 1962; Heidegger, 1962). The structure of experience

is not split into a subject (i.e., person) and object (i.e., the world). Instead, an integration of the individual and what the individual experiences occurs; this experience is embodied and part of the whole structure, thus making it necessary to use a phenomenological method to study it (Merleau-Ponty, 1962). The body exists in relation to the world and is intentional, or directed toward an experienced world of other people and things.

Relationships with others and the world hold meaning and are not seen as causal—rather, the body and the world are a unity.

For this study, I wished to use a different language than the traditional researchers do with regard to migraines. The researchers in biology and health psychology speak of “causes” of migraines and view the individual as somehow separate from the migraine phenomenon. I saw a unity between the migraine and the individual and wished to learn about that unity. From this perspective, I did not view stress, for example, as causing a migraine, but instead stress might be one context out of which the migraine could arise.

While Merleau-Ponty (1962) does not specifically address pain, such as a migraine headache, he posits an alternative to natural scientific approaches to gain an understanding of the body and human beings as a subject of study. Through examining physiological aspects of existence, he searched for a means to study human beings specifically. In the end, Merleau-Ponty used phenomenology to arrive at an understanding of the human body, a significant departure from the mechanistic viewpoint of physiology. He regards physiology as an abstraction from the body, as physiology does not reach the experience of a person as a lived body. Merleau-Ponty’s thought does not view the human body as machine-like with separate parts, nor does he believe adequate study of the body comes out of looking at physiological systems separately.

Instead of physiology's reductionism, Merleau-Ponty understands the human body as a "lived body," or "body subject" (Merleau-Ponty, 1962). According to this line of thought, because the individual is a body, he or she experiences the world and all its meaning from an embodied perspective. The body subject in the life world holds agency, purpose, and meaning. Merleau-Ponty gives primacy to the body because of his belief that the body represents more than a collection of cells or blood vessels; rather, the body itself is engagement with the world. The body, pregnant with meaning, presents itself as both subject and object for Merleau-Ponty. Embodiment precedes consciousness and represents the lived comportment of the human being.

Moreover, Merleau-Ponty negatively reviews the standpoints of physiology and behaviorism. Merleau-Ponty critiques the view of the body as an object that endures subjection to cause-effect relationships. Instead, he speaks of a body subject that is always of the world. Thus, no objective body in and of itself exists, but instead the body remains constantly in a situated context. Using Merleau-Ponty's view, the premises of either physiology or health psychology become unacceptable. For, although he acknowledges the objectification of body as one way to view it, at its essence, the body is not an object. The body gives the individual his or her world; therefore, behavior bears study in tandem with the world. The life world centers around the body as the locus of meaning; the body allows the world to come into existence and presents the entry point to the world, comprised of a meaningful weave of meanings and relationships. The body constitutes the life world and possesses relevance and necessity to all aspects of it. The life world focuses on the body as essential to understanding the *mitwelt*, or social world;

the *umwelt*, or natural world; and the *eigenwelt*, or self-world (Husserl, 1970). Without the body, no world exists.

The migraine, as all phenomena, is an embodied experience. For this study, I wished to fully explore migraines in light of Merleau-Ponty's viewpoint that the body is the locus of meaning. I was not interested in physiological facts of the migraine headache; instead, I wanted to learn about the migraine as an embodied experience, which would include the experience of symptoms. I wanted to learn what the symptoms would mean to the participants; I did not view the participants' bodies as objects, but instead as the locus of meaning and the center of the life world. I wanted to learn not only that the person experienced severe head pain, for instance, but what that pain was like, what it meant and how it played out in the context of the other relationships in the participants' lives. I did not view the participants as objective bodies that were malfunctioning, but instead as whole universes of meaning that I wished to explore.

Drawing on Merleau-Ponty's ideas, Drew Leder's 1990 book *The Absent Body* discusses the experience of the body in normal states and disease states. He finds that in disease states, the body becomes more available for phenomenological study or reflection, as under normal conditions, the body essentially remains absent to the individual. People do not notice their own bodies while using them, but when there a dysfunction arises, the being of the body shows through (Leder, 1990). Leder concludes that a study of a disease process or an occurrence of bodily dysfunction sheds light upon the body's mode of being. In *The Absent Body*, he contends that the most beneficial study of the body occurs under a phenomenological investigation instituted when the body undergoes a dysfunctional state (Leder, 1990).

To elucidate his point regarding the body in a state of pain or disease, Leder uses the concept of “dys-appearance.” Leder proposes that only in a dysfunctional mode does the body appear to the individual. While in pain, the body becomes away or apart from the person’s desired state. During a migraine, for example, the person is ripped away from his or her day-to-day existence and, thus, becomes separate from his or her desired state of being. Leder uses the example of a man playing tennis to illustrate the phenomenon of pain. In Leder’s example, a man focuses on playing the game and the various structures of his body sit in the background, while his swing is situated in the foreground. When the man suddenly experiences pain in his chest, his body then becomes the focus of his attention (Leder, 1990, p. 71). Prior to the pain, the body itself remained absent from the foreground, although that the tennis player gains access to his world through the body. Leder goes on to say that the aversive nature of pain “places upon the sufferer . . . an *affective call*” which seizes the person (Leder, 1990, p. 73). Using a phenomenological framework, pain is no longer viewed merely as a neurological process, but instead as “reorganiz[ing] our lived space and time, our relationships with others and with ourselves” (Leder, 1990, p.73). While Leder does not write specifically about migraine headaches, many of his insights about pain aid in examining of the world of the migraineur. During a migraine headache, the focus becomes the pain, interrupting all activity. Through Leder’s lens, the impact of pain on the migraineur becomes more apparent than through examining the phenomenon at a cellular level, which is the goal of physiologists.

Leder’s work was helpful to me in two different yet related respects. First, in general the work helped me reflect upon the method I had chosen for the current study.

Second, Leder's work showed there was a need for studying specific types of pain, such as migraine pain, from the phenomenological perspective. In terms of method, Leder's entire premise in The Absent Body is that to effectively study embodied phenomena, one must study the body as it is lived in a dysfunctional mode. The migraine headache is one dysfunctional mode of living one's body, thus I strongly believed that studying the migraine experience utilizing the phenomenological method would yield interesting and useful results. Therefore, I believed that the method I had chosen was valid for the current study based, in part, on Leder's work. Secondly, Leder's study of pain in general led me to questions regarding specific types of pain. Leder's work shows that pain is not only a neurological process, but instead is an experience that affects all aspects of the individual's life world. Pain closes off possibilities and has a widespread impact on the individual. I wanted to learn from migraineurs what these assertions might mean in terms of their own lived experiences. I wondered what it would be like to live with the severe pain of a migraine and further live with the looming threat of another migraine arising as a potential horizon. I wondered what kinds of possibilities pain would close off for the participants. Pain affects all aspects of the life world; I wondered how this impact would manifest itself across the different aspects of the life world. Because of Leder's work, I believed I could find answers to my questions by utilizing the phenomenological method when studying the migraine experience and I further believed that due to a lack of qualitative analysis on the topic in the literature, this study was a necessary one to undertake in order to elucidate aspects of a migraineur's experience. I believed the topic was available for examination using the method and I believed a study would yield interesting and helpful results.

Physician Medard Boss is another thinker from the existentialist perspective whose work was helpful for the current study. Boss grounds his work in the existential philosophy of Martin Heidegger, who posits that human beings possess an essentially different character than objects in the world. Based on this position, Boss believes natural science insufficient to study human experience, as the nature of human beings differs from the nature of other things in the world. Boss's viewpoint that human existence is primarily defined as *Dasein* (being-there) allows for a new understanding of human beings. Using Heidegger's thought and the concept of *Dasein*, Boss makes his argument against a reductionist perspective in the study of medicine. In Existential Foundations of Medicine and Psychology (1979), Boss specifically addresses pain and refuses to reduce it the assumptions provided by the medical field. He realizes that pain exists as a powerful experience; yet, his patients gave inexact descriptions of pain upon inquiry. However, in his research, Boss approached pain with the understanding that the experience holds significant weight in human existence, and tried to reach a complete conceptualization of his patients' experiences. Boss thus comes to hold that the experience of pain changes the relationship of the person with the world and, in the context of the world the person inhabits, meaning is present in patient's symptoms. Thus, physical pain holds a psychological significance.

Furthermore, in The Existential Foundations of Medicine and Psychology (1979), Boss uses one of his own experiences he had to illustrate the dramatic limiting effect of pain. He describes a scene during which he sat in his garden thinking about medicine and conversations he had with other physicians in other times and places far from his garden. Suddenly, his lawn chair fell, and he caught his finger. In that instant, "the broad

extension of my being-in-the-world into its past and future has suddenly shrunk ... to the meager proportions of a connection to my injured fingertip” (Boss, 1979, p.211). In this example, Boss demonstrates the radically limiting nature of pain on the person’s being-in-the-world. He also points out the necessary nature of pain to “watch over health by warning a person of imminent damage to his integrity” (Boss, 1979, p.211). Boss shows how pain severely limits an individual’s possibilities, while also understanding the pain as part of the person’s lived experience, not only in terms of the injured fingertip in need of first aid care.

Boss’s work, like Leder’s, helped me reflect about the phenomenon of pain and what it means to be in pain. Both agree that pain is a radically limiting phenomenon and that it reduces one’s existence; however I was not satisfied to simply accept the fact that existence is restricted by pain. I wanted to expand upon and explore the meaning of this limitation. Living through pain, specifically migraine pain, is its own experience worthy of exploration even though pain is a limitation on the life world.

After reviewing Boss’s work, I was not only intrigued to study the world as lived in migraine pain, but was also concerned about his finding that his patients gave inexact descriptions of pain. From a methodological stance, I did take this finding into consideration since the premise of the current study was that I could elicit descriptions from participants about their experiences. I was not sure if finding meaning might be elusive due to the difficulty in adequately expressing the experience of pain. However, I decided to continue with the study using the phenomenological method since I believed a qualitative analysis of migraine pain was relevant and necessary and still could be accomplished. Even though participants may give inexact descriptions of the pain itself,

I believed exploring the experience of pain would elicit interesting findings. I was not only curious about the phenomenon of migraine pain, but also how the pain would impact other aspects of the participants' lives. For example, I wondered how living through extreme pain might influence how participants would view themselves as well as how the pain might impact relationships with others. Overall, Boss's work further excited me in terms of the possibilities of what I might find when exploring the migraine experiences.

Conclusions – Existential Phenomenological Framework

While some studies have been conducted from the existential phenomenological perspective on the body subject of pain in general, room for more research on specific areas of concern exists, including room for studies on specific phenomena of pain such as the migraine headache. This phenomenon has been studied extensively by researchers from the other perspectives— biological, health psychology and psychoanalytic—but a further explication from a first person perspective illuminates the meaning of this experience. The body, as most available for phenomenological study when in a disease state or in pain, seems, during a migraine state, an ideal topic for investigating it on its own terms as well as in more general terms. While the other perspectives have a great deal to offer and should not be disregarded when studying the structure of the phenomenon, a phenomenological method interrogating first-person experience yields interesting and useful results for migraine sufferers and those who care for them.

Method

While medical and mental health professionals such as DiPiro (1993) and Hassinger (1999) have conducted a significant body of scientifically-based research on migraine headaches, the literature review outlined in this study indicates that only a small amount of research works with subjects' individual experiences. The existential phenomenological tradition provides a closer understanding of the meaning of the lived body as reflected in pain. The term "lived body" as it occurs throughout this study originates with Husserl's *The Crisis of European Sciences and Transcendental Phenomenology* and will hereafter refer to the body as a null point around which all else becomes relative (1970). In a study on migraines, Husserl's idea can elucidate the experience of pain from the perspective of the individual's lived body as a null point and how pain is experienced using the body as an absolute referential.

Up to this point in time, an empirical phenomenological study based on individuals' experiences with migraine headaches had never been conducted. The data in this study consists of written protocols and verbal, taped interviews from self-identified migraine sufferers. The written protocols respond to the question: "Please describe in as much detail as possible a time in which you experienced a migraine headache. Please include what was happening before the migraine occurred, what happened during the migraine, and what was the resolution of the headache," a question arrived at through discussion in a doctoral-level research class and conferencing with my director. Using these protocols in conjunction with the taped interviews, I then worked with Giorgi's phenomenological method developed at Duquesne University to analyze the data and arrive at a general structural meaning of the experience of migraine headaches (Giorgi,

1985). Giorgi's method emphasizes the conceptualization of human experiences in terms of structuring that experience through phenomenological research, which places individual perspective above the controlled experimentation of the natural scientific model. Following Giorgi, I thus focused my study on three individuals' experiences of migraine headaches.

The structure in this study employed five classic existential themes: the body, *eigenwelt*, *mitwelt*, *umwelt*, and time. The concepts of *eigenwelt*, *mitwelt*, and *umwelt* are all aspects of the lived world or *lebenswelt*. *Eigenwelt* refers to the world of the self, through which concept I will examine the participants' senses of themselves and their reactions to and feelings about the migraine headache. The term *mitwelt* refers to the individual's social world; I will discuss the participants' relationships with others. Finally, the term *umwelt* represents the world in and of itself. The concept of *umwelt* will aid in my discussion of how the participants' interactions with the world changed during a migraine.

I performed my initial, or pilot, study on students in a doctoral-level psychological research course at a Western Pennsylvania university. This pilot study was used to determine whether migraine headaches would present a suitable avenue for phenomenological investigation. Out of the members of this class, I easily found find three participants to engage in the pilot study. During this preliminary study, I only collected protocols and did not conduct verbal interviews, as the written protocols provided sufficient evidence that the migraine experience would lend itself to a phenomenological approach. The question I asked in the pilot was, "Please describe a time you experienced a migraine headache."

The pilot study led me to the focal point for the current research—that individuals experienced migraines as a temporal unfolding during which they felt subject to violent attack. Each participant in the pilot tried to fight against the attack by employing various ameliorative methods, but to no avail. They felt forced to “give in” to the attack and succumbed to it through attempting to sleep. The participants felt isolated during the migraine, which affected all aspects of their lives from how they felt about themselves to their work and their ability to relate to others. The primary physical symptom, pain was so severe that some of the participants experienced it as nearly unbearable, with some of the participants wishing for death. Based on findings in the pilot, the experience of the migraine headache seemed to superimpose itself over and stand against a person’s typical existence enough to enable him or her to remember a specific incident of migraine with sufficient clarity to write and speak about it. Thus, given the extreme nature of the migraine experience, I believed it possible that participants in the current study would provide rich narratives. Through the pilot’s process and the finding that migraines presented an experience that clearly stood out for the individuals that responded to the protocol, I determined migraines to be a viable topic for phenomenological research.

Approaching the data with the assumption that people experience life as a temporal unfolding, I wanted to specifically ask participants about that temporal structure as endured during a migraine. By the term “temporal unfolding,” I refer to progression of time as it relates to individuals’ ordering and structuring of their lived experiences. Many life events are perceived as having a beginning, a middle, and an end, and I assumed the migraine possessed a similar temporal structure through its duration. I wanted participants to describe a single incidence of migraine, not the general experience of

being a migraine sufferer, believing that participants could easily to remember a time that they experienced a migraine headache and assuming they would pick a personally significant example. Thus, I felt the examples I collected would reflect various elements of the migraine headache, including individuals' experiences with the pain as affecting sensory perception and interpersonal relationships

Due to the ease with which I collected the protocols in the pilot, I believed that I could easily gather data in a community setting. At the time I was preparing to collect data, I was the coordinator of a wellness center in a pharmacy. With access to a number of potential participants in the pharmacy setting, I had a nearly endless pool of potential participants. However, I found data collection rather difficult. The first two protocols I collected were very sparse and did not actually answer the question posed. I then began to explain the question more fully to the participants, asking them to tell me about specific migraine headache incidents. I asked the participants to explain their specific experiences to me as though I had never heard of migraine headaches. Yet, even after clarifying the question, one of the participants provided only a cursory description a typical headache experience. In addition, I found it difficult to arrange for verbal interviews with the five participants who contributed protocols. Due to a lack of response from two of the participants, I was unable to gain verbal interviews from them. After nearly four months, I collected three full sets of data (both written protocol and verbal interview). The two additional protocols from participants with whom I was not able to arrange verbal interviews contributed insufficient information and will hereafter be excluded from analysis in the current study.

Flow Chart of Research Method

The following is a flow chart of the research method tracing the overall process of the research from preparatory work through final data preparation and analysis. The overall research process includes the various methods used in preparing for data gathering, collecting data and, ultimately, preparing this data by filtering it through the structural lens of phenomenology.

Preliminary Preparation to Gather Data

1. Word of mouth – I told the employees of the pharmacy where I was employed about the research project, I explained what the research process entailed and the project’s goals in an effort recruit participants.
2. Flyers - I hung flyers in the pharmacy inviting potential participants to contact me if interested in and qualified for the study (see Appendix A to view the flyer).

Data Gathering

3. Research request – Each participant received the appropriate consent form (see Appendix B to view this form) and a typed copy of the research question (refer to page 60 to revisit the question).
4. Written response – Each participant gave a written response to the research question (see Appendices C, D, and E for syntheses of these responses).
5. Interview – After locating areas in the written responses that lacked clarity, I asked the participants to explain the written responses further during the

interview. If during the course of the taped, verbal interview one of the unclear areas was not addressed, such as part of the migraine's temporal structure, I then asked direct questions regarding that particular characteristic of the experience. Two of the participants, Judy and Nancy participated very fully in the interview process, expanding on their feelings and insights about themselves in relation to being migraineurs. Although Steve willingly participated in the interview, he focused more on symptoms, perceived causes of the migraines, and medications than a single experience. Despite the explanation given at the beginning of the interview that the study required participants to provide, in detail, one experience with a migraine headache, he gave information about what generally happened during a migraine experience.

Data Preparation

6. Edited Synthesis – I synthesized the written response and interview into one text for each participant. This text served as the primary data source for the research project.

7. Delineation of Meaning Units – I broke the edited synthesis into more manageable units of meaning (see Section Two Appendices C, D, and E). These meaning units were still faithful to the words of the participants. To find these meaning units in the text, the question, “How is each aspect of the participant's experience an essential part of her experience of the migraine headache?” guided analysis. Participant statements such as “I would just feel a sharp pain when it first starts” or “Once it started, it came on me—I couldn't

stand the lights” represent meaning units. Each sentence of the participants’ dialogues was analyzed, and at each shift or change in the data, I started a new meaning unit.

8. Re-description of Meaning Units- To delineate the meaning units, I re-described each unit using slightly more psychological language inserting my own words (see Section Two of Appendices C, D, and E).

9. Situated Structure – Moving to a more technical level of psychological interpretation, the situated structures for each participant use the re-descriptions of meaning units, presenting the units in a more cohesive, structured narrative broken down into the following categories: body, *eigenwelt*, *mitwelt*, *umwelt*, and time in an effort to more effectively manage the data. Section One of Appendices C, D, and E shows the data presented in the form of a situated structure.

10. Illustrated General Structure – Once I created situated structures for each of the participants, I combined the results into an illustrated general structure using quotations and examples from the participants to highlight the various aspects of the experience of a migraine headache. As in the situated narrative, I organized the illustrated general structure into the categories: body, *eigenwelt*, *mitwelt*, *umwelt* and time.

Participants

When summarizing the basic demographics of the participants (names have been changed to protect confidentiality), I noticed some diversity with regard to gender and

occupation, but similarities in other areas, such as race and age, surfaced. The following table depicts demographics of the participants who rendered a complete set of data:

Table One – Participant Demographics

Participant	Race	Age	Education	Occupation	Marital Status
Steve	Caucasian	47	B.S.	Pharmacist	Widowed, remarried
Judy	Caucasian	56	M.S.	Retired teacher	Married
Nancy	Caucasian	50	M.A.	Guidance counselor	Married

Steve

When the study was conducted, Steve was a 47-year-old pharmacist, widowed and remarried. He is Caucasian and had suffered from migraine headaches since childhood. At the time of the study, Steve was experiencing a great deal of stress in his day-to-day life; he described himself as wanting to be in control of all aspects of his life at all times. His primary interest centered on his ability to continue working through the migraine headache. In addition, he held a significant sense of responsibility toward his employees and his family, which consisted of a wife and five children ranging from four to twenty-one years old.

Judy

At the time of the study, Judy was a 56-year-old retired teacher. She was a married, Caucasian, female who cared for her mentally and physically disabled husband.

She had two grown children and considered herself a caretaker, having cared for a number of physically ailing family members, including both of her parents. She had been experiencing migraines for seven years to the date of this study; the genesis of her migraines coincided with the time her husband's disabilities increased markedly in severity. In addition to the physical symptoms he had been enduring for several years, he began experiencing psychological symptoms. Judy felt as though she was letting her husband down when she experienced a migraine headache, as she could not care for him while enduring such pain.

Nancy

Nancy, at the time of the study, was a 50-year-old guidance counselor. She is a Caucasian, married female with two grown children. She had been experiencing migraines since her childhood, and her headaches were very closely tied to her identity. At one point in the interview, she stated simply, "this is me." The migraines were part of her unique individual experience, and she could not remember having lived without them. Nancy assumed sole responsibility for the care of her migraines and did not feel that having migraines impacted her relationships with others. After attempting many different types of medication regimens, Nancy believed she had finally gained control of her headaches. She experienced a new sense of freedom once she had found a treatment she felt to be effective.

Interactions with Participants

After explaining the research question and emphasizing that I wanted the participants to fully describe the experience of migraine headache to me as though I had never heard of the experience, the participants wrote their protocols. After reviewing the protocols and discerning unclear areas, I conducted the interviews with the participants. I used open-ended and directive approaches as dictated by the course of the interview. In the open-ended questions, I permitted the participants to speak at length about their experiences with migraine headaches without holding exclusively to the examples given in the written protocols. As the participants began to speak about the examples in their protocols, other aspects of their migraine experience or other occurrences of migraines arose. While I was originally looking for one specific migraine experience, I did not stop the subjects from discussing their other experiences. For the most part, the participants answered my questions and did not veer from the general topic at hand. I found that the other experiences the participants spoke of in the interviews helpfully illuminated those described in the protocols. In terms of using a more directive method of interrogation I had already identified areas of the protocols that required clarification; thus, I specifically questioned participants about these areas. In addition to achieving clarity of explanation, another one of my goals was to ensure I had obtained a temporal sense of the experience from each participant (i.e., what was the beginning, middle and resolution of the experience). I also aimed to ask participants how the migraines impacted the various aspects of the life world including the *eigenwelt*, *mitwelt* and *umwelt*.

Data Preparation and Analysis

From each participant's written response and interview, I created an edited synthesis, or a single text fusing the responses into one cohesive body of narrative. The edited synthesis does not deviate from what the participants wrote or said, with the exception of eliminating redundancies and deleting extraneous comments such as "uh" and "um."

Results

Edited Syntheses

The following section provides the edited syntheses for participants Steve, Judy, and Nancy. Punctuation and syntax have undergone adjustment to facilitate understanding and flow for each narrative. The edited synthesis served as the primary, raw data analyzed in this study. The data presented here in its original form ultimately resulted in the illustrated general structure given in the subsequent section.

Edited Synthesis: Steve

One of the causes for my migraines is alcohol (only if I have not had any alcohol for several weeks). If I drink one to three drinks per week, then alcohol does not cause a migraine. However, if I don't drink for several weeks and then drink two to three beers or glasses of wine, I wake up in the morning with a migraine.

(When asked for clarification) Normally, the typical scenario is that I have had one to two beers. If I had had two beers last night, I would have probably had a migraine today. We have it (alcohol) in the house, but I don't drink it. But, if I go two to three weeks without a beer and then go out to a meeting and have two beers or three beers, the next day I'm probably going to have a migraine. I'm not sure why; it's just part of my body chemistry I guess. My body just doesn't like alcohol for some reason (smiles). For example, during the holidays from November, like Thanksgiving, to December there is something going on every weekend; so, I'll have a beer here or there or there or here, and generally it's enough to keep my body from . . . and I don't understand why. It's just that's what occurs—if I don't have a beer for three weeks and I go to have a beer or two beers, I know the next day I'm going to have a migraine. It may not be one of my worst ones and if you combine that with stress, I will have a migraine. A lot of times that occurs, I think, because R_ (business partner) and I will be having a meeting and we will be talking to someone. We will be at A_'s (a local restaurant) for our meeting, where stressful things occur. Even discussing this stuff about J_ (problem employee) and things that are going to occur, it's over two or three beers and for some ungodly reason that is what occurs. I don't know the answer.

(When asked if he considers the possible impact of drinking on migraine activity) Well, no it doesn't, but you say to yourself, "Well, I'll roll the dice and maybe it won't happen" and sometimes it doesn't, but usually it does and a lot of times you are at a function and you don't even think. Someone says, "Do you want a beer?" and you don't realize you haven't drank for three weeks. But, by that time you've drank, and it's past the point of no return . . . and I think, "If I get it, I get it."

(When asked for clarification on the beginnings of a migraine.) I can generally tell by the time I go to bed that I am possibly going to have a migraine. It's almost like I have a dull . . . numbness on one side of your head. So you go to bed after three or four Motrin, hoping you will sleep sound enough. Probably, about 50% of the time, you will be OK the next day when you wake up—it's the other 50% when you wake up with a migraine. The beginnings are always like—then, I can almost tell that night when I go to bed, I'm probably going to have a migraine. Oh, I have a feeling and if the day got stressful and I had had two beers last night, I would have probably had a migraine today.

Usually, less sleep than five hours also occurs.

(When asked to clarify how sleep is a factor.) If I sleep too much, I can end up working up with a migraine. I usually get four to five hours of sleep. If I sleep eight hours and don't get my coffee, there is a good chance I'll get a migraine.

I usually get nauseous and throw up at work.

(When asked how other factors in the world intertwine with the experience of the migraine.) There is something excessively stressful in the work place or at home—over and above the normal stress (laughs).

(When asked for clarification on Steve's idea of stress.) It's just if the whole day is a long—a long (Steve's emphasis) day. Yesterday was a good example. This morning, I have actually had that same scenario that I just explained from last night. I started work at six o'clock and had a meeting at (workplace). I had to address all the employees about some things. Then, I worked from eight o'clock to eight-thirty at night in the pharmacy. Right after the meeting, I'm to work and worked all day. Then, I had another meeting with J_ (problem employee) last night too to discuss his future with the company. So the whole scenario was just a long (Steve's emphasis) day; it was almost midnight. That's the kind of day that will generally cause it. So, there is some huge incident that occurs that day, specifically this J_ (problem employee) thing that day. There is an anticipation and buildup, then it's basically, it's resolved, and you have a let down; but it's just that internal stress all day long.

(When asked about other factors that precede a migraine.) There was a time way back when, when I was getting a migraine every Saturday. I know for sure what was causing that, because I was working Monday through Friday, I was drinking a lot more coffee then, and every morning I would have a fourteen-ounce cup of coffee. Then, I would come to work and drink another cup of coffee on Monday through Friday. And then on Saturday, I wasn't working. I wasn't working out at that time. I work out now, so on Saturday morning I get my coffee. On Saturday, I would sleep in until ten o'clock. I got more sleep than I'm used to and, not getting my caffeine every Saturday, I would wake up with a migraine. That lasted about a month, until I realized, "I think I understand this." I think that the caffeine and I think the extra sleep did that to me—I'm not sure if you've heard that? Chocolate—that never bothered me.

The migraine is usually a very persistent dull aching pain.

(When asked for clarification on the pain.) Then, you start the day, and it's almost like a numbness of the one side of your head. For me, it's always on the right side of the head (gestures to head with hand "covering" the right side of the head with the hand). I've got that dull, aching pain—for me, it's more of a dull, aching pain at that point, and as I move around it becomes more severe. There's almost like a funny feeling on this side (gestures) of my head, and I'm just sitting here saying . . . It's almost a numbness. As the day progresses (at work) the migraine usually gets worse.

(When asked for clarification on how work and migraine interplay.) By the time I get to work, I take two Percocets to get myself through the day.

(When asked if he ever leaves work due to a migraine.) Honestly, I think I can remember only one time that I actually called off work and didn't come in several years ago. Maybe it was a combination of being still drunk (laughs) . . . or hung over and the migraine. And even if I did, like if I had one on a Saturday, and I didn't have to go to work and I laid down in the morning, it still doesn't go away until eight o'clock, nine o'clock at night. No matter what I do, I'm going to have that migraine until nine o'clock at night. If I take time in the middle of the day—because there are times even when I can sneak away from (workplace)—it almost seems worthless, because it doesn't go away. Even if I take off in the middle of the day to sleep for an hour, it just doesn't work. If I can get home at six o'clock at night, it seems to make the whole thing work for me—it seems to work for me.

I will take two to three Percocets over an eight-hour period to dull the pain. I will take a Maxalt.

(When asked for clarification on medication.) Well, one Percocet and then another one two to three hours later to try to be able to make myself able to function. That works generally enough to dull the pain, so I can generally function through the course of the day. Generally, by three or four o'clock, it's just worse again, and I know the Percocet is not going to help; so, I generally take a Maxalt, Zomig or Imitrex—they all seem to work the same. Then, once I start to take some type of medicine to make sure I get through the day that eliminates some of the worse . . . No matter what drugs I take, if I take five Maxalt it just doesn't . . . I already took three Motrin this morning (the morning of the interview), and I'm just sort of sitting here saying I hope it doesn't develop into a migraine; and 50% of the time it won't. I actually started on Inderal for a while, but that just slowed my whole metabolism down way too much for me (laughs).

(When asked for clarification on "functioning" throughout the day.) I can generally function through the course of the day. It just limits me to . . . (looking down while pausing) . . . function really. I mean I get aggravated because I cannot function the way I'm supposed to. Again, it's just the inability to do what I need to do, because I can't do what I need to do for that day. Most of the time, it is not that severe that I can't function—it's (the functioning level) not at 100%. There is no doubt in my mind or anyone else's mind that I'm not at a 100%, but my 30% is still good enough to get me through the day. All day long . . . [I am] . . . functioning and trying to do what you need

to do and ignore the pain, you know. I functioned all day long, and it's more or less I say I won the battle.

(When asked about feelings about diminished functioning level.) Oh, obviously yeah, . . . [it is frustrating] . . . because I can't do what I need to do for that day.

(When asked for the clarification on his sense of who he is.) I guess I have just learned to live with it, so it's not like, "Oh my God, I'm going to have a migraine." They have decreased over the years. There was a point in time you know they seemed to be worse. I have a particularly high pain tolerance; I just ignore it. I'm obviously a hyperactive individual and very vocal and, if anything, I get more quiet. Although I do lose short-term memory with the use of the Percocet, I will start to do something, and I'll stop and say, "What was I doing?"

(When asked for clarification on relationships with others.) I'm obviously a hyperactive individual and very vocal and, if anything, I get more quiet. People know that I have a migraine, because I turn white. They say, "He's got a migraine" (laughs). If anything, it's just quiet. I don't get belligerent. I mean, they just know that something is the matter with me, and that he's not his normal self. I'm sure it impacts me and them in some ways, but not in a dramatic fashion of any kind. I'm always on the go, so I guess it impacts them in some way; because for me to take two hours in the middle of the day to lay down and cover my face up and sleep is generally what happens. So, it's just that I'm not responsive to them as I normally am. I mean, when you talk about family and friends and everything, they can tell that I have a migraine. They know what I'm going to do by now, so they just more or less just clear out—the kids, at this point, even the four-year-old, knows "he has a headache, leave him alone for a couple hours." And it's not that I have ever been mean to any of them. It's just that they know daddy will be fine if he gets two hours' sleep; so, I don't know that they've ever said that. I guess that it's the way I work and, if I stop and think about it, for my family because that three or four hours is the only time I get to spend with them—it cuts into their time, so it's probably—I don't know . . . Finally, when I can get some time I will take a Maxalt, lie down, and cover my head.

(When asked for clarification on withdrawing.) With everything on my mind, I just never had time to catch up on what happened. I literally have very little personal time, so it's my need to have personal time; and I guess everyone is entitled to a little bit. I guess I assume it's OK. I might pull away at about six o'clock, close my eyes, cover my head, and just sleep for an hour or so; and, generally, by eight o'clock that night, the migraine is gone. You just go straight to the bedroom, turn the lights off and close the door and put whatever, the pillow . . . but then, I'm also tired.

(When asked for clarification on sleep) You go to bed hoping you will sleep sound enough (before a migraine occurs) and, probably about 50% of the time, you will be OK the next day when you wake up. (In talking about the experience during a migraine) I just sleep for an hour or so and generally by eight o'clock that night the migraine is gone, so I don't know if there is anything enlightening about it. Usually,

about one to two hours later when it is dark, the migraine will subside (within twelve hours).

(When asked to clarify the resolution of the migraine) Well, actually, it's almost like the opposite (of feeling exhausted)—it's a feeling of euphoria because you got through it and now it's nighttime. It's always at night and whether light is a factor or not a factor—I don't know. But, it never gets resolved during the day. Usually, it's about nine o'clock at night and by that time things have resolved; and then, it's almost like a feeling of euphoria. I'm not sure if it's the drugs or just the fact that it's over, but now I have a difficult time going to sleep. Now it's almost like my body is over-compensating, so I'm a little bit hyper. I'm not sure if it's the combination of things I didn't do during the day or the fact that I finally started to feel better. It's probably a combination of all of them. Generally, around nine o'clock, I'm starting to feel really good; and then I'm like, “Oh geez, I got to do something.” It's almost always twenty hours later before it's resolved.

(When asked for clarification on giving control over to migraine.) I don't know—it's just more or less giving in (laughs). So you know it's what you inevitably have to do . . . [give in to the pain] . . . I guess it's, what can you say? (laughs) I'm not used to giving in to anything, but I still feel I have won because I functioned (laughs). I functioned all day long, and it's more or less I say I won the battle; I got through the day and got 90% or 80% or 70% of what I needed to get done.

Edited Synthesis: Judy

My husband is a disabled (mentally and physically) individual who had to retire due to his disabilities. (When asked about relationship with husband) I would say B__ has a lot to do with my migraines—I have to say that. There are nights we don't sleep and when there is stress; I can feel one coming on. If there is a situation where B__ is not aware of something, the littlest thing could happen. Perhaps, it's the lawn mower would not start on the first try. That would cause him to have his paranoia episodes—he gets so upset. And the frustration of it. Here I am trying to start the lawn mower, which I never did before; so, now I not only take care of everything inside the house, but outside as well. At times, I get them because of him; at other times, I just want to sleep.

So B_ has a lot to do with it, I will be the first one to admit that. I have never been a yeller or a screamer and with him there is no sense. But verbally, this is not working and this is not the way it should be and I hold everything in. I don't have an outlet. I could, could (Judy's emphasis) yell and scream, but he wouldn't get it. He would just come right back at me.

When I was working, I had to wear a beeper because B__ needed to know he could get in touch with me at all times. If that went off and I didn't call him within five minutes, he panicked. To take the heat off me, I added on to our house. We added four rooms onto the house; B__'s like, “How are you paying for this?” I had to solve the problems, keep the peace, be the strong one and then when I would get hit with a migraine . . . That's when I had my first one, probably between '96 or '96/'97, they were

tough years. I bet every six weeks I got one. Every six weeks and I finally told the doctor, “I can’t . . . function.”

And there are times when he realizes it, but there is nothing he can do about it. He just can’t. It’s worse when he does realize, because he feels responsible and he feels guilty.

(In talking about the stress of handling her husband’s health problems.) B__ has Parkinson’s, he’s had four back surgeries, he has Menière’s disease, he has PMR—a muscle disease—and now he is in the beginning stages of Alzheimer’s and he’s 56. But, all this started when he had his stroke and with his Parkinson’s. It’s much more mental—he has the shakes and all that—but the paranoia, the psychological effects on him, it’s just tremendous. So to get him to go out, I have to work at it.

(When asked to elaborate on relationships with others.) They (family members) are very sympathetic toward me. B__ doesn’t like seeing me sick. I’m his caregiver and when I’m down, that’s when I do become short and curt and it’s just like, “Leave me alone.” I’m on a maintenance medication now, but I wasn’t getting them as often. Lately, I have been getting them more often. I have a couple things coming up and this spurs B__ on, so I take another medication. I take Axert; it puts me to bed. I mean, I sleep, which is good for me. But, B__ is sympathetic toward the migraine.

At the time I am about to describe, I was also caring for my father (who lived with us). I became very light-headed one day while still teaching. My husband had had a very bad night previously and, therefore, I did not get enough sleep (which I attributed to my light-headedness). However, I became very light sensitive and turned the overhead lights off in my classroom. This did not help, and I even experienced “floaters”—light spots “dancing” in front of me. My neck became very stiff. At this time, I realized I had to leave work. Driving home, I began to experience a riveting pain shooting up the base of my head and around to my forehead.

Once home, I went directly to bed—explaining to my husband and dad that I could not stay up. Once I got home, I remember just looking at him (husband) and I said, “I have to get undressed and go to bed,” and he said, “Oh, a migraine.” I said, “Yeah, I have to get undressed,” and he had to help me (Judy’s emphasis); and that time I was like, don’t ask, don’t talk. That’s hard for me—going to my bedroom, closing the door, closing the window. I tried ice on my forehead and neck, but nothing seemed to ease the pain, which by now was like a ‘sharp knife’ penetrating between my eyes and through my head. When I had a migraine, I would go home, tell my husband and my dad (when he was living), and say you guys have to fend, I’m going to bed. I became very nauseous and laid in my dark room for more than three hours. Not knowing what to do and afraid to take Tylenol, etc., I called my family doctor. I explained to him as best I could what I was experiencing. He told me to take one of my husband’s M.S. Contin pills, to stay in bed, and see him the next day after work. Bending over, walking or even talking made the pain worse. It was the next morning that I realized that I had not had just an ordinary headache.

(In speaking about the relationship between her father and husband.) I had to care for my dad, I had to care for B__, I had to keep the peace between them. They got along famously, but living in the same house . . .

I had contracted meningitis (sic.) and, as a result, my blood pressure rose dramatically, and I experienced my first headache (later to be diagnosed as a migraine).

(When asked about being hospitalized for meningitis) I had never experienced a migraine until I had meningitis, and I was hospitalized for it. I had high blood pressure after that—my blood pressure had always been low.

(When asked to elaborate on the first experience with a migraine) So, I'm on medication for that also and the first experience of my migraine—it was just a very bad night with my husband. B__ is a very educated man—two Master's degrees. He was a teacher, and his disability has taken all that—he can do very little now.

(When asked to elaborate on the bodily experience) OK, it's so strange, because at first my eyes become very sensitive. I never did like overhead lights and, as a teacher, that's what I have. But, my eyes would become very sensitive and the base of my neck. I would just feel a sharp pain. When it first starts, just more like a stiff neck, and then it would almost be like a fog around me; and when I would start to experience that, I knew it was going into a migraine.

(When asked to elaborate on how migraines impacted her work) If I got a migraine at work while I was at school, I could not function as a teacher. You know teaching was the love of my life. If I would feel one coming on—and this is while I was on the maintenance drug—if I couldn't get a pill in me, once a migraine starts, that other medication didn't help and that's taking three of them. Once it started, I came on me. I couldn't stand the lights, I couldn't stand the kids in the classroom. The slightest movement . . . I always had good kids. I always had good control of my room, but it didn't matter. It was just being there. I would have like a cloud around me. It was like I was looking out of a fog, and I would have to leave school. I would call off and say, "Please get someone to cover me, I have to leave."

(At a later point in the interview.) And, at that point, I knew that I couldn't function. There were a couple times when I couldn't drive from school to home. I would have to get one of my coworkers to drive me home. And I would say, I will worry about the car later.

(When asked to elaborate on the symptoms) It's mostly my eyes. Mine always started at the base of my neck. It's like a stiff neck, and there are times when I think, "I didn't sleep right"; and then, the pain goes up the base of my neck, up my head and then mine seems to center right in between my eyes—right here (gestures). It's like a knife going right through it. Uh, (sighs) it does seem . . . it's almost like it's very foggy. It's almost like a film closes in around me. I usually just try to put my fist on my head and push on it (gestures); but then the slightest sound, it just echoes in my head.

(When asked if she feels like she wants to withdraw) Right.

(In talking about the symptoms.) I become nauseous, which was another problem with taking those pills. They wouldn't stay down for me. The slightest sound or movement just compounded my headache.

