

INTENTIONAL MUSIC LISTENING PROTOCOL: DEVELOPMENT OF
A RESOURCE-ORIENTED MUSIC THERAPY TECHNIQUE TO
PROMOTE WELL-BEING

A Dissertation
Submitted to
the Temple University Graduate Board

In Partial Fulfillment
of the Requirements for the Degree
DOCTOR OF PHILOSOPHY

by
Heather J. Wagner
Diploma Date May 2014

Examining Committee Members:

Dr. Darlene Brooks, Advisor, Director Music Therapy Program
Dr. Wendy Magee, Music Therapy
Dr. Deborah Confredo, Music Education

ABSTRACT

This study examined a music therapy technique designed according to a resource-oriented approach and involved the use of music listening with adults, called “Intentional Music Listening”. This protocol consisted of four music listening techniques. An exploratory sequential design was used, with a quantitative data phase followed by a qualitative data phase. The quantitative phase employed a modified crossover design, with an experimental group and waitlist control group. Participants attended groups at which they were coached in the music listening techniques for at-home practice. Quantitative data was gathered using the Positive and Negative Affect Scale (PANAS) (Watson, Clark & Tellegen, 1988), and through completion of diary cards after each at-home listening protocol. The qualitative data phase consisted of semi-structured interviews following participation in the music listening protocol. Both the statistical data and the qualitative data give support for the Intentional Music Listening protocol as having a positive impact on the participants’ perceived state of well-being, and as a viable set of techniques for use in wellness-based music therapy practice.

DEDICATION

First and foremost, this paper is dedicated to my mother, LouAnne Bloam. Your sacrifices gave me the opportunities that have brought me to this point.

Thank you to my father, Charles “Bud” Bloam. You taught me that I could do anything to which I set my mind.

There aren’t enough words to say thank you to my husband, Donald. I couldn’t have done this without you. Thank you for being there for me when I was frustrated and thought I would never finish, and for making me laugh even when I didn’t want to.

And to my children, Jacob and Brendan, may you both achieve all that you dream in your lives. You are my reason for working so hard.

ACKNOWLEDGMENTS

I would like to acknowledge the people who have helped me on this journey. First are my advisors, Dr. Cheryl Dileo and Dr. Darlene Brooks. Your guidance and support through this process made this possible. Dr. Dileo, you inspired me from my first moments at Temple University for my Master's degree. Your teaching and advisement helped shape the direction my career has taken. Dr. Brooks, your ability to remain positive and supportive in the face of my many challenges is what gave me the confidence to complete this project. Your firm, yet gentle presence got me through these past few months.

Thank you to my dissertation committee, Dr. Wendy Magee and Dr. Deborah Confredo, for your wisdom and thoughtful reflection on my work, and to Dr. Edward Flanagan for agreeing to read and review my dissertation.

I also wish to acknowledge retired Temple professor Dr. Kenneth Bruscia who laid the foundation for my philosophy of music therapy, and who has had a profound influence on my work and my life.

Thank you to former Temple professor Dr. Kenneth Aigen for always challenging me during my doctoral education and in the development of this protocol.

My sincere appreciate to Dr. John Stewart of Stewart Consulting who helped me enormously through the statistical analyses and his guidance in my understanding of the data.

Finally, I wish to thank the participants of my study and all those who assisted me in the recruitment process. You made this study possible.

TABLE OF CONTENTS

	Page
ABSTRACT	ii
DEDICATION.....	iii
ACKNOWLEDGMENTS	iv
LIST OF TABLES.....	xi
LIST OF FIGURES	xiii
CHAPTER	
1. INTRODUCTION	1
Topic and purpose	1
Clinical Significance.....	3
2. REVIEW OF RELATED LITERATURE.....	5
Definitions and Delimitations.....	5
Well-Being.....	6
Factors that Influence Well-Being.....	8
Well-Being as a Multidimensional Concept.....	10
Affect, Mood, and Emotions as Components of Well-Being.....	11
Theories of Affect.....	12
The Dynamic Model of Affect Relationship	12
Subjective Well-Being.....	12
Theories of Affect Regulation	13
Control Theory Model	13

Broaden-and-Build Theory	14
Well-Being through Music	14
Music Listening and Well-Being	17
Affect, Mood, and Emotions in Music	19
Music Therapy and Wellness Practices	24
Music Therapy and Affect Regulation	24
Resource-Oriented Music Therapy	26
Influences of Related Psychological Theories	26
The Influence of Empowerment	26
The Influence of the Common Factors Approach	27
The Influence of Positive Psychology	28
Characteristics of Resource-Oriented Music Therapy	29
Nurturing of Strengths, Resources and Potentials	30
Involves Collaboration Rather Than Intervention	30
Views the Individual within His/Her Context	31
Music Is a Resource	31
Summary	32
Research Questions	32
3. METHOD	33
Participants	33
Recruitment	34
Design	34
Procedure	36

Quantitative Phase	36
Qualitative Phase	38
Intentional Music Listening Groups	39
Week 1	41
Week 2	41
Role of the Therapist	42
At-Home Listening Experiences	42
Data Gathering	43
Quantitative Data Gathering	45
Qualitative Data Gathering	45
Data Analysis	46
Quantitative Measures	46
Qualitative Interviews	47
Data Integration	48
4. RESULTS	49
Quantitative Results	49
Sample	49
PANAS Data	51
Diary Card Data	62
Listening Experiences	64
Correlations between Variables	65
Well-Being	68
Bivariate Correlations between Well-Being and Variables	69

Multivariate Statistics	73
Comparing PANAS and Diary Card Well-Being Scores	78
Open-Ended Diary Card Responses	80
Question 1: Part of the Music	80
Question 2: Mood	82
Question 3: Body Responses	86
Qualitative Results	89
Mood	90
Physiological Responses	93
Release	94
Body Memory	94
Arousal	94
Calm	95
Relationship with Music	95
Personal Associations	95
Awareness of Music	99
Lingering Effects of Music	100
Future with Music	100
5. DISCUSSION	101
Data Integration	101
Reflections on the Protocol	105
The Music and the Use of Music Players	105
Groups and Group Environment	108

At-Home Practice	109
Techniques.....	110
Musical Elements	110
Positive Imagery	110
Body Awareness	111
Movement.....	112
Data Collection	112
Impact of the Researcher on the Process	113
Instructions	113
Techniques.....	114
Study Limitations	115
Recommendations	116
Future Research	116
Future Implications for the Protocol.....	117
Considerations for Implementation of the Protocol	119
Concluding Remarks	120
 BIBLIOGRAPHY	 121
APPENDICES	
A. RECRUITMENT LETTER TO PRACTITIONERS	129
B. RECRUITMENT FLYER	130
C. INFORMED CONSENT	131
D. AT-HOME LISTENING INSTRUCTIONS	136

E. OUTLINE OF GROUP PROCEDURES	138
F. STRETCHING SEQUENCE	140
G. PANAS QUESTIONNAIRE	141
H. ELECTRONIC PANAS QUESTIONNAIRE	142
I. I-PANAS-ST	143
J. DEMOGRAPHIC QUESTIONNAIRE.....	144
K. INTENTIONAL MUSIC LISTENING DIARY CARD	147
L. APA PERMISSION	149
M. QUALITATIVE INTERVIEW OUTLINE.....	150

LIST OF TABLES

Table	Page
1. Outline of Study Procedures.....	37
2. Optimal Study Design	52
3. Actual Study Design.....	52
4. PANAS Data Groups.....	54
5. Properties of the PANAS Components from Three Measurement Periods.....	54
6. <i>t</i> -Test Results for Changes of PANAS Scores.....	62
7. Time of Day of Listening Experiences.....	65
8. Frequency of Engagement of Each Listening Technique.....	67
9. Well-Being Ratings Before and After Listening	68
10. Change in Well-Being (WB-After – WB-Before).....	68
11. Summary of Listening Duration and Well-Being Change by Technique.....	69
12. Summary of Listening Duration and Well-Being Change by Time of Day of Listening	70
13. Well-Being Change According to Listening Duration	71
14. Correlation Between Listening Duration and Well-Being Change	71
15. Regression Equation Predicting the Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique.....	75
16. Regression Equation Predicting the Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique with WB-Before Score	76
17. Regression Equation Predicting Change in Well-Being by Listening Duration,	

Listening at Night, and the Musical Elements Technique with WB-Before Score with Dummy Variables for Respondents.....	77
18. Regression Equation Predicting Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique without WB-Before Score with Dummy Variables for Respondents	78
19. Comparison of Predictors for Change in PA and NA Scores at Various Intervals	79
20. Responses to Diary Card Open-Ended Question 1	81
21. Responses to Diary Card Open-Ended Question 2.....	83
22. Responses to Diary Card Open-Ended Question 3.....	87
23. Qualitative Themes with Categories and Concepts	90
24. Categories, Concepts and Data for Theme “Mood”	91
25. Categories, Concepts and Data for Theme “Physiological Responses”	93
26. Categories, Concepts and Data for Theme “Relationship with Music”	96

LIST OF FIGURES

Figure	Page
1. Age range distribution of demographic survey respondents	51
2. Degree of change of PA between T1 and T2 NA administrations	56
3. Degree of change of NA between T1 and T2 NA administrations	57
4. Degree of change of PA between T2 and T3 NA administration.....	58
5. Degree of change of NA between T2 and T3 NA administrations.....	59
6. Degree of change of PA between T1(or T2) and T3 NA administrations.....	60
7. Degree of change of NA between T1(or T2) and T3 NA administrations	61
8. Total number of diary cards submitted by each participant	63
9. Participant reported length in minutes per listening session	64
10. Mean listening duration according to the time of day of listening	66
11. Mean length in minutes for each listening technique	67
12. Mean change in well-being according to time of day of listening	72
13. Mean change in well-being according to technique	73

CHAPTER 1

INTRODUCTION

Topic and Purpose

Globally, there has been a movement from illness-based models of health to a more holistic view of health as a wellness-based conceptualization. Further, the notion of health is being more fully embraced as a multi-dimensional phenomenon, rather than simply involving physical or biological functioning.

The World Health Organization (WHO) (2011) defines health as “a state of complete physical, mental and social well-being, and not merely the absence of disease.” It is salient that the WHO’s definition includes the term “well-being.” Mental well-being, one component of overall well-being is defined by the WHO as a “state (of well-being) in which the individual realizes his or her own abilities, can cope with the normal stresses of life, can work productively and fruitfully, and is able to make a contribution to his or her community” (Ranaweera & Chandra, 2009, p. 2). This focus on well-being and greater ability as opposed to disability is being embraced by a variety of healthcare and mental health disciplines. One such example can be found in the field of psychology, aptly termed “positive psychology.”

The positive psychology movement, promoted by Seligman and Csikszentmihalyi (2000), advocates that “treatment is not just fixing what is broken; it is nurturing what is best” (p. 7). The intent of positive psychology research is to have a more complete and balanced understanding of

the human experience, including suffering and happiness and their interaction, and interventions that both relieve suffering and increase happiness (Seligman, Steen, Park & Peterson, 2005).

This emphasis of balanced understanding of human functioning can manifest in many forms of intervention. Music therapy, a profession rooted in both music and therapy, often responds to trends in related fields such as psychology. Music therapy has traditionally embraced specific wellness issues, such as stress management and has long supported the notion of finding enjoyment through music. However, a new perspective on promoting well-being through music therapy is found in the resource-oriented approach advocated by Rolvsjord (2010). This approach is based on the concept that development of the strengths and resources of a client in music therapy may lead to positive, psychotherapeutic benefit. The author is careful to note that resource-oriented music therapy is an approach, not a specific technique or model. She purports that any technique or model of music therapy can be considered “resource-oriented” if the goals are focused on developing strengths and resources. A more in-depth explanation of resource-oriented music therapy may be found in chapter two of this paper.

One of the reasons that music therapy has the potential to be a powerful force for individuals is the actual engagement in music and the role that music plays in everyday life. People listen to music in their leisure time for a variety of purposes, such as creating certain mood states or changing their levels of emotional arousal (North, Hargreaves & Hargreaves, 2004). Individuals may consciously or unconsciously choose particular genres or specific pieces of music for their meaning or associations to meet a personal need in the moment. Particular songs or pieces of music may hold great significance for a listener (Batt-Rawden, DeNora & Ruud, 2005; Bruscia, 1998a). Whereas music therapists often capitalize on these effects of

music in the therapy setting, it would seem logical for music therapists to also guide clients to use music listening in everyday life to reap psychological benefit.

Hanser (2011) did just that in her work as a music therapist in a medical center. She guided clients in cancer treatment in creating playlists for use upon discharge. The purpose of the playlist was to choose music that would help them produce desired affective states. This ultimately proved to be important in helping the clients take control of their emotions. With the increased accessibility and portability of music due to advances in technology, it would seem relatively easy to for this to be a step in discharge planning for music therapy clients, and even further, for guiding well adults in their quest for greater states of well-being.

Clinical Significance

Often, the most appealing and motivating aspect of engagement in music therapy is the actual experience of the music. Music therapy is often seen as enjoyable on some level, even when difficult themes or expressions are elicited. Acquiring a greater understanding about the possibility of music therapy techniques to improve well-being, and understanding how to capitalize on this positivity, would benefit the practice and ultimately the clients of music therapy. Additionally, with the burgeoning field of self-help and self-care, and more specifically music for self-help, it would seem only logical that music therapists become more highly engaged in this trend, offering their unique training and understanding about music and its mechanisms for promoting wellness. As Ruud (2013) noted, few studies have focused on the use of music in everyday life as a way to provide protective health benefit. He holds that there are “new possibilities for widening the compass of music therapeutic interventions to include the intersection between clinical work and people’s other engagements in society” (Six Narratives on Music as Self-Care, para. 1).

The development of this resource-oriented music listening protocol is beneficial to persons at varying levels of health and wellness. The unique design of the Intentional Music Listening protocol as a psychoeducational technique facilitated by a trained music therapist and then practiced in everyday contexts, coupled with the individual's expertise about him- or herself and the capacity to connect more deeply with the power of music has the potential to be an excellent resource to enhance well-being. Well persons seeking personal growth or a more optimum state of being have the opportunity to become more aware of the potential power of music in their everyday lives, and capitalize on this capability in a more intentional manner. As Sloboda (2010) notes, much of everyday music listening occurs in tandem with other activity, and listening to music for its own sake is rare. Additionally, persons with medical and/or psychological illnesses can be empowered to use music for their personal gain and growth, particularly in situations in which resources for music therapists are limited. The Intentional Music Listening protocol has the potential to open doors to a more meaningful, focused experience of music.

CHAPTER 2

REVIEW OF RELATED LITERATURE

Definitions and Delimitations

For the sake of clarity, it is important to delineate the relevant definitions and delimitations of literature included in this paper. Though perhaps obvious, the most important definition to present is that of “music therapy” itself. According to the American Music Therapy Association’s (AMTA) website (2011), music therapy is “the clinical and evidence-based use of music interventions to accomplish individualized goals within a therapeutic relationship by a credentialed professional who has completed an approved music therapy program.”

It is notable that on its list of what music therapy interventions can be designed to address, the AMTA cites “promoting wellness” first. As cited by Parker (2009), the AMTA defined music therapy in wellness in 2005 as “the specialized use of music to enhance quality of life, maximize well-being and potential, and increase self-awareness.” This provides clear support of the application of music therapy for wellness and to improve well-being.

This study focused on the use of music listening to enhance well-being. In the extended definition of music therapy, the AMTA (2011) includes the use of music listening as an accepted music therapy intervention: “after assessing the strengths and needs of each client, the qualified music therapist provides the indicated treatment including, creating, singing, moving to, and/or listening to music.” Therefore, if a trained music therapist facilitates music listening, the intervention can be part of a music therapy process. Finally, the emphasis on assessing strengths

and needs supports a perspective that enhancing what is already good about a person has a place in therapy.

The focus of this study was a music listening protocol to and its impact on well-being, specifically measured by affect. There is a wide body of literature on music and mood, music therapy and mood, and music listening. For the sake of this study, only literature focusing on wellness and affect of non-clinical populations is included both for music listening and music therapy. This is not to imply that wellness and well-being are not important concepts for persons with illness, but rather to provide focus and clarity for the study.

There are three studies that were included in this review even though they focus on clinical populations: Batt-Rawden, DeNora and Ruud (2005); Hanser, 1990; and Harrison, Cooke, Moyle, Shum, and Murfield, 2010. These studies were included because they focused on the effects of music listening and mood responses with no emphasis on the illness, and two of them are not music therapy studies. Hanser's (1990) study was included because her music listening method has similarities to the proposed Intentional Music Listening Protocol. It was therefore deemed to be important to include in the review of literature to offer support for the study.

Well-Being

The term "well-being" is not a technical term. It may encompass anything to which an individual strives in the process of becoming more whole, balanced and positive in mind, body and spirit (Hanser, 2011). Similarly, "health" is a broad term that refers to the comprehensive nature of physical and emotional status. To provide clarity, however, both terms require a contextual description.

There is much support for defining health in a broader concept as opposed to the traditional absence of illness concept (Kirsten, van der Walt, Viljon, 2009; Parker, 2010; Rolvsjord, 2010; Ryff & Singer, 1998; Ranaweera & Chandra, 2009). First suggested by Antonovsky (1996) in his salutogenic perspective of mental health, health is increasingly viewed as a continuum of functioning, rather than a discrete end state. There is greater acknowledgement of the interconnectedness between mind and body, and positive health is considered a multidimensional dynamic process (Ryff & Singer, 1998). O'Grady and McFerran (2007) described this process:

Health is not an either-or condition but a process involving physical, emotional, social, cultural, and spiritual dimensions. Furthermore, this process is not just a linear progression that ends with achieving a state of balance; it is more like a continuum along which people continually move forward or backwards, or cyclically as various physical, emotional, social, cultural and factors ebb and flow throughout their life. People's health needs will depend upon where they are located on this continuum. (p. 68)

In the literature, the terms, "health," "wellness," and "well-being" are used frequently and seemingly interchangeably when describing a positive state of functioning. In a literature review of these phenomena, Kirsten, van der Walt and Viljon (2009) concluded that there is no consistent pattern of conceptual links among these three terms. According to these authors, there is no distinction between "health" and "wellness," and they recommend the use of the term, "wellness," as a way of avoiding the restricted meaning of "health" as the absence of disease. The authors suggested that the term, "well-being," be reserved for describing the functioning of the different domains or contexts of a person's life, including mind, spirit, emotions, meaning, behavior, social relationships, and interconnectedness of person and environment. The promotion

of these domains enhances the health/wellness of the person. In this conceptualization, the promotion of well-being ultimately leads to a person's state of health/wellness.

This definition is similar to that of the WHO, terming it as "mental well-being." In this definition, mental well-being refers to a personal state in which individuals are aware of their strengths, are able to cope with normal life stressors, are able to work productively and contribute to his or her community (Ranaweera & Chandra, 2009). This definition captures the domains described in the preceding paragraph. Another description of well-being is that of "subjective well-being" (SWB) (Diener, 2000) which is defined in general terms as happiness, and more specifically as peoples' evaluations of their lives. This includes life satisfaction, satisfaction with work, high levels of positive affect, and low levels of negative affect.

Factors that influence well-being. There are many factors that influence well-being. Diener (2000) found that temperament and personality strongly influence SWB, likely because individuals usually adapt to some to degree to both good and bad conditions. The influence of temperament and personality on well-being is supported by Hermon and Hazler (1999). They considered psychological well-being to be an internally-focused method of attaching value to the quality of life and affective experience, with both long- and short-term components. A long-term component is propensity or disposition, whereas short-term is mood. Although individuals may not be able to change their general disposition, their mood may vary and may be influenced by a variety of factors.

Quality of life is a concept that is frequently associated with well-being. Quality of life can be defined as an individual's perception of his or her position in life in the context of culture and value systems, in relation to personal goals, expectations, standards and concerns

(Ranaweera & Chandra, 2009). Similar to well-being, there are a variety of factors that influence this phenomenon. Hermon and Hazler (1999) found that self-regulation, friendship, work, recreation, and leisure contributed significantly to quality of life as a component of psychological well-being in college students. Self-regulation included stress management, a sense of worth, control, emotional responsiveness, intellectual challenge, nutrition, exercise, sense of gender and cultural identification. All of these facets were associated with high levels of well-being.

In addition to quality of life, Ranaweera and Chandra (2009) noted several other concepts that are related to mental well-being, including resilience, positive psychology social capital, and the salutogenic view of health.

Resilience is the capacity to cope with adversity and to avoid breakdown when confronted with stressors. Resilience can buffer individuals from adversity (Mak, Ng, & Wong, 2011).

Positive psychology in this case is a general term referring to the idea that resilient and optimistic people are less likely to suffer from depression and will lead happier and more productive lives (Ranaweera & Chandra, 2009). This idea led to a movement also termed “positive psychology” (Seligman & Csikszentmihalyi, 2000), and will be further explored later in the paper.

Social capital refers to a person’s social life, such as institutions, networks, norms, reciprocity, and social trust that shape the quality and quantity of social interactions. Social capital constructs such as trust, social support and social networks all influence well-being.

Finally, it is important for life to have meaning, and for the world to make sense. Antonovsky (1996), in his *salutogenic view* of mental health, purported that a sense of coherence is an important construct to overall health and well-being. This construct is a generalized

orientation toward the world, perceiving it as comprehensible, manageable and meaningful. This is similar to Frankl's (1946) tenet of *logotherapy*, that people are motivated by the will to find meaning in life.

It is important to note that well-being, an inherently positive concept, does not intend to dismiss the negative. Well-being emphasizes engagement in living. This engagement includes difficult experiences, pain and struggle, which are part of such engagement. A complete approach to well-being seeks to integrate these negative life experiences in the quest to achieve deeper meaning and purpose, closer ties to others, an increased self-regard, and heightened mastery (Ryff & Singer, 1998; Seligman, et al., 2005).

Well-being as a multidimensional concept. As suggested in the above citations, there are many factors that may influence an individual's perception of well-being. One popular theory of well-being was developed by Ryff (1989). Based on Maslow's theory of self-actualization, Rogers's view of the fully functioning person, Jung's formulation of individuals and Allport's conception of maturity, Ryff delineated six main components to well-being:

1. Self-acceptance – a positive attitude about oneself.
2. Positive relations with others – warmth, trust, and the ability to love.
3. Autonomy – self-determination, independence, and regulation of behavior from within.
4. Environmental mastery – the ability to choose or create environments suitable to one's own psychic conditions.
5. Purpose in life – beliefs that give one the feeling that there is purpose in and meaning to life; includes goals, intentions and a sense of direction.

6. Personal growth – continual development of one’s potential and openness to experience.

Ryff and Keyes (1995) studied these dimensions to determine the ability to replicate them, to assess their consistency across age and sex, and to compare the relationship between this theory of wellness and the three prominent indicators from prior research, including happiness, life satisfaction, and depression. They found support for this six-factor model as opposed to a single indicator of well-being.

Affect, mood, and emotions as components of well-being. Affect, mood and emotions are often identified as important factors in determining well-being (e.g., Austenfeld & Stanton, 2004; Fredrickson, Mancuso, Branigan, & Tugade, 2000; Larsen, 2000; Reich, Zautra, & Davis, 2003; Tugade, Fredrickson, & Barrett, 2004). Larsen (2000) differentiated between affect, mood and emotions as follows. “Affect” can be operationally defined as the feeling tone associated with mood and emotion, serving an evaluative function of an individual’s state of being. Affect however is not just an outcome of thoughts and situations, but can influence them as well. Positive affect influences behavior in a manner that promotes resource building and involvement with goals and motivation, which can lead to improved cognitive performance and abilities (Ziv, Chaim, & Stamar, 2011).

A simple differentiation between mood and emotion is that emotions often have a distinct cause and an object of reference, whereas mood may be more pervasive and less connected to specific behaviors. This is supported by Ekkekakis (2012), who stated that “emotional episodes are elicited *by* something, are reactions *to* something, and are generally *about* something” and that moods are more “diffuse and global as opposed to specific” (p. 322). The author described affect as being experienced constantly with varying nature and intensity.

Affect is often categorized as positive or negative. A popular conceptualization of positive affect (PA) and negative affect (NA) was described by Watson, Clark & Tellegen (1988). These authors viewed PA and NA as distinct, orthogonal dimensions rather than as a bipolar relationship. PA reflects the extent to which a person feels enthusiastic, active and alert. Further, high PA is a state of high energy, full concentration and pleasurable engagement, and low PA is characterized by a state of sadness and lethargy. NA is a general dimension of subjective distress and unpleasurable engagement that subsumes a variety of aversive mood states, including anger, contempt, disgust, guilt, fear, and nervousness. High NA results in subjective distress and unpleasant engagement, whereas low NA is a state of calmness and serenity (Crawford & Henry, 2004).

Theories of Affect

The Dynamic Model of Affect Relationship. The Dynamic Model of Affect Relationship (DMA) is a model of affect developed by Reich, Zautra, and Davis (2003). This model emphasizes the importance of contextual factors to affect, and holds that positive affect and negative affect can be both orthogonal and bipolar. DMA regards processing of emotional responses to the environment on a continuum from simple and one-dimensional to complex and multidimensional. The differentiating factor in determining processing on this continuum is the degree of uncertainty the person feels resulting from recent stressful events. Under high stress, positive affect and negative affect tend to collapse into a simple, bipolar dimension with a highly inversely coupled affect. Stress is a threat to well-being, and emotional processing is narrowed to aid successful coping with the stressor.

Subjective well-being. The development and interest in measuring both positive affect and negative affect may be due to the shift in focus in psychology toward measuring not only

maladaptive, negative thoughts and behaviors to an openness to positive, affirming, resilience-enhancing aspects of human adaptation and well-being (Reich, Zautra, & Davis, 2003). Diener (2000) specifically delineated positive affect and low levels of negative affect as important characteristics of subjective well-being. In an investigation of a person-centered approach to studying subjective well-being, Busseri, Sadava, Molnar and DeCourville (2009) determined that people characterized by a high subjective well-being profile reported superior mental health, physical health, and interpersonal functioning. In contrast, a low subjective well-being profile appears to be a marker of psychosocial and physical impairment.

Theories of Affect Regulation

Control theory model. In addition to the presence of positive affect and negative affect, self-regulation and mastery of affect, mood and emotions have been found to be an important aspect of well-being (van Goethem & Sloboda, 2011; Hermon & Hazler, 1999; Ryff & Singer, 1998). Affective states may persist long after their functional, communicative or informational role is achieved. These states can thus become chronic and dissociated from objective life circumstances. Therefore the ability to self-regulate affective states is a crucial part of adaptive psychological functioning. Larsen (2000) developed the *control theory model* of mood regulation, in which affect can be the controlled quality. This theory holds that people directly compare their current state to some desired state and take actions with the direct intention of regulating how they are feeling. This process is highly dependent on the individual, with six mechanisms of individual difference identified. They are 1) attention to affect; 2) regulatory mechanisms that effect personal or environmental change; 3) temperamental affective reactivity; 4) attention to or perception of current state; 5) discrepancy sensitivity; and 6) desires/beliefs/values regarding optimal state.

