HEALTH PROMOTION AT WORK:
EXPLORING EMPLOYEE PERSPECTIVES OF WELLNESS

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Abstract

This study explored (a) the types of health promotion messages employees prefer, (b) the behaviors they associate with healthy living, and (c) the factors that influence their decision to participate or not participate in workplace wellness programs. The literature review investigated the theoretical foundation for approaching health communication using a narrative paradigm and identified pertinent findings from workplace wellness programs studies. Thirteen semi-structured employee interviews were conducted at one company; qualitative analysis was conducted using a grounded theory approach.

Participants preferred television/video media for health education, spoke significantly of healthy eating practices but focused much less on physical activity as a healthy living behavior. The health model narratives involving a personal acquaintance as the protagonist had greater depth and coherence (fitting with the narrative communication paradigm) than celebrity stories. Participants also suggested expanding wellness activities and adding incentives to increase participation in workplace wellness programs.
Chapter 1. Introduction

1.1. The Problem and Study Goal

Following an optimal healthy lifestyle reduces a person’s risk of developing many serious health problems such as cardiovascular disease, diabetes and cancer. Certainly many health issues are beyond an individual’s control, but physical activity levels and diet are two health behaviors that people can personally manage. Yet, despite the availability of health guidelines, many people have difficulty practicing the necessary eating and exercise behaviors recommended for living healthy. “Super-sized” food portions and sedentary entertainment are frequently the norm in the United States today. Additionally most people face time constraints due to schedules filled with work, school, parenting, and family matters. As a result, simply finding time to exercise or shop for and prepare healthy foods becomes a real barrier to living a healthy lifestyle. The challenges of integrating healthy living into daily practice may be eased when the people in one’s social network help support and engage each other in practicing healthy behaviors. One place where many people spend a significant amount of time is their workplace, presenting a unique opportunity to use the workplace as an avenue for health promotion.

Engaging employees in healthy living behaviors is the first step toward making workplace wellness programs successful for employers seeking to manage health care costs and to optimize employee productivity. As such, the goal of this research was to explore best-practices of promoting wellness programs in workplace settings. The objective was to identify (a) what kinds of health promotion messages employees prefer, (b) what characteristics and behaviors they associate with healthy living, and (c) what influences their decision on whether to
participate in workplace wellness programs. Interviews were conducted at one worksite of a large corporation to understand these issues from the employees’ perspectives.

1.1.2. The Importance of the Study

Wellness promoted at the organization level has many benefits including reducing medical costs (Baicker, Cutler, & Song, 2010), chronic illness incidence and severity (Heinen & Darling, 2009), absenteeism, and increasing work performance (Mills, Kessler, Cooper, & Sullivan, 2007). Promoting health behaviors in workplace settings creates a unique opportunity to target health messages to the specific organizational culture, needs and preferences of employees, and to leverage the social capital of organizational membership and influence (Heinen & Darling, 2009; U.S. Department of Health and Human Services, 2001). Most of the studies on workplace wellness programs have focused on the effectiveness of the health intervention activities (e.g., promoting physical activity, controlling weight, etc.) (Conn, Hafdahl, Cooper, Brown, & Lusk, 2009); fewer studies have focused on initiating participation or tailoring the promotion messages to the members of an organization (T. R. Berry, Witcher, Holt, & Plotnikoff, 2010; Gates, Brehm, Hutton, Singler, & Poeppelman, 2006; Robroek, van Lenthe, van Empelen, & Burdoff, 2009; Salyers Bull, Gillette, Glasgow, & Estabrooks, 2003).

Applying behavioral and communication theories to the design of health promotion messages have also been researched extensively. Established health communication theories and social marketing strategies indicate that the effective health messaging strategies for preventative behaviors involve positive gain-framed messages (i.e., taking action) (Rothman, Bartels, Wlaschin, & Salovey, 2006), persuasive techniques (Brawley & Latimer, 2007; Cameron, 2009; Witte, 1995), campaigns with a marketing approach (i.e., involving consumer research and mass
distribution channels) (Maibach, Van Duyn, & Bloodgood, 2006; Siegel & Doner, 2004), and audience segmentation expanded beyond demographics (Slater, 1995). Less focus has centered on the attitudes, preferences, and health theories of the lay public. Studies have indicated that some less healthy sectors of the public desire the use of stories and multi-media formats to communicate health promotion messages (T. R. Berry et al., 2010; M. Dutta-Bergman, 2004b; Gates et al., 2006). These preferences contrast with traditional health promotion methods where medical guidelines are translated into objective facts disseminated for public consumption.

The use of narratives as a method of health communication for inciting public health behavior change is a newly emerging practice (Hinyard & Kreuter, 2007; Kreuter et al., 2007; Petraglia, 2007). Using storytelling for public health intervention has the benefit of making factual health information more understandable through storylines that present behavioral change in context, address common challenges, and demonstrate personal identification with the story’s characters (Berkley-Patton, Goggin, Liston, Bradley-Ewing, & Neville, 2009; Corby, Enguidanos, & Kay, 1996). Practitioners of what Petragalia (2007) calls “narrative interventions” usually cite Fisher’s narrative paradigm as one of the theoretical bases of using narratives for health communication (Fisher, 1987). Fisher’s narrative paradigm, which assumes that humans are natural storytellers, will be used as a basis for understanding the persuasive power of storytelling in the context of lay health concepts and motivations (Fisher, 1987). This narrative theory informed the data collection methods and questions as well as the content analysis.

1.1.3. Statement of the Problem

Americans are not meeting national recommendations for nutrition and exercise. In an effort to remedy this in 2001, the U. S. Surgeon General issued a call to action challenging
employers to provide healthy eating options onsite and to offer increased opportunities for physical activity during the workday (U.S. Department of Health and Human Services, 2001). Employer sponsored wellness initiatives are becoming more popular including many business model wellness programs marketed to corporations for purchase. However, living a healthy lifestyle does not come in a one-size-fits-all package. Employee participation in workplace wellness programs and life-long behavior change continues to be a challenge (Linnan et al., 2008). Traditional health promotion has not bridged the gap between translating recommended behaviors for reducing chronic disease risks and public uptake of health behavior changes. Understanding the target audience’s perspective and preferences is fundamental to effectively communicating and influencing people’s actions. This study explored employees’ perceptions about health behaviors and their opinions about participating in workplace wellness programs.

1.2. Definition of Terms

Key terms used in this work include workplace wellness programs, narratives, and health messages. Following are some brief definitions of these terms. Workplace wellness programs are defined as employer-sponsored, organized programs comprised of various services, activities and resources to support employees in practicing health behaviors to reduce health risks, improve well-being, and manage chronic diseases (L. L. Berry, Mirabito, & Baun, 2010; Steinbrunn, 1988). A succinct definition of narratives based both on Fisher’s work and others stated that narratives “are linguistic constructions of lived experiences that attempt to make sense of actions, motives, and consequences, as well as, interactions, relationships, and emotions” (Gray, 2009). Health messages are simply any information about health issues created and disseminated for the purposes of educating and promoting public health.
1.3. Organization of Remaining Chapters

The remaining chapters of this study provide an in-depth investigation into best-practices of promoting health in workplace settings. Chapter two, the literature review, is divided into three parts. Part one describes the theoretical basis for using the narrative paradigm for the purposes of health communication and promotion. Part two presents a thorough review of published findings on the background, value, and potential of workplace wellness programs. Part three of the literature review describes both the theory and practice of health promotion as well as lay audience preferences for health messages. Next, chapter three describes the study methods. Chapter four presents the results, describes the analysis, discusses the implications of the findings, and compares them to existing literature. Chapter five details study limitations, summarizes the study conclusions, suggests areas for future research, and makes recommendations for wellness activities to pilot at the target organization.
Chapter 2. Literature Review

The first part of this chapter covers the philosophical and theoretical foundation for approaching health communication from the perspective of a narrative paradigm; related findings from the literature on narrative communication are discussed. The second part of this chapter describes pertinent findings from the literature on workplace wellness programs, including (a) what wellness programs include, (b) why employers are investing in them, (c) why workplace settings offer a unique opportunity for public health promotion, (d) how social influence in the workplace may be leveraged to influence employee health, and (e) how employee participation and program effectiveness are related. The third part of this chapter covers health promotion messaging and associated lay theories of health, including (a) effective health promotion messaging – general theory and practice, (b) audience preferences regarding health promotion messages, and (c) the role of lay theories of health. The importance of the findings to the proposed research is discussed at the end of each section.

2.1. Part I. Philosophical and Theoretical Basis

2.1.1. Philosophical background.

Prior to Plato and Aristotle, knowledge was united and consisted of both logos and mythos. The philosophy of Plato and Aristotle divided knowledge into separate entities consisting of philosophical/technical knowledge versus poetic/rhetorical discourse. This shift concurrently elevated technical discourse and subordinated rhetorical discourse regarding the strength of their rationale, truth knowing, and interpretation of reality (Fisher, 1987). Hundreds of years of this philosophical paradigm have divided knowing into the objective and the subjective where the objective is disassociated from the personal. Even though health is an
inherently personal issue, the prevailing paradigm of health communication also reflects this division. Most public health communication uses the traditional scientific practice of presenting information as facts and statistical probabilities, which depend on rational processing to influence decision making about public health behaviors (Hinyard & Kreuter, 2007). But there is room in the health communication arena to explore other means of dissemination in a way that draws on people’s natural affinity for storytelling, a historically practiced method for sharing information and meaning across cultures. In narratives we combine our objective and subjective thought processes together to help us understand facts and create meaning regarding our world.

2.1.2. Theoretical basis of narrative communication.

Walter Fisher (1987) termed the predominant philosophical view (the technical/objective discourse) as the “rational world paradigm.” In contrast, Fisher published the narrative paradigm of human communication on the basis that people are fundamentally storytellers. Fisher built on Burke’s concept that people are users of symbols to say that humans are storytellers incorporating all forms symbolism into their storytelling to provide meaning, order, and social context for human life (Fisher, 1987, p. 63). Fisher’s (1987) narrative paradigm was also founded on several additional assumptions. Fisher argued that people primarily use “good reasons” for decision making and communication. Our judgment of what constitutes “good reasons” stems from our history, life experience, culture, and personal character. These good reasons fluctuate depending on the situation, media, and style (or genre) of communication. Fisher’s narrative paradigm presumed that as narrative beings, our rationality depends on both our sense of narrative coherence (i.e., the thread of consistency throughout a story in characters’ actions, setting, language, etc.); and on our sense of narrative fidelity, which is an agreement with our
view of what is true and right. Any moviegoer can tell when a movie was so unbelievable that viewing it seemed like a waste of time. Lastly, Fisher’s (1987) narrative paradigm assumes that our way of knowing the world and our place in it occurs through a series of stories, which we choose, interpret, author, and by which we recreate our lives (pp. 64-65).

Types of narratives can include entertainment education (soap operas, photo stories), storytelling (anecdotes, case histories, role model stories), and testimonials (Kreuter et al., 2007). Adopting the narrative paradigm for health communication provides an opportunity to make scientific evidence more translatable to members of the public. Fisher (1987) stated “The narrative paradigm sees people as storytellers, as authors and co-authors who creatively read and evaluate the texts of life and literature…Viewing human communication narratively stresses that people are full participants in the making of messages, whether they are agents (authors) or audience members (co-authors)” (p. 18). For health communication this concept offers another paradigm from the traditional dissemination of expert knowledge to the public. Traditionally scientific evidence has been distributed to the public to receive and act upon as instructed; the narrative paradigm offers the audience an opportunity to be co-authors of the information as they receive, interpret, and adapt the health story for application in their social and individual lives. Here, Fisher’s narrative paradigm was used as a basis for understanding the persuasive power of storytelling (in terms of fidelity and coherence) in the context of lay health concepts and preferences for story attributes (sequence, character, structure, realism, message strength, etc.).

2.1.2.1. Narrative communication for public health promotion.

Emerging evidence indicates narratives can provide alternative and supplemental methods of promoting and supporting public health behavior changes (Hinyard & Kreuter,
2007). As a part of the National Cancer Institute’s Working Group on Narrative Communication in Cancer Prevention and Control, an interdisciplinary team of researchers asserted “that narrative has four distinctive capabilities [as a preventative health tool]: overcoming resistance, facilitating information processing, providing surrogate social connections, and addressing emotional and existential issues” (Kreuter et al., 2007).

Using storytelling for public health intervention has the benefit of making dense, factual health information more engaging and relatable. One researcher used the term “narrative intervention” to describe the use of story formats to influence behavior change in public health settings (Petraglia, 2007). For example, researchers developed culturally relevant role model stories in HIV prevention interventions to depict risk prevention behaviors in non-threatening, interesting storylines that invoked audience values and engendered audience identification with the characters (Berkley-Patton et al., 2009; Corby et al., 1996). These role model stories were designed so that receivers would be less likely to dismiss the message or react with counterarguments. Receivers also had the opportunity to learn healthy, risk-reducing behaviors by observing the model’s progression through the story.

Hinyard and Krueter (2007) summarized traditional persuasion research that asserts the persuasive effect is generally enhanced when any audience views the source of the message as both similar to themselves and credible. In the case of narratives, character similarity to audience membership has the same effect (p. 785). In fact, Hinyard and Krueter (2007) indicated that the field of health promotion would benefit from an investigation of how to customize narratives or main character traits to the preferences of specific audiences. The current study proposes to explore these very aspects of employee preferences within one organization.
2.1.2.2. Debating the persuasive power of statistics versus narratives.