(When asked to elaborate on sound and movement) I would close my door, close the drapes—my daughter bought me like this mask to put on. I put a pillow over my ears. I didn't even want the dog. The dog always wanted to come in with me. (Judy and researcher laugh). I didn't even want him jumping on the bed—just leave me alone. I have a phone right next to my bed, and I will never forget one time the phone went off. I wanted to smash it! Piercing, I mean, my head just felt like it was going to explode.

(When asked about her feeling of trying to fix the headache and it not working) I was always the “fixer-upper” even when my parents were living. I'm the youngest of three and the one my parents relied on. Judy to the rescue! When I'm experiencing a migraine, to me, this is not supposed to be happening—and this is not life-threatening. I mean, in my mind I realize this, but while I'm having a migraine, I'm not able to do the things I have to do. I'm not (Judy's emphasis) able to care for my husband, I'm not able to get him up and get him showered at that time, or have him exercise. If I have a doctor's appointment or B__ does, I can't do it. I'm also a person who won't ask someone for help. That's just me. I have wonderful neighbors who would come in a heartbeat, take B__ for a ride, take him to the doctor's—whatever. But that's my job.

(When asked if it feels like the migraine robs her of her job.) Exactly. It's taking away from me precious time that I need to be doing for others. You know, my main job is not to be in the bed with a migraine or not to be held up. I get frustrated with myself. I blame me—it's like suck it up. (Judy and researcher laugh.) It's like, “What's wrong with you – are you being a wimp or what!”

(When asked if she is hard on herself.) Ugh, you have to be—I want to do it.

(In talking about the role of medication in her life.) After the first experience with the migraine, the doctor put me on a medication to help. When I felt a migraine coming, I had to take a pill. But being a teacher that wasn't always possible.

(In talking about the impact of the medication.) I can't function, I can't teach, I can't do whatever. We tried three different drugs and it didn't work, so they put me on Depakote, and as soon as my daughter heard that, she said, “You aren't bipolar mother, what are you doing taking that pill?” And I was like, “Well honey, it does help with migraine—let's give it a shot.” For a long time, it was fine. My migraines were kept in check. The last year-and-a-half, I've been getting more migraines. So now I take Axert when I feel one coming on. But, now the Depakote, it worked fine—it doesn't bother me. But the Axert, it knocks me out. Now the good thing is, when I wake up, I don't have a migraine any more. But I feel like I have a hangover. It's just kind of like, “Woah.” (Judy and researcher laugh.) And from the time my head hits the pillow, I'm out. And

when I wake up, it's just that really, "ooh," but then it shakes out. I don't like losing control and, with a migraine, you don't have control over it. I can't will it away.

(When responding to the comment by researcher that she still tries to will the migraine away.) I do. (Judy and researcher laugh.)

(At a different point in the interview.) I really don't like to be dependent on drugs.

(In speaking about the example in the protocol.) Needless to say, the pill put me to sleep for about four hours. When I awoke, I felt sluggish, but my head only had a dull ache in it. After bathing, I went right back to bed, afraid to get the headache back. During this time, I was unable to think clearly or do the simplest chore.

(When asked what it is like to not be able to do the simplest chore.) It's terrible. I remember being in school one time, and I was getting one. They couldn't get somebody to relieve me. I should have just left, but I couldn't do that. I can remember I taught reading and a couple of sixth-graders came up to my desk, and they had a question for me. And I can recall just staring at them, and one of my little boys just put his hand on mine and said, "You aren't all right, are you?" I remember just staring thinking, "I have to say something," but I was afraid if I said something, I was going to cry. It was just a simple question that they needed clarification, and I couldn't do it. I looked at him, and I said, "Go get Mrs. H__ for me." She was right next-door, and she came over, took one look at me, and she knew. I couldn't help them, I couldn't help them. And it was at that point that Mrs. H_ knew I couldn't drive home or that I shouldn't (Judy's emphasis) drive home. I live in TP, I taught at TMS which is a mile, maybe a mile-and-a-half at most. She had someone else drive me home.

The only thing that is going on is that headache. It's like my brain waves are all focused. It's like how can so many of them be beating inside my head (Judy and researcher laugh) at the same time? And that is the only thing that is going on in my head at that time is that headache. That headache shuts everything out. It shuts me down.

(When asked to elaborate on the emotional impact of the headache.) For me, it's very . . . (sighs) . . . it's very traumatic. I don't want to be sick; I'm not supposed to be. I cared for my mother, I cared for my dad, I've cared for B__—my mother-in-law. I was the support; I was the strong one in the family. And in my mind, I'm letting everybody down. Here I am, I'm not supposed to get sick. I'm not (Judy's emphasis) supposed to be in bed.

(In talking about stress as a factor in the experience of migraine.) But, I found that I would get a migraine when there was a great level of stress at home. There have been times I've gone out in the back yard and just let out a hoot. (Judy and researcher laugh.) "Hello?!" But I do keep it in. I have two grown children. Our son lives with us on and off. He's engaged, but he has seen his father going downhill. Whereas, our daughter, who lives further away, will call and be upset with me, "You aren't making dad do this or that." She works for (a major drug manufacturer), so she has all the answers (sarcastically). I love her dearly, but then I kind of get it from her, even though she is

doing it lovingly. I keep it in, and I know I should have an outlet. I should have, but it's hard to do. But it's hard to do. When my dad passed away, B__ was in the process of getting off MS Contin and Morphine, and at that time I was the punching bag. I try to keep things even-keeled at home. And it's not easy with my husband—it just is not. Stress is a very large, it's very high in my life because of B__.

(In talking about what happens after the headache.) I'm very sore after I have one. I think I have myself so stiff and trying to be so still and almost trying to will it away. You know it's like, "I'm going to get rid of this"; so then, I'm going to take ten minutes to get rid of this, but I get really stiff because I'm so sore after.

(When asked about feeling a sense of control or lack thereof.) I don't feel I'm lacking control. I feel I'm letting my husband down because, I mean, he depends upon me for everything now. It's like I'm just a total letdown, and it makes me feel inferior. Usually after an episode, I'm so stiff. We have a hot tub, so I get in the hot tub. But I can't go to the hot tub during a migraine. The jets—there is no way—but afterwards I massage the neck, my back, and shoulders.

I'm very sluggish after a migraine. Like I said, I'm stiff, I'm sluggish. It's almost as if, like everything has been drained from me. It's like a battle. It's like I've been fighting and I haven't won the war yet. I remember one that was really bad. It just felt like someone hit me with a two-by-four. My head just ached for a couple days. It wasn't a migraine, but the ache was still there.

(In talking about other experiences) One time, B_'s sister and her husband were coming, and we were going out to dinner. In fact, I don't think anything was wrong, and probably an hour before they came, I felt one start coming. I thought, "Oh no." I'm going to get in the shower, let the water hit my neck. I went to get dressed and a half-hour later, I laid on the couch. I thought, "OK, if I put that mask on and the heck with the eye makeup. Just lay there. By the time they got there, I said, 'I can't go' and B__ said, 'Yeah, you can't go.'" I have to go to bed and it was just like . .

(When asked to elaborate.) It was devastating, because B__. It's very hard to get him out. I mean to get him to the doctor's even. He feels people look down upon him because of his disability, and they look at him. So to get him to go out, I have to work at it. So maybe that's why I got the headache—he was finally fine with going out and I couldn't go (laughs). I didn't, but he did go and they brought me home dinner, which I couldn't eat.

(When asked about her sense of self.) So it's just like, no—these things don't happen to me. I'm trying to be bigger than life. I think when you're a caregiver—it puts you—you aren't supposed to be the one who is down. I truly feel that I'm letting B__ down; I really don't want to get one. And I hate that to even tell him, "You can't bother me right now."

(When asked if it hurts her to say that.) It does. B_ falls a lot and, it's like, if you fall down, I can't pick you up. You know, you're on your own. My life changes when I

have a migraine, and I can't focus. I'm upset with myself, and I feel as though I'm letting other people down. I can't change anything, but I can't get rid of the migraine. I can handle just about anything else. There are a lot of things I don't like to handle, but I do, and I can still function. I think the biggest thing with migraine that people don't realize is that you don't function with them. You never get half a migraine (Judy and researcher laugh.) It's like, "OK I'll just take a little bit now." In my instance, I don't; it's never, this is a mild one, or whatever. They're all bad; some are worse than others. It's never like, "Oh, I had a little migraine."

(When asked to elaborate on feeling frustrated and inferior.) I have always felt that I'm a strong person. When my husband and I were 40, he had a stroke and things started to change. I mean, he has had just multitude after multitude of problems. I was the one to be in charge, which I had not been until then. I mean, together we would pay the bills and decide how much money we were setting aside for the kids or whatever, and that was never a problem. Money wasn't a problem, but then all of a sudden I was taking care of the money, I was taking care of the bills, and I was making the decisions; because, rationally, from '96 on, he couldn't make those monetary decisions. After letting him go through thousands of dollars on nothing—I mean giving it away—I felt badly, I had to be strong for him. When I got meningitis, it was really weird. I called my son, and I didn't want to call my husband. But, luckily, you can get over it. I was hospitalized for a couple days. To me, that was a real blow that something could attack me.

A long time ago, I learned there is only one constant in life and that is change. Either you accept it and move on, or you are left behind. I learned that with my husband. I have a migraine, and I can't control the situation, you know? To me, that is devastating, because I can't change the fact that I get a migraine.

Edited Synthesis: Nancy

It's hard to pick a single time when I have had a migraine, since I can't remember not (Nancy's emphasis) having them.

(When asked further about always having migraines.) I don't know how old I was when I had a migraine. I have always had headaches. I would say, probably, by the time I was in middle school or junior high school and in high school, I had the type of pain that I felt if I stuck my finger back behind my right eye, then another in my temple, and they intersected that would be the point of pain. It would travel in a pattern around my head, and that was the type of headache I had for many, many years.

At 50 years old, I finally feel my headaches are under control because of the care and follow-up of a neurologist specializing in headaches. Until a couple years ago, I felt this was a disability or handicap I would be cursed with for the remainder of my life.

(When asked to elaborate.) It is a big part of my life, and I remember thinking many, many times that this is something I am going to suffer with all of my life, because

even though I would go to a doctor and something would be prescribed, it would lose its effectiveness over a certain amount of time.

(When asked if she feels under attack.) I did feel that way. I don't now, because it's under control right now. But, I also know there could be a time when these medications could lose their effectiveness.

(When asked to elaborate on feeling cursed) Well ... at those times that I didn't have effective treatment, I didn't worry about when was I going to get a headache. I'm sure some people do. But, my personality is not that. It did prevent me from enjoyment from a lot of life activities.

(When asked about the impact of migraines on life activities.) Yes, there were many times I was miserable and in pain and certainly not able to crawl under the covers. So yeah, I was like, well here it is—this is me.

(When asked if there was a feeling of it being unfair.) No, I think everyone has something to deal with, and that was mine.

I will describe a severe migraine that occurred about a year and a half ago. I am a middle school counselor (no, that's not the reason!), and once we went outside when the fire alarm system was tripped accidentally by an electrician.

(When asked how sound impacted the experience) I don't believe sound had anything to do with it. As I stood outside, which happened to be in bright sunlight...

(When asked about sunlight) But, I do see now, after that there have been a couple times where I have gotten a very bad migraine where heat and bright sunlight will bring it on—real heat, heat and light. I felt my head starting to hurt. It didn't hurt in just one spot, but was a general ache.

(When asked to elaborate on the ache.) Uh, it's not an aura, I don't get those; I have never thrown up with a headache. Um, I don't see any lights or anything like that, the sensation is just ... maybe a slight tingling pain. And not in a particular area, but I know it's the precursor of a headache; so if I get that Midrin, I'm good. I did not have my purse and, therefore, no access to any medication.

(When asked more about not having medication.) Well, that's never going to happen again ... I always (Nancy's emphasis) have that with me. If we are going somewhere fancy and I have a little tiny purse or whatever, my headache medication is going to be in there.

(When speaking about previous experiences with various medications.) I would take Tylenol, Advil, and eventually they (the headaches) would go away. I would say probably by the time I was in my late 20s, I was taking Advil very frequently—three at a time. Sometimes, these headaches would go on for two or three days. I did have one bout when I ... I'm trying to remember this exactly now (sigh) ... After my second child was

born and I went back on birth control pills, I had a serious migraine headache, which put me in bed. At that time, I contacted a neurologist, and he prescribed Inderal for me—this was probably around the late 70s. And that seemed to work pretty well for me. I took that for a while and quit, and then I was back to my Advil regimen. In the period of the last, maybe, ten years, I have seriously and aggressively gone after migraine prevention and treatment. So, I have been through a lot of mediations. I started with Inderal and Imitrex, and I don't even remember. But, I do go to see Dr. K__ now, who I have been going to for maybe about two and a half years. What has worked for me right now is to use Depakote daily—morning and evening—as a preventative measure. And I take a Midrin if I just start to get a headache; I will instantly take that Midrin. I know exactly how many to take and everything. And if that doesn't work, I will take Fiorinal. I will start with a Fiorinal and Tylenol first. If that doesn't work, which is rare, I take two Fiorinal, and then that's going to put me out. So, if I can get to that headache right away ... Now I am not even letting the pain go for, maybe, five minutes.

(In talking about the incident in the protocol) I was talking to a student, and as the conversation continued, I felt my legs weaken as though I might faint.

(When asked to elaborate on relationships with others.) I think any time you are not feeling well, whether it is a migraine or whatever, people can see it. They can't see a headache, but they can see how the headache is affecting you. They can see the expression on your face—the fact that you are not well. They can see your complexion or coloring change—whatever it might be. It was noticeable to that teacher. She said, “You're not feeling well. However, I did see that student later and I said (she's like a twelfth grader), “J__, I had the worst migraine the other day, I really wish I could have talked to you longer.” And she said, “I didn't know that.” She didn't know. But then again, you have to take care of your own needs.

(When asked about how migraines have an impact on family members.) It doesn't. It might if I were a complainer, but I'm not going to allow it to impact them. I take care of it; I remove myself until it's taken care of, and then I will rejoin them. I mean, I certainly know people who get very bad headaches, and they play the part of the drama queen; but that's just the way they want to do it. If you got the flu or cold, you are going to step back a little bit.

(When asked what that is like to step back from your family.) It doesn't interfere, because they understand what the problem is, the intensity of it, and the frequency of it over a period of the years—“Oh well, Mom's just got a headache.”

(In reference to the incident in the protocol.) This was a new sensation to me. My headache was progressing rapidly, which concerned me, since if I don't take medication immediately, at the very first twinge of pain, it is too late.

(When asked about feeling as though the headache was overtaking her.) Well, maybe that's a good way to describe it—normally it doesn't happen that quickly. It's a very gradual thing, but again, if it was something like this one I described, it was just a

surrounding feeling of pain and fuzziness and . . . not being clear. By this time, I felt I wasn't able to think straight or speak properly, almost as though I was losing control. Of course, this alone is a very frightening phenomenon. I excused myself from the student, saying my head was pounding.

(When asked to elaborate on the issue of control.) Well, I'm a person that needs to have the control all the time. I mean, I have a job with a lot of responsibility; I am also a musician in my church, and I can't not be there. I mean, there are obviously times when you get sick, but there's a lot of people that depend on me to do a lot of things. I mean, certainly, we have all worked with pain and significant pain. I am going to continue to be aggressive about pursuing treatment.

(In reference to the incident in the protocol.) Massaging my neck and temple did not relieve any pain but, in fact, increased it.

(When asked about the experience of trying to do something that didn't work to relieve the pain.) I do have often a mixed headache—migraine and tension headache, so just the muscle massage will just relieve it. I mean it would relax any body . . . that's the most natural thing to do isn't it?

By this time, a teacher friend noticed me with concern and led me to her car, where I sat down, laid my head back, and closed my eyes. She turned the air conditioner on, and the car was somewhat more shaded. I thought after a couple of minutes of rest the pain would subside at least a little, but it didn't. I decided to leave work and turned down offers to drive me home—only ten minutes away.

(When asked to elaborate on turning down offers of help and not wanting to be a burden on anyone.) I didn't want to bother anybody. (Nancy and researcher laugh.)

(When asked if it is difficult to ask for help.) No, I just didn't want to bother anyone. They had their own responsibilities; someone would have to take care of covering them. Had I lived further away, it would have been a different story. Being only ten minutes away, I felt I could do that.

Once home, I got into bed to try to sleep. My head felt like it was going to explode.

(When asked to elaborate on withdrawing.) That was a time where I was very, very fearful. I wondered what it would feel like if someone had a stroke—if I was having a stroke—what the difference would be. I wondered what having an aneurism would feel like. I have a friend who died of an aneurism—just very, very quickly—all of these things run through your head. You are trying to be rational, but your thought becomes irrational when you are in that much pain. And you start to think maybe what is the worst possible scenario that could happen, and how would I take care of that . . . so yeah.

I took the recommended medicine, which had no effect. Several hours later, I called my neurologist, who called in a narcotic-based pain-killer for this particular headache. The medication did finally relieve my pain, but I felt completely exhausted

afterwards and also had a “numb” feeling in my head—feeling as though I wasn’t fully clear and alert—throughout the next day.

(When asked to elaborate on the resolution of the headache and the after-effects of the experience.) The migraine lasts about 24 hours. I wish I could describe what it feels like when that numb feeling goes away, because that’s when the migraine is over. I mean the pain is over, but I don’t consider everything over until I feel perfectly clear and normal again.

(When asked if a clarity comes over her.) Yes, I mean there is no tingling. There is no sensation of any kind. I have had the type of sensation when it feels almost like fingers crawling up the back of my neck. Paresthesia—all of that is gone—because with the Fiorinal, I will have a little bit of that fuzzy stuff. When that is gone, then I’m in the clear.

(Throughout the interview, Nancy gave other examples of migraines she has experienced):

Example 1: For example, my family was at an Ohio State football game last September, it was 90 some degrees, and we knew it was going to be hot. We dressed appropriately—I had a hat on, I had water, I had ice, we were sitting in direct sunlight—and I was miserable. Now that was one of those times where it was a handicap—everyone was enjoying the game, and I was like, “Please get me out of here.” And I went back to the relatives’ where we were staying, and I went right to that bedroom. Of course, I took medication throughout this, but the light is a trigger for me.

There is a “fuzziness,” there is a . . . I mean, like I said, I don’t have an aura or nausea or anything like that. There is a feeling in a severe migraine of almost being outside of yourself, you know. I have only had this one situation where I felt that my knees were rubber bands. And that scared me.

Example 2: Well, um . . . (sighs, eight second pause) I will describe another situation that is coming to my mind. I was in a meeting one morning with parents at school, with administrators and the whole bit, and I start to develop this headache. I excused myself for a few minutes, shot down some medicine, came back, and I just started fuzzing out so fast. Then, when I was unexpectedly asked a question, “Well, Nancy, how would you respond to such and such?” I felt like I had no idea what I was saying. I could barely get my thoughts together in a clear sense. And I knew they were coming out clear, but I wasn’t speaking fluently, in my opinion, like I normally do. I, uh, even told them alter in the meeting; I said I need to apologize for uh, you know, maybe not giving you as much information as you want, but I’m really not feeling well, and my head is just really fuzzy right now. To the point one of the parents said, “What is it that you’re on? Maybe I’d like some.” (Nancy and researcher laugh.) I said, “You don’t want this.” But it was just maybe a “dys-fluency” in my speech is what it was. I felt like my tongue was thick, like I couldn’t quite form my thoughts; um, I didn’t think it sounded that way. Of course you get a little panicky, which you cover. (Nancy and researcher laugh.)

(When asked to speak about stress as a factor.) Stress doesn't seem to be a big factor for me, personally. I would say it has been in the past, but as we get older, we learn how to deal with stress better and that's good. Certainly, I would say stress is not the biggest factor for me. I mean, I get a headache for no reason; it just happens. It just happens. I have certainly (Nancy's emphasis) had a lot of stress in my life—a great deal of stress. It might sound like I'm bragging and I'm not, but more than most people ever have absolutely. And I have not had headaches in those periods of stress.

(When asked if Nancy has headaches after the stress ended.) Um, no. I get them for no reason.

(When asked if that was frustrating.) I'm beyond that, because if I'm 50—almost 51—years old, and I don't remember not having a headache, I don't worry about it any more. If it happens, I take care of it. Yeah, so many people as you say have migraines, it makes me compassionate or understanding and also encouraging. You do not (Nancy's emphasis) have to live your life that way. Because I thought you did. You don't have to.

(When asked about the sense of “getting life back.”) I'm getting my life back; it's something I can take care of this the next time. I mean, “getting my life back” is really a powerful statement. The freedom is carrying the medicine in my purse. I will interrupt whatever I'm doing and swallow a pill without even any water. I mean, I will have a Tic-Tac or whatever, or even with nothing, but the freedom for me is making sure I have what I need with me. And that it's going to work so I don't have to worry any more.

Illustrated General Narrative

The Illustrated General Narrative is a combination of general phenomenological themes arising out of participants' experiences as well as the unique qualities of participants' life worlds. Similarities were equally important to me as differences between individual experiences since they are intimately connected when exploring participants' life experiences. I attempted to understand the structural interrelationships of aspects of the phenomenon and, by contextualizing themes in their relationships, to understand those themes that differed between participants.

This phase of data analysis begins with an overview of the migraine experience, and moves into further psychological analysis of various characteristics of the migraine experience. As in any lived experience, aspects of the migraine experience tended to group around the following classic existential themes, as discussed in the introduction to the Method section: the body, the *eigenwelt*, *mitwelt*, *umwelt* and time. If the participants did not address one of these areas during the interview, I prompted them with directive questions about the omitted area. Therefore, the categories themselves, in part, formed my own preconceptions about the migraine experience, such as the idea that the migraine experience would be like other experiences that organize around the aforementioned themes. With further respect to organization of the migraine experience around the categories listed, some areas included under a particular category could have also been

placed in other categories. I used the themes as a way to order the data, not to label each aspect of the experience under a strict system of categorization. Rather, each of the above categories serves to present the reader with a thematic conceptualization of the temporal and bodily experience of migraines. The body category explores aspects related to the participants' lived bodies, not simply a description of the physical symptoms associated with the experience. The *eigenwelt* category explores the participants' senses of themselves and their reactions to and feelings about the migraine headache. The *mitwelt* category refers to the participants' social worlds and relationships with others. The *umwelt* section covers aspects of the world in and of itself in terms of changes in participants' interactions with the world during a migraine headache. Finally, the time category discusses how time was lived before the migraine as compared to during and after the experience.

General Narrative of the Migraine Experience

While the specific details of each participant's migraine experience varied from one individual to the next and from one experience to the next, some similarities still arose. For one, the participants felt a premonition of the migraine, at which point they took medication to ward off the event. In addition, they experienced migraines as attacks from outside of themselves. The experience was verbalized as "not me," and in some ways, became something with which the migraineur had to battle. All of the participants experienced the migraine "coming on," as though from without. Specifically, Nancy reported feeling "surrounded" by the pain, as though it were outside of her. Simultaneously, however, the participants felt an embodied sense of pain as well as other physical symptoms associated with the migraine, such as light sensitivity and nausea. The pain itself was not experienced as coming from the outside like the headache, but was experienced by the participants as a direct result of the attacking migraine.

Furthermore, the participants experienced severe head pain after the premonition phase of the headache. Each participant described his or her experience of pain differently. Physical symptoms other than pain varied from participant to participant. For example, Steve and Judy's symptoms included light sensitivity, sound sensitivity, and nausea, while Nancy felt a tingling in the neck and head accompanied by visual disturbances.

In addition to premonition, embodied pain, and severe physical symptoms, each of the participants also felt limited in what they could accomplish during the migraine. Such feelings of limitation were typically work-related. The participants experienced varying degrees of limitation, but none of them became completely incapacitated. Steve continued to work during the migraine headaches, while Nancy drove home from work during a particularly severe attack.

Finally, the participants felt encapsulated in a fog or surrounded by a film during a migraine headache. They felt an inability to function efficiently or speak clearly. Nancy iterated this sensation as a "dys-fluency" in terms of her speech. She also stated that she became irrational in her thinking while in so much pain. To experience a migraine meant feeling trapped in a web of pain.

To deal with the pain, the participants tried to rid themselves of it, but these efforts led to even more pain in some cases. Judy and Nancy both gave examples of attempting self-massage of the head and neck, which only caused their pain to increase. Steve took a number of different medications throughout the day; however, the migraine pain increased with movement at work.

As a result of the pain, the participants experienced perception as a bombardment of the senses and therefore desired isolation. They yearned for darkness and quiet, as light and sound worsened the pain. Moreover, the participants felt more pain when moving. The bombardment of perception and inability to move without increasing the pain led the migraineurs to isolate themselves during the headache. For the participants in this study, the migraine made relationships with others difficult. At one point in the headache, the participants desired to further isolate themselves from others, as even speech became too difficult. For each of the participants, lying down presented an escape, a relief, and a giving-in to the migraine pain. The participants retreated to their bedrooms, closed their doors, shut the blinds, turned off the telephones, and covered their faces. For instance, in Judy's case, the only thing that was happening was the headache. The participants felt the headache drew them away from their day-to-day lives and into the bedroom, where relief rather than work or relationships became the focus. For these participants, sleep represented a retreat—a way to withdraw from the world. While the ability to withdraw gratified the subjects, they communicated a sense that the quality of sleep differed from that of normal sleep and that the migraine compelled them retreat to their rooms.

Each participant experienced resolution of the migraine differently. Judy felt both stiff and sluggish after sleeping during a migraine headache, whereas Steve felt energized with the need to work. However, all of the participants had a wonderful relief when the migraine pain finally ended, although they felt after-effects of the experience, such as exhaustion or hyperactivity. For the most part, the participants felt that the headache itself had truly ended when they experienced clarity and felt completely “normal” in terms of being pain-free and able to communicate with others or return to work.

*Steve: “The migraine is usually a very persistent dull aching pain ... As the day progresses (at work), the migraine usually gets worse ... All day long (I am) functioning and trying to do what you need to and ignore the pain ... I might pull away at about six o'clock—close my eyes, cover my head, and just sleep for an hour or so ... I functioned all day long, and it's more or less I say I won the battle.”

*Judy: “I became very light sensitive ... my neck became stiff ... I began to experience a riveting pain shooting up the base of my head and around my forehead ... I went directly to bed ... when I awoke, I felt sluggish, but my head only had a dull ache in it ... The only thing that is going on is that headache. You know, it's like my brain waves are all focused ... That headache shuts everything out. It shuts me down.”

*Nancy: “I felt my head starting to hurt ... I had no access to medication ... I felt my legs weaken as though I might faint ... I felt I wasn't able to think straight or

... speak properly, almost as though I was losing control ... I decided to leave work. ... Once home, I got into bed to try to sleep ... the medication did finally relieve my pain, but I felt completely exhausted afterwards and also had a 'numb' feeling in my head."

The Body

From the participants' experiences of migraines, various characteristics of embodiment reveal themselves. Leder's perspective that phenomenological study of the body works best when the body is in a state of disease or pain held true in the current study (Leder, 1990). In the migraine headache, a severe constriction of space and time occurred, leading to a feeling of "denseness" around the body. A dramatic reduction of "theres," or projects, and an expanded "here," or focus, on the migraine also affected the migraineurs, as the body in the migraine state became the focus of existence. The individuals no longer felt themselves able to function normally. Rather, pain and how to end it became central to existence. Thus, time and space were experienced as constricted when in the vise of the migraine. As Judy observed: "The only thing going on is that headache."

All things radiate out from the lived body in normal circumstances, however, during a migraine, ways to be free of pain primarily radiated. In Steve's case, he attempted to mask the existence of pain, but was eventually forced to succumb to the migraine, no longer able to ignore its existence. All of the participants, including Steve in his attempt to ignore the pain, took serious actions to ameliorate the symptoms of the migraine headache from near-deprivation of the senses to adherence to complicated medication regimens.

Functioning

The participants experienced the migraine as attacking the body and causing it to malfunction. During the migraine, they experienced their bodies in part as inefficient machines. As the participants perceived their bodies as a machine-like, they were experienced as subject to the rules of cause and effect. The participants named causes of the migraines and talked about ways to treat the body with medications. Their bodies, as treated and experienced as though machines, became alien to the participants. For instance, Steve started speaking in second person when talking about the early stages of a migraine headache and referred to his body as though separate from his actual self:

*Steve: "So *you* go to bed after three or four Motrin and *you* go to bed hoping *you* will sleep sound enough ... It's just part of my body chemistry I guess. My body just doesn't like alcohol for some reason" (ital. mine).

Additionally, Nancy stated overtly that she felt outside herself during a migraine:

*Nancy: "There is a feeling in a severe migraine of almost being outside of yourself."

The body, which is most one's own, became unfamiliar and unpredictable to the participants in their attempts to manage working or participating in other activities during a migraine headache.

Along with holding partially mechanistic views of their bodies, the participants utilized mechanistic language, such as speaking about the level at which they could "function." For Steve, the whole purpose of medication was to be able to force himself to function. Unlike Steve's manner of pushing himself through the migraine, Judy stated her inability to function during the headache. In terms of using the word "function" and its various derivatives, the participants communicated an understanding of their bodies as pieces of equipment.

To elaborate on the migraine as an encumbrance on functioning, each of the three participants felt a differing degree of limitation in his or her daily life activities. Although he reported not functioning at a 100% level, Steve still went to work; whereas, Judy felt completely shut down by the phenomenon. Nancy's experience was not as extreme in one direction or the other since she cited times she was not able to withdraw immediately as well as times during which she had to leave work or withdraw from her family until the headache resolved. Moreover, Steve felt a sense of resignation about the headache; he felt it was going to happen whether he was working or at home lying down. Thus, he felt he might as well go to work and accomplish something. He quantified, by percentage, his functioning level during the migraine and how much he could accomplish.

*Steve: "I take another Percocet to try to be able to make myself be able to function. That works generally enough to dull the pain so that I can generally function through the course of the day ... I can generally function through the course of the day. It just limits me to function really ... I mean, I get aggravated, because I cannot function the way I'm supposed to ... Most of the time, it is not so severe that I can't function—it's not at 100% ... All day long ... [I am] ... functioning and trying to do what you need to do, and ignore the pain ... I functioned all day long and it's more or less I say I won the battle ... Obviously, it is frustrating, because I can't do what I need to do for that day."

On the opposite end, Judy felt unable to function at all while experiencing a headache. She accepted help from others, including her disabled husband for whom she typically took care:

*Judy: "I think the biggest thing with migraine that people don't realize is that you don't function with them ... they are all bad—some are worse than others ... I bet every six weeks I got one. Every six weeks and I finally told the doctor, 'I can't function' ... I was unable to think clearly or do the simplest chore ... It's terrible ... I mean, a simple question that they (her students) needed clarification, and I couldn't do it ... At that point, I knew that I couldn't function. There were a couple times when I couldn't drive home from school."

As mentioned, Nancy's experience fell between those of Judy and Steve; Nancy felt able to handle the headache on her own and, while she gave examples of times she left work, she also presented many occasions where she felt compelled to fulfill her responsibilities.

*Nancy: "There were many times I was miserable, in pain, and certainly not able to crawl under the covers."

I imagine that the participants did not always refer to their bodies as functioning or not functioning. However, when they experienced their bodies as "broken," the participants used the mechanistic language. The participants experienced their bodies as inefficient machines vulnerable to attack, and they thought of the migraines as separate entities that attacked their vulnerable bodies. In a way the participants' separating their bodies from themselves preserved their integrity. The migraine was thus attacking a machine, not the self. In a sense, the participants felt vulnerable from the attack, but they still felt power over the migraine after its resolution. For example, Steve pointed to his ability to go to work, which contributed to his statement about having "won." Nancy, similarly, pointed to several times that she worked or participated in activities in spite of the migraine pain. In general, the migraineurs experienced the progression of the headache in terms of functioning, attack, and victory over the intruding pain.

Causes

The body, understood in part by the migraineurs as a machine during this experience, could be viewed as subject to the rules of cause and effect. All of the participants conceptualized the conditions out of which a migraine arose as the migraine's *cause*. For the most part, the individuals readily pointed to factors they construed as creating the migraines. Not all experiences are lived in terms of assigning causality, but for these participants' experiences with migraines, a sense of a specific agent as cause of the headache seemed to exist.

The participants exhibited a yearning to find causes of the migraine headaches to make sense of their experiences and, thus, find some logic or predictability. For example, the opening line of Steve's protocol read: "One of the causes for my migraines is (sic.) alcohol—only if I have not had any alcohol for several weeks." It seemed especially important to Steve to think that he knew, in a cognitive sense, what caused his headaches. Beginning his protocol with a statement of the cause of the migraine illustrates that naming a cause was foremost in his experience of migraines. Assigning cause gave him a sense of power over the migraine; to have the ability to render a detailed scenario involving the various ways alcohol caused the migraine headache provided him with the feeling that he had mastered it.

In addition, he readily spoke about other scenarios during the interview that he experienced as causing a migraine headache, including oversleeping or insufficient amounts of caffeine. However, after speaking about circumstances that he interpreted as causes, Steve admitted he still did not wholly understand the reasons his migraines occurred: "I don't understand why. That is just what occurs . . . I don't know the answer." As shown in his statement, the apparent cognitive control Steve attempted to exert did not translate into practical control. At times, a migraine occurred after the set of circumstances he described, while in other instances it did not: "And probably about 50%

of the time you will be OK the next day when you wake up—it's the other 50% when you wake up with a migraine." Steve's quantifying the number of times the migraine occurs under the given set of circumstances versus the number of times it does not occur points to the strong desire he had to try to predict migraine activity and, thus, display knowledge of what he sees as his "attacker."

Like Steve, Judy pointed to a primary cause of her migraines. The perceived cause of her migraines was interpersonal rather than chemical, however: "I would say B_ (husband) has a lot to do with my migraines." Looking at the situation from a purely logical standpoint, one might be inclined to advise that Judy reduce her stress level by hiring a nurse to care for her husband. However, hiring a caretaker, although it may have reduced Judy's migraine activity, would have meant forsaking her identity as a caretaker and assigning it to someone else. She strongly identified herself as a caretaker and thrived on responsibility for B_, although she perceived this relationship as causing her migraine headaches. This example shows a case in which the participant's meaning and role in life, her identity, entwined itself with what she construed as a major cause of the migraines. Thus, for Judy, this perceived cause of the migraine had more meaning than simply giving her the headache. .

Unlike Steve and Judy, Nancy was not as explicit in pointing to causes of her migraines and, at one point during the interview, stated: "I mean I get a headache for no reason—it just happens. It just happens." Nancy then proceeded to contradict herself by relating times she experienced the migraines as caused by a specific agent: "I do see now, after that there have been a couple times where I have gotten a very bad migraine, where heat and bright sunlight will bring it on—real heat, heat and light." Similarly, the experience she wrote about in her protocol involved an instance where she felt direct, bright sunlight and heat caused the migraine.

As Nancy believed the headaches had lacked adequate control for the majority of her life, she conceptualized them as having no cause. Although she gave at least two causes in the interview, perhaps Nancy's experience of migraines over her lifetime indicated no logical onset, appearing to occur out of nowhere and nothing. Thus, she reported a time in her life that she felt cursed and disabled by the migraines. At the point in her life during which the interview took place, she no longer regarded the migraines as a disability or a "not being able to." Instead, she felt she had some control over them and no longer concerned herself about the cause of the headaches.

In some ways, the participants spoke about and experienced the migraine in a cause-effect framework; however, when stepping back from the migraine, one can see that the agents the participants identified as causes had significant meaning within the context of their lives. For Steve, his demanding work and personal lives drove him to find causes in hope that he might stave off the headache, whereas for Judy, the perceived cause of the headache was closely tied to her identity as caretaker. While each of the participants pointed to perceived causes of the migraine headaches, these agents remained part of the participants' lives. Thus, the causes possessed more personal meaning to the individuals than simply agents that caused migraines. Using the same cause-effect model with which the migraineurs in this study conceptualized their experiences shows the problem with attempting to impose a specific cause on the incident. None of the participants would state that they *wanted* to experience a migraine headache. Therefore, in cause-effect thinking, the participants should have removed the agents. The difficulty

with this approach is that the perceived causes were not lived in purely logical terms, but were lived ambivalently. For example, in Steve's case, the alcohol was not merely a chemical entity that worked on his vascular system to cause a migraine but, instead, acted as part of the fabric of Steve's social life. What the participants identified as causes of the migraines had personal meaning to them, making them more than mere causes of headaches.

Medication

In addition to looking for causes of the headaches within their personal life experiences, the participants regarded medications in the same cause-effect framework. Again, they viewed their bodies, in part, as impacted by a chemical entity—medication. From the perspective of the participants, the alcohol (to use Steve's case) *caused* the migraine, and the medication *prevented* or cured it, thereby *fixing* the body. Furthermore, in all of the participants' experiences, medication figured prominently and became especially important when the participants felt a migraine approaching. Each of the participants possessed a complicated medication regimen to treat and/or abort an attack. In addition to the treatment, Judy and Nancy had a prophylactic regimen, as well. All three participants spoke of all the different medications they have tried and the series of medications they would take if an attack were imminent.

Steve talked about taking medication the night before he thought a migraine would begin. Yet, he did not take medication specifically to abort the attack, because it limited his ability to function at work. As a pharmacist, Steve had knowledge of all the medications that could treat migraine headaches, such as Imitrex, Maxalt, and Zomig. However, he opted for a mild anti-inflammatory agent, such as Ibuprofen, as his first line of defense. Steve chose his medications according to what would help him function at work, not what would most efficiently eliminate the migraine. He took several types of medication to treat the pain as his workday progressed. Once he finally had a chance to leave work and rest, he would take the aforementioned medications specifically designed to treat migraine headaches. For Steve, functioning at work presented greater importance than aggressive treatment of the migraine. Although he still took medication to alleviate the pain during the workday, the medications he chose did not impair his ability to work; they had no serious side-effects, such as the drowsiness or dizziness commonly associated with prescription medications specifically designed to treat migraines.

Steve admitted that he felt able to stay home from work only once in his life when he was experiencing a migraine. Staying home on this occasion was the only time he and wished to fully acknowledge that he had a migraine. Taking Imitrex, a medication that specifically targets migraine headaches, at work, would have meant acknowledging that he had a migraine. However, generally, he attempted to "ignore" the entire experience of the migraine while at work and only when he reached home did allow himself to succumb to the headache. Steve's identity as a hard-working business owner and his feeling of obligation to his employees and customers held greater importance to him than acknowledging that he suffered from migraine headaches. For business-minded Steve to fully acknowledge the experience of a migraine and allow it to overtake him indicated how difficult everyday activities could become when dealing with occurrences of severe pain.

Moreover, at one point in his life, Steve tried to use the medication Inderal as a prophylactic therapy, but the side effects of slowing metabolism bothered him enough to stop him from taking it. He preferred a limited range of functioning at work when a migraine occurred, living with migraine as a horizon, to taking prophylactic medication and constantly feeling a reduced functioning level:

*Steve: “You go to bed after three or four Motrin ... I take one Percocet and then another. Two or three hours later I take another Percocet to try to be able to make myself able to function ... I generally take a Maxalt, Zomig or Imitrex ... I actually started on Inderal for a while, but that just slowed my whole metabolism down way too much for me.”

The Inderal made Steve experience an ever-present sluggishness that did not occur if he took medication only during a migraine attack. Thus, he did not feel constantly that he was functioning at a diminished level, but only fell into a state of reduced functioning when the migraine actually occurred.

Akin to Steve’s case, Judy waited two years before telling her physician she needed medication to treat the headaches. By that point, the migraines had limited her ability to function enough to lead her to seek treatment. Perhaps, like Steve, Judy did not wish to acknowledge that something could physically impair her. She commented throughout the interview on not wanting the label of the “sick one” and that the migraine headache was not supposed to be happening.

Taking medication prophylactically for migraines forced a daily acknowledgement upon Judy that something could strike her down, a reality difficult for her to accept. At times, Judy experienced severe migraine headaches because of an inability to take abortive medication quickly enough. Like Steve, work held priority over taking migraine medication that would force her to leave her job. Ultimately, however, many times Judy had leave work because the migraine became too severe for her to deal with her students or even the fluorescent light of the classrooms.

When first diagnosed with migraine headaches, Judy still worked outside the home. At the time of the data collection, Judy was retired, and she seemed more willing to accept the fact that she needed to take medication for the migraine headaches. Judy also seemed more willing to deal with the medications’ side-effects, which included extreme drowsiness. Perhaps her willingness to take this medication during her retirement shows that functioning as a teacher was more important to her than functioning as B_’s caretaker. With her primary mode of functioning and responsibility no longer present, she may have been more willing to accept that, when she took a medication for the migraine, she would sleep for several hours.