Broaden-and-build theory. Negative emotions and poor coping to emotional stress can have a negative effect on physical and psychological health (Fredrickson, et al, 2000). The *broaden-and-build theory* (Tugade, Fredrickson, & Barrett, 2004) holds that positive emotions have the potential to quell autonomic arousal generated by negative emotions and broaden one's attention, thinking and behavioral repertoire. Positive emotions can momentarily broaden one's scope of thought and allow for flexibility, attention and thus improve well-being. When repeated, this broadened mindset can become habitual, providing resources that may be drawn when under stress. The authors studied two phenomena of this theory: psychological resilience and positive emotional granularity, or the tendency to represent positive emotional experience with precision and specificity. When considering psychological resilience, trait resilience was found to be positively associated with positive mood, and positive emotions help the coping process. The authors concluded that positive emotions serve as protective factors useful in promoting short-term health benefits as well as providing long-term advantages for coping in the future. Study participants with higher emotional granularity reported that they are less likely to mentally self-distract during stressful times, are more engaged in the coping process, less automatic in their responding and more likely to think through their behavioral options before activity.

In reflection of these theories of affect regulation, there are both individual methods for maintaining optimum functioning and methods of intervention that have been developed to address deficiencies and challenges in functioning. Music and music therapy may be employed both individually and in community to address this need and to promote well-being in general.

Well-Being through Music

There is much support for the ability of people to engage with music in ways that enhance health and well-being (Batt-Rawden, 2010; Knobloch & Zillman, 2002). DeNora (1999)

found that music has a role as an ordering device at the personal level as a means for creating, enhancing, sustaining and changing subjective, cognitive, bodily and self-conceptual states.

Based on the multidimensional theory (Ryff, 1989), this can be interpreted as music being used to promote well-being. Discussing music and health promotion, Batt-Rawden (2010) summarized the effects of music on well-being:

- Feelings of self-recovery, self-confidence, bridge building, self-efficacy, self-change, pleasure and connection to others
- Effects of calming, inspiring, motivating, comforting, relaxing, triggering memory
- Provision of vitality, happiness, joy, emotional release, energy, relief, strength, wholeness in body/mind, self-stability, coping mechanism, sense of being alive, and hope.

These effects were also present in Hays's (2005) interviews with older adults about the meaning and importance of music in their lives. He found that the experience of music was individualistic and intensely personal. The personal meaning of music had "direct links" (p. 29) to the participants' perceptions of identity and well-being and music served as a motivator to engage in life experience. The participants' expressed that music gave meaning to life experiences.

In interviews with caregivers of cancer patients, all participants reportedly found music helpful, encompassing emotional, physical, communicative, supportive, empathic, affirming, transformational, cathartic, distractive, or stabilizing elements (O'Callaghan, Hudson, McDermott, and Zalberg, 2011). Caregivers used music to

- alter thoughts (as a distraction or shift focus);

- increase productivity (due to increased energy);
- release emotion and alter moods;
- feel in control by changing emotions and even to avoid emotions when necessary;
- enhance quality of life;
- connect with patients through listening to their preferred music;
- experience support (music described as “supportive friend”);
- connect with spirituality;
- practice self-care; and
- offer structure/sense of coherence.

In his examination of music and quality of life, Ruud (1997) found that music has the potential to satisfy four human needs: affective awareness, agency, belonging and meaning. *Affective awareness* is an increased awareness of feelings, including an ability to both experience and express feelings. He goes on to express this in terms of vitality, the combination of spontaneity and reflexivity in emotional expression. *Agency* is the ability to take responsibility for one’s own life and actions, to be able to make choices, and follow self-made plans. This includes developing a sense of achievement, competency, and feelings of mastery and empowerment. Because of the social nature of music experience, a sense of *belonging* may result through experiences of involvement, a heightened feeling of being included, and relation with others. Musical experiences are often remembered or felt as being significant, thus bringing a sense of *meaning*. Music may provide the link to inclusion in a larger context, and offer a sense of life as having value.

These effects of music on well-being have been noted in both musicians and non-musicians, people of varying ages and functioning levels, and in differing levels of music involvement, from active music making to receptive music experiences (e.g., Hanser, 2006; Hanser, 2011; Harrison, Cook, Moyle, Shum & Murfield, 2010; Reuer, Crowe, & Bernstein, 2007; Saarikallio & Erkkilä, 2007). A popular and generally accessible method of musical engagement for well-being aims is through music listening.

Music listening and well-being. Although there has been much written about the effects of music listening on the physiological domain, this paper focused on the effects of music listening on mental functioning as it relates to well-being. Ruud (2013) referred to the use of music as health-related behavior as a “cultural immunogen” (A Cultural Immunology?, para. 1). As such, engaging in music listening may serve as a protective behavior that may influence well-being

Listening to music is often reported as a highly valued leisure activity (Laukka, 2007). In a study of the effects of music listening on persons with long-term illnesses, Batt-Rawden, et al. (2005) found improvements in well-being both from the act of listening to music, and from the participation of the clients in making track choices for shared CDs. When participants listened to the music they had contributed to the compiled CDs, they found that the music they chose at the specific time of their lives represented a sense of certainty about that life experience. This led to feelings of empowerment and a sense of aesthetic belonging (as represented by their choices being part of the shared musical experience with other group members). This in turn increased their sense of well-being. In a second study with these subjects, Batt-Rawden (2010) concluded that music might provide resources for recovery of self-identity through opportunities for interaction, reminiscence, adoption of roles and emotions. This occurred through individuals’

increased self-regulation and self-identification. Increased self-identification was then related to an improvement in well-being as music provided a reminder of who the participants wanted to be and how to get there.

In a study of adolescents, Miranda and Gaudreau (2010) determined that both positive individual and social experiences from music listening might contribute to positive youth development. This positive youth development was determined by healthy emotional well-being. Music was found to be very important to many adolescents, likely because music listening usually produced positive emotions. The authors posit that everyday music listening experiences can have moderate but cumulative emotional effects.

It is important to note although most consequences of musical engagement are positive, there are some negative responses. In another study of adolescents' use of music, McFerran and Saarikallio (2014) found that most young people "feel happier, more relaxed, relieved, connected, confident and understood as a consequence of engaging with music of their own intuitive and largely unconscious choosing" (p. 94). Problems may arise however when young people are feeling vulnerable, and may use music to isolate themselves from others or ruminate in negative feelings.

Contexts determine the value of the music experience to the individual listener. There are several characteristics of music and the listening environment/situation that may affect an individual's response. Though preferred music is typically most often found to produce a relaxation effect and positive change in mood (Pelletier, 2004), music that is used for listening does not always have to be familiar to have an effect. Listening to recordings of percussion music composed with specific emotional intent had an effect on listeners' mood, as well as levels

of relaxation, energy and focus (Hoeft & Kern, 2007). Many studies that show an increase in positive affect and improved mood state utilize music from the Western classical genre with no application of listener preferences (e.g., Boothby, & Robbins, 2011; Krahe & Bieneck, 2012; Kreutz, Ott & Teichmen, 2008). Such changes in affect and mood state include a reduction of tiredness and tension, and lower levels of aggressive behavior and anger.

Environmental listening contexts are also important. Juslin & Laukka (2004) found that the strongest emotional experiences in listening to music occur when listening alone. In contrast, DeNora (1999) concluded that “a good deal of music’s affective powers arise from its co-presence with other things – people, events, scenes, and so on” (p. 48). This may be reconciled by the idea that when even listening alone, the memories of the contextual experience of the music still holds, this is described in the next section as “episodic memory” by Juslin and Västfjäll (2008). These emotional responses to music, and the contextual influences on the experiences of musically-induced emotions, are important in understanding why the use of music for wellness aims is pervasive and popular.

Affect, mood, and emotions in music. People tend to value music because it expresses and induces emotions. Genuine internal emotional responses to music evidenced by physiological measurements, not simply identification of emotion expressed in the music, were found by Lundqvist, Carlsson, Hilmersson and Juslin (2009). This implies that the listeners truly felt the emotions expressed in the music, not simply were aware of the emotional content in the music. Correlations between music and emotion can be found regardless of subject age or gender (Roberts, Dimsdale, East & Friedman, 1998).

Although specifying the precise meaning in music and how it affects listeners is elusive, DeNora (2000) and Juslin and Västfjäll (2008) hypothesized that musical induction of emotions occurs through six psychological mechanisms:

1. Brain stem reflex - autonomic and quick response;
2. Evaluative conditioning, also known as affective learning or emotional conditioning;
3. Emotional contagion - the listener perceives the emotional expression of the music and then mimics this expression internally;
4. Visual imagery - emotions are associated with the image;
5. Episodic memory – memories are evoked in the listener;
6. Musical expectancy - emotion is induced when a specific feature of the music violates, delays or confirms the listener's expectations about the continuation of the music.

This is supported by DeNora's (1999) conclusion that "a good deal of music's affective powers arise from its co-presence with other things – people, events, scenes and so on" (p. 48). Lesiuk (2005) conceptualized this contextual nature in a more musical description: mood states occur as a result of individual projection of many past experiences and beliefs onto the experience of the tonal-rhythmic events in the music. In Saarikallio and Erkkilä's (2007) study of adolescents, the effect of music depended on mood, attitude, situations/activities that were taking place around them and the company of other people.

People use music in everyday life to achieve different psychological ends, commonly to create or sustain certain mood states or to change their levels of emotional arousal (North, Hargreaves & Hargreaves, 2004; Ruud, 2013; Skånland, 2013.). Basic motives for listening to music are expression, release, and influence of emotions (Juslin & Laukka, 2004). A common

metaphor of the experience of music in Western culture is transport, the sense of being carried from one emotional place to another (DeNora, 2000). This is a common phenomenon found in qualitative interviews studying music's effect in everyday life (DeNora, 1999; van Goethem & Sloboda, 2011). The temporal nature of music may influence the experience of the sense of emotional or psychological movement in response to music.

Music listening is recognized as being a widely used device by people to consciously influence their affect (DeNora, 1999; van Goethem & Sloboda, 2011; North, et al, 2004; Skånland, 2013). This influence of affect is widely termed “affect regulation”, and the ability to regulate emotions, mood and feelings in everyday life is generally considered vital for a healthy psychological self (Knobloch & Zillman, 2002). Van Goethem and Slodoba (2011) determined that music is the second only to talking with friends as the most frequent affect regulation tactic used in everyday life with a high level of reported success. The authors found that the underlying mechanisms of music in affect regulation are the emotion of the music, the type of music, the familiarity of the music, and the content of the music (e.g. lyrics). Additionally, the authors found that music serves as a mechanism in which listeners mentally leave the present world and create positive associations and memories. Skånland (2013) suggested that music listening has the potential to develop emotional intelligence through affect regulation, and could thus represent a means of promoting positive mental health.

Van Goethem (2010) summarized the use of popularity of music for affect regulation in six points:

1. Music is viewed as a quick and easy accessible “fix”.
2. Listening to music does not require any brainpower.

3. Music listening is easy to combine with other activities (and tactics).
4. Music listening allows a temporary break without leaving everything behind.
5. Music listening is healthier than other tactics, such as eating or smoking.
6. Prior experience leads to knowledge of possible outcomes. (p. 298)

Harrison, Cooke, Moyle, Shum, & Murfield (2010) found that persons with dementia who participated in 40 minutes of music listening (consisting of a combination of live and recorded music facilitated by a non-music therapist) demonstrated positive behavioral and mood changes as reported by nursing staff. These changes were reportedly noticeable for the entire day after the music listening experience. In another study of older adults participants reported that positive emotions were among the most frequent felt in response to music, and that individual listening strategies were significantly correlated with well-being variables, including increasing positive affect, decreasing negative affect, environmental mastery and personal growth (Laukka, 2007).

Individuals might deliberately and actively use music in different situations at different levels of engagement. Lundqvist, et al. (2009) eloquently summarized this point: “Emotions give rise to affective *experiences* such as feelings of happiness, sadness, pleasure and displeasure; activate widespread *physiological* adjustment to the evoking condition; and lead to *expressive* behaviors that are often, but not always, goal directed and adaptive” (p. 62). Several studies support the notion that individuals intuitively acquire listening skills and know how to use music in everyday life to enhance, alter, or express their mood or state of mind according to their personal needs in various personal, interpersonal and work contexts (Batt-Rawden & DeNora, 2007; DeNora, 1999; Lesiuk, 2005; Saarikallio & Erkkilä, 2007; Ziv, Chaim, & Stamar, 2011).

Further, Lesiuk (2005) concluded that habitual music listeners might be more proficient at recognizing current mood states and better able to project the necessary mood state and choose appropriate music.

The use of music to recognize mood states and choose music to encourage a different mood is supported in Batt-Rawden and DeNora's Music and Health Promotion Project (2007). Participants identified that receiving and listening to CDs provided by the researcher bi-monthly facilitated a learning process of how to use different types of music, and to identify the parts of the music that reflected self-identity, thus further enhancing their self-knowledge. This led to a sense of empowerment through the process of music listening, reflecting on the music, and creating a musical narrative through interviews about the experiences. Participants identified what worked, learned how to access it through music, and put it into action. The authors proposed that this process, termed "musicking" by Small (1998) could be developed as a health promotion practice to encourage individuals to increase their conscious awareness of how music regulates mood and how to capitalize on this potential. Further, Skånland (2013), in interviews with adults about their use of MP3 players, concluded that music was used for affect regulation both consciously and unconsciously. This allowed the participants to gain "a better understanding of their internal states" (Discussion, para. 1).

In the context of the deliberate use of music to meet personal needs, Saarikallio and Erkkilä (2007) identified two goals for adolescents' emotional regulation: mood control and mood improvement. An interesting finding of this study was that mood improvement occurred over time even when music temporarily strengthened the current negative feeling. This illustrates

that even when listeners choose music that reflects negative feelings they are experiencing, the long-term effect can be positive in nature.

Music Therapy and Wellness Practices

Music therapy is a clinical practice that in part capitalizes on the aforementioned benefits of music listening and participation, and has the added component of development of a therapeutic relationship and thus the support of a trained therapist to help deepen these benefits. Ghetti, Hama and Woolrich (2004) found that music therapy could address various dimensions of wellness (physical, social, intellectual, emotional/mental, and spiritual). In speaking to the adaptability of music therapy experiences, Parker (2009) purported that wellness aims can be applied to any area of music therapy in any setting. She attributed this to the qualities of music as being a) multidimensional, b) adaptable for participation, c) temporal in nature, d) integrative of body, mind and spirit, and e) self-directed.

Similarly, the qualities of music therapy that are relevant to a wellness focus are its ability to a) adapt to where a person is in any given moment; b) focus on ability and not disability; c) help bring signs, symptoms, and thoughts to awareness; d) be a vehicle for learning about and exploring the uncertain; and e) connect persons to passions, creativity and fun (Parker, 2009). This author further suggested that improvements in well-being often occur in tandem with other psychological, physiological and biological effects.

Music therapy and affect regulation. Music listening is termed a receptive experience when employed in music therapy (Bruscia, 1998b). In receptive music therapy experiences, “the client listens to music and responds to the experience silently, verbally, or in another modality... The listening experience may be focused on physical, emotional, intellectual, aesthetic, or spiritual aspects of the music, and the client’s responses are designed according to the purpose of

the experience” (Bruscia, 1998b, pp. 120-121). The aforementioned benefits of everyday music listening to influence affect regulation have been applied to use in the music therapy setting. Hanser (1990) discovered that older adults experiencing mild depression who participated in eight weeks of a music listening protocol reported quick relief from symptoms of anxiety and somatic complaints, and remarked how reassuring it was to know that they had the capacity to control their feelings. This improvement can be associated with a greater sense of well-being, as it relates to self-regulation and autonomy. In a similar study, Hanser & Thompson (1994) found that this same listening protocol had an effect on depression, self-esteem and mood, which was still evident nine months after the treatment period.

Ghetti (2011) integrated the potential of music and music therapy as promoters of positive affect and emotional expression.

The music therapy process may be used to elicit and support a broad range of emotional expression and affective response, to help bring about a balance between positive and negative emotions and promote better adjustment. Music therapy is a form of therapeutic intervention that lends itself well to promoting emotional-approach coping. Due to the aesthetic qualities of music based on arousal and expectations, the possibility of rich associative materials, and the capacity to directly impact the limbic system, music may be used to prompt emotional response and provide a means for emotional expression. (p. 467)

This capability of music therapy to enhance affect and affective experiences, and to ultimately improve individuals’ perceptions of well-being, along with the pervasive use of music and music listening for care of self, supports the notion that music therapy techniques can be well-suited in a wellness paradigm. Along this vein, a new approach to music therapy, resource-oriented music therapy, has been defined (Rolsvjord, 2010). This approach makes a case for a more focused way of working toward wellness aims, with people on any place of the wellness continuum.

Resource-Oriented Music Therapy

The basic tenet of resource-oriented music therapy practice is that music therapy can focus on nurturing strengths, and not only on pathology or problems. Schwabe (2005) purported “music therapy implicitly is a resource-oriented psychotherapy” (p. 49). He viewed the purpose of resource activation to not only build on existing abilities, but also to release, make aware, activate or reactivate blocked abilities. Gold, Rolvsjord, Aaro, Aarre, Tjemsland, and Stige (2005) defined resource-oriented music therapy in mental health as “oriented towards client’s resources, strengths and potentials, rather than primarily on problems and conflicts, and emphasizes collaboration and equal relationships” (p. 2).

Influences of related psychological theories. Rolvsjord (2010) has identified the roots of this approach in several psychological theories, including empowerment, the common factors approach and positive psychology.

The influence of empowerment. Empowerment as a philosophy includes both individual and organization models. For the purposes on this paper, the focus will remain on the individual model, which is termed “psychological empowerment.” Psychological empowerment involves changes in behaviors, cognitions, and emotions. A central theme of empowerment is that an individual has the capacity to not only act on and in the environments, but one has the *right* to do so. Empowerment also comprises a belief about competence, including efforts to exert control, to exert intrapersonal competence, and interactional competence (Fitzsimons & Fuller, 2002).

In music therapy, the act of the therapist helping the client achieve what is important to him/her embodies the concept of empowerment. The client is encouraged to be independent and to take a more active role in the therapy process while therapist takes a less directive role

(Rolsvjord, 2010). Daveson (2001) further suggested that active participation in music brings mutuality through the participatory processes and client ownership.

Another important aspect of empowerment is the recognition of how the client uses music and music therapy to improve his/her quality of life. Often music therapy focuses solely on music that happens during the sessions, not how the client uses music in everyday life. Empowerment theory supports that clients have access to music outside of the therapy session, and that in some cases should be guided in using and accessing music in the community. Music is a resource that should be promoted during everyday life (North, et al., 2004).

The influence of the common factors approach. Common factors research seeks to identify the factors that are common in different psychotherapies that provide benefit to clients regardless of the technique used. This approach resulted from interpretations of meta-analyses of psychotherapy outcome research. There are factors that are common to all forms of psychotherapeutic models. These include

- client and environment, including severity of the disturbance, economy, social network, cultural participation, and accessibility of health services
- client expectancy and hopes related to treatment
- therapist allegiance
- bonding between therapist and client
- the structure of therapy, including technique, rituals, interactions between participants, and therapist and client roles (Rolsvjord, 2010).

This suggests that music therapy, various techniques utilized, and experiences within music therapy, can be considered effective for clients when incorporating these factors. In line with the conceptualization of resource-oriented work, Rolsvjord (2010) stressed that music

therapists remember the importance of the client's craft in using music both in music therapy and in everyday life. She emphasizes that in addition to the ability to engage in and use music in the therapy setting, individuals are competent and capable of utilizing music on a personal level to meet their needs.

The influence of positive psychology. The positive psychology movement started as a backlash against mainstream psychology as a disease model of human functioning. The aim of positive psychology focuses on the development of human strengths and resources in relation to well-being, as well as on illness prevention and therapy (Seligman & Csikszentmihalyi, 2000). This approach is rooted in the notion of prevention, which concerns the building of competence and not the remediation of weakness. Prevention researchers have found that there are human strengths that act as buffers against mental illness: courage, future mindedness, optimism, interpersonal skill, faith, work ethic, hope, honesty perseverance, and the capacity for flow and insight (Seligman & Csikszentmihalyi, 2000). Thus, positive psychology supports the identification, activation, and bolstering of these strengths in order to maintain well-being and ameliorate the symptoms of psychological distress.

Positive psychology seeks to develop positive emotions and self-concept. The approach is rooted in the belief that the experience of positive emotions leads to a state of greater well-being. In order to achieve this more positive state of well-being, positive psychology advances the idea that it is necessary to *experience* positive emotions, not just remove all maladies (Seligman, Parks & Steen, 2004). These authors have also identified three components of happiness: a) pleasure (or positive emotion); b) engagement; and c) meaning. In all three of these components, the deployment of inner strength toward something larger than the self is purportedly what leads to greatest life satisfaction.

Thus, positive psychology practices can be applied to music therapy practices. When considering Seligman, et al.'s (2004) three components of happiness, music can engender all three (Croom, 2012). In Laukka's (2007) study of older adults, participants reported that *positive emotions* were among the most frequent ones felt in response to music, and that many individuals connect experiences of pleasure, joy, contentment and interest with music. Music, in its immediacy, offers opportunities for *engagement*, whether in the production of music or in listening (Bonny, 2002). For many, music has great *personal meaning* (Bonny, 2002; Bruscia, 1998a; Merritt, 1996). For example, Magee and Davidson (2004) found that songs contain extramusical emotional associations and personal meaning. This leads to emotional states and stimulates a wide range of moods and feelings. Songs from an individual's life hold temporal and associative properties that enhance their emotional content and meaning (Magee, 2007) and the emotional context of life experience provides meaning in music (Hays & Minichiello, 2005). These characteristics of music and music experience can be engaged in both music therapy and in everyday life.

Characteristics of resource-oriented music therapy. Resource-oriented music therapy is defined as an approach, because the source of change for the client is in the process of collaboration and the space provided to activate and mobilize resources for change, not in the specific music therapy technique used (Rolvjord, Gold & Stige, 2005). Rolvsjord (2010) identified four key characteristics of resource-oriented music therapy:

1. Nurturance of strengths, resources, and potentials;
2. Collaboration with the client, rather than intervention;
3. A view of the individual within his/her context; and

4. Music is a resource.

The discussion of each of these characteristics is described at length in Rolvsjord's (2010) text.

Nurturing of strengths, resources, and potentials. According to Rolvsjord (2010), nurturance of the client's strengths, resources and potentials is the focus of therapy at every stage in the resource-oriented approach. This goes more deeply than making clients feel better; it is psychologically beneficial to connect clients with their strengths. Seligman (2002) advocated for the development of "signature strengths," defined as those that are most characteristically descriptive of a person. He stressed that connecting with signature strengths engenders energy and enjoyment, thereby increasing positive emotions. As cited earlier in this paper, experiencing positive emotions leads to improved quality of life and a greater sense of well-being.

Resilience, serving the as a buffer to adversity, is correlated with self-esteem, hope, and life satisfaction (Mak et al., 2011). Nurturing inner resources such as resilience through participation in music can also have a buffering effect on the demoralization of persons suffering from illness or dysfunction (Aldridge & Aldridge, 1998). This may have an empowering effect on individuals, as they realize that they can still be creative and productive.

Involves collaboration rather than intervention. In relation to the aforementioned common factors research and empowerment theory, recognizing the client's role, responsibility, and competence in the therapy setting is paramount. Emphasis on a client's personal strengths should also take into account his or her strengths and competence in working within the therapeutic process (Rolvsjord, 2010). This implies a less hierarchical relationship between client and therapist.

Rolvsjord (2010) identified three interacting and interdependent aspects that characterize this collaboration: equality, mutuality and participation. *Equality* refers to the balance in relationship between the therapist and client, while maintaining an acknowledgement of the differing roles. *Mutuality* in a relationship is comprised of the qualities of engagement, shared responsibility, equality, and affective responsiveness. Finally, *participation* reflects that both persons are active participants in the process of music therapy. This also implies that both the client and the therapist are involved in the decision-making processes of therapy.

Views the individual within his/her context. An individual's functioning in life is often very dependent upon the environment in which he or she exists. Rolvsjord (2010) made the point that "similar to illness, the individual's responsibility for well-being has to be seen in connection with structural aspects" (p. 80). Throughout the literature on well-being and positive psychology, there is emphasis placed on social relationships, community and connectedness and how these phenomena both interconnect and impact a person's psychological functioning (Hermon & Hazler, 1999; Ryff, 1989; Ryff & Singer, 1998; Seligman, 2003). These aspects of a person's life must be recognized, valued, and integrated in the therapeutic arena.

Music is a resource. Music as a health resource "comprises the individual's musical competencies as well as being something that can be accessed through some kind of engagement with music" (Rolvsjord, 2010, pg. 83). In a resource-oriented approach, music therapy should be concerned with opportunities to use music in everyday life. A task of the music therapist is to help make music accessible and attainable for clients. Rolvsjord (2004) called this "regaining the

rights to music” (p. 106). This placed an emphasis on music therapists’ helping people to have access to the appropriation of music in their everyday life.

Summary

Rolvjord (2010) is clear to point out the competence of the client in the music therapy setting, and that clients come to music therapy with a history of engagement with music in their lives, including listening to music. In general, music listening is a popular everyday activity for much of the population. When considering the potential of music listening to positively influence well-being and affect regulation, it seems that applying these potentials within the resource-oriented approach would have benefit for both clinical and non-clinical populations. A logical first step in the process of developing resource-oriented music therapy techniques, in this case focused music listening, is to examine their impact on well adults.

Research Questions

The quantitative research questions were:

- Does learning and engaging in the Intentional Music Listening protocol affect well-being, as specifically measured through levels of positive and negative affect?
- Does individual music listening using the Intentional Music Listening protocol influence changes in perceived levels of well-being?

The qualitative research question is:

- How do participants experience the Intentional Music Listening Protocol, both in terms of perceived well-being and in the procedures of the protocol?