Several literature reviews report conflicting results comparing the persuasive effectiveness of statistical versus narrative evidence. Statistical messages usually reported summary statistics or population risk information whereas narratives typically provided case histories, anecdotes, or fictional role model stories. The results of these reviews and studies are summarized here, but researchers (Greene & Brinn, 2003; Hinyard & Kreuter, 2007) also noted these mixed results indicate the need for more consistent methods of comparison between evidence styles and types. These researchers also acknowledged that a void exists in the literature regarding the persuasive effects of a combination of statistical and narrative messaging.

2.1.2.3. Narratives versus statistics.

The studies reporting narratives as more persuasive than statistical evidence include (Baesler & Burgoon, 1994; Reinard, 1988). In his comparison, Reinard’s (1988) 50-year review reported that anecdotes may demonstrate greater persuasive impact than statistical reports. Baesler and Burgoon’s (1994) review of 19 studies found the majority of studies (n=13) supported the persuasiveness of narrative messages.

Not all studies indicate narratives are more persuasive than statistical information. In a meta-analysis of 15 studies, researchers (Allen & Preiss, 1997) found statistical messages “slightly more” persuasive than narratives (a correlation of 0.10 on potential persuasiveness, which the authors represented as 55% persuaded versus 45% persuaded where a base expected rate of message persuasion is 50%). However, the authors note that while receivers may be persuaded by statistical information, it is unknown whether they can apply that knowledge to future situations requiring interpretation and decision-making. In one study, researchers (Greene
& Brinn, 2003) demonstrated that a statistical message given to college students about the skin
cancer risks associated with using tanning beds rated higher information value and reduced
intentions to tan than narrative messages. In contrast, the narrative message realism was rated
higher than the statistical message and also decreased the intention to tan (to a lesser extent). It
may be likely that college students are better able to understand and process a statistical message
than the general population. Additionally, statistical information may be easier to focus on in a
controlled study setting compared to everyday settings like workplaces where there are many
competing sources that may divert the receiver’s attention.

Another study (Kopfman, Smith, Ah Yun, & Hodges, 1998) supported statistical
evidence as more persuasive than narrative evidence but took an in-depth look at the cognitive
and affective impacts of the two message types. The authors found statistical messages resulted
in more cognitive reactions while the narratives resulted in more affective reactions among
message receivers. The authors also reported that receivers who had low “prior thought or intent”
(PTI) to practice the health behavior of interest (registering for organ donation) experienced the
opposite affect intended by the health message designers (i.e., a negative response to the
message). This implied that designers of health promotion messages should consider and test
how a health message will be received by people with low PTI to ensure a positive response.

It is difficult to evaluate these conflicting results regarding the relative persuasive power
of statistics versus narratives because of the variability of elements of comparison. Even given
the disparity of the results, most of the researchers indicated that areas of further research are
needed: to provide consistent comparisons between studies, to understand for whom and in what
situations one type of evidence might prove better than the other, and lastly, to test what the
persuasive effect would be if both statistical information and narrative elements were combined into one message. The current study explored what aspects of health promotion messages were most appealing for one specific organizational audience. This enabled an in-depth exploration of the attributes of health narratives and non-narrative promotions that employees of one organization identified with most readily. Employees identifying with the health promotions via messages that reflect the common organizational culture, values, and characteristics, is particularly important for persuasive effect according Burke. Burke asserted that without identification between the speaker and the audience in a way that is almost a communal coexistence, there can be no persuasion (Griffin, 2009).

2.1.2.4. Narratives in organizations.

In the organizational context, both forms of evidence (statistical and narrative) provide useful outcomes. A comparison and critique of lists and general stories in organizations indicated that lists provide public structure of organizational knowledge and stories provide personal experience, variety, and evolve over time (Browning, 1992). Browning argued that both types of information should be equally recognized and used since organizations need the results both formats can provide.

Storytelling in an organizational setting can translate employers’ values and indicate what behaviors organizational leaders will reward (Conrad & Poole, 2005). Additionally group storytelling can be an interactive process, perhaps started by the organizational leadership but then opened for employee interpretation and adoption. An interesting promotion and engagement example found in the business literature (Milano, 2007), described how one employer with a wellness program called Kailo provided t-shirts to participants who completed health assessment
surveys. The employer also invited employees to promote the program themselves through a campaign called “Kailo on Vacation.” Employees submitted travel photos of themselves wearing their Kailo t-shirts to the organization’s intranet. Workers liked seeing themselves and their coworkers’ photos (i.e., they were active players in the health story of their organization). The photos created novelty with constantly changing backdrops to the Kailo health promotion. Through qualitative discussions with employees, this study explores other novel, fun techniques that engage employees in telling their own stories in the context of health. Understanding what appeals to employees will provide insight into the kind of health promotion messaging that will be particularly persuasive within the sociocultural context of the organization studied. The ultimate goal of effective health promotion is healthy behavior change and improved health of people and their organizations.

2.2. Part II. Workplace Wellness Programs

To shift from the theoretical foundations and implications discussed above, this section provides a focused review of workplace wellness programs and the benefits and opportunities they provide to promote health. Workplace wellness programs are various services, activities, environmental factors and resources offered by employers to their employees (and sometimes, by extension, to employees’ family members) to support the health, well-being and disease management of their personnel (Steinbrunn, 1988). Wellness programs began appearing in the workplace in the 1970’s, massively expanded in the 1980’s and 90’s, and are a common occurrence in one form or another in most major corporations today. According to the 2004 National Worksite Health Promotion Survey, the most common wellness programs offered by U.S. employers included the following components: employee assistance (mental health or
counseling services (45%), back injury prevention (45%), blood pressure screenings (36%),
alcohol/substance abuse support (36%), cholesterol screening (29%), diabetes screening (27%),
followed closely by cardiovascular disease management (26%). Other typical wellness programs
or activities were offered in the areas of nutrition (23%), weight management (21%), and
physical activity (20%). Only 7% of employers provided comprehensive wellness programs that
included all of the following components: health education, a supportive social and physical
work environment, organizational integration, connection to employee assistance programs, and
worksite screening (Linnan et al., 2008). Workplace health promotion programs can include a
number of different features and programs; there is significant diversity in program offerings.
Employers benefit from knowing the programs that are the best fit for their organizations based
on their employees’ needs and preferences.

2.2.1. Why employers invest in wellness programs.

In both the scholarly literature and business trade publications, frequently cited reasons
for employer investment in employee wellness include managing health care costs (Baicker et
al., 2010; Linnan et al., 2008; Mills et al., 2007), managing chronic diseases (e.g., diabetes, heart
disease) (Heinen & Darling, 2009; Heinen & Darling, 2009; Robroek et al., 2009), controlling
absenteeism (L. L. Berry et al., 2010; Mills et al., 2007), increasing employee productivity
(Devaney & Noone, 2008; O’Reilly, 2009), and retaining employees. Cost savings is a major
driver from the employer’s perspective. In a review of 22 studies, for every dollar employers
spent on health program costs researchers found an average return on investment (ROI) of $3.27
for health care costs and $2.73 for absenteeism costs (Baicker et al., 2010). The range of cost
savings varied across studies, but studies consistently demonstrated employer investment in a workplace wellness program ultimately provides medical cost savings and reduced absenteeism.

2.2.2. Workplace settings: A unique opportunity for public health promotion.

According to the National Occupational Employment and Wage Estimates, over 130 million people are employed in America (U.S. Bureau of Labor Statistics, 2009). This makes for a large population pool that can be targeted for public health purposes. Since employees spend so many of their waking hours working (whether at onsite locations or in remote home offices), organizational health promotion provides a strategic opportunity to impact their health behaviors (Blake & Lloyd, 2008). Wellness programs for organizations that increasingly employ telecommuters will need to offer services and opportunities to both types of employees. Companies with existing communication channels, social networks, and infrastructure to which health promotion could be easily adapted could use these channels for distribution with less effort than in non-networked community settings (Robroek et al., 2009; U.S. Department of Health and Human Services, 2001).

2.2.3. The role of workplace social influence on coworkers’ health.

One’s workplace serves as a type of community with a shared culture, intrapersonal bonds and environmental boundaries. As such, employers have leverage points for impacting the health of their workers. One leverage point is providing environmental support for healthy behaviors (e.g., walking paths, healthy food options in onsite cafeterias, accessible stairwells). Another leverage area, a culture of health, can be developed using the power of social influence via demonstrated participation by organizational leadership, branded wellness program communications (e.g., Well at Dell), and creating support networks (health champions, peer
leaders, educational affinity groups) (L. L. Berry et al., 2010; Heinen & Darling, 2009). This concept of using social influence (such as social support, social norms) to influence people’s health behaviors has been growing in the public health promotion literature especially in the last 15 years (M. Dutta-Bergman, 2004a). Citing the work of social psychologists (Campbell & Jovchelovitch, 2000), Dutta-Bergman (2004) described this social concept, “Individuals are more likely to engage in a preventive behavior if the behavior seeps through the social cement of the community, being enacted by their trusted peers, community leaders, and role models” (p. 395).

Since one’s place of employment serves as a type of community, it therefore may be able to serve as the same support and reinforcement mechanism (i.e., “social cement”) for health found in other community settings. Organizational culture and social influence are another aspect of the power of persuasion. Earlier we discussed the persuasive effects of health narratives. Here, social influence relates to employees’ social identities providing an opportunity to use the persuasive power of audience identification with the champions promoting the health messages through shared characteristics, source credibility speaking style, or message design. Understanding an organization’s culture and employees’ perceptions of social influence on their health behaviors at work deserves the qualitative exploration that is included in this study design.

**2.2.4. Effectiveness and participation in workplace wellness programs.**

Understandably, studies of the outcomes and effectiveness of health interventions have been the focus of most of the research on workplace wellness programs (Conn et al., 2009; Ni Mhurchu, Aston, & Jebb, 2010). Conn et al.’s (2009) recent extensive meta-analysis of workplace physical activity interventions found significantly positive results for physical activity, fitness, work attendance and job stress. Ni Mhurchu et al.’s (2010) systematic review
found that workplace health promotions resulted in a moderate improvement in employees’ diets. Despite the volume of studies published on workplace health promotions indicated in these reviews, the authors of both reviews stated that the quality of workplace health intervention studies to-date are highly variable, even sub-optimal, and more primary studies are needed to evaluate the effectiveness of these programs.

Before a wellness program can effectively influence the health of employees, they must agree to participate in the program. This has been a significant problem for most employers and is one area of inquiry for this research. In 1,553 employer interviews conducted across 730 U.S. worksites in 2004, 64% of employers surveyed reported “lack of employee interest” as the number one barrier to the success of their workplace wellness programs (Linnan et al., 2008). Additionally, concerns have been raised that those who do not participate in wellness programs are those in poorer health and who need to improve their health behaviors the most (Conrad, 1987, as cited in Salyers Bull et al., 2003).

Research on participation in workplace wellness programs has shown variable results. In a review of 24 studies on workplace health interventions, researchers found employee participation rates ranged from 8% to 97%, with a median of 61% (Salyers Bull et al., 2003). Another more recent systematic review of 23 studies on workplace interventions (Robroek et al., 2009), found a similar minimum participation rate (10%) but smaller maximum (64%) and median participation rates (33%). Both reviews indicated that large percentages of employees are not engaging in available workplace wellness programs. This presents a significant lost opportunity for employers to reduce healthcare and absenteeism costs and for employees to take advantage of program supports for improving their personal health and well being.
Given that calculating ROI and the cost-effectiveness of wellness programs are important metrics for employers to evaluate their programs, more research is needed into participation levels and the characteristics of participants versus non-participants. In Robroek et al.’s (2009) review, 172 articles (96% of the 283 evaluated in a full review) did not include non-participant data or characteristics. Based on the limited studies evaluating the role of lifestyle and work-related factors in participation, Robroek et al. (2009) suggested more studies investigate what factors incite initial participation in order to target interventions and engage people who need it most. The study proposed here seeks to address part of this knowledge gap by exploring the health perceptions of employees and their attitudes about participating in workplace health programs. This could inform future comprehensive studies of wellness program participation.

2.3. Part III. Health Promotion Messaging and Lay Theories of Health

2.3.1. Effective health promotion messaging: Theory and practice.

Prevailing health communication theories, health promotion theories, and social marketing strategies indicate that the effective health messaging strategies for preventative behaviors involve positive gain-framed messages (i.e., taking action) (Rothman et al., 2006), persuasive techniques and frameworks (Brawley & Latimer, 2007; Cameron, 2009; Witte, 1995; Witte, 1995; Witte, 1995), campaigns designed with a marketing perspective (i.e., involving consumer research and mass distribution channels) (Maibach et al., 2006; Siegel & Doner, 2004), and audience segmentation expanded beyond demographics (Slater, 1995).

In practice, results from the 2004 National Worksite Health Promotion Survey showed that employers’ most common methods of disseminating and promoting their wellness programs included printed materials (46%), the Internet (28%), in-person methods (24%), and telephone...
approaches (11%) (Linnan et al., 2008). But are these the dissemination methods likely to reach the unhealthiest people (i.e., those who need the information the most)? Analysis of the 1999 Needham Life Style Study found that unhealthy eaters do not use the most commonly used channel (print-based materials), preferring instead entertainment-oriented channels (M. Dutta-Bergman, 2004b). This means the majority of health messaging in the workplace misses some of the key people the message promoters are trying to target.