Although during the interview, Judy explained that her migraine activity had increased at the time of this study, she did not seem as distressed as one might have imagined. On the contrary, she seemed accepting that her doctor may have to change her medication as her migraine occurrences warranted.

*Judy: “After the first experience with the migraine, the doctor put me on medication to help ... We tried three different drugs, and it didn’t work; so, they put me on Depakote ... Now I take Axert when I feel one coming on.”

Despite her claim that she did not wish to rely on medication as a panacea, she still placed her faith in the medical system for treatment.

Compared to Steve and Judy, Nancy gave the most straightforward explanation of the meaning of her medication, although she began by merely listing the various agents she has taken over the time she has struggled with migraines. She demonstrated a great deal of knowledge about her medications; however, only after reaching the current point in her life, having taken numerous medications, did she believe her migraines under control. In this way, Nancy communicated the same sense of cognitive control over migraines without the illusion of practical control that Steve possessed. She knew several facts about the medications she had taken in the past, but none of them successfully regulated her migraines. After suffering with them the entirety of her life, Nancy finally declared her migraines “controlled” with medication, calling the treatment her “freedom.” For Nancy, effective medication dispelled her of the feeling of being a victim during the migraine headaches; she had become free to exercise control over them.

In spite of her faith in medication, Nancy had taken a variety of medications that worked for a time, but then lost effectiveness. She felt this could happen again but, at the time of the study, felt relieved that her medications seemed to control her migraines. She did not express frustration at the medications losing effectiveness over time, nor did she express dread or fear that her current regimen may stop working. Instead, she focused on feeling better because of the current medication:

*Nancy: “I would take Tylenol, Advil ... by the time I was in my late 20s, I was taking Advil very frequently ... I contacted a neurologist, and he prescribed Inderal for me ... that seemed to work pretty well for me ... I was back to my Advil regimen, but in the period of the last, maybe, ten years, I have seriously and aggressively gone after migraine prevention and treatment. So, I have been through a lot of medications. I started with Inderal and Imitrex and, uh, I don't even remember ... what has worked for me right now is to use Depakote ... and I take a Midrin if I just start to get a headache; I will instantly take that Midrin ... if that doesn't work, I will take a Fiorinal and Tylenol first. If that doesn't work, which is rare, I take two Fiorinal, and then that's going to put me out.”

Nancy best summarized her feelings about medication when she said: “The freedom is in carrying the medicine in my purse.” This statement implies she felt a point during which she was not free, but held hostage by the migraine headaches. Although over the years she has taken a number of medications in differing dosages and combinations, she continued to believe that she lacked freedom before beginning her current regimen. Despite Nancy's conceptualizing her medications in simple cause-effect terms (i.e., the medication *caused* the migraine activity in her body to decrease), the medication possessed further, individualized meaning for her. While Nancy did not provide concrete examples from her past of migraine-related limitations in her freedom, she currently felt that the migraines no longer held her captive. She, instead, felt the sense of “I can,” the sense of ability, and spoke specifically about her participation in and enjoyment of life's activities.

While the other participants did not specifically address freedom as an issue related to migraine headaches, their freedom was limited by the experience in a number of ways. Neither Steve nor Judy wished to immediately acknowledge the limitations placed on them by the migraines, such as the inability to perform their duties at work. Yet, an inability to go about daily tasks implies restriction, or limitation, on personal freedom. Steve went so far as to attempt to ignore the phenomenon and continue with his normal routine during the headaches. A rare pause in the interview with Steve occurred when he was asked to reflect on limitations. After several seconds of silence, he said he did not like anything to limit him—a difficult acknowledgement for hard-working Steve. Judy appeared like Steve when she worked outside the home; she, too, did not desire to acknowledge the impact of migraines on her life. Yet, as a retiree, she more readily gave credence to the role of migraines in her life and more easily accepted their impact on her freedom. Perhaps, for Judy, the migraine had actually become her freedom as it was — the one time focused exclusively on her needs and allowed herself to tell B_ to fend for himself.

Generally, the meaning of the medications differed slightly for each participant. In Steve and Judy's cases, taking the medication represented a reluctant acknowledgement that they suffered from migraine headaches. Both participants wanted to function at their respective regular capacities at work; the side-effects of the medications, experienced as embodied phenomena, actually impaired their functioning more than the migraine itself. For Nancy, although she valued her professional identity as much as Steve and Judy, she did not hesitate to take migraine medications at work. No matter where she was, Nancy allowed herself to take medication. Out of the three participants, Nancy most easily identified herself as a migraineur; so perhaps her self-identification explains why she did not hesitate in taking of medication. Notably, none of the participants talked about treatments other than medication or wanting to try or consider other therapies. Perhaps none of the subjects ever considered alternative therapies. It is also possible that they emphasized the use of medications because of the researcher's occupation as a pharmacist or because the pharmacy was the forum for interviews during the study.

Pain

According to Leder's work titled *The Absent Body*, embodied pain reverberates through existence (1990). It changes and limits projects, tampers with relationships, and transforms goals and horizons (Leder, 1990). The body feels "thing-like," perceived in more objective terms during subjects' attempts to reduce or eliminate pain. Pain presents a different experience of being-in-the-world. Instead of focusing on surroundings or other people, the pain forces the person to concentrate on him- or herself and center on finding relief for the pain.

In *The Absent Body*, Leder further posits that embodied experiences are, by nature, difficult to describe, as individuals experience typically experience the body as absent from themselves (1990). As Leder explains, a phenomenological perspective can be used more easily to analyze the body when the body is in a state of pain (1990). To bring in details of the current study as related to Leder's hypotheses, the pain of the headache—the experience's paramount feature—seemed difficult for participants to describe in explicitly declarative statements. However, participants could still relate their

experiences by using metaphors and examples of the pain's social, personal, and professional impact on them. The nature of the pain seemed to vary from one participant to the next, with Judy—the only non-lifetime sufferer—providing the clearest descriptions of the experience. However, the pain, no matter what form it took, comprised the key component of the migraine experience. Relieving the pain motivated all of the participants' actions during the migraine headache.

Out of the three subjects in the current study, Steve had the most difficult time describing the pain and trying to convey verbally the feelings he experiences:

*Steve: "It's almost like a numbness on the one side of your head. For me, it's always on the right side of the head (gesturing). I've got that dull, aching pain ... as I move around it becomes more severe. There's almost, like, a funny feeling on this side (gestures) of my head ... it's almost a numbness."

Steve said he tried to ignore the migraine pain throughout the day, which seemed difficult considering the pain compelled him to find the reasons behind it and ways to ameliorate it. Perhaps Steve's self-proclaimed high pain tolerance led the migraine pain to recede somewhat over time. However, although Steve tried to ignore the pain and said he had a high tolerance for it, he could not ultimately tolerate it and felt forced to give in and rest. Additionally, in his ignoring the pain, Steve also wished to push aside the whole experience of the migraine. He wanted to proceed with his workday as though nothing would impede him from continued accomplishment of his goals. However, at one point in the interview, he admitted to an instance during which he had to acknowledge the migraine was limiting him and rested. Possibly, Steve was trying to "ignore pain" on another level. As shown in the data, he gave very little information about his personal life, centering primarily on the facts of his migraine experience. Therefore, the researcher can only speculate on his possibly ignoring interpersonal pain. Steve presented himself throughout the research process as a non-reflective person who did not always take time to consider the impact of his actions on others. For example, he had never thought about, or simply refrained from verbalizing in the interview, the impact of his migraines on his family. Perhaps, Steve was similarly non-reflective regarding his own feelings; he might be ignoring another kind of pain.

Judy's experience of migraine pain differed markedly from Steve's experience. In the beginning of and during the migraine, she felt a stiffness in her neck. Sound exacerbated the pain; Judy described it as "piercing." In addition, she referred to experiencing light as "harsh." Judy said she felt as if sharp knife was piercing through her forehead. Judy communicated the experience of the migraine pain as if it directly attacked her, centering on her forehead:

*Judy: "I would just feel a sharp pain when it first starts—just more like a stiff neck ... I began to experience a riveting pain shooting up the base of my head and around to my forehead ... piercing, I mean, my head just felt like it was going to explode ... the pain was like a sharp knife penetrating between my eyes and through my head ... It felt like someone hit me with a two-by-four. My head just ached for a couple days ... Bending over, walking, or even talking made the pain

worse ... The pain goes up the base of my neck, up my head, and then seems to center right in between my eyes; it's like a knife going right through it."

Judy's migraine experience began and ended with feeling of stiffness, but she did not immediately identify the stiff neck as the precursor of the migraine headache. In a sense, the migraine held her stiff and still, and forced her to focus on herself rather than attending to others. Judy experienced the migraine as grabbing her and holding on to her. However, she tried to hold herself more stiffly in an attempt to "will" the migraine away.

On the contrary, Steve and Nancy complained of a more generalized ache. Nancy could not give as striking a description of the embodied pain as Judy; however, she still related a sense of the unpleasant nature of her experience. As Nancy explained: "It didn't hurt in one spot, but was a general ache ... it was just a surrounding feeling of pain ... my head was pounding ... my head felt like it was going to explode." However, Nancy gave clearer descriptions of the headache pain she experienced when younger:

*Nancy: "By the time I was in middle school or junior high school and in high school, I had the type of pain that I felt if I stuck my finger back behind my right eye and then another in my temple and they intersected, that would be the point of pain. And it would travel in a pattern around my head."

Perhaps, due to its nature, that type of pain was easier for Nancy to describe. Nancy did not provide much information about the type of pain that she experienced at this stage of her life. She said only that it was a surrounding feeling, and the pain of the migraine was "miserable."

As shown in the cases presented, complexity characterizes the idea of the body in pain. Each of the participants described the pain of the migraine in different ways and with different levels of severity. For example, Steve felt a numbing sensation, while Judy felt a sharp piercing; Nancy simply described her head as aching and the pain as surrounding her. The word "pain" did not quite capture the experience of the participants; perhaps this word has an overly simplistic or generic connotation that fails to reflect the experiences described by migraineurs. Perhaps the all-embracing nature of the migraine (i.e., its involvement of the senses and movement in addition to pain) made it such a powerful experience. None of the participants went so far as to say that the migraine incurred the worst pain of their lives. Yet, the sense of the migraine as a holistic experience echoed throughout their existences, as reflected most specifically in Judy's description. Moreover, during the headache, ameliorating the pain became the primary motivation of the migraineurs. Each subject wished to free him- or herself from it and did everything possible to create a pain-free existence. All participants answered this "affective, compulsory call" of pain (Leder, 1990, p. 73).

Notably, the pain did not render the participants completely incapacitated. Steve still worked. At the current point in her life, Judy gave herself the freedom to retreat to the bedroom but, at one time, she, too, stayed at work. Nancy tried to stay at work and ultimately drove herself home when she could no longer work through the pain. Although the intense pain of the migraine typically limited individuals, the participants did not appear crippled by the experience. Unlike chronic (unending) embodied pain, the migraineurs knew the pain would end at some point—and end in predictable fashion for

these participants. For instance, Steve, in some ways, looked forward to the euphoria he knew he would experience at the migraine's resolution. Perhaps the knowledge that the pain would end contributed to the migraineurs' ability to work through it.

Eigenwelt

The self pole, or *eigenwelt*, of the participants can be explored in terms of sense of self, confrontation of existence, reactions to the migraine, the relationship between stress and migraine occurrences, impairment of perception (fog), and control over the headache. Exploring limitations on the participants' existences in terms of this category deepens understanding of the self.

Sense of Self

Steve, Judy, and Nancy exhibited different experiences of themselves. Yet, they all saw themselves as capable and able to manage stress and responsibility. The migraine had an impact on each of the participants' views of the self in terms of capability and stress management.

Steve communicated the sense that during a migraine headache his body became alien to him. As shown, he spoke at length about his functioning level throughout the interview. He used the second person when discussing his experience with migraine pain, presenting the entity of the body as separate from the entity of the self:

*Steve: "So *you* go to bed after three or four Motrin, and *you* go to bed hoping *you* will sleep sound enough ... it's the other 50% when *you* wake up with a migraine" (ital. mine). He went on to say: "It's just my body chemistry, I guess . . . my body just doesn't like alcohol."

As demonstrated by his statements, Steve's life did not appear drastically affected by the existence of migraine headaches, but he did have a different view of himself when experiencing one. While he continually tried to ignore the pain, in a way, his attention kept returning to the migraine throughout the day at work. He felt frustrated and aggravated by the limitations and less efficient level of functioning during a migraine.

Like Steve, Nancy had experienced migraines since childhood. However, contrary to him, Nancy identified strongly as a migraineur, although she viewed her headaches as under control at the time of the interview. Nancy's sense of self, in part, was defined by the migraine: "I was like, well here it is—this is me." She did not attempt to deny the headaches' role in her existence.

Yet, of all the participants, Judy's sense of self seems to have undergone the most dramatic impact due to the existence of migraines. When Judy experienced a migraine, she felt her identity changed. Accustomed to caring for others, Judy became the person taken care of during a migraine. This role-reversal distressed her:

*Judy: "It's taking away from me precious time that I need to be doing for others ... I blame me—it's like suck it up ... 'what's wrong with you—are you being a wimp or what!' ... you have to be ... [hard on yourself] ... I want to do it ... it's very traumatic. I don't want to be sick; I'm not supposed to be ... I was the

strong one in the family and, in my mind, I'm letting everybody down ... I'm not supposed to be in bed ... I'm upset with myself, and I feel as though I'm letting other people down ... my life changes when I have a migraine, and I can't focus ... that was a real blow that something could attack me ... that is devastating, because I can't change the fact that I get a migraine ... it is very traumatic."

Judy thought of herself as a "fixer upper" and blamed herself for not having the ability to rid herself of the migraine. Thus, Judy's life and identity changed when she had a migraine headache. She felt herself a let-down to others and experienced feelings of inferiority. In addition, she gave herself no sympathy:

*Judy: "When I'm experiencing a migraine, to me, this is not supposed to be happening ... while I'm having a migraine, I'm not able to do the things I have to do ... that headache shuts everything out. It shuts me down."

For Nancy and Steve, the migraine phenomenon had a high level of familiarity, along with a relatively predictable set of surrounding circumstances. Both participants had suffered with migraines since childhood and never recalled life without headaches. Judy, however, had not suffered with migraines since youth; thus, she could remember a headache-free period in her life. She compared and contrasted her life and self-perception before and after the onset of the migraines. As Steve and Nancy did not have this frame of reference, the meaning of the migraines within the context of their lives differed for them.

Another way that the participants experienced themselves differently during a migraine headache, surfaced in their feeling of diminished responsibility. While suffering with a migraine, they found themselves able to step back from their demanding lives. Typically, the participants thought of themselves as able people who did not typically shirk responsibility. During a migraine, however, each of them felt a sense of entitlement to a respite. For example, Steve felt that the migraine entitled him to the limited amount of personal time he had at home. When he had a migraine, Steve's small children stayed away from him and let him rest. Perhaps, Steve experienced similar demands from both his family and his co-workers and, at times, needed a reprieve from personal and professional obligations.

Along the same lines, the personal stress Judy encountered in dealing with B_ and trying to keep a peaceful home was worse than the pain of a migraine headache. While the migraine headaches devastated Judy, she felt a sense of relief when she permitted herself to tell her husband to "fend for himself" for a bit. Judy explicitly stated that she got migraines because she needed to sleep. For Judy, the terrible pain of a migraine, which she likened to a thief robbing her of her identity, actually became preferable, at times, to her usual existence.

Like Judy, Nancy gave herself liberties in the cases of migraine. Nancy found herself in situations at work during which she excused herself from duties. Only in a migraine situation would Nancy have walked away from a student or allowed herself to admit to a parent in a meeting that she did not feel well. She did not speak at length about her family; however, from the way Nancy presented herself, it did not appear that

she would have removed herself from her family under normal circumstances. However, in a migraine situation, she felt entitled to personal time.

In short, the existence of migraines in the subjects' lives had an impact on their self-concepts in terms of dealing with stress and responsibility. All of the participants had unique feelings about their migraines, and it appeared that the length of time a participant had suffered with migraines affected these feelings. Judy was the most dramatically impacted and had the strongest feelings about the migraines, while Steve and Nancy more readily accepted the phenomenon. Nancy even went so far as to say that she was beyond worrying about them, implying that at one time in her life migraines impacted her more significantly.

Confrontation of Existence

Confronting existence reflects dealing with limitations on individual identity, as caretaker, business owner, etc. Physical symptoms such as nausea and pain led the participants to confront anew their previously well-determined roles. Limitation on existence leads individuals to face the death of their previous identity or their ultimate and unavoidable mortality.

One symptom that forced the participants to confront their existence was nausea. Judy and Steve both experienced this symptom—a sickening feeling, a feeling in which the afflicted person does not wish to take anything into the body. Nausea possesses a practical implication for migraine sufferers—the inability to retain medication in the stomach long enough for its digestion, as Judy pointed out in her interview.

Nausea can also be examined in terms of humans' becoming nauseous not only when experiencing certain illnesses, but also when undergoing overwhelming situations. The existential literary character Roquentin, the protagonist in Jean-Paul Sartre's novel Nausea, reaches a point at which he realizes his freedom and his concomitant responsibility, and this realization brings about the sickening feeling. The overwhelming sense of freedom and anxiety when confronting his own existence creates the conditions out of which Roquentin's nausea arises. Like Roquentin, the migraineurs had to confront their own existences during the headache. Their roles in life and their very being came into question and were limited by the experience.

Although only Judy and Steve dealt with nausea, all three participants confronted their existences in the migraine situation. Judy gave the most compelling example of confronting of existence in her explanation that not only did she feel traumatized and devastated by the experience she, in turn, lost a sense of her identity. When she had a migraine, she no longer possessed the ability to retain the position of caretaker or "fixer upper," as she knew herself to be. If she could no longer act as a caretaker, she did not know what would make up her identity. In the migraine experience, she thus confronted her identity and existence as tied to performing the necessary functions of caretaker.

Like Judy, Steve so strongly identified with his work, that he had taken only one day off due to migraines, although he had suffered with them his whole working life. The idea of any limitation on his existence represented a death to Steve. He tried to flee the limitation by continuing to work but, despite his efforts, the migraine impeded his ability to work. As in Judy's case, if Steve were not working, he would not know how to exist; thus, he felt compelled to continue regular work activity though the migraine.

In contrast, Nancy did not experience nausea during her headaches; yet, she similarly confronted her own existence. In her experience, Nancy felt outside of herself, unable to conduct herself in a familiar roles, such as in parent-teacher meetings. Her diminished ability to communicate thus made her feel limited in her capacity to assume her normal identity. Furthermore, in the one example of a migraine, she described having explicitly confronted death. During this particularly severe migraine, Nancy talked about contemplating what a stroke or aneurism would feel like. Yet, because of the intense pain, she quickly dismissed these thoughts as irrational. Even so, although she tried to push aside her thoughts, she still confronted the possibility of the ultimate limit of her existence—death.

Reactions to the Migraine

The participants not only saw themselves differently during a migraine experience, but also had feelings and reactions related to the headache itself. For instance, Steve reported that he did not feel panicky when he felt a migraine coming, because he knew what to expect: “I guess I have just learned to live with it, so it’s not like, ‘Oh my God, I’m going to have a migraine.’” However, he did express frustration due to the migraine’s limiting effects on his day-to-day activities, and did not like the feeling of giving in to it. He additionally reported feeling aggravated by the experience. In spite of these feelings of limitation and frustration, Steve still felt an overall sense that he had conquered the migraine and experienced a sense of euphoria when it resolved. Steve also felt victorious against the migraine in terms of his ability to accomplish work during the day. He felt stronger having gone through the experience, although it frustrated him when it occurred. Steve stated: “Obviously, yeah ... [it is frustrating] ... because I can’t do what I need to do for that day.” Yet, once the migraine ended, a sense of euphoria prevailed.

Different from Steve, Judy felt suffering from migraines an injustice; but, like Steve, she experienced frustration by the severe limitations on her activity brought on by the migraine. As Judy explained: “When I’m experiencing a migraine, to me, this is not supposed to be happening.” She labeled the migraine a “thief” who robbed her of her existence that “tak[es] away . . . precious time that I need to be doing for others.” In a reactive effort to will the migraine away, she tried to fight against the migraine by holding herself stiff.

At the time of the data collection, Nancy was not worrying about her headaches. At one point in her life, she felt frustrated by them and thought of the migraines as a disability or a curse, like Judy’s feeling of injustice. Although she sometimes panicked due to a feeling of “dys-fluency” or an inability to speak clearly, Nancy currently felt an overall sense of control over her migraines: “This is me ... I’m beyond that (getting frustrated), because if I’m 50, almost 51, years old and I don’t remember not having a headache, I don’t worry about it any more ... I’m getting my life back ... I don’t have to worry any more.” In addition to this newfound sense of control, Nancy covered the feeling of panic and tried to work through the migraine:

*Nancy: “You do NOT have to live your life that way. Because I thought you did. You don’t have to. I’m getting my life back.”

For all participants, the migraine came and went, but always presented an ongoing threat. It changed the way the participants took up their bodies and their choices. The focus shifted from an “I can” to an “I cannot” stance. The migraine severely limited their activities, but each of the participants dealt with this differently. The experience had the most radical effect on Judy whose very existence appeared to be at stake.. The migraine stole her identity—her role as B_’s caretaker. On the contrary, Steve and Nancy identified themselves as migraine sufferers, but they had lost the sense of worry, panic, anger, or frustration about the headaches. At certain points in their lives, some of those feelings existed; for example, Nancy, at one time, thought of the migraines as a disability and a curse. Yet, at time this study was conducted, Steve and Nancy seemed to accept the experience and the limitations that came with it.

Stress

Stress figured prominently in the lives of the migraineurs, each conceptualizing it similarly. All three participants led what they defined as stressful lives, filled with responsibility, commitments, and time constraints; however, none of them seemed to see the full extent to which they participated in their own stress. None of the participants saw viable ways to reduce stress in their lives and did not state a desire to do so. Rather, Steve, Judy, and Nancy appeared proud of the amount of stress and responsibility in their lives and seemed uninterested in making lifestyle changes to reduce it. The migraineurs viewed the stress as primarily interpersonal, as they held the conviction that all people must maintain activity and responsibility. Additionally, stress generally arose when they encountered situations they could not control, illustrating the internal component of the stress through their feelings of responsibility for disharmonious relationships in their lives.

The central feature of stress the participants described comprised an interpersonal phenomenon, specifically affecting them during periods of prolonged stress. The amount and types of responsibilities they had influenced their levels of interpersonal stress. As mentioned, the participants were active, responsible individuals who, in turn, believed that all people should be active and responsible. They put pressure on themselves to succeed professionally and personally, while remaining giving toward others. The migraine limited their abilities to act as the high-functioning individuals they identified themselves. Limitation on activity affected each of the participants differently; yet, only during a migraine did they allow themselves to rest and put aside their responsibilities. Perhaps, the constant high-stress existence made them more likely to experience migraines, as they would not otherwise take a respite.

In Steve’s case, stress occurred primarily at work, where stress the interpersonal component of stress entailed encountering a situation he could not control or a person behaving in an unexpected manner. Steve gave an example of stress that included a long day throughout which he acted in a decision-making capacity over a long period. Along those lines, he had to handle a number of issues relating to a problematic employee who had acted in an unexpected way in the workplace. Steve commented that he did not have a chance to have any personal time to reflect on the difficult decisions he had to make, especially those regarding the fate of the problem employee (referred to as J_).

While the bulk of Steve’s stress occurred in the workplace, Judy deemed her interpersonal stress the greatest at home in her relationship with her disabled husband.

*Judy: "...I found that I would get a migraine when there was a great level of stress at home ... There are nights we don't sleep and, when there is stress, I can feel one coming on ... Stress is a very large—it's very high in my life because of B_."

Her specific pinpointing of B_ as a major stressor reflects the ever-present nature of stress in her life. Her husband is always in the house, needing care. Thus, Judy never seems to experience personal time.

Although the stress Judy and Steve described was of an interpersonal nature, both thought of stress as an internal phenomenon. As Steve iterated: "There is an anticipation and build up then it's basically, it's resolved and you have a let down, but it's just that internal stress all day long." Moreover, they assumed all of the responsibility for disharmonious relationships in their lives. Judy states: "Verbally, this is not working, and this is not the way it should be, and I hold everything in. I don't have an outlet ... but I do keep it in." During a migraine headache, though, they allowed themselves to be less attentive toward others to an extent. In a migraine situation, Steve and Judy somewhat abandoned the stressful interpersonal situations in their lives by withdrawing and focusing on ridding themselves of the migraine.

Notably, the migraineurs did not feel the headache a "choiceful" experience. Therefore, Steve and Judy found the migraine an acceptable outlet for stress. When feeling well, none of them would feel it acceptable to ask for help, take a break from work, or tell others that they had to assume responsibility for themselves. During a migraine, though, they walked away from others and the stress that others brought them, because the migraine left them no choice.

Fog

Perceptually, the participants experienced a lack of clarity during the migraine headache. Judy and Nancy described this sensation as being in a fog or surrounded by a film. Perhaps, the haziness of this phenomenon contributed to the participants' difficulty in describing it; the migraine was lived in a fog.

Each participant provided a different, but equally uncertain description of the fogginess. Steve described the phenomenon in terms of memory loss: "I do lose short-term memory ... something I started to do, I'll stop and say, 'What was I doing?'" Judy brought up "fog" specifically: "It would almost be like a fog around me ... I would have like a cloud around me—it was like I was looking out of a fog ... It does seem very foggy. It's almost like a film closes in around me." Finally, Nancy explained:

*Nancy: "There is a fuzziness ... I could barely get my thoughts together in a clear sense ... I wasn't speaking fluently, in my opinion ... It was just maybe a 'dys-fluency' in my speech. I felt like my tongue was thick ... and fuzziness ... not being clear ... I just started fuzzing out so fast ... fuzzy stuff ... when that is gone, then I'm in the clear."

Each of the three cases emphasized loss of clarity in terms of feeling confusion, fogginess, or fuzziness.

Generally, the mind was experienced as unclear, with a film around it. For these three participants, this aspect of the migraine troubled them most. Each of them required clear-headedness for their jobs and valued clarity of thought and speech. The researcher perceived all of the participants as clear and straightforward; thus, the lack of clarity must have been difficult for them to manage and accept.

Control

Each of the participants held an interest in control in their lives in general and, specifically, with regard to their migraines. They spoke explicitly about controlling the migraine headaches, but also implied a desire for control in other areas of their lives, as well.

For instance, Steve hated the feeling of submissiveness to the migraine:

*Steve: "It's more or less giving in . . . so you know it's what you inevitably have to do . . . I'm not used to giving in to anything." Although he eventually went to sleep in the early evening, he still felt that he controlled the migraine, because he could still work. As he stated: "I still feel I have won, because I functioned all day long. It's more or less I say I won the battle; I got through the day and got 90% or 80% or 70% of what I needed to get done."

There was the feeling from Steve that he took the migraine with him to work; he would not allow the migraine to keep him from working.

As previously mentioned, Steve felt a sense of cognitive control over the migraines by knowing the details of what he considered causes. However, this cognitive control did not always translate into practical control. Steve did not truly have the level of control over the migraines he thought he did.

*Steve: "If I laid down in the morning, it still doesn't go away until eight o'clock at night, nine o'clock at night; no matter what I do, I'm going to have that migraine until nine o'clock at night . . . even when I can sneak away from (workplace), but it almost seems worthless, because it doesn't go away."

In his experience, cognitive understanding of what created the conditions for the migraine headaches placed him in control of them. He wanted to control the migraine through understanding and analyzing it, but he continued to experience migraines in the same way he has for many years.

Judy, similarly, did not like the idea of losing control, as since she was her husband's primary caretaker, wholly responsible for his well-being and the household. However, Judy reached a breaking point where she needed a rest from the responsibilities. She explained: "Sometimes I get them because of B_ and sometimes I just need to sleep." Judy attempted to philosophize about the migraines' controlling her, but still expressed frustration over their occurrence:

*Judy: "A long time ago, I learned there is only one constant in life, and that is change. And either you accept it and move on, or you are left behind; and I learned that with my husband. I have a migraine, and I can't control the situation

... to me, that is devastating, because I can't change the fact that I get a migraine."

The migraine headache represented the one area in her life over which she felt diminished control. Judy felt that she able to handle other difficult life circumstances, like having to help B_ perform simple tasks like dressing, but could not exercise control over the migraine headache.

At this point in her life, although Nancy did not like the idea of losing control, she felt a sense of freedom in her belief that she had mastered the migraines. Nancy felt that her constant and aggressive seeking of treatment for the headaches would control the migraine activity in her life:

*Nancy: "At 50 years old, I finally feel my headaches are under control ... until a couple years ago, I felt this was a disability handicap I would be cursed with for the remainder of my life ... I'm a person that needs to have the control all the time. I mean, I have a job with a lot of responsibility; I am also a musician in my church, and I can't not be there ... there's a lot of people that depend on me to do a lot of things."

Additionally, in Nancy's protocol, she talked about feeling quite fearful during the migraine experience she described, due to the sense that she would lose control by fainting. Nancy stated: "That was a time I was very, very fearful ... I have only had this one situation where I felt that my knees were rubber bands. And that scared me."

For these participants, the migraines were lived as both being-in-control and being-out-of-control. The participants saw the migraine as an opportunity to demonstrate that they could control the experience to a certain degree, holding a power in the migraine situation that they did not otherwise feel—the power to say "no" to the demands of their lives. The migraine represented the only opportunity the participants experienced as acceptable to take personal time. Yet, at the same time, the migraine was lived as being-out-of-control. In experiencing the migraine as an attack from outside of themselves, the participants did not feel able to control the pain; Steve tried to ignore it, and Judy attempted to will it away. The participants would not choose to live in a state of limitation, but continued to experience it during the migraine headache.

Mitwelt

The *mitwelt*, or social pole of the life world of the participants, was affected by the migraine headaches. A sense of isolation pervaded their experiences, closing them off from relationships with others while believing that others knew of their illness.

Isolation

The participants lived the migraine headache as an isolating event. The migraine drew the person into the self and the focus of being became the pain of the headache. The participants experienced interaction with others as painful and, therefore, they limited and avoided it. At some points during a migraine experience, the participants

experienced an inability to answer another person's question. As Judy explained of one specific migraine: "That time I was like, don't ask, don't talk." At other points, the participants tried their best to get through interacting with others, so that they could simply rest. Steve said: "If anything, it's just quiet ... it's just that I'm quieter." Relating to people, an everyday aspect of life, became much more difficult during a migraine.

Although migraines isolated the participants, they also further isolated themselves. As Nancy explained: "I take care of it—I remove myself until it's taken care of, and then I will rejoin them (the family) ... If you got the flu or cold, you're going to step back a little bit ... I excused myself from the student, saying my head was pounding." As a way to ameliorate pain and to find solitude, they went into a further state of isolation, covering their faces and retreating to dark bedrooms. Steve stated: "With just everything on my mind, I just never had time to catch up on what happened. I literally have very little personal time, so it's my need to have personal time; and I guess everyone is entitled to a little bit ... I get quiet." Steve, as well as the other participants, wanted other people in their lives to leave them alone. Judy described becoming somewhat hostile:

*Judy: "I do become short and curt, and it's just like, 'Leave me alone' ... when I had a migraine, I would go home, tell my husband and my dad (when my dad was living and he was still then), you guys have to fend, I'm going to bed ... I went directly to bed—explaining to my husband and dad that I could not stay up."

All three participants communicated the necessity of "stepping back" from others to help bring an end to the pain. The pain made talking and relating difficult.

Yet, from a different perspective, the isolation did not represent a totally negative experience. The isolation presented itself as a way to take a rest from life and weaken ties to others. For Judy, it took something as drastic as the pain of a migraine to pull her away from caring for her husband without feeling guilty about it. Specifically, she said in the interview that one of the reasons she got migraines was because she needed to sleep. The migraine was the one time in the participants' lives that they could abdicate responsibilities, focus solely on themselves, and not have to attend to anything or any one else. The participants viewed the isolation as temporary and took it up, therefore, as a relief. If it the pain were permanent, individuals would deem it a much more frightening experience.

In the case of migraine, one aspect of isolation was choice. The participants chose to remove themselves from personal contact and returned when they felt able. The migraine afforded them time they typically did not have to care about nothing except the headache. The participants led busy, stress-filled lives, crowded by people and demands. During a migraine, though, they felt they did not have to attend to anyone but themselves. For each of the participants, it seemed too difficult to simply take a day off or take a rest. They seemed to need an excuse, such as the extreme pain of a migraine, to have respite. For example, even Nancy's volunteer activity, singing in her church's music group, appeared stressful and demanding. She felt that, due to her commitment to the group, she must attend church services, even if experiencing a migraine. The participants felt the constant need to be busy and functioning and did not usually feel entitled to personal

time. Choosing isolation during extreme migraine pain gave the participants the time they craved along with a viable excuse to take this time.

For busy, responsible people like the three participants, the migraine headaches impinged on all aspects of their lives. The participants unanimously communicated a sense that they “should be” functioning at a high level at all times. The migraine signified a loss of this “should” or “ought to” attitude. For example, Judy felt that she “should be” B_’s sole caretaker and refused to accept help from others who would have gladly offered her some relief. She conceptualized taking care of B_ as her job, her responsibility, belonging to her alone. However, during a migraine headache, she told B_ to fend for himself. She said she did not feel good about doing this and, at times, felt guilty that he had to assist her. However, during a migraine episode, she found it in her to let go of the “should” attitude and take care of her own needs.

Relating to the Other

Other people in the participants’ lives played only a minor role in Steve, Judy, and Nancy’s experiences of migraine headache. As shown, relating to other people often made the headache worse. When asked about the impact on others, the participants answered by expressing discomfort with the knowledge that other people could “see” the headache.

*Judy: “And I can recall just staring at them, and one of my little boys just put his hand on mine and said, ‘You aren’t all right, are you?’ I remember just staring and thinking, ‘I have to say something,’ but I was afraid if I said something, I was going to cry.”

Judy’s explanation of this incident with her sixth-grade boys gave a sense that the headache drew her away from the world and others, and in toward herself. Steve’s dialogue provided a similar theme:

*Steve: *(When asked for clarification on relationships with others.)* “I don’t know, I think that the only thing that happens is I get—I’m obviously a hyperactive individual and very vocal and, if anything, I get more quiet ...and people know that I have a migraine, because I turn white ... I mean, when you talk about family and friends and everything, they can tell that I have a migraine. They know what I’m going to do by now, so they just more or less just clear out.”

Likewise, Nancy’s interview communicated the sentiment that others could “see” her illness:

*Nancy: “I think any time you are not feeling well whether it is a migraine or whatever, people can see it—they can’t see a headache, but they can see how the headache is affecting you. They can see the expression on your face—the fact that you are ... that you are not well. They can see your complexion or coloring change.”

Although the participants wished to avoid other people, others still existed.. Through their avoidance of others, they still participated in the *mitwelt* by acknowledging others' existence.

All of the participants said that others around them knew that they were experiencing a headache. Because of a history of suffering with headaches, all of their family members knew to stay away from the migraineurs, as neither the family members nor any others could help. Even without a migraine, it seemed that the participants focused on themselves and how they were while relating to others. For example, Steve and Judy's definition of stress as an interpersonal phenomenon experienced it as internal. The stress arose, in part, because Steve and Judy seemed to take on almost all of the responsibility for harmony in their relationships. During a migraine, the participants could no longer assume responsibility for their relationships running smoothly; their family members had to "fend," as Judy put it.

For Steve and Judy, others' unpredictable behavior brought about stress in their lives. Steve talked more about relationships with his co-workers than his family members; his example of stress centered on his inability to predict or control the behavior of an employee. One stressful day, Steve had to deal with a problem employee. He defended the employee, who had acted unacceptably and unpredictably, to his business partner and attempted to allow the employee to retain his job. Similarly, Judy felt wholly responsible for her husband's happiness and always wanted to maintain a peaceful home environment. She did not feel that she had any control over this circumstance, including her husband's sometimes paranoid or erratic behavior, and felt responsible for "keeping an even keel" at home. Steve and Judy thus felt total responsibility for disharmony in their respective homes and workplaces, even if the disharmony arose due to others' unpredictable behavior.

In addition, Steve's conceptualization of people changed when he had a migraine; he viewed other in terms of their ability to see his pain. The people in his life left him alone when he had a headache, because they could see it affecting him. He never had to explain himself to those who knew him. Moreover, Steve pointed out that he did not treat the people in his life nastily; he simply became quiet—the opposite of his typical personality. He felt the migraines simply part of the life he led, and he did not hurt or affect others by this part of his existence. He reported that the migraines have lessened over the years, but others around him still knew what to expect when he did have a migraine.

However, when asked directive questions that made him reflect on his experience, Steve came to realize that perhaps his migraines did impact on others in his life. He saw that he only spent two or three hours with his family in the evenings; thus, lying in bed with a migraine at six o'clock in the evening, took away from his time with his family. However, Steve's admission that he had very little personal time and his feeling of entitlement to sleep for an hour or two during a migraine showed his need to justify taking that time. Steve appeared had not to have considered any of this until the moment of the interview, a detail that speaks to the isolating, self-absorbing nature of the migraine.

Furthermore, during a migraine, others' voices were regarded as demands for the participants. Another person's voice demanded an answer from the migraineur, an answer he or she could not give. For example, Judy could not communicate with the

sixth-grade students who asked her a simple question. Whereas, Nancy described and experienced an inability to communicate effectively—a dys-fluency—during a meeting with parents. Steve said he became quiet during a migraine. All of the participants wished to be surrounded by quietness and a quieting of their relationships. As a result, the migraineurs did not seek out community or relationships. Rather, they isolated themselves from others and experienced people as a burden. Nancy removed herself from her family; Judy told those who need her that they needed to fend for themselves; and Steve’s children “cleared out” of his area. Others could not help the migraineur, for whom relationships with others became painful.

Although the participants had a number of relationships in their lives, they did not seem to have reflected much on the impact of the migraine on these relationships. Steve came to some insights over the course of the interview, but presented them though it had never occurred to him that his migraines could have an impact on the other people in his life, including his young children. Nancy, on the contrary, flatly stated that the migraines had no impact whatsoever on her family, despite her position as the only participant to discuss apologizing to others for her lack of mental presence. Notably, both her apologies to people occurred in a professional setting. Perhaps, Nancy assumed that her family would understand her absence during a migraine, but in front of co-workers or students, became concerned with keeping a certain professional image of as “capable.” From the migraineurs’ descriptions of interpersonal relationships during the migraine, the participants seemed to wish not to reflect on the nature of the experience. The migraines produces so much pain and the participants felt such a relief when they resolved that the subjects had little interest in thinking or reflecting on ways the migraines impacted others.

Only Judy, the sole participant to speak at length about a specific family member, saw an impact on her husband, but she tended to focus on her own feelings and experiences. She did not speculate on how B__ might feel if she could not care for him, but instead talked about the migraine robbing her of her job as his caretaker. Judy said B_ realized occasionally that he, in part, caused her migraines, but the realization made him feel worse due to his senses of guilt and responsibility. She felt as though she had no outlet for her stress and, while she may have wanted to express anger toward B_ , she saw no point. She would have liked to confront reality by expressing her anger directly, but did not want him to feel worse about himself. Moreover, Judy said that B_ expressed sympathy toward “the migraine,” but not necessarily toward her. Judy may have phrased her comment this way for several reasons. For one, she appeared to experience the migraine as a separate entity and could not accept sympathy given to her; or perhaps B_ saw the migraine as separate from Judy because, as she reported, he did not like to see her being sick. The migraine experience and Judy’s relationship with her husband spawned problems of determining interpersonal impact and responsibility, managing stress, and acting in reversed roles.

From the comments in her interview, Judy appeared to resent B_ in some ways. She clearly showed frustration when speaking about him. For one, she said he caused her a great deal of stress by becoming upset so easily. Judy, in response, did everything she could for him to keep a sense of peace and calm in the household. In return for her efforts, she lost her freedom, endured sleepless nights, and engaged in irrational arguments. His illness forced her to give up a job that she loved, and he only expressed

appreciation for her sacrifice and work during his clear moments. In these rare lucid moments, however, B_'s appreciation came with feelings of guilt and responsibility for Judy's unhappiness. Therefore, Judy could not accept or enjoy this appreciation, because she hurt for B_ when he had these insights.