CHAPTER 3

METHOD

Participants

Well adults aged 18 or older were invited to participate in the study. There were no restrictions on gender, race or socio-economic status, but participants were encouraged to have internet access to complete the quantitative outcome measures. There were two participants who did not utilize email or the internet. In these cases, the study measures were mailed in hard copy and were entered into the online survey tool by a colleague of the researcher. Participants were required to have transportation to the relevant study sites for two sessions, and the participants in the qualitative phase of the study met with the researcher for a follow-up interview at a site of their choice.

Exclusion criteria, self-reported by participants were:

- Persons suffering from a known psychotic disorder;
- Persons who are experiencing thoughts of suicide or who have attempted suicide within the past 6 months;
- Persons who are medically fragile due to illness or currently under medical care for a life threatening illness;
- Former or current clients or students of the therapist/researcher;
- Persons currently engaged in any form of psychological counseling;
- Persons with hearing loss; and
- Persons who are non-English speaking or writing.

Participants who had past involvement in therapy, including music therapy, were not excluded.

Recruitment. Participants were recruited at a variety of sites through self-selection and through snowball sampling. Notices about the study were sent and placed in locations throughout the Hartford, CT area and in many online notice boards that included:

- A variety of clinical practitioners known by the researcher;
- University music and therapeutic degree programs;
- Community wellness centers, including yoga studios and massage therapy centers;
- Community centers, such as libraries and town halls;
- Medical wellness centers affiliated with hospitals;
- Physicians' offices; and
- Fitness centers. (See Appendices A and B)

Groups were held at several locations, including a yoga studio, a retreat center, a church, and in one case at a participant's home. The group held at the participant's home consisted of colleagues and friends of this participant, and at the time, no other site options were available. The variability in sites was necessary due to the geographical range of recruitment and for greater flexibility of scheduling.

Design

The study utilized a consecutive mixed methods design, consisting of a quantitative phase followed by a qualitative phase. Though there has been much research on everyday music listening and its effects on well-being, there is a gap in the literature regarding music therapist-led coaching individuals to listen to music in a specific, focused manner and its impact on affect as a component of well-being. The quantitative phase of the study was designed to provide data

about the influence of Intentional Music Listening on the affect of participants as one component of their overall well-being. This was followed by qualitative phase to explore the experiences of the participants. Semi-structured qualitative interviews were conducted to illuminate the participants' experiences being coached to listen to music in this manner, to further explore perceptions of well-being and affective responses to the music listening experiences, and to provide additional data to determine the suitability of the protocol as a music therapy technique with well adults.

This design was based on Creswell and Plano Clark's (2011) "explanatory sequential design" in which quantitative data collection and analysis are followed by qualitative data collection and analysis. In this design, the qualitative data collection and analysis are used to generalize and develop a deeper understanding of quantitative data. Because of the length of time required to recruit participants and thus gather the quantitative data in this study, the qualitative interviews were held throughout the quantitative phase rather than at the conclusion of quantitative data collection and analysis. This was done so that qualitative interviews would occur within a reasonable time frame of the participants' completion of the protocol. Thus, the design can be classified as a "follow-up explanations variant" (p. 85) of the explanatory sequential design, in which the qualitative phase is used to help explain the quantitative results (Creswell & Plano Clark, 2011). It should be noted that the change in study procedures necessitated by the challenges in recruitment caused the design to have features of the convergent parallel design presented by Bradt, Burns and Creswell (2013), in that both the quantitative and qualitative data were obtained concurrently. However, because the qualitative interviews were guided by the quantitative variables, and because qualitative sampling was

informed by the quantitative responses of the participants, the overall design is more in line with the explanatory sequential design.

The quantitative phase employed a modified crossover design. As participants were recruited, they were randomized into the experimental groups or the waitlist control groups. Participants from both groups were often in the same treatment groups; the waitlist control group simply completed a study measure two weeks before the treatment group meeting. This is explained more fully in the Procedure section.

The qualitative phase utilized selective sampling, in which four participants were chosen based on their responsiveness to the protocol, as determined by their verbal responses during the groups and their amenability for participation. One person who did not verbalize positive effect was intentionally chosen. See Table 1 for an outline of study design.

Procedure

Quantitative phase. Data collection occurred over the course of a year, with a total of eight different groups completing the protocol. The quantitative phase was designed as a randomized control trial, but exceptions were made. Participants were randomized into one of two groups, the experimental group or the wait-list control group. Randomization was performed using a computerized random number generator from the site www.random.org. A random series of 45 1's and 2's was generated, with the 1's representing the experimental group and the 2's for the waitlist control. As participants were recruited, they were assigned to the group according to the consecutive number in the series. Thus, group affiliation was not blinded for either the researcher or the participants, as it was necessary to know group affiliation in order to administer the proper number of study measures.

Table 1
Outline of Study Procedures

Stubhead		Procedures	Products
Quantitative Phase	Data Collection	<ul style="list-style-type: none"> • $N = 40$ (20 experimental and 20 waitlist control) • PANAS • Intentional Music Listening Groups • At-home listening exercises • Diary cards 	<ul style="list-style-type: none"> • Data from PANAS • Data from diary cards
	Data Analysis	<ul style="list-style-type: none"> • PANAS – paired t-tests • Diary cards <ul style="list-style-type: none"> ◦ Univariate analyses ◦ Bivariate analyses ◦ Multivariate analyses • Regression analysis on PANAS and diary cards • Descriptive analysis of diary cards 	Statistical results and descriptive tables
	Interpretation	Summarize data	<ul style="list-style-type: none"> • Inferences about the effects of the Intentional Music Listening protocol on positive and negative affect • Inferences about the effects of the Intentional Music Listening protocol on well-being
Qualitative Phase	Data Collection	<ul style="list-style-type: none"> • Selective sampling ($N = 4$) • One-on-one semi-structured interviews 	<ul style="list-style-type: none"> • Field notes • Transcripts
	Data Analysis	<ul style="list-style-type: none"> • Coding • Thematic development 	<ul style="list-style-type: none"> • Coded text • Themes • Description of themes • Description of effects on well-being
	Interpretation	Summarize data	<ul style="list-style-type: none"> • Reflections on protocol administration
Integration	Interpretation	Connect quantitative data with qualitative themes	Narratives that highlight support and differences between quantitative and qualitative data sets, and an expansion of quantitative data with qualitative themes

The difference between the two groups was the number of times they completed the Positive and Negative Affect Schedule (PANAS) (Watson, Clark & Tellegen, 1988). The experimental group completed the PANAS before the start of the first group and at the conclusion of their study participation. The waitlist control group also completed the PANAS

two weeks before the start of the groups. In this way, both experimental participants and waitlist control participants could attend the same group meetings. Once the group assignments were made, the researcher emailed the participants to communicate appropriate instructions regarding participation. All participants were given a study identification number. This number was used on all study surveys in order to maintain anonymity of data. Some exceptions to this procedure were made in order to retain participants and to balance the groups. Several individuals were recruited into a group less than two weeks before the group meeting. These individuals were automatically placed into the experimental group due to the fact that there was insufficient time before the group meetings to complete the initial study measure required of the waitlist control group. Also, as the data gathering began to draw to a close, the final group of participants was placed in the waitlist control group to balance the number of participants between the two groups. These exceptions were considered acceptable by the researcher since they did not impact the actual music listening protocol.

Qualitative phase. Participants who completed the Intentional Music Listening protocol were eligible to participate in semi-structured interviews. Selective sampling was employed, consisting of four voluntary participants. Four interviews were conducted in consideration of Cresswell and Plano Clark's (2011) recommendations on sampling for qualitative data. The authors explain that because the purpose of the qualitative interviewing was to provide in-depth understanding of a few people, and because "the larger the number of people, the less detail that typically can emerge from any one individual" (p. 174), a relatively small number of interviews was appropriate. The researcher invited three participants who expressed positive responses to the protocol to participate. One participant who verbalized ambivalence to the protocol was invited to participate as well. All participants who were invited agreed to be interviewed.

Intentional music listening groups. Once a week for two weeks, participants attended groups with the researcher. A total of eight different groups completed the intentional listening groups. Groups ranged in size from two to eleven people. After a failed attempt to compose a group and then schedule the times, it was found that the most effective method of composing a group was to first schedule a group time and site, and then recruit participants into that group. Participants who responded to more general recruitment methods (with no specific group time) were incorporated into an upcoming group that fit their schedules. One person was not able to attend the group that he was originally scheduled, and instead was coached through the protocol individually. In two other instances, participants had unexpected conflicts with the second group meeting and were also coached individually for the second group meeting experiences.

After obtaining consent, participants were instructed to choose preferred music that they felt was supportive and offered positive associations for them. The use of participant preferred music was chosen in light of the documentation about the greater response most people have with their preferred music (e.g., Batt-Rawden, 2010; DeNora, 2000; van Goethem & Sloboda, 2011; Hanser, 2006; Schafer & Sedlmeier, 2011), and to more fully align with the principles of resource-oriented music therapy (Rolvsjord, 2010). There were no restrictions regarding genre or tone of the music. Even music considered sad could be appropriate, as there is research that supports the idea that people like sad music and may experience positive emotions in response to listening to sad music (Gabrielsson, 2010; Saarikallio, Nieminen, & Brattico, 2012). Approximately 20 - 30 minutes of music was requested from each participant.

For most participants, the researcher then loaded each participant's songs to personal MP3 devices that were loaned to the participants for the duration of the study. The preferred use of consistent researcher-provided MP3 devices was intended to help reduce technical issues that

may arise with the use of technology. Participants used these players for both the research groups and their at-home music listening assignments and returned the MP3 devices to the researcher at the conclusion of the research group. Some participants who were recruited without sufficient time for the researcher to compile the playlists utilized their own personal music players, and were thus instructed to compile a playlist for use during the study before attending the first group. This decision was made to keep the spirit of resource-oriented music therapy's tenet that individuals be encouraged to utilize music as a resource, and for music therapists to connect individuals with the music in their everyday contexts (Rolvjord, 2010).

The purpose of the groups was to coach the participants in four music listening experiences (two different experiences each session). All participants were coached in and completed at-home listening experiences for all four music listening experiences. For all but one, these listening experiences were designed in a similar method to what Bruscia (1998b) identifies as meditative listening. This is the use of "music to assist in meditation or in the contemplation of a particular idea" (p. 122). The fourth experience engaged participants' kinesthetic awareness by utilizing movement. The four different listening experiences were chosen to represent a range of the ways that an individual may choose to listen to music to stimulate a positive response, and represent a wider range of possible learning modalities that participants may prefer. The use of a variety of experiences was also to help the participants find the experience that was most suitable for their needs and their preferences. This may help them hone in on a "signature strength" (Seligman, 2002) as they may develop new ways to listen to music and identify an individual capability. In addition, Shafer and Sedlmeier (2011) noted that induced emotional arousal can be accompanied by bodily activity (the movement experience) or self-focused attention (the

remaining three experiences).

At the first group meeting, the researcher reviewed the consent form (see Appendix C) and explained the requirements for participation in the study. All participants received a handout with instructions for all four listening techniques (see Appendix D). During the research groups, the researcher facilitated guided individual listening of the participants' music following one of each of the four music listening exercises. At the conclusion of the listenings, a brief discussion of the protocol occurred and questions were answered. For a more complete description of the group procedures, see Appendix E.

Week 1. Listening A consisted of listening to music and following varying musical elements that were most salient to the participant. Such musical elements included melody, particular instruments/sections, rhythm, harmony, and dynamics.

Listening B consisted of the participants focusing on a self-selected positive image while listening to the musical selection(s). Initially, the participants were guided to choose this image before the music begins, and were encouraged to allow the music to guide the inner exploration of this image. As the groups progressed, it became clear that it was necessary to modify the directions to help ensure successful experiences for the participants. Participants were instructed more clearly to choose music that would support the pre-selected positive image. Also, if the chosen music elicited other images, they were encouraged to follow them so long as the experience remained positive. They were encouraged to change the music if necessary to ensure a positive experience.

Week 2. Listening C involved body listening. In this listening, participants were instructed to focus on any sensations they felt in their bodies while listening to the music.

Listening D focused on movement to music. In order to facilitate this during the group,

the researcher played music over speakers and guided the participants through a series of easy stretches (see Appendix F for the stretching sequence). For their at-home listenings, participants were encouraged to either follow the stretches guided by the researcher (as given to them on a handout), or to move in any way that wished to the music.

Role of the therapist. It seems important to clarify the intended role of the music therapist in facilitating this protocol. The use of the term “facilitating” is intentional; in the resource-oriented approach to music therapy, there is an emphasis on collaboration rather than intervention (Rolvsjord, 2010). Additionally, a tenet of the resource-oriented approach is to nurture strengths, resources and potentials. Thus, a major role for the music therapist in the Intentional Music Listening protocol is encourage and guide participants to more fully engage with their chosen music and to learning the various listening techniques. In the research setting, there is a greater need to maintain consistency in adherence to the protocol. In non-research applications, the therapist may have more latitude in guiding the participants/clients in their engagement in the experiences. An important quality of the resource-oriented music therapist is flexibility (Rolvsjord, 2010). This quality was exercised as much as possible while bearing in mind the need for consistency in the research setting.

At-home listening experiences. The participants were instructed to practice the listening techniques learned in the groups at least once each, for a total of four (two each week). The motivation for the employment of at-home practice has several purposes. First of all, it has been documented that music pervades everyday life, and music listening often occurs in situations where listening to music is not the main activity (DeNora, 2001; van Goethem & Sloboda, 2011; Knobloch & Zillman, 2002; Sloboda, 2010). Rather, the focus of attention is on other activities. This kind of mundane musical practice is often not oriented to specific and consciously adopted

goals. Affective musical goals are subsumed by other tasks and the meaning in the music may be lost (Batt-Rawden & DeNora, 2007). The premise behind helping individuals to connect more fully with their preferred music is to encourage them to raise their music engagement from accompaniment of an activity to an activity all its own.

Participants received written instructions (see Appendix D). Participants were instructed to set the environment conducive to this experience by finding a quiet, uninterrupted space, getting into a comfortable position, adjusting the lighting, and setting the music to a comfortable volume (Grocke & Wigram, 2007). Aside from the desire to create a space to assist with focus, another motivation for setting the space was to encourage the participants to make listening a special part of their days, thereby transforming this listening experience from the everyday to something special (Sloboda, 2010). Listeners could be done via headphones if preferred, eyes open or closed, and any time of the day that is convenient for the participants. The participants were also instructed that if the music on their players did not suit their moods, they were welcome to choose other preferred music for the listening experiences. This decision is supported by North and Hargreaves' (1996) assertion that music preferences may vary depending on the listening situation, and that participants' moods at any given time could impact their music choices (Sloboda, 2010). Participants may have found that listening alone in a quiet space could elicit different music choices than when they compiled their original music lists or even when they were listening to music through headphones in the group setting (Sloboda, 2010).

Data gathering. All participants in both phases of the study completed both the PANAS and intentional music listening diary cards. The PANAS is a tool used for tracking changes in positive and negative emotions (see Appendix G). It consists of 20 items, 10 each for measuring positive and negative affect (Magyar-Moe, 2009). Each item is rated on a 5-point scale ranging

from 1 = *very slightly or not at all* to 5 = *extremely* to indicate the extent to which the respondent has felt this way in the indicated time frame. The measure has been proven to be sensitive to changes in affect when respondents are directed to complete the form based on their affect over the course of the past week (Crawford & Henry, 2004; Ekkekakis, 2012). The Cronbach's alpha is .89 for positive affect and 0.85 for negative affect.

In the carrying out the study, an error was made in the use of this measure in that only the first ten items were administered. Appendix H contains the survey as administered to participants. It is unclear if this was a researcher error or a technology error, as the survey was administered using an online survey tool. Fortunately, of the ten items that were administered, five each measured positive and negative affect. There is a short-form PANAS (I-PANAS-SF) (Thompson, 2007) that consists of ten items also balanced with five each for positive affect and negative affect (Appendix I). This test was developed because studies showed that some word clusters showed redundancy as they were too close to each other in meaning (Thompson, 2007). Unfortunately, the items chosen for the I-PANAS-SF differ slightly from the ones administered in this study. The I-PANAS-SF internal reliability is .82, dropped from .85 of the original PANAS. The I-PANAS-SF positive affect and negative affect subscales had Cronbach's alphas of .78 and .76 respectively, indicating adequate reliability. This suggests that though the 10 items administered in this study are different from the ten in the I-PANAS-SF, the internal reliability is likely not completely null. In fact, after testing the reliability of the items that were administered for this research, the data had a Cronbach's alpha test of .60. This is less than the published scales, and at questionable to acceptable level of internal consistency for low stakes research according to George and Mallery (2003).

The researcher considered adding further correlational statistical data using participants

demographic information (Appendix J) collected post-participation. Of the 40 participants, 35 responded to the final request for data. Of those, only 21 recalled their study identification information. Based on the incomplete data, a final decision was made to not to include demographics in the statistical analyses.

The diary cards were designed by the researcher to gather data regarding the music the participants chose, the time of the day in which they completed the listening exercises, and their perceived well-being before and after the listening exercises (see Appendix K). Perceived well-being was measured using 5-point scale ranging from 1 = *very low* to 5 = *very high*.

Both of these measures were administered electronically through the use of an anonymous online survey site, www.surveymonkey.com. Permission to utilize the PANAS and to adapt it for electronic administration was granted by the American Psychological Association (Appendix L). Participants received weekly email reminders to complete their listening assignments and all survey measures.

Quantitative data gathering. As previously discussed, all quantitative data were gathered electronically through the use of an online survey tool. All study participants completed the PANAS no more than two days prior to participation in the treatment groups, and within two days of the completion of the at-home listening experience. The waitlist control group completed the PANAS an additional time, two weeks before the group began. Diary cards were completed immediately after each at-home listening experience. Participants were provided with a paper copy of the diary card to provide an option if they were unable to immediately enter the information electronically.

Qualitative data gathering. Participants in the qualitative phase of the study participated in semi-structured interviews within four weeks after the completion of the week of at-home

music listening experiences. The interviews were structured as evaluation research, focusing mainly on events and processes in order to explore the experiences of the participants of the intentional music listening and how these experiences impacted their perceptions of their own well-being (Rubin & Rubin, 2005). The interviews followed the approach of Rubin and Rubin (2005), responsive interviewing, which relied heavily on the interpretive constructionist philosophy. This approach recognizes that the interviewer and interviewee are both human beings and thus form a relationship, and the goal is to generate a depth of understanding, rather than breadth.

See Appendix M for an outline of questions that provided the structure for the interviews. The interviews focused on changes in mood experienced as a result of the listening experiences, overall perceptions of well-being after completion of the protocol, and any notable changes in music listening habits after participation. This line of questioning was developed in order to more fully elucidate the data gathered in the quantitative phase of the research. Another focus of the interviews was on the components of the protocol. This was pursued in order to determine the suitability of the protocol, and to understand more fully how the participants experienced the protocol, particularly what aspects of the protocol impacted perceived well-being. Because the interviews were held after participants completed participation in the study groups, but before all groups were completed, feedback received about the group and group procedures was used to make tweaks to the protocol administration for future groups. This will be explained more fully in the Results section.

Data analysis.

Quantitative measures. There were two sources of quantitative data, the PANAS and the diary cards. Each was analyzed separately.

PANAS. First descriptive analyses of the responses were made. Then simple analyses of the responses were carried out, including paired t-tests between the means at various survey administration periods.

Diary Cards. Initially univariate analyses were carried out on the variables of the diary cards (listening duration, time of day, and listening technique). Then bivariate analyses were carried out to test for relationships between the variables and changes in the self-reported well-being measures. This was followed by multivariate analyses between reported well-being change and multiple variables. At this point, a regression analysis was completed with the PANAS data and salient well-being data from the diary cards. Finally, a descriptive analysis of the open-ended questions submitted on the diary cards was completed.

Qualitative interviews. The analysis of the qualitative data followed the procedure outlined by Rubin and Rubin (2005). Interviews were recorded and then transcribed. During the transcription process, memos were recorded in order to capture any relevant thoughts of the researcher that were triggered by the interviews. Following transcription, summaries of each interview were compiled.

Analysis of the interviews occurred in several stages. The first stage was recognition, in which the researcher identified concepts and themes in the data. These concepts and themes were coded with a brief, distinct label. After each interview was transcribed and coded, all data units from all participants were sorted and summarized. Then data units were ranked within each coded category. Finally, data were integrated into a narrative seeking to describe the overall experience of the participants. Because the qualitative interviews were semi-structured with questions pertaining to the quantitative data being gathered, the qualitative themes and concepts were shaped by these questions and reflect the quantitative data as well.

Data integration. Data between the two phases of the study were integrated using the merging technique in which the two datasets were collected concurrently (Creswell & Plano Clark, 2011). The variables measured in the quantitative phase guided the formation of the qualitative interview questions, but the results were analyzed independently. The integration of the data from each phase is found in the discussion section, where the data from the qualitative interviews is used to expand the finding of the quantitative data.

CHAPTER 4

RESULTS

Quantitative Results

There were several challenges when running statistical analyses of the PANAS and diary card data. The first deals with study identification numbers (hereafter referred to as “study IDs”) of the participants. All participants were assigned a study ID by the researcher depending on their group affiliation (experimental or waitlist control). This study ID was to be used for all online survey tools to protect the identity of the participants. The researcher did not keep a list of these study IDs in order to help further protect the participants’ identities. In some cases, it appeared that incorrect study IDs were utilized. Corrections were able to be made based on the computer IP address of submission, and on date of completion according to group participation.

Another challenge was the compliance of the participants in completing each measure. Each participant was to complete one diary card per listening technique. In one case, the same person completed two diary cards for the same listening technique, and didn’t complete a diary card for another. There were participants who did not complete any diary cards, but did give PANAS data. There were participants who did not complete the PANAS at every data point, particularly in the waitlist control group who were to complete the measure three times.

Sample. The quantitative study consisted of 40 participants and of those, four completed the qualitative interviews. There were 28 women and 12 men. Further demographic data were gathered post-hoc and as such 36 of participants completed the survey (see Appendix J). The following descriptions of the participants are based on these responses.

Specific ages were not asked, but rather in age ranges. Figure 1 displays the age range distribution. The race of the respondents was predominantly white, with one respondent identifying as “Black or African/American” and two as “From multiple races”. All of the respondents have pursued higher education, with 80.56% of the groups having either a bachelor’s or graduate degree. The majority of the respondents were employed, with 62.86% full-time (40 hours) and 17.14% part-time. Of those not employed, 17.14% were retired and 2.86% were disabled and unable to work. The majority (62.86%) of the respondents fell into two occupational categories: healthcare practitioner/support and education/training/library occupations. The respondents’ income levels ranged from \$35,000 per household to \$150,000 or more per household, with 66.66% of the respondents reporting incomes above \$75,000 per household. This indicates that a majority of the respondents rank well above the 2012 Connecticut state median income levels (Connecticut Department of Social Services, 2012).

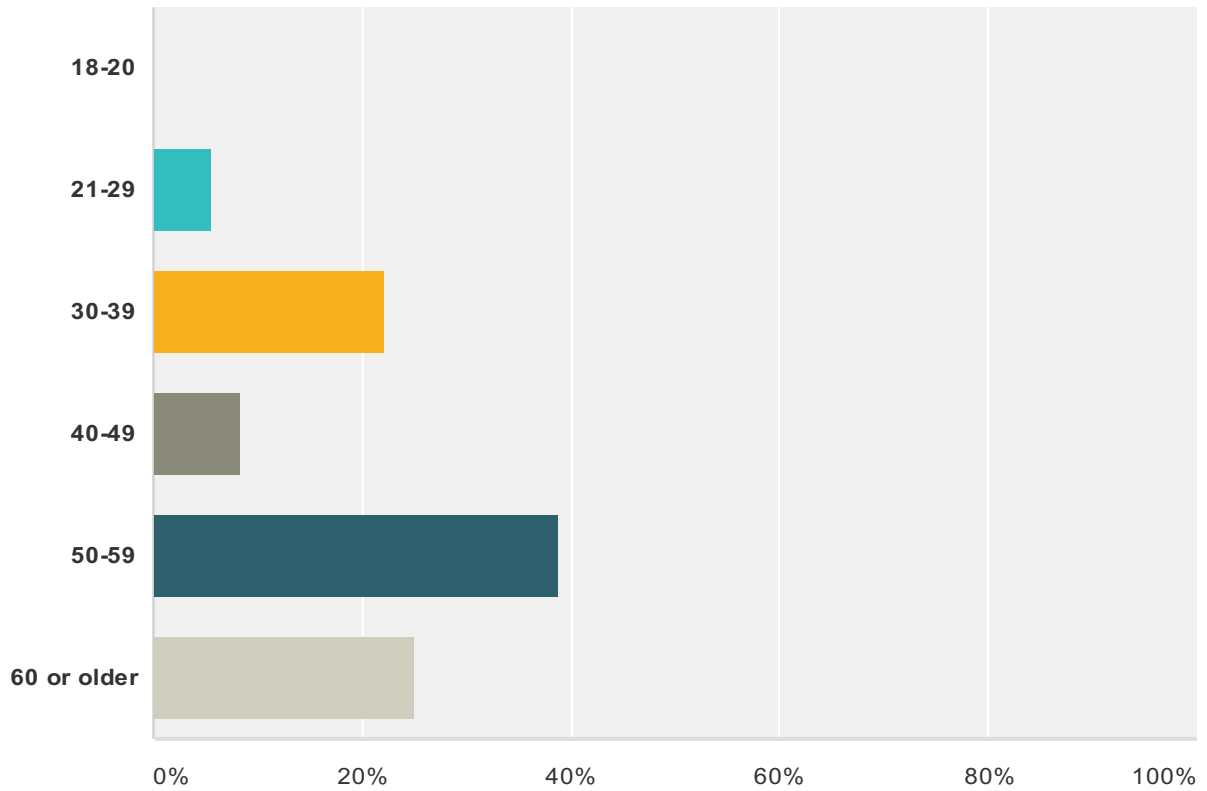


Figure 1. Age range distribution of demographic survey respondents.

PANAS data. PANAS measures were administered depending on group assignment. The experimental group (E) completed the measure within two days of starting the group and within a week after completing the final diary card. The waitlist control group (WC) completed the measure an additional time, two weeks before the start of the group meetings. In the original conception of this design, participants would only have participated with members of like study groups following the design presented in Table 2.

Table 2

Optimal Study Design

Stubhead	Day 1*	2 Weeks	Day 15*	2 Weeks	Day 30*
WC Group	PANAS WC1		PANAS WC2	Group attendance	PANAS WC3
E Group	PANAS E1	Group attendance	PANAS E2		

*Day number is approximate

This design would have allowed for a better statistical comparison between WC2 and E2 scores, as any differences would be more likely attributed to the effects of the groups and the listening experiences.