2.3.2. Preferences regarding health promotion messages.

Next, it is important to consider the perspectives of the people being asked to participate in workplace wellness programs and change their health behaviors. A few studies discussed participant preferences for health message design and dissemination (T. R. Berry et al., 2010; M. Dutta-Bergman, 2003; Gates et al., 2006). A community-based research study that developed and implemented an environmental program to improve nutrition and physical exercise at four manufacturing firms, conducted 12 focus groups to guide the study’s dissemination and implementation plans. In the focus groups, managers and employees indicated preferences for health promotion signage that was simple, humorous, included stories, had large pictures/words, included nutrition facts, changed regularly, were colorful, positive, used catchy phrases, and were located in break rooms, cafeterias, and near vending machines (Gates et al., 2006).

While the literature provided recommendations for messaging physical activity guidelines effectively including using expert advice, developing new and prominent messages, and basing messages on behavior change theory (Brawley & Latimer, 2007), other researchers reported that little work has been done to identify preferences for message design, layout, and format (T. R. Berry et al., 2010). Berry et al. (2008) conducted an exploratory study of office
workers, students, and health program participants and their impressions of Canada’s Physical Activity Guide (CPAG). The focus group participants rated the CPAG format as unappealing and preferred messages designed similar to commercial advertising, including personal and celebrity stories, and Internet-based media features. Building on this research, the current study explored employee preferences for health messages using storytelling and multi-media formats.

Additionally, the findings from the qualitative evaluation of the CPAG guideline matched those from the data provided by 3,388 U.S. respondents to the 1999 Needham Life Style Study (M. Dutta-Bergman, 2003). This study of demographic, psychographic, and communicative variables found that healthy eaters were more information and responsibility oriented while unhealthy eaters were more entertainment oriented. Unhealthy eaters preferred to watch comedy on television and sought Internet-based entertainment; healthy eaters preferred television news and consumed health-oriented media such as “Health” and “Prevention” magazines.

Significantly, health promotion campaigns that have traditionally been founded on models of rational decision making (health belief model and theory of reasoned action) are not engaging the sensory and affective needs of unhealthy audience segments (M. Dutta-Bergman, 2003). One significant limitation of this study was its predominantly white respondent pool that limits its generalizability to non-white populations. Nevertheless, these studies support the rationale for exploring a qualitative examination of message preferences around entertainment and story formats in targeted audiences such as corporations or worksites.

2.3.3. Understanding the role of lay theories of health.

Why do lay health theories matter when considering health promotion messaging in workplace wellness programs? Because an individual’s motivations to practice healthy behaviors
may be influenced by their personal health theories derived from many places outside of medically-based sources (Moorman & Matulich, 1993). For example, a person who believes health is largely influenced by genetics or the environment will view health promotion messages differently than a person who believes personal health is a moral responsibility or someone who believes that working keeps you healthy. Additionally, in contrast to illness and disease, the concept of health in the sense of wellness or optimal health is more abstract and difficult for researchers to differentiate or interpret from people’s definitions of health (Hughner & Kleine, 2008). Exploring employee narratives of well being through interviews will provide ecological context for teasing out people’s multi-faceted definitions of health. Additionally, interpreting the results through the assumptions of Fisher’s narrative paradigm as a means of understanding reasoning may provide further insight into an audience’s perception and sense-making of health stories.

In the extensive review of 20 years of published behavioral research on health and illness, (Hughner & Kleine, 2004) found that “popular sector worldviews are socio-cultural products…They are complex interweavings of information drawn from different sources including lay knowledge, folk beliefs, experiences, religious and spiritual practices and philosophy” (p. 397). Several of the 18 themes identified in Hughner & Kleine’s (2004) review relate to concepts that are likely a factor in social settings such as worksites. These themes included theme number two – health means being capable of managing daily functions (e.g., going to work, keeping up with household chores), theme number eight - daily work or activities keeps people healthy, theme number 11 – a person is morally obligated to take care of his/her health, and theme number 15 – our modern life and environments negatively impact one’s health.
(e.g., stress, sedentary lifestyles, pollution). These themes informed the development of the qualitative questions included in this study.

In summary, health promotion messages that do not account for the health understandings of the target audience cannot be properly designed to match the information needs and design preferences of that audience. Thus it is important to integrate health promotion and communication theory with an understanding of the health perspectives of people in their daily work-life settings and paradigms.

2.4. Purpose of the Proposed Research

Engaging employees in healthy living behaviors is the first step toward making workplace wellness programs successful for employers seeking to manage health care costs and to optimize employee productivity. Most of the studies on workplace wellness programs have focused on the effectiveness of the health intervention activities (e.g., promoting physical activity, controlling weight, etc.); fewer studies have focused on initiating participation in the first place or in tailoring the promotion messages to the members of an organization.

In addition, while there has been extensive research on applying behavioral and communication theories to design health promotion messages, less focus has centered on the attitudes, preferences, and health theories of the lay public. A focused exploration of health narratives in a workplace could provide insight about specific audience preferences for storied health messages. Additionally, studies have indicated employees and some unhealthy sectors of the public prefer the use of stories (personal and celebrity) and multi-media formats (television [TV], video, Internet), rather than printed information, to communicate health promotion messages. These preferences are in contrast to the traditional methods of promoting health
guidelines by translating medical recommendations into printed information for public digestion, processing, and decision-making.

The purpose of this research is to explore best practices of promoting wellness programs in workplace settings. This study aimed to identify (a) what kinds of health promotion messages employees prefer, (b) what characteristics and behaviors they associate with healthy living, and (c) what influences their decision to participate or not participate in workplace wellness programs. Semi-structured open-ended interview questions were used that were developed out of this literature review and were informed by narrative theory and the findings of researchers who have previously studied aspects of this focused study.

Findings from employee interviews and focus groups may help an organization tailor persuasive health messages for workplace health interventions. Ultimately, by contributing to understanding employee health theories and message preferences, this research effort could help make evidenced-based health information more relatable and applicable to employees. Personalized health messaging may then increase participation in workplace health programs and ultimately improve employee health.
Chapter 3. Scope and Methodology

3.1. Scope

This study explored the health messaging and healthy behavior concepts of employees at one location of a large national company headquartered in the Pacific Northwest. One focus group was conducted on-site among eight employees and five individual interviews were conducted by telephone. Thirteen employees participated in both interview/discussion formats. The organization has over 400 locations across the United States and more than 225 employees at the site where the focus group and interviews were held. This organization was selected because it had a comprehensive wellness program with many opportunities for employees to participate in healthy living activities and programs sponsored by their employer.

3.2. Research Design

This exploratory study implemented a qualitative approach using individual interviews and focus groups conducted at one organization. A qualitative study design was used since the data collection methods are designed to capture the complexity of participants’ socially constructed meanings and interpretations of wellness behaviors via in-depth discussions with employees in the setting of interest (the workplace) (Lindlof & Taylor, 2002). As a naturalistic inquiry the goal is to “understand the constructions of the respondents on their own terms” (Erlandson, Harris, Skipper, & Allen, 1993, 132). Conducting interviews and focus groups are effective for collecting information on participants’ thoughts, attitudes and subtle nuances while sharing their health beliefs and health promotion preferences (Berger, 2000; Hoyle, Harris, & Judd, 2002). Most importantly, research (T. R. Berry et al., 2010; Hughner & Kleine, 2004) has
indicated lay preferences for stories in the context of health so asking participants to share examples of health narratives in their own words was particularly appropriate.

3.2.1. Sampling

This study used a *convenience sampling* approach. Because this was an exploratory study conducted in one employer and organizational setting, achieving the exploratory goals of the study did not include generalizing findings to wider populations outside the organization. A type of *purposive sampling* known as comparative sampling was used to sample two groups of employees (Hoyle et al., 2002; Lindlof & Taylor, 2002). These two groups included (Sample A), employees who are current or past participants in an employer-sponsored wellness program, and (Sample B), employees who have never participated in a workplace health program at their employer. This comparative group was selected because the health beliefs of existing or past wellness program participants may differ from the health beliefs and preferences of employees who have never participated in a workplace wellness program. One focus group was conducted with participants of both samples in the focus group. While the study design planned for a similar mix among interview participants, the history of program participation was not known to the researcher in advance and resulted in only Sample A participants.

3.2.1.1. Sample accessibility.

The target population was employees of one large company headquartered in the Pacific Northwest. After selecting a pool of approximately 10 companies with workplace wellness programs, invitations to participate in the study were issued by email or phone to wellness or benefits managers. These invitations included a description of the study, plus potential benefits and risks for granting permission to conduct it among their employees. Two organizations that
provided their permission to conduct this study met the study parameters (500 or more employees, multi-faceted workplace wellness program and geographic proximity). Although one of the organizations dropped out of the study due to lack of employee interest, their initial involvement was included. The minimum organization size ensured a sufficient number of employees to participate. The organization’s wellness program needed to be multi-faceted (i.e., offer enough variation in services, activities, education) to be reasonably comprehensive and appealing to a cross section of their employees. Limited personal funding for the study restricted the geographic proximity to control transportation costs and travel time.

Once the organization’s leadership granted permission to conduct the study, invitations to participate were distributed through methods provided by the employers. For Company X, print flyers were posted in common areas and the management and wellness advocate also personally invited employees to participate. The employer suggested these approach methods because most employees at the study site do not generally have email access. For Company Y, the wellness specialist emailed flyers to employees who also followed up by email and phone. Company authorization to contact the employees was noted in flyers and emails. In addition to providing study contact information, company contact information was provided to allow potential participants to verify the legitimacy of the study prior to agreeing to participate.

3.2.1.2. Sample size and selection.

The optimal number of focus group participants is six to 10 individuals per group (Hoyle et al., 2002). The target size was six to eight people since the focus group time was limited to 45 to 60 minutes during the business day for employee convenience. Fewer participants ensured more equitable participation in the limited time period. If participants are acquainted, their
responses may be influenced by their past or anticipated future interactions and opinions of each other (Hoyle et al., 2002). However, controlling for employee knowledge of one another was not planned in this pilot study since employee relationships and their influences on each other are a likely factor of their workplace environment and of particular interest in this study.

A screening question was used to determine whether the employee preferred to participate in either the interview or the focus group. Employees participated in only one activity. Additional demographic questions were asked of respondents at the time of the focus groups/interviews to determine whether they fit Sample A (wellness program participants) or Sample B (non-participants) criteria, their age, length of service with the employer, and race/ethnicity. The target sample size was two focus groups of six to eight participants (n=12-16) and four to five interviews at each employer site. The target number of employee participants was 10 to 13 people per employer (20 to 26 people for the study overall). However, since only three people at Company Y agreed to participate, it took away from the study. Therefore, the final sample size was reduced to the one focus group (n=8) and five interviews at the Company X, for a total sample size of 13 participants.

3.2.2. Instrumentation

The interviews and focus group were semi-structured in format. The semi-structured format involved open-ended questions designed to encourage participants to share their perspectives relevant to the research topic with only casual control by the researcher serving as both the interviewer and focus group moderator (Berger, 2000). The dual interview methods (individual and group discussion) enabled assessment of any individual versus social, interpersonal or cultural influences on employee statements of health concepts and preferences.
(Erlandson et al., 1993). This is important because health promotion messages distributed in the workplace need to target both individuals and the shared employee culture of a company.

3.2.2.1. Instrument development and content.

Open-ended questions were used because the continuum of health beliefs, attitudes, and message preferences was unknown at the outset. Open-ended questions also enabled the data collected to be in the respondent’s own words and were likely a truer fit of the respondent’s intended meaning than researcher generated responses provided by a questionnaire.

The literature review and researcher interests in exploring the topic informed the focus group and interview questions. The objective of both types of qualitative interviewing was to identify (1) employee preferences regarding health promotion messages, (2) employee concepts of health, and (3) influences on their decision to participate or not participate in workplace wellness programs. Based on suggestions indicated in the literature review, the questions primarily addressed general preferences regarding health message style, format, content, quality narrative attributes (T. R. Berry et al., 2010; M. Dutta-Bergman, 2003; M. Dutta-Bergman, 2004b; Kreuter et al., 2007); characteristics of preferred health behavior change success stories (T. R. Berry et al., 2010; Kreuter et al., 2007), perceptions of unhealthy and healthy behaviors or models (Berkley-Patton et al., 2009; Hughner & Kleine, 2004; Petraglia, 2007) and influences on the decision whether or not to participate in workplace wellness programs (Langille et al., 2009). Appendix A includes the focus group/interview questions.

3.2.2.2. Instrument dependability issues.

In keeping with a naturalistic inquiry approach, while the question design was influenced by the sources listed above and Hoyle et al. (2002) provided guidance for the general design of
the interview guide, the researcher developed the question wording and interview guide to explore employee concepts of wellness specifically from the respondents’ perspectives. Using general questions followed by prompts enabled the moderator to delve into aspects of respondents’ statements that are particularly relevant to understanding the topic of workplace wellness in the context of the study (Berger, 2000; Erlandson et al., 1993). One of the advantages to the narrative interview method was that the moderator could recognize participant confusion regarding the meaning of questions and provide clarification. This opportunity to clarify meaning or moderator interpretation in a live dialogue ensured that the respondent answered the question the researcher intended to have answered, not misunderstanding it (Hoyle et al., 2002), and that the moderator’s interpretation of respondent terms was accurate.