Furthermore, in addition to blaming B_ for the migraines in terms of stress and responsibility for his moods, Judy blamed B_ because the migraine became her only retreat. In a way, the migraines provided the only times Judy could express her frustration at B_. Judy did not feel as if she chose to have migraines; thus, although the migraine gave her a retreat from the relationship and its responsibilities, she also saw it as a form of punishment. The painfulness of the experience was punishing, and Judy additionally punished herself by believing she was "a wimp" for becoming unable to function during a migraine. The extremity of Judy's need to escape the demands of her relationship surfaced in her regarding a painful experience as both retreat and punishment for needing to retreat.

Nancy, who simply stated that she saw no impact on those around her when she had a migraine headache, merely removed herself from family situations and rejoined them when she had taken care of the headache. Nancy felt that the migraines would have an impact on others if she were a "drama queen," and became overly demonstrative of her pain. However, since that was not her personality, the migraine had no impact on her family. Nancy did not see that, perhaps, her absence affected others. She had no interest in accepting or soliciting help from others, not wanting to bother her co-workers. Moreover, Nancy reported that she would not *allow* the migraines to have an impact on her family. She did not see that although she still attended a football game with her family while suffering from a migraine, she might still have affected those around her. I imagine that if I attended an event with a family member suffering from a migraine headache, that migraine would have an impact on my experience of the game as well as the other's experience. Nancy did not see that the importance of her presence was defined not only in terms of a physical presence, but her social participation as well.

Steve and Nancy have suffered with migraines for many years, thus they felt that family members and others around them knew what to expect. Part of the expectation was that the migraine sufferer was not going to be able to fully participate in family relationships or activities while experiencing a migraine. To the participants, therefore, there must not have been an impact on the family since it was not a surprise to those around them that they had to withdraw and take care of the migraine.

*Steve: "I'm obviously a hyperactive individual and very vocal and if anything I get more quiet and people know that I have a migraine because I turn white . . . it's just quiet – I don't get belligerent. I mean they just know that something is the matter with me and that 'he's not his normal self.' I'm sure it impacts me and them in some ways, but not in a dramatic fashion of any kind. I guess it impacts them in some way because for me to take two hours in the middle of the day to lay down and cover my face up and sleep . . . It's just that I'm not responsive to them as I normally am. I mean when you talk about family and friends and everything, they can tell that I have a migraine. They know what I'm going to do by now, so they just more or less just clear out . . . and it's not that I have ever been mean to any of them."

*Judy: “They are very sympathetic toward me. B_ doesn’t like seeing me sick. I’m his caregiver and when I’m down, that’s when I do become short and curt and it’s just like, ‘Leave me alone’ . . . B_ is sympathetic toward the migraine.”

*Nancy: “I think any time you are not feeling well whether it is a migraine or whatever, people can see it – they can’t see a headache, but they can see how the headache is affecting you. They can see the expression on your face – the fact that you are not . . . that you are not well. They can see your complexion or coloring change.”

Steve was the only participant to not mention a relationship with a doctor. Steve appeared to be trying to treat the migraine headaches on his own, mentioning nothing of discussing his condition with another health care professional. Perhaps for Steve, seeking medical treatment and being given a diagnosis would have been an acknowledgement of a limitation that he was unwilling to accept. Nancy was the strongest in her opinion of her current doctor saying that he was very sympathetic and accommodating toward her. Judy, almost as a last resort after suffering with migraines for two years, asked her doctor for medication on an ongoing basis

The participants lived the migraines alone. The migraineur focused almost exclusively on his or herself as she attempted to relieve herself of the pain. However, human beings can not escape the *mitwelt*, so even by avoiding other people, others figured into the experience of the migraine headache.

Umwelt

The participants not only desired isolation from the people around them, but from the world (*umwelt*) as well. They wanted to shield themselves from light, sound, and movement. Judy, for instance, did not even want the family dog near her because the dog’s movement on the bed made the headache worse. The telephone also became problematic, as the ringing sound turned into an ear-piercing experience for her. For Judy, nothing was happening except the headache, and all perception seemed to exacerbate the headache pain. While the other participants did not phrase their feelings as strongly, they still communicated a sense that the migraine was first and foremost in their experiences, even if they could work through it or sit through a football game during the migraine.

Movement

The diminished feeling of “I can” during the migraine experience surfaced in the participants’ desire for stillness of body and surroundings. Reaching out and touching something or walking forward in the world represents an outward movement. During a migraine, this outward movement was limited in that it caused pain for the participants.

Action, in turn, was limited, as the person attempted to retreat from the world of sights, sounds, and people that exacerbated the pain. For example, Steve and Judy both made specific points about movement in the workplace worsening the pain. Steve stated:

“As I move around during the course of the day, it gets worse.” Perhaps the movements they experienced came in the form of demands from other people, such as customers or co-workers for Steve and children in the classroom for Judy. Judy alluded to this idea in her statement: “I couldn’t stand the kids in the classroom. The slightest movement . . . the slightest sound or movement just compounded my headache . . .” The complexion of all action and interaction was changed during a migraine experience. What the participants normally took for granted, such as movement or perception, became problematic during the migraine.

Photophobia and Phonophobia

The three participants experienced photophobia (avoidance of light) and phonophobia (avoidance of sound), classic symptoms of migraine headaches. All three participants experienced light sensitivity, but Judy had the most dramatic visual disturbances, including seeing floaters and flashing lights.

*Judy: “I became very light headed . . . I became very light sensitive . . . I even experienced ‘floaters’—light spots ‘dancing’ in front of me . . . it’s mostly my eyes . . . I became very nauseous.”

Nancy’s sensitivity to light was not as severe as Judy’s; Nancy stated: “I do see now, after that there have been a couple times where I have gotten a very bad migraine where heat and bright sunlight will bring it on. Real heat, heat and light.” Light sensitivity thus occurs in varying degrees depending on the individual migraineur’s experiences.

Furthermore, sounds in the world also presented a problem for migraine sufferers. Judy’s reaction to the telephone ringing provided the most striking example of this phenomenon. When she heard the ring of the telephone, she described the sound as “piercing.” She reported wanting to smash the telephone, a rare expression of anger or violence on Judy’s part. Due to the extremity of her sound-sensitivity, Judy learned to turn the telephone off when she had a migraine. The telephone ringing represented more than a sound; the telephone indicated an implicit demand from another person, as another person at the other end of the telephone must logically exist. Shutting off the telephone was another way Judy isolated herself during the headache experience.

Generally, migraines debilitated the sufferers in this study on all levels. Regardless of the circumstances out of which the migraine arises or the specific context or environment in which the participants found themselves, the migraine arrested them. Perception became experienced a bombardment during the headache.

Sleep

During a migraine headache, the migraineur wished to retreat from the world to a dark, quiet space to sleep. When one covers the face and lies down, relationships with other people or the world become impossible. The participants seemed to desire this goal of shutting-off from others and the world. Once withdrawing from the day or circumstance, each of the participants felt the need to sleep. Most of the time, the headache was resolved by the time the person awoke, although the individuals examined in this study experienced some after-effects.

The participants withdrew from all responsibilities in their lives to shut themselves in their rooms,—closing the doors, shutting the blinds or drapes, and pulling the covers over their heads. Steve, for one, covered his head with his pillow, while Judy wore a mask over her eyes to keep out the light. The participants sought total isolation and sensory deprivation, wanting to rest from the world they experienced as bombardment. Steve described the ways in which he isolated himself during a migraine:

*Steve: “They (his children) know daddy will be fine if he gets two hours of sleep ... I might pull away at about six o’clock—close my eyes, cover my head and, you know, just sleep for an hour or so; and generally by eight o’clock that night the migraine is gone. You know, you just go straight to the bedroom, turn the lights off and close the door, and put whatever, the pillow—but then, I’m also tired. You go to bed hoping you will sleep sound enough (before a migraine occurs), and probably about 50% of the time you will be OK the next day when you wake up. I just sleep for an hour or so and, generally, by eight o’clock that night the migraine is gone.”

Judy delineated her experience of isolating herself rather differently; although, like Steve, she wanted to sleep, she did not try to quantify the effects of her sensory deprivation efforts on the migraine:

*Judy: “At times, I get them because of him (the husband); at other times, I just want to sleep ... Once I got home, I remember just looking at him, and I said, ‘I have to get undressed and go to bed’ ... that’s hard for me going to my bedroom, closing the door, closing the window ... I’m going to bed ... I would close my door, close the drapes ... put a mask on—pillow over my ears ... the pill put me to sleep for about four hours ... the Axert knocks me out. Now the good thing is, when I wake up, I don’t have a migraine any more.”

Nancy also tried to remove herself from the world of the bright sunlight, retreating to an air-conditioned, shaded car in an effort to relieve herself of the pain. She did not wish to remain in the pain-producing light that worsened her migraine. Eventually, the pain and light sensitivity forced to go home to her dark bedroom to sleep: “Once home, I got into bed to try to sleep.” All three participants found sleep and sensory deprivation, a blocking-out of the *umwelt*, as a solace.

While the migraine took away the participant’s abilities to perceive, move, or relate to others without pain, the migraineurs ultimately sought the isolation and stillness of sleep. The migraine pushed the participants toward isolation, but they also craved it to find relief.

Time

The migraine experience had a sense of a linear temporal structure comprised of a premonition phase, a headache phase, and an aftermath. However, in a way, the migraine was never truly over for the participants, as it always loomed as a possibility. As the

experience was lived as both a temporal unfolding and an ongoing experience, I will refer to two different types of migraine: the living-through a migraine and the living-with a migraine. Living-through migraine emphasized the experience of each distinct headache, while living-with migraine represented the time when the migraine floats on the horizon.

Premonition

In terms of the living-through a migraine, each of the participants experienced a period before the headache pain began, during which a sensation or feeling that something was not right prevailed. Steve described this experience in the following way:

*Steve: "I can generally tell by the time I go to bed that I am possibly going to have a migraine ... it's almost like I have a dull ... numbness on one side of your head."

*Judy: "At first my eyes become very sensitive. I would just feel a sharp pain when it first starts—just more like a stiff neck."

*Nancy: "I felt my head starting to hurt ... I have had the type of sensation when it feels almost like fingers crawling up the back of my neck."

This premonition period represented a crucial point to each of the participants, as it was the opportunity to take medication to abort the migraine. They still had a sense that they could control the migraine headache at this stage by possibly stopping it with medication. For example, Steve typically had the feeling he would develop a migraine headache the night before it happened; thus, he took medication and tried to get a good night's sleep as preventive measures.

*Steve: "So you go to bed after three or four Motrin, and you go to bed hoping you will sleep sound enough; and probably about 50% of the time you will be OK the next day when you wake up—it's the other 50% when you wake up with a migraine."

Steve did not communicate the sense of urgency about taking medication to abort the migraines as Judy and Nancy did. He appeared to have a familiar routine, and did not seem very disturbed by the possibility of having a migraine headache the next day. Migraines had played a part in his life for so long, he did not seem to perceive them as something over which to become distressed.

Even though as the interview progressed, Steve indicated a conceptualization of the headache as a foe that he had conquered, he did not communicate this feeling of preparing for battle in the premonition phase of the headache. Instead, he described a routine that he followed, without deep questioning of whether it actually worked or how well. After the headache, he commented that he had "won the battle," because of his ability to function. Therefore, Steve did conceive of the migraine as an opponent whom he fight; his language made it appear that his nonchalant taking of a few Motrin and hoping for sound sleep was not part of preparing to battle the headache.

Unlike Steve's feeling of numbness or dullness on one side of his head, Judy experienced a stiffness in her neck at the premonition phase of the migraine. After her coming to the realization that she was going to have a migraine and that her neck was not stiff for another reason, Judy took medication: "If I couldn't get a pill in me once a migraine starts . . . once it started, it came on me." At first, although Judy had experienced several migraine headaches, she did not immediately think of the migraine as the reason for her stiff neck. The sensation in her neck forced Judy to find a reason for its existence. She could not ignore the stiff neck, as human beings have a difficult time ignoring any pain. Judy then experienced a moment that she realized that the stiff neck was occurring due to an upcoming migraine. She then felt an urgency to take medication immediately to abort the attack. Just as with Steve, Judy experienced the migraine as an attack that came upon her from the outside.

Judy had suffered with migraines for seven years up to the time of the interview; thus, it seemed surprising that she would not automatically connect the migraine with her neck stiffness. Perhaps, in profoundly not wanting to have a migraine, she grasped for other reasons for the neck sensation. Eventually, she came to terms with the fact that the migraine was about to occur and moved quickly to counteract it by taking her medication. At the point in her life at which the interview occurred, Judy diligently took her medication at the first signs of a migraine. The medication Judy took put her to sleep, which she admitted needing at times.

For Nancy, the premonition phase did not last very long. When she began to feel the slightest hint of pain, she took her medication to prevent the headache. Nancy would not let the pain last for more than five minutes before taking medication: "Maybe a slight tingling pain. And not in a particular area, but I know it's the precursor of a headache; so if I get that Midrin, I'm good . . . If I don't take medication immediately, at the very first twinge of pain, it is too late." Nancy came across as the most realistic of all the participants about the impending migraine. She did not want to experience a migraine, but instantly accepted its imminence and took immediate action.

Notably, none of the participants described a feeling of dread or anxiety about the upcoming migraine. Each of them had experienced migraines for long enough that they knew what to expect. However, they supplied no explicit feelings about the experience that would follow. The participants tried to avoid the attack by taking medication or sleeping, but did not appear to have any feelings about the migraine as it began to materialize. Moreover, the participants would not plan ahead for a migraine experience. For example, Steve did not say that he would call one of his employees to help him at work if expecting a migraine the next day. No feeling of anxiety arose among the participants regarding the migraine's impact on family members, work, or other events in the participants' lives. For example, Judy did not worry about B_'s doctor's appointment that day; she simply rescheduled it. Under non-headache circumstances, she would not have rescheduled the appointment but, during a migraine, Judy allowed herself to focus on her own needs.

The Headache

In the overview at the beginning of the Results section, I gave a detailed explication of participants' experiences during a migraine. The story flowed in a linear temporal fashion, starting with the participants' beginning to feel the migraine coming

and then moving into the migraine itself. During this latter period, they stated experiencing migraine symptoms, such as severe head pain, photophobia, phonophobia, nausea, and paresthesia. This phase typically ended with the participants' retreat from the world to sleep.

Resolution

Disagreement arose among the participants regarding the point at which the living-through the migraine ended; the migraine continued to impact the participants once the pain ended. Directly after the headache, the participants indicated a sense that something still did not feel normal, and did not feel that the entire experience had reached completion until all embodied feelings and sensations from the migraine disappeared. In this way, the participants themselves constructed the end of the headache. It was not simply an objective fact that the migraine ended when the pain ended. The experience went beyond the end of the pain, and the story of the headache's conclusion differed for each participant.

For Steve, a sense of euphoria occurred after the migraine ceased. Steve felt "hyper," indicating a desire to accomplish numerous tasks because he had not functioned at a high level throughout the day.

*Steve: "Actually it's almost like the opposite (of feeling exhausted)—it's a feeling of euphoria because you got through it, and now it's night time ...it never gets resolved during the ... I have a difficult time going to sleep—now it's almost like my body is over compensating; so now I'm, like, a little bit hyper."

Part of the familiar experience of the migraine was that in twenty hours, the headache would end. The pain may have been excruciating, but a future horizon was that the migraine would end with a sense of euphoria. Steve summarized the end of the migraine experience by saying the whole scenario "works" for him: "Even if I take off in the middle of the day to sleep for an hour, it just doesn't work. Even if I can get home at six o'clock at night, it seems to make the whole thing work for me – it seems to work for me." However, if one assumes that Steve did not want to experience migraine headaches, the whole scenario was not "working" for him. He continued to experience migraine headaches. The scenario must have worked in the sense of his obtaining time to take a rest and feeling an inability to make the choice to rest on non-migraine days.

In Judy's experience, she felt simultaneously stiff and sluggish at the end of a migraine. Judy attributed the stiff feeling to her holding herself tightly during the migraine to will it away. The stiffness that Judy felt was reminiscent of the migraine itself insofar as it made movement more painful. Her physical soreness after the migraine pain ending indicates that Judy's stiffness had meaning beyond her merely having sore muscles. Perhaps, she felt stiff or frozen in her life. Judy seemed to have few viable choices due to her husband's illness, which forced her to retire from a job she loved and accept that her life partner possessed debilitating physical and mental conditions. Judy strongly identified herself as B_'s caretaker; yet, the choice to take on this identity did not reside with her. Judy's stiffness could relate to her self-criticism—being "hard on herself"—for the existence of migraines in her life, thinking herself a

“wimp” that should “suck it up.” Perhaps the stiffness somatically manifested this self-flagellation, or “hardness.”

Judy’s sluggishness after a migraine seemed opposite of the stiffness. However, the sluggishness resulted from the medication she took to ameliorate the pain. For Judy, sluggishness meant a mental slowing. Judy experienced stiffness in her body, but sluggishness in her mind:

*Judy: “I’m very sore after I have one. I think I have myself so stiff and trying to be so still and almost trying to will it away ... but I get really stiff, because I’m so sore after ... when I awoke, I felt sluggish ... I’m very sluggish after a migraine ... I’m stiff, I’m sluggish. It’s almost as if, like, everything has been drained from me. It’s like a battle. It’s like I’ve been fighting, and I haven’t won the war yet.”

Judy communicated an implicit sense of relief at the resolution of the migraine, but she focused more on the after-effects of the medication than Steve, who focused on feeling euphoria and energy at the resolution of his migraines. Rather than experiencing hyperactivity, Judy’s after-effects centered on stiffness and sluggishness. Still, she communicated a sense of relief—similar to Steve’s—at the conclusion of her migraine.

Like Judy’s physical stiffness and mental sluggishness, Nancy felt a lack of clarity that continued past the end of the migraine experience. She did not consider the migraine completely over until she felt her typical sense of clear headedness:

*Nancy: “The migraine lasts about 24 hours. I wish I could describe what it feels like when that numb feeling goes away, because that’s when the migraine is over. I mean the pain is over, but I don’t consider everything over until I feel perfectly clear and normal again.”

Nancy, like Judy had an implicit sense of relief, different from Steve’s feeling of pronounced euphoria. Perhaps Judy and Nancy’s shifts from a state of pain to a state of comparative wellness was not as radical as Steve’s. He seemed very energized at the resolution of the migraine, whereas the other participants seemed relieved on a more implicit level. Judy and Nancy did not say they felt euphoric, energized, or “hyper.” Perhaps, Steve actually looked forward to this phase of the experience and, thus, emphasized it. Steve appeared as an energetic individual possibly seeking that euphoric feeling.

Judy and Nancy may also not have experienced such a pronounced shift, because they might have had better control of their pain. Steve took a variety of different medications, but none of them seemed to control the pain very effectively. Otherwise, he would not have consistently resigned himself to taking his fourth or fifth lines of medications. In his general overview of the headache experience, Steve discussed taking the same course of medication, despite its ineffectiveness. Judy and Nancy more diligently took their medications when needed as well as prophylactically; thus, the pain they experienced may not have the same level of severity as Steve’s even though Judy described the pain in more vivid detail than he. Steve and Judy considered the migraine over when they finished experiencing all pain; however, Nancy did not declare the

migraine ended until she felt her clarity fully restored. In a way, the migraine never ended for the participants, making it stand out from other experiences.

Episode

The notion of “episode” requires examination with regard to migraine headaches. In a way, the migraine never ended for the participants, it was a living-with the headache. There was the constant anticipation of another migraine occurring. The participants experienced living-with the migraine past having lived-through a migraine. This horizon existed in the medication that Nancy carried in her purse and in the glass of beer that Steve drank during a stressful business meeting. The medication was more than a bottle of capsules; it was Nancy’s freedom from the constant possibility of another migraine. The person may have exited the fog of a migraine, but the fog still loomed in the distance.

A horizon of one migraine comprised past and future migraines, and gave context and meaning to the present migraine. The migraineur’s focus centered on the pain accompanied by a future-orientated conceptualization of the pain’s end. The past remained only implicit in the participants’ expectations regarding the headache’s resolution. They knew that within a certain time-frame, proved through prior experiences, the horrible pain would cease and a great relief would replace it.

Preliminary Findings

Preliminary findings described in this section are based on the researcher’s preconceptions regarding the research process and the migraine experience. The overall results and more complete formulations of ideas warrant a detailed examination, such as that given in the Discussion. However, at the time I began analyzing the data, I started to formulate findings within the context of several preconceptions. This preliminary analysis reveals these preconceptions as they arose during data analysis and idea formulation.

1. *Preconception:* I believed finding participants would be easy, based on the number of people suffering from migraine headaches as well as the location of the study. Further, I thought migraine sufferers would eagerly share their experiences to help others.

Finding: Finding participants was difficult; it took four months to find three participants to give a complete set of data. Few individuals responded to the solicitation for participants. When I spoke with potential participants, they did not seem to understand the study's purpose. Two participants gave sparse protocols and did not return for the interview process. Overall, the process of finding participants proved difficult, time-consuming, and frustrating.

The problem with finding participants may have arisen from the experience of migraine as isolating. Perhaps migraine sufferers did not wish to revisit their experiences of migraines or did not see the value explaining those experiences as helpful to others. Another possibility for the difficulty could have come from the trying to verbalize an experience that resisted description through language.

Overall, the experience of pain seemed difficult to express in language, and it appeared that an additional difficulty in verbalizing migraines, as they are such an isolating experience.

2. *Preconception:* The pain could be difficult to put into words, but would stand out to a person more than if the body was functioning normally. Furthermore, I believed the protocols would provide dramatic description of the overall experience and effects of the pain.

Finding: I collected some good descriptions, but they did not provide the compelling depictions of pain I had hypothesized. Some protocols gave a list of the usual progression of a migraine headache. Steve and Nancy, who gave less compelling descriptions than Judy of migraine headache, had both suffered from

migraines since childhood. Yet, Judy, who had only suffered from migraines over the last decade, provided the most vivid description of migraine. Perhaps this occurred because the migraines were relatively newer experiences to her than to the other participants. The experience of migraine for Steve and Nancy seemed to have receded into the background. A dys-appearance of dys-function, contrary to what Leder proposes, surfaced; possibly, when the body subject experiences dys-function over an extended period, the experience is not as accessible to phenomenological research, because it dys-appears in to the background of experience.

3. *Preconception:* I assumed that participants would answer the research question by giving one example of a migraine.

Finding: Two of the participants gave one example of a migraine headache in response to the research question, while the third participant did not. During the interview process, the participants talked more about the experience in general rather than reflecting on the single incident of migraine they gave in their protocols. For instance, Judy and Nancy gave one example in answer to the research question, but then filled out their descriptions in the interview by linking other experiences of migraine. In both the protocol and the interview, Steve reported on “what generally” happened to him during a migraine headache.

In general, it appears that the participants’ histories with migraines held importance to them. When asked to explain a single incident; it was difficult to define or give meaning to the single incident recorded in the protocol without

linking other experiences to it. Prior experiences with migraines gave meaning to each individual migraine. Each of the migraines did not function as a discrete incident, but instead became part of the overall meaning of the individual's existence as a "migraine sufferer."

4. *Preconception*: I assumed that the temporal structure to the experience of the migraine headache would include a beginning, middle and resolution.

Finding: When the participants gave a single example, they described the migraine as having a beginning, middle, and end. The participants did not reach a consensus on the characteristics of each phase or when one phase ended and another began. For example, Steve considered the migraine to end when the pain ended; however, Judy considered the migraine over when she stopped feeling pain and her head cleared. A discussion of the participants' numerous commonalities regarding the middle of the experience appears in the Discussion section.

In addition to seeing a temporal progression made up of a beginning, middle, and end to the migraine, I found that, in a way, the migraines never ceased to exist for the participants. Another migraine presented a constant horizon for the participants—a looming threat of pain. As the migraine experience became enmeshed with conceptualizations of future headaches, the migraine's temporal structure did not possess strict linearity; it did not begin and end in a punctuated, definitive moment. Thus, the participants lived with the migraine even when the individual experiences ended.

5. *Preconception*: I assumed a meaningful relationship would exist among the constituents of the life world for the migraine headache. I also assumed that the participants would be able to describe the aspects of the life world easily—if not on their own, after my prompting.

Finding: The migraine had an impact on and an interrelationship with all constituents of the life world, even if the participants were not explicitly focusing on each constituent. The migraine was an isolating experience that had an effect on all elements of the life world. The participants drew back into themselves and did not consider how the migraines affected other aspects of their life worlds. Thus, the migraines had an impact on the *eigenwelt*, or self-pole, insofar as they changed the way the participants thought about themselves. The participants all experienced different levels of ability to verbalize explicitly and specifically how the migraines affected each of them.

Overall, the participants did not see how migraines involved the people surrounding their life worlds. Due to the isolating nature of the experience, they did not appear to consider the effects of their absence on others. Judy, for instance, spoke about her concern over losing her ability to care for her disabled husband when experiencing a migraine, but primarily focused on her own caretaking role in that relationship and how that role changed.

Finally, the participants focused on the *umwelt* in terms of their desire to retreat from the world, as perception was experienced as an attack or bombardment. The participants wanted to close themselves off from the sights and sounds of the world, an illustration of the recurring theme of isolation that

surfaces again in a discussion of the participants' relation to the *umwelt*. It was difficult to separate the findings into discrete categories, however, because all of the constituents of the life world were interrelated in the migraine experience.

6. *Preconception*: I assumed that the individuals would feel embattled.

Finding: The participants felt embattled and challenged by the migraine, experienced in part as coming toward them from the outside. In a way, the migraine was experienced as “not me,” but as a foreign entity against which to fight. The migraineurs exhibited a sense of pride in their ability to get through the experience—Steve and Nancy markedly so.

Although the participants expected to feel embattled from their previous experiences, they did not show a sense of panic or bracing for an impending fight—a surprising finding. I expected the participants would dread the thought of a migraine and experience a sense of panic, fear, or anxiety when expecting one. Instead, the participants resorted to their routines of dealing with the migraine headache and, at differing points depending on the participant, knew they would have to give in and go to sleep. Steve most explicitly discussed the concept of battling the migraine, saying at the point in the migraine when he gave in, he still felt as though he had defeated it, as the migraine did not completely incapacitate him.

7. *Preconception:* I assumed that the participants would conduct an exhaustive search for relief from the migraine headaches in the form of medication or other therapeutic techniques such as relaxation exercises or other measures.

Finding: The participants engaged in a strong search for relief from the excruciating pain of the migraine. In talking about forms of relief, the participants focused primarily on medications, providing comprehensive lists of medications that they have taken in the past or were taking at the time of the study. The focus on medications could have been due to the importance of them in relieving pain or because the participants viewed the researcher primarily as a pharmacist and not a psychological researcher. Additionally, the interviews took place in a pharmacy. The participants talked about other ways they sought relief, including massaging the neck, sleeping, isolating themselves from the world, and finding a dark, quiet place to rest.

8. *Preconception:* I assumed the participants would discuss stress and how the existence of the migraine adds stress to their lives.

Finding: All participants expressed pride in the amount and levels of stress they could handle and each discussed different levels of the effects of stress on the migraines. Surprisingly, the participants did not reveal a great deal about how the existence of migraines could add to the stress in their lives. Nancy, for example, said that she no longer worried about or became frustrated by them.

9. *Preconception:* I thought that the issue of control would figure prominently in the experience of the migraine headaches. I believed the participants would be looking for more control in their lives and, specifically, that they would try to find ways to control the migraine headaches.

Finding: Participants desired control over their lives, even in the face of the migraine, which for most of them was experienced as an out-of-control feeling of pain. Although they knew on a cognitive level that once a migraine began they had to wait until it ended, they continued to take a range of measures to rid themselves of the pain, such as massaging the neck, trying to will the migraine away, or going to an air-conditioned car.

In general, the participants wanted to control and handle the headache by themselves. Steve and Nancy seemed especially unwilling to accept help. Only Judy would accept a bit of help by taking a ride home from work and having her husband help her with her clothes. Overall, the participants were very active individuals, not used to significant rest or personal time. They all possessed an “ought to” attitude, accompanied by the feeling that many others in their lives depended on them.

Discussion

The structure of the Discussion section examines the themes of the body, *eigenwelt*, *mitwelt*, *umwelt*, and time in much the same pattern as the Illustrated General Structure. However, organization according to these themes does not imply that all points presented under a given theme fit into that category and no other. The structure provided in this section is a tool to manage the data.

The Body

As the migraine headache has been presented primarily as an embodied phenomenon throughout the study, this topic presents a starting point at which to begin discussion. According to Husserl (1962), the body is experienced directly, and has and is a relationship to the world. In concert with Husserl's idea, Buytendijk (1974) deems that the body is most a person's own and experience would not exist without it. Additionally, as seen in Leder's (1990) work, the inescapable presence of the body recedes into the background during normal experience. Leder (1990), however, further contended that the body bears phenomenological investigation more fully in a disease state or in pain than under circumstances of relative physical and mental health.

The current study upheld Leder's contention; the participants more easily described their bodies as they were lived during the migraine headache than under non-migraine circumstances. To comprehend more fully the implications of the current study, a return to the literature aids in examination of the current study's data and its claims regarding the body and embodiment. Examination of the body in terms of its phenomenological position as a null point, the concept of dys-appearance, the

Heideggerian ideas of the body as ready-to-hand and present-at-hand, its perception as machine, and pain as an embodied phenomenon provides the backbone for understanding the body during migraines.

The Body as Null Point

Husserl wrote extensively about the body, which he described as the “lived body,” or *leib*. Husserl’s conceptualization of the body as “null point” works well within the context of this study. As a null point of existence, the body retains its absence in the midst of perception. All experience radiates from the body (Leder, 1990, p.13). Husserl contends that the body is a “spatial-temporal ‘thing’ around which is grouped an unlimitedly extending surrounding world of things, and that “all which is in the lived body appears relative to the lived body” (Husserl, 1970, p. 13). Thus, the body is the null point, an absolute “here” with “theres” arrayed around it (Leder, 1990, p. 13). Normally, an unlimited number of possibilities or “theres” surround the body; whereas, in a migraine headache, the “theres” become severely constricted. The participants in the study focused primarily, although not fully, on the headache pain and how to rid themselves of it. While still able to work or interact with others in some cases, the migraine limited the possibilities they experienced. The null point became magnified—no longer absent—in the case of the participants’ migraine headaches. As a result, the participants experienced constriction of space and time, and reflected on the body thematically in terms of projects afoot in their lives.

During the migraine, the participants experienced a constricted sense of both space and time, creating “denseness” around the null point. With respect to space, the

participants experienced an amplified sense of the “hereness” of the physical place. Light, sound, and movement proved painful; thus, the participants desired to stay still and placed themselves in states of virtual sensory deprivation. Regarding time, the participants focused primarily, although not exclusively, on the present and the pain of the migraine. The past only held importance insofar as prior experiences provided context and ground for the current headache. Moreover, the future was conceptualized in relation to the time of the migraine’s cessation. Overall, however, the null point did not retain the absent character to which Husserl refers, as the participants became drawn into the here and now of the pain due to its effects on their bodies. Judy summarized this constriction most succinctly: “The only thing going on is that headache . . . that headache shuts everything out. It shuts me down.” Possibilities continued to exist outside the migraine headache during its course; however, a sense of severe limitation of experience surrounded the null point of the body.

As mentioned, the individual typically experiences the null point of the body as absent. However, in a state of disease, the body becomes an object of thematic reflection. In a healthy state, all projects radiate out from the body, and the body is passed over without significant reflection on its functioning. While this theory continued to hold up in a migraine situation, in terms of space and time, those projects became severely limited and constricted around the here and now of the null point.

Dys-Appearance

In accordance with Husserl’s conception of the null point, Leder contends that human beings experience absences, or ways in which the body escapes itself under

normal circumstances. Although the body acts as the mode through which the world comes into being, it normally fades into the background of existence (Leder, 1990). This absence presents a paradox for Leder, as the body becomes at once absent and the human being's most inescapable presence. The body is not usually a thematic object of experience; however, the body can and does appear to human beings in a "dys" mode, such as a disease state or in physical pain. He calls this phenomenon as "dys-appearance" (Leder, 1990, p.5). In a "dys," or dysfunctional, mode, the body begins to surface as a central component of experience and more easily lends itself to phenomenological study.

A migraine headache exemplifies Leder's "dys-appearance" phenomenon. During the migraine, the body became present to the participants, individuals who did not usually reflect on their bodies. On a typical non-migraine day, the participants proceeded with their projects, relationships, and goals. However, while suffering from the migraine headache, the participants changed their perspective to focus intently on their bodies; their bodies thus "dys-appeared." Steve could no longer attend to his duties at the pharmacy he runs; Judy had difficulty with simple tasks, such as removing her clothes when in such pain. The pain of the migraine made the participants aware of their bodies' functioning when in a state of extreme discomfort.

Leder's contention, although it holds up rather well under the current study, shows signs of oversimplification upon further scrutiny of participants' cases and the contexts out of which their migraines arose. For two of the participants—Steve and Nancy, lifetime migraine sufferers—the state of pain in the form of migraines began to recede into the background of their experiences. Leder points out that all pain or disease

processes “dys-appear”; however, for Steve and Nancy, the migraine experience itself also receded, to an extent. Steve could work through his migraines; Nancy stopped worrying about them. Both participants knew what to expect and adjusted their activity levels or dosages of medication accordingly. Judy’s experience of migraine, on the contrary, was a more recent phenomenon; Leder’s point applies more accurately to her case. Judy felt traumatized and devastated by the experience; whereas, Nancy’s lack of worry and Steve’s attempt to ignore pain showed a greater level of acclimation to it. For the latter two participants, over a lifetime of experience with migraine headaches, the migraines receded more and more into the background. In the “dys” mode of the migraine, headache (or dysfunction) had itself become absent. It is not that Steve and Nancy remained unaffected by the migraine pain; they simply did not experience the same level of impact as Judy, for whom the experience of migraine arose less than a decade ago from the date of this study. To use Leder’s term, Judy’s migraines “dys-appear” to a greater extent than Steve’s or Nancy’s.

Despite its hint of oversimplification, Leder’s concept of “dys-appearance” remained helpful in the attempt to arrive at a phenomenological understanding of the body in a disease state. However, the results of the current study show that when the “dys” mode becomes part of normal existence, the body does not “dys-appear” as easily. Rather, the body in pain was experienced differently with different lived meanings for each participant.

Ready-to-Hand and Present-at-Hand

Another conceptualization of the body in a disease process comes from Heidegger’s 1962 work *Being and Time*, a critical examination of science and

philosophy. Heidegger (1962) presents two ways of seeing the world, which he calls ready-to-hand and present-at-hand. These concepts provide a useful critical perspective for the present inquiry, as they interpret the body in terms of a tool for experience of the world and relation to others, and what happens to individual experience when the body falls prey to disease.

In a ready-to-hand state, the body functions normally and is used as a tool for the individual to experience the world and relate to others (Gelvin, 1989, p.61). Husserl's (1970) and Leder's (1990) respective conceptualizations of null point and "dys-appearance" reinforce Heidegger's assertion that the subject possesses no awareness of his or her own body when it functions in a normal (i.e., non-diseased) state. In a ready-to-hand state, the body is not the focus of an individual's existence. The person owns the body and its ability to act within and upon the world. Relationships, work, and other life activities are carried out with little or no attention given to the body.

However, when the individual experiences a physical problem and cannot function normally, such as during migraine headache, the body becomes present-at-hand, —an object of reflection and inquiry. At the point where a problem or a disease process exists, the individual can no longer use the body in the same fashion as under non-disease circumstances. Thus, as shown in the Results section of this study, the participants began to view their bodies as independent of their control. The participants focused on ways to rid themselves of the pain, or "fix" their broken bodies, through medication, massage, or sleep. In addition, they reflected on their present-at-hand bodies as impacting and limiting their projects and relationships—Steve could no longer work at full capacity,

Judy could no longer teach. The participants took up their bodies as malfunctioning during the migraine.

Heidegger's (1962) concept of ready-to-hand and present-at-hand relates, in a similar fashion, to Husserl's (1970) null point and Leder's (1990) "dys-appearance." The ideas these thinkers present build on each other to create a profound understanding of the participants' experiences of their bodies during a migraine headache. In accordance with points made in Heidegger's, Husserl's, and Leder's thought, the participants became aware of their bodies and conceived of them as separate entities when experiencing a migraine headache.

The Body as Machine

Building on the above framework of understanding the body, the participants took up their bodies as machine-like during the migraine headache, supporting Heidegger's (1962) definition of the present-at-hand body. Participants understood the body-machine as broken through communicating an understanding of it in terms of cause and effect. If the body were a mechanical entity, rules of cause and effect would apply. Steve, for example, believed that the alcohol (a perceived cause) brought on the effect (migraine). Other phenomena are not experienced in the simple cause-effect manner through which participants interpreted the migraine. In the case of the migraine, all three participants pointed to causative agents for the headaches and reflected, in seemingly simple terms, on which agents seemed to bring on the migraine and which seemed to cure it. As the participants primarily took up their bodies as material, the rules of cause and effect on the

bodies were, in turn, experienced more directly by the participants than under normal circumstances.

Although, during the migraine, the participants experienced their bodies as malfunctioning machines and spoke about cause and effect relationships, they infused the headaches with meaning. Upon examination of the factors the participants labeled as causative, the agents appeared to possess meaning beyond causes of migraines. To refer again to the first sentence of Steve's protocol, he pointed to alcohol as a cause of his migraines. When questioned about his use of alcohol, Steve discussed the social component of drinking in terms of sharing a drink with his business partner at a meeting or with friends at a party. Despite Steve's understanding of alcohol as a cause of his migraines imparting a direct affect on his physical body, the alcohol also held significant meaning as part of his social life. He wove it into the fabric of communing with friends and making business decisions. As the alcohol seemed to cause his migraines from his perspective, one would wonder why Steve continued to consume it. Yet, the alcohol's inextricable integration into his social existence—professional and personal—reflects the difficulty of eliminating the alleged causative agent from the individual's life experiences.

Along with the cause-effect conceptualization of the body involved in understanding it as a machine, the participants frequently used the word "function" to describe the level of performance at which their bodies were "working." For the participants, the word "function" became associated with a diminished capacity to work or participate in their worlds. Steve, for example, discussed his functioning level consistently throughout his data.

*Steve: “I took another Percocet to try to be able to make myself be able to function ... I can generally function through the course of the day ... it just limits me to function really ... I cannot function the way I’m supposed to ... most of the time it’s not so severe that I can’t function.”

In referring to the body as either functioning or not functioning, the participants communicated a taking-up of the body as a tool. The body—the individual’s most inescapable presence and most belonging to the individual—became interpreted in a present-at-hand way during the migraine, as participants tried to work or perform other activities. The body could no longer move without effort, relate to others, or express feelings. Rather, the body became present-at-hand, a “broken” tool unable to function in its usual capacity.

The Body in Pain

In reviewing theories of understanding the body in a disease process, the phenomenon of embodied pain requires attention. Many types of pain exist, including the pain of losing a loved one, suffering a broken leg, or a broken heart, to name a few; embodied pain, however, affects all areas of individual existence and draws the person into the moment of the experience (Leder, 1990). The participants in this study primarily, but not exclusively, experienced a form of embodied pain through the migraine headache.

According to Leder, embodied pain reverberates through existence, changing and limiting projects, relationships, goals, and horizons (Leder, 1990, p.78). Boss (1979) points out that pain alters a person’s relationships and his or her world. As the migraine pain overtook the subjects in the study, these changes in their respective existences surfaced. The participants retained the ability to participate in projects, but the presence

of the migraine pain changed and limited their activity. For example, Steve continued to work, but experienced a decrease in what he termed his “functioning level” when suffering from the pain of the migraine; throughout the course of the day, he recognized and reluctantly accepted that he was not functioning at his usual energy and/or competence level. Moreover, the all-consuming nature of the severe pain affected each participant’s projects, relationships, goals, and horizons. Living through the migraine pain presented a different kind of being-in-the-world, a being fraught with limitation, frustration, and constriction brought on by pain.

Pain not only reverberates through existence in terms of changing projects, relationship, and goals, but also acts as a simultaneously centripetal and a centrifugal force (Leder, 1990). The centripetal nature of pain draws the person into the “here” and “now” of the embodied experience; the pain acts as the center around which all of experience revolves. The individual does not acquire desensitization to pain as to other sensations. For example, the sound of a refrigerator turning on is apparent at first but, over time, recedes into the background, fading from the perceptual moment. Pain, on the contrary, forces the person into constant perceptual awareness of bodily experience.