In the reality of recruitment and scheduling groups, this became quite challenging, and a decision was made instead to include both group affiliates in the same group meetings. Thus, the design was as illustrated in Table 3.

Table 3

Actual Study Design

Stubhead	Day 1*	2 Weeks	Day 15*	2 Weeks	Day 30*
WC Group	PANAS WC1		PANAS WC2	Group attendance	PANAS WC3
E Group			PANAS E1	Group attendance	PANAS E2

*Day number is approximate

Statistically with this design, only comparisons could be made between WC2 vs. WC1 and E2 vs. E1 and any differences could be attributed to other factors, such as changes in the economy or the weather that may have impacted participants' overall affect and senses of well-being. The design employed by this research cannot rule out these types of alternate explanations for changes in PANAS scores. However, the WC1 scores might help to assess whether PANAS scores change "without known cause" between WC1 and WC2.

This design has very low internal validity, partly because of the design and other factors that came into play during the course of the study. One factor is that there is a great deal of missing data for the WC2 data point. All 19 members of the WC group completed WC1 and WC3, but only 14 completed WC2. One possible explanation could be confusion on the part of the WC participants. These two surveys were to be completed prior to the first meeting of the group. Nearly all communication up to that point was done via email, and all surveys were sent by email. It is possible that some participants thought they were exempt from the second sending of the survey, not understanding the design. Another threat to internal validity of this study is that, again due to the realities of recruitment, groups were held over the course of a year. Much can change externally that may impact individual's sense of well-being and affect. Therefore, any changes in PANAS scores may have any number of explanations that cannot with any certainty be attributed to their engagement in intentional music listening.

With all of these considerations, the PANAS data were analyzed as fully as possible in order to investigate if there were any trends that could be discovered. A decision was made to combine the WC2 and E1, and the WC3 and E2 responses. The new classifications for this combined data is T1 (formerly WC1), T2 and T3 respectively. Thus, T1 represents the first administration or the PANAS only completed by the waitlist control participants. T2 includes the first administration of the PANAS to the experimental group and the second administration for the waitlist control group. T3 represent the second administration of the PANAS for the experimental group and the third for the waitlist control participants. Table 4 provides an illustration of these data collection points.

Table 4
PANAS Data Groups

Stubhead	T1	T2	T3
Study Group	WC - first administration	WC - second administration	WC - third administration
		E - first administration	E - second administration
Time of completion	Two weeks before group began	Within two days of attending the first group	Within two days after finishing the final at-home listening experience

The PANAS scale is comprised of two components: PA represents indicators of positive affect, and NA represents indicators of negative affect. Thus, changes in affect are measured by considering each category separately. The modified measure utilized in this research consisted of five items for each the PA and NA categories. Table 5 summarizes the properties of the PANAS responses from the three measurement periods.

Table 5
Properties Of The PANAS Components from Three Measurement Periods

Stubhead	T1 PA	T1 NA	T2 PA	T2 NA	T3 PA	T3 NA
<i>M</i>	15.89	9.89	16.72	9.22	17.89	7.94
<i>Mdn</i>	15.00	9.00	17.00	9.00	18.50	7.00
<i>SD</i>	3.755	3.843	3.708	3.072	3.647	2.484
<i>N*</i> (WC/E)	19 (19/0)	19 (19/0)	36 (14/22)	36 (14/22)	36 (19/17)	36 (19/17)
Cronbach's Alpha	.770	.799	.795	.648	.834	.622
Correlation between PA & NA	-.155		-.511		-.288	

It is necessary to compare the changes in PA and NA between each administration of the measure. The change scores are calculated for T1-T2 and T2-T3 and T2(or T1)-T3 in a special way to produce positive scores, so that if participation increases the PA or decreases the NA a positive number will result. This is because a decrease in the NA, which is inherently a positive change, would otherwise show a negative value. Thus for measuring changes in PA T2-T1 is used, but for measuring changes in NA T1-T2 is used because high scores mean negative feelings, and the hope is that T2 scores will be lower than the T1 scores. This is also true for the T2-T3 NA changes.

The following graphs illustrate the results of these analyses. Figure 2 illustrates T2-T1 PA scales. Bars in the negative numbers demonstrate a decrease in positive affect responses, and positive numbers demonstrate an increase in positive affect responses. There is a positive mean of change, but it is quite low at .29.

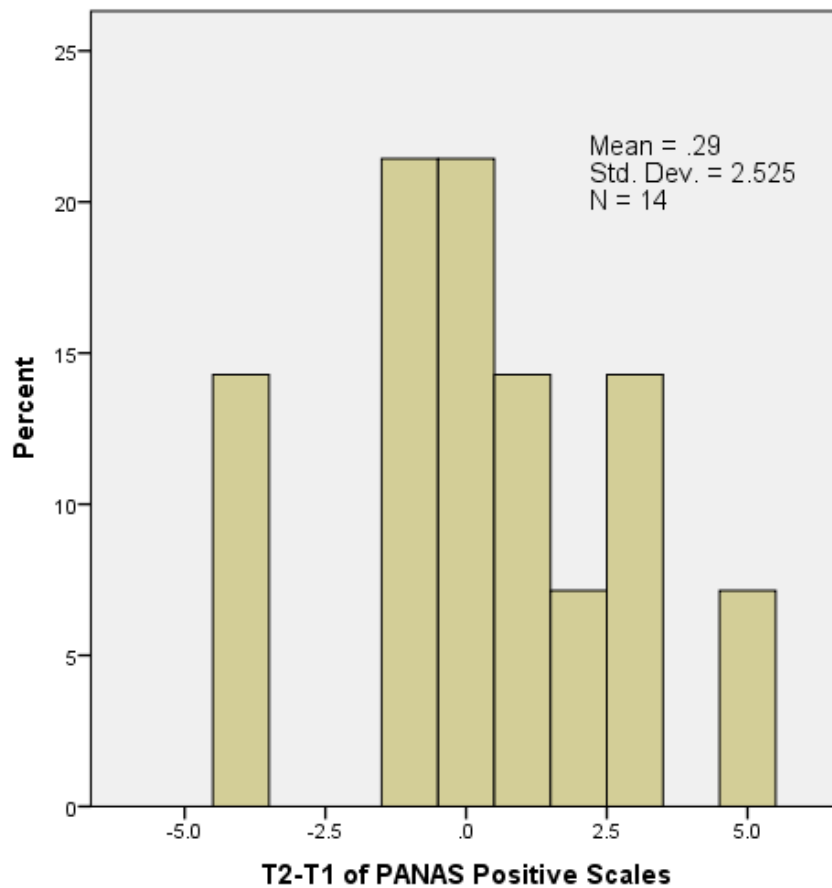


Figure 2. Degree of change of PA between T1 and T2 PANAS administrations.

It is important to be aware of the standard deviation values for much of the statistical analyses. The standard deviation values demonstrate large variation in the responses. The larger the standard variation value, the lower the precision of the measurements, and thus the lower the confidence in the statistical conclusions.

Figure 3 shows the change of NA for the same group of comparison. Overall, the positive mean of .79 is indicative of an improvement in response, or a decrease in reported negative affect, albeit small.

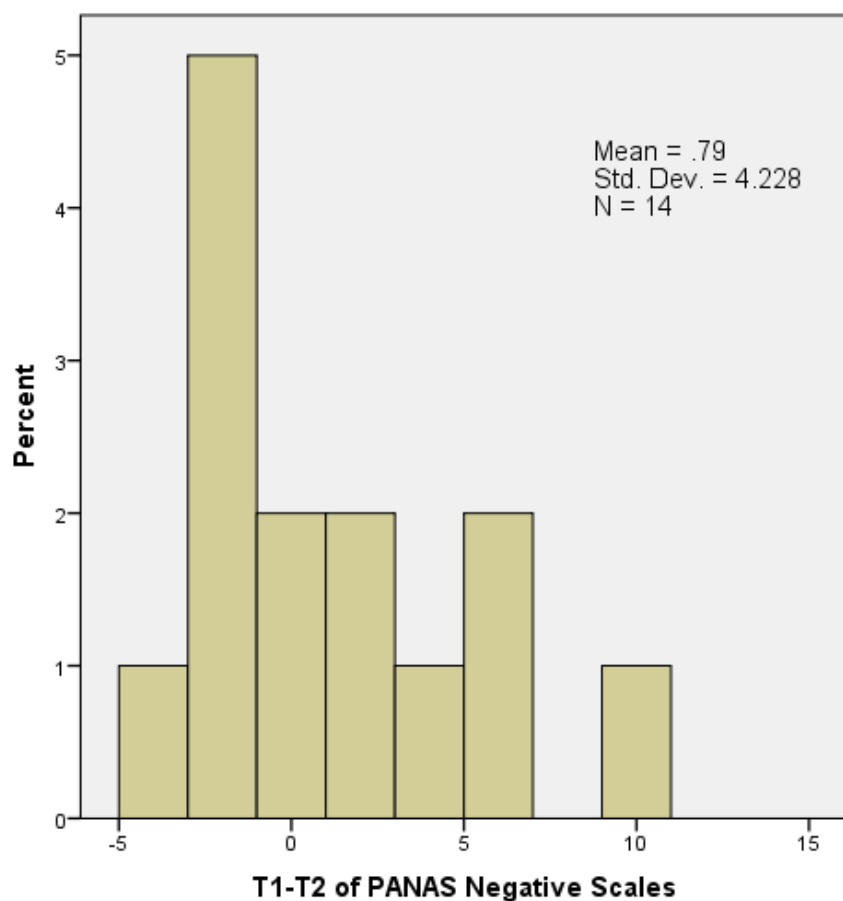


Figure 3. Degree of change of NA between T1 and T2 PANAS administrations.

The above graphs are reflections of the time between the first PANAS measure of the waitlist control group and the measure of the waitlist control group and experimental group just before engagement in the protocol. The next four graphs refer to the time during participation in the protocol. Figure 4 is a representation of the change in PA from before participation to after. The mean is positive, indicating an increase in positive affect. It is still a small number at .84, but larger than the previous PA measure when there was no engagement in the music listening protocol in Figure 3 (.29).

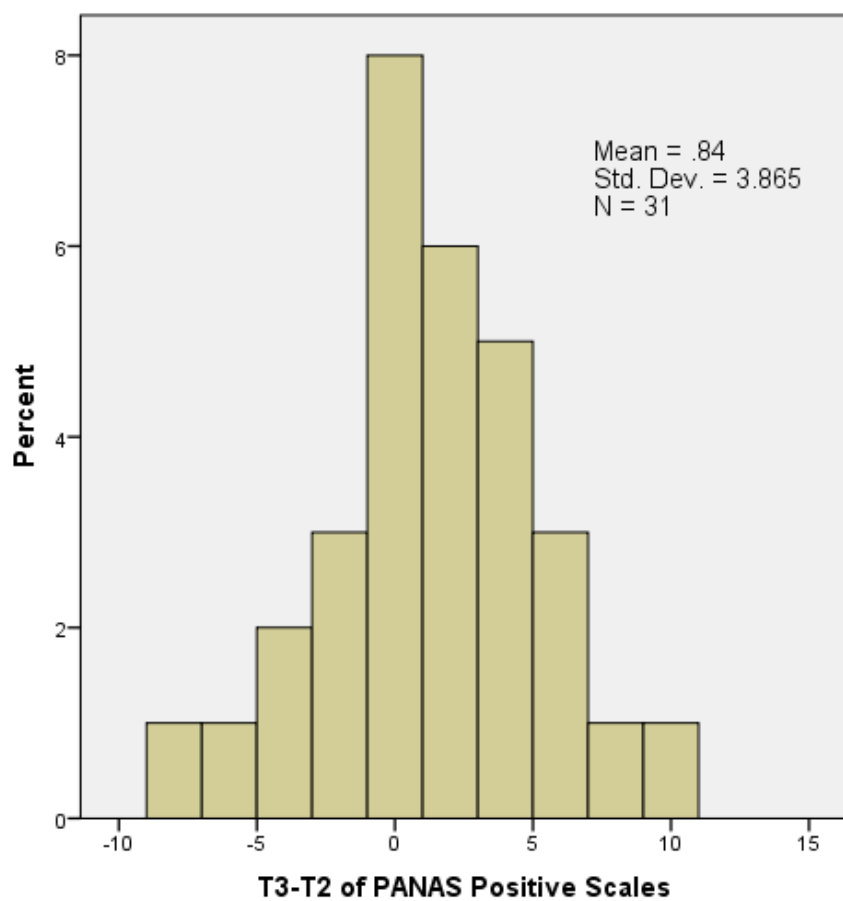


Figure 4. Degree of change of PA between T2 and T3 PANAS administrations.

Similarly, the change in NA scores also showed improvement with the positive mean (Figure 5). Again, the mean is low at .81, but slightly higher than in the non-protocol period (.79).

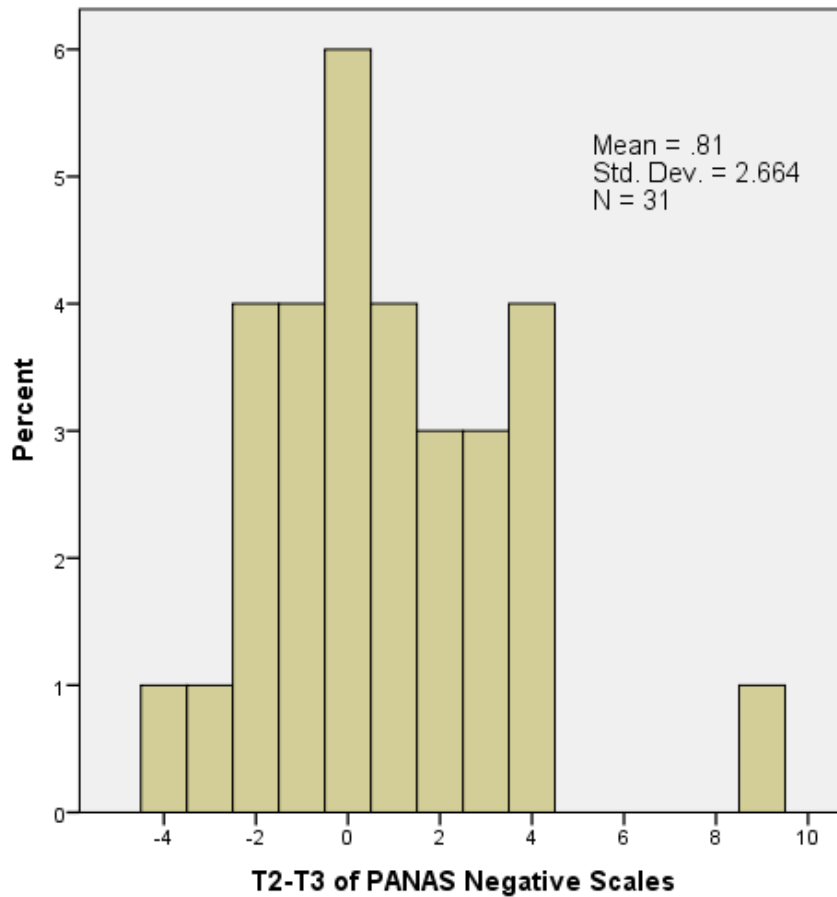


Figure 5. Degree of change of NA between T2 and T3 PANAS administrations.

As discussed previously in this section, there were 5 members of the WC group who did not complete T2. Those individuals were not included in the comparisons found in Figures 4 and 5. In order to include their data, their information from T1 was included with the data from the T2 data, which will be referred to as “alternate T2T3”. This makes the time between their pre-test and post-test longer, but gives a bit more information. This new configuration of data resulted in larger means in the changes for both PA and NA. Figure 6 shows the change in mean for PA, now at 1.00.

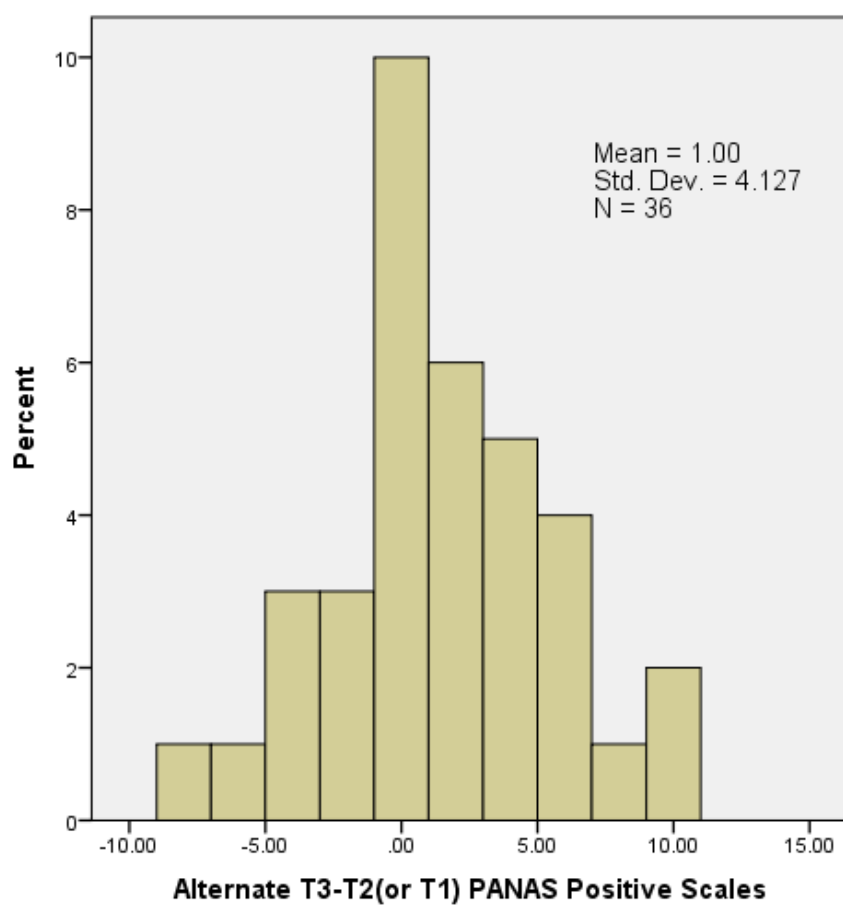


Figure 6. Degree of change of PA between T1(or T2) and T3 PANAS administrations.

Even larger is the mean of the change for the NA, shown in Figure 7 as 1.03.

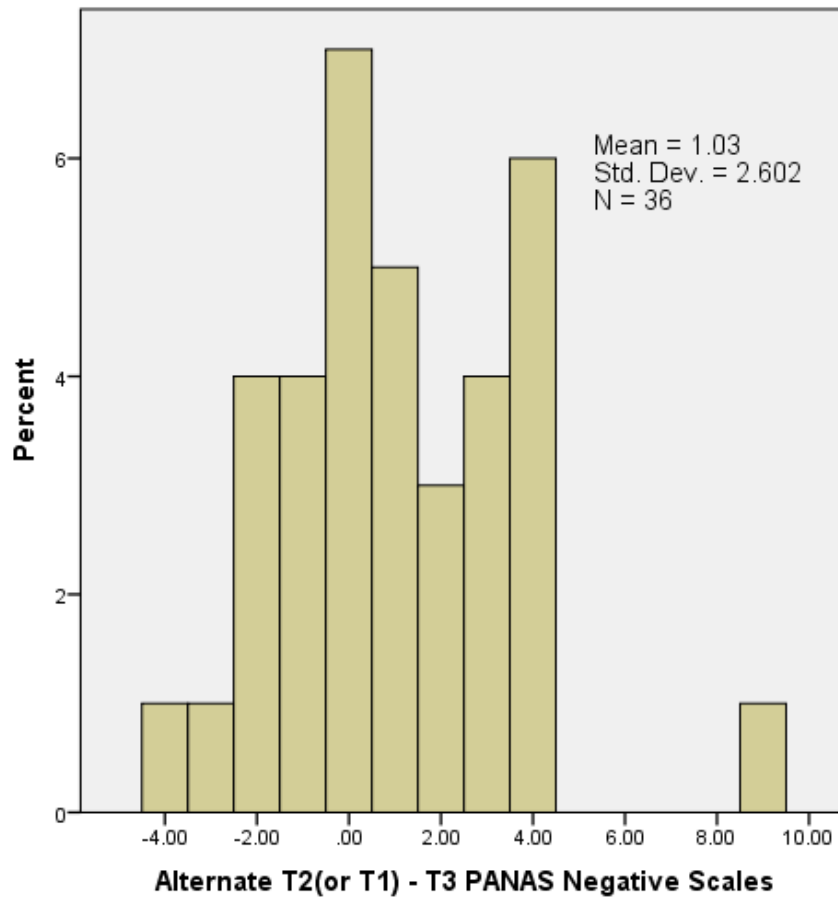


Figure 7. Degree of change on NA between T1(or T2) and T3 PANAS administrations.

All of these distributions have a positive mean, which indicates that respondents showed higher PA scores and lower NA scores. But are these changes significant? A simple t-test comparing the means to 0.0 was carried out. Table 6 shows the results.

Table 6
t-test Results for Changes on PANAS Scores

Stubhead	T2T1 ChangePA	T2T1 ChangeNA	T3T2 ChangePA	T3T2 ChangeNA	AltT3T2 ChangePA	AltT3T2 ChangePA
<i>N</i>	14	14	31	31	36	36
<i>M</i>	.29	.79	.84	.81	1.00	1.03
<i>SD</i>	2.525	4.228	3.865	2.664	4.127	2.602
<i>t</i> -value	.423	.695	1.208	1.686	1.454	2.370
<i>p</i> -value (1-tail)	.340	.250	.118	.051	.078	.012

At the .05 level of significance, the T1 to T2 mean changes in both PA and NA scales are not at all significant. This is seen as a positive result for the study, because this is the time before engagement in the music listening protocol. The changes improve in the T2 to T3 time period when participants were engaged in the protocol, and the NA changes improve, but are still not reaching significance. When the data from the 5 WC participants without T2 scores are added, there is a significant decrease in NA.

Overall, the results of the analysis of the PANAS data shows weak support for the music listening protocol to achieve changes in positive and negative affect ratings. As discussed previously, there are a number of other influences that could have caused improvements in the participants' lives over the time of the study. Although the change in negative affect scores did reach statistical significance, it is not possible to definitively state that the music listening protocol ameliorated negative affect.

Diary card data. A total of 37 of the 40 participants submitted at least one diary card. Overall, there were a total of 142 diary cards submitted. Figure 8 shows the number of diary cards submitted by the percentage of participants. Most participants completed one diary card per listening experience, but less than 20% completed either more or less than the required four.

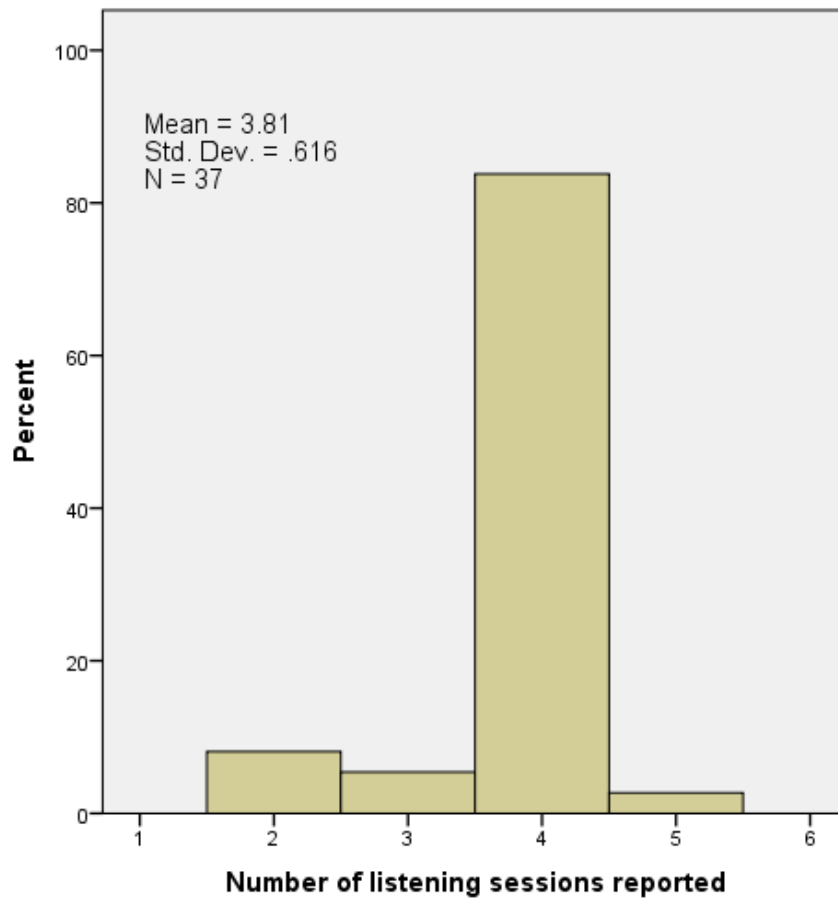


Figure 8. Total number of diary cards submitted by each participant.

The simple analyses of the well-being change (WB-change) showed that there was a very definite reported increase in the sense of well-being over the course of the listening sessions. WB-change scores were significantly different from zero ($M = 1.11$, $SD = .961$), $t(140) = 13.66$, $p < .001$.

It is important to emphasize that the nature of measurement of WB-change should be interpreted with caution, because well-being before listening was measured at the same time as

well-being after listening. This retrospective measurement of well-being is prone to biased reporting by participants.

Listening experiences.

Length. Participants were asked to listen for 15-20 minutes per experience. Figure 9 presents the actual length of time participants engaged in music listening, ranging from three minutes to 120 minutes. The mean listening duration time was 23.61 minutes. It is important to note that large standard deviation of 14.914. This illustrates the tremendous variability in listening durations between participants, and individual listening experiences. The researcher gave recommendations, but there was no control over their adherence to these recommendations.