Disadvantages to using qualitative interviewing, particularly in the focus groups, include tangential discussions that detract from the relevant topics, participants who dominate or withdraw from the discussion or potential conflicts in participants’ viewpoints that influence participation. To mediate these issues, the moderator drew on past experience and training in group facilitation to reduce the biasing dynamics that naturally occur in the context of a social discussion. Additionally, to reduce moderator influence, the moderator avoided verbal or nonverbal responses that indicate opinions about the participants’ comments. Lastly, the moderator made written notes, audio recorded and transcribed the focus group and interviews to improve the accuracy of data documentation and to contribute to the construction of the study audit trail (described later in this chapter).

3.3. Procedures

3.3.1. Study activities.
After receiving the leadership approval of the selected organizations to conduct the study, potential employee participants were approached through study flyers and wellness staff or managers. Interested employees notified their onsite company contacts (Company X’s contacts were the General Manager and the site’s Wellness Advocate, who was also the Safety Coordinator). The company contacts provided the researcher with the interview participants’ contact information.

Interviews were conducted by telephone. The focus group was conducted onsite at the employer location, at a time convenient to the workday. The researcher served as the moderator for the focus group and interviews. At the time of the focus group/interviews the moderator introduced the purpose of the study, the nature of the questions, described the recording process and explained the use of participants’ information. Additionally, the moderator conducted an informed consent process and participants answered basic demographics questions. The moderator asked the study questions of participants as described in Appendix A (Tables 1 & 2).

In addition to audio-recording the discussion sessions, the moderator made brief written notes during the discussions to record salient points and significant nonverbal communication (Berger, 2000). The focus group lasted 60 minutes (including the introduction and consent process) and the interviews averaged between 30 and 45 minutes. Light refreshments were provided at the focus group by the employer. Company X participants were not paid due to company policy restricting monetary incentives.

3.3.3. Analysis.

The moderator transcribed both the focus group and interview recordings. Participants’ comments were transcribed word for word to authenticate comment reporting. To protect
confidentiality, individual participant comments in the transcripts were assigned a code (e.g. P1, P2). Participant codes were kept in a separate file with participant demographic information. Also, any names or employer departments or potentially proprietary company information mentioned by participants were anonymized in the transcripts using pseudonyms to protect the confidentiality of individuals and the organization. Following transcription, the moderator conducted a preliminary review to obtain a general overview of each sample.

Next, the moderator proceeded with qualitative analysis based on the grounded theory approach originated by Glaser and Strauss (1967) (as cited in Lindlof & Taylor, 2002). Using a grounded theory approach requires the researcher stay connected to the source data throughout the process of coding, analyzing, and interpreting the content (in this case, transcripts). The researcher used coding procedures suggested by Creswell (1994) (as cited in Berger, 2000) and Lindlof & Taylor (2002) by first manually open coding all the transcript data followed by axial coding to integrate categories and identify themes. The open coding steps involved (1) reviewing two transcripts in depth, looking for all topics discussed; (2) coding these topics with abbreviations and noting examples for each topic; (3) coding all the transcripts with the topic abbreviations, adding newly discovered topics to the master list as the researcher progressed through the transcripts; (4) categorizing the topics, making sure that the categories covered all transcripts; and (5) finalizing the entire abbreviated code list. Next, the axial coding steps involved (6) creating new codes that linked similar topics between categories, collecting all the elements for each category in one place and analyzing it for patterns and themes; and lastly (7) refining the coding to reduce the number of categories (Berger, 2000; Lindlof & Taylor, 2002). The coding instrument is included in Appendix B, Table 3. Following all coding and
categorization, the researcher synthesized and summarized the findings, quoting participant
comments that are particularly illustrative of key findings. This aspect of the analysis is
described in more detail in chapter four.

3.4. Soundness of the Study

3.4.1. Credibility.

As a naturalistic inquiry, the credibility (i.e., trustworthiness) of the study depends on the
ability of the researcher to report the findings as related to the respondents’ constructed views
and realities, not interpretations that diverge from what rings true for respondents (Erlandson et
al., 1993). Focus groups and interviews are established data collection methods appropriate for
studies aiming to understand the thoughts, attitudes, and perceptions of participants about the
research topic (Aitaoto, Braun, Dang, & So'a, 2007; Hoyle et al., 2002; Westmorland, Williams,
Amick, Shannon, & Rasheed, 2005). As a naturalistic inquiry, the threats to the credibility of the
study primarily involved researcher bias. Researcher bias can stem from selective observation
and recording of participant behaviors and comments. Additionally, the researcher’s personal
opinions and expectations can influence the conduct of the interviews and the interpretation of
the data collected.

To control for the author’s own researcher bias, the author critically evaluated her
personal assumptions and expectations at the outset of the study. By making an in-depth
evaluation of researcher biases, the researcher identified personal assumptions and deconstructed
her natural tendencies toward those assumptions. For example, the researcher’s background in
public health project management influenced her concept of healthy living because of the
knowledge she has gained about medical guidelines (albeit not as a health care provider). This
required the researcher to moderate her knowledge of medical guidelines to try to understand some areas of lay concepts of health truly from the participants’ perspectives. In order to mediate researcher biases the author documented her assumptions at the study start to be particularly aware of making reflex judgments about participant comments.

The documented biases also helped the researcher practice negative case sampling during interviews and analysis to selectively search out examples of participant comments that counter researcher expectations. Searching out data that disconfirm the researcher’s explanations demonstrates checking and rechecking data to improve the credibility of the reported findings (Lindlof & Taylor, 2002).

To strengthen the study’s descriptive validity (i.e., reporting accuracy), triangulation of both data sources and data collection methods were planned (Erlandson et al., 1993). To triangulate data sources, this study collected data from two types of respondents (those who have participated in workplace wellness programs and those who have not). To triangulate data collection methods two different types of interviews were conducted. Focus groups provided an experimental social setting to learn what people say about their health views when talking in front of their fellow employees (i.e., more socially acceptable viewpoints). Individual interviews provided an anonymous environment for participants to share their views and health promotion preferences with the moderator, an outside observer not associated with their organization.

Next, the moderator used two methods to heighten the study’s interpretive validity (i.e., the accuracy of the participants’ meanings and views as understood by the researcher). First, the moderator used confirmation statements in discussions with participants to state the moderator’s understanding of the meaning of their comments (i.e., member checking) and allow the
participant(s) to correct moderator misunderstandings. For example, the moderator might have asked a participant, “Is my understanding correct that by saying ____ you mean ____.” The use of prompts and probes (Appendix A, Table 2) also helped the moderator obtain the right interpretations of the participants’ meanings. Secondly, the researcher quoted participant statements in the study results that are representative of key findings. Quoted comments provided low inference descriptors to readers, enabling others to experience “hearing” the participant’s own words firsthand instead of reading interpreted summaries (Hoyle et al., 2002).

One of the limitations of the study was a lack of investigator triangulation (i.e., multiple transcript reviewers) in the coding process. Narrative content coding takes significant time. Without external funding to support paying someone for the many hours involved in dual coding and content analysis, the researcher was limited to serving as the only coder.

3.4.2. Dependability/consistency.

As a naturalistic inquiry, the concept of the study’s reliability is approached from the perspective of dependability or consistency (Erlandson et al., 1993; Golafshani, 2003). The researcher practiced consistency by following the study protocol for each of the phases of the study from field work to analysis. Interactions with participants were conducted consistently because there was only one moderator to administer the introductions and discussion guides. The researcher kept a reflexive journal (i.e., a research diary) to make notes on both methodological decisions and thought processes as they occurred during data collection and analysis. A reflexive journal contributed to the study’s dependability and transferability by serving as a record of the researcher’s process as it was conducted, thus preventing memory loss and recall bias (Erlandson et al., 1993). Additionally, the reflexive journal contributed to the audit trail.
In order to make it possible for others who wish to transfer aspects of this study to another setting, the researcher kept a detailed audit trail to document the data and inquiry procedures. The audit trail included documentation of (1) raw data (audio recordings, written transcripts, moderator field notes), (2) data reduction and analysis (coding and categorization), (3) procedural and researcher thought process notes (journal), and (4) materials on intentions and motivations (original proposal, employer and participant approach materials). Keeping an audit trail lends dependability and conformability to a study (Erlandson et al., 1993).

3.4.3. Credibility and dependability summarized.

In short, the study had a number of strengths in terms of both credibility and dependability. Credibility was strengthened by an in-depth evaluation and documentation of researcher bias, negative case sampling, triangulation of data sources and data collection methods (for descriptive validity), member checking (clarification of participant statements) and the use of verbatim statements (for interpretive validity). Limitations to credibility included the inevitable researcher bias that remained despite attempts at controlling personal bias and a lack of resources to provide rigorous investigator triangulation. Study dependability was addressed by practicing consistent procedures and providing thorough documentation by keeping a reflexive journal and audit trail. The overall trustworthiness of the study was addressed through the careful reconstruction of the process and thorough documentation.

3.5. Ethics

In any research endeavor it is important to consider not only the potential benefits offered to the greater public or the public domain of knowledge, but also the participants’ ethical rights as well as the potential risks and benefits of research participation by the study subjects (Hoyle et
al., 2002). This section discusses how the proposed study addressed the issues of respect for persons, beneficence (i.e., do no harm) and justice.

### 3.5.1. Respect for persons.

Individuals considering participation in research studies have the right to be informed about the scope of the research, learn how their information will be used and maintain the option to refuse participation without experiencing undue pressure. In order to respect individual autonomy, the prospective participants were provided with information that described the study purpose, the list of participant activities, the risks and benefits to the participant and the options to skip any question or withdraw from the study at any time. All essential elements for informed consent (Gonzaga University Institutional Review Board, n.d.; Hoyle et al., 2002) were reviewed prior to starting the focus group and interviews. All focus group participants were required to review and sign the written informed consent document in order to be eligible to participate. For telephone interviews, the informed consent process was conducted verbally and the moderator documented oral consent prior to beginning the interview.

This research study was conducted among employees at one organization, posing some challenges to ethical considerations. In order to minimize the possibility of perceived coercion, the study approach materials clarified that participation was completely optional and that participating was not required or associated with employment status. The employer policies did not allow monetary incentives so monetary coercion was not an issue.

### 3.5.2. Beneficence.

The risk to participants was minimal and the benefits anticipated in terms of knowledge gained in the area of health promotion preferences outweighed any small discomforts
participants may have experienced by participating in the discussions. This research posed minimal risk to participants because the participant activities were limited to the thoughts and comments they voluntarily shared. The content of the discussions, while focused on participants’ personal health concepts, did not involve any particularly sensitive health topics such as disease diagnoses. All the same, at the start of the focus groups the moderator explained the discussion ground rules and provided redirection if any participants made judging statements about other participants’ comments. Participants had the option to contact the researcher if they wished to withdraw their participation (and comments) after the fact.

3.5.3. Justice.

Due to the purposive sampling method of this qualitative study conducted in an employment setting, the main issue regarding the just treatment of participants related to participants’ anonymity and confidentiality. Because the study involved face-to-face participation and discussions in front of other employees, anonymity could not be provided for participants; however, significant attempts were made to provide the highest degree of confidentiality possible. As a part of the informed consent process, participants were notified that their statements would not be reported to managers or company leadership in any individually identifiable manner. Study findings were either summarized as de-identified aggregate information or, in the case of verbatim comments, attached only to pseudonyms. This was true not only of the participants’ information, but also the names of any individuals or departments mentioned in the discussion. Because focus group participants may have known each other (or of their organizational roles) complete confidentiality was not possible. To maximize participants’ confidentiality, the moderator and consent form explained the importance of not repeating any
comments made during the group discussion outside of the discussion group. Because the moderator was external to the employer, the interview participants experienced a greater degree of confidentiality than the focus group participants who discussed their comments in front of coworkers.

Confidential data security was maintained by retaining signed (identifiable) consent forms in locked locations and keeping digital files password protected. The organization’s use of any resulting findings shall be limited to ethically allowable purposes and may not be used to impact the employment status of the participants. Similarly, the researcher will conceal the organization’s identity in any publications or presentations and remove any characteristics that a reasonable person could use to identify the organization (e.g., branding, largest supplier of X, etc.) An agreement describing the ethical and publication issues along with study scope was approved by both the organizational leadership and the researcher at the study outset.
Chapter 4. The Study

4.1. Introduction

This study explored three facets of health promotion via wellness programs in the workplace. Through semi-structured interviews of employees of one organization, the study explored: (a) the types of health promotion messages employees prefer, (b) the characteristics and behaviors they associate with healthily living, and (c) the factors that influence their decision to participate or not participate in workplace wellness programs. One focus group with eight participants and five individual interviews were completed in November 2010. In this chapter, the process of coding and analyzing the participant comments is described, the results are presented according to the three facets of health promotion mentioned above, and the findings are discussed in terms of relevant theories and related published studies.

4.2. Data Analysis

As mentioned in Chapter 3, the researcher based the qualitative analysis on grounded theory established by Glaser and Strauss (as cited in Lindlof & Taylor, 2002) to ensure resulting interpretations remained fundamentally connected (i.e. grounded) in the original words and meanings of the respondents. Manual open coding of both the focus group and interview transcripts line-by-line identified 50 subcategories summarized under 18 categories, later reduced to 16 (See Appendix B, Table 3, for the coding instrument). Comments were counted to assess distributions between categories. Example comments were also identified for each subcategory. Through the process of axial coding to integrate categories, topics spanning the 16 categories enabled the researcher to collapse them into eight themes with a ninth miscellaneous category containing comments outside the study focus. The data was reported with sufficient
detail and context to allow readers the ability to make their own determinations about the transferability of any findings or questions to other settings (Erlandson et al., 1993).