Yet, as a centrifugal force, pain also impels the individual to push the unpleasant sense out of his or her existence. Thus, both a centering upon and a pushing outward occur simultaneously during the experience of pain. The aversion humans have to pain puts a demand on the person to institute a change in the state of the lived body; pain possesses an “affective, compulsory call” the individual must heed, if he or she ultimately desires to end the discomfort (Leder, 1990, pp. 73, 77). This call represents the horizon, or goal, for the person experiencing embodied pain—freedom from the pain. Steve

experienced the pain as numbness on one side of his head and sought to end it through mild anti-inflammatory agents or sleep. Alternatively, Judy defined the pain as “piercing” and focused on pushing the pain away through medication and sensory deprivation. Although all of the participants in this study experienced the severe migraine pain differently, they all focused extensively on the physical pain itself and their attempts to end it, thus illustrating the centripetal (centering) and centrifugal (pushing away) characteristics of pain.

As an alternate experience of being-in-the-world, pain affected all areas of the participants’ existences. The pain drew them centripetally into themselves, limiting home and work projects, changing how they viewed themselves and increasing the desire for isolation. At the same time, the pain exerted a centrifugal force that compelled participants to conceive ways to end and escape the discomfort.

Conclusion – The Body

Heidegger’s, Husserl’s, Leder’s, and Boss’ theories adhere to the idea that, during normal (pain-free) existence, human beings do not focus on their bodies. However, this experience changed for the individuals in this study when they experienced the pain of migraine headaches. The body was no longer passed over, but became visibly ill at ease and central to perception; to use Heidegger’s (1962) and Leder’s (1990) terms, the body became present-at-hand while also “dys-appearing.” Furthermore, while the participants experienced the migraines, they took their bodies up as machines, viewing themselves as malfunctioning during the severe pain that limited their projects and activities. Further research on this topic might include examinations of embodied pain aside from migraine

headaches. The framework created by Heidegger, Husserl, Leder, and Boss bears application to other examples of this phenomenon. Perhaps a study on terminally ill patients and their experience of constant pain would reveal whether individuals' bodies can adjust to pain and exhibit signs of desensitization to it.

Eigenwelt

The self pole, or *eigenwelt*, of the life world reveals numerous characteristics regarding limitations of existence, facilitating an examination of the participants' understandings of themselves. While existential phenomenological literature has yet to address the migraineur's *eigenwelt*, researchers from other disciplines have dealt with related areas, including the psychoanalytic conceptualization of the neurotic character patterns of the migraineur, and the health psychologists' examination of stress and control in relation to migraines.

Migraine Personality

The construct of the migraine personality originates in psychoanalytic literature, although psychoanalysts disagree on the exact definition of a migraine personality. Generally, psychoanalytic thinkers concur that migraineurs possess neurotic character patterns (Wolff, 1963). According to research, characteristics of the migraine personality include: rigidity; hypersensitivity; inability to express resentment; shyness; desire for power, money, and success; and ambivalence toward people (Martin, 1993; Wolff, 1963). However, more recent studies, such as that performed by Stronks, Tulen, Pepplinkhuizen, Verheij, and Mantel (1999) regarding the migraine personality, give different

conclusions. Stronks et al. (1999) found that migraine patients did not show higher levels of anxiety, depression, or rigidity than those suffering from tension headache or those in the control group experiencing no headache activity. In a different study, Cao (2002) discovered personality differences in participants who had a migraine with aura versus those who did not experience aura. The aura group showed greater levels of neuroticism, aggression, and hostility, while the non-aura group did not exhibit these characteristics (Cao, 2002). While the construct of migraine personality appears in the literature, no definitive conclusions exist regarding traits that constitute this personality type.

Given the mixed results and overall disagreement in literature dealing with the migraine personality, it was not surprising that the participants in the current study did not fit neatly into a particular category or cluster of personality traits. Commonalities among the participants included the experience of stress and a desire for control in both the headache situation and other aspects of their lives; traits such as aggression, neuroticism, and hostility did not factor in interviews with this study's participants. The migraines had more of a connection to each participant's self-concept and activity level than to each of their personalities.

Stress

A large body of literature in health psychology addresses the relation between stress and migraine headaches. Most studies focus on stress management, which researchers conceptualize as a cause for migraine headaches. Primarily, the studies on stress emphasize various relaxation techniques. For example, Sorbi, Tellegen, and DuLong (1989) found participants who suffered from migraines benefited from

relaxation training. Researchers also study relaxation via biofeedback. Results from studies such as that conducted by Kropp et al. (1997) find biofeedback training useful in reducing migraine activity.

The participants in the current study did not employ any stress management techniques named in health psychology literature. Additionally, none of the participants attempted to or desired to limit the stress in their lives. Rather, each of the participants conceptualized themselves as able to handle high amounts of day-to-day stress. They felt pride in their ability to manage large amounts of responsibility associated with their jobs and their personal lives. A solution to ameliorating migraine headaches posited in the health psychology literature was to reduce stress levels. However, for these participants, removing or reducing stress to alleviate the headaches presented a major challenge. Each participant valued retaining control and handling stress and, thus, stress held a greater meaning in the participants' lives than merely as a perceived cause of migraines.

Moreover, each of the participants lived with an "ought to" attitude that contributed to the amount of stress they experienced; the participants all felt forced to make certain choices. Choice presents a central theme in existentialism. According to Sartre's position (1993), because I am nothing, I can choose to be anything. For Sartre, freedom is absolute, and human beings are condemned to freedom (1993). However, the participants did not reflect on their freedom and freedom's relationship to choice. They instead felt they "should" act in a certain way or they "had to" tend to their responsibilities. For instance, Steve talked about feeling aggravated when he "cannot function the way [he is] *supposed to*" (ital. mine). Similarly, Judy commented: "I'm not able to do the things I *have to do*" (ital. mine). Finally, Nancy, in talking about her

volunteer activity as a church musician, said: “I *can't not* be there” (ital. mine). The participants did not take up their actions as their choices, but instead as demands on them from others.

In short, stress figured prominently in the *eigenwelt* of each participant. To understand the participants' relationships to themselves, the role of stress in their lives bears examination. The participants did not experience the choices they made as fulfilling their desires, but instead experienced their choices as expectations or compulsions, contributing to their stress. The participants understood themselves partially in terms of the roles they held in their lives and the responsibilities and concomitant stress that came with those roles. Without these roles and their accompanying stress, the participants would not know how to define or understand themselves. Thus, stress retains a more expansive meaning for the migraineurs in this study than as just one of many possible causes of a headache.

Control

In addition to issues of stress and its relation to migraines, health psychology literature deals extensively with issues of control with regard to migraine headaches. Studies performed by Martin (1993) and Stronks et al. (1999) explore ways migraineurs can increase their sense of control and assume that experiencing a greater sense of control leads to a decrease in migraine activity. Martin (1993) determined that if participants shifted toward an “internal locus of control,” migraine activity lessened. Another study health psychology study conducted by Stronks et al. (1999) contradicts Martin's findings. The researcher in Stronks et al.'s study found that migraineurs already possessed an

internal locus of control and did not seek out social support to deal with their problems. The migraineurs in Stronks study, in locating control within themselves, refused to let go of it and let others help them. Control surfaces as a central theme in both studies, but each provides a different view on the relationship of control to migraine headaches. Notably, the current study supports conclusions from both Martin's and Stronks' research. The participants already had a strong sense of control over their lives and refused to seek the social support when dealing with migraines, as indicated in the Stronks study. Yet, the participants also found it helpful to increase this sense of control, as Martin's work suggests.

In support of the Stronks et al. study, the participants attempted to exert control over their migraines before they even began. Primarily through knowledge about the headaches themselves, as well as perceived causes and treatments, the participants could predict when a migraine would occur and, thus, control the symptoms. Of all the participants, Steve most clearly attempted to exert cognitive control over the migraine headaches by laying out various complicated scenarios of conditions that ostensibly led to the occurrence of a migraine headache. However, his self-perceived cognitive understanding failed to translate into practical control over the headaches. Even through his construction and awareness of his complicated cause-effect scenarios, the migraines continued to occur half the time. Nonetheless, Steve displayed his desire for control in continually laying out the detailed scenarios.

In one way or another, the participants tried to exert practical control over the migraine headaches, most often through medication. Of the three participants, Nancy experienced the strongest sense of control over the migraine headaches through her

discovery of effective medication. She planned to continue aggressively pursuing treatment if the current medication lost effectiveness. At the time of the interview, Judy felt her medications were losing their effectiveness in controlling her migraines; she thus decided to consult her physician to explore other medication options. Steve, in addition, felt that, regardless of the medication he took, the outcome would remain the same—he would still get migraines. Despite his belief that medication would not completely end his migraines, he continued with his medication regimen during the headache's course. All three, while having experienced a range of success levels with a variety of medications, believed their taking medications controlled the intensity and frequency of migraines.

In addition to medication, Judy tried to control the pain of the migraine headache by holding herself tightly to “will” the migraine away. She felt able to stop the migraine pain by holding herself so tightly that she froze herself in place more than the migraine froze her. Although she found herself in large part unable to control the migraine pain, Judy continued to assert her independence and ability to control herself during a migraine headache by exerting such strict control over her body's movement.

Each of the participants attempted to exert control over their experiences and handle the migraine without help from others. However, the participants desired control not only during the headache, but also under normal circumstances. Nancy expressed her attitude toward control most clearly and seemingly spoke for all of the participants when she said: “I'm a person that needs to have control all the time,” demonstrating her already existing internal locus of control and desire to maintain or increase that level of control.

Limitations of Existence

Limitations on one's existence, a common theme in existential literature, surfaces when analyzing the migraine experience. In support of Sartre's philosophic novel Nausea, this symptom presented one means through which the participants came to confront their own existences in living-through the migraine. Nausea, experienced by Steve and Judy, is not unique to the migraine experience, but examining this aspect of the phenomenon provides further insight into the participants' experiences of themselves and their limitations.

Sartre's novel Nausea presents one of most compelling existential explorations of experiencing feelings of sickness in the stomach. When the protagonist Roquentin confronts his own existence, nausea overcomes him. He tries to justify his sickness, but finds only nothingness and a depthless world. With no absolute truths to ground or restrict him, he experiences a nauseating sense of freedom. He finds that the human consciousness a being for itself, Roquentin discovers he, as all other humans, can choose his own essence. The realization that he possesses the ability to create his own essence as well as the essence of that which he perceives brings on his nausea (Sartre, 1979).

While the participants' confrontations of their own existences did not seem to lead to nausea during the migraine, their experience exhibited a number of similarities to Roquentin's. He intently studied seemingly mundane things, such as the root of a tree or a bag, and in doing so sees that he creates their essences. Roquentin realizes that this ability imparts him with an enormous amount of freedom and responsibility and, as a result, experiences the nausea. In a migraine experience, the participants confronted their own existences like Roquentin. Even Nancy, who did not experience nausea, confronted

her own existence by wondering during a particularly severe attack how a stroke or aneurism would affect her body. Although the participants were not sitting in a park reflecting on a tree root, the migraine forced them to reflect on their busy, at times overloaded, lives. The migraine limited them, and the realization of this limitation led the participants to engage in such reflection. For these participants, feeling limited represented a death for them, as they greatly valued the ability to work and care for others.

In addition to Sartre's (1979) work, Heidegger (1962) examined the uncanniness of being-toward-death. Heidegger asserts that, as *Dasein* (being-there), humans are the only kind of beings aware of their own deaths and, as such, humans flee nothingness. The flight from nothingness manifests itself in humans' engrossment in the "busy"-ness of day-to-day activities. Thus, a human being's own experience, as most proximal, is the least obvious. In the situation of a migraine, however, the participants became limited in their activities enough that they could not help but confront their own nothingness. Nausea represented a being-toward-incapacitation and, for these participants, equaled death in some ways. The experience of migraine and its accompanying nausea brought on limitations that led them to question their roles in life and their very being. When asked about feeling limited, Steve took a rare pause in his interview to reflect. He haltingly admitted to feelings of limitation, but quickly followed his admission by stating that he still won the battle against the migraine because of his ability to work during the experience. Although nauseous to the point of vomiting, Steve did not allow the migraine or its symptoms to stop him from working. Immediately after admitting that he had limitations, he tried to flee his own limits. Like Steve, Judy also confronted her own

limits. In describing her experience with meningitis, an event that preceded the onset of her migraines, Judy discussed feeling surprised by the realization that something could make her sick and in need of care. She so identified herself as a caretaker that her existence did not offer the possibility that she would fall into the role of patient. She stated: "...this is not life threatening . . . but while I'm having a migraine, I'm not able to do the things I have to do." In terms of nausea and limitation, Judy also encountered a practical problem – her inability to digest medication. The migraine thus possibly incapacitated Judy over a longer period. Although the nausea came about for different reasons, its debilitating effects led the participants to examine their own existences and the identities they assumed within existence.

Finally, Nancy, although not affected by the specific physical symptom of nausea, confronted the limits of her existence during the migraine described in her protocol. Nancy said: "I wondered what it would feel like if someone had a stroke—if I was having a stroke—what the difference would be. I wondered what having an aneurism would feel like." Nancy faced the possibility of death during this migraine but, then, proceeded to dismiss her thoughts as irrational, brought on by her extreme pain. Like Steve, Nancy fled the confrontation of her own nothingness, dismissing her thoughts as products of pain, as Steve cast off his thoughts by expressing his knowledge that working through the migraine made him the victor. Steve and Nancy did not allow thoughts of death or limitation to linger.

In general, although they quickly fled from the thought of their own nothingness, the participants' experiences of limitation forced them to confront existence. Such incapacitation resembled a death for these individuals; they explicitly wished to avoid a

state of “not-being-able.” For example, Steve tried to flee the feeling of “not-being-able” by trying to continue his normal work routine. Judy fled her state of “not-being-able” when she worked; however, at the time of the interview, she had retired and embraced the incapacitation in a way. Yet, even in embracing her incapacitation, she felt herself a “let-down”; she was not “supposed” to get sick. Moreover, in Nancy’s protocol example, she explicitly experienced thoughts of dying and questioned her ability to “handle” a stroke or aneurism, as though given a choice about death. Perhaps thoughts she dismissed as irrational actually indicated facing the possibility of death. None of the participants wanted to accept the idea that, at some unknown point, they cease to have possibilities.

Conclusion - Eigenwelt

The migraine directly affected the participants’ understandings of their identities and existences. They wanted to understand themselves as powerful and in control in the midst of stressful existences, but the migraine presented an instance during which they confronted with their own limitations and, mainly in terms of identity, their own deaths. Being-toward-incapacitation brought on a sense of resistance for all of the participants, whose senses of self included maintaining control over all aspects of their lives. In the case of a migraine headache, they attempted to exhibit cognitive and practical control, but their attempts fell short. Ultimately, they lost control, as made manifest in physical symptoms such as nausea and fainting, as well as in their attitudes. They all felt they had fought a battle and had to give in by resting. Yielding to the migraine disturbed the participants’ senses of self, as the sense of self undergoes change when in a disease state. A motivated professional must leave work and lie down; a caretaker must allow herself to

assume the position of patient; and a teacher must walk away from educating her students to sleep in an air-conditioned car. Each participant's sense of self, suffered a devastating blow when the migraine forced its way into the individual's being and altered lived experience from a focus on activity to a focus on pain cessation through rest and sensory deprivation, which the migraineurs interpreted as limiting.

Mitwelt

In addition to an effect on the sense of self, the participants' relationships with others (*mitwelt*) underwent changes during the phenomenon of the migraine. Phenomenologists such as Leder (1990) assert the fundamental importance of the *mitwelt* to the existence of the human being. Leder's (1990) examination of the *mitwelt* from a phenomenological perspective focuses on the impact of the gaze of the other upon the subject. In addition, psychoanalysts such as Fromm-Reichmann specifically address migraineurs' relationships with others in terms of repression of hostility against loved ones. Both of these perspectives work to facilitate an understanding of migraineurs' relation to other individuals inhabiting the world around them.

Relationships with Others

Despite the participants' wishes to retreat from relationships, the *mitwelt* still presents an essential component to understanding the lived experience of the migraine. Heidegger's (1962) work primarily discusses *Dasein*—a being-with or, what Medard Boss (1979) calls a being-there. In Heidegger's estimation, human beings are derived from relations with others and the world and, as such, are always a “being-in-relation,”

when with others or alone. As the structure of *Dasein* is a being-with, Heidegger sees the self as grounded in the phenomenology of care: “The self is an ‘I who cares’” who is already in the world (Gelvin, 1989, p. 176). *Dasein*, the being-with, is involved with entities and other *Daseins* (beings-with). In the case of the migraine, however, the participants did not show concern for others. The lack of concern for others presents another way in which the migraine draws the person into the self.

The participants in the current study, while not removed from the *mitwelt*, became unconcerned with others. The migraineurs understood people as demands that could not be met, rather than conceptualizing them as other *Daseins* to whom they related or for whom they expressed concern. Relating to others brought on more intense physical pain and, thus, the participants simply wished to be alone. Normally concerned with others, one of the few times they felt entitled to tell people in their lives “no” and focus primarily on themselves occurred during the migraine experience. For example, Steve always possessed an awareness of his role as a business owner and dedicated himself to being present for his employees and customers. Steve experienced as much difficulty in leaving work during a migraine as Judy in telling her husband to “fend” for himself. As Steve’s life revolved around work, Judy’s centered on taking care of B_, except during a migraine. Nancy also committed herself deeply to her work and took the responsibilities she had toward others very seriously. Yet, during the migraine, the participants all desired solitude and expressed less concern for others than in typical life situations. For the most part, the participants overlooked how the migraines changed their relationships with others. For example, Steve, before participating in this study, had not considered how his having migraines affected his small children. Over the course of the

interview, he came to realize that in retreating to his bedroom after work, his children did not have the chance to spend time with him during the evening. Moreover, the participants did not show as great a concern for others as normally both during the migraine and once it had passed; the participants did not generally consider how the headache affected those around them. The migraine drew the participants in toward themselves and away from others. Removing oneself completely from the *mitwelt* is impossible; however, the participants wanted suffer alone.

The Gaze of the Other

Another person can change or affect typical embodiment; however, the participants remained unconcerned with how others looked at them and, thus, did not experience an effect from the other's gaze. This finding stands in contrast to Leder's (1990) concept of social "dys-appearance." According to Leder, "...my awareness of my body is a profoundly social thing" (Leder, 1990, p. 92). Under another's gaze, one's body becomes an object, and embodiment can be altered. Leder's notion of social "dys-appearance" describes this phenomenon of another's effect on one's embodiment. Social "dys-appearance" occurs when communication undergoes disruption and one individual views another as an object (Leder, 1990, p. 96). When social "dys-appearance" occurs, the gaze of the other yields an objectification of the body. In turn, a self-consciousness ensues that can be thought of in a variety of contexts, including illness such as migraines. For example, if a person feels scrutinized, he or she can become clumsy. Conversely, a person could also experience feelings of justification or affirmation from another's gaze. Leder illustrates the concept of social "dys-appearance" by giving the example of

walking in the forest with a friend. If Leder's friend began looking at him as though something were wrong or if she seemed preoccupied with his appearance instead of his conversation, social "dys-appearance" would result. Leder might begin to stumble or feel an embodied sense of discomfort; thus, the friend could have an impact on Leder's embodiment (Leder 1990).

The objectifying gaze thus leads to social "dys-appearance." Through internalizing this gaze, the individual can feel alien or apart from the self, and the body can feel like an object (Leder, 1990, p. 96). For example, when an individual in a position of power scrutinizes another person or when one experiences his/her body as different, social "dys-appearance" occurs. The other does not experience the world *with* the person and, thus, does not treat the person as a subject but as an object. Objectification by the other and the subsequent self-consciousness that arises contribute in large part to social "dys-appearance."

The participants experienced social "dys-appearance" in terms of disruption in their usual relationships with others in their lives. The self-consciousness that Leder posits as the result of another's objectifying gaze, however, did not occur in the case of the migraine. During the headache, none of the participants seemed concerned with or affected by the gaze of the other. The existence of the migraine loomed larger than the impact other people may have had on them. The participants said others simply knew they had a headache from the way they looked, mostly through a change in coloring or expression. What participants could have interpreted as an objectifying gaze—others seeing the participants as ill due to a physical change in coloring—was instead dismissed. The participants said very little about their relationships with others, and none of them

seemed affected by others' perceptions of them. The headache, as foremost in the participants' experiences, disrupted communication with others and led to social "disappearance," not others' objectification of the participants' bodies.

Under non-disease circumstances, absence characterizes the body, but the body can become an object of thematic reflection under the gaze of another. However, in a migraine situation, the body already acted as an object of reflection. The gaze of the other served to reinforce what the participants already felt, but had no additional impact upon the participants' understanding of themselves.

Hostility Toward Others

Psychoanalytic literature specifically addresses the migraine and its effect on the migraineurs' relationships with others. Psychoanalytic thinkers such as Fromm-Reichmann developed the idea of the aggressive migraine. According to Fromm-Reichmann (1937), migraines manifest unconscious resentment toward loved ones. As overt expression of resentment or hostility toward others in the migraineur's life is unacceptable, the hostility becomes unconscious. However, the hostility still requires an outlet, which materializes in the migraine headache. Judy's experience provides the most accurate example of an aggressive migraine from the current study. However, her resentment did not appear as unconscious. Judy explicitly blamed B_ for her headaches. His disabilities completely changed her life; she had to leave a job she identified as the "love of . . . [her] . . . life" and assumed full responsibility for all household management, including "keeping the peace." In line with the psychoanalytic theory, Judy seemed resentful of her husband, and this resentment possibly played a role in her developing

migraine headaches. Yet, Judy's awareness of her resentful feelings does not support the psychoanalytic perspective that migraines occur as conscious manifestations of unconscious hostility.

Conclusion - Mitwelt

The presence of the migraine headache affected the *mitwelts* of the participants. Although the structure of *Dasein* is defined as being-with, the participants found themselves wanting to escape others. The participants no longer concerned themselves with others and almost solely focused on the self during the migraine experience. When asked about relationships in the interviews, the participants generally did not consider the impact the migraine had on their relationships or on the lives of those around them. Under non-migraine circumstances, the participants all held significant awareness of others' needs. Yet, in the migraine situation, none of them saw the *mitwelt* as changed. Another area of the participants' experiences that changed during the migraine situation was the potential impact of others' perception of the participants. Typically, the gaze of a person has an impact on another's embodiment; however, in the migraine situation, the participants remained unconcerned about how others viewed them. Contrary to Leder's (1990) assertion, the participants were not affected by the objectifying gaze of others around them. For example, Judy's lack of concern for others and disregard for the other's gaze also presented a conscious expression of hostility toward her husband. Overall, the results of this study show that while the human being is inherently a being-with, the migraine led to participants' becoming unconcerned with others and centered on themselves.

Umwelt

The participants wished not only to flee the world of relationships, but also to escape the world of things, or *umwelt*, as well. The participants attempted to retreat from the *umwelt* while living through a migraine in terms of perception, movement, and sleep.

Perception

Understood in terms of either empiricism or the work of Merleau-Ponty (1962), the participants lived perception during a migraine in a complex manner that moved beyond these conceptualizations of perception.. According to the perspective given through empiricism, perception displays a similarity to passive reception or “bombardment” of sensory data. Merleau-Ponty counters this view, interpreting perception as an intentional perceiving of meaningful wholes. According to empiricism, sensory data provide the primary source of perception understood as imposed on the human being’s mind. Merleau-Ponty criticizes this view of perception in his belief that empiricists do not account for the lived intentional and holistic character of perception. In an attempt to reach a holistic view of perception, Merleau-Ponty holds that a person’s experience is not the mere collection of sensations that empiricism purports. Rather, perception, like the body, is lived in a context; the individual and his/her experiences intertwine, creating a structure comprised of sensory data and its interpretation in the context of the surrounding world. The smell of a lily in a funeral parlor, for instance, provides a completely different phenomenological experience than the smell of a lily

presented as a love-token. The same sensory data possesses very different meaning and experience depending on the context, as the individual assigns meaning to his/her world.

During the migraine, however, the participants lived a more complex experience of perception than the theories of empiricism or Merleau-Ponty offer. Each of the participants experienced perceptions, in part, as a bombardment, which at an experiential level supports the empiricists' view. For example, at several points in the interview, Steve referred to covering his face in his dark, quiet bedroom, because the light and sound seemed to attack him. Judy also focused on light and sound: "the slightest sound—it just echoes in my head ... I would close my door, close the drapes ... a mask to put on—pillow over my ears." Judy wondered how all of her brain waves could pound in her head simultaneously. Moreover, during a migraine, Nancy fled to a shaded car to escape the harsh sunlight. All of the participants acted to remove themselves from the possibility of seeing or hearing. The migraineurs experienced perception as a series of bombarding sensations that exacerbated their pain. Despite feeling overwhelmed by sensations, the participants made meaning out of them, as well. In these terms, Merleau-Ponty's conceptualization of perception upheld. For example, Steve's workplace still held meaning insofar as he felt responsible for staying there, despite living-through a migraine. He chose the times when he "pulled away" from work to seek darkness and quiet. Therefore, the workplace did not merely comprise a collection of sights and sounds that exacerbated the migraine, but instead acted as a place where he made meaning. To a major extent, although the participants experienced the world as a sensory assault, they still experienced "the perceptual 'something' . . . as always in the middle of

something else,” thereby continuing to participate in the meaning of those objects (Merleau-Ponty, 1962, p. 4).

Merleau-Ponty’s complete move away from the sensation theory was too reductionistic to apply in its entirety to the participants in this study. The participants simultaneously experienced perception as holistic and meaningful, as well as a series of bombarding sensations. Neither empiricism nor Merleau-Ponty adequately addresses the lived experience of a person living through a migraine. Perhaps this finding also applies to other disease states. In addition to the experience of sight and hearing as bombardment, the participants felt movement to exacerbate the pain of the migraine headache.

Movement

“The upright gait of man is the only natural one to him, nay it is the organization for every performance . . . and his distinguishing character” (Straus, 1966, p.32).

According to Straus, a person’s very humanity holds contingency upon maintaining an upright posture; encountering the world in a human way involves standing upright. Through this posture, human beings experience themselves in relation to the world (Straus, 1966, p. 4). The upright posture gives humans a particular attitude, a different environment than other animals, and presents one mode of being-in-the-world (Straus, 1966). Standing and human movement impart a certain freedom.

Through movement possible due to the human’s upright posture, people interact with their worlds, relate to others, and assert being. The upright posture affords the

human being the ability to walk, move, and see things in relation to one another, as well as giving human beings freedom and widening their horizons (Straus, 1966). Walking is an expansive motion that provides human beings flexibility (Straus, 1966). The ability to walk and move, typically taken for granted, becomes problematic in the migraine situation. The migraine headache limited virtually all movements the participants made; movement exacerbated migraine pain, adding to the centripetal nature of the experience. Another way the participants' experiences focused around Husserl's null point, as described earlier, arose in constriction of movement. "Theres" typically arrayed around the body, or null point, bore increasing limitation as the participants tried to avoid movement. Steve felt the pain heighten in severity as he moved around at work. Similarly, Judy said she "couldn't stand the kids in the classroom . . . [or] . . . the slightest movement." The migraine inhibited the participants' ability to move freely in the world and, thus, interact with others and the *umwelt*. The migraine was a limiting experience during which every movement seemed to worsen the already severe pain. In addition to darkness and silence, each of the participants desired stillness, then sleep. They retreated from their responsibilities relationships, and —impositions on their senses—when afforded the chance to sleep.

Sleep

Due to the various implications of standing upright—including giving human beings their character, freedom, and ability to relate to the surrounding world—implications also exist for lying in the prone position taken during sleep. Straus points out: "...there is a voluptuous gratification of succumbing" to sleep (Straus, 1966, p. 10).

His observation matches the participants' experiences. For the participants, finally having the ability to sleep presented a great relief after suffering through the migraine pain.

Yet, Straus makes a second point about normal sleep that does not match the experiences of the participants. He wrote that sleep is not so much a withdrawal from the world as a surrender to it (Straus, 1966). The participants seemed to experience both surrender and withdrawal. The migraine seemed to force them to surrender to sleep but, simultaneously, they withdrew from others and the world intentionally. Steve said, "I might *pull away* at about six o'clock—close my eyes, cover my head, and just sleep for an hour" (ital. mine). At this point, he finally surrendered to the migraine he had battled all day. The participants all felt compelled to retreat to a quiet, dark room to rest, but they made the choice to lie down. Judy stated the experience most simply: "...at other times I just need to sleep," and "I sleep, which is good for me." None of the participants in this study would normally choose to sleep in the middle of the day; however, in examining their desire to retreat from the world, a shift in how the participants lived their *umwelts* appears.

Conclusion - Umwelt

From the way participants lived their worlds, their *umwelts* were clearly affected by the headaches. According to Straus: "disease . . . shows itself primarily as a change of the 'physiognomy of the world'" (Van den Berg, 1952, p.66). In other words, the world takes on different meanings in a disease state. During a migraine headache, the participants experienced the world differently than under their usual circumstances. In a

healthy state, the participants experienced the world without reflection. They proceeded with projects and felt no limitations on their freedom. While living-through a migraine, however, the world and the subjects' bodies became present-at-hand. The world presented a problem for the participants during the headaches. Light felt harsh, a ringing telephone sounded ear-piercing, and movement exacerbated pain. The participants experienced perceptions as bombarding their bodies. Sleep became important to each of the participants not only as a way to rest, but also as a way to retreat into a dark, quiet, still world—a world marked by limitation on perception.

Time

The participants experienced constriction of time when living through the migraine; horizons became focused on the headache's pain and how to eliminate it. The existence of migraines in the lives of the participants also affected how they lived when the pain of the headache abated. The migraine experience never truly ended, as the participants always lived with the migraine as a horizon. Finally, in examining the phenomenon of migraine headache, the overall life history or context of the participants also requires consideration.

Ways of Living a Migraine

To present a general view of time, Heidegger conceptualizes time as the ontological meaning of being. "The being of *Dasein* is time" and to be is always to be temporal (Gelvin, 1989, p. 177). Heidegger defines "ordinary time" as a series of "now" points, represented by individuals point along a line. In this way, an infinite number of

points make up time and, therefore, for Heidegger, ordinary time has no meaning. Finitude characterizes authenticity for him; thus ordinary time, as infinite, is not authentic (Gelvin, 1989).

Most researchers of migraine headaches view time as “ordinary time,” or points along a line. Traditional researchers assume the migraine experience contains a defined beginning, middle, and end of the migraine headache. Some disagreement exists among researchers on the typical length of the migraine but, as understood from the traditional perspective, the migraine is a delimited experience. In addition to this perspective, biological researchers have identified several distinct phases to the migraine headache regarding individual “episodes” or “attacks.” Typically, the goal of biological research is to discover ways to reduce the frequency and severity of migraine headaches. For an examination of headache frequency, researchers must assume that migraines begin and end.

For the most part, the participants identified a beginning, middle, and end to particular migraine headaches, but the idea that a migraine consists of only an “episode” remains a questionable from the data gathered in this study. The participants lived the migraine as both a linear temporal phenomenon, or series of “now points,” as well as a more complex phenomenon, involving a horizon of future possible attacks. The participants pointed to specific times they experienced a migraine headache or lived-through the phenomenon. However, since the migraine came and went, unlike more omnipresent disease states, the participants maintained constant vigilance to ward off the next attack or living-with migraine headache. Nancy carried medication with her wherever she went, and both Judy and Nancy took maintenance medication every

morning and evening. For Steve, thoughts of a possible migraine headache occurred after drinking beer. As shown through the examples given by this study's participants, the migraine never ended for them—the migraine potential exists in the medication or in the beer. All participants identified themselves as “migraine sufferers,” meaning for them, the possibility of a migraine always presented itself as a horizon; the headache existed as a future for each of the participants.

In examining the living-through aspect of migraine, Husserl's concept of the null point again demonstrates usefulness for the purposes of this study. As discussed earlier in this examination, a spatial constriction around the null point occurs during a migraine. At the time the participants lived-through a migraine, they also underwent a temporal constriction. The pain of the migraine pulled the migraineurs not only to the “here,” but also to the “now” of the pain experience. As Judy pointed out during her dialogue, the only thing happening for her was the headache. The participants' foci became elimination of the pain in the “now” moment. The past and future did not disappear but, instead, constricted. Of all aspects of the participants' pasts, past migraines surfaced as of highest importance in terms of understanding the living-through a migraine.

In addition to the past, the future showed dramatic limitation during the living-through a migraine. Because of its aversive nature, pain exerts a telic demand to be free of pain, culminating in a pain-free horizon (Leder, 1990). The participants considered an immediate future, unlike under non-migraine conditions in which the future is conceptualized as expansive. When living-through a migraine, the participants did not continue with their projects as usual. Rather, they experienced an overarching preoccupation with the immediate future, thinking about the time when living-through the

migraine will again become living-with the migraine. The pain exerted a telic force on all of the participants, compelling them to act toward alleviating the pain. The past, present, and future existed for the participants while living-through the migraine; however, time underwent severe constriction in its quest for pain relief.

In addition to living-through migraine, the participants also lived-with the migraines. As a never-ending experience for the participants, they did not necessarily understand the migraines in terms of distinct episodes. During the participants' interviews, one experience of a migraine led not to the end of the episode, but to the horizon of many other migraines. For example, Steve, despite the research question's emphasis on one specific example of migraine, demonstrated an inability to provide a singular one in both the protocol and the interview. As no single migraine stood out for Steve, he communicated that he experienced all of the migraines in nearly the same way. Remembering a single event of migraine presented difficulty for the participants, as other migraines always occupied their horizons. During the interviews, the participants were thus currently living-with the migraine experience.

Life History and Context

In addition to the migraine possessing a meaning in terms of past, present, and future, meaning can also be derived from looking at migraines against the backdrop of the participants' life histories. Sacks's work (1992), although using the lens of natural science, values the meaning of the migraine within the context of a migraineur's life. He believes that depth analysis presents a viable avenue through which to arrive at a meaning of the migraine experience (Sacks, 1992, p. 211). One must understand the whole life

history and context within which the migraine occurs. Sacks gives a broad list of categories to capture the different meanings of migraine headaches within different contexts. His (1992) valuing of the context out of which the migraines arose holds more importance than the list of specific categories. Through studying the migraineurs' relationships and emotions, Sacks's (1992) research provides a more complete understanding of the migraine headache.

For the participants in the current study, the migraine's meaning was defined, in part, by past experiences with migraines. None of the participants could document or describe a single episode of a migraine without referring to other experiences. Steve, although asked several times for a description of one specific migraine, he still gave a "typical scenario." Moreover, the participants made meaning of their experiences based on the length of time they had suffered from the headaches. At the time of data collection, Steve and Nancy experienced migraines as part of a life history of suffering starting with childhood; thus, the living-through a migraine, while not pleasant, almost became routine for them. In contrast, Judy, traumatized by the migraines, felt devastated by each attack. Since Steve and Nancy had suffered with migraines for a longer period of time and over various phases of their lives, the meaning of the migraines had changed over time for them. While, for Judy, the experience held a similar meaning over her decade of dealing with migraines. Thus, examining the life context out of which the migraine arose for each of the participants is of utmost importance in determining and assigning meaning to the migraines.

Conclusion - Time

Commonly understood, migraine headaches occur as delimited experiences. However, in scrutinizing the participants' individual experiences, the migraine was not conceptualized as an episode with a definitive beginning and end. Instead, after living-through a migraine headache, the participants continued to live-with the migraine. A possible horizon for the participants always came in the form of another migraine. Furthermore, the meaning of the migraines depended on both past migraine experiences as well as the length of time the participants had experienced migraines. Meaning, thus, was not stagnant and required study in terms of the migraine's existence within a context.

Conclusions

Summary of Findings

No aspect of the participants' lives remained untouched by the migraine headache. All areas outlined in the previous section—body, *eigenwelt*, *mitwelt*, *umwelt*, and time—possessed an interrelation in the migraine experience. The phenomenon, as a primarily embodied experience, led most of the alterations in the participants' lives to reverberate from the changes in embodiment. Due, in part, to the migraine's impact on the body, effects on the participants' senses of self, constriction of relationships, perception of the world as a bombardment, and living of time as a “now” moment of pain occurred. The migraine presented a concrete example of how an individual's entire life world can change completely in a few moments.

Furthermore, the impact on the body had a dramatic effect in terms of severe physical symptoms and the way the body was lived during a migraine. When suffering the migraine, the participants lived their bodies in a more limited fashion than under non-migraine circumstances. A denseness arose around the null point of the body, and the body was no longer passed over, as in typical experience. As explained through Leder's (1990) concept of “dys-appearance,” the body became an object of reflection. The participants understood their bodies as at least in part as broken or malfunctioning. In addition, the aversive nature of pain forced the participants to look outside of themselves for relief. These two findings support Leder's contention that pain is simultaneously centripetal and centrifugal.

However, Leder's (1990) concept of “dys-appearance” may be too simply stated for a phenomenological conceptualization of the migraine experience. While the

experience was able to be studied phenomenologically, in part because the body “dys-appeared” for all three participants, a different level of “dys-appearance” manifested itself based on the length of time each participant had suffered from migraine headaches. Steve and Nancy experienced less “dys-appearance” than Judy, as the dysfunctional experience of migraine receded into the background of existence over time. Steve and Nancy had suffered with migraines their entire adult lives, while Judy had only suffered with them for the previous seven years. Additionally, Judy’s life was more impacted by the headaches than Steve’s or Nancy’s, and her results illustrated the difference. The data did not provide a clear conclusion as to whether this diminished “dys-appearance” over time related to the migraine itself or could apply to other disease states. Possibly, for disease states other than migraine, the “dys-appearance” would lessen over time. It also seems possible that the “dys-appearance” could return to the foreground of experience again, after receding, if for example, symptoms of a disease state changed or worsened. A study of the changes in dys-appearance over time presents an area for further research.

Aside from the phenomenon of “dys-appearance,” the migraines also affected the participants’ senses of self, although not always communicated explicitly. A close examination of the data, however, shows that each participant defined him or herself over and against the migraine headache. For Steve, the migraine constituted a foe against which he defined himself the victor. For Judy, the migraine acted as a thief who stole her identity as caregiver and, thus, traumatized her. At last, for Nancy, the migraine sat at the very essence of her being; the headaches had become interwoven into her identity. Each person ultimately thought about him or herself differently because of the existence of migraines. Ultimately, limitation described the way the participants thought about

themselves during the migraine. The participants typically thought of themselves as able to handle stress and exert control over most situations. However, despite their best efforts, they did not have the ability to control the migraine. Therefore, the headaches forced them to confront limits when living-through the pain. For these participants, feeling limited was like a death. Facing a life-threatening situation or explicitly contemplating death is not necessary for one to face the limits of his or her existence. A limitation such as a migraine can act as an opportunity to stop and reflect on existence and its boundaries.

The participants' ability to relate to others also underwent dramatic limitation during migraines. Under non-migraine circumstances, the participants possessed a high level of concern for others in their lives; each of them worked in a helping profession and engaged actively in family life. However, when a migraine occurred, the participants isolated themselves from all others and lost concern with those around them. No one could assist the participants in their contending with extreme pain; interacting with other people simply made the experience worse. In addition to becoming unconcerned with others, the gaze of the other did not affect the participants during the migraine headache. The embodiment had already become altered by the migraine and another's gaze did not change that embodiment. Even after the migraine ended, the participants returned to usual routines and relationships with the belief that the migraine had little or no impact on those around them. Therefore, once away from the pain of the migraine, the participants had a difficult time seeing the full effect of the headaches on their relationships.

As a result of the pain, the participants wanted to retreat from the seemingly inescapable world of relationships. While such a retreat is impossible, relationships with others did not seem possible either during the extreme pain. The participants could not accept help or sympathy, nor could they reach out to others. Insofar as a disturbance in normal relationships occurred, the current study supported Leder's (1990) concept of social "dys-appearance"; however, the idea that the gaze of the other as filled with impact did not hold true in for these participants. They seemed unconcerned about how others viewed them and did not feel justified or scrutinized when others saw them as ill. Rather, they simply noticed that others knew of their illness and walked away to deal with their pain on their own. A migraine appears as such a self-absorbing state that others had little effect on the participants' self-perceptions. The migraine defined how the person viewed him or herself, not others. Perhaps other similar states exist in which the gaze of the other has no effect on a person's self-concept.