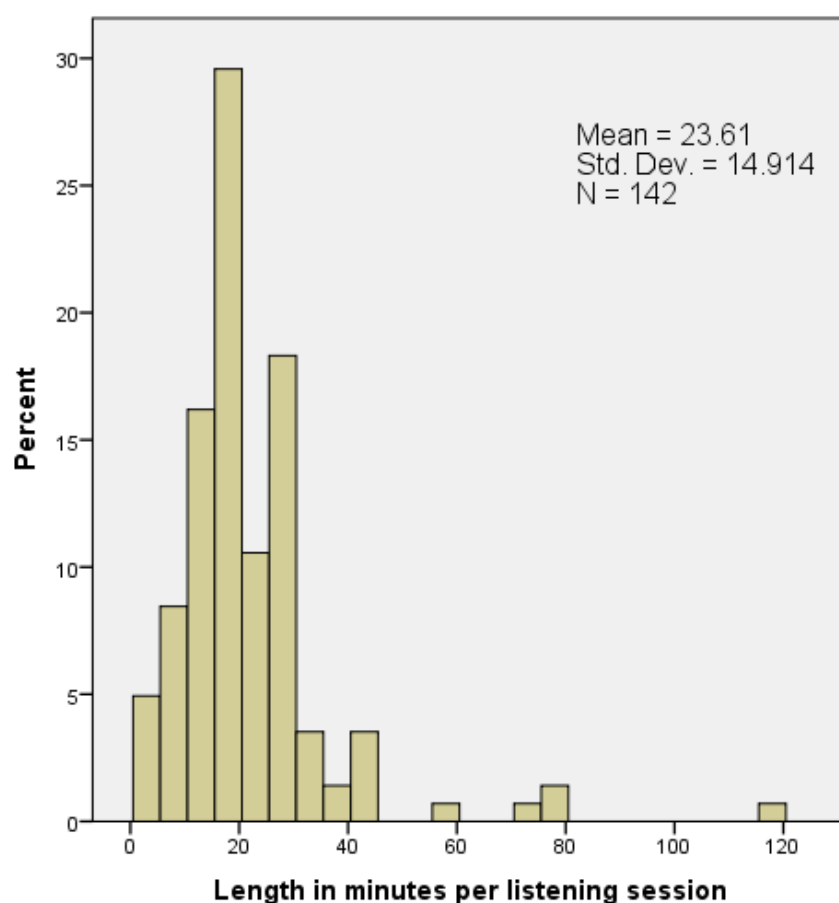


Figure 9. Participant reported length in minutes per listening session.

Time of day. There was a wide range of time of day that listening occurred as shown in Table 7. It should be noted that there were no specific times associated with these labels; participants were free to assign the category according to their own perceptions. An early version of the diary card contained time ranges after each descriptor. After participants in the first group raised concerns about their listening experiences falling into two ranges, the ranges were dropped from the descriptors.

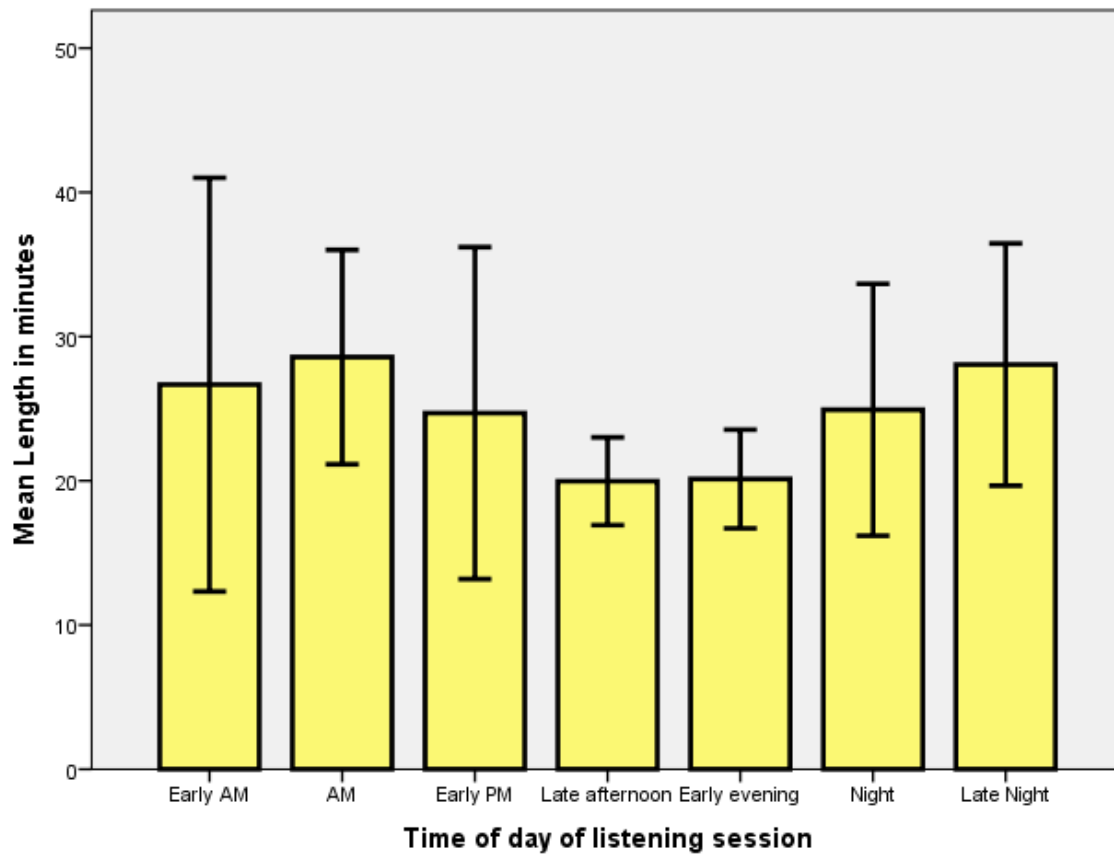
Table 7
Time of Day of Listening Experiences

Time of Day	Frequency	Valid Percent
1 Early morning	3	2.1
2 Morning	19	13.4
3 Early afternoon	13	9.2
4 Late afternoon	32	22.5
5 Early evening	32	22.5
6 Night	26	18.3
7 Late night	17	12
Missing data = 19		

Note that the column “Valid Percent” in all of the following tables represents the calculations after the missing data from participant non-compliance was excluded. For 40 participants, there should have been 160 diary cards submitted. The number of missing entries is found at the bottom of each table.

Correlations between variables.

Length and time of day. In Figure 10, mean length of sessions occurring at the different times of day are given along with 95% confidence intervals (CI). The early morning session CI is large because there were so few responses in this category. The listening duration was not significantly impacted by the time of day that the listening occurred.



Error bars: 95% confidence intervals around the mean length, which is indicated by bar height.

Figure 10. Mean listening duration in minutes according to the time of day of the listening.

Listening technique. Table 8 shows the frequency in which participants reported engaging in each listening technique. There was little variation in the number of sessions with each technique. There were 34 entries each for the focus on musical elements and body awareness techniques, 37 for the positive imagery technique, and 35 for the movement technique.

Table 8
Frequency of Engagement of Each Listening Technique

Listening Technique	Frequency	Valid percent
1 Musical elements	34	24.3
2 Positive imagery	37	26.4
3 Body awareness	34	24.3
4 Movement	35	25
Missing data = 21		

Technique and length. According to Figure 11, the mean listening duration did not vary greatly according to the technique.

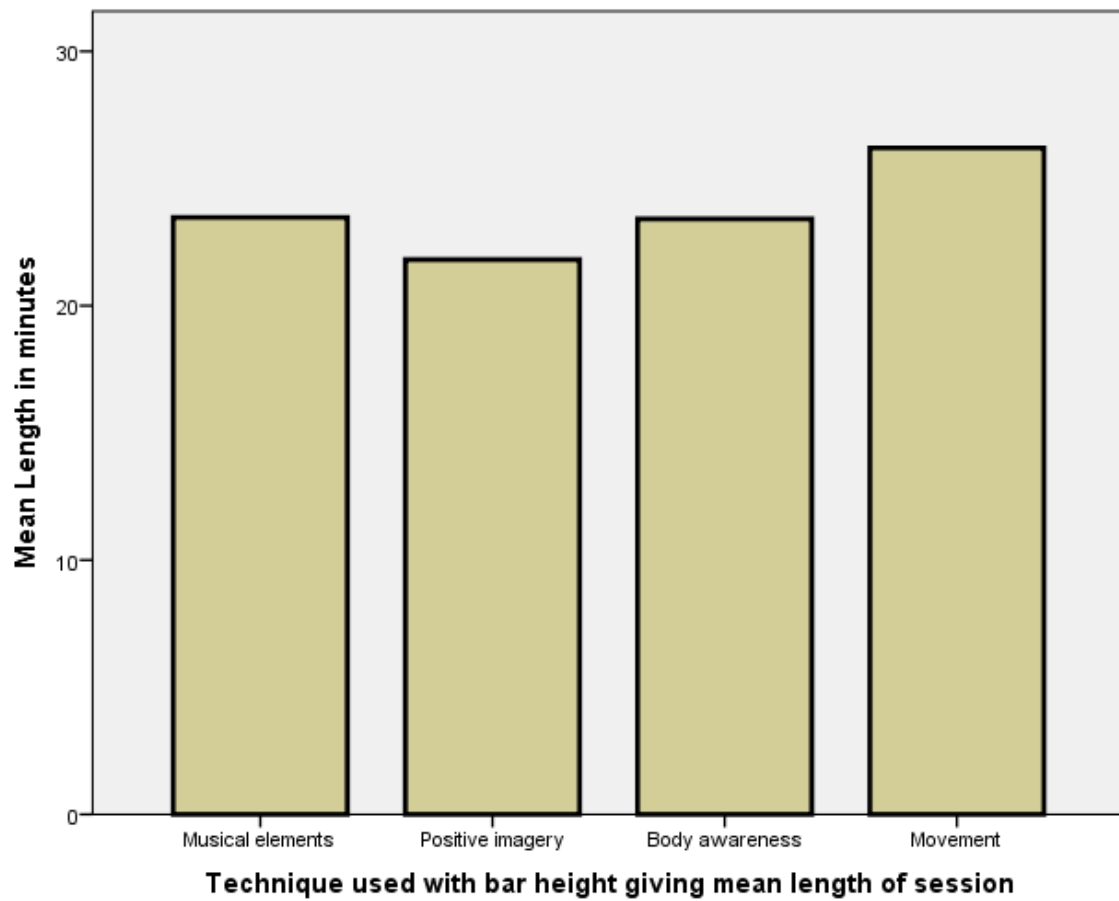


Figure 11. Mean length in minutes for each listening technique.

Well-being. Each diary card asked participants to rate their sense of well-being before (WB-before) and after (WB-after) the listening experience on a scale of 1 (very low) to 5 (very high). Table 9 gives the specific information about each point on the well-being rating scale. Most participants rated themselves between 2 – 4 on the scale pre-listening. After listening, most participants rated themselves either 4 or 5.

Table 9
Well-Being Ratings Before and After Listening

Stubhead	Well-Being Before		Well-Being After	
Well-Being Descriptor	Frequency	Valid Percent	Frequency	Valid Percent
1 Very low	6	4.2	0	0
2 Low	28	19.7	3	2.1
3 Moderate	60	42.3	18	12.8
4 High	37	26.1	64	45.4
5 Very high	11	7.7	56	39.7
Missing data	20		19	

The change in well-being (WB-change) is found by subtracting the WB-before rating from the WB-after rating. For example, a rating of 2 pre-listening and a rating a 5 post-listening would equal a change of 3. The mean WB-change was 1.1. A more explicit comparison of WB-change is shown in Table 10.

Table 10
Change in Well-Being (WB-after – WB-before)

Valid Change	Frequency	Valid Percent
-2	1	0.7
-1	2	1.4
0	35	24.8
1	57	40.4
2	35	24.8
3	11	7.8
Missing data = 20		

In three cases, well-being was reported as lower after listening. No WB-change ratings occurred on 35 diary cards. There were 57 reports that showed an increase of 1, 35 instances of an increase by 2, and 11 instances of an increase by 3.

Bivariate correlations between well-being and variables. Table 11 is a summary of the music listening techniques, the mean length for each technique, and the WB-change for each technique.

Table 11
Summary of Listening Duration and Well-Being Change by Technique

Listening Technique	Parameter	Length in minutes	Well-Being Change (after - before)
1 Musical Elements	<i>M</i>	23.47	.85
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	34	34
	<i>SD</i>	23.000	1.077
2 Positive Imagery	<i>M</i>	21.81	1.16
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	37	37
	<i>SD</i>	12.708	0.958
3 Body Awareness	<i>M</i>	23.41	1.15
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	34	34
	<i>SD</i>	11.410	0.892
4 Movement	<i>M</i>	26.20	1.26
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	35	35
	<i>SD</i>	20.807	0.919
Total	<i>M</i>	23.70	1.11
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	140	140
	<i>SD</i>	14.918	0.965

Table 12 shows a similar summary of the time of day of listening, the listening duration and WB-change associated with that time of day.

Table 12
Summary of Listening Duration and Well-Being Change by Time of Day of Listening

Time of Day	Parameter	Length in minutes	Well-Being Change (after - before)
1 Early morning	<i>M</i>	26.67	1.33
	<i>Mdn</i>	30.00	1.00
	<i>N</i>	3	3
	<i>SD</i>	5.774	1.528
2 Morning	<i>M</i>	28.58	1.11
	<i>Mdn</i>	30.00	1.00
	<i>N</i>	19	18
	<i>SD</i>	15.421	1.023
3 Early afternoon	<i>M</i>	24.69	1.08
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	13	13
	<i>SD</i>	19.045	1.038
4 Late afternoon	<i>M</i>	19.97	1.09
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	32	32
	<i>SD</i>	8.434	.995
5 Early evening	<i>M</i>	20.13	1.41
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	32	32
	<i>SD</i>	9.489	0.979
6 Night	<i>M</i>	24.92	.96
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	26	26
	<i>SD</i>	21.622	.599
7 Late night	<i>M</i>	28.06	.76
	<i>Mdn</i>	25.00	1.00
	<i>N</i>	17	17
	<i>SD</i>	16.388	1.091
Total	<i>M</i>	23.61	1.11
	<i>Mdn</i>	20.00	1.00
	<i>N</i>	142	141
	<i>SD</i>	14.914	.961

Well-being and length. Table 13 presents a summary of listening length and well-being measures.

Table 13
Well-Being Change According to Listening Duration

Stubhead	Length in minutes	Well-being before	Well-being after	Change in well-being
<i>Valid N</i>	142	142	141	141
<i>Missing N</i>	19	19	20	20
<i>M</i>	23.61	3.13	4.23	1.11
<i>Mdn</i>	20.00	3.00	4.00	1.00
<i>Mode</i>	20	3	4	1
<i>SD</i>	14.914	.962	.750	.961
Minimum	3	1	2	-2
Maximum	120	5	5	3

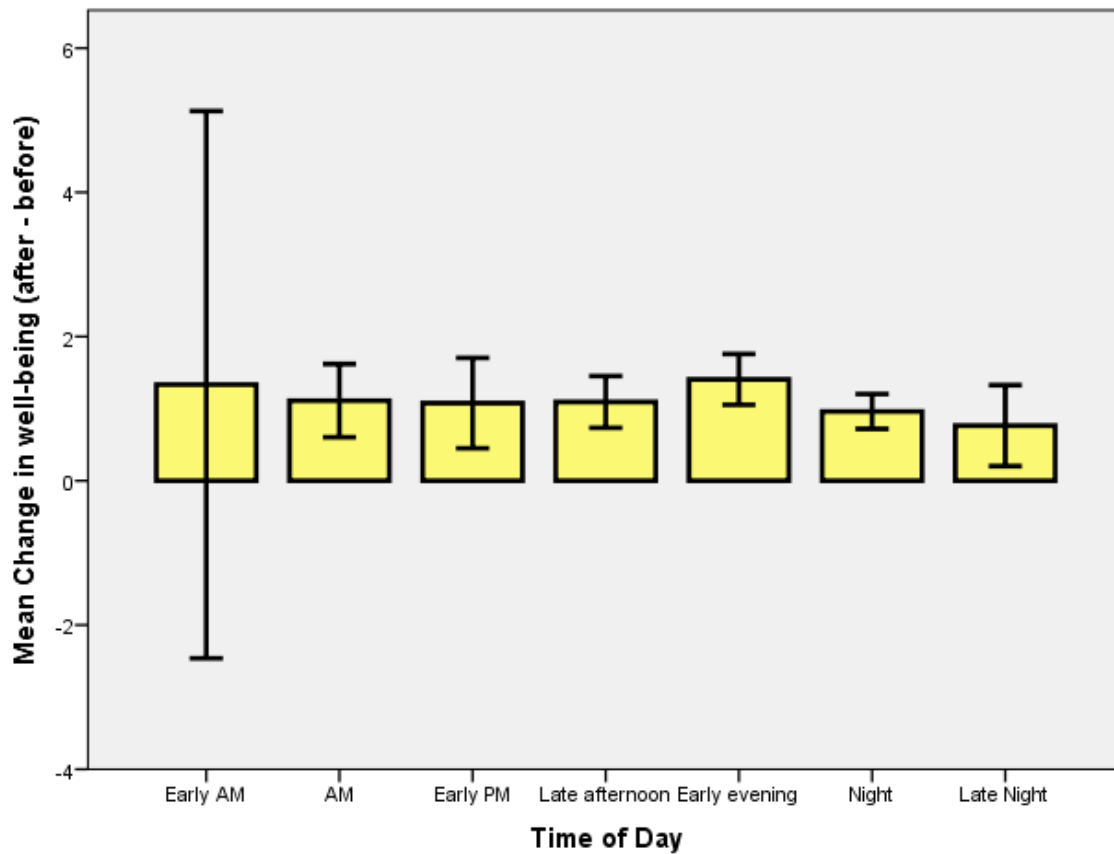
When considering listening duration, a positive correlation was found between the lengths of listening and WB-change but it was not significant ($r = .089$; $p \leq .293$) (see Table 14).

Table 14
Correlation between Listening Duration and Well-Being Change

	Stubhead	Length in Minutes	Well-Being Change	Log_Length
Length in minutes	Pearson Correlation	1	.089	.864**
	Sig (2-tailed)		.293	.000
	<i>N</i>	142	141	142
WB-Change	Pearson Correlation	.089	1	.062
	Sig (2-tailed)	.293		.467
	<i>N</i>	141	141	141
Log_Length	Pearson Correlation	.864**	.062	1
	Sig (2-tailed)	.000	.467	
	<i>N</i>	142	141	142

**Correlation is significant at the .01 level (2-tailed).

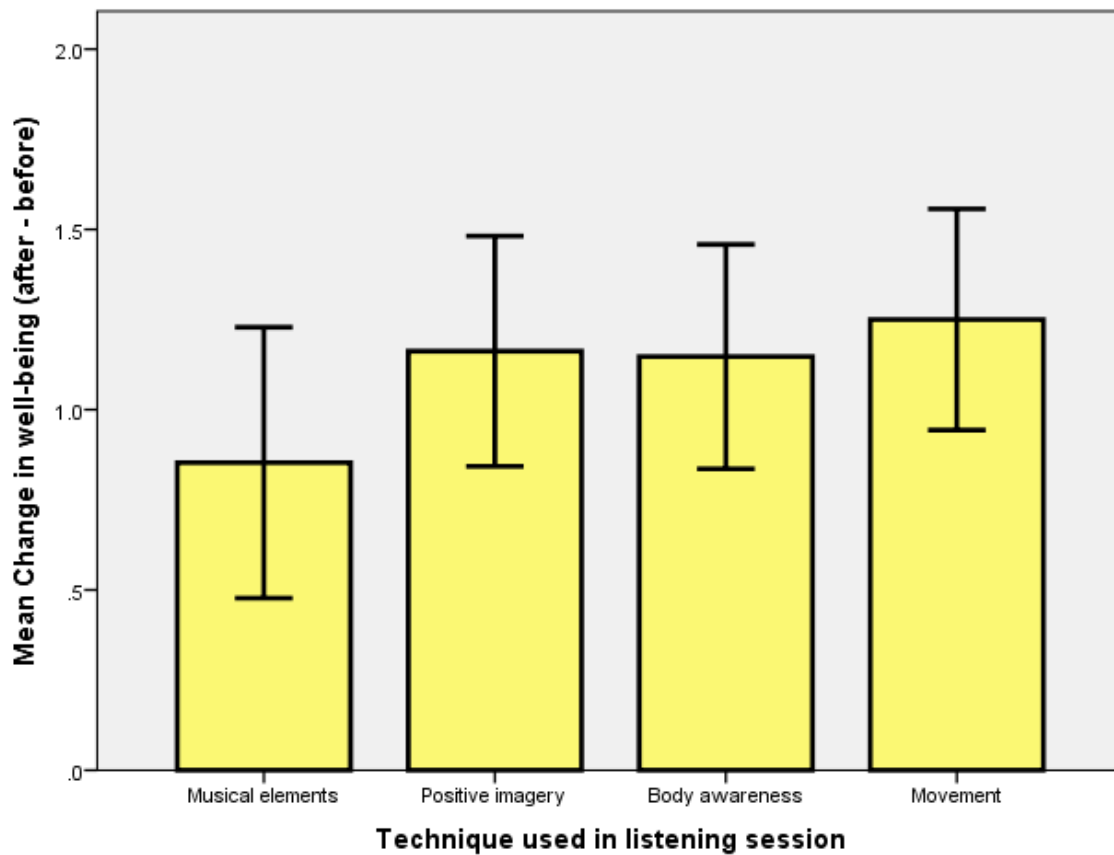
Well-being and time of day. The WB-change does not seem dependent on the time of day (Figure 12) as the 95% CI generally overlap in each category.



Error bars: 95% confidence intervals on mean change in well-being.

Figure 12. Mean change in well-being according to time of day of listening.

Well-being and listening technique. Similarly, there seems to be no correlation between the WB-change and the specific technique practiced (Figure 13) as the 95% CI generally overlap in each category.



Error bars: 95% confidence intervals for mean change in well-being.

Figure 13. Mean change in well-being according to technique.

Multivariate statistics. With simple bivariate analyses length, technique, nor time of day for the sessions were strongly or significantly related to WB-change. It is possible that these simple results might change when the effects of several variables are considered together using regression analyses.

There is considerable discussion in the literature whether one should predict change score (in this study, WB-after – WB-before) with other variables (i.e. listening technique), or predict the WB-after score using the WB-before as an additional covariate (Cribbie & Jamieson, 2004; Smolkowski, 2010). A decision was made to include the WB-before as a predictor variable

because its value places strong constraints on possible WB-changes that can be recorded by a 5-score ordinal variable. That is, if WB-before was rated as 5, then it is impossible to indicate a better sense of well-being after the session. Large change scores can only occur when WB-before is low.

Complicated linear models were explored in order to test the effects of the variables in different combinations on the WB-change. The initial model predicted WB-change using the length of the session as a quantitative predictor, or covariate, with the time of day and technique variables as nominal predictors, or factors. The results indicated that length was not significant, but some of the post-hoc analyses for specific scores of the time of day and technique variables indicated that sessions from technique 1, focusing on the musical elements, and occurring in the early evening were likely to have smaller changes in well-being than other sessions.

Since the effect of length of the sessions might vary by the technique used in the session or by one's initial sense of well-being, a new linear model added tests for interactions of length with technique with WB-before. Outcomes of interaction tests were not significant and other possible interactions with length were not pursued.

In order to take into account individual difference, respondent ID was added as another factor in the general linear model predicting WB-change. This addition was almost significant at the .05 level ($F=1.479$, $df=36$, $p=.07$). More complicated models were not pursued (e.g. using a repeated measures design).

Table 15 provides the results of a simple regression analysis where WB-change is predicted by WB-before, length of the session, and two dummy variables: NightSession, which gives contrast between night sessions and those occurring at any other time of the day, and

MusicElement, which gives contrast between sessions focusing on music elements to the other three techniques.

Table 15

Regression Equation Predicting the Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique with WB-Before Score

Variables	Regression Coefficient	Standardized Regression Coefficient	t-value	p-value (2 tail)
Intercept	3.450		14.985	.000
WB-Before	-.714	-.707	-11.808	.000
Length	.001	.021	.352	.725
NightSession	-.390	-.158	-2.651	.009
MusicalElements	-.313	-.140	-2.362	.020
Adjusted R^2	.510			
N	141			

With other variables set to zero scores, the equation predicts a WB-change of 2.736 [=3.450-.714(1)] when WB-before score is 1 and a WB-change of .594 [=3.450-.714(4)] when WB-before is 4. Only when WB-before is 5 does the equation predict a negative WB-change of -.120 [=3.450-.714(5)]. So for most values of WB-before, the equation predicts an improvement in well-being.

As noted above, one of the positions in the literature on the study of change suggest that one simply predicts the change score without using information about the pretest beyond the fact that it is used to calculate the change (Cribbie & Jamieson, 2004; Smolkowski, 2010). Table 16 indicates that when this is done, the results are somewhat different. The overall ability to predict the WB-change score is much weaker without the use of the pretest or the WB-before scores among the predictors. The adjusted R-square has dropped from .510 to .015. Length has a little stronger positive influence, but is still not significant. Night sessions tend to have smaller

changes compared to sessions at other times of the day, but this effect no longer significant. The reduced WB-change associated with the technique of focusing on musical elements is stronger than before, but is significant.

Table 16
Regression Equation Predicting Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique without WB-Before Score

Variables	Regression Coefficient	Standardized Regression Coefficient	<i>t</i> -value	<i>p</i> -value (2 tail)
Intercept	1.083		6.745	.000
Length	.006	.092	1.097	.275
NightSession	-.192	-.078	-.924	.375
MusicalElements	-.335	-.150	-1.785	.077
Adjusted R^2	.015			
<i>N</i>	141			

The above results have 37 subjects providing diary card data on about four listening sessions, so the diary observations are not independent from each other. The simplest attempt to correct for this is to add a dummy variable for each respondent. When this is done with the model that includes WB-before as a predictor, the dummy variables as a group barely add a significant amount to the ability to predict WB-change. The sessions at night or focusing on musical elements continue to have significant negative effects on WB-change (Table 17).

Table 17

Regression Equation Predicting Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique with WB-Before Score with Dummy Variables for Respondents

Variables	Regression Coefficient	Standardized Regression Coefficient	t-value	p-value (2 tail)
Intercept	4.029		9.479	.000
WB-Before	-.673	-.666	-7.930	.000
Length	.006	.093	1.164	.247
NightSession	.396	-.160	-2.302	.023
MusicalElements	-.310	-.138	-2.489	.014
Dummy variables for respondents	~~	~~	~~	.05*
Adjusted R^2	.584			
N	141			

* The calculated p-value is based upon the decrease in the sum of squared errors in the regression model with dummy variables added for the respondents.

When the dummy variables are added to the prediction equation without WB-before, they very significantly increase the ability to predict WB-change and some of the other predictors become more significant. In particular, length of the session now has a significant positive influence on the size of the WB-change. The sessions at night or focusing on musical elements continue to have negative effects on WB-change and the musical elements technique effect is now statistically significant (Table 18).

These analyses provide hints more than definitive conclusions. They are fairly consistent in suggesting that the sessions focusing on musical elements produce less change in well-being. These sessions were also the first sessions given, which may suggest a learning curve in engaging in the techniques. A different study design would be needed to investigate this possibility. The hint of a positive effect of the length of the listening session is also promising.