4.3. Results

4.3.1. Demographics

Among the 13 participants, the majority were white (85%). Other participant-reported demographics broke down as follows: 46% were between the ages of 41 and 59 years old, 39% were 18 to 39 and 8% were over 60; 31% had worked for Company X for five years or less, 39% had worked there for six to 15 years and 31% had worked there for more than 15 years. The majority of participants (54%) had participated in a Company X wellness program or activity, 39% had never participated, and 8% did not know. The study design aimed for an equal proportion of wellness program participants (Sample A) and nonparticipants (Sample B) to ensure the perspectives of both groups were captured. While there was a mix of both groups among focus group participants, all of the interview participants had been prior Company X wellness participants (Sample A). Since the General Manager and Wellness Advocate identified the pool of prospective participants, the distribution between groups was not known to the researcher until after the completion of the interviews.

4.3.2. Qualitative results.

Reporting of the qualitative analysis results are aligned with the study’s three main aims to explore: (a) what kinds of health promotion messages employees prefer, (b) what characteristics and behaviors they associate with healthily living, and (c) what influences their decision to participate or not participate in workplace wellness programs.

4.3.2.1. Health promotion message preferences.
Both media format and content were of interest for the purposes of this study. Among the respondents, TV and videos/movies dominated both the general media preferences and the formats that participants remembered hearing health messages from; this category accounted for 44% of all media sources and 36% of all sources mentioned (including people and other non-public media formats). The most popular TV category overall was reality TV (38%). Some of the reality TV shows mentioned included *Cook Your Self Thin* and *The Biggest Loser* (Conner & Deen, 2009; Roth, 2011). Talk shows, both health and non-health specific, represented the next most popular type of TV preference. Of all TV shows mentioned, 28% were talk shows like *The Montel Williams Show, The Doctors* and *The Dr. Oz Show* (Gulinello, 2008; McGraw, 2010; Wagner, 2011). At 19%, TV news also garnered several mentions.

Among non-TV sources, books and movies accounted for generally preferred media sources overall (23% and 19% respectively). Some of the books mentioned were sold at Company X stores perhaps indicating easy access at the work site to these books. The internet received a minor 7% of the media sources mentioned. Other sources were minority mentions with magazines and games at 4% each and talk radio at 1%. Overall, this indicated a definite participant preference for video format media like TV and movies, although books made a substantial albeit minority showing.

Speaking specifically about the health message promotion at the Company X location, the primary method participants reported seeing was postings in public work areas (62%) with the remainder received directly through in-person communication with the Wellness Advocate (38%). No one mentioned receiving information about wellness programs through other company sources such as the insurance-sponsored website, managers, or corporate leadership.
Within the discussion of preferences for health messages, employees highly advocated for health information and education in general. Of all the comments about health education and information, 52% indicated that health information or education is positive or highly desired, with another 30% commented on the types of health information sources desired/used (e.g., friends/family/coworkers provide helpful information and “Dr. Oz’s TV show is instructive”). The remaining 17% focused on youth health education (e.g., advocated providing health education to children or expressed dissatisfaction with the lack of health or physical education in schools).

4.3.2.2. Reported characteristics of healthy living.

Participants characterized healthy living around five major themes. The tables report the number of comments per subcategory and list quotes from participants that exemplify typical responses (See Appendix C, Tables of results). These themes are listed in the order of most mentioned to least.

- Eating habits, foods (good/bad) and the related effects of eating habits (Table 4)
- General lifestyle behaviors or changes that represent healthy living (Table 5)
- Perceptions and opinions about people or society pertaining to health issues (Table 6)
- Exercise behaviors (Table 7)
- Attitude and one’s sense of self (confidence, self esteem) plays an important role in health (Table 8)

Comments about these themes had positive, negative and neutral connotations. Some themes, like exercise, had mostly or only positive connotations, while only one theme (perceptions and opinions about people or society and health, Table 6) had mostly negative connotations. It is also
interesting to note that overall there were many more mentions about healthy eating behaviors than physical activity or exercise behaviors.

Table 4 reports the results regarding the theme of eating habits, foods and related effects. Participants were highly cognizant of key foods and eating behaviors that are generally considered healthy (eating fruits and vegetables, quantity or portion control, less red meat). Several participants included organic and local food as part of healthy eating behaviors. Participants also associated eating behaviors with the way you feel. Many of the negative examples (i.e., of unhealthy foods or eating behaviors) came from what they see their coworkers eat. Awareness of coworkers’ eating behaviors indicates the social influence (positive or negative) of coworkers’ eating behaviors via peer observation and interpretation.

Table 5 reports on the theme of general good health behaviors or changes for improved health. This is the theme that captures the health model narratives shared by participants. There were roughly equal distributions of the source of the health model among family members and friends (n=5), coworkers (n=4), celebrities (n=3), and personal examples (n=2) (data not shown). In general, the impact of the changes of personal acquaintances seemed to carry more weight or inspiration. They also had more narrative depth and coherence, perhaps indicating the importance of the health model to the respondent. The celebrity mentions were more like examples of what to do than personally inspiring stories like those of the family members.

Table 6 presents the participants’ perceptions and opinions about people or society and related health issues. This was the only theme where negative comments (n=15) outnumbered positive/neutral comments (n=6). Participants viewed society and people with unhealthy lifestyle habits as either not caring about health, presupposing fatalistic reasons for not changing (i.e.,
genetics) or wanting to take the easy way out to achieve health. Participants generally shared the impression that health is not achieved through quick fixes, rather, it is achieved by making healthy lifestyle choices and keeping them over the long term. The positive or neutral comments on this theme allowed for some flexibility (i.e., finding a personal balance point, acknowledging that no one makes healthy choices all of the time).

Table 7 reports participant comments on the theme of exercise behaviors. There are few overall mentions for this theme (n=15), especially compared to eating behaviors (n=52, Table 4). Additionally, the majority of the exercise comments are about everyday activities like walking for exercise as opposed to other physical activities (playing sports, cardiovascular exercise, weight training, etc.). This may indicate either an unmet health promotion opportunity for Company X employees or a bias against exercise as key component of healthy living.

Table 8 presents participants’ comments on the theme of attitude and self-concept. Participants’ comments on this theme may best be summarized by the view that having a good attitude leads to having good health. Participants’ comments indicated an association between one’s psychological state of mind (confidence and self esteem) and living healthy. The comments were almost equally distributed in positive and negative frames. For example, a negative interpretation is that you feel bad because you are overweight or alternatively, if you have a negative attitude about yourself then you make poor health choices (i.e., it’s OK to hurt yourself if you’re bad). A person’s attitude or self-perception is important for health. This was an indicator of an important thread spanning across themes, that there is a link between attitude – choices – behavior – and health.

4.3.2.3. Wellness program participation.
Addressing the last study objective, Tables 9 and 10 report the results of what influences employees’ decisions to participate or not participate in workplace wellness programs. Table 9 provides the comments regarding health programs and initiatives discussed by participants. It includes both health programs and initiatives sponsored by Company X or individually or commercially sponsored. This theme dominated all the other results in quantity of participant discussion (n=94 comments) and broke down into four main topic areas: (a) suggestions (n= 39); (b) overall impressions about Company X and wellness, (n=23); (c) comments about incentives and rewards for participation (n=15); and general participation comments (n=12). Suggestions included general comments that participants would like Company X to provide promotions that address more than just weight loss goals, suggestions for insurance coverage (e.g., higher insurance premiums for those with unhealthy behaviors and general requests for more health benefits) and suggestions about health-related games or sports at the worksite.

Overall impressions of Company X and its wellness efforts indicated that participants felt the company’s changes were positive and showed concern for employee health. Employees noticed Company X’s efforts to make the reward meals healthy fare instead of pizza or cake, and replacing soda with juice in the vending machines. However, some employees felt the company could go further with these changes (e.g., they did not see high calorie juice or Gatorade© as the healthiest options to offer).

There were five wellness programs that employees mentioned participating in at Company X. They were all challenges coordinated by the Wellness Advocate. All but one challenge (the pedometer challenge) were weight loss challenges. Those who participated in the company-sponsored wellness activities were generally positive and pleased with the challenges.
In the focus group, participants also discussed whether or not health education and wellness activities at Company X needed to be mandatory to be successful. Participants who discussed this issue seemed equally split between advocating mandatory versus optional programs.

One of Company X’s wellness activity incentives was a group reward, two were individual rewards and one reward was altruistic (food donation to the needy). Participants generally advocated for small but frequent rewards, like for regular competitions, although some participants indicated that they were highly motivated by monetary rewards. It is interesting to note that comments on participation in wellness programs were equally split between general participation mentions (types of programs, likes/dislikes about those programs) and incentives or rewards for participating. This indicates the importance of incentives and rewards for Company X wellness activities.

4.4. Discussion

4.4.1. Health promotion message preferences.

The study identified some key factors regarding employee preferences for health promotion messages. First, the predominant preferred media format was video (TV, movies) with books in distant but substantive second. This mirrored the U.S. leisure time activity distributions where watching TV also dominated over other leisure time activities (2.8 hours watched per day for people ages 15 and over). This accounts for about half of all leisure time per day (U.S. Bureau of Labor Statistics, 2010). For adults ages 20 to 34 years old, the average time spent reading for leisure was 10 minutes per day; for those 35 to 54 years old that average was 15 minutes per day (U.S. Bureau of Labor Statistics, 2010). This perhaps indicates a message format preference for video, which could be capitalized on for health promotion via
entertainment-oriented channels. It also matches findings for this media preference from the 1999 Needham Life Style Study (M. Dutta-Bergman, 2004b).

Moreover, combining this preference with the fact that over 50% of participants indicated a desire for increased health education and no health information is currently distributed through video format onsite, and a clear opportunity arises. Granted video production is costly and not likely something an organization would want to take on as an ancillary activity. But publically available health promotion videos on the internet could be broadcast using the existing break room TVs. A few healthy video examples are listed in the attached references (American Heart Association, 2008; European Commission and the Union of European Football Associations, 2007; Howcast, 2009): additional options can be identified with a little selective previewing for accurate and appropriate content. Alternatively, some public health organizations have sponsored contests for the best user-generated online videos that demonstrate key health principles in an entertaining ways. Similarly, an employee-generated YouTube video contest could be launched. Another possibility might involve simulating a reality TV show at work with employees.

4.4.2. Reported characteristics of healthy living.

The study identified definite trends regarding the characteristics and behaviors participants associated with healthy living. First, there was a gap in interest in exercise. The majority of comments about healthy living behaviors focused on eating specific foods and practicing certain eating habits, while comments about physical activity played a minor role. This lack of interest in exercise as a heath topic runs counter to known health guidelines that often pair exercise with good nutrition as two factors that individuals can take responsibility for to improve their health. Poor diet is associated with major health problems like coronary heart
disease, stroke, cancer, and diabetes. Adequate physical activity leads to reduced risks of these conditions along with improvements in health states such as better mood, control of body weight, and quality of life (U.S. Department of Health and Human Services, 2008). The lack of comments about exercise may be reflective of the fact that many employees at these Company X locations are not performing sedentary, desk jobs (i.e., they may feel they get enough exercise simply at work). It also may have something to do with the industry of this particular company, which sells food among other products and may indicate the salience of food at the workplace.

Recall the debate in the literature discussed in Chapter 2 that focused on the persuasiveness of narratives versus statistics. Participants in this study described health behaviors using both narratives and facts, but no one reported statistics. Some examples of these narrative and factual comments include the following participant comments.

Participant 13: But it’s [weight] stayed off and she [mom] looks great. …Counting calories. That really rubbed off on me. It wasn’t any diet. It was just keeping track of what you’re doing. I’d say it’s always been my mom. …she started working out and exercising. And she works split shift. She walks down to her work and walks back each time. She lost her weight gradually, over three years. But it’s stayed off and she looks great. …But she’s pretty much a role model to me and that inspires me to be healthier and be a better person. …Counting calories. That really rubbed off on me. It wasn’t any particular diet. It was just keeping track of what you’re doing. Always having a conscious effort you know…

Participant 7: Have you ever seen [X]’s lunch. Participant 1: It’s like a salad bar or something.
Participant 11: Well I just heard recently that was it 20 minutes of exercise a day four days a week can help fight Osteoporosis and Alzheimer’s. Which I thought was pretty interesting because my father-in-law was just diagnosed with Alzheimer’s.

Another important aspect explored in this study is the role of relationships and social influence on health behaviors and motivations. As mentioned earlier, Dutta-Bergman (2004a) called this social influence “social cement.” This social influence was seen in the stories participants shared about health model narratives of people who inspired them (coworkers, family members) and awareness of their coworkers’ health behaviors, particularly eating behaviors onsite (Table 5 and Table 10). Considering the narrative paradigm approach (Fisher, 1987) where one’s personal health story is a combination of interpretation of other people’s health stories and re-creation in one’s own life, the social connection between people’s stories has definite impact. It is like cement affixing us to attributes we identify with and are inspired by in others. In the health narratives shared by participants, a coworker inspired others to help him and themselves lose weight in a departmental challenge, family members inspired employees to change their behaviors who in turn passed on similar inspirations to their fellow coworkers (such as the Wellness Advocate). Lastly, the old adage, “you are what you eat,” tells another aspect of one’s health story. Coworkers noticed what their peers are eating. The person whose lunch was a salad was a positive example, while those in the break room eating pizza and energy drinks (and who were overweight) were seen as examples of what NOT to do.