Not only did the migraineurs experience alteration in their relationships, but the way the world was lived changed during the headache as well. The isolation the participants sought excluded people, objects, and sensory data. Instead of a place of horizons, possibilities, and opportunities, the world transformed into a barrage on the participants, assaulting and attacking their senses. They experienced an inability to move or look at something without increasing pain, nausea, or other symptoms. The limits on movement stunted freedom, relationships, and the ability to participate fully in life. The participants wanted to retreat from the world by sleeping, not for refreshment but for an escape. They experienced sleep in a different way than Straus proposes (1966). For

Straus, sleep represents a form of surrender to the world, but the participants experienced sleep as both a surrender and a retreat. Their surrender was their choice.

The participants' experiences with migraine headaches revealed perception as a complex phenomenon both holistic, as Merleau-Ponty proposes, and also the bombardment of sensations, as empiricism posits. The participants experienced the world as an assault comprised of noises that reverberated in their heads or harsh sunlight that pierced their eyes. Moreover, they also experienced the world as a workplace or a home from which they felt the need to retreat. The participants perceived the world as a whole and meaningful but, at the same time, as inflicting sensations upon them. Perhaps there are other states, disease or otherwise, in which this phenomenon also holds true.

Finally, the migraine's alteration of the participants' senses of time presented an integral component of the headache experience. For the participants, the focus of existence was not only the "here" of their bodies, but also the "now" of the headache. The pain drew them into the moment of experience, calling attention to its presence and forcing the participants to acknowledge it. Judy's observation that the only thing happening for her at that time was the headache provided a compelling description of the migraine's effect on her existence. Moreover, the concept of the body as the null point returns as a focus of discussion when considering temporal constriction. Spatial constriction around the null point has already been examined, but at this point a temporal constriction reveals itself as well.

In addition to impacting the way the participants experienced time while living-through the experience, the migraines had a way of changing how time was lived overall. The migraine consisted of both an episodic and an ongoing quality. In continuing to

remain a possibility for the participants, the migraine represented an omnipresent horizon. While the head pain and nausea ended, the migraine continued to present a threat to the participants' existences. This circumstance differs from other omnipresent and inescapable disease states, such as arthritis, or episodic like a broken limb. The arthritis never leaves, but the broken limb eventually heals. Migraines exist as a recurring phenomenon, leading to the two ways the migraine was lived—living-through an attack and living-with the possibility. When experiencing migraines, the participants felt as if pulled into a black hole. Dense pain and seeming inescapability characterized the headaches; they limited the participants' possibilities and seemed to trap them. Interestingly enough, however, the headaches also served as an opportunity for the participants to feel entitled to time and justified in saying “no” to others. In this way, although the migraine severely limited most possibilities, it opened possibilities for the participants that they deemed unrealistic in their usual existences, such as taking breaks from work or caring for sick family members.

In general, the migraine seemed to come from outside the person and attacked him or her. The individuals in this study fought to retain a semblance of control over the experience, but were eventually forced to retreat from surrounding people and the world. The individuals grappled with a battle not of their choosing, and the results of the battle affected all areas of life. The participants did not escape the battle unscathed and continued to remember the scars of each battle in preparing for the next, inevitable attack.

Limitations of Research

The limitations of the current research arose from assumptions the participants

had about me and assumptions I had about them. As the study was located inside the pharmacy where I was employed, the participants identified me primarily as a pharmacist and secondarily as a researcher studying psychology. Therefore, they may have assumed that I had more of an interest in their medications than in other aspects of their experiences with migraine headaches. While I asked them in the interviews about the various aspects of the experience of migraine headaches, each of them gave a lengthy, detailed account of all of the medications they have taken in the past, as well as their current regimens at the time of the study. Each of the three participants seemed prepared to tell me about the medications they had been taking, as anticipating that I would ask about this aspect of the experience. At times, they hesitated on questions I asked them about the psychological impact of the experience, as though unprepared for such questions. For example, Steve hesitated when I asked him how it feels to experience limitation. Judy also paused for several seconds during the interview when admitting to me that incapacitation from the migraines devastates her. Similarly, after speaking about a specific incident of a migraine when she experienced fear, Nancy sat in silence for several seconds. While I imagine the task of listing various medications easier than admitting limitation, devastation, and fear to another person, I found it striking that each participant seemed more ready to answer questions about medications and the physical experience of the headache than about the psychological implications of the phenomenon, even though the purpose of the study was for psychological research. I cannot help but attribute this difference, at least in part, to the way the participants viewed me within the setting of the pharmacy.

Perhaps different results would have occurred had I conducted the study in a more

neutral context, where the participants would have identified me primarily as a psychological researcher and not as a pharmacist. While I still believe the role of medication central for each of the participants, I do not imagine they would have spoken in such detail about the various medications they have taken had the study been conducted elsewhere. The participants assumed that I would be well-versed in the language of medications and, therefore, understand their references to medications because I am a pharmacist. They each spoke about the medication by name, assuming I would understand when they brought up an adverse side effect from that medication. The participants' assumptions, along with their seeming lack of preparedness to answer questions regarding the psychological impact of the migraines, leads me to believe that the participants viewed me primarily as a pharmacist, thus skewing the results of the research. For future work on the psychological meaning of migraine headaches, I recommend a more neutral location.

A second limitation on the research arose from assumptions I had as a pharmacist regarding the symptom of pain. As a pharmacist, I value defining symptoms of disease states and, therefore, I assumed that in a phenomenological study, I would have the ability to reach a clear, experiential description of migraine pain. Furthermore, I assumed that the participants' descriptions of pain would present a central point in understanding the phenomenon. Instead, I found the participants more interested in talking about the effects of pain, rather than describing it in a clear, detailed way. As I could not arrive at a succinct experiential description of pain, this inability could be thought of as a limitation; however, it can be thought of as a strength, as the way in which the participants talked about pain fit the phenomenological idea that their horizons often characterize

phenomena. The implications the phenomena have for the other aspects of the person's life matter to the person, not just an isolated dimension of life. One of my goals was to understand in a more subtle and clear way what pain meant for the participants. Instead of finding a succinct description of pain, I discovered that meaning lies in the impact of the pain on other aspects of the participants' lives.

On a more general level, thematizing embodiment is extremely difficult because it is our taken for granted being-in-the world which forms the background of existence. While it is not the phenomenological position espoused by Boss (1979) and Merleau-Ponty (1968), psychoanalysts have also addressed the difficulties of discussing somatic problems that might be related to psychological issues since they view somatization as a defense. While I was aware of the potential problems in asking participants to discuss a phenomenon that is inherently difficult to articulate, I still felt the project was a worthwhile endeavor due largely to Leder's research on the absent body. Despite encountering difficulties in speaking about embodiment and the emotional impact of suffering through severe pain, my participants did offer useful narratives of their experiences that I was able to analyze.

Implications

Most of the implications from the study follow from the self-absorbing nature of the phenomenon. The migraine was lived in isolation; it was a solitary process that drew the participants into themselves. Other people were unable to help the participants, and their presence exacerbated the pain. As a result, relationships were stunted, even though the participants did not always fully realize the extent to which the migraines affected

their relationships. When focusing on themselves during the migraine, the participants viewed the self differently, feeling alien and taking themselves up as objects. The participants could not live the possibilities that were normally part of their lives, and instead focused almost solely on relieving themselves of the pain. In addition to feeling isolated and object-like, the participants felt under attack by not only the migraine, but also by the world—left alone to battle the barrage of sensations that worsened the pain of the migraine.

While the participants felt isolated and under attack, they felt that they were not simply victims, nor was the experience completely negative. The migraine seemed to overtake the participants; yet, in a way, they remained volitional. Each of them chose the point at which they surrendered and succumbed to sleep. In some examples the participants gave, they continued to participate in life activities for several hours or even a full work-day; whereas, in other examples, they retreated to their dark bedrooms almost immediately. While debilitated, these participants showed themselves able to continue with life if necessary. After retreating, the participants experienced a respite or relief. The migraine seemed the only time the participants felt entitled to take personal time and not take up all of the demands of their worlds.

As they lived the experience in isolation, the migraine affected all aspects of the participants' lives. The migraine drew the participants into themselves and forced them to focus on the “here” and “now” of the experience. Little room for others or for concerns outside of the headache existed. Once the headache ended, the possibility that they would be forced into the isolation again as another migraine was a horizon.

This study revealed the migraine as a complex phenomenon, not simply a brute force attack on the participants. It involved both choice and surrender, had episodic and ongoing qualities, and presented an example of how perception was lived as both a bombardment of the senses and a holistic phenomenon. Furthermore, despite the participants taking themselves up as machine-like, meaning infused all aspects of the experience; participants viewed some elements in their lives purely as causes of the migraine headache and experienced perception as a bombardment of sensations.

Recommendations

Based on the results of the current study, I have found two overall ways in which to move forward—one involves recommendations for further areas of research and the other involves recommendations for the health care community. In the first case, I recommend phenomenological studies on the topic of migraine headaches should include a wider pool of participants to obtain a greater sense of diversity. Such a study would helpfully fill out the experience of the migraineur from a wider variety of perspectives. While each participant has his or her own perspective, valuable and different from the others, greater diversity in terms of race, age, socioeconomic status, and other demographic factors, may help researchers discover how cultural values can inform the experience of a migraine. The second area of research I recommend concerns a further exploration from a phenomenological perspective involves Leder's (1990) notion of "dys-appearance." Studies along these lines could include a group of participants who have experienced migraines, or another disease state, for an extended period of time and a group that has experienced the state for a shorter amount of time. Such studies would

reveal the potential complexity of the phenomenon of “dys-appearance” and how it can recede into the background of normal existence. In addition to these two areas for further research, I would also recommend phenomenological studies be conducted on different states, disease or otherwise, possibly leading to further insights about the nature of perception. Perhaps migraine is not the only state in which people experience their senses as bombarded.

The second area of recommendations involves how the health care community and families can better serve migraine sufferers. I recommend that health care professionals make efforts to educate migraineurs and their family members on the impact of migraine headaches. Educating all involved on the isolating process that is a migraine headache facilitates understanding among family members that the providing quiet and darkness best helps their loved one. Family members who do not understand this need for quiet and darkness may experience feel insulted by the curtness or quietness of a migraine sufferer and, thus, come to resent the sufferer or help him or her less. I also recommend health care professionals make an effort to explore the meaning of the individual context out of which the migraine headaches arise. In doing so, perhaps migraine sufferers will be able to more fully understand how choices they make can affect migraine activity.

Reflections

As I reflect back on the research project and ponder the change in my mindset before and after the study, I am struck by the fact that I most wish to go back to the

participants themselves. What draws me back for further reflection are Steve, Nancy, and Judy, not Heidegger, Husserl, and Merleau-Ponty.

First, I am struck by how my sympathies changed toward the participants as the process moved forward. At first, I experienced sympathy toward the suffering migraineurs, imagining what affliction with such horrible pain that seemingly appeared out of nowhere would feel like. I thought how terrible it must be to live life not knowing when the next migraine would be lurking around the corner. As I moved through the data analysis, however, I found myself becoming more irritated with the participants for placing themselves in circumstances that they believed create the conditions out of which migraines arose. I asked myself, “Why would they do such things as drink beer, sit in bright sunlight, or repeatedly expose themselves to toxically high stress levels?” I could not understand. Then, I began to remind myself that this was not a study in logic, but in phenomenology. The beer had more meaning than simply as part of a series of chemical components that interacted with Steve’s blood vessels to create a migraine. The beer represented a part of his social and business interactions. Furthermore, to feel forced to say “no” to the beer would have presented a limitation on Steve’s freedom. When I reached the insight that the “causes” of the migraines were not easily extricated from their lives and had more meaning to the participants, I regained sympathy for the participants.

I was also struck by how trapped the participants felt, despite simultaneous feelings of control and power in their lives. It was not the trap of the migraine that struck me, but the trap of the “ought to” attitude. They allowed themselves to be imposed upon and imposed responsibility upon themselves that seemed if not unnecessary, then at least

extreme at times. As I reflected further upon this idea, it became less of a surprise that the participants could conceptualize the migraine as a respite. I thought of the migraine as a completely horrible experience with no redeeming qualities. While I do not believe that any of the participants would choose to have a migraine, in a way, the migraine entitled them to the freedom to say “no” and to attain the personal time of which they had so little. It took something as extreme as a migraine headache for the participants to step away from their responsibilities and take some time for themselves.

Finally, as I reflect back on the research, I realize that while limitations exist in any research methodology, I believe that interrogation of first person experience provides the best way to study human beings. One can not reach psychological insights by breaking down components of a stressful reaction, for example, into respiratory rate and galvanic skin response—the person has more of an essence than that. Because humans are what they are makes the phenomenological method not only useful or interesting but necessary. I owe a deep level of gratitude toward my participants for their honesty with me about their experiences. Their honesty and openness allowed me to fully study their experiences and reach conclusions that can contribute to the field of psychology.

Appendix A: Flyer

ARE YOU A MIGRAINE SUFFERER?

WOULD YOU LIKE TO HELP OTHERS?

If you would like to tell someone about your experiences with migraine headaches, please contact:

Jodie Eckenrod

At

Washington Pharmacy

412-403-3189/724-225-2415

to participate in a Ph.D. study

Appendix B: Informed Consent

CONSENT TO PARTICIPATE IN A RESEARCH STUDY

- TITLE:** Migraine Headaches: An Existential Phenomenological Study
- INVESTIGATOR:** Jodie Eckenrod, M.A.
Duquesne University
Department of Psychology
546 College Hall
Pittsburgh, PA 15282
724-225-2415
412-403-3189
- ADVISOR:** Paul Richer, Ph.D.
Department of Psychology
Duquesne University
412-396-6326
- SOURCE OF SUPPORT:** This study is being performed as partial fulfillment of the requirements for the doctoral degree in clinical psychology at Duquesne University.
- PURPOSE:** You are being asked to participate in a research project that seeks to investigate the experience of a migraine headache. You are being asked to come to Washington Pharmacy for the study. You are being asked to provide a written answer to questions about your experience of a migraine headache. In addition, you will be asked to allow the investigator to interview you at Washington Pharmacy once the investigator has reviewed your written response. The interviews will be taped and transcribed. These are the only requests that will be made of you.
- RISKS AND BENEFITS:** There are no risks in participating in this study beyond the risks associated with participating in the activities of daily living.
- COMPENSATION:** You will not be compensated for participation in the study. However, participation in the project will require no monetary cost to you.
- CONFIDENTIALITY:** No identifiers will be in the data analysis. All written materials, consent forms, tapes and transcriptions of tapes will be stored in a locked file in the researcher's home. Your response(s) will only appear in data summaries. All materials will be destroyed upon completion of the research.
- RIGHT TO WITHDRAW:** You are under no obligation to participate in this study. You are free to withdraw your consent to

SUMMARY OF RESULTS: participate at any time. A summary of the results of this research will be supplied to you, at no cost, upon request.

VOLUNTARY CONSENT: I have read the above statements and understand what is being requested of me. I also understand that my participation is voluntary and that I am free to withdraw my consent at any time, for any reason. On these terms, I certify that I am willing to participate in this research project.

I understand that should I have any further questions about my participation in this study, I may call Mr. Eugene Mariani, Human Protections Administrator at Duquesne University (412-396-6000)

Participant's Signature

Date

Researcher's Signature

Date

Appendix C: Steve's Data

Situated Narrative: Steve

Conditions out of Which the Migraine Arises

Alcohol

Steve believed that alcohol was a cause of his migraine headaches. When he had abstained from alcohol for several weeks and then drank, Steve found himself suffering from a migraine the following day. If Steve consistently drank one to three alcoholic beverages per week, then alcohol was not a cause for the migraine, but if he had abstained, he would wake up with a migraine headache after drinking alcohol.

A typical case scenario was that Steve had one or two beers in an evening. Those beers became the groundwork for a migraine the following day. In the moment of the interview, Steve felt that he would have a migraine that day if he had had two beers the previous evening. Steve did not typically drink beer. It only became noticeable to him when he had gone two or three weeks without drinking since he would most likely develop a migraine after drinking.

Steve conceptualized the relationship between alcohol and migraine headaches as having to do with his body chemistry. Steve felt that his body did not like alcohol. Steve felt pushed by alcohol into a migraine headache.

Maintaining a lifestyle, especially during the holiday season between Thanksgiving and Christmas, of drinking one or two drinks each weekend kept his body from experiencing a migraine headache. Steve did not understand the relationship between alcohol and migraines, he simply knew there was a relationship. Steve was not sure what the severity of the migraine would be and he knew that the migraine may not be one of his worst ones.

Steve did not think of the possible consequences of drinking when someone offered him alcohol. Once Steve realized that he had not had a drink for two weeks, he was willing to take a chance that the migraine would not happen. Most times a migraine did occur, however, after drinking alcohol. When in a social atmosphere, Steve did not think about the consequences of drinking. When someone offered him a beer, Steve did not think about the last time he had a beer and that it may have been three weeks since he had a drink.

Once Steve had realized that he was drinking and that he had not had a drink in three weeks, he already had had his beer and understood this as the point of no return. At the point of no return, Steve was not concerned about getting the migraine the next day – if he got a migraine, then those were the consequences.

Stress

Stress combined with alcohol use was a condition that created the experience of a migraine headache for Steve. The conditions out of which stress and alcohol use occurred many times when Steve was meeting with his business partner. There was stress at the meetings they had at a local restaurant where they would drink. Steve's

discussions about stressful situations with his business partner occurred over two or three beers.

Steve understood the migraine headaches as occurring for an ungodly reason. Steve did not know the answer to why stress, alcohol and meetings with his business partner caused the migraine headaches.

Steve understood excessive stress, over and above the normal stress, at work or home to be a contributing factor to the development of migraine headaches. When defining stress, Steve considered a very long day of work to be stressful. Steve had a good example from the day before the interview to illustrate the points he made about stress the morning of the interview. Steve had a long day the day before the interview. He began work at six o'clock in the morning to have a meeting at his workplace to address issues with a problem employee. He then worked for over twelve hours immediately after the meeting. Steve had a meeting with said problem employee after working for twelve hours to discuss the employee's future with the company. Steve had worked from six o'clock in the morning to almost midnight.

Steve saw that a day that involved a huge incident at work coupled with working long hours created stress. He felt anticipation and build up during the day. The situation was resolved and then Steve, referring to himself in second person, had a let down. Steve understood the stress to be an internal phenomenon.

Other Factors

In addition to stress and alcohol, sleep also played a role in the development of a migraine headache for Steve. Too little sleep, less than five hours, usually occurred. Steve would develop a migraine when he had too much sleep as well. If Steve slept for eight hours, which was more than his usual four or five hours, he would develop a migraine.

Lack of caffeine, which he took as coffee, would create a better chance that Steve would develop a migraine. Steve experienced a time when he had a migraine every Saturday and he was not sure what caused them. Steve was working at the time Monday through Friday and drank two fourteen ounce cups of coffee on work days. On Saturday, he was not working or working out in the morning, so he was not having his coffee. At the time, Steve would sleep late, thus getting more sleep than normal. He was not having the normal amount of caffeine that he was accustomed to. Steve would wake up every Saturday morning with a migraine. He finally realized after a month that lack of caffeine and extra sleep were causing the migraine.

Chocolate never caused Steve to have migraines.

The Migraine Begins to Unfold

Steve could generally tell by the time he went to bed whether or not he would develop a migraine headache the next day. Steve felt a dull numbness on one side of his head before he got a migraine

Steve, who referred to himself in the second person, went to bed after taking medication to prevent the migraine from occurring. Steve, still referring to himself in the second person, went to bed hoping that he would sleep soundly enough to prevent a migraine from occurring the next day. Half of the time Steve would feel fine, but the

other half of the time, he would wake up with a migraine.

Steve during the interview felt that the conditions might be such that had he had two beers the previous night he would have a migraine that day. Steve felt a numbness on one side of his head; the numbness always occurred on the right side of his head.

The Migraine Experience

The pain of the migraine was usually a persistent, dull aching pain. As Steve moved around, the pain became more severe. Steve had a funny feeling like a numbness on the right side of his head. Steve felt the migraine getting worse as the day at work proceeded. He would usually throw up once during the day. By late afternoon, the pain of the migraine was worse and Steve realized that the pain medication was not going to work.

Even if Steve were to try to lie down in the morning, the migraine would still persist until eight or nine o'clock in the evening. If Steve could leave work by six o'clock in the evening to get home, it made the scenario of the migraine work for him.

Steve would pull away from work at six o'clock. When he went home, he closed his eyes, covered his head and slept for approximately an hour. In addition to sleeping when he finally had time, he would take migraine medication. Referring to himself in the second person, Steve went straight to the bedroom, turned off the lights, closed the door and put the pillow over his head. He felt tired by this time. During a long day at work, Steve felt that he had not had a chance to catch up on the stressful events of the day.

By eight o'clock the migraine was gone. Steve was not sure if there was anything enlightening about the fact that once he slept for an hour or two, the headache was gone. The migraine subsided after it became dark, but Steve was not sure if light had anything to do with the migraine or not. The migraine subsided within twenty hours of it beginning.

Sense of Self

Steve felt that he had simply learned to live with the migraines. He did not panic when he felt a migraine coming on. Steve's migraines have decreased over time; they were worse at one point in his life. Steve felt he had a high tolerance for pain and ignored the pain of the migraine.

During a migraine, Steve, who was normally hyperactive and vocal, became more quiet.

Steve had very little personal time. He felt that sleeping during a headache was his need to have personal time and assumed that it was acceptable since everyone was entitled to personal time. Steve guessed that his assumption was that it was acceptable to take time to sleep.

Steve felt that he gave in to the migraine eventually. He was not used to giving in to anything, but he still felt that he won the battle against the migraine because he was able to function all day and only gave in after working until six o'clock in the evening.

Medication and Migraine

After taking a mild anti-inflammatory medication, Steve took stronger pain medication when he arrived at work in order to get himself through the day. While at work, Steve would take two or three more doses of pain medication over an eight hour

period to dull the pain. Then he would take another type of medication to help alleviate the migraine. Steve would finally take another type of medication specifically used to treat migraine headaches. All of the types of medications designed to treat migraines worked similarly for Steve.

Steve took the various medications in order to help him function throughout the day. When Steve took some type of medication, it helped him get through the day at work and eliminated some of the worst of the pain. Steve felt that no matter what type of drug he took or in what quantity, the headache would continue.

While using pain medication to control the migraine, Steve would lose short term memory. He found himself starting to do something and in the midst of a task forgot what he was doing.

Steve, the morning of the interview, took some mild pain medication as a prophylactic measure because he had felt a migraine possible coming on. He felt that half of the time the prophylactic measure will work, but then the other half of the time it would not.

At one time, Steve took a type of medication on a maintenance dose to prevent migraines from occurring, but he did not like the way it made him feel. Steve felt the medication slowed down his metabolism too much.

Functioning

Steve had only left work one time in his life due to a migraine. The one time he left work early involved a hang over as well as a migraine. Steve was not sure if he left work because of the migraine or the hang over.

Steve did get migraines on days he did not work as well as on the days he did. Even if Steve took time in the middle of the day to sneak away from work, it felt worthless because the migraine would persist whether he was at home resting or at work. Sleeping for an hour in the middle of the day did not alleviate the migraine.

Taking the pain medication generally dulled the pain so that Steve could function throughout the day. During a migraine headache, Steve still felt that he was able to function throughout the day, but he felt limited. Steve felt aggravated by not being able to function the way he was supposed to. He felt an inability in not being able to accomplish what he needed to in the day. This inability also aggravated Steve. He was obviously frustrated by not being able to do what he needed to during the day.

Most times, the migraine was not severe enough to completely prevent him from functioning. He felt that he could function at a 30% level and that was good enough to get him through the day. There was no doubt in the minds of those around Steve that he was not functioning at 100%. While functioning throughout the day, he tried to accomplish what he needed to while ignoring the pain of the migraine.

Steve got through the day after having a migraine headache and accomplished 70-90% of what he needed to do. He felt that it was acceptable to finally give in at six o'clock in the evening because of what he had accomplished. After functioning all day long while having the migraine, Steve felt that he has won a battle.

Relationships with Others

In describing his relationships with other people, Steve focused on himself. When asked about other people, Steve answered by describing himself as becoming more quiet

during a migraine. Steve did not become belligerent toward others. Steve knew that others around him knew he had a migraine because he turned white. Steve knew that others around him knew he was not his normal self.

Steve felt that there was some kind of impact on both him and the others around him during a migraine, but it was not a dramatic impact. He simply became more quiet. Since Steve was always on the go, he felt the migraines did impact his family because he needed to take two hours during the day to cover his face and sleep. Steve felt that he was not as responsive to his family as he normally was.

Steve's friends and family knew when he was having a migraine, so they adjusted their behavior by clearing out of his way and letting him do what he needed to in order to take care of the headache. All of Steve's children, even Steve's four year old son, knew to stay out of Steve's way and let him sleep for a couple hours. Steve had never been mean to his children during a headache. The children knew Steve would recover if he got two hours of sleep. He did not think that the children had ever verbalized knowing that they should let Steve get his sleep so that he could recover.

Steve knew what worked for him for the duration of the migraine, that he needed to lay down for one or two hours in the early evening. As he stopped to think about how it impacted he family, he realized that he only spent three or four hours with them a day, so if he was sleeping, it took way from their time with him.

Euphoria

After the migraine was over, Steve felt the opposite of how he felt during the migraine. He felt exhausted during the migraine and upon resolution felt euphoric. Part of the feeling of euphoria was having gotten through the experience of the migraine.

Steve was not sure if the resolution of the headache had to do with it being dark or if light was a factor in his migraines. The migraine never got resolved during the day. Steve was not sure if the euphoria he felt afterward was the medication working or the fact that it was over. Upon resolution, Steve had difficulty sleeping.

After the migraine, Steve felt that his body was over compensating and he felt a little bit hyper. Steve was not sure if the hyper feeling was due to the fact that he did not accomplish what he needed to during the day, that he was finally feeling better or a combination of factors. Steve began to feels really good at nine o'clock at night. When Steve began to feel better, he had the feeling that he had to do something.

From the beginning feeling from the night before that a migraine may occur, it was twenty hours until the migraine was resolved.

1. One of the causes for my migraines are alcohol (only if I have not had any alcohol for several weeks).

Steve understands that alcohol causes his migraine headaches when he has abstained from alcohol for several weeks.

2. If I drink one to three drinks per week then alcohol does not cause a migraine. However if I don't drink for several weeks and then drink two to three beers or glasses of wine I wake up in the morning with a migraine.

If Steve consistently drinks one to three alcoholic beverages per week, the alcohol is not a cause for the migraine, but if he has abstained, he will wake up with a migraine headache after drinking alcohol.

3. You know, normally the typical scenario is that I have had one to two beers.

Steve sees a typical case scenario happening that lays the groundwork for a migraine headache involving drinking one or two beers.

4. If I had had two beers last night, I would have probably had a migraine today.

In the moment of the interview, Steve feels that he would have a migraine occurring had he drank two beers the previous evening.

5. It's funny – if I have gone two or three weeks without a beer, you know, that happens frequently – you know I'm not a person who - you know, we have it in the house, but I don't drink it. But if I go two to three weeks without a beer and then go out to a meeting and have two beers or three beers, the next day I'm probably going to have a migraine.

Steve does not typically drink beer, but it becomes noticeable to him when he has gone two or three weeks without drinking because he will most likely develop a migraine after drinking.

6. I'm not sure why and it's just part of my body chemistry I guess. My body just doesn't like alcohol for some reason (smiles).

Steve conceptualizes the relationship between alcohol and migraine headaches as having to do with his body chemistry. Steve feels that his body does not like alcohol.

7. Generally it (alcohol) pushes me into a migraine.

Steve feels pushed by alcohol into a migraine headache.

8. If – during the holiday from November like Thanksgiving to December there is just something going on every weekend so, so I'll have a beer here or there or there or here, and generally it's enough to keep my body from . . .

Maintaining a lifestyle, especially during the holiday season, of drinking one or two drinks each weekend keeps his body from experiencing a migraine headache.

9. and I don't understand why. It's just that's what occurs

Steve does not understand the relationship between alcohol and migraines, he simply knows there is a relationship.

10. if I, if I don't have a beer for three weeks and I go to have a beer or two beers, I know the next day I'm going to have a migraine and it may not be one of my worst ones

If he has not had a drink for three weeks, Steve knows he will have a migraine the next day after drinking two or three beers. Steve is not sure of the severity of the migraine, and knows that the migraine may not be one of his worst ones.

11. and if you combine that with stress, I will have a migraine

Stress combined with alcohol use is a condition that creates the experience of a migraine headache.

12. and a lot of times that occurs because I think because a lot of times R_ (business partner) and I will be having a meeting and we will be talking to someone and we will be at A_'s (a local restaurant) for our meeting and that is where stressful things occur –

Stress and alcohol cause Steve's migraines because the conditions out of which stress and alcohol use occur happen often when Steve is meeting with his business partner. There is stress at the meetings they have at a local restaurant.

13. you know even discussing this stuff with (problem employee) you know discussing things that are going to occur it's over two or three beers and you know for some ungodly reason that is what occurs.

Steve's discussions about stressful situations with his business partner occur over two or three beers. Steve understands the conditions of the creation of the migraine headache as an ungodly reason.

14. I don't know the answer.

Steve does not know the answer to why stress, alcohol and meetings with his business partner cause the migraine headaches.

15. Well, no it [thinking about the possible impact of alcohol] doesn't [occur to him in the moment],

Steve does not think of the possible consequences of drinking when someone offers him alcohol.

16. but you say to yourself, "Well, I'll roll the dice and maybe it won't happen"

Once Steve thematizes the fact that alcohol seems to cause him to experience migraines, he is willing to take a chance that the migraine will not happen.

17. and sometimes it doesn't, but you know usually it does

Most times a migraine does occur, however, after drinking alcohol.

18. and a lot of times you are at a function and you don't even think. You know someone says, "Do you want a beer?" and you don't realize you haven't drank (sic.) for three weeks

When in a social atmosphere, Steve does not think about the consequences of drinking. When someone offers him a beer, Steve does not think about the last time he had a beer and that it may have been three weeks since he had a drink.

19. but by that time you've drank and it's past the point of no return . . . and I think, "if I get it, I get it."

Once Steve has thematized to himself that he is now drinking and that he has not had a drink in three weeks, he already has had his beer and understands this as the point of no return. At the point of no return, Steve is not concerned about getting the migraine the next day – if he gets a migraine, then that is what will happen.

20. I can generally tell by the time I go to bed that I am possibly going to have a migraine

Steve can generally tell by the time he goes to bed whether or not he is going to get a migraine headache.

21. I get like . . . it's almost like I have a dull . . . numbness on one side of your head.

Steve feels a dull numbness on one side of his head before he gets a migraine.

22. So you go to bed after three or four Motrin

Steve, who refers to himself in the second person, goes to bed after taking medication to prevent the migraine from occurring.

23. and you go to bed hoping you will sleep sound enough

Steve, still referring to himself in the second person, goes to bed hoping that he will sleep soundly enough to prevent a migraine from occurring the next day.

24. and probably about 50% of the time you will be OK the next day when you wake up – it's the other 50% when you wake up with a migraine.

Half of the time Steve will feel fine, but the other half of the time he will wake up with a migraine.

25. The beginnings are always like – then I can almost tell that night when I go to bed I'm probably going to have a migraine

The beginning of migraine headache occurs before Steve goes to bed. He can tell when a migraine is going to happen the next day.

26. Oh I have a feeling and if the day got stressful and if I had had two beers last night, I would have probably had a migraine today.

Steve during the interview feels that the conditions might be such that had he had two beers the previous night he would have a migraine that day.

27. Usually less sleep than five hours also occur.

In addition to stress and alcohol, sleep also plays a role in the development of a migraine headache. Too little sleep, less than five hours, usually occurs.

28. (When asked to clarify how sleep is a factor) If I sleep too much, I can end up working up with a migraine. I usually get four to five hours of sleep – If I sleep eight hours

Steve will develop a migraine when he has too much sleep as well. If Steve sleeps for eight hours, which is more than his usual four or five hours, he will develop a migraine.

29. and don't get my coffee there is a good chance I'll get a migraine

Lack of caffeine in his coffee will create a better chance that Steve will develop a migraine.

30. Um, you know – there is something excessively stressful in the work place or at home – over and above the normal stress (laugh).

Steve understands excessive stress, over and above the normal stress, at work or home to be a contributing factor to the development of migraine headache.

31. (When asked for clarification on Steve's idea of stress) It's just if the whole day is a long – a long day.

When defining stress, Steve considers a very long day to be stressful.

32. Yesterday was a good example. This morning I have actually that same scenario that I just explained from last night.

Steve has a good example from the day before the interview to illustrate the points he made about stress and the morning of the interview has the scenario he described.

33. I started work at six o'clock, had a meeting at (workplace) – I had to address all the employees about some things. Then I worked from 8 o'clock to 8:30 at night in the pharmacy. Right after the meeting I'm to work and worked all day. Then I had another meeting with (problem employee) last night too with (problem employee) to discuss his future with the company. So the whole scenario was just a long day, so it was almost midnight.

Steve had a long day the day before the interview. He began work at six o'clock in the morning to have a meeting at his workplace to address issues with a problem employee. He then worked for over twelve hours immediately after the meeting. He then had a meeting with said problem employee after working for twelve hours to discuss the employee's future with the company. After the day, Steve had worked from six o'clock in the morning to almost midnight.

34. Uh, that's the kind of day that will generally cause it, so there is some huge incident that occurs that day, specifically this (problem employee) thing that day

Steve sees that day that involves a huge incident coupled with a long day will create stress.

35. and uh. . . there is an anticipation and build up

Steve feels anticipation and build up during the day.

36. then it's basically, it's resolved and you have a let down

The situation is resolved and then Steve, referring to himself in second person, has a let down.

37. but it's just that internal stress all day long.

Steve understands the stress to be internal and it lasts all day.

38. (When talking about other factors that precede a migraine). There was a time way back when, when I was getting a migraine every Saturday and it was, and I know for sure what was causing that

Steve experienced a time when he had a migraine every Saturday and he was not sure what caused them.

39. because I was working Monday through Friday and I was drinking a lot more coffee then and every morning I would have a 14 ounce cup of coffee and then I would come to work and drink another cup of coffee, you know, on Monday through Friday. And then on Saturday, I wasn't working, you know,– I wasn't working out at that time. I work out now, so on Saturday morning I get my coffee.

Steve was working at the time Monday through Friday and drink two fourteen ounce cups of coffee on work days. On Saturday, he was not working or working out in the morning, so he was not having his coffee.

40. On Saturday I would sleep in until ten o'clock – I got more sleep than I'm used to and not getting my caffeine

At the time, Steve would sleep late, thus getting more sleep than normal. He was not having the normal amount of caffeine that he was accustomed to.

41. and every Saturday I would wake up with a migraine.

Steve would wake up every Saturday morning with a migraine.

42. That lasted about a month until I realized, "I think I understand this." I think that the caffeine and I think the extra sleep did that to me.

Steve finally realized after a month that lack of caffeine and extra sleep were causing the migraine.

43. Chocolate – that never bothered me.

Chocolate never caused Steve to have migraines.

44. The migraine is usually a very persistent dull aching pain.

The pain of the migraine is usually a persistent, dull aching pain.

45. (When asked for clarification on the pain) Then you start the day and it's almost like a numbness of the one side of your head. For me, it's always on the right side of the head (gestures to head with hand "covering" the right side of the head with the hand).

Steve feels a numbness on one side of his head when he begins to have a migraine. Steve always has the numb feeling on the right side of his head.

46. And you know I've got that dull, aching pain – for me it's more of a dull aching pain at that point

The pain in beginning of the migraine is a dull, aching pain.

47. and as I move around it becomes more severe.

As Steve moves around, the pain becomes more severe.

48. But the fact is – you know, there's almost like a funny feeling on this side (gestures) of my head and I'm just sitting here saying . . . It's almost a numbness.

Steve has a funny feeling like a numbness on the right side of his head. During the interview, he was beginning to have that feeling.

49. As the day progresses (at work) the migraine usually gets worse.

Steve feels the migraine getting worse as the day at work proceeds.

50. I will usually "throw up" once during the day.

Steve will generally be nauseous and vomit once at work.

51. By the time I get to work, I take two Percocets to get myself through the day.

Steve takes strong pain medication when he gets to work in order to get himself through the day.

52. (When asked if Steve ever leaves work due to a migraine) Honestly I think I can remember only one time

Steve only left work one time due to a migraine.

53. and I don't know that it was actually – that I actually called off work and didn't actually come in because, you know, several years ago. . . maybe it was a combination of being still drunk (laughs). . . or hung over and the migraine.

The time he left work early, involved a hang over as well as a migraine. Steve is not sure if he left work because of the migraine or the hang over.

54. And even if I did, like I had one on a Saturday and I didn't have to go to work.

Steve does get migraines on days he does not work.

55. Uh, if I laid down in the morning, it still doesn't go away until eight o'clock at night, nine o'clock at night no matter what I do, I'm going to have that migraine until nine o'clock at night.

Even if Steve lay down in the morning in the beginning of a migraine, the migraine will still persist until eight or nine o'clock in the evening.

56. So yeah, if I take time in the middle of the day – 'cause there are times even when I can sneak away from here (workplace), but it almost seems worthless because it doesn't go away.

Even if Steve takes time in the middle of the day to sneak way from work, it feels worthless because the migraine will persist whether he is at home resting or at work.

57. Even if I take off in the middle of the day to sleep for an hour, it just doesn't work.

It does not alleviate the migraine if he sleeps for an hour in the middle of the day.

58. Even if I can get home at six o'clock at night, it seems to make the whole thing work for me – it seems to work for me.

If Steve can leave work by six o'clock in the evening to get home, it makes the scenario of the migraine work for him.

59. I will take two to three Percocets over a eight hour period to dull the pain. . . I will take a Maxalt.

While at work, Steve will take two or three pain pills over an eight hour period to dull the pain. Then he will take another medication to help alleviate the migraine.

60. Well, one Percocet and then another one two to three hours later I take another Percocet to try to be able to make myself be able to function.

He will take one pain pill at first and then another two or three hours later to try to make himself function at work.

61. That works generally enough to dull the pain so that I can generally function through the course of the day.

Having the pain medications generally dulls the pain so that Steve can function throughout the day.

62. Generally by three or four o'clock it's just worse again and I know the Percocet is not going to help

By late afternoon, the pain of the migraine is worse and Steve realizes that the pain medication is not going to work.

63. so I generally take a Maxalt, Zomig or Imitrex – they all seem to work the same.

Steve then takes another type of medication from a drug class used to treat migraines – all of these drugs work similarly for Steve.

64. So and again, and then once I start to take some type of medicine to make sure I get through the day that eliminates some of the worse. .

When Steve takes some type of medication, it helps him get through the day at work and eliminates some of the worst of the pain.

65. No matter what drugs I take – if I take five Maxalt it just doesn't – not that I ever took five Maxalt – I've taken two in the course of a day.

Steve feels that no matter what type of drug he takes or in what quantity, the headache will continue.

66. I already took three Motrin (the morning of the interview) and I'm just sort of sitting here saying I hope it doesn't develop into a migraine and 50% of the time it won't

The morning of the interview, Steve took some mild pain medication as a prophylactic measure. He feels that half of the time the preventative medication will work, but then the other half of the time it will not.

67. I actually started on Inderal for a while . . . um, but that just slowed my whole metabolism down way too much for me (laughs).

Steve took a type of medication on a maintenance dose to prevent migraines from occurring, but he did not like the way it made him feel. The medication slowed down his metabolism too much.

68. I can generally function through the course of the day. It just limits me to . . . (looking down while pausing) . . . function really – it doesn't, I mean, you know

During a migraine headache, Steve feels that he is able to function throughout the day, but he feels limited in his functioning.

69. I mean I get aggravated because I can not function the way I'm supposed to. Again, it's just the inability to do what I need to do because I can't do what I need to do for that day.

Steve feels aggravated by not being able to function the way he is supposed to. He feels an inability in not being able to accomplish what he needs to in the day. This inability also aggravates Steve.

70. Most of the time it is not that severe that I can't function – it's (the functioning level) not at 100%. There is no doubt in my mind or anyone else's mind that I'm not at a 100% but my 30% is still good enough to get me through the day.