Table 18

Regression Equation Predicting Change in Well-Being by Listening Duration, Listening at Night, and the Musical Elements Technique without WB-Before Score with Dummy Variables for Respondents

Variables	Regression Coefficient	Standardized Regression Coefficient	<i>t</i> -value	<i>p</i> -value (2 tail)
Intercept	.757		1.905	.060
Length	.015	.239	2.429	.017
NightSession	-.340	-.138	-1.555	.123
MusicalElements	-.382	-.171	-2.424	.017
Dummy variables for respondents	~~	~~	~~	.001*
Adjusted R^2	.328			
<i>N</i>	141			
* The calculated <i>p</i> -value is based upon the decrease in the sum of squared errors in the regression model with dummy variables added for the respondents.				

Comparing PANAS and diary card well-being scores. There are two key summaries from the diary card data: the total length of time spent in the listening techniques and the mean average change in well-being across all of the techniques. Table 19 shows a simplified summary of the above two predictors for change scores of the PA and NA for T1T2 and T2T3 and alternate T2T3. Only the regression coefficient with its significance level is given for each variable, as well as the adjusted R-square, and the number of cases.

Table 19
Comparison of Predictors for Change in PA and NA Scores at Various Intervals

Dependent Variable	Total Time in Sessions		Mean Change in WB in Techniques		Adjusted R^2	N
	Regression Coefficient	p -value (2-tail)	Regression Coefficient	p -value (2-tail)		
T1T2 PA	.000	.968	1.020	.435	-.116	13
T1T2 NA	.061	.093	.413	.819	.168	13
T2T3 PA	.032	.054	-.528	.597	.075	30
T2T3 NA	.014	.247	.106	.883	-.020	30
Alt. T2T3 PA	.023	.172	-.428	.692	-.090	35
Alt. T2T3 NA	.015	.170	-.043	.950	-.001	35

In considering this data, it is clear that the average change in well-being has no relevance to the change in the PANAS scores. This conclusion is based on the fact that the coefficients change from positive to negative and the adjusted R-squares are not significant. However, the total time reported over all of the sessions always has a positive effect, in that it increases the PA and decreases the NA. It is most significant for the T2-T3 PA, and would be significant with a one-tail test (only measuring change in one direction). Thus, the evidence is weak. It is likely that the design flaws and data collection problems contributed to this disappointing evidence.

There are more data to be considered from the diary cards. There were three open-ended questions included on each diary card. Although this information was not analyzed statistically, it was worth examining this data to help present a more detailed picture of the experience of the participants.

Open-ended diary card responses. On each diary card, there were open-ended questions that were optional for response. The questions were:

1. What part of the music were you most aware of while listening?
2. What was the mood you experienced while listening?
3. How did your body feel while you were listening to the music?

These questions elicited an enormous amount of rich data about the experiences of the participants.

Question 1: Part of the music. For this question, there were 173 total responses. Each diary card often contained more than one response. All responses were included, and were classified according to the category of music. Table 20 illustrates the categories of response, and the number of instances per listening technique and in total.

Overall, lyrics and instruments were overwhelmingly the most commonly reported part of the music, with a total of 89 instances. This was likely due to the salience of these musical elements to the participants, and may reflect on the musical sophistication and complexity of the chosen music and knowledge of the participants. Tempo and harmony were the least reported, with only four instances each. Melody, rhythm and beat were close in number of responses, with 25, 23, and 17 respectively.

When looking at the total number of reported saliencies, the first two techniques showed the highest overall reports of musical saliencies. It seems natural that the first listening experience in which participants were to focus on the musical elements had the largest numbers in total, and that the instruments were the most noted aspect of the music. Hearing the music more deeply for itself was the point of that technique. It was interesting to note that in technique

2, positive imagery, the highest attention to lyrics was found. It would seem that the lyrical content might have provided the focus for, or possibly in some cases distraction from, the imagery.

Table 20
Responses to Diary Card Open-Ended Question 1

Part of Music	Subcategory	1 Musical Elements	2 Positive Imagery	3 Body Awareness	4 Movement	OVER-ALL TOTAL
Lyrics		10	15	10	5	40
Melody		10	5	2	8	25
Beat		2	2	4	9	17
Tempo		0	1	0	3	4
Rhythm		6	7	5	5	23
Harmony		3	1	0	0	4
Expression elements	Articulation		1			1
	Dynamics	1	2		1	4
	Timbre				1	1
	Repetition			1		1
	Expression				1	1
	Structure				1	1
	Orchestration	1			1	1
	Pauses		1			1
TOTAL		1	4	1	5	11
Instruments	Non-specified	4	4	2	1	11
	Voice	2	1	1	1	5
	Strings	1	1		1	3
	Violin	2	1			3
	Flute	1		2		3
	Clarinet		1			1
	Trumpet	1				1
	Percussion/Drums	3	2			5
	Bells	1				1
	Piano	2	1	1		4
	Keyboards	1				1
	Synthesizer	1				1
	Organ				1	1
	Guitar	3	1	1	2	7
	Bass	1	1	1		3
	Bagpipes	1				1
TOTAL		22	13	8	6	49
TECHNIQUE TOTAL		54	48	30	41	173

Overall, during the kinesthetic experiences (techniques 3 & 4) the fewest reports of hearing different parts of the music were recorded, particularly during technique 3, body awareness. It could be that during more physiologically focused and physically active participation there was less focus on the specifics of the music. Technique 4 did have the highest report of noticing the beat, but there were still relatively few instances.

Question 2: Mood. In total, there were 76 different descriptors given to describe the moods the participants experienced while listening, and 204 total responses in all submitted diary cards. As with Question 1, there was often more than one descriptor on each diary card, and every descriptor was included. Once the descriptors were gathered, the researcher looked for common moods and grouped them into categories. As there is no common categorization of moods available, the researcher made the determination of categories based on factors such as positive or negative moods; present, past or future-focused moods; high or low energy moods; and grounded or transcendent moods. Table 21 presents this information, as well as the total instances of each mood category and each descriptor, both by technique and in total.

Overall, most responses to this question elicited positive mood descriptors. Categories A, B, C, D, E and F contain these descriptors, and have 165 responses comprising 80.9% of the total responses. Category G contains more inward, thoughtful moods with a total of 13 responses, and 6.4% of the overall responses. Categories H and I contain descriptors of negative mood states, and contain on 26 responses, or 12.7% of the overall responses. This clearly demonstrates that the overwhelming moods experienced by the participants when listening were positive in nature.

Table 21
Responses to Diary Card Open-Ended Question 2

CATEGORY	DESCRIPTORS	1 Musical Elements	2 Positive Imagery	3 Body Awareness	4 Movement	OVER-ALL TOTAL
A Positive, quiet, outward	Enjoyment		1			1
	Good		2		1	3
	Happy	5	6	4	12	27
	Joyful		1			1
	Pleasant				1	1
	Positive	2	2			4
	Upbeat	1	1		1	3
	Well-being				1	1
TOTAL		8	12	4	16	41
B Positive, high energy, outward	Ebullient		1			1
	Energetic/ Energized	3	3		3	9
	Enthusiastic	2			1	3
	Excited		1		2	3
	In control				1	1
	Intense	1			1	2
	Invigorated		1		1	2
	Majestic				1	1
	Feeling of movement	1				1
	Passionate	1				1
	Release	1				1
TOTAL		9	6	0	10	25
C Positive, quiet, inward	Calm	8	3	4	1	16
	Comfortable			1		1
	Content	2	1	2	1	6
	Gentle			1		1
	Lighthearted	1				1
	Loose				1	1
	Mellow	1	2			3
	Peaceful	4	3	1		8
	Relaxed	10	2	9	6	27
	Restful			1		1
	Tranquil	1	2			3
TOTAL		27	13	19	9	68
D Transcendent	Blissful				2	2
	Ethereal			1		1
	Euphoric				1	1
	Inspired		1			1
	Mystical			1		1
	Spiritual		1			1
	Uplifted	1	3	1	1	6
TOTAL		1	6	3	4	14

Table 21, continued

CATEGORY	DESCRIPTORS	1 Musical Elements	2 Positive Imagery	3 Body Awareness	4 Movement	OVER-ALL TOTAL
E Positive, future- oriented	Attentive	1				1
	Curious			1		1
	Engaged	2				2
	Exploring	1				1
	Optimistic		1			1
	Present	1	1			2
TOTAL		5	2	1	0	8
F Positive, grounded, inward	Accepted		1			1
	Fulfillment		1			1
	Grateful	1	1			2
	Loving				1	1
	Nurturance				1	1
	Satisfaction		1			1
	Safe		1			1
	Secure		1			1
TOTAL		1	6	0	2	9
G Inward, past- oriented	Contemplative	1				1
	Introspective	1			1	2
	Nostalgic		3	1		4
	Pensive	1				1
	Reflective		1			1
	Retrospective			1		1
	Sentimental	1			1	2
	Wishful		1			1
	Wistful				1	1
TOTAL		4	5	2	2	13
H Passive, negative, inward	Ambivalent			1		1
	Dark	1				1
	Homesick	1				1
	Lonely	1				1
	Melancholy	1				1
	Sad	4	2	1	1	8
	Serious			1		1
	Solemn			1		1
	Tired		2	1	1	4
TOTAL		8	4	4	2	18
I Negative, outward	Anxious			1	1	2
	Cranky				1	1
	Frustrated			1		1
	Overwhelmed			1		1
	Rushed			1		1
	Stressed		2			2
TOTAL		0	2	4	2	8
TOTAL BY TECHNIQUE		63	57	37	47	204

As found in Question 1 responses, Techniques 3 and 4 showed a markedly less number of responses about mood than techniques 1 and 2. It is possible that a more body-oriented focus may have caused listeners to be less attuned to the moods they experienced in response to listening to music.

Category C, which contains descriptors relating to positive, quiet, and inward moods, has 11 different descriptors and the most instances overall with 68. The highest response to this category was found in the first technique, focus on the musical elements. Additionally this technique had the highest number of occurrences of positive mood descriptors, 51 total. However, this technique also had the highest number of responses in Category H, which contains descriptors that are of a passive, negative, inwardly focused nature. With eight responses in this category and none in Category I, also containing negative moods, it is still far lower than the 51 positive responses. This was interesting in light of the statistical analysis that found this particular technique to have the lowest correlation with change in well-being. This lends further credence to the consideration of the learner's curve in listening intentionally to music, since the participants wrote many positive descriptors, yet tested low in well-being change.

Technique 3, body awareness, also had 8 negative mood descriptors, tying Technique 1 for the most, and had the lowest reports of positive moods with only 27. Yet in Table 10 found previously in this chapter, the change in well-being associated with this technique was in line with the other more positively correlated techniques for WB-change. There were also positive statements written in the diary cards regarding the impact of this technique on mood, "My mood improved through the listening. I went from being tense and preoccupied to relaxed, comfortable and peaceful at the end." Another participant stated that s/he felt "able to handle things with

better patience” after completing Technique 3. In addition, this technique had a comparably high number of responses for “relaxed”, yet had no responses at all in Category B which contains positive descriptors that are high energy and outwardly focused.

The highest number of responses for Category D, containing transcendent mood states, and for Category F, containing positive, grounded, internal mood states, was found with Technique 2, positive imagery. This technique also had a high number of responses in Category A, containing quiet and outwardly directed positive moods.

It is not surprising that Technique 4, movement, had the highest number of responses in both Categories A and B. Category B contains positive mood descriptors that represent high energy with an outward focus. In particular, this technique had the highest response for “happy.” Moving to music generally made the participants feel happy and full of energy.

Question 3: Body responses. In answer to the question about body responses, participants gave 49 different descriptors about body sensations, with a total of 164 instances of response. As in the previous questions, all instances of descriptors were included. As with mood responses, body responses were classified into like categories by the researcher, considering such characteristics as positive or negative, high or low energy, inward or outward focus, and real or imagined/transcendent. Table 22 illustrates these categories, descriptors, and instances reported by listening technique.

Table 22
Responses Diary Card Open-Ended Question 3

CATEGORY	DESCRIPTOR	1 Musical Elements	2 Positive Imagery	3 Body Awareness	4 Movement	OVER-ALL TOTAL
A High energy, high intensity	Active	1			1	2
	Alive			1		1
	Animated	1				1
	Bouncy			1		1
	Energized/ Energetic	1	3	1	7	12
	Invigorated				1	1
	Pumped up				1	1
	Stimulated			1	1	2
	Strong			1		1
	Want to move	1				1
	Younger				1	1
	TOTAL	4	3	5	12	24
B Pleasant, low energy	At ease		1			1
	Calm	4	5	3		12
	Comfortable	2	1	2		5
	Fine			1		1
	Great				1	1
	Happy		2			2
	Peaceful	1	2			3
	Positive		1			1
	Relaxed	22	15	18	4	59
	Sleepy/Drowsy		2	2		4
	Still	1				1
	TOTAL	30	29	26	5	90
C Focus	Alert		1			1
	Attentive		1			1
	Awake	1	1			2
	Connected		1		1	2
	Engaged		1			1
	Present				1	1
	Receptive		1			1
	TOTAL	1	6	0	2	9
D Transcendent	Chills			3		3
	Expansive				1	1
	Floaty			1	1	2
	Imagined sensations			2		2
	Prayerful	1				1
	Tingly		1			1
	Zen-like				1	1
	TOTAL	1	1	6	3	11

Table 22, continued

CATEGORY	DESCRIPTOR	1 Musical Elements	2 Positive Imagery	3 Body Awareness	4 Movement	OVER-ALL TOTAL
E Positive somatic	Release of/freed of tension			4	2	6
	Cool	1				1
	Heavy (positive)			1		1
	Light				1	1
	Looser				1	1
	Stretched				2	2
	Warm			1	1	1
TOTAL		1	0	6	7	14
F Negative somatic	Cold			1		1
	Heavy (negative)	1		1		2
	Numb	1				1
	Tense	1	1		3	4
	Tired		1			1
TOTAL		3	2	2	3	10
G	Two differing sensations simultaneously	3	2	0	3	8
OVERALL TOTAL		43	43	45	35	166

Overall, the descriptors cited about body responses are positive. There were only five descriptors referring to negative body feelings, compared to 44 positive. The instances of negative body response comprise only 6% of the total responses. Note that the descriptor “heavy” was in two different instances, but the contextual data made it clear that one experienced this as a positive sensation and the other negative.

By a large margin, the most prevalent category of response was found in Category B, with descriptors that represent body feelings that are low-energy and pleasant. Responses in this category represent 54.2% of the total responses. Despite this, it seems natural that this category had the lowest number of responses during the movement technique. Instead, this technique had

the highest number of responses in Category A, which contains descriptors that are high-energy and imply higher intensity.

It also seems logical that the kinesthetic techniques (3 and 4) had the highest responses in Category E, which contains descriptors that are related to positive somatic body experience. It is interesting that Technique 3, Body Awareness, had the highest responses in Category D, the descriptors that are of a more transcendent nature. Of particular note was that this technique held three instances of the sensation of chills, and two “imagined sensations,” which refers to the participants’ feeling as though someone was pressing on specific parts of their bodies.

Technique 4, movement, held the lowest number of responses to this question, which may seem surprising since it was the most physical technique in nature. One possible explanation could be that the responses were more focused, with fewer descriptors given in a single diary card response. It is also possible that survey fatigue may have played a part. This was intended to be the final diary card and this was the final open-ended question. Participants may have been weary of completing the measures.

Qualitative Results

Analysis of the four interviews provided information both on the subjective, internal experience of the participants and on the protocol. Reflections on the protocol will be presented in Chapter 5. Three major themes emerged in their participation of the music listening protocol illustrated. These themes were: perceived moods, physiological responses to the music, and relationship with music. In each theme several categories, subcategories as developed from concepts. Table 23 offers a comprehensive presentation of this material. For clarity, the term “interviewee” will be used when referring to specific responses from individuals who participated

in the qualitative interviews. Each interviewee is assigned a number 1 through 4 according to the order in which they were interviewed. The term “participant” will be used to indicate responses from other study participants that support the data.

Table 23
Qualitative Themes with Categories and Concepts

Theme	Category	Subcategory	Concepts
Mood	Positive mood		Positive moods were strengthened
	Mental focus		Greater ability to feel present
Physiological Responses	Release		Tensions felt in body were released
	Body memory		Somatic memories of movement were experienced
	Arousal		Body felt energized
	Calm		Body felt relaxed
Relationship with Music	Personal associations	Significant persons	New connections with memories of significant persons
		Significant places	Evocation of memories of places
		Significant events	Connections with events from past
	Awareness of music		New awareness of music heard in everyday life
	Lingering effects of music		Newfound ability to hear complexity in music
	Future with music		Positive effects of music listening continued after experience concluded
			Desire to maintain the newly discovered or rediscovered relationship with music

Mood. A comprehensive list of interviewee statements that illustrate their comments about mood is presented in Table 24.

Table 24
Category, Concepts and Data from the Theme "Mood"

Category	Concepts	Data Illustration
Positive mood	Positive moods were strengthened	<ul style="list-style-type: none"> • "I found that my good mood always got even better." • "It was always a positive." • "It was always pleasant. I kept reinforcing that by always thinking that it was pleasant." • "It was very powerful." • "We can bring pleasure to our lives in the simplest of ways [listening to music]." • "It was high anyway [mood]. I could really see how music could do that type of enhancement." • "Lifting my mood, it would just be from a high level to an even higher level." • "I just enjoyed it."
Mental focus	Greater ability to feel present	<ul style="list-style-type: none"> • "I wrote [in personal notes after listening], 'Mind clear, body happy.'" • "It made me more single-task oriented where I am usually a multi-tasker." • "So instead of being aware of everything that needs to be done ... it was like you could be more present and in the moment."

With all four interviewees, the responses to questions about their mood were the same. Participants reported that listening to music in this way made their good moods even better. They started the experiences from a positive mood state, and the listening experiences supported their good moods. A common statement was that they chose music from their playlists depending on the nuanced mood they found themselves. This likely reinforced the sense of the music supporting their moods.

Interviewee 1 stated that the listenings were never negative experiences. As will be discussed later, this same interviewee had attempted to use the imagery technique to overcome negative visual imagery that she associated with one particular song on her playlist. Though she was not successful in this, she still reported positive responses to the listenings. It is possible that her listening to other music during this experience may have helped to quickly remediate these

negative responses. The other music she chose brought a more positive experience, thus allowing her to hold onto the favorable overall response.

Early in the interview, Interviewee 4 stated that the music didn't change his mood because he was generally emotionally stable. He did note that his mood guided his music choice, and because he was in a positive mood, he typically chose music that would reflect this mood. At the end of the interview, he did say that the music listening would take him from "a high level to an even higher level," and that the experiences were always enjoyable.

Interviewee 1 commented that after listening her mind felt clear and her body felt happy. She discussed the dichotomy of feeling both physically reenergized and mentally rested at the same time, and stated that music can "shift mood". Similarly, Interviewee 3 felt that music could help with "releases in the body", and that her body responded favorably to the music. When her body felt more relaxed and she felt a sense of physical release, her mood improved.

Several participants shared that they looked forward to the at-home listening experiences, and that it became a special part of their days. Interviewee 4 viewed his participation as "an adventure," because he had no idea how he would react to the music. Interviewee 3 found listening to her music "very powerful" and that the listening experiences were "amazing".

In addition to strengthening positive moods, Interviewee 3 found that listening to music in a focused way allowed her to be more "single task-oriented." This was in contrast to her typical state of trying to do several things at once. It gave her a deeper focus and helped her in her everyday life to block distractions. The music made her "more present."

Physiological responses. Many participants found either new, or reinforced methods to deal with physiological responses to the music. This may be explained from two standpoints. One is that music is inherently rhythmic, and the human body too is rhythmic. Therefore the connection between music and the body may be felt on a deep physiological level. Also, because two of the four listening techniques focused on the body and kinesthetic responses to the music, it was assumed by this researcher that there was bound to be to physiological responses. Both feelings of physiological arousal and calming were reported. Interviewees 1 and 3 seemed surprised that sometimes they experienced these sensations concurrently. Specifically, Interviewee 1 “enjoyed” how her body felt, as she realized she “could be both re-energized and restful at the same time.” Table 25 provides an illustration of the data examples regarding physiological responses to the protocol.

Table 25

Category, Concepts and Data from the Theme “Physiological Responses”

Category	Concepts	Data Illustration
Release	Tensions felt in body were released	<ul style="list-style-type: none"> • “I had some tension and on its own when I was listening to the music, the tension, I felt it release.” • “The music allowed it to resolve.” • “Music allowed releases after working in our bodies. The releases would come either in the form of tears or a release in the body, or the ability to stretch something out that I couldn’t do before.”
Body memory	Somatic memories of movement were experienced	<ul style="list-style-type: none"> • “For me body awareness comes through sound.” • “The one that required movement, I tend to move.” • “Because its rhythm, it’s movement to the rhythm of music.”
Arousal	Body felt energized	<ul style="list-style-type: none"> • “It made me feel refreshed.” • “My rhythm [in movement experience] matched the music that I was doing at the time.”
Calm	Body felt calm	<ul style="list-style-type: none"> • “I chilled out.” • “It was very yoga-like.” • “I can plug in, put on earphones and sack out and just listen.”

Release. During the body awareness listening technique, Interviewee 3 who is an avid yoga practitioner, noticed that listening while focused on her body allowed her to “feel releases” in tensions that she’d “been working on” in her yoga practice. She used music similar to what is typically played during her yoga classes. At the conclusion of this experience, she found that she felt a greater sense of relaxation and openness throughout her body. Interviewee 1, also a yoga practitioner, had a very similar experience. She became aware of tension throughout her body that she was previously incognizant. As she listened to what she described as “chill out music,” she felt this tension release. This allowed her to feel better physically, which also lightened her mood.

Body memory. During the body listening technique, Interviewee 4 who has strong connections with rhythm in general, reported experiencing the rhythm of his chosen music throughout his body, even though he was reclining quietly while listening. This experience brought back memories of dancing with his wife, who is deceased. He found this positive, even feeling like his body was dancing with her though he was sitting still. This somatic experience was very meaningful for him. This same interviewee chose waltz-time music for the movement technique, and thus was able to dance a partner-less waltz in imitation of how he used to dance with his wife. This brought back tender memories of her, and he enjoyed reconnecting with his past training as a ballroom dancer.

Arousal. There were many comments that reflected upon feeling more energized, particularly after the movement technique. Two interviewees chose to dance, and another knitted while she listened. One dancer, Interviewee 1, reported feeling “more alive” after her experience. The knitter, Interviewee 3, found that the pace of her knitting and the tightness of her stitches

corresponded with changes in the music, specifically the rhythm and the volume. Even indirectly, the music impacted her physical responses.

Calm. A sense of calm was reported during many of the techniques. Interviewee 2 used the stretches that were provided in the participant handouts for her movement experience. She found this experience enjoyable and relaxing, calling it “yoga-like”.

Relationship with music. There were many interesting insights reported about the experience with the music and the interviewees’ relationships with music. It became clear that although the interviewees were already familiar with the music used for the there was some type of shift in their experiences with the music. These insights occurred through the interviewees’ personal associations with the music, their reconnection with music, new awareness of music, the temporal experience of the music, and new ideas about their use of music in their lives. See Table 26 for a comprehensive representation of data related to interviewees’ relationship to music.

Personal associations. Because this research protocol was designed using the resource-oriented approach (Rolvsvjord, 2010), the participants used self-selected music that they enjoy and find meaningful. The participants were instructed to choose music to which they had positive associations. Not all participants followed this direction, and instead chose music that held sad memories. The associations the participants had with their selected music – both positive and negative – were important in this process, and some experienced shifts in these associations.

Table 26

Category, Concepts and Data from the Theme "Relationship to Music"

Category	Subcategory	Concepts	Data Illustrations
Personal associations	Significant persons	New connections with memories of significant persons	<ul style="list-style-type: none"> • "As much as I love that song, it brought back sadness because my granddaughter sang it at my husband's memorial service." • In reference to a song that reminded her of her mother's death, "When it was on this [on the study MP3 player], I didn't have the same reaction. It changed the memory." • Discussed memories of dancing with wife, and how the rhythm of the music reminded him of these experiences. • "I was trying to hold the image of a pond in the back of our house in Vermont and the woods."
	Significant places	Evocation of memories of places	<ul style="list-style-type: none"> • "I was thinking of a trip I took in my late twenties to France. I was traveling all over France in my imagery." • "When you chose the music, and had to think of somewhere that it reminded you. I had no trouble with that because I've been to plenty of places." • "There was so much associations with the music itself. You have all these memories come back from it, both what you were doing at the time and also the artist."
	Significant events	Connections with events from past	<ul style="list-style-type: none"> • "It [listening to music] brings back the fond memory of the night." • "I remembered being at plays, and being dressed up." • "It made me think of many things I had been exposed to." • Discussed memories of music experiences from childhood, and how the music he chose reminded him of these times.
Awareness of music		New awareness of music heard in everyday life	<ul style="list-style-type: none"> • "I noticed music in other places that I hadn't been noticing before." • "It was a different way of looking at music and a new awareness." • "I think I'm a little more aware. When I went to the symphony the other night, I'm usually pretty aware, but maybe a little bit more." • "I was able to separate out the lyrics with the music." • "When you are in a relaxed state and getting to hear how the music is actually put together, I enjoyed very much. The headphones separate it out."
		Newfound ability to hear complexity in music	<ul style="list-style-type: none"> • "I discovered things I had never heard." • "It was almost like a new piece." • "It made me much more aware of how the sounds vibrate, and it has so many layers as well." • "It was changing the focus of how you listen to the song. The first time I heard it, I was just listening to the rhythm."
Lingering effects of music		Positive effects of music listening continued after experience concluded	<ul style="list-style-type: none"> • "Music lasts with me. Quite a long time." • "It didn't seem to necessarily end when the music was over."
Future with music		Desire to maintain the newly discovered or rediscovered relationship with music	<ul style="list-style-type: none"> • "You go through periods where you don't as much at home [listen]... I want to be reminded that this is something I can do." • "I have enjoyed keeping the purposeful uplift there." • "I am trying to use what I have [CDs]". • "It was just different ways of looking at music and a new awareness." • "I want to take voice lessons and I actually found a voice teacher." • "I remembered how much I love different styles of music." • "I brought who I am and my relationship with music into the study."

Interestingly, for the focused listening experience, Interviewee 1 purposefully chose a piece of music in which she had a “bad association” due to the music video that had been popular. She opted to use this piece because she wanted to try to work through this negativity. She found that while it helped her gain a new appreciation of this music, this visual memory held strong.