4.4.3. Wellness program participation.

There were many comments made about participating in Company X wellness programs as well as general impressions about Company X and wellness. Company X started their overall
wellness programs in 2008 so the program is relatively new. Study participants included a mix of wellness program participants and non-participants so some comments about participating in Company X were first person examples while non-participants provided observations.

Among their overall impressions about Company X and wellness, participants commented on what may be considered one of the intangible returns on their investment in company-sponsored wellness programs. These were comments indicating wellness-related changes showed that the organization values employee health and wants better health for its employees (see example comments in Table 9 – Suggestions-games and the workplace and Overall impressions of Company X and wellness). This confirms what others (L. L. Berry et al., 2010; Heinen & Darling, 2009) have discussed regarding creating a culture of health within an organization. Albeit participant comments did indicate that Company X wellness programs have room for improvement (Table 9 - Overall impressions of Company X, negative categories).

Participants suggested several ways to make Company X wellness programs more enticing. The major suggestion was to expand the initiatives beyond weight loss to activities that challenged people to improve other health metrics such as body mass index, blood pressure, cholesterol, and walking. One reason that weight loss may have been a focus to date at this location is the personal weight loss goals of the Wellness Advocate. Participants’ comments indicate the need to expand the concept of the target audience from those who want to lose weight to those who want to focus on other healthy living behaviors and factors that may prevent chronic disease conditions (heart disease, diabetes, cancer, etc.) (Slater, 1995).

Another main topic discussed was the use of rewards or incentives in wellness programs, indicating the importance of rewards to participants. Company X’s rewards were a mix of
individual (health baskets, win the money pot), group (meals), and altruistic (donation of food to the needy) incentives. Two recent review articles indicated some influential effects of incentives on participation in health promotion programs. Of these, Robroek et al. (2009) found greater levels of participation if incentives were included or if the program was multi-faceted in either activities offered or health behaviors targeted. Another review (Sutherland, Christianson, & Leatherman, 2008), reported studies that indicated financial incentives incorporated in workplace wellness programs could help promote healthy living behaviors. However, the authors cautioned that the results may not be generalizable to other employees. Finally, the authors found insufficient evidence in the literature regarding the long-term effectiveness of incentives on changing employee health behaviors.

The majority of focus group participants advocated for changing the premiums of the Company X-provided health insurance plan based on employee health metrics (e.g., employees who weigh more pay more). Some companies have started this with either premium reductions or premium increases based on personal health metrics. However, this is still a relatively new practice and not mainstream practice at many corporations. If Company X did want to pursue this avenue, a thorough landscape analysis and needs assessment is recommended.
Chapter 5. Summaries and Conclusions

5.1. Limitations of the Study

This study had several limitations. First, the focus group and interviews were conducted among employees of only one worksite location within an organization that has over 400 locations in North America. Regional and location-specific health or wellness program preferences may vary across locations even within the same company. Secondly, while the overall distribution of study participants who had previously participated in Company X wellness programs was 54% wellness participants (Sample A) to non-wellness participants (Sample B), all of the individual interview participants were wellness participants (Sample A). Thus triangulation between participant types was limited to the total sample instead of occurring within the focus group and interview subsets. Thirdly, the study had a small number of participants (n=13). A more robust qualitative analysis could be done with additional focus groups and interviews at three or four locations across the company.

Lastly, this study did not have investigator triangulation since one person coded all transcripts due to modest resources. To compensate, the researcher made multiple passes through the transcripts on different dates to ensure comments were consistently categorized. The researcher also kept a reflexive journal to prevent memory loss and create a thorough audit trail.

5.2. Further Study and Recommendations

The findings from this study present several opportunities to further explore best practices of health promotion among Company X workplace wellness programs. By combining participant preferences, narrative interventions, and social influence (“social cement”), it may be possible to construct onsite health initiatives that are novel, fun, and draw on Company X
employees’ preferences and relational interactions (M. Dutta-Bergman, 2004a; Hinyard & Kreuter, 2007; Petraglia, 2007). For example, the company could sponsor a health story contest where people contribute written or photo stories of people who made inspirational health changes. Employees could vote on the most inspiring story. Alternatively, people could capture the healthiest foods seen eaten by employees onsite (via video, photograph, or written description) and vote on the healthiest and tastiest food. Another possibility might involve potluck lunches; employees could bring healthy foods and exchange recipes. In these ways, coworkers would direct, act and produce their own Company X narratives of healthy eating.

Study participants identified incentives as important factors in their decisions to participate in the wellness programs. As indicated by earlier work (Robroek et al., 2009; Sutherland et al., 2008), further research is needed on incentives to assess the most effective type for inciting employee participation as well as their long-term effectiveness on participation. Within Company X, a future research project could survey employees on a variety of known incentive types, frequency, and employee expectations about rewards in general, to develop a more evidence-based incentive strategy within Company X.

This study identified a health promotion opportunity surrounding the limited discussion about physical activity. That combined with study participants’ thirst for health information presented an opening to bolster workplace health promotion about physical activity. A good starting point would be following participants’ preferences for incorporating physical activity into daily activities (walking and playing with kids) as opposed to posting suggested gym workouts. Model health narratives have been used in studies of other health behaviors (Berkley-Patton et al., 2009; Corby et al., 1996). An example model exercise narrative would depict a
Company X employee on a typical day incorporating exercise into their daily activities in ways that are relatable to the target population. This model health story would follow Fisher’s narrative paradigm by providing fidelity (relatable character, doable activities) and coherence (familiar setting against daily life, morning to night chronology) (Fisher, 1987, pp. 64-65).

5.3. Conclusions

This study explored best practices of promoting wellness programs in workplace settings. The researcher investigated employees’ health promotion message preferences, the employee’s concepts of characteristics and behaviors associated with healthy living and factors associated with participation in workplace wellness programs. Through semi-structured interviews with employees of one organization, key themes on different facets of health communication and wellness program promotions were identified.

First, regarding health promotion message preferences, this study identified that the Company X study participants overwhelmingly preferred TV/video formats for health education. As mentioned earlier, other studies found similar preferences for this type of entertainment health promotion (TV/video, multimedia formats). Additionally, based on this study’s finding that participants highly desire health education, Company X will likely find future health education campaigns well received, especially if the information is communicated in entertainment-type formats or with model health narratives based on Company X employees.

Second, this study found that participants were well informed about healthy eating practices but were much less cognizant of physical activity and its integral role to living a healthy life. Additionally, to increase participation, participants suggested expanding wellness activities beyond the scope of weight loss initiatives. Promoting physical activity in a more
targeted campaign at Company X that both fills an educational gap and aligns with preferences for fitting physical activity in as part of everyday activities may have great success.

Participants also identified their own health model stories from their lived experience, or from people in their reference groups. The health model narratives where a family member, friend, or coworker served as the protagonist had more narrative depth and coherence than those involving celebrities. These inspirational narratives indicated the power of the social influence of people on those in their lives. This finding corresponded with prior examinations of social relations and the ability of those social influences to impact the perspectives and behaviors of others (Campbell & Jovchelovitch, 2000; M. Dutta-Bergman, 2004a; Hawe & Shiell, 2000).

Regarding wellness program participation, study participants were mostly pleased with the health challenges offered so far. In addition to suggesting future initiatives beyond weight loss campaigns as discussed above, a large focus of participants’ discussions centered on the role of incentives. As mentioned earlier, other studies have also reported on the role of incentives in increasing participation in workplace wellness programs, but this field of research needs further investigation before results could be generalized across different worksites and time points.

In summary, this study provided an exploration into employee preferences regarding health promotion and participation in workplace wellness programs. An organization that aims to better the health of its employees and that of the organization recognizes that a well-designed workplace health promotion program (1) depends on offering wellness initiatives that appeal to and win the participation of a majority of employees and (2) promotes health education tailored to employee needs. Workplace wellness promotion is a complex endeavor but one that when done well, ultimately improves organizational and individual health and well-being.
6. References


7.1. Appendix A - Focus Group and Interview Questions

Focus groups and interviews will include participants from both sample sets.
Sample A – *Past or current participants in a workplace wellness program*
Sample B – *Employees who have never participated in their workplace wellness program*

**Overall objective:** Identify employee preferences regarding health promotion messages, their concepts of health and influences on their decision to participate or not participate in workplace wellness programs.

**Table 1. Focus Group/Interview Questions**

<table>
<thead>
<tr>
<th>Domain</th>
<th>Question</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>Preferences regarding health promotion messages</td>
<td><strong>Tell us/me what kind of entertainment media you like best and why (movies, TV, computer games, music, books, magazines, Internet media, etc.).</strong></td>
<td>Self-developed</td>
</tr>
</tbody>
</table>
|                                             | **What kinds of past messages about physical activity or healthy eating come to mind?** | Interest in media preferences suggested by (T. R. Berry et al., 2010; M. Dutta-Bergman, 2004b; M. Dutta-Bergman, 2003).

Attributes of narrative communication suggested by (Kreuter et al., 2007).

Questions adapted from those used by (T. R. Berry et al., 2010)

Listen for type of information (narrative or statistical evidence) (Greene & Brinn, 2003; Hinyard & Kreuter, 2007).

<table>
<thead>
<tr>
<th>Employees’ concepts of health</th>
<th><strong>Give an example of a story you found inspiring about someone who made a change in their lifestyle to live healthier?</strong></th>
<th>Self-developed</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td><strong>How did you learn about the health success story?</strong></td>
<td>Topic (stories) influenced by (Berkley-Patton et al., 2009; T. R. Berry et al., 2010).</td>
</tr>
<tr>
<td></td>
<td><strong>What features stood out to you the most?</strong></td>
<td></td>
</tr>
<tr>
<td></td>
<td><strong>Listen or query for media format, model story attributes.</strong></td>
<td></td>
</tr>
</tbody>
</table>
Table 1. Continued: Focus group/Interview Questions

<table>
<thead>
<tr>
<th>Domain</th>
<th>Question</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>4. Perceptions of unhealthy behaviors</td>
<td>Describe someone you know personally (or a celebrity figure) who you consider lives an unhealthy lifestyle. What activities do they do or not do?</td>
<td>Self-developed</td>
</tr>
<tr>
<td></td>
<td>- How do they act or talk about these behaviors?</td>
<td>Asking about lay meanings of health influenced by (Hughner &amp; Kleine, 2004) and health stories by (Petraglia, 2009).</td>
</tr>
<tr>
<td>5. Perceptions of healthy behaviors</td>
<td>Describe someone you know personally (or a celebrity figure) who you consider lives a healthy lifestyle. What activities do they do or not do?</td>
<td>Self-developed</td>
</tr>
<tr>
<td></td>
<td>- How do they act or talk about their health?</td>
<td>Asking about lay meanings of health influenced by (Hughner &amp; Kleine, 2004) and role model stories by (Berkley-Patton et al., 2009).</td>
</tr>
</tbody>
</table>

Influences on the decision whether or not to participate in workplace wellness programs

<table>
<thead>
<tr>
<th>Domain</th>
<th>Question</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>6. Decision to participate</td>
<td>When you learned about the workplace health program what interested you in participating?</td>
<td>Self-developed</td>
</tr>
<tr>
<td></td>
<td>- Did the program announcement start you thinking about making health changes or were you already thinking about making health changes on your own?</td>
<td>Asking about participation influenced by (Langille et al., 2009).</td>
</tr>
</tbody>
</table>

Focus Group Only

<table>
<thead>
<tr>
<th>Domain</th>
<th>Question</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>7. Cooling down question</td>
<td>Describe the most important thing each of you heard during this discussion.</td>
<td>Quoted from (Hoyle et al., 2002) p. 404.</td>
</tr>
</tbody>
</table>

Table 2. Generic prompts for clarification or soliciting more in-depth responses

<table>
<thead>
<tr>
<th>Question</th>
<th>Source</th>
</tr>
</thead>
<tbody>
<tr>
<td>That’s interesting. Could you explain that a little more?</td>
<td>(Hoyle et al., 2002)</td>
</tr>
<tr>
<td>Let’s see, you said…</td>
<td>Self-developed</td>
</tr>
<tr>
<td>Can you explain…What that means to you? What you mean by…?</td>
<td>Self-developed</td>
</tr>
<tr>
<td>And then what happened?</td>
<td>(Berger, 2000)</td>
</tr>
<tr>
<td>Why did this happen?</td>
<td></td>
</tr>
<tr>
<td>What was the result?</td>
<td></td>
</tr>
</tbody>
</table>
### Table 3. Coding Instrument