Most times, the migraine is not severe enough to prevent him from functioning. He feels that he can function at a 30% level and that is good enough to get him through the day. There is no doubt in the minds of those around Steve that he is not functioning at 100%.

71. All day long . . . (I am) . . . functioning and trying to do what you need to do and ignore the pain, you know.

While functioning throughout the day, he tries to accomplish what he needs to while ignoring the pain of the migraine.

72. I functioned all day long and it's more or less I say I won the battle.

After functioning all day long while having the migraine, Steve feels that he has won a battle.

73. Oh, obviously yeah . . . [it is frustrating] . . . because I can't do what I need to do for that day.

Steve is obviously frustrated by not being able to do what he needs to during the day.

74. (When asked for the clarification on Steve's sense of self) Yeah, so I guess I have just learned to live with it

Steve feels that he has simply learned to live with the migraines.

75. so it's not like it's like, "Oh my God, I'm going to have a migraine."

Steve does not panic when he feels a migraine coming on.

76. They have decreased over the years – I mean there was a point in time you know they seemed to be worse.

Steve's migraines have decreased over time; they were worse at one point in his life.

77. I have a particularly high pain tolerance; I just ignore it.

Steve has a high tolerance for pain and ignores the pain of the migraine.

78. I'm obviously a hyperactive individual and very vocal and if anything I get more quiet you know.

During a migraine, Steve, who is normally hyperactive and vocal, becomes more quiet.

79. Although I do lose short-term memory – believe it or not – with the use of the Percocet. Something I started to do, I'll stop and say, "What was I doing?"

While using pain medication to control the migraine, Steve will lose short term memory. He will find himself starting to do something and in the midst of a task forgets what he was doing.

80. (When asked for clarification on relationships with others) I don't know, I think that the only thing that happens is I get – I'm obviously a hyperactive individual and very vocal and if anything I get more quiet you know

In describing his relationships with other people, Steve focuses on himself. He becomes more quiet during a migraine.

81. and, and, and people know that I have a migraine because I turn white you know. They say, "He's got a migraine" (laughs)

Steve knows that others around him know he has a migraine because he turns white.

82. if anything, it's just quiet – I don't get belligerent. I, I mean they just know that something is the matter with me and that he's not his normal self, you know

Steve does not become belligerent toward others. Steve knows that others around him know he is not his normal self.

83. I'm sure it impacts me and them in some ways, but not in a dramatic fashion of any kind. It's just that I'm quieter.

Steve feels that there is some kind of impact on both him and the others around him during a migraine, but it is not a dramatic impact. He simply becomes more quiet.

84. And again, I, I'm always on the go, so I guess it impacts them in some way because for me to take two hours in the middle of the day to lay down and cover my face up and sleep, um you know, generally what happens.

Since Steve is always busy, he feels the migraines do impact his family because he needs to take two hours during the day to lay down and cover his face.

85. So it's just that I'm not responsive to them as I normally am.

Steve feels that he is not as responsive to his family as he normally is.

86. I mean when you talk about family and friends and everything, they can tell that I have a migraine. They know what I'm going to do by now, so they just more or less just clear out

Steve's friends and family know when he is having a migraine, so they adjust by clearing out of Steve's way and letting him do what he needs to take care of the headache.

87. the kids at this point, even the four year old, knows "he has a headache, leave him alone for a couple hours."

All of Steve's children, even Steve's four year old son, knows to stay out of Steve's way and let him sleep for a couple hours.

88. And it's not that I have ever been mean to any of them. It's just that they know daddy will be fine if he gets two hours sleep

Steve has never been mean to his children during a headache. The children know Steve will recover if he gets two hours of sleep.

89. so I don't know that they've ever said that.

Steve does not think that the children have ever verbalized knowing that they should let Steve get his sleep so that he can recover.

90. I guess that it's the way I work and if I stop and think about it, for my family because that three or four hours is the only time I get to spend with them – it cuts into their time, so it's probably, I don't know . . .

Steve knows what works for him for the duration of the migraine. As he stops to think about how it impacts he family, he realizes that he only spends three or four hours with them a day, so if he is sleeping, it takes way from their time with him.

91. Finally when I can get some time I will take a Maxalt and lay down and cover my head.

In addition to lying down and sleeping when he finally gets time, he will take another migraine medication.

92. With just everything on my mind, I just never had time to catch up on what happened.

During a long day at work, Steve feels that he has not had a chance to catch up on the stressful events of the day.

93. I literally have very little personal time, so it's my need to have personal time and I guess everyone is entitled to a little bit.

Steve has very little personal time. He feels that lying down during a headache is his need to have personal time and assumes that it is all right to do so since everyone is entitled to personal time.

94. I guess I assume it's OK

Steve guesses that his assumption is that it is acceptable to take time to lie down.

95. I might pull away at about six o'clock – close my eyes, cover my head and you know just sleep for an hour or so and generally by eight o'clock that night the migraine is gone.

Steve will pull away from work at six o'clock. When he goes home, he closes his eyes, covers his head and sleeps for an hour or so. By eight o'clock the migraine is gone.

96. You know and finally um, and you know you just go straight to the bedroom, turn the lights off and close the door and put whatever, the pillow – but then I'm also tired.

Referring to himself in the second person, Steve goes straight to the bedroom, turns off the lights, closes the door and puts the pillow over his head. He feels tired by this time.

97. I just sleep for an hour or so and generally by eight o'clock that night the migraine is gone, so I don't know if there is anything enlightening about it.

Steve is not sure if there is anything enlightening about the fact that once he lays down for an hour or two, the headache is gone.

98. Usually about one to two hours later when it is dark the migraine will subside (within twenty hours).

The migraine subsides after sleeping for an hour or two when it is dark. The migraine subsides within twenty hours of it beginning.

99. (When asked to clarify the resolution of the migraine) Well actually it's almost like the opposite (of feeling exhausted) – it's a feeling of euphoria

After the migraine is over, Steve feels the opposite of how he felt during the migraine. He felt exhausted during the migraine and upon resolution feels euphoric.

100. because you got through it

Part of the feeling of euphoria is getting through the experience of the migraine.

101. and now it's night time and it's always at night whether light is a factor or not a factor but it always gets resolved during the course of the day.

Steve is not sure if the resolution of the headache has to do with it being dark or if light is a factor in his migraines. The migraine never gets resolved during the day.

102. I'm not sure if it's the drugs or just the fact that it's over, but now I have a difficult time going to sleep

Steve is not sure if the euphoria he feels afterward is the medication working or the fact that it is over. Upon resolution, Steve has difficulty sleeping.

103. now it's almost like my body is over-compensating so now I'm like a little bit hyper.

After the migraine, Steve feels that his body is over compensating and he feels a little bit hyper.

104. It's almost like – you know – I'm not sure if it's the combination of things I didn't do during the day, the fact that finally I started to feel better – you know, probably a combination of all of them.

Steve is not sure if the hyper feeling is due to the fact that he did not accomplish what he needed to during the day, that he is finally feeling better or a combination of factors.

105. Yeah, generally around nine o'clock I'm starting to feel really good

Steve begins to feel really good at nine o'clock at night.

106. and then I'm like, 'Oh geez, I got to do something.'

When Steve begins to feel better, he has the feeling that he has to do something.

107. You know it's almost always twenty hours later before it's resolved.

From the beginning feeling from the night before that a migraine may occur, it is twenty hours until the migraine is resolved.

108. (When asked for clarification on giving control over to migraine) I don't know – it's just more or less giving in (laughs).

Steve feels that he gives in to the migraine.

109. I guess it's, what can you say? (laughs) I'm not used to giving in to anything, so yeah, but I still feel I have won because I functioned (laugh) – I functioned all day long and it's more or less I say I won the battle,

Steve is not used to giving in to anything, but he still feels that he won the battle against the migraine because he was able to function all day and only gave in after working until six o'clock.

110. I got through the day and got 90% or 80% or 70% of what I needed to get done and it's just time that, you know.

Steve gets through the day after having a migraine headache and accomplished 70-90% of what he needed to do. He feels that it is acceptable to finally give in at six o'clock in the evening because of what he has accomplished.

Appendix D: Judy's Data

Situated Narrative: Judy

A Migraine Experience

Judy was caring for her elderly father as well as her husband (B_), who was disabled, when she experienced her first migraine headache. She came home and told her husband that she had to get undressed and go to bed. B_ realized that she had a migraine and Judy simply said that she did have a migraine and had to go to bed. On this occasion, B_ had to help Judy get undressed and into bed. Judy did not want B_ to ask any questions of her or to talk. On the occasion in question, Judy went directly to bed and explained to her husband and dad that she could not stay up. On this occasion she laid in her dark room for more than three hours.

Judy experienced her first migraine headache after she had contracted meningitis and her blood pressure rose dramatically. She had never experienced a migraine before having meningitis. On this occasion, Judy became very light headed while she was teaching. The night previous to the migraine had been very difficult with her husband. Judy did not get adequate sleep. She blamed the light headedness on sleep deprivation. On the occasion in question, Judy became very light sensitive, so she turned off the overhead lights in the classroom. Judy experienced floaters and had light spots dancing in front of her. During the incident, Judy found that bending over, walking and talking made the pain worse.

Judy's neck became very stiff. Judy knew she had to leave work when her neck became stiff. Judy also became very nauseous during the incident she was describing.

On the occasion described, Judy tried to put ice on her forehead and neck, but nothing seemed to ease the pain. At this point, the pain was like a sharp knife penetrating between Judy's eyes and through her head.

During the incident, Judy was afraid to take any medication. She called her doctor who suggested she take on of B_'s strong pain medications and to stay in bed until the next day when she could see him after work. Judy slept for almost four hours after taking B_'s pain medication.

When Judy woke up, she felt sluggish and her head still had a dull ache in it. Judy bathed and then went right back to bed fearing the migraine would return. The next morning after the headache was resolved, Judy realized that she did not have an ordinary headache.

Sense of Self

There were times when Judy developed a migraine because of her husband and there were other times she developed them because she wanted to sleep. During a migraine, Judy felt the desire to withdraw.

Judy felt as though she had to solve problems, keep the peace and be the strong one. Judy thought of herself as the fixer upper. She was the youngest of three children, but her parents relied on her the most. Judy felt that she came to the rescue for others. Judy conceptualized herself as the strong one in the family having cared for her mother, father, B_ and her mother-in-law. She was everyone else's support.

Judy is B_'s caregiver. When she was down with a headache, she did become short and curt with him and told him to leave her alone. It was difficult for Judy to go to the bedroom, close the door and close the window. B_ was fully dependent on Judy and she felt that she was a total let down when she had a migraine.

Judy thought that the migraine was not supposed to be happening. Judy realized that her migraine headaches were not life threatening, but they stopped her from being able to do what she had to do. Judy was not able to get her husband up and showered. She was not able to have her husband exercise or go to a doctor's appointment. Judy felt that migraines should not happen to her; as a caregiver, she was not supposed to be down.

Judy understood herself as someone who would not ask someone for help even though she had wonderful neighbors who would take B_ for a ride or to the doctor. Judy felt that these tasks were her job. Judy felt that the migraine robbed her of her job. The migraine stole time that Judy needed to be doing things for other people. Judy did not feel that her main job was to be in bed with a migraine headache or held up in any way.

Judy was not sympathetic toward herself and felt frustrated. She blamed herself for having the migraines and asked herself if something was wrong with her or if she was being a wimp. Judy was hard on herself because she both felt that she had to be and she wanted to be.

Judy did not like losing control, but she felt that she did not have control over the migraine. She tried to will the migraine away, but realized that she could not do that. During the headache, Judy was not able to think clearly or do the simplest chore. She felt it was terrible to not be able to do a simple chore. Judy did not feel that she was lacking control, but feels that she was letting B_ down.

Having a migraine was very traumatic for Judy. She felt that she was not supposed to be sick and in bed. Judy did not want to be sick. Judy felt that she was letting everyone down when she was suffering from a migraine.

Experiencing the migraine made Judy feel inferior. Judy felt that the migraine was like a battle that she has been fighting, but she had not won the war yet. Not being able to participate in activities because of a migraine headache was devastating for Judy.

Judy felt that she was trying to be bigger than life. When she had a migraine, she truly felt she was letting B_ down and she did not want to get one. Judy's life changed when she had a migraine – she was not able to focus.

Judy became upset with herself feeling that she was letting others down. She felt she could handle just about anything because she was a strong person, but she was not able to handle the migraine. Judy said there were many things she did not like to handle, but she handled them and could still function. With a migraine, however, she was not able to function. There was never a half a migraine or a little migraine. For Judy, they were all bad even though some were worse than others.

Her life had changed a great deal since her husband had his stroke. Judy had to be in charge and start making decisions on her own that heretofore had been made by both of them, particularly with regard to finances. Judy felt she had to be strong for B_ and then when she contracted meningitis, she realized that something could attack her. This realization was a real blow to Judy.

Judy knew that the only constant in life was change and that a person had to accept that and move on or be left behind. She could not control the situation when she

had a migraine and to her this was devastating. Judy could not change the fact that she got migraines.

Judy's Husband

Judy's husband, B_, was a mentally and physically disabled individual who had to retire due to his disabilities. At age 56, B_ suffered from a number of conditions including Meniere's disease, PMR, Alzheimer's, Parkinson's and back difficulty. B_'s health problems began when he had suffered a stroke. B_ suffered from physical and psychological effects including muscle tremors and paranoia respectively. B_ was an educated man with two master's degrees. He was a teacher, but he could do very little at the time due to his disabilities. Judy felt that she had to say that B_ had a lot to do with her migraine headaches. Judy had no difficulty admitting that B_ had a lot to do with the development of the migraines especially when B_ became obsessive and paranoid.

Judy became frustrated when B_ had an episode of paranoia because she was trying to take care of the chores on both the inside and outside of the house in addition to caring for B_. Judy had made an effort to alleviate the stressful situation at home by adding onto their house. They added four rooms onto the house and B_ was concerned about how Judy was paying for the addition.

When Judy was working outside the home, she had to have a beeper so that B_ could reach her at all times. B_ would panic if Judy did not return his page within five minutes. At the time when Judy's father passed away, B_, who became addicted to pain medication, was in the process of getting off of the medication. At that time, Judy felt that she was B_'s punching bag.

There were times when B_ realized that he was responsible for contributing to Judy's migraine headaches. When he had this insight, the situation worsened because B_ felt guilty and responsible. B_ did not like seeing Judy be sick, although he was sympathetic toward the migraine.

For Judy to get B_ out of the house, she had to work at it. It took a great deal of effort to get B_ out of the house because he felt that others looked down on him because of his disabilities. There was a time where she had worked very hard to have B_ agree to go out to dinner with relatives and Judy developed a migraine an hour before leaving for dinner. Judy speculated that perhaps the reason she got the headache was because B_ was finally fine with going out and she was not able to go.

Judy hated to have to tell B_ that he was not able to bother her while she had a migraine. It hurt Judy to say to B_ that he was on his own, that if he fell down, she could not pick him up.

There were nights when Judy and her husband did not sleep due to paranoiac episodes. The sleepless nights contributed to Judy's migraine activity.

Relationships with Others

Judy felt that others in her life were very sympathetic toward her. When Judy would experience a migraine when her dad was still living, she would go home and tell them that they had to fend for themselves. Judy felt that she had to keep the peace between her dad and husband. Even though they got along well, it was difficult living in the same house together.

When she experienced a migraine, she could not stand the kids in her classroom. She always had good kids and good control of the classroom, but it was the simply being there that was difficult for her. The slightest movement would bother Judy. If she was at work, Judy would have to call off and ask for someone to cover for her. One time when Judy was experiencing a migraine, two of her students came to her desk to ask her a simple question. Judy found herself unable to respond to their question. The one student put his hand on Judy's hand and asked her if she was all right. Judy was afraid to answer because she thought she might cry. Judy told the students to get another teacher. Judy was unable to help her students.

The other teacher was next door. When the teacher looked at Judy, she knew there was something wrong. This teacher knew that Judy should not drive home, even though it was only a mile to her home. The teacher found someone else to drive Judy home.

Judy's two grown children had different perspectives on B_'s illness. The son who was home more often has seen first hand his father's decline, whereas the daughter who lived out of town was often hard on Judy in terms of her care of B_. The daughter stated that Judy was not making B_ do certain things that could help him. Judy felt that she was being given a hard time from her daughter, even though the daughter made comments out of concern.

Judy recalled a time when B_'s sister and husband were going to go out to dinner with them. Before they came, Judy felt a migraine coming on. She got into the shower to let the water hit her neck, she then rested on the couch. By the time they arrived, Judy said she could not go out and said she had to go to bed. The relatives were sympathetic toward Judy, still taking B_ out and bringing Judy home some dinner.

It was very difficult for Judy to ask others for help even though there were people in her life who would help Judy with her husband.

Stress

Judy could feel a migraine coming on when there was a period of stress. An example of a stressful situation is when B__ was not aware of why something was happening. A small incident could happen, for example the lawn mower not starting on the first try, which could lead B_ to have an episode of paranoia where he became quite upset. This was difficult for Judy.

Judy experienced her first migraine in 1996. Judy thought of 1996 and 1997 as tough years. At the time of the interview, she had been experiencing more migraine headaches. She had some events coming up that would spur B_ on to paranoid episodes. Judy felt that the last year and a half to two years, she had been experiencing more migraine headaches.

Judy found that she would be more likely to experience a migraine when there was a great level of stress at home. Judy tried to keep an even keel at home even though it was difficult with her husband. Because of B_, stress was high and was a large factor in her life.

No Outlet

Judy had never been a person to yell or scream. She felt she could yell at B_, but there was no sense because he would not understand why she was upset and then would

come back at her. Subsequently, Judy did not have an outlet. There was no verbal outlet for her stress and Judy realized that this situation was not working for her since she held everything in.

Judy found times when she was in the back yard and wanted to yell out and ask if anyone was there. However, she kept her feelings in. Judy knew she should have an outlet, but found it very hard to do.

Functioning

During 1996 and 1997, Judy got a migraine headache every six weeks. She finally told her doctor that she was unable to function.

If Judy got a migraine at work, she was unable to function as a teacher and teaching was the love of her life. There were a couple of occasions that Judy had to ask someone to drive her home from work because she was unable to do so herself. She knew she could not function and she thought she would worry about the car at a later point.

Judy remembered a time she was working and was getting a migraine. She felt she had to stay until there was someone to relieve her, even though she should have left when the migraine began. While experiencing a migraine, Judy could not teach or do anything else. The only thing that was happening for her was the headache. Judy felt that others did not realize that when a person suffers from a migraine, she can not function.

Symptoms

Judy never did like overhead lights in her classroom, but when she would experience a migraine, she became even more light sensitive. She was not able to stand the lights. The most problematic symptom for Judy was the difficulty with her eyes. Judy's neck would feel stiff and she would experience a sharp pain. A fog would envelop her. At this point, she knew she was going to experience a migraine. Judy felt that a film closed in around her and that it was very foggy. Once the migraine started, Judy felt as though it came upon her. Judy felt as though there was a cloud around her and that she was looking out of a fog.

During the time in question, Judy began experiencing a riveting pain shooting up the base of her head and around her forehead. Judy's migraines always started in the base of the neck. At first she thought that it was a stiff neck and that she did not sleep correctly. The pain then proceeded up the base of Judy's neck. The pain of the migraine centered between her eyes and felt like a knife going through her head. Judy usually tried to push her fist against her forehead.

The slightest sound echoed in Judy's head while she had a migraine. The slightest movement or sound compounded Judy's headache. She would close the door and drapes and put a mask over her eyes and a pillow over her head. Judy could not even stand to have her dog on the bed with her. She wanted to be left alone by everyone. During one headache, the telephone which was next to her bed, rang. It sounded piercing and Judy felt as though her head was going to explode.

When experiencing a migraine, the only thing that was happening for Judy was the headache. She felt that her brain waves were all focused and she wondered how so

many of them can be beating in her head. The only thing happening in Judy's head was the headache. The migraine shut everything out and shut Judy down.

Judy remembered a time that she had a very severe migraine where her head felt as though someone had hit her with a two by four. Afterward, her head ached from several days, even though the migraine was resolved.

Medication

After Judy's first migraine, the doctor prescribed a medication to treat migraines. Judy and her doctor tried three different medications that did not work. Finally, the doctor prescribed a mood stabilizer that helped her migraines and kept them in check for a long time. Judy's daughter, who worked for a major drug manufacturer, disagreed with the decision to take this medication. Judy told her daughter that the medication helped and that she wanted to give it a shot.

If Judy started to have a migraine, she would have to get medication immediately or else it would not help her. At this time she was also on maintenance medication. When Judy became nauseous, it was a problem taking the medication because she would not be able to keep them down. When she felt a migraine coming, Judy had to take the medication immediately which was not always possible at work.

Judy was on a maintenance medication at this point and for a time was not getting the migraines headaches as often as in 1996 and 1997. When Judy took the medication to treat the migraine headache, it put her to sleep which Judy felt was good for her. Judy then began taking a new medication, Axert, to treat migraines when she felt a migraine coming on. This medication made Judy extremely tired. Judy was knocked out from the time her head hit the pillow. The maintenance dose of the mood stabilizer did not have this side effect. After taking the Axert, Judy would wake up with no migraine, but felt a hangover effect. When she woke up, Judy felt woozy, but then the feeling shook out.

Judy did not like to be dependent on medication.

Stiffness

After a migraine, Judy was very sore. She thought that part of the reason she was sore was because during the headache, she tried to hold herself so stiff in an effort to get rid of the migraine as if she could will the migraine away. After a migraine, Judy got in the hot tub, which she would not be able to go into during a migraine because of the noise the jets made. After a headache, however, the hot tub massaged her neck, back and shoulders.

After a migraine, Judy felt very sluggish and stiff and as though everything has been drained from her.

Meaning Units and Psychological Interpretation: Judy

1. My husband is a disabled (mentally and physically) individual who had to retire due to his disabilities. And B_ had had a particular problem, um . . . not only physically, but he is mentally disabled.

Judy's husband (B_) is a mentally and physically disabled individual who had to retire due to his disabilities.

2. Um, I would say B__ has a lot to do with my migraines, I have to say that.

Judy feels compelled to say that B_ has a lot to do with her migraine headaches.

3. There are nights we don't sleep and when there is stress, I can feel one coming on.

There are nights when Judy and her husband do not sleep. She can feel a migraine coming on when there is a period of stress

4. If there is a situation where B__ is not aware of something, you know, the littlest thing could happen. Perhaps it's the lawn mower would start on the first try. That would cause him to have, to have his paranoia episodes – he gets so upset.

An example of a stressful situation is when B__ is not aware of something. A small incident could happen, for example the lawn mower not starting on the first try, which can lead B_ to have an episode of paranoia where he becomes quite upset.

5. And the frustration of it – here I am trying to start the lawn mower, which I never did before, so now I not only take care of everything inside the house, but outside as well.

Judy becomes frustrated when B_ has an episode of paranoia because she is trying to take care of the chores on both the inside and outside of the house in addition to caring for B_.

6. At times I get them because of him, at other times I just want to sleep, you know?

There are times when Judy develops a migraine because of her husband and there are other times she develops them because she wants to sleep.

7. So there he (the husband) has a lot to do with it – I will be the first one to admit that. OK, when B__ becomes obsessive, paranoid . . .

Judy has no difficulty admitting that B_ has a lot to do with the development of the migraines especially when B_ becomes obsessive and paranoid.

8. I have never been a yeller or a screamer and with him there is no sense. But um, verbally, this is not working and this is not the way it should be and I hold everything in. I don't have an outlet. I could, could yell and scream – he wouldn't get it. He would just, he would just, but you know come right back at me.

Judy has never been a person to yell or scream. She feels she could yell at B_, but there is no sense because he would not understand why she is upset and then come back at her.

Subsequently, Judy does not have an outlet. There is no verbal outlet and it is not working for her because she holds everything in.

9. When I was working . . . I had to wear a beeper because B__ needed to know he could get in touch with me at all times. And if that went off and I didn't call him within five minutes, he panicked.

When Judy was working, she had to have a beeper so that B_ could reach her at all times. B_ would panic if Judy did not return his page within five minutes.

10. Um – to take the heat off of me I added on to our house. We added four rooms onto the house so I could sit and watch and B__'s like, "How are you paying for this?"

Judy has made an effort to alleviate the stressful situation at home by adding onto their house. They added four rooms onto the house. B_ asked Judy how she was paying for the addition.

11. But um, so I had to be, I had to solve the problems, keep the peace, be the strong one

Judy feels as though she has to solve problems, keep the peace and be the strong one.

12. and then when I would get hit with a migraine – probably between '96 – that's when I had my first one, probably between '96 or '96/'97, they were tough years.

Judy experienced her first migraine in 1996. 1996 and 1997 were tough years.

13. I bet every six weeks I got one. Every six weeks and I finally told the doctor, "I can't . . . function"

During 1996 and 1997, Judy got a migraine headache every six weeks. She told her doctor that she was unable to function.

14. And there are times when he realizes it, but there is nothing he can do about it. He just can't and it's worse when he does realize. Because he feels responsible and he feels guilty.

There are times when B_ realizes that he is responsible for contributing to Judy's migraine headaches. When he has this insight, the situation worsens because B_ feels guilty and responsible.

15. B__ has Parkinson's, he's had four back surgeries uh . . .he has Meniere's disease, he has PMR a muscle disease and now he is in the beginning stages of Alzheimer's and he's 56. But all this started when he had his stroke and with his Parkinson's, it's much more mental, he has the shakes and all that, but the paranoia, the psychological effects on him – it's just tremendous. So to get him to go out, I have to work at it.

At age 56, B_ suffers from a number of conditions including Meniere's disease, PMR, Alzheimer's, Parkinson's and back difficulty. B_'s health problems began when he had his stroke. B_ suffers from physical and psychological effects including muscle tremors and paranoia respectively. For Judy to get B_ out of the house, she has to work at it.

16. At the time I am about to describe, I was also caring for my father (who lived with us).

Judy was caring for her father as well as her husband when she experienced her first migraine headache.

17. When asked to elaborate on relationships with others) They are very sympathetic toward me.

Judy feels that others in her life are very sympathetic toward her.

18. B__ doesn't like seeing me sick.

B_ does not like seeing Judy be sick.

19. I'm his caregiver and when I'm down, that's when I do become short and curt and it's just like, "Leave me alone."

Judy is B_'s caregiver. When she is down with a headache, she does become short and curt with him and tells him to leave her alone.

20. I'm on a maintenance medication now, but I wasn't getting them as often.

Judy is on a maintenance medication now and for a time was not getting the migraines headaches as often as in 1996 and 1997.

21. Lately I have been getting them more often, but I have a couple things coming up and this spurs B__ on, so I take another medication.

Judy has recently been experiencing more migraine headaches. She has some event coming up that spur B_ on. Judy takes another type of medication when she does experience a migraine.

22. I take Axert, it puts me to bed. I mean I sleep which is good for me.

When Judy takes the medication to treat the migraine headache, it puts her to sleep which is good for her.

23. But B__ is sympathetic toward the migraine.

B_ is sympathetic toward the migraine.

24. (In speaking about the particular instance in the protocol) Once I got home, you know, I remember just looking at him (husband) and I said, "I have to get undressed and go to bed" and he said, "Oh, a migraine" "Yeah, I have to get undressed"

On one particular occasion when Judy experienced a migraine, she came home and told her husband that she had to get undressed and go to bed. B_ realized that she had a migraine and Judy simply said that she did have a migraine and had to go to bed.

25. and he had to help me

On this occasion, B_ had to help Judy get undressed and into bed.

26. and that time I was like, don't ask, don't talk

Judy did not want B_ to ask any questions of her or to talk.

27. and that's hard for me going to my bedroom, closing the door, closing the window.

It is difficult for Judy to go to the bedroom, close the door and close the window.

28. When I had a migraine, I would go home, tell my husband, if my dad when my dad was living and he was still then, you guys have to fend, I'm going to bed.

When Judy would experience a migraine when her dad was still living, she would go home and tell them that they had to fend on their own.

29. Um . . . I had to care for my dad, I had to care for B__, I had to keep the peace between them. They got along famously, but living in the same house . . .

Judy felt that she had to keep the peace between her dad and husband. Even though they got along well, it was difficult living in the same house together.

30. I had contracted meningitis, and as a result my blood pressure rose dramatically and I experienced my first headache (later to be diagnosed as a migraine). But I had never experienced a migraine until I had meningitis and I was hospitalized for it. Um, I had high blood pressure after that – my blood pressure had always been low. So I'm on medication for that.

Judy experienced her first migraine headache after she had contracted meningitis and her blood pressure rose dramatically. She had never experienced a migraine before having meningitis. Judy is also on medication to treat high blood pressure.

31. I became very light-headed one day while still teaching.

On one occasion, Judy became very light headed while she was teaching.

32. My husband had had a very bad night previously and therefore I did not get enough sleep (which I attributed to my light headedness). The first experience of my migraine – it was just a very bad night with my husband.

The night previous to the migraine had been very difficult with her husband. Judy did not get adequate sleep and she blamed the light headedness on sleep deprivation.

33. B__ is a very educated man. Two master's degrees. He was a teacher and his disability has taken all that – he can do very little now.

B_ is an educated man with two master's degrees. He was a teacher, but he can do very little now due to his disabilities.

34. However, I became very light-sensitive and turned the over head lights off in my classroom.

On the occasion in question, Judy became very light sensitive, so she turned off the overhead lights in the classroom.

35. This did not help and I even experienced “floaters” – light spots “dancing” in front of me.

Judy experienced floaters and had light spots dancing in front of her.

36. My neck became very stiff

Judy’s neck became very stiff.

37. OK, it’s so strange because at first, um, my eyes become very sensitive. I never did like overhead lights and as a teacher, that’s what I have. Um, but my eyes would become very sensitive

Judy never did like overhead lights in her classroom, but when she would experience a migraine, she became very light sensitive.

38. and the base of my neck. I would just feel, a sharp pain when it first starts just more like a stiff neck and then it would almost be like a fog around me and when I would start to experience that, I knew it was going into a migraine.

Judy’s neck would feel stiff and she would experience a sharp pain. A fog would envelop her. At this point, she knew she was going to experience a migraine.

39. At this time (when her neck became stiff) I realized I had to leave work.

On the occasion in question, Judy knew she had to leave work when her neck became stiff.

40. If I got a migraine at work while I was at school, I could not function as a teacher.

If Judy got a migraine at work, she was unable to function as a teacher.

41. You know teaching was the love of my life.

Teaching was the love of her life.

42. And if I would feel one coming on and this is while I was on the maintenance drug. If I couldn’t get a pill in me, once a migraine starts, that other medication didn’t help and that’s taking three of them.

If Judy started to have a migraine, she would have to get medication immediately or else it would not help her. At this time she was also on maintenance medication.

43. Once it started, it came on me – I couldn’t stand the lights,

Once the migraine started, it came upon Judy. She was not able to stand the lights.

44. I couldn’t stand the kids in the classroom. The slightest movement . . . I always had good kids. I always had good control of my room, but it didn’t matter. It was just being there.

When she experienced a migraine, she could not stand the kids in her classroom. She always had good kids and good control of the classroom, but it was the simply being there that was difficult for her. The slightest movement would bother Judy.

45. I would have like a cloud around me – it was like I was looking out of a fog and it just . . .

While experiencing a migraine headache, Judy felt as though there was a cloud around her and that she was looking out of a fog.

46. I would have to leave school. I would call off and say, “Please get someone to cover me, I have to leave.”

If she was at work, Judy would have to call off and ask for someone to cover for her.

47. And at that point I knew that I couldn’t function. There were a couple times when I couldn’t drive from school to home. I would have to get one of my coworkers to drive me home. And I would say, I will worry about the car later.

There were a couple of occasions that Judy had to ask someone to drive her home. She knew she could not function and she thought she would worry about the car at a later point.

48. Driving home, I began to experience a riveting pain shooting up the base of my head and around to my forehead.

During the time in question, Judy began experiencing a riveting pain shooting up the base of her head and around her forehead.

49. (When asked to elaborate on the symptoms) OK, uh. It’s mostly my eyes

The most problematic symptom for Judy is the difficulty with her eyes.

50. – mine always started at the base of my neck. It’s like a stiff neck and there are times when I think, “I didn’t sleep right” you know, and then the pain goes up the base of my neck,

Judy’s migraines always start in the base of the neck. At first she thinks that it is a stiff neck and that she did not sleep correctly. The pain then proceeds up the base of Judy’s neck.

51. up my head and then mine seems to center right in between my eyes right here (gestures), it’s like a knife going right through it.

The pain of the migraine centers between her eyes and feels like a knife going through her head.

52. Uh, (sighs), it does seem – it’s almost like it’s very foggy. It’s almost like a film closes in around me.

Judy feels that a film closes in around her and that it is very foggy.

53. And I usually just try to put my fist on my head and push on it (gestures)

Judy usually tries to push her fist against her forehead.

54. but then the slightest sound – it just echoes in my head.

The slightest sound echoes in Judy’s head while she has a migraine.

55. Once home, I went directly to bed – explaining to my husband and dad that I could not stay up.

On the occasion in question, Judy went directly to bed and explained to her husband and dad that she could not stay up.

56. (When asked if she feels like she wants to withdraw) Right.

During a migraine, Judy feels as though she wants to withdraw.

57. I became very nauseous

Judy also became very nauseous during the incident she was describing.

58. and laid in my dark room for more than three hours.

On this occasion she laid in her dark room for more than three hours.

59. I become nauseous which was another problem with taking those pills. The wouldn't stay down for me, um . . .

When Judy becomes nauseous, it is a problem taking the medication because she would not be able to keep them down.

60. The slightest sound or movement just compounded my headache. I would close my door, close the drapes – my daughter bought me like this . . . a mask to put on – pillow over my ears. I didn't even want the dog, the dog always wanted to come in with me (Judy and researcher laugh). I didn't even want him jumping on the bed you know – just leave me alone.

The slightest movement or sound compounds Judy's headache. She would close the door and drapes and put a mask over her eyes and a pillow over her head. Judy could not even stand to have her dog on the bed with her. She wants to be left alone by everyone.

61. I have a phone right next to my bed and I will never forget one time the phone went off. I, I wanted to smash it! Piercing, I mean my head just felt like it was going to explode.

During one headache, the telephone which was next to her bed rang. It sounded piercing and Judy felt as though her head was going to explode.

62. I tried ice on my forehead and neck, but nothing seemed to ease the pain

On the occasion described, Judy tried to put ice on her forehead and neck, but nothing seemed to ease the pain.

63. [the pain] by now was like a 'sharp knife' penetrating between my eyes and through my head

At this point, the pain was like a sharp knife penetrating between Judy's eyes and through her head.

64. I was always the fixer upper. Even with, when my parents were living, but I was – I’m the youngest of three – the one my parents relied on. Judy to the rescue.

Judy thinks of herself as the person who solves problems in the family. She was the youngest of three children, but her parents relied on her. Judy felt that she came to the rescue.

65. when I’m experiencing a migraine, to me, this is not supposed to be happening.

Judy thinks that the migraine is not supposed to be happening.

66. And this is not life threatening. I mean in my mind I realize this, but while I’m having a migraine, I’m not able to do the things I have to do. I’m not able to care for my husband, I’m not able to get him up and get him showered at that time or have him exercise. Uh – if I have a doctor’s appointment or B__ does, I can’t do it.

Judy realizes that her migraine headaches are not life threatening, but they stop her from being able to do what she has to do. Judy is not able to get her husband up and showered. She is not able to have her husband exercise or go to a doctor’s appointment.

67. You know and . . .I’m also a person who won’t ask someone for help. That’s just me. I have wonderful neighbors who would come in a heart beat, take B__, you know, take him for a ride, take him to the doctor’s – whatever. But that’s my job. And I just you know . . .

Judy understands herself as someone who will not ask someone for help even though she has wonderful neighbors who would take B_ for a ride or to the doctor. Judy feels that these tasks are her job.

68. (When asked if it feels like the migraine robs her of her job.) Exactly, you know. It’s taking away from me precious time that I need to be doing for others.

Judy feels that the migraine robs her of her job. The migraine steals time that Judy needs to be doing things for other people.

69. my main job is not to be in the bed with a migraine or not to be held up

Judy does not feel that her main job is to be in bed with a migraine headache or held up in any way.

70. I get frustrated with myself. I blame me – it’s like suck it up (Judy and researcher laugh) It’s like, “what’s wrong with you – are you being a wimp or what!”

Judy is not sympathetic toward herself feeling frustrated. She blames herself for having the migraines and asks herself if something is wrong with her or if she is being a wimp.

71. (When asked if she is hard on yourself.) Ugh, you have to be – I want to do it.

Judy is hard on herself because she both feels that she has to be and she wants to be.

72. Not knowing what to do and afraid to take Tylenol, etc; I called my family doctor. I explained to him as best I could, what I was experiencing. He told me to

take one of my husband's M.S. Contin pills, to stay in bed and see him the next day after work.

During the incident described, Judy was afraid to take any medication. She called her doctor who suggested she take on of B_'s strong pain medications and to stay in bed until the next day when she could see him after work.

73. Uh, so after the first experience with the migraine, the doctor put me on a medication to help, but I had to – when I felt a migraine coming I had to take a pill. But being a teacher that wasn't always possible.

After the first migraine, the doctor put Judy on a medication to treat migraines. When she felt a migraine coming, Judy had to take the medication immediately which was not always possible at work.

74. I can't function, I can't teach, I can't do whatever.

While experiencing a migraine, Judy can not teach or do anything else.

75. And uh, we tried three different drugs and it didn't work,

Judy and her doctor tried three different medications that did not work.

76. so they put me on Depakote and as soon as my daughter heard that, she said, "You aren't bipolar mother, what are you doing taking that pill?" And I was like, "Well honey, it does help with migraine – let's give it a shot." And for a long time, it was fine – my migraines were kept in check.

Finally, the doctor put her on a mood stabilizer that helped her migraines and kept them in check for a long time. Judy's daughter, who works for a major drug manufacturer, disagreed with the decision to take this medication. Judy told her daughter that the medication helped and that she wanted to give it a shot.

77. The last . . . two . . . year and a half I've been getting more migraines.

Judy feels that the last year and a half to two years, she has been experiencing more migraine headaches.

78. So now I take Axert when I feel one coming on. But, now the Depakote – it worked fine, it doesn't bother me, no, um, but the Axert, I'm not bad. It knocks me out.

Judy takes a new medication to treat migraines when she feels a migraine coming on. This medication makes Judy extremely tired. The maintenance dose of the mood stabilizer does not have this side effect.

79. Now the good thing is, when I wake up, I don't have a migraine any more. But I feel like I have a hangover. It's just kind of like, "woah."

After taking the Axert, Judy wakes up with no migraine, but feels a hangover effect.

80. You know and from the time my head hits the pillow, I'm out. And when I wake up, it's just that really, "ooh" but then it shakes out.

Judy is knocked out from the time her head hits the pillow. When she wakes up, Judy feels woozy, but then the feeling shakes out.

81. But I don't lose, I don't like losing control and with a migraine you don't have control over it. I can't will it away. (When responding to the comment by the researcher that she still tries to will the migraine away) I do.

Judy does not like losing control, but she feels that she does not have control over the migraine. She tries to will the migraine away, but realizes that she can not do that.

82. I really don't like to be dependent on drugs.

Judy does not like to be dependent on medication.

83. Needless to say, the pill put me to sleep for about four hours.

During the incident in question, Judy slept for almost four hours after taking B_'s pain medication.

84. When I awoke, I felt sluggish, but my head only had a dull – ache in it.

When Judy woke up, she felt sluggish and her head still had a dull ache in it.

85. After bathing, I went right back to bed, afraid to get the headache back.

Judy bathed and then went right back to bed fearing the migraine would return.

86. During this time, I was unable to think clearly or do the simplest chore. (When asked what it is like to not be able to do the simplest chore) It's terrible.

During the headache, Judy was not able to think clearly or do the simplest chore. She feels it is terrible to not be able to do a simple chore.

87. I . . .being in school one time I was getting one and before they could get somebody to relieve me. I should have just left, but I couldn't do that.

Judy remembers a time she was working and was getting a migraine. She felt she had to stay until there was someone to relieve her, even though she should have left when the migraine began.