Significant persons. Three interviewees shared their experiences with songs that are connected with deceased loved ones. Two of these interviewees chose specific songs for their playlists that were closely tied to their loved ones. Interviewee 2 chose a song played at her spouse’s memorial service and Interviewee 3 chose a song that she associated with the time of her mother’s illness and death. For Interviewee 2, she chose to listen to this song during the positive imagery technique. Hearing this music in such a focused state brought her sadness, and she found she couldn’t hold a positive image. This interviewee reported having difficulty with this particular protocol as a whole. It could be that the sadness associated with this song stayed with her, making it difficult for her to shift into a more positive state of mind. Yet, she reported that it was still an enjoyable experience for her. She stated that even though she struggled to hold a positive image and she experienced sadness remembering her husband, she still was happy to hear great music.

Interviewee 3 actually hadn’t listened to this particular song for years before finding it on her playlist, as it was too difficult for her emotionally. She was one of the participants who listed artists without specific song titles for inclusion on the MP3 player. So the inclusion on this song wasn’t her direct choice. It should be noted however that in the context of the music listening with varying techniques, she found that by listening repeatedly to this song, she was able to develop a new relationship with the song. The song shifted from bringing sadness, to a more

pleasant, neutral experience. She expressed the ability to hear the song for itself and the beauty of the song, and not just in the context of the sad memories she associated with the song. She found greater enjoyment of the song and was able to listen to it again.

Interviewee 4 shared that some of the listening techniques, in addition to the music itself, reminded him of his deceased wife, and in particular dancing with her. He found this very meaningful and enjoyed experiencing the sense of connection with her and his memories of her.

Significant places. Several interviewees reflected on the memories of travels to other countries that the music evoked. This was especially evident in the positive imagery technique, as these interviewees' positive imagery related to special places they had traveled. Sometimes these memories or places had shifted from reality to take on some imagined qualities. For Interviewee 3, her imagery of this place was a surprise to her, as this was a departure from her usual meditative imagery experiences. She posited that this was because the music she chose for this experience elicited these memories, whereas when she uses music for meditation, it is usually of a different genre.

Interviewee 1 had strong memories of her hometown and her life experiences as a child there. This was due to the gospel music she had included on her playlist that she hadn't heard since that time.

Significant events. Music was found to connect some interviewees with past events in their lives. Interviewee 3 commented that listening to the music reminded her of attending concerts and other cultural events, particularly with her family as a child. She found these memories very dear to her, and she enjoyed reliving these experiences through the listenings. In the same vein, Interviewee 1 felt clear memories with concerts she had both attended and with

music-making experiences in which she had engaged in the past. This reminded her of the joy she feels in listening to good music and in making music with others.

Memories of listening to music on the radio as a youth were evoked in Interviewee 4. These memories included his father's love of Western classical music, playing soldier while listening to marches as a child, the first time he saw a Scottish pipe and drum band, and listening to jazz on the radio as a teenager. His music choices reflected these memories very directly.

Awareness of music. An often-repeated theme in the interviews was that of a new awareness of music, both within the music itself and of the music that is experienced in everyday life. All of the interviewees discovered a new depth in their ability to hear the music, and the layers of sound within their chosen pieces. Comments were made about connecting with the complexity of the music no matter the genre, and the skills required in writing and arranging music. Interviewee 2 stated that she "discovered new things never heard before", and that familiar songs were "almost like new" pieces. This was regardless to the fact that these were familiar pieces to the participants. Interviewee 3, who was very connected with the lyrics of the music she chose for this experience, found she was able to separate the lyrics from the music. This led to more meaningful listening experiences for her. These new realizations were often experienced during the first listening technique of focused listening.

Interviewee 1 found that "being forced" to sit and focus on the music to be very meaningful. For her in her daily life, music typically takes a background role. To truly listen to the music brought a new awareness of the elements of the music, and she found that she was very drawn to the rhythm of her choices. She experienced this rhythm within her body, and

found that her body could quiet and become more restful, yet feel re-energized by bringing the sense of rhythm internally.

Lingering effects of music. A phenomenon was the continuation of the music experience after the listening was completed. Two interviewees specifically and independently observed that the experience of the music stayed with them after they finished the techniques. Interviewee 2 stated that the “music would last with me quite a long time.” Similarly, Interviewee 1 said that the positive responses continued, “even after the music ended.” This supports Harrison, et al. (2010) in their findings that mood changes were noticeable for the entire day after music listening in persons with dementia.

Future with music. Several interviewees shared their desire to maintain and further develop their newfound reconnection with music. Also, listening to music that they chose for the playlist triggered memories of other music that they had once been connected to, and they now desired to listen to that music as well.

A plan to incorporate music listening more fully into everyday life, even if it is background and not as intentionally focused was a common theme. Interviewee 1 said this would “keep the uplift (experienced during the study participation) there.” A desire to discover music of other cultures, and to develop connections with new music was expressed.

Interviewee 3 was so moved by the experience of reconnecting with music that she decided to take voice lessons. Being reminded on such a deep level of the importance of music in her life, she felt the desire to “bring pleasure to her life”.

CHAPTER 5

DISCUSSION

Despite the obvious flaws of the design and issues of data collection, the overall study data give support for the Intentional Music Listening protocol as having a positive impact on the participants' perceived state of well-being. The data are preliminary and further investigation with greater rigor is needed. Although the modified PANAS only showed weak statistical support for the protocol, the rich data collected on the diary cards offered a bit more support for the experience.

Data Integration

In relation to the quantitative measures employed in the research, there are several considerations. The PANAS data showed weak support for changes in positive and negative affect. The researcher is unable to speculate whether the use of the full PANAS as intended would have shown any stronger evidence. It is worth considering if perhaps measuring a different dimension of well-being, such as mood, happiness or coping, would have shown different results. However, as DeNora (2013) has recently discussed, the use of surveys to measure well-being may not be ecologically valid. Although they were attempting to measure lived experience, these measures were completed outside of everyday life, and were retrospective in nature. Thus, it is challenging for participants to respond authentically.

On the diary card measure, a scale of 1 – 5 was utilized for self-report of well-being before and after listening. In some cases, participants rated themselves as starting at 5, leaving no room for improvement. This led to a decision to include the well-being score before listening as

a predictor variable, or covariate in the regression analysis. As it was, changes in well-being were only slight overall, ranging on the scale by .85 to 1.16 across the different techniques. This is not much better than what Sloboda, O'Neill, and Ivaldi (2001) found for self-rated change in affect after everyday instances of musical exposure (not focused listening). However, Sloboda (2010) states that "small emotional differences from day to day can have enormous cumulative effects" (p. 495). A scale with greater range, perhaps 1 – 9, may have been more sensitive to subtle changes in perceived well-being, and may have caused participants to indicate their before- well-being state near the top rather than at the ultimate data point. This is clearly supported by the responses of every interviewee, that listening to music within the context of the protocol strengthened their already positive mood states.

It is interesting here to more fully consider the qualitative data in reference to well-being and affective responses. A predominant theme in the interviews was that of experiencing a positive mood, specifically strengthening their positive moods, and a greater state of mental focus. This suggests that although the quantitative data was weak (particularly the PANAS), the participants experienced the music listening experiences as generally positive and found benefit in participation. In addition, their physiological responses were overwhelmingly positive, experiencing a sense of release, positive somatic memories, and feelings of being both energized and calm.

Although no single variable was found to have a significant effect of well-being in simple bivariate measures, it was found that that listening duration had a significant correlation with the improvement of reported well-being in the multivariate regression statistics. It may be necessary to examine the length of the listening experiences more fully. There was no control on this

variable, and no control was intended as the listening experiences were participant-driven. The listening times varied greatly, from three minutes to two hours. The mean listening length was 23.61 minutes. The participants were requested to listen for 15 – 20 minutes per technique. This length was chosen by the researcher based on personal experience and on anecdotal recommendations for meditation. It seemed that this length would be sufficient time for the participants to get into the technique without inconveniencing the participants too greatly. The results of the data demonstrate that perhaps increasing the recommended length would prove to have greater benefit to well-being. Two of the qualitative interviewees shared that they listening for far longer than the minimum requirement of the study protocol, often longer than an hour. They stated that they continued to listen because it was enjoyable and listening brought them pleasure.

Another result of the more complex data analyses was that the Technique 1, focus on music elements, produced less change in well-being than the other three techniques. This was surprising to the researcher, because much of the qualitative, open-ended diary card responses, and anecdotal responses were generally positive. This may be due to the fact that this was the first technique utilized, and perhaps there was a learning curve for both participation and for measure completion. Similarly, the response to the open-ended questions about Technique 4, movement, showed a lower amount of overall responses, particularly on the last open-ended question – asking about body feelings – which directly relates to this technique. Yet this technique was rated quite highly as a favorite in other forms of data. Also, Technique 3, body awareness, facilitated in the second week of participation had the lowest number of responses in the open-ended questions. This is a point of interest in light of the fact that there were significant responses during the qualitative interviews that related to positive physiological response. An

entire theme was discovered based on their physiological experiences. There are many possibilities for the incongruence. It could simply be that the more music-focused techniques produced more internal responses than the more kinesthetic techniques. It could also be that survey fatigue became a factor, or that the respondents were more efficient in expressing their responses. A future study should be done randomizing to investigate these possibilities.

In looking at the overall responses to the open-ended questions, the overwhelming majority of responses were positive in nature. It is encouraging that when looking at the diary card responses by study identification number, no individual participant had negative responses throughout the entire protocol. In most cases, it was one or at most two techniques that elicited any negative descriptors for these questions.

Each participant was asked to indicate the music to which they listened during each technique. These responses proved to be vast and varied, and weren't analyzed for this study. Even within each participant's music choices were wide variations of genre and tone of music. It might be valuable in the future to examine the kind of music individuals choose for the different techniques to perhaps make more precise recommendations on the type of music that may be beneficial for each technique. At the same time, care should be taken that ultimately it is participant choice that drives the music selection, as this protocol is intended to be a resource-oriented approach, calling for individual autonomy and empowerment.

No matter the type of music, which was quite varied in the qualitative interviewees, they all verbalized experiencing some deepening or shift in their relationship with music. This shift was sometimes a reconnection with music, with their musical selves, or with their personal associations with music. Other times the shift was in a greater awareness of music, both in

everyday life and within the music itself. This phenomenon was invariably experienced as positive, and for some the most meaningful benefit of participation.

Reflections on the Protocol

Through both the interviews and the researcher's experience facilitating the research, much was learned about the protocol and the viability of these music listening techniques as potential resource-oriented clinical protocols. These insights are categorized by the component of the protocol.

The music and use of music players. When asked to provide the researcher with a list of music, some participants were very specific with their music choices, giving clear song/pieces and artists/composers/performers. Western classical music was the most challenging music to gather. There are many different performances of each piece, and each performance has its own unique qualities. Several participants commented on the differences between the recordings they were familiar and the ones I had loaded on their MP3 players. It is possible that these changes impacted the participants' responses to the listening experiences.

Some participants gave a performer/artist, but not specific songs. Even when prompted, several people responded that any song by the performer/artist would be acceptable. One such interviewee stated that she was curious what she would hear on the MP3 player. When not given specific songs, the researcher loaded a variety of "greatest hits" tracks from the artist to try to provide a range of the popular songs by that artist. In at least one case, this proved to be a challenge in keeping with the intent that the music hold positive associations for the participants. This was demonstrated by the responses of two interviewees as discussed in Chapter 4.

The selection of music that held positive associations proved to be challenging for other participants as well. One interviewee who was specific about the music included on her playlist

chose a song she specifically associated with her husband's memorial service. Fortunately, she was able to transform this into a positive experience. Garrido and Schubert (2013) found this ability for individuals to actually feel enjoyment of the strong emotions experienced while listening to sad music, or in this case, music that is associated with a sad event. There was also an instance in which a participant (who was not interviewed in the qualitative phase) indicated on the corresponding diary card that s/he chose to listen to music that reminded him/her of difficult times of her past. As such, s/he reported a decline in his/her sense of well-being at the conclusion of the listening experience. In considering Garrido and Schubert's (2013) work, it is possible that this individual was ruminating in these feelings with music associated with a difficult time in his/her life, which caused feelings of dysphoria instead of catharsis or release. Depending on the psychological state of the individual, this could have proved to have an overall deleterious effect on this participant. When looking at this participant's overall data, s/he seemed to have more positive responses to other experiences using different song choices. This also lends credence to the facilitation of these experiences by a trained music therapist, and suggests that a more direct exploration of experiences would have been beneficial. These participants did not share these responses during the group meetings, and one happened after the second group meeting. It may be beneficial for the music therapist to individually "check in" with each participant, even after the conclusion of the groups to monitor for potentially detrimental effects. Had the researcher been aware of these responses after they occurred, these responses could have been explored and processed more fully, and the individuals could have been more effectively coached to choose music that would have more positive effect.

Many research participants had their own digital music players, and several requested to use their own devices. This was acceptable by the researcher since the use of the MP3 players was to ensure that each participant have a device to use during the group meetings. In addition, it is likely that an individual's personal player likely contained a greater selection of preferred music. The danger of this use was the potential for participants to choose music that they did not find inherently positive. This also was considered an acceptable variation in protocol in that realistic practice of these techniques would likely involve participants using their own portable devices.

Purely by chance, none of the four interviewees owned any sort of digital music device during the study or at the time of their interviews. Two reported being so attached to them that they didn't want to return them at the completion of the study. Though they had much of the music on CD or other media, having the music that was special to them on the player was meaningful. One participant commented on the convenience of having this music "at his fingertips" rather than searching through his media. One participant found that she felt "hip and cool" using this technology.

Another interesting aspect of the technology of the study was the experience of using of headphones or earbuds. Participants were given the option of using their own headphones or the small earbuds that were included with the MP3 players. Every interviewee spoke of the use of the headphones without prompting. All reported very positive responses in using headphones. One participant said that the headphones changed her listening experience, in that they allowed her to "separate out" the musical elements. All reported surprise at the quality of sound they experienced. During the group meetings, other participants also commented on the use of the

headphones as being a positive experience to their music listening. Common themes were the clarity of the music and the ability to more fully immerse themselves in the music without extraneous noises and distraction. This echoes the findings of Skångard (2013) who found that earbuds “created a private space within which the informants could more easily focus on their own states of mind” (Mobile Music Listening and Mood Regulation section, para. 2).

Groups and group environment. Of the four interviewees, three indicated that attending the groups enhanced their experience. When asked, all agreed that they could have done the protocol with only written instructions, but that there was benefit to attending the group, both from an instructional standpoint and socially. Instructionally, participants commented on the benefit on their understanding of the listening experiences. The guided practice of each technique was helpful, giving them structure and focus. Direct instruction and practice using the MP3 players were also found to be beneficial, as well as the opportunity to ask questions. One interviewee found that attending the group was “fascinating” as she was able to meet new people and learn from their experiences. Similarly, another interviewee found a greater level of self-awareness in comparing her experience with the other group members. Enjoyment in making connections with other group members was also found to be favorable. One interviewee commented specifically on her appreciation of getting to meet the researcher. She said it was enjoyable to “put a face” to the digital interactions that preceded the groups. One interviewee said that while he didn’t mind the groups, he could have “done without them.” Specifically, he found other group members distracting as he was practicing the music listenings.

This suggests that in-person coaching of the techniques was helpful for most participants. The researcher speculates that having face-to-face connections with the participants may have

influenced their desire to complete the requirements of the study. It is unclear if the size of the group had an impact on the perception of the groups. Of the four interviewees, three attended with a group of three persons (all different groups), and one attended in a group of six persons. No specific comments were made about the group size by the interviewees or anecdotally during the groups.

Most participants in the study did comment on the comfortable environment for the group meetings. Most groups were held in the large room in a local facility familiar to the researcher. This room had several large couches, offering comfort and sufficient space. Another group was held at a yoga studio, with a proliferation of mats, pillows and blankets. A pleasant environment seemed to help the participants be more comfortable in participating in the group experiences.

One large group was held at a participant's home. The group was composed of her friends and colleagues. The group meetings were scheduled just after their workday. It is possible that this impacted the participants' experience of the protocol, not simply because of the environment, but rather from attending the groups with people whom they were comfortable.

At-home practice. Based on interview responses, it seems that the at-home listening requirements were manageable and reasonable. Three of the four interviewees listened for significantly longer times than the recommended 15-20 minutes per experience. They found that they enjoyed listening because it was a pleasant experience. This serves as further encouragement for study of the optimal listening duration experiences for well-being change. The interviewees overall reported a positive experience with the listening protocol, and they tended to listen longer than the recommended time. One of the interviewees listened for up to two hours per technique. Though this length may not be feasible for all individuals it is worth

considering how long of an experience will provide optimal benefit, balanced with the constraints of varying individuals' everyday routines.

It seemed that the interviewees were motivated to complete the at-home listening experiences. One interviewee reported that it was sometimes difficult to find a quiet space and time; but she was so eager to listen to her favorite music she always fit it into her busy schedule. Another participant said that she looked forward to the at-home experiences, that she made it a special part of her day. The practice of the techniques at home seems to relate to Ruud's (2013) suggestion of health-related music listening taking place within a certain ritual structure in order to prepare the individual to enter the mode of experience.

Techniques. The impetus for choosing these four experiences was based in music therapy literature (Bruscia, 1998b) and in learning modality strengths (visual, aural, and kinesthetic) identified by Barbe, Milone and Swassing in the late 1970's (Wilson, 1998). It seemed likely to the researcher that people will be drawn to and be successful in varying types of experiences. The differing techniques engaged participants aurally, visually and kinesthetically. This seems to have been effective, as there were varying responses to each of the experiences, except for the overall popularity of the movement experience.

Musical elements. This technique seemed to be a favorite of the interviewees, and likely one of the easiest in which to engage. It was the first technique coached during the study, as it seemed the most straightforward. All interviewees gave positive feedback of this technique. Because of the flexibility on the part of the listener during this technique, it was easily employed with any chosen music. Therefore, no special instructions were needed.

Positive imagery. This listening technique led to the most varied responses from the interviewees. It should be noted that after the second interview, the verbal directions were further

clarified to help participants have a more successful experience. The second interviewee had difficulty with this experience, in that she found it challenging to hold her pre-selected image with the music she chose. This led me to be clearer with groups to consider their music choices more carefully for this experience, and to reinforce that it was acceptable to change their music if it didn't suit their imagery experiences, and that it was acceptable for the imagery to shift during the experience as long as it remained a positive and pleasant experience.

It is interesting when considering that in the diary card data, the lyrics were the most often salient component of the music during this technique. It could be that the lyrics may have distracted the imagery process for some participants. An interesting comparison would be to repeat this technique asking the participants to use instrumental music, or music with either lyrics in a language other than their own or with music that employs chanting techniques. It is also worth considering that the overall diary card data for this technique showed a high number of positive responses regarding mood.

Two of the interviewees were yoga practitioners and meditated regularly, and thus had prior experience with imagery. One interviewee, however, was worried about this technique as she had not been successful with visual imagery in the past. The description of imagery used for this technique was very wide, including colors, memories, people, or places, real or imagined. She said that this "opening the concept of imagery" to her, helped her be more successful. She found it helpful to have more options about what an image could be. She chose a color to focus on while listening and found the experience pleasant, which surprised her based on her history with imagery. Having a variety of options for participation proved to be helpful.

Body awareness. This experience led to mixed responses from the interviewees. The instructions were to be aware of any responses felt in the body, real or imagined, while listening

to the chosen music. It seemed that when participants chose a body part in advance, thereby limiting their open awareness of the body, their experiences were less meaningful and positive. For example, an interviewee tried to focus on one body part, and reported having difficulty staying focused because she couldn't maintain connection with this part of her body. It seems that this limiting of the experience, rather than opening her awareness to whatever the music evoked, made it challenging for her. Here was an opportunity for greater clarity in the instructions for this technique, encouraging participants to allow the body to respond to the music in any way that comes naturally, rather than trying to force responses.

Movement. All interviewees described positive responses to and enjoyment of this experience. In the groups, in order to facilitate group practice a set of light stretches were utilized. These stretches were illustrated on a handout given to the participants. They were instructed that they could use those stretches at home, or that they could move to the music in any way that they preferred. As with the focused listening, this experience seemed relatively easy to understand and to engage for the participants.

Data collection. This study required significant use of technology with modifications being utilized as necessary. Two of the 40 participants were not computer users. All contact was made with them by telephone, and they submitted data by hard copy. They were provided with researcher-addressed, stamped envelopes and they mailed all completed paperwork at the completion of their participation. A colleague of the researcher's inputted the data into the online survey tool. As it happened, these two non-users were in the qualitative component of the study. They reported no difficulty with this method of data collection. One drawback noted by the researcher is that because they mailed all of the paperwork at the same time, they were able to compare the pre- and post-tests, as well as all the diary cards. This may have affected their

reporting between sessions and between the pre- and post-tests. It is recommended that in using this form of data collection, each survey and diary card should be mailed immediately after completion so as to not influence future reporting.

Of the remaining participants, including the remaining two qualitative interview participants, only minor issues were reported. In the first group, there were technical issues with the set up of the diary cards in the online survey tool were quickly remedied. This occurred despite several test runs by the researcher. A better strategy would have been to have colleagues of the researcher run dummy data in order to test the surveys and diary cards for glitches. The issues did not deter participants from the requirements, but were minor, avoidable annoyances.

Impact of the Researcher on the Process

In this research study, a dual role occurred as the group facilitator was also researcher. This dual role undoubtedly impacted the results of the study, as well as the experience of the participants. Throughout the data gathering process, both during the groups and during the interview process, the researcher took notes on her process and reactions to the process. This served to help in understanding the researcher's impact on the research, to make decisions about when to minimize this impact and when to use it to benefit the process, and how to manage the researcher's personal experiences. The following is an analysis of the researcher's impact on the study.

Instructions. As groups were facilitated and as feedback was offered both anecdotally from participants and more formally in the interviews, verbal descriptions of the four experiences became clearer. The researcher was able to more explicitly describe not only the technique, but also suggestions on how to choose the music to accompany the techniques. This was a conscious choice, even though the researcher was aware it could impact the results of the participation of

future subjects. It seemed worth the potential because it led to a richer experience on the part of the participants.

For example, the positive imagery experience needed to be clarified. Initially, participants were instructed to think of a positive image, and then focus on that image while they listened to the music. This method was chosen to preempt the possibility that the music would evoke emotionally challenging images, and the intent was to keep the experience positive. This proved to be problematic, as without clearer instructions about music choice, the music might not support the pre-selected positive image. This led to a shift in instructions to choose music that would support the positive imagery. This was slightly more helpful, but there was still a strong possibility that the music might elicit images other than those that were pre-selected. In the early groups, participants commented that this was a challenging experience to align song choices with the positive image they had preselected before listening, as per the instructions. Participants often reported that they had difficulty holding the preselected image with the music, or that the music was encouraging different imagery. So instructions were made clearer that participants to be more conscious of their music and imagery choices, and also to be open to shifting imagery so as long as it remained a positive experience, as was the purpose of the technique.

Techniques. The researcher acknowledges personal bias about each of the listening techniques based on personal experiences with each of them. It is likely that this bias may have impacted not only the way in which these techniques were implemented within the group context, but also the in the written and verbal instructions.

Extensive experience with music and imagery likely prevented the researcher from anticipating the struggle some participants would have with the positive imagery technique. Upon further reflection, it may have been better to change the technique even further. Perhaps a

better technique would have been for the participants to choose songs that they associate with positive memories, and then focus on these memories while they listen to the songs. This would likely have kept the music and the images in closer harmony.

Conversely, the researcher's discomfort with creative movement to music led to the implementation of the stretching techniques that were utilized during the group meetings. This served a purpose for the groups, but most participants chose other movement experiences during this technique. Only one interviewee used the stretching protocol. It does seem prudent to offer this option, but it is possible that this option may have stifled the creativity of some participants.

Study Limitations

Though the author attempted to adhere as closely to a randomized control trial (RCT) method as possible, with the realities of human participation, exceptions had to be made, as noted in the Method section of this paper. These alterations of the protocol in some instances were necessary to simply make the method workable, and in some instances to retain participants. It was very difficult to recruit participants, and some didn't meet the necessary qualifications, or could not commit to attending the groups. The sample size is small and quite unintentionally homogeneous. This suggests perhaps the methods of recruitment were not effective at reaching a sufficiently diverse audience.

Another issue is the incomplete submission of study artifacts by participants. Every survey is missing data points. For members of the experimental group, there were six required submissions and seven for the waitlist control group. The PANAS submissions were time sensitive. This can be attributed to many factors, e.g. unclear directions from the researcher, misunderstanding of directions by participants, technology issues, or simple noncompliance.

This had an impact on statistical significance, which was already quite weak due to the low N and the suboptimal study design.

Additionally, the measures themselves present limitations. DeNora (2013) critiques appropriateness of RCT's in music therapy, including the use of surveys to measure well-being. She stated that survey measures, which are completed outside the context of everyday life and are retrospective in nature, might not be ecologically valid. This decontextualization may lead to responses that are not authentic. Another threat to authenticity of responses is the fact that the researcher also served as the group facilitator. This dual role undoubtedly impacted the results of the study, as well as the experience of the participants. It is possible that the overall positive direction of reported well-being on the diary cards could have been influenced by the participants desire to please or help the researcher.

Recommendations

Future research. There are a multitude of possible research topics arising from the study. The author will highlight a few that seem most salient. As noted in the Quantitative Results section of this paper, the study design was flawed. A future study would ideally have the experimental and waitlist control group participate in the groups separately and consecutively. This would help control for outside factors having an impact on affect and well-being scores. This study was adequate, but there may be better measures available to study well-being that are more contextual and more ecologically sound, and perhaps focused on music rather than the generalized conceptualization of well-being. An interesting new scale is the Brief Music in Mood Regulation Scale (B-MMR) recently developed by Saarikallio (2012). This scale is used to assess mood regulation through music in individuals' self-chosen, voluntary engagement in music. This measure seems to be applicable to the intent of this protocol, and may serve as a valuable tool in

measuring the effects of this protocol on participants' use of music to regulate mood. Comparing the Intentional Music Listening techniques with other self-focused activities (e.g. yoga, meditation) would also provide richer data about the protocol.

As discussed previously in this chapter, the well-being measure may not have been sufficiently sensitive to detect subtle changes in perceived well-being. It also suggests that persons in positive mood states may have “nowhere else to go” on the scale. It might be valuable to study the effect of these techniques when the participants engage in the techniques when they are in a negative mood state. Konecni (2010) states, “good-mood maintenance is less important than bad-mood repair” (p. 716). On the surface, this statement seems contrary to the tenets of positive psychology (Seligman & Csikszentmihalyi, 2000). However, positive psychology promotes the need to *develop* positive emotions as well as strengthen them. In this way, using music to empower individuals to improve their negative moods will help them achieve a more positive state of well-being.