<table>
<thead>
<tr>
<th>No.</th>
<th>Code</th>
<th>Theme/Category</th>
<th>Description or key terms</th>
<th>No. of Incidents</th>
</tr>
</thead>
<tbody>
<tr>
<td>1</td>
<td>C1</td>
<td>Participant perspectives</td>
<td>General societal perceptions about people and suggestions</td>
<td>33</td>
</tr>
<tr>
<td>2</td>
<td>C2</td>
<td>Media preferences</td>
<td>The types of media that participants say they like generally or referred to specifically by name</td>
<td>46</td>
</tr>
<tr>
<td>3</td>
<td>C3</td>
<td>Participants’ perceptions about healthy people</td>
<td>How healthy people are perceived (habits, behaviors, and attitudes)</td>
<td>14</td>
</tr>
<tr>
<td>4</td>
<td>C4</td>
<td>Positive health model story attributes</td>
<td>Changed eating or exercise behaviors to align with good health practices. Other good health changes not specific to eating/exercise that were also mentioned. Model story may be about the participant, someone s/he knows, knows of, or a celebrity.</td>
<td>30</td>
</tr>
<tr>
<td>4.2</td>
<td>C4.2</td>
<td>Negative health model story attributes</td>
<td>Stories about individuals who made decisions detrimental to their health – Later dropped.</td>
<td></td>
</tr>
<tr>
<td>5</td>
<td>C5</td>
<td>Participants’ perceptions about people viewed as unhealthy</td>
<td>General perceptions about activities/behavior/attitudes of unhealthy individuals</td>
<td>29</td>
</tr>
<tr>
<td>6</td>
<td>C6</td>
<td>Participants’ thoughts about Company X regarding wellness</td>
<td>Participant comments that intersected between wellness/health topics and Company X</td>
<td>61</td>
</tr>
<tr>
<td>7</td>
<td>C7</td>
<td>Relationship/social interactions</td>
<td>When behavior of others influences the attitude/behavior or choices of people in their social network or society</td>
<td>17</td>
</tr>
<tr>
<td>8</td>
<td>C8</td>
<td>Healthy exercise activity/behaviors</td>
<td>Misc. mentions of types of exercise/physical activity.</td>
<td>5</td>
</tr>
<tr>
<td>9</td>
<td>C9</td>
<td>Healthy eating behaviors</td>
<td>Comments about the types of foods they consider healthy and the benefits of healthy eating</td>
<td>15</td>
</tr>
<tr>
<td>10</td>
<td>C10</td>
<td>Unhealthy exercise activity/behaviors</td>
<td>Comments about unhealthy physical activity behaviors, mainly the lack of physical activity</td>
<td>2</td>
</tr>
<tr>
<td>11</td>
<td>C11</td>
<td>Characteristics of unhealthy eating</td>
<td>Comments on food and eating behaviors viewed as unhealthy (and the affects/results).</td>
<td>9</td>
</tr>
<tr>
<td>12</td>
<td>C12</td>
<td>Preferences/memory of health messages</td>
<td>General concepts of health information either remembered or liked and the sources of those nuggets of information</td>
<td>26</td>
</tr>
<tr>
<td>13</td>
<td>C13.1</td>
<td>Participation indicators – Company X wellness programs</td>
<td>Comments about participation in Company X wellness activities</td>
<td>17</td>
</tr>
<tr>
<td>13.2</td>
<td>C13.2</td>
<td>Participation indicators – other wellness programs or self directed</td>
<td>Comments about other kinds of wellness programs (not sponsored by Company X)</td>
<td>4</td>
</tr>
<tr>
<td>14</td>
<td>C14</td>
<td>How the employee learned about Company X wellness program</td>
<td>Identification of sources of wellness program information at Company X</td>
<td>10</td>
</tr>
<tr>
<td>15</td>
<td>C15</td>
<td>Work environment</td>
<td>Misc. comments about work/organizational life</td>
<td>9</td>
</tr>
<tr>
<td>16</td>
<td>C16</td>
<td>Health information/education</td>
<td>From any or unspecified source or discussed generally</td>
<td>23</td>
</tr>
</tbody>
</table>
### 7.3. Appendix C – Tables of Study Results

#### Table 4. Theme - Eating Habits, Foods and Related Affects

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive categories, comment types [36]</th>
<th>Positive Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>[52]</td>
<td>Healthy eating behaviors (19)</td>
<td>“…but it goes back to your basic food groups and it goes back to how much you eat.”</td>
</tr>
<tr>
<td>36 positive</td>
<td>- Reducing quantity</td>
<td>“I’ve been blessed with a high metabolism too but I try to watch what I eat.”</td>
</tr>
<tr>
<td></td>
<td>- Watch diet (i.e., kinds of food, conscious about eating, controlling sugar &amp; cholesterol)</td>
<td></td>
</tr>
<tr>
<td>16 negative</td>
<td>- Not eating processed food or fast food</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Eating specific types of foods (14)</td>
<td>“…I eat less meat than I would say average people. And I kind of go through cycles too but I definitely try to have a salad with a meal a day that would be my ideal. And um fruits and vegetables are very important.”</td>
</tr>
<tr>
<td></td>
<td>- Eating less meat or eat vegetarian</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Eating fruits &amp; vegetables important</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Eating oatmeal control cholesterol</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Chicken</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Eating natural, less processed &amp; organic foods</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Eating local foods</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Benefits of healthy eating (3)</td>
<td>“I did a lot of research on proper eating, all natural food. I’m into a lot of organics. Also meat has to be hormone free, organic. Mostly just live food. I cook meats for my husband but mostly I’m a fish and vegetable person.”</td>
</tr>
<tr>
<td></td>
<td>- Eating healthy = feeling better</td>
<td>“Well the healthier you eat the better you feel.”</td>
</tr>
<tr>
<td></td>
<td>- Eating fruits &amp; vegetables satisfies you longer</td>
<td>“If you get your good fruits and vegetables …it lasts you longer through the day than if you eat junk food.”</td>
</tr>
</tbody>
</table>

<table>
<thead>
<tr>
<th>Negative categories, comment types [16]</th>
<th>Negative Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>Unhealthy eating behaviors (6)</td>
<td>“Well maybe a coworker of mine who eats a lot of bad food [later described as “Lots of McDonald’s. Lots of candy.”] and drinks a lot of energy drinks and stuff like that… I mean he’s not overweight or anything but it kind of affects you know energy levels and things.”</td>
</tr>
<tr>
<td>- Eat lots of bad food (e.g., soda, pizza, food court, protein shakes, energy drinks, processed food)</td>
<td></td>
</tr>
<tr>
<td>- Not eat anything nutritious</td>
<td></td>
</tr>
<tr>
<td>- Eat out a lot</td>
<td></td>
</tr>
<tr>
<td>Food viewed as unhealthy (5)</td>
<td>“I have seen some kids here who are pretty overweight and every time you see them in the break room eating what are they doing? Coke, burgers, whatever. I mean it’s always something. I’m like how can you live on this 24/7?” Reply “Energy drink – energy drink.”</td>
</tr>
<tr>
<td>- Drinking pop, energy drinks</td>
<td></td>
</tr>
<tr>
<td>- Eating burgers</td>
<td></td>
</tr>
<tr>
<td>- Eating junk food (McDonalds, candy)</td>
<td></td>
</tr>
<tr>
<td>Unhealthy eating behaviors &amp; affects (5)</td>
<td>“People don’t understand that [daily calorie requirements]. It’s just – everything’s supersize for us. [group laughter] It’s terrible.”</td>
</tr>
<tr>
<td>- Overeating (e.g., beyond daily requirements, supersize mentality)</td>
<td>- - -</td>
</tr>
<tr>
<td>- Unhealthy eating affects your energy levels</td>
<td>“…But you can’t just sit there and say I lost 5 pounds. Reply “You gain it back the week after.”</td>
</tr>
<tr>
<td>- Losing weight &amp; gaining it right back</td>
<td></td>
</tr>
<tr>
<td>- High cholesterol</td>
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</tbody>
</table>
Table 5. Theme - General Good Health Behaviors or Changes for Better Health

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive categories, comment types [31]</th>
<th>Positive examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>[32]</td>
<td>Health model changed other lifestyle behaviors (19)</td>
<td>“And just from changing what I ate I lost like 15 pounds instantly.”</td>
</tr>
<tr>
<td>31 positive</td>
<td>- Lost weight</td>
<td>“I’d say it’s always been my mom. She quit using a lot of different drugs… and quit smoking. I mean everything unhealthy in that way.”</td>
</tr>
<tr>
<td>1 negative</td>
<td>- Stopped smoking/abusing alcohol &amp;/or drugs</td>
<td>“I was heavier…I just started learning more knowledge and wanting to feel better, and learning more stuff about how to eat better and make better choices.”</td>
</tr>
<tr>
<td></td>
<td>- Learning more healthy information</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Change to feel better about self</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Make positive choices</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Keep a food diary</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- See doctor regularly</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Use Company X programs</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Progressive changes (not drastic)</td>
<td></td>
</tr>
</tbody>
</table>

People with conditions who changed their health positively or model healthy behaviors (12)

- Family members/friends with alcohol or substance abuse history stopped drinking/using
- Family member with heart disease
- People who lost weight (Personal/self, friend, coworkers, Biggest Loser contestants)
- Celebrities (Montel Williams - manages multiple sclerosis with healthy lifestyle, Jack La Lane)
- Overall healthy lifestyle

“That would actually be my father. A few months back he actually had like three heart attacks in two days and since then he’s completely changed his health behavior. He’s stopped smoking. He’s changed what he eats. He doesn’t eat all the fast food and stuff like he used to. He’s seeing a doctor regularly. He’s pretty much turned his life around when it comes to being healthy and it’s really inspiring.”

“Then [mom] started working out and exercising. …She walks down to her work and walks back each time. She lost her weight gradually, over three years. But it’s stayed off and she looks great. She looks amazing. Hotter than me and I hate it. But she’s pretty much a role model to me and that inspires me to be healthier and be a better person.”

Neutral categories, comment types [1]

- Alcoholism not unusual – (1)

“I mean we all go through things like that in life [responding to story about former coworkers alcoholism]. You know and we see in our life, we see it in managers, we see it in regular coworkers who you know who go through alcoholism.”

Neutral examples
Table 6. Theme - Perceptions and Opinions about People (or Society) and Health

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive or neutral categories, comment types [6]</th>
<th>Positive or neutral Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td></td>
<td>- People tend to go back &amp; forth between healthy choices and excess/unhealthy indulgences</td>
<td>“Well yeah and the balance point is different for every person. But you know you have fun, you relax, you eat healthy or you gorge sometimes, you know you party and you kick back. Right definitely balance is definitely the best word for it.”</td>
</tr>
<tr>
<td>6 Neutral or positive</td>
<td>- The health balance point is different for every person</td>
<td></td>
</tr>
<tr>
<td>15 negative (italics)</td>
<td>- It’s about personal choices</td>
<td></td>
</tr>
</tbody>
</table>

Negative categories, comment types [15]  

<table>
<thead>
<tr>
<th>View about people/society pertaining to health issues (15)</th>
<th>Negative examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Our society wants quick fixes (diet pills, results now, etc.)</td>
<td>“That’s what we want as a culture is a quick fix. We want it now or it’s not happening.”</td>
</tr>
<tr>
<td>- People don’t stick with the health changes</td>
<td>“…if that’s not your follow-through then you’re wasting your time because as soon as you fall off the wagon you’re right back where you started.”</td>
</tr>
<tr>
<td>- They make excuses (i.e., genetics)</td>
<td>“A lot people feel comfortable with the way they are and don’t think they have a problem.”</td>
</tr>
<tr>
<td>- Some people accept their poor health status as just they way they are.</td>
<td>“But they [overweight people at work/in break room] tend to justify the reason for their behavior or they blame it on genetics. They say ‘oh I’m just always going to be this way.’”</td>
</tr>
<tr>
<td>- They don’t care/don’t have the motivation</td>
<td></td>
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</tbody>
</table>

Table 7. Theme - Exercise Behaviors

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive categories, comment types [13]</th>
<th>Positive examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>[15]</td>
<td>Healthy exercise behaviors (13)</td>
<td>“And she started to get more active. And she has to walk everywhere because she doesn’t have a car. So she was doing that and working out and…”</td>
</tr>
<tr>
<td>13 positive</td>
<td>- Daily activities as fitness (e.g., walking to/from destinations, playing outside with family)</td>
<td>“But exercise obviously you know some cardio would be ideal along with physical strength.”</td>
</tr>
<tr>
<td>2 negative</td>
<td>- Working out/exercising/cardio/strength training</td>
<td>“…Just like simple things like parking away from entrances to stores and making it to where you have a walk a little further, just trying to more active with just simple tasks and stuff.”</td>
</tr>
<tr>
<td></td>
<td>- 20-30 minutes a day 3-4 days a week</td>
<td>“…30 minutes a day 5 days a week. I’ve always heard that. That’s what they say if you want to lose weight.”</td>
</tr>
<tr>
<td></td>
<td>- Becoming more active</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Generally being fit</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Exercise helps your body rejuvenate</td>
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</table>

Negative categories, comment types [2]  

<table>
<thead>
<tr>
<th>Negative examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>- Unhealthy people don’t do any activities</td>
</tr>
<tr>
<td>- Friend died from gastric bypass surgery</td>
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</table>
Table 8. Theme – Attitude and Self Concept

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive categories, comment types [6]</th>
<th>Positive examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>6 positive</td>
<td>Attitude &amp; self concept (6)</td>
<td>“Unless you change your attitude from an unhealthy attitude then things will follow, depending on the person.”</td>
</tr>
<tr>
<td></td>
<td>- How you feel about self (related to body size, your confidence, comfort level)</td>
<td></td>
</tr>
<tr>
<td></td>
<td>- Good attitude = good health</td>
<td></td>
</tr>
<tr>
<td>4 negative</td>
<td>How unhealthy people see themselves (according to participants) (4)</td>
<td></td>
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<tr>
<td></td>
<td>- Overweight friend felt bad &amp; had a low self esteem</td>
<td></td>
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<tr>
<td></td>
<td>- Don’t love themselves enough</td>
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<td></td>
<td>- Not happy with themselves/ negative attitude leads to hurting themselves with their actions</td>
<td></td>
</tr>
<tr>
<td></td>
<td>Negative examples</td>
<td></td>
</tr>
<tr>
<td></td>
<td>“…Then in high school you know she [obese friend] was big. And it was hard for her because you know most of the people who were in high school, not everyone, but most are small or skinny or athletic. So she obviously felt bad about that and had low self esteem.”</td>
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</tbody>
</table>
Table 9. Theme - Comments Regarding Health Programs / Initiatives (within Company X or in General)