88. I can remember I taught reading and a couple of sixth graders came up to my desk and they had a question for me. And I can recall just staring at them and one of my little boys just put his hand on mine and said, "You aren't all right, are you?" and I remember just staring thinking, "I have to say something," but I was afraid if I said something, I was going to cry or you know, "just go sit down and do this" and it was just a dumb question . . . I mean a simple question that they needed clarification and I couldn't do it. I looked at him and I said, "Go get Mrs. H__ for me." I couldn't help them, I couldn't help them.

One time when Judy was experiencing a migraine, two of her students came to her desk to ask her a simple question. Judy found herself unable to respond to their question. The one student put his hand on Judy's hand and asked her if she was all right. Judy was afraid to answer because she thought she might cry. Judy told the students to get another teacher. Judy was unable to help her students.

89. She was right next door and she came over and took one look at me and she knew.

The other teacher was next door. When the teacher looked at Judy, she knew there was something wrong.

90. And it was at that point that G__ knew I couldn't drive home or that I shouldn't drive home. I live in TP, I taught at TMS – a mile, maybe a mile and a half at most. She had someone else drive me home.

This teacher knew that Judy should not drive home, even though it is only a mile to her home. The teacher found someone else to drive Judy home.

91. The only thing that is going on is that headache. You know and it's like my brain waves are all focused. It's like how can so many of them be beating inside my head (Judy and researcher laugh) at the same time? And that is the only thing that is going on in my head at that time is that headache.

When experiencing a migraine, the only thing that is happening for Judy is the headache. She feels that her brain waves are all focused and she wonders how so many of them can be beating in her head. The only thing happening in Judy's head is the headache.

92. That headache shuts everything out. It shuts me down.

The migraine shuts everything out and shuts Judy down.

93. Bending over, walking or even talking made the pain worse.

During the incident, Judy found that bending over, walking and talking made the pain worse.

94. It was the next morning that I realized that I had not had just an ordinary headache.

The next morning after the headache was resolved, Judy realized that she did not have an ordinary headache.

95. For me it's very . . . (sighs) . . . it's very traumatic. I don't want to be sick, I'm not supposed to be.

Having a migraine is very traumatic for Judy. She feels that she is not supposed to be sick and that she does not want to be sick.

96. I cared for my mother, I cared for my dad, I've cared for B__ since he was 40. My mother-in-law, um, you know I was the support – I was the strong one in the family.

Judy conceptualizes herself as the strong one in the family having cared for her mother, dad, B_ and her mother-in-law. She was everyone else's support.

97. And in my mind, I'm letting everybody down – here I am, I'm not supposed to get sick. I'm not supposed to be in bed.

Judy feels that she is letting everyone down when she is suffering from a migraine. She feels that she is not supposed to get sick and to be in bed.

98. (In talking about stress as a factor in the experience of migraine) But I found that I would get a migraine when there was a great level of stress at home.

Judy found that she would be more likely to experience a migraine when there was a great level of stress at home.

99. There have been times I've gone out in the back yard and just let out a hoot. (Judy and researcher laugh). "Hello?!" But I do keep it in. But it's just, um – I keep it in and I know I should have an outlet. I should have, but it's hard to do. But it's hard to do.

Judy finds times when she is in the back yard and wants to yell out and ask if anyone is there. However, she keeps her feelings in. Judy knows she should have an outlet, but finds it very hard to do.

100. I have two grown children, um, our son lives with us on and off – he's engaged, but he has seen his father going down hill. Whereas, our daughter who lives further away um, she will call and be upset with me, "You aren't making dad do this or that." She works for (a major drug manufacturer), so she has all the answers (sarcastically) – I mean I love her dearly, but then I kind of get it from her even though she is doing it lovingly.

Judy's two children have different perspectives on B_'s illness. The son, who is home more often, has seen first hand his father's decline, whereas the daughter who lives out of town is often hard on Judy in terms of her care of B_. The daughter states that Judy is not making B_ do certain things that could help him. Judy feels that she is being given a hard time from her daughter, even though the daughter makes comments out of concern.

101. When my dad passed away, um, B__ was in the process of getting off MS Contin and Morphine and at that time I was the punching bag.

At the time when Judy's father passed away, B_, who became addicted to pain medication, was in the process of getting off of the medication. At that time, Judy felt that she was B_'s punching bag.

102. I try to keep things even keeled at home. And it's not easy with my husband, it just is not. Stress is a very large, it's very high in my life because of B__.

Judy tries to keep an even keel at home even though it is difficult with her husband. Because of B_, stress is high and is a large factor in her life.

103. I'm very sore after I have one. I think I have myself so stiff and trying to be so still and almost trying to will it away. You know it's like, "I'm going to get rid of this" so then I'm going to take ten minutes to get rid of this, but I get really stiff because I'm so sore after. OK – usually after an episode I said I'm so stiff. We have a hot tub, so I get in the hot tub. But I can't go to the hot tub during a migraine. The jets – there is no way, but afterwards I massage the neck, my back and shoulders.

After a migraine, Judy is very sore. She thinks that part of the reason she is sore is because during the headache, she tries to hold herself so stiff in an effort to get rid of the migraine. After a migraine, Judy gets in the hot tub, which she would not be able to go into during a migraine because of the noise the jets make. After a headache, however, the hot tub massages her neck, back and shoulders.

104. I don't feel I'm lacking control, I feel I'm . . . More I'm letting my husband down because I mean he depends upon me for everything now. And um . . .it's like I'm just a total letdown.

Judy does not feel that she is lacking control, but feels that she is letting B_ down. B_ is fully dependent on Judy and she feels that she is a total let down when she has a migraine.

105. It makes me feel inferior.

Experiencing the migraine makes Judy feel inferior.

106. I'm very sluggish after a migraine. Like I said, I'm stiff, I'm sluggish. It's almost as if, like everything has been drained from me.

After a migraine, Judy feels very sluggish and stiff and as though everything has been drained from her.

107. It's like a battle. It's like, you know, I've been fighting and I haven't won the war yet. Fighting for you know . . .

Judy feels that the migraine is like a battle that she has been fighting, but she has not won the war yet.

108. I remember one that was really bad. It just felt like someone hit me with a two by four. My head just ached for a couple days. It wasn't a migraine, but the ache was still there.

Judy remembers a time that she had a very severe migraine where her head felt as though someone had hit her with a two by four. Afterward, her head ached from several days, even though the migraine was resolved.

109. One time B__'s sister and her husband were coming and we were going out to dinner. . .and uh. . .in fact I don't think anything was wrong and probably an hour before they came, I felt one start coming and I thought, "Oh no." I'm going to get in the shower, let the water hit my neck. I went to get dressed and a half hour later, I laid on the couch. I thought, "OK, if I put that mask on and the heck with the eye makeup – just lay there." By the time they got there, I said, "I can't go" and B__ said, "Yeah, you can't go." I have to go to bed and it was just like . . . you know and I didn't, but he did go and they brought me home dinner which I couldn't eat

Judy recalls a time when B_'s sister and husband were going to go out to dinner with them. Before they came, Judy felt a migraine coming on. She got in the shower to let the water hit her neck, she then laid on the couch. By the time they arrived, Judy said she could not go out and said she had to go to bed.

110. It was devastating

Not being able to go out to dinner was devastating for Judy.

111. because B__ . . . it's very hard to get him out. I mean to get him to the doctor's, umm, he feels people look down upon him because of his disability and they look at him. So to get him to go out, I have to work at it.

It takes a great deal of effort to get B_ out of the house because he feels that others look down on him because of his disabilities. Judy has to work at getting B_ out of the house.

112. So maybe that's why I got the headache - he was finally fine with going out and I couldn't go (laughs).

Judy speculates that perhaps the reason she got the headache was because B_ was finally fine with going out and she was not able to go.

113. So it's just like, no – these things don't happen to me. I'm trying to be bigger than life. I think when you're a caregiver – it puts you, you aren't supposed to be the one who is down. I truly feel that I'm letting B__ down, I really don't want to get one.

Judy feels that migraines should not happen to her; as a caregiver, she is not supposed to be down. Judy feels that she is trying to be bigger than life. When she has a migraine, she truly feels she is letting B_ down and she does not want to get one.

114. And I hate that, you know, to even tell him, you know, "You can't bother me right now."

Judy hates to have to tell B_ that he is not able to bother her while she has a migraine.

115. (When asked if it hurts her to say that) It does. He falls a lot and it's like – if you fall down, I can't pick you up. You know, you're on your own.

It hurts Judy to say to B_ that he is on his own, that if he falls down, she can not pick him up.

116. Um, my life changes when I have a migraine and I can't focus, I need to be . . .

Judy's life changes when she has a migraine – she is not able to focus.

117. I'm upset with myself and I feel as though I'm letting other people down. I can't change anything, but I can't get rid of the migraine, but I can handle just about anything else.

Judy becomes upset with herself feeling that she is letting others down. She feels she can handle just about anything, but she is not able to handle the migraine.

118. There are a lot of things I don't like to handle, but I do, but I can still function. I think the biggest thing with migraine that people don't realize is that you don't function with them. You never get half a migraine (Judy and the researcher laugh) – it's like, OK I'll just take a little bit now. In my instance I don't, it's never, this is a mild one or whatever. They're all bad – some are worse than others. It's never like, "Oh, I had a little migraine."

Judy says there are many things she does not like to handle, but she handles them and can still function. With a migraine, however, she is not able to function. There is never a half a migraine or a little migraine. For Judy, they are all bad even though some are worse than others.

119. OK, um I have always felt that I'm a strong person, um, when my husband and I were forty, he had a stroke and things started to change. I mean he has had just multitude after multitude of problems you know and uh . . . it was OK, I was the one to be in charge which I had not been until then. I mean together we would pay the bills and decide ho much money we were setting aside for the kids or whatever and that was never a problem. Money wasn't a problem, but then all of a sudden I was taking care of the money and I was taking care of the bills and I was making the decisions because rationally, um, from '96 on, he couldn't make those monetary decisions. After letting him go through thousand of dollars on nothing, I mean giving it away and I felt badly - I had to be strong for him. Um, when I got meningitis, it was really weird. I called my son and I didn't want to call my husband, but luckily you can get over it. I mean, hospitalized for a couple days, um, but to me that was a real blow that something could attack me.

Judy feels that she is a strong person and that she can handle anything. Her life has changed a great deal since her husband had his stroke. Judy had to be in charge and start making decisions on her own that heretofore had been made by both of them, particularly with regard to finances. Judy feels she has to be strong for B_ and then when she contracted meningitis, she realized that something could attack her. This realization was a real blow to Judy.

120. A long time ago, I learned there is only one constant in life and that is change. And either you accept it and move on or you are left behind and I learned that with my husband. Um...I really I mean, I have a migraine and I can't control the situation, you know? To me, that is devastating because I can't change the fact that I get a migraine.

Judy knows that the only constant in life is change and that a person has to accept that and move on or be left behind. She can not control the situation when she has a migraine and to her this is devastating. Judy can not change the fact that she gets migraines.

Appendix E: Nancy's Data

Situated Narrative: Nancy

Identity

It was difficult for Nancy to pick a single time when she had a headache. She could not remember a time that she did not have headaches. Nancy was not sure how old she was when she had her first migraine; she felt that she had always had headaches. Nancy experienced a feeling of pain that would centralize behind her right eye. She had this type of headache for many, many years during her late twenties. These headaches would last for two or three days.

Nancy did feel that the migraine was a disability handicap that she would be cursed with for the rest of her life. Nancy did feel under attack by the migraines at one time. Nancy felt that the migraine headaches were her identity – that was the person she was.

Pain

The headaches Nancy had by the time she was in middle school to high school involved a pain that traveled in a pattern around her head. The point of pain was a theoretical intersection if she stuck a finger behind her right eye and another in her temple.

Nancy remembered many times that she was in miserable pain and not able to withdraw and crawl under the covers. Nancy had worked with significant pain as she assumed that all people have.

Other Symptoms

Nancy did not have an aura, visual disturbance or nausea with migraine headaches. The precursor of a migraine was a slight tingling pain which was not in a particular area. Nancy had the sensation of fingers crawling up the back of her neck. Usually Nancy's headaches progressed gradually and lasted 24 hours.

Nancy felt outside herself when she had a migraine. Nancy experienced a fuzziness and lack of clarity. Nancy felt that she had a dys-fluency in her speech during a migraine headache, that her tongue was thick and she could not form her thoughts.

Nancy often had a mixed headache (migraine and tension). Typically massage would help Nancy who felt it was the most natural thing to do.

The migraine was finally over when the numb feeling was gone. Nancy did not feel that the migraine was over until she felt perfectly normal again. A clarity came over Nancy. When she felt no tingling, sensation or paresthesia of any kind, the headache was resolved. When Nancy took Fiorinal, she would have a fuzzy sensation after the headache. She felt in the clear when the fuzziness subsided.

Medication

When Nancy was younger, she went to several doctors who would prescribe her medication. The medications would lose their effectiveness over a certain period of time. At first Nancy took Tylenol and Advil which would eventually take care of the

headaches. By the time Nancy was in her late twenties, she was taking Advil very frequently, usually three at a time.

Nancy had serious migraines after her second child was born in the late 1970's and she began taking birth control pills again. A severe headache occurred after which she contacted a neurologist. He began Nancy on a prophylactic regimen of Inderal. The Inderal helped Nancy for a while, but then she returned to her Advil regimen. Nancy had taken quite a number of different medications. Nancy did not even remember all of the medications.

Nancy began seeing a neurologist two and a half years before the time of the interview who prescribed her a prophylactic regimen of Depakote which she took twice daily. If Nancy felt a migraine coming on, she would take Midrin immediately to abort the migraine. Nancy knew exactly how to take the Midrin, which has a complicated dosing regimen. If the Midrin did not give her relief, Nancy would take a strong pain medication and Tylenol. Rarely, this would not work; at that point, Nancy would take two tablets of pain medication which made her fall asleep.

Nancy wanted to get to the headache right away with medication and would only let the pain go for five minutes. If Nancy got her medication during the precursor phase, she would feel that she got her headache in time to prevent severe pain. If Nancy did not take her medication immediately at the first twinge of pain, then it would develop into a full migraine.

Since the incident described below where she did not have access to her medication, Nancy would never be without it. She always had it with her even if she was going to a formal event and was only carrying a small purse.

Nancy would interrupt anything she was doing to take the medication. She ably took the medication even if she had no access to water to help her swallow the pill. Nancy's freedom was in carrying the medication with her.

Headache Control

Nancy finally felt that her headaches are under control at age 50 due to the care and follow up of a neurologist who specialized in headaches. While Nancy felt that the migraine headaches were under control at the time of the interview, she knew that there could be a time when the medications could lose their effectiveness.

Nancy had seriously and aggressively pursued migraine prevention and treatment in the last ten years. Nancy was going to continue to be aggressive about pursuing treatment.

Nancy thought she had to live with the migraine headaches, but had realized she did not have to. Nancy felt that she was getting her life back since she could take care of the migraines at this point. Nancy felt that her freedom was having her medication with her and knowing that it would work. She felt that she did not have to worry any more about getting a migraine headache.

A Migraine Experience

About a year and a half before the interview, Nancy, a guidance counselor, suffered a severe migraine while at work. The fire alarm was tripped accidentally and Nancy had to go outside. The sound of the alarm was not a factor in triggering the migraine headache.

Once outside, Nancy was standing in the bright sun light. Nancy felt that there had been a couple times when she had gotten a severe migraine when heat and bright sunlight were involved.

Nancy's head began to hurt as a general ache; it did not hurt in just one spot. She did not have her purse or access to medication.

Nancy was talking to a student. She began to feel her legs weaken as she continued her conversation. Nancy felt as though she may faint. It was a new sensation to Nancy to feel her legs becoming weak. This was the only time during a migraine where she felt her knees weakening. This feeling scared Nancy.

One of Nancy's coworkers realized that there was something wrong with her. The coworker knew Nancy was not feeling well and told Nancy as much. Nancy excused herself from the student, saying that her head was pounding. After the headache was resolved, Nancy apologized to the student she had been talking to saying that she wished she could have spoken to the student longer. The student said she did not realize that Nancy was having a migraine headache.

It was of concern to Nancy that the headache was progressing so rapidly. Nancy felt as though the headache was overtaking her, although it did not typically happen that quickly. Nancy experienced a surrounding feeling of pain. She felt as though she was losing control and that she was not able to think straight or speak properly.

Nancy massaged her neck and temple to try to relieve the pain. The massage actually increased the pain.

A coworker, who was a friend of Nancy's, led her to the car. Nancy lay down and closed her eyes in the car, which was air conditioned and somewhat shaded. Nancy thought after resting that the pain would subside, but it did not.

Nancy decided to leave work. She turned down offers to drive her home which was only ten minutes away. Nancy did not want to bother anyone to drive her home. Nancy did not think it is difficult to ask for help, but she realized that her coworkers have their own responsibilities. Had Nancy lived further away, she would have asked for a ride home.

Once home, Nancy got into bed to try to sleep. Her head felt like it was going to explode.

Nancy felt very fearful at this time. During the headache, she wondered what it would feel like to have a stroke or an aneurism, comparing it to the pain she was experiencing. Nancy realized that these thoughts were irrational, but it was difficult to be rational while in such pain. Nancy began to think of worse scenarios (such as a stroke or aneurism) and how she would handle these scenarios.

Nancy took the recommended medication which had no effect. Several hours later, Nancy called her neurologist who prescribed a narcotic pain medication which did relieve the pain.

After taking the medication, Nancy felt exhausted. The next day, Nancy felt a numb feeling in her head. She was not fully clear and alert.

Other Experiences

Nancy experienced a migraine headache during a football game where it was 90 degrees and she was sitting in direct sunlight. Nancy dressed appropriately and had water

and ice, however, she was miserable with a migraine. Nancy took medication during this time, but the direct sunlight was a trigger for her to have a migraine.

Nancy felt that during the football game, the migraine was a handicap. She wanted to leave, but everyone else was having fun. She returned to her relative's house and went directly to bed.

During a meeting one time with parents and administrators, Nancy began to develop a headache. Nancy excused herself from the meeting to take some medication.

She was quickly experiencing a fuzzy feeling. During the meeting, Nancy was asked an unexpected question. Nancy began to answer the questions, but she felt that she did not know what she was saying. Nancy knew that her thoughts were coming out clearly, but she could barely manage to get her thoughts together and was not speaking as fluently as she normally did. Nancy did not think her thoughts sounded unclear, but she felt panicky which she covered.

Nancy apologized to the parents and administrators after the meeting for not giving them as much information as they wanted. She told them she was not feeling well and that her head was fuzzy.

Relationships

Nancy believed that others could see when she had a migraine headache. The headache itself was not visible, but the impact it had on her was visible to others. The physical impact, such as change in coloring or complexion was visible as well.

Nancy felt that the migraines did not impact her family members. Nancy felt that the migraines would have affected on her family if she were a person who complained. Nancy knew of others who "play the drama queen," but Nancy was not like that.

Nancy felt that she could take care of the headache. She removed herself from the family members until the headache was resolved and then she rejoined them. Nancy felt that stepping back from her family during a headache did not interfere with her relationships with them since they understood that she was suffering from a headache. They understood the problem and had witnessed the frequency and intensity of Nancy's experiences.

Nancy was compassionate, understanding and encouraging of others who suffered from migraine headaches telling them they did not have to live this way.

Feelings about the Migraine

Stress was not a big factor in Nancy's experience of migraine headaches. Nancy felt at one time stress was a bigger factor, but as she had gotten older, she had learned how to deal with stress more effectively. Nancy had experienced periods of tremendous stress in her life, but she had not had headaches during those times of stress. Nancy did not experience migraine headaches when the stress was resolved. She felt she got the headaches for no reason.

During the time Nancy did not have effective treatment, she did not worry about getting a headache, although she felt that some people do. Nancy again reiterated she got headaches for no reason, they just happened. Nancy was not frustrated by the migraines happening for no reason. She was past feeling frustrated.

Nancy did not worry about getting the headaches any more; if a migraine occurred, she could take care of the headache. Nancy's personality was not one to worry about getting a headache. The migraine headaches did not prevent her from enjoying life's activities.

Nancy identified strongly as a migraineur – that was her. Nancy did not think it was unfair that she suffered from migraine headaches. She felt everyone had something to deal with. Nancy felt that when she had a headache, she had to take care of her own needs.

Nancy felt as though she needed to always have control. Nancy had a great deal of responsibility with her job and her church. She was unable to miss church because she was a member of the music team. Nancy acknowledges that there were times when a person became sick, but she had a number of people that depended on her to do a number of things.

Meaning Units and Psychological Interpretation: Nancy

1. It's hard to pick a single time when I have had a migraine, since I can't remember not having them.

It is difficult for Nancy to pick a single time when she has had a headache. She can not remember a time that she did not have headaches.

2. I don't know how old I was when I had a migraine. I have always had headaches.

Nancy is not sure how old she was when she had her first migraine; she feels that she has always had headaches.

3. I would say probably by the time I was in middle school or junior high school and in high school I had the type of pain that I felt if I stuck my finger back behind my right eye and then another in my temple and they intersected that would be the point of pain. And it would travel in a pattern around my head

The headaches Nancy has by the time she was in middle school to high school involved a pain that traveled in a pattern around her head. The point of pain was the theoretical intersection if she stuck a finger behind her right eye and another in her temple.

4. and that was the type of headache I had for many, many years.

Nancy had this type of headache for many, many years.

5. At 50 years old, I finally feel my headaches are under control because of the care and follow up of a neurologist specializing in headaches

Nancy finally feels that her headaches are under control at age 50 due to the care and follow up of a neurologist who specializes in headaches.

6. but until a couple years ago I felt this was a disability handicap I would be cursed with for the remainder of my life.

Nancy did feel that the migraine was a disability handicap that she would be cursed with for the rest of her life.

7. it is a big part of my life and I remember thinking many, many times that this is something I am going to suffer with all of my life

Migraine headaches are a big part of Nancy's life and she thought she was going to suffer with them for the rest of her life.

8. because even though I would go to a doctor and something would be prescribed – it would lose its effectiveness over a certain amount of time.

Nancy went to several doctors for treatment who would prescribe her medication. The medications would lose their effectiveness over a certain period of time.

9. (When asked if she feels under attack) I did feel that way.

Nancy did feel under attack.

10. it's under control right now. But I also know there could be a time when these medications could lose their effectiveness.

Nancy feels that the migraine headaches are under control now, however she knows that there could be a time when the medications could lose their effectiveness.

11. at those times that I didn't have effective treatment I didn't worry about when was I going to get a headache. I'm sure some people do.

During the time Nancy did not have effective treatment, she did not worry about getting a headache, although she feels that some people do.

12. But my personality is not that – it did prevent me from enjoyment from a lot of life activities.

Nancy's personality is not one to worry about getting a headache. The migraine headaches did not prevent her from enjoying life's activities.

13. There were many times I was miserable, um in pain and certainly not able to crawl under the covers.

Nancy remembers many times that she was in miserable pain and not able to withdraw and crawl under the covers.

14. I was like, well here it is – this is me.

Nancy identifies strongly as a migraineur – that is her.

15. (When asked if there was a feeling of it being unfair) No, I think everyone has something to deal with and that was mine.

Nancy does not think it is unfair that she suffers from migraine headaches. She feels everyone has something to deal with.

16. I will described a severe migraine that occurred about a year and a half ago. I am a middle school counselor (no, that's not the reason!) and once we went outside when the fire alarm system was tripped accidentally by an electrician.

About a year and a half ago, Nancy suffered a severe migraine while at work. The fire alarm was tripped accidentally and Nancy had to go outside.

17. I don't believe sound had anything to do with it.

Sound was not a factor in creating the conditions for a migraine headache.

18. As I stood outside, which happened to be in bright sun light. (When asked about sunlight) But I do see now, after that there have been a couple times where I have gotten a very bad migraine where heat and bright sunlight will bring it on. Real heat, heat and light.

Nancy was standing in the bright sun light. Nancy feels that there have been a couple times when she has gotten a severe migraine when heat and bright sunlight were involved.

19. I felt my head starting to hurt. It didn't hurt in just one spot, but was a general ache.

Nancy's head began to hurt as a general ache; it did not hurt in just one spot.

20. Uh, it's not an aura, I don't get those – I have never thrown up with a headache. Um, I don't see any lights or anything

Nancy does not have an aura, visual disturbance or nausea with migraine headaches.

21. the sensation is just . . . maybe a slight tingling pain. And not in a particular area, but I know it's the precursor of a headache

The precursor of a migraine is a slight tingling pain which is not in a particular area.

22. so if I get that Midrin, I'm good.

If Nancy gets her medication during the precursor phase, she will be good.

23. I did not have my purse & therefore no access to any medication.

Nancy did not have her purse or access to medication.

24. (When asked more about not having medication) Well that's never going to happen again . . . I always have that with me. If we are going somewhere fancy and I have a little tiny purse or whatever, my headache medication is going to be in there.

Since that incident, Nancy will never be without her medication. She always has it with her even if she is going to an event with a small purse.

25. (When speaking about previous experiences with various medications) I would take Tylenol, Advil and eventually they (the headaches) would go away. I would say probably by the time I was in my late 20's I was taking Advil very frequently, um, I would take three at a time

At first Nancy took Tylenol and Advil which would eventually take care of the headaches. By the time Nancy was in her late 20's, she was taking Advil very frequently, usually three at a time.

26. Most of the time and uh sometimes these headaches would go on for two or three days.

The headaches Nancy suffered from in her late 20's would last for two or three days.

27. I did have one bout when I . . . I'm trying to remember this exactly now (sigh) . . . After my second child was born and I went back on birth control pills – I had gone back on birth control pills and I had a serious migraine headache which put me in bed and at that time I contacted a neurologist and he prescribed Inderal for me and this was probably around the late 70's.

Nancy had serious migraines after her second child was born in the late 1970's and she began taking birth control pills again. A severe headache occurred after which she contacted a neurologist. He began Nancy on a prophylactic regimen of Inderal.

28. And that seemed to worked pretty well for me and uh, I took that for a while and then quit and then I was back to my Advil regimen

The Inderal helped Nancy for a while, but then she returned to her Advil regimen.

29. but in the period of the last maybe ten years I have seriously and aggressively gone after migraine prevention and treatment

Nancy has seriously and aggressively pursued migraine prevention and treatment in the last ten years.

30. So I have been through a lot of mediations. I started with Inderal and Imitrex and uh I don't even remember

Nancy has taken quite a number of different medications. Nancy does not even remember all of the medications.

31. But I do go to see Dr. K__ now. Who I have been going to for maybe about two and a half years and uh what has worked for me right now is to use Depakote. Daily, morning and evening as a preventative measure.

Nancy began seeing a neurologist two and a half years ago who prescribed her a prophylactic regimen of Depakote which she takes twice daily.

32. And I take a Midrin if I just start to get a headache I will instantly take that Midrin. I know exactly how many to take and everything.

If Nancy feels a migraine coming on, she will take Midrin immediately. Nancy knows exactly how to take the Midrin.

33. And if that doesn't work, I will take Fiorinal. I will start with a Fiorinal and Tylenol first.

If the Midrin does not give her relief, Nancy will take a pain medication and Tylenol.

34. If that doesn't work, which is rare, I take two Fiorinal and then that's going to put me out.

Rarely, this will not work; at that point, Nancy will take two tablets of pain medication which makes her fall asleep.

35. So if I can get to that headache right away, I am really going – now I am even getting at letting the pain go for maybe five minutes

Nancy wants to get to the headache right away with medication and will only let the pain go for five minutes.

36. I was talking to a student, and as the conversation continued I felt my legs weaken as thought I might faint.

Nancy was talking to a student. She began to feel her legs weaken as she continued her conversation. Nancy felt as though she may faint.

37. I think any time you are not feeling well whether it is a migraine or whatever, people can see it – they can't see a headache, but they can see how the headache is affecting you. They can see the expression on your face – the fact that you are . . . that you are not well. They can see your complexion or coloring change – whatever it might be.

Nancy believes that others can see when she has a migraine headache. The headache itself is not visible, but the impact it has on her is visible to others. The physical impact, such as change in coloring or complexion is visible as well.

38. It was noticeable to that teacher. She said, "You're not feeling well."

One of Nancy's coworkers realized that there was something wrong with Nancy. The coworker knew Nancy was not feeling well.

39. However, I did see that student later and I, I said, she's like a twelfth grader.

And I said, "J__, I had the worst migraine the other day, I really wish I could have talked to you longer." And she said, "I didn't know that." She didn't know.

Nancy apologized to the student she had been talking to saying that she wished she could have spoken to the student longer. The student did not realize that Nancy was having a migraine headache.

40. But then again, you have to take care of your own needs.

Nancy feels that she has to take care of her own needs.

41. (When asked about how migraines impact family members) It doesn't.

Nancy feels that the migraines do not impact her family members.

42. Uh, it might if I were a complainer, but I'm not going to allow it to impact them.

I take care of it – I remove myself until it's taken care of and then I will rejoin them

Nancy feels that the migraines would have an impact on her family if she were a person who complained. However, she feels that she can take care of the headache. She removes herself from them until the headache is resolved and then she will rejoin the family.

43. I mean I certainly know people who get very bad headaches and they play the part of the drama queen, but that's just the way they want to do it.

Nancy knows of others who "play the drama queen," but Nancy is not like that.

44. If you got the flu or cold, you are going to step back a little bit. (When asked what that is like to step back from your family) It doesn't interfere. Because they understand what the problem is. And the intensity of it and the frequency of it over a period of the years, "Oh well, mom's just got a headache."

Nancy feels that stepping back from her family during a headache does not interfere with her relationships with them since they understand that she is suffering from a headache. They understand the problem and have witnessed the frequency and intensity of Nancy's experiences.

46. This was a new sensation to me

It was a new sensation to Nancy to feel her legs becoming weak.

47. My headache was progressing rapidly, which concerned me,

It was of concern to Nancy that the headache was progressing so rapidly.

48. if I don't take medication immediately, at the very first twinge of pain, it is too late.

If Nancy does not take her medication immediately at the first twinge of pain, then it will develop into a full migraine.

49. (When asked about feeling as though the headache was overtaking her) Well maybe that's a good way to describe it – normally it doesn't happen that quickly.

Nancy felt as though the headache was overtaking her, although it does not typically happen that quickly.

50. It's a very gradual thing

Usually Nancy's headaches progress gradually.

51. if it was something like this one, I described, it was just a surrounding feeling of pain

Nancy experienced a surrounding feeling of pain.

52. And fuzziness and . . . not being clear.

Nancy experiences a fuzziness and lack of clarity.

53. By this time I felt I wasn't able to think straight or speak properly, almost as though I was losing control.

Nancy felt as though she was losing control. She was not able to think straight or speak properly.

54. (When asked to elaborate on the issue of control) Well, I'm a person that needs to have the control all the time.

Nancy feels as though she needs to always have control.

55. I mean I have a job with a lot of responsibility, I am also a musician in my church and I can't not be there.

Nancy has a great deal of responsibility with her job and her church. She is unable to miss church.

56. I mean there are obviously times when you get sick, but, um, there's a lot of people that depend on me to do a lot of things

Nancy acknowledges that there are times when a person becomes sick. Nancy has a number of people that depend on her to do a number of things.

57. I mean certainly we have all worked with pain and significant pain.

Nancy has worked with significant pain as she assumes that all people have.

58. I am going to continue to be aggressive about pursuing treatment.

Nancy is going to continue to be aggressive about pursuing treatment.

59. Of course, this alone is a very frightening phenomenon

Losing control is a frightening phenomenon for Nancy.

60. I excused myself from the student, saying my head was pounding.

Nancy excused herself from the student explaining that her head was pounding.

61. Massaging my neck and temple did not relieve any pain, but in fact increased it.

Nancy massaged her neck and temple to try to relieve the pain. The massage increased the pain.

62. I do have often a mixed headache – migraine and tension headache, so you know, just the muscle massage will just relieve – I mean it would relax anybody . . . that’s the most natural thing to do isn’t it?

Nancy often has a mixed headache (migraine and tension). Typically massage will help Nancy who feels it is the most natural thing to do.

63. By this time, a teacher friend noticed me with concern and led me to her car where I sat down and laid my head back and closed my eyes. She turned the air conditioner on, and the car was somewhat more shaded.

A coworker, who is a friend of Nancy’s, led Nancy to the car. Nancy lay down and closed her eyes in the car, which was air conditioned and somewhat shaded.

64. I thought after a couple of minutes of rest the pain would subside, at least a little but it didn’t.

Nancy thought after resting that the pain would subside, but it did not.

65. I decided to leave work & turned down offers to drive me home, only ten minutes away.

Nancy decided to leave work. She turned down offers to drive her home which is only ten minutes away.

66. (When asked to elaborate on turning down offers of help and not wanting to be a burden on anyone) I didn’t want to bother anybody

Nancy did not want to bother anyone to drive her home.

67. (When asked if it is difficult to ask for help) No, I just didn’t want to bother anyone. They had their own responsibilities – someone would have to take care of covering them.

Nancy does not think it is difficult to ask for help, but she realizes that her coworkers have their own responsibilities.

68. Had I lived further away, it would have been a different story. Being only ten minutes away, I felt I could do that.

Had Nancy lived further away, she would have asked for a ride home.

69. Once home, I got into bed to try to sleep.

Once home, Nancy got into bed to try to sleep.

70. My head felt like it was going to explode.

Nancy's head felt like it was going to explode.

71. That was a time where I was very, very fearful.

Nancy felt very fearful at this time.

72. I wondered what it would feel like if someone had a stroke, if I was having a stroke, what the difference would be. I wondered what having an aneurism would feel like. I have a friend who died of an aneurism. Just very, very quickly.

During the headache, she wondered what it would feel like to have a stroke or an aneurism, comparing it to the pain she was experiencing.

73. And all of these things run through your head – you are trying to be rational. But your thought becomes irrational when you are in that much pain.

Nancy realizes that these things are irrational, but it is difficult to be rational while in such pain.

74. And you start to think maybe what is the worst possible scenario that could happen and how would I take care of that

Nancy began to think of worse scenarios (such as a stroke or aneurism) and how she would handle these scenarios.

75. I took the recommended medicine, which had no effect.

Nancy took the recommended medication which had no effect.

75. Several hours later, I called my neurologist who called in a narcotic-based pain killer for this particular headache. The medication did finally relieve my pain, but I felt completely exhausted afterwards.

Several hours later, Nancy called her neurologist who prescribed a narcotic pain medication which did relieve the pain. After taking the medication, Nancy felt exhausted.

76. had a “numb” feeling in my head – feeling as though I wasn’t fully clear and alert – throughout the next day.

The next day, Nancy felt a numb feeling in her head. She was not fully clear and alert.

77. The migraine lasts about 24 hours

The migraine lasts 24 hours for Nancy.

78. I wish I could describe what it feels like when that numb feeling goes away because that's when the migraine is over. I mean the pain is over, but I don't consider everything over until I feel perfectly clear and normal again.

The migraine is finally over when the numb feeling is gone. Nancy does not feel that the migraine is over until she feels perfectly normal and clear again.

79. (When asked if a clarity comes over her) Yes, I mean there is no tingling. There is no sensation of any kind. Paresthesia . . . um, all of that is gone.

A clarity comes over Nancy. When she feels no tingling, sensation or paresthesia of any kind, the headache is resolved.

80. I have had the type of sensation when it feels almost like fingers crawling up the back of my neck. Paresthesia . . . um, all of that is gone

Nancy has had the sensation of fingers crawling up the back of her neck.

81. with the Fiorinal I will have a little bit of that . . . fuzzy stuff. When that is gone, then I'm in the clear.

When Nancy takes Fiorinal, she will have a fuzzy sensation after the headache. She feels in the clear when the fuzziness subsides.

82. my family was at an Ohio State football game last September and it was 90 some degrees and we knew it was going to be hot, we dressed appropriately, I had a hat on, I had water, I had ice, we were sitting in direct sunlight and I was miserable.

Nancy experienced a migraine headache during a football game where it was 90 degrees and she was sitting in direct sunlight. Nancy dressed appropriately and had water and ice, however, she was miserable.

83. Now that was one of those times where it was a handicap – everyone was enjoying the game and I was like, “Please get me out of here.”

Nancy felt that during the football game, the migraine was a handicap. She wanted to leave, but everyone else was having fun.

84. And I went back to the relatives where we were staying and I went right to that bedroom

She returned to her relative's house and went directly to bed.

85. Of course I took medication throughout this, but the light is a trigger for me.

Nancy took medication during this time, but the direct sunlight was a trigger for her to have a migraine.

86. there is a feeling in a severe migraine of almost being outside of yourself,

Nancy feels outside herself when she has a migraine.

87. I have only had this one situation where I felt that my knees were rubber bands. And that scared me.

This was the only situation where she felt her knees weakening which scared Nancy.

88. I was in a meeting one morning with parents at school with administrators and the whole bit and I start to develop this headache.

During a meeting one time with parents and administrators, Nancy began to develop a headache.

89. I excused myself for a few minutes, shot down some medicine, came back and I just started fuzzing out so fast.

Nancy excused herself from the meeting to take some medication. She was quickly experiencing a fuzzy feeling.

90. Then when I was unexpectedly asked a question, “Well, Nancy, how would you respond to such and such?”

During the meeting, Nancy was asked an unexpected question.

91. I felt like I had no idea what I was saying. I could barely get my thoughts together in a clear sense. And I knew they were coming out clear but I wasn’t speaking fluently in my opinion, like I normally do

Nancy began to answer the questions, but she felt that she did not know what she was saying. Nancy knew that her thoughts were coming out clearly, but she could barely manage to get her thoughts together and was not speaking as fluently as she normally does.

92. I even told them alter in the meeting, I said I need to apologize for uh, you know, maybe not giving you as much information as you want, but I’m really not feeling well and my head is just really fuzzy right now

Nancy apologized to the parents and administrators after the meeting for not giving them as much information as they wanted. She told them she was not feeling well and that her head was fuzzy.

93. But it was just maybe a “dys-fluency” in my speech is what it was.

Nancy feels that she has a dys-fluency in her speech during a migraine headache.

94. I felt like my tongue was thick, like I couldn’t quite form my thoughts,

Nancy feels that her tongue is thick and she can not form her thoughts.

95. I didn’t think it sounded that way. Of course you get a little panicky. Which you cover.

Even though Nancy does not think her thoughts sounded unclear, however she felt panicky which she covered.

96. Stress doesn’t seem to be a big factor for me personally. I would say stress is not the biggest factor for me

Stress is not a big factor in Nancy’s experience of migraine headaches.

97. I would say it has been in the past – um, but as we get older and we learn how to deal with stress better, uh, that’s good.

Nancy feels at one time stress was a bigger factor, but as she has gotten older, she has learned how to deal with stress more effectively.

98. I mean I get a headache for no reason – it just happens. It just happens.

Nancy gets headaches for no reason. They just happen.

99. I mean, I have certainly had a lot of stress in my life. A great deal of stress – it might sound like I’m bragging and I’m not, but more than most people ever have absolutely. And I have not had headaches in those periods of stress.

Nancy has experienced periods of tremendous stress in her life, but she has not had headaches during those times of stress.

100. When asked if Nancy has headaches after the stress was over) Um, no. I get them for no reason.

Nancy does not experience migraine headaches when the stress is resolved. She gets the headaches for no reason.

101. (When asked if that would be frustrating) I’m beyond that because if I’m 50 almost 51 years old and I don’t remember not having a headache, I don’t worry about it any more. If it happens, I take care of it.

Nancy is not frustrated by the migraines happening for no reason. She is past feeling frustrated. She does not worry about getting the headaches any more; if it occurs, she can take care of the headache.

102. So many people as you say having migraines – it makes me compassionate or understanding and also encouraging. You do NOT have to live your life that way.

Nancy is compassionate, understanding and encouraging of others who suffer from migraine headaches telling them they do not have to live this way.

103. Because I thought you did. You don’t have to.

Nancy thought she had to live with the migraine headaches, but has realized she does not have to.

104. I’m getting my life back . . .something can take care of this the next time.

Nancy feels that she is getting her life back since she can take care of the migraines now.

105. The freedom is carrying the medicine in my purse – seriously because I will interrupt whatever I’m doing and swallow a pill without even any water. I mean I will have a Tic Tac or whatever or even with nothing,

Nancy’s freedom is in carrying the medication with her. She will interrupt anything she is doing to take the medication.

107. That is the freedom for me is making sure I have what I need with me. And that it’s going to work so I don’t have to worry any more.

The freedom is also knowing that the medication will work so that Nancy does not have to worry any more about getting a migraine headache.

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