<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive or neutral categories, comment types [82]</th>
<th>Positive and neutral examples</th>
</tr>
</thead>
</table>
| [94] *       | **Suggestions for Co. X regarding wellness** [39] | “But usually everybody focuses on weight loss. There’s blood pressure, cholesterol, body mass…
Reply “Yes”
Reply “Yeah, there you go.”
Reply “There’s a lot of different factors.”

| 39 suggestions for Co. X | General suggestions (17) | “…as far as [Co. X] goes if they were more…if they were working on trying to keep their employees healthy they would offer better healthy snacks and drinks in the break room. …they’re all high-fructose corn syrup soda like drinks and candy and stuff like that. And you can get that anywhere but it’s hard to find healthier snacks or drinks so to speak….I mean it’d be better to have just a few choices of something that’s better for you.”

| 15 incentive comments | Would like educational programs (better eating habits, nutritionist group sessions) | “We should have some more information about it [what to eat]. So maybe we could have little meetings and we could say do you see what this is doing for you.”

| 12 participation comments | Would like healthier food options onsite in vending machines and onsite café/food court [Food court options are high fat/high calorie (with just a couple healthier options like yogurt & salad)] | “Well they have healthier options too. We have salads. We have chicken bake which is very loaded in calories. We have un pizza. We have yogurt with strawberries on it. We have hot dogs and soda. I believe that’s all… And then you can have an ice cream bar as well. So you can really have your calories at [Co. X].”

| 11 overall impressions (neutral/positive) | Would suggest a Healthiest Employee of the Month with rotating metrics of health (e.g., pedometer use, weight lost, etc.) | “We could have something like the healthiest employees of the month. And rotate it according to…maybe the pedometer, how many steps they have done or if they have lost weight with the program.”

| 5 misc. | Suggestions for insurance coverage (12) | “I know that certain companies are now charging you higher insurance according to your health. It’s a good motivation and I agree a hundred percent with that.”

| 12 overall impressions (negative) | - Support charging overweight, unhealthy employees higher health insurance costs | “And they [employees] both went through a [alcohol treatment] program up in ah Seattle that apparently now our insurance doesn’t cover anymore. I was a little disappointed. … Like I said the program is not being accepted through our insurance anymore. I was a little disappointed about that.”

| | - Would like added alcohol treatment program coverage | “You could have a fat person in a game and you have to manipulate their diet to make them lose weight. Then you’d have to know what the ingredients are and what causes you to gain weight…”

| Suggestions - games & the workplace (10) | - Suggest using video games to engage younger generation | “Cause so many kids play games - the Wii Fit was kind of the company’s way to incorporate a little bit of healthy… “I think that’s good we started that [Wii Fit in break room] – you know we put subliminal messages up there.”

| - Positive thoughts about Wii fit in the break room | - Play team sports after work; not time during work day | }
<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive or neutral categories, comment types</th>
<th>Positive and neutral examples</th>
</tr>
</thead>
</table>
| **Incentives [15]** | - Little incentives (e.g. like the competitions for top items scanned/month)  
- Maybe some type of exercise incentives to go the gym (or helped with gym dues)  
- Need rewards/incentives for everybody to participate | “You can offer little incentives like a contest one month.”  
“Well they do upstairs – like the people how have the top items scanned per month or get the most members per month. There’s 3 or 4 people each week who get that and I think you could do the same for healthy steps.”  
“...”  
“At my old building my warehouse manager was very proactive on things like this. And she would do things like…well if you participated you got like a chip and you turned it in to your supervisor and you got like an extra 5 minutes on your break or just little things like that. And people go “wow” 20 minute break instead of 15…”  
“We had a weight challenge per week and we put in money to start… So I participated in that one. So the person would win that lost the most weight per week… These would win some money and then at the final finale they would win the jackpot.” |
| **Participation [12]** | Types of Co. X wellness programs people participated in (7)  
- Weight loss challenges (monthly, weekly, year end)  
- I like doing the challenges (weigh ins, pedometer, pound for pound) | “...It’s like a weigh-in thing where she keeps track of people’s weights every month and then in December there’s a final weight. And we try and get like the lowest weight and stuff like that. Also, three months ago she also did another…like she gave everybody pedometers and we tried to have people that walked essentially the distance from here…to France I believe it was or something like that. We actually did that so we actually got like a salad bar in the break room for doing that. So yeah, things like that I enjoy doing.”  
| **Participation indicators – other wellness programs (1)** | Employee initiated Biggest Loser weight loss challenge in his department | “...we’re doing our own challenge [in department] – it’s all money motivated. [Laughs] So we’re doing a Biggest Loser thing. I think it’s a $50 entry fee and I think there’s a $500 - $600 pot right now. ...So that’s motivation right there. They weren’t going to let me play but I made ‘em do it by percentage…I only need to lose 13 pounds. And they’re like you don’t want to be in it. And I’m like “hell, for $500-600 I’m in there.” [Laughs]” |
| **Discussion on whether participation in company health activities should be mandatory or not (4)** | | - In the focus group some participants advocated that health education & activities need to be mandatory to be successful  
- Some focus group participants did not think requiring employees to participate in health education/activities will work |
<table>
<thead>
<tr>
<th>No. comments</th>
<th>Positive or neutral categories, comment types</th>
<th>Positive and neutral examples</th>
</tr>
</thead>
<tbody>
<tr>
<td><strong>Overall impressions of Co X &amp; wellness [11]</strong></td>
<td>“I don’t know. It seems like they are trying. C6] [I don’t know how you would force people to exercise or anything like that. C1] It’s more of the impression that you as a company give you know that you want healthier stuff for your employees.”</td>
<td>“Pedometers for a dollar… that was nice. We were all checking how many steps we did per day. “And I honestly did try to walk more when I was wearing the pedometer.” Reply “So did I.”</td>
</tr>
<tr>
<td>- See Co. X healthy changes as positive and showing concern for employee health (e.g. new vending machine options, healthy reward meals, etc.)</td>
<td>- Liked the pedometers promotion</td>
<td></td>
</tr>
<tr>
<td><strong>Miscellaneous comments [5]</strong></td>
<td>“Well there’s kind of a – there is a stretching break everyday. You do a little stretching, they give you a little meeting. But um – it’s relatively superficial but it’s an incentive, it’s more of an awareness program.”</td>
<td>Various individual comments about:</td>
</tr>
<tr>
<td>- Existing stretching breaks</td>
<td></td>
<td>- Challenges usually last 3 months</td>
</tr>
<tr>
<td>- New ideas for wellness programs (Co. X wellness website &amp; wellness manager, start a warehouse team to stimulate new ideas)</td>
<td></td>
<td></td>
</tr>
<tr>
<td><strong>Negative categories, comment types [12]</strong></td>
<td>“It doesn’t matter what they bring. If we don’t have the knowledge or we don’t choose or don’t love ourselves enough to make that change, then it doesn’t matter what they bring. You can lead the horse to water but you can’t make him drink.”</td>
<td>“But other than that they got things a little screwed up because they keep rewarding people (like people loosing a certain amount or do this challenge) with a big buffet. It’s like well thanks — this stuff isn’t good for you. But there was a salad bar so you know they’re just not really quite on track. I mean their intentions are good…”</td>
</tr>
<tr>
<td>Overall impressions of Co X &amp; wellness (9)</td>
<td>“It doesn’t matter what they bring. If we don’t have the knowledge or we don’t choose or don’t love ourselves enough to make that change, then it doesn’t matter what they bring. You can lead the horse to water but you can’t make him drink.”</td>
<td>(Wellness Advocate) “The same people will participate in everything you know with their friends. But I really want to get people that they never do that kind of stuff.”</td>
</tr>
<tr>
<td>- Ultimately, employees have to make better choices no matter what Co X offers</td>
<td>“But other than that they got things a little screwed up because they keep rewarding people (like people loosing a certain amount or do this challenge) with a big buffet. It’s like well thanks — this stuff isn’t good for you. But there was a salad bar so you know they’re just not really quite on track. I mean their intentions are good…”</td>
<td>(WA) “I think things get boring quickly. A lot of the ah weight loss challenges – you know the first two were great but it’s just really hard to keep them fresh.”</td>
</tr>
<tr>
<td>- Co. X intentions are good but a little off the mark (e.g., rewarding with big buffets, or vending machine changes with Gatorade)</td>
<td></td>
<td></td>
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<tr>
<td>- Difficulties include expanding employee participation, keeping challenges new so people stay engaged, needing more manager participation (for support &amp; modeling participation to employees).</td>
<td></td>
<td></td>
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<tr>
<td><strong>Other wellness programs or self directed (3)</strong></td>
<td>“But they [commercial weight loss programs] need to teach the people to be healthier, not just say here’s this pill, this pill will make me healthier. If you run out of this pill then you’re out of luck. You need to learn why you’re healthier and how to stay healthier once you get there.”</td>
<td></td>
</tr>
<tr>
<td>- Commercial programs should teach people how to be healthier and maintain health</td>
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</table>
Table 10. Social/Relationship Influences on Health Behaviors

<table>
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<tr>
<th>No. comments</th>
<th>Positive or neutral categories, comment types</th>
<th>Examples</th>
</tr>
</thead>
<tbody>
<tr>
<td>21*</td>
<td>Coworkers influencing others (9)</td>
<td>“I make little comments [to coworker eating candy] but I try not to be rude or disrespectful. I’ll say, ‘come on you don’t need that do you?’…He just chuckles, ‘yes I do.’”</td>
</tr>
<tr>
<td></td>
<td>- Employees who influence coworkers about health choices. – Versus -</td>
<td>“And I have a really good personality for getting that kind of stuff out there and motivating people and getting the hype up.”</td>
</tr>
<tr>
<td></td>
<td>- Not my place to tell them what to do (when seeing coworkers eating bad food)</td>
<td>…</td>
</tr>
<tr>
<td>20 positive</td>
<td>- Coworker’s lunch models healthy food</td>
<td>“Have you ever seen [X]’s lunch. It’s like a salad bar.”</td>
</tr>
<tr>
<td>1 negative</td>
<td>- Coworker with food allergies made employee aware of food ingredients</td>
<td>“Yeah, one of our workers, he was off for a little while on an injury. They had him on steroids while he was out. And you know steroids just make you pack on the weight. So he came back, ‘I’m fat. I’m fat.’ He was the one who was like ‘come on let’s do this.’ And he’s motivated by money too. He got everybody into it.”</td>
</tr>
<tr>
<td></td>
<td>- Healthiest employee picture could motivate other people to do the same</td>
<td>…</td>
</tr>
<tr>
<td></td>
<td>Family members &amp; friends influencing others (6)</td>
<td>“He [father] sees some of the lifestyles that I lead…I mean I don’t smoke and I don’t really drink but the food that I eat isn’t really that healthy. And so he’s really been persistent [chuckles] in trying to help me change my habits as well.”</td>
</tr>
<tr>
<td></td>
<td>- Parents (who made health changes) inspire changes in their children (employees)</td>
<td>“But it’s stayed off and she [mother] looks great. Counting calories. That really rubbed off on me. It wasn’t any diet. It was just keeping track of what you’re doing.”</td>
</tr>
<tr>
<td></td>
<td>- Family member diagnosed with Alzheimer’s disease.</td>
<td>…</td>
</tr>
<tr>
<td></td>
<td>- Family members/friends educate each other about health information</td>
<td>“Well a lot of it has to do with the education because I have a couple of friends that I talk to.”</td>
</tr>
<tr>
<td></td>
<td>Family members inspire others (2)</td>
<td>“He’s [father] pretty much turned his life around when it comes to being healthy and it’s really inspiring.”</td>
</tr>
<tr>
<td></td>
<td>- Father changed eating habits/stopped smoking and is really inspirational</td>
<td>“She [employee’s mom] lost her weight gradually, over three years… But she’s pretty much a role model to me and that inspires me to be healthier and be a better person.”</td>
</tr>
<tr>
<td></td>
<td>- Mom’s weight loss is model to follow</td>
<td>…</td>
</tr>
<tr>
<td></td>
<td>Celebrity or other influencers (3)</td>
<td>“So it’d be maybe even the [Biggest Loser] trainers. Because they’re really good um getting the United States involved. … Just the eating habits that inspires you to eat healthier…what they take for their food intake that inspires me to eat less amounts of food.”</td>
</tr>
<tr>
<td></td>
<td>- Biggest Loser contestants &amp; trainers model healthier habits</td>
<td>“It goes back to eating right, exercising. It all started with Jack La Lane. That man is 90 years old. He’s juicing. Montel Williams …because of his MS – eats right.”</td>
</tr>
<tr>
<td></td>
<td>- Celebrities with model eating/exercise habits</td>
<td>…</td>
</tr>
<tr>
<td>Negative categories, comment types [1]</td>
<td><strong>Negative examples</strong></td>
<td><strong>”I see a lot at work [eating processed food] but then you see who’s eating it and they’re like 100 pounds overweight. It’s affirming for me. ‘OK I’ll make sure I won’t have pizza.’”</strong></td>
</tr>
<tr>
<td>Cautionary example (1)</td>
<td>- Unhealthy behaviors are an example of what not to do</td>
<td>…</td>
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</tbody>
</table>

* Many of these comments were mentioned in other categories (i.e., are not new counts) but here detail the dimension of social or relationship influence on health.