There is also much opportunity to adjust different variables for study. The length of the listening experience is a clear area for further testing to determine the optimal length for greatest benefit. It would be helpful to investigate the order in which the techniques are introduced and practiced to see if there are any changes in responses. Music choice is another ripe area for investigation. There are myriad considerations about music choice that could be studied to determine how best to implement these techniques. Finally, though not studied as a variable in this paper, determining optimal frequency of listening would be a helpful consideration.

Future directions for the protocol. Rolvsjord (2010) is very clear to identify resource-oriented music therapy as an “approach” to music therapy. Her intention in this clarification is to

establish that it is not a general theory for music therapy, but rather an orientation that informs the context and aims of music therapy. She does not identify specific interventions, experiences or techniques that fit into this approach. Rather, it seems up to the individual music therapist how to incorporate this approach into his or her practice.

A review of the current practices that have been classified as wellness-based music therapy practices indicates that they may share common characteristics with the resource-oriented approach, but may lack a vital component or the essence of the approach. Thus, it seems that a logical step in the development of resource-oriented music therapy is to more clearly delineate music therapy practices that embody this approach. Being a newly developed approach, there is a need for more exploration of resource-oriented music therapy, and how music therapists can practice using this approach. It is not enough for the approach to be conceptualized; practical application – and dissemination of the outcomes – must follow.

In light of the well-documented use of music listening for personal and therapeutic benefit, and the effects of music on affect and affect regulation, developing a resource-oriented technique based music therapy technique using music listening seemed a logical beginning. There is much support for the benefits of music listening, both in clinical and everyday situations, but limited documentation of the use of individual music listening as a resource with the assistance of a music therapist (Batt-Rawden, 2010; Batt-Rawden, DeNora & Ruud, 2005; Hanser, 1990; Hanser, 2011; Hanser & Thompson, 1994). This study was a first step in determining the feasibility and potential benefits for the employment of psychoeducational music listening groups in regards to well-being and personal satisfaction. One desire for future directions of this protocol is to implement these techniques with clinical populations, either in group or individual settings, in inpatient and outpatient services.

Considering the current climate of health care in the United States, more and more individuals are being treated outside of health and medical institutions. Offering music therapy techniques that can be implemented outside of clinic setting – with the support of a clinical music therapist – may offer a new way to reach clients who may otherwise not have access to such services. As a former private client of the researcher stated, “Why should I have to be in the hospital to participate in music therapy?” This protocol for music listening, “Intentional Music Listening,” facilitated by a music therapist with the potential to be practiced individually outside of the therapy setting, may offer one way to engage a wider range of clientele. This protocol presents music therapy techniques aimed at helping individuals develop personal music resources and empower them to be more self-aware and in control of their affective states.

Considerations for implementation of the protocol. A major component of the Intentional Listening Protocol is the use of participant preferred music. This is a generally accepted tenet in the music therapy field (e.g., Batt-Rawden, 2010; DeNora, 2000; van Goethem & Sloboda, 2011; Hanser, 2006; Schafer & Sedlmeier, 2011) and is important in the adherence to the resource-oriented approach to music therapy. Keeping in mind that the intent of the protocol is to improve well-being and nurture inner resources, strengths and potentials, there may be a need for care in music selection. As discussed previously, the positive focus on the protocol does not preclude music that could be described as “sad”, but caution should be exercised. Additionally, caution is advised with the use of music with violent or aggressive themes, degradation of others, high use of profanity, glorification of substance abuse, and other potentially questionable attributes. It is important that the therapist employing this protocol be aware of potential responses of the participants/clients during engagement in the listening exercises. In the

resource-oriented approach negative responses are not to be ignored, but therapists need to be aware of the context of engagement in the protocol. Engagement in the protocol as part of the course of treatment as opposed to in a workshop environment will have far different implications for the therapist to ethically and responsibly engage with participants/clients.

Concluding Remarks

As this document was being completed for submission, yet another example of the need for resource-oriented music therapy techniques both in and outside of the clinical context arose. This occurred during a support group for persons with cancer that the researcher is facilitating during the regular facilitator's leave of absence. This group is usually an art therapy group, and the members agreed to shift to music therapy during this time. At the conclusion of a recent group, a participant stated that she wondered why she had to be sick to receive music therapy services. This directly echoed a statement made by a former client of the researcher some months earlier. Several of the other group participants then shared their enjoyment of and the benefits that they are experiencing as a result of participation, and their desire to tell others about music therapy. Several of them either have already or plan to find ways to bring music more fully into their everyday lives, and to share music with friends and family in a more meaningful manner.

This research lends preliminary support to the Intentional Music Listening protocol with small statistical support, and more significant qualitative validation. A participant in the qualitative interviews summarized this about the positive impact of listening to music using the study protocol, "Their mood shifted [through listening to music], and that in turn can shift many other things too." It is the hope of the researcher that this resource-oriented protocol for music therapy will lead to the development of other such techniques to help expand the practice of music therapy to meet the ever-changing needs of health and wellness practices.

BIBLIOGRAPHY

- Aldridge, D. & Aldridge, G. (1998). Life as jazz: Hope, meaning and music therapy in the treatment of life threatening illness. In C. Dileo (Ed.) *Music therapy and medicine: Theoretical and clinical applications*. Silver Spring, MD: American Music Therapy Association.
- American Music Therapy Association. (2008 – 2011). What is music therapy? In *Definitions and Quotes about Music Therapy*. Retrieved April 10, 2012, from <http://www.musictherapy.org/about/quotes/>.
- Antonovsky, A. (1996). The salutogenic model as a theory to guide health promotion. *Health Promotion International*, 11(1), 11-18.
- Austenfeld, J. & Stanton, A. (2004). Coping through emotional approach: A new look at emotion, coping and health-related outcomes. *Journal of Personality*, 72(6), 1335-1363.
- Batt-Rawden, K.B. (2010). The benefits of self-selected music on health and well-being. *The Arts in Psychotherapy*, 37, 201-210.
- Batt-Rawden, K.B. & DeNora, T. (2007). Music and informal learning in everyday life. *Music Education Research*, 7(3), 289-304.
- Batt-Rawden, K.B., DeNora, T., & Ruud, E. (2005). Music listening and empowerment in health promotion: A study of the role and significance of music in everyday life of the long-term ill. *Nordic Journal of Music Therapy*, 14(2), 120-136.
- Bonny, H. (2002). Music: The language of immediacy. In L. Summer (Ed.) *Music and Consciousness: The evolution of guided imagery and music* (pp. 103-116). Gilsum, NH: Barcelona Press.
- Boothby, D.M. & Robbins, S. (2011). The effects of music listening and art production on negative mood: A randomized, controlled trial. *The Arts in Psychotherapy*, 38, 204-208.
- Bradt, J., Burns, D.S., & Creswell, J.W. (2013). Mixed methods research in music therapy research. *Journal of Music Therapy*, 50(2), 123-148.
- Bruscia, K. (1998a) (Ed.) *Dynamics of music psychotherapy*. Gilsum, NH: Barcelona Press.
- Bruscia, K. (1998b). *Defining music therapy* (2nd ed.). Gilsum, NH: Barcelona Press.
- Busseri, M, Sadava, S., Molnar, D., & DeCourville, N. (2009). A person-centered approach to subjective well-being. *Journal of Happiness Studies*, 10, 161-181.

- Connecticut State Department of Social Services (2013). Federal poverty levels and state median income levels. Retrieved from www.ct.gov/dss/lib/dss/PDFs/PovSMI.pdf on March 9, 2014.
- Crawford, J. & Henry, J. (2004). The Positive and Negative Affect Schedule (PANAS): construct validity, measurement properties and normative data in a large, non-clinical sample. *British Journal of Clinical Psychology*, 43, 245-265.
- Creswell, J. & Plano Clark, V. (2011). *Designing and conducting mixed methods research* (2nd ed.). Thousand Oaks, CA: Sage Publications.
- Cribbie, R. & Jamieson, J. (2004). Decreases in posttest variance and the measurement of change. *Methods of Psychological Research Online*, 9(1), pp. 37-55.
- Croom, A. (2012). Music, neuroscience, and the psychology of well-being: a précis. *Frontiers in Psychology*, 2: 393. Retrieved from: doi: 10.3389/fpsyg.2011.00393.
- Daveson, B. (2001). Empowerment: An intrinsic process and consequence of music therapy practise. *The Australian Journal of Music Therapy*, 12, 29-37.
- DeNora, T. (1999). Music as a technology of the self. *Poetics*, 27, 31-56.
- DeNora, T. (2000). *Music in everyday life*. Cambridge: Cambridge University Press.
- DeNora, T. (2013). "Time after time": A Quali-T method for assessing music's impact on well-being. *International Journal of Qualitative Studies on Health and Well-Being*, 8:20611. Retrieved from: <http://dx.doi.org/10.3402/qhw.v8i0.20611>.
- Diener, E. (2000). Subjective well-being: The science of happiness and a proposal for a national index. *American Psychologist*, 55(1), 34-43.
- Diener, E. & Chan, M. (2011). Happy people live longer: Subjective well-being contributes to health and longevity. *Applied Psychology: Health and Well-Being*, 3(1), 1-43.
- Ekkekakis, P. (2012). *Affect, mood, and emotion*. Accessed online at http://www.public.iastate.edu/~ekkekaki/pdfs/ekkekakis_2012.pdf.
- Fitzsimons, S. & Fuller, R. (2002). Empowerment and its implications for clinical practice in mental health: A review. *Journal of Mental Health*, 11, 481-499.
- Frankl, V. (1946). *Man's search for meaning*. Boston: Beacon Press.
- Fredrickson, B., Mancuso, R., Branigan, C. & Tugade, M. (2000). The undoing effect of positive emotions. *Motivation and Emotion*, 24(42), 237-258.

- Gabrielsson, A. (2010). Strong experiences with music. In P.N. Juslin & J. A. Sloboda (Eds.), *Handbook of music and emotion: Theory, research, applications* (pp. 547-574). Oxford & New York: Oxford University Press.
- Garrido, S. & Schubert, E. (2013). Adaptive and maladaptive attraction to negative emotions in music. *Musicæ Scientiæ*, 17(2), 147-166.
- George, D. & Mallery, P. (2003). *SPSS for Windows step by step: A simple guide and reference. 11.0 update* (4th ed.). Boston: Allyn & Bacon.
- Gold, C., Rolvsjord, R., Aaro, L., Aarre, T., Tjemsland, L. & Stige, B. (2005). Resource-oriented music therapy for psychiatric patients with low therapy motivation: Protocol for a randomized controlled trial. Retrieved from <http://www.biomedcentral.com/1471-244X/5/39>.
- Ghetti, C. (2011). Active Music Engagement and Emotional-Approach Coping to improve well-being in liver and kidney transplant recipients. *Journal of Music Therapy*, 48(4), 463-485.
- Ghetti, C., Hama, M. & Woolrich, J. (2004). Music therapy in wellness. In A. A. Darrow (Ed.), *Introduction to approaches in music therapy* (pp. 127-141). Silver Spring, MD: American Music Therapy Association.
- Grocke, D. & Wigram, T. (2007). *Receptive methods in music therapy: Techniques for clinical applications for music therapy clinicians, educators and students*. London: Jessica Kingsley Publishers.
- Hanser, S. (1990). A music therapy strategy for depressed older adults in the community. *Journal of Applied Gerontology*, 9(3), 283-298.
- Hanser, S. (2006). Music therapy research in adult oncology. *Journal of the Society for Integrative Oncology*, 4, 62-66.
- Hanser, S. (2011). Music, Health and Well-Being. In P. Juslin & J. Sloboda (Eds.), *Handbook of music and emotion: Theory, research, applications*. Oxford & New York: Oxford University Press.
- Hanser, S. & Thompson, L. (1994). Effects of a music therapy strategy on depressed older adults. *Journal of Gerontology*, 49(6), 265-269.
- Harrison, S., Cooke, M., Moyle, W., Shum, D. & Murfield, J. (2010). Delivering a music intervention in a randomized controlled trial involving older people with dementia: Musician experiences and reflections. *Music and Medicine*, 2(4), 214-218.
- Hays, T. (2005). Well-being in later life through music. *Australasian Journal on Ageing*, 24(1), 28-32.

- Hays, T. & Minichiello, V. (2005). The meaning of music in the lives of older people: A qualitative study. *Psychology of Music*, 33, 437-451.
- Hermon, D. & Hazler, R. (1999). Adherence to a wellness model and perceptions of psychological well-being. *Journal of Counseling and Development*, 77(3), 339-343.
- Hoelt, L. & Kern, P. (2007). The effects of listening to recorded percussion music on well-being: A pilot study. *Canadian Journal of Music Therapy*, 13(2), 132-147.
- Juslin, P. & Laukka, P. (2004). Expression, perception and induction of musical emotions: A review and questionnaire study of everyday listening. *Journal of New Music Research*, 33(3), 217-238.
- Juslin, P. & Västfjäll, D. (2008). Emotional responses to music: The need to consider underlying mechanisms. *Behavioral and Brain Sciences*, 31, 559-575.
- Kirsten, T.G.J.C., van der Walt, H.J.L., & Viljoen, C.T. (2009). Health, well-being and wellness: An anthropological eco-system approach. *Health SA Gesondheid*, 14(1), Art. #407, 7 pages. DOI: 10.4102/hsag.v14i1.407.
- Knobloch, S. & Zillman, D. (2002, June). Mood management via the digital jukebox. *Journal of Communication*, 351-266.
- Konecni, V. (2010). The influence of affect on music choice. In P. Juslin & J. Sloboda (Eds.), *Handbook of music and emotion: Theory, research, applications* (pp. 697-723). Oxford & New York: Oxford University Press.
- Krahe, B. & Bieneck, S. (2012). The effect of music-induced mood on aggressive affect, cognition and behavior. *Journal of Applied Social Psychology*, 42(2), 271-290.
- Kreutz, G., Ott, U., Teichman, D. (2008). Using music to induction emotions: Influences of musical preferences and absorption. *Psychology of Music*, 36(1), 101-126.
- Larsen, R. (2000). Toward a science of mood regulation. *Psychological Inquiry*, 11(3), 129-141.
- Laukka, P. (2007). Uses of music and psychological well-being among the elderly. *Journal of Happiness Studies*, 8, 215-241.
- Lesiuk, T. (2005). The effect of music listening on work performance. *Psychology of Music*, 33(2), 173-191.
- Lundqvist, L.O., Carlsson, F., Hilmersson, P., & Juslin, P. (2009). Emotional responses to music: Experience, expression and physiology. *Psychology of Music*, 37(1), 61-90.

- Magee, W. (2007). A comparison between the use of songs and improvisation in music therapy with adults living with acquired and chronic illness. *Australian Journal of Music Therapy*, 18, 20-38.
- Magee, W. & Davidson, J. (2004). Music therapy in multiple sclerosis: Results of a systematic qualitative analysis. *Music Therapy Perspectives*, 22, 39-51.
- Magyar-Moe, J. (2009). *Therapist's guide to positive psychological interventions: Practical resources for the mental health professional*. Academic Press. Retrieved from <http://www.sciencedirect.com.libproxy.temple.edu/science/book/9780123745170>
- Mak, W., Ng, I., & Wong, C. (2011). Resilience: Enhancing well-being through the positive cognitive triad. *Journal of Counseling Psychology*, 58(4), 610-617.
- McFerran, K. & Saarikallio (2013). Depending on music to feel better: Being conscious of responsibility when appropriating the power of music. *The Arts in Psychotherapy*, 41(1), 89-97.
- McKinney, C. (1990). The effect of music on imagery. *Journal of Music Therapy*, 27(1), 34-36.
- Merritt, S. (1996). *Mind, music and imagery: Unlocking the treasures of your mind*. Santa Rosa, CA: Aslan Publishing.
- Miranda, D. & Gaudreau, P. (2010). Music listening and emotional well-being in adolescents: A person- and variable-oriented study. *European Review of Applied Psychology*, 61, 1-11.
- North, A. & Hargreaves, D. (1996). Situational influences on reported musical preference. *Psychomusicology*, 15, 30-45.
- North, A., Hargreaves, D., & Hargreaves, J. (2004). Uses of music in everyday life. *Music Perception*, 22(1), 41-77.
- O'Callaghan, C., Hudson, P., McDermott, F., & Zalcberg, J. (2011). Music among family carers of people with life-threatening cancer. *Music and Medicine*, 3(1), 47-55.
- Pelletier, C. (2004). The effect of music on decreasing arousal due to stress: A meta-analysis. *Journal of Music Therapy*, 41(3), 192-214.
- Ranaweera, S. & Chandra, V. (2009). Concept of mental well-being. Retrieved from www.searo.who.int/linkfiles/meeting_reports_concept_of_mental_well-being_2009.pdf.
- Reich, J., Zautra, A., & Davis, M. (2003). Dimensions of affect relationships: Models and their integrative implications. *Review of General Psychology*, 7(1), 66-83.

- Reuer, B., Crowe, B., & Bernstein, B. (2007). *Group rhythm and drumming with older adults: Music therapy techniques and multimedia training guide*. Silver Spring, MD: American Music Therapy Association.
- Roberts, K., Dimsdale, J., East, P., & Friedman, L. (1998). Adolescents emotional response to music and its relationship to risk-taking behaviors. *Journal of Adolescent Health, 23*, 49-54.
- Rolvjord, R. (2004). Therapy as empowerment: Clinical and political implications of empowerment philosophy in mental health practises of music therapy. *Nordic Journal of Music Therapy, 13*(2), 99-111.
- Rolvjord, R. (2010). *Resource-oriented music therapy in mental health care*. Gilsum, NH: Barcelona Publishers.
- Rolvjord, R., Gold, C., & Stige, B. (2005). Research rigour and therapeutic flexibility: Rationale for a therapy manual developed for randomised controlled trial. *Nordic Journal of Music Therapy, 14*(1), 15-32.
- Rubin, H. & Rubin, I. (2005). *Qualitative interviewing: The art of hearing data (2nd ed.)*. Thousand Oaks, CA: Sage Publications.
- Ruud, E. (1997). Music and quality of life. *Nordic Journal of Music Therapy, 62*(2), 86-91.
- Ruud, E. (2013). Can music serve as a “cultural immunogen”? An explorative study. *International Journal of Qualitative Studies on Health and Well-Being, 8*:20597. Retrieved from: <http://dx.doi.org/10.3402/qhw.v8i0.20597>.
- Ryff, C. (1989). Happiness is everything, or is it? Explorations on the meaning of psychological well-being. *Journal of Personality and Social Psychology, 57*(6), 1069-1081.
- Ryff, C. & Keyes, C. L. (1995). The structure of psychological well-being revisited. *Journal of Personality and Social Psychology, 69*(4), 719-727.
- Ryff, C. & Singer, B. (1996). Psychological well-being: Meaning, measurement, and implications for psychotherapy research. *Psychotherapy & Psychosomatics, 65*(1), 14-23.
- Ryff, C. & Singer, B. (1998). The contours of positive human health. *Psychological Inquiry, 9*(1), 1-28.
- Saarikallio, S. (2008). Development and validation of the brief music in mood regulation scale (B-MMR). *Music Perception: An Interdisciplinary Journal, 30*(1), 97-105.
- Saarikallio, S. & Erkkilä, J. (2007). The role of music in adolescents' mood regulation. *Psychology of Music, 35*, 88-109.

- Saarikallio, S., Nieminen, S. & Brattico, E. (2012). Affective reactions to music stimuli reflect emotional use of music in everyday life. *Musicæ Scientiæ*, 17(1), 27-39.
- Schwabe, C. (2005). Resource-oriented music therapy: The development of a concept. *Nordic Journal of Music Therapy*, 14(1), 49-56.
- Seligman, M. (2003). *Authentic happiness: Using the new positive psychology to realize your potential for deep fulfillment*. London: Nicholas Brealey Publishing.
- Seligman, M. & Csikszentmihalyi, M. (2000). Positive psychology: An introduction. *American Psychologist*, 55(1), 5-14.
- Seligman, M, Parks, A., & Steen, T. (2004). A balanced psychology and a full life. *The Royal Society of London*, 359, 1379-1381.
- Seligman, M., Steen, T., Park, N. & Peterson, C. (2005). Positive psychology progress: Empirical validation of interventions. *American Psychologist*, 60(5), 410-421.
- Shafer, T. & Sedlmeier, P. (2011). Does the body move the soul? The impact of arousal on music preference. *Music Perception: An Interdisciplinary Journal*, 29(1), 37-50.
- Skaggs, R. (1997). *Finishing strong: Treating chemical addictions with music and imagery*. Saint Louis, MO: MMB Music, Inc.
- Skånland, M. (2013). Everyday music listening and affect regulation: The role of MP3 players. *International Journal of Qualitative Studies on Health and Well-Being*, 8:20595. Retrieved from: <http://dx.doi.org/10.3402/qhw.v8i0.20595>.
- Sloboda, J. (2010). Music in everyday life: The role of emotions. In P. Juslin & J. Sloboda (Eds.), *Handbook of music and emotion: Theory, research, applications* (pp. 493-514). Oxford & New York: Oxford University Press.
- Sloboda, J., O'Neill, S. & Ivaldi, A. (2001). Functions of music in everyday life: An exploratory study using the Experience Sampling Methodology. *Musicæ Scientiæ*, 5, 9-32.
- Small, C. (1998). *Musicking: The meanings of performing and listening*. London: Wesleyan Press.
- Smolkowski, K. (2010). Gain score analysis. Accessed at http://homes.ori.org/~keiths/Files/Tips/Stats_GainScores.html on March 5, 2014
- Summer, L. (2006, April). *Music and imagery for wellness practicum handbook*. Training conducted at the New England Region American Music Therapy Conference, Meriden, CT.

- Thompson, E. (2007). Development and validation of an internationally reliable short-form of the Positive and Negative Affect Schedule (PANAS). *Journal of Cross-Cultural Psychology*, 38(2), 227-242.
- Tugade, M., Fredrickson, B., & Barrett, L. (2004). Psychological resilience and positive emotional granularity: Examining the benefits of positive emotions on coping and health. *Journal of Personality*, 72(6), 1161-1190.
- van Goethem, A. (2010). *Affect regulation in everyday life: Strategies, tactics, and the role of music*. (Doctoral dissertation). Retrieved from Electronic Theses Online Service, (uk.bl.ethos.522671).
- van Goethem, A. & Sloboda, J. (2011). The function of music for affect regulation. *Musicæ Scientiæ*, 15(2), 208-228.
- Ventre, M. (2002). The individual form of the Bonny Method of Guided Imagery and Music (BMGIM). In K. Bruscia & D. Grocke (Eds.), *Guided imagery and music: The Bonny Method and beyond* (pp. 29-36.). Gilsum, NH: Barcelona Press.
- Watson, D. Clark, L., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scale. *Journal of Personality and Social Psychology*, 54(6), 1063-1070.
- Wilson, V. (1998). Learning how they learn: A review of the literature on learning styles. Retrieved from <http://eric.ed.gov/?id=ED427017>.
- The World Health Organization. (2011). WHO: Health topics: Mental health. Retrieved from http://www.who.int/topics/mental_health/en/.
- Ziv, N., Chaim, A.B., & Stamar, O. (2011). The effect of positive music and dispositional hope on state hope and affect. *Psychology of Music*, 39(1), 3-17.

APPENDIX A**RECRUITMENT LETTER TO PRACTITIONERS**

October 2012

Dear Health Practitioner:

My name is Heather Wagner. I am a board-certified music therapist and doctoral candidate of Temple University. I am currently engaged in dissertation research to explore the effects of a music therapy protocol on the well-being of normal adults. I have sent you this letter with the request that you consider referring participants to this study. As mentioned, the study is for normal adults, aged 18 years or older with the following exclusion criteria:

- Persons suffering from a known psychotic disorder.
- Persons experiencing thoughts of suicide or who have attempted suicide within the past six months.
- Former or current clients or students of the therapist/researcher.
- Persons currently engaged in any form of psychological counseling.
- Persons with hearing loss.
- Persons who are non-English speaking or writing.

I have enclosed a flyer and a copy of the consent form for a greater description of the study. Questions may be directed to 860-550-4884 or heather.wagner@temple.edu.

Thank you for your anticipated support of this research.

Sincerely,

Heather J. Wagner, MMT, MT-BC
Fellow of the Association of Music and Imagery

APPENDIX C

INFORMED CONSENT

Title of research study: Intentional Music Listening Protocol: Development of a Resource-Oriented Music Therapy Technique to Promote Well-Being

Investigator and Department:

Principal Investigator: Cheryl Dileo, Ph.D., MT-BC Carnell Professor of Music Therapy

Student Investigator: Heather J. Wagner, MMT, MT-BC, Music Therapy Ph.D.

Candidate

Why you are being invited to take part in a research study

We invite you to take part in a research study because you are a healthy adult who is

- Not suffering from a known psychotic disorder;
- Not experiencing thoughts of suicide nor have ever attempted suicide
- Not medically fragile due to illness or currently under medical care for a life threatening illness;
- Not a former or current client of the therapist/researcher;
- Not currently engaged in any form of psychological counseling;
- Of normal hearing;
- English speaking and writing.

What you should know about a research study

- Someone will explain this research study to you.
- You volunteer to be in a research study.
- Whether you take part is up to you.
- You can choose not to take part in the research study.
- You can agree to take part now and later change your mind.
- Whatever you decide, it will not affect your care.
- Feel free to ask all the questions you want before and after you decide.

Who can I talk to?

If you have questions, concerns, or complaints, or think the research has hurt you, contact the research team at 860-550-4884 or email them at intentionalmusiclistening@gmail.com.

This research has been reviewed and approved by an Institutional Review Board. You may talk to them at (215) 707-3390 or e-mail them at: irb@temple.edu for any of the following:

- Your questions, concerns, or complaints are not being answered by the research team.
- You cannot reach the research team.
- You want to talk to someone besides the research team.
- You have questions about your rights as a research subject.

Appendix C, continued

- You want to get information or provide input about this research.

Why are we doing this research?

We are doing this study to examine the effects of a music therapy intervention on your feelings of well-being. Many people listen to music and use music in many ways in their lives. This music therapy intervention has been designed to help you learn how to use music more fully in your life. Specifically, this protocol will teach you how to use music listening in a way that may affect your general state of well-being and help you use music as a way of taking care of yourself.

How long will the research last?

We expect that you will be in this research study for two weeks. You will attend one music listening group a week for two weeks. The groups will last 75 minutes each and be held the site listed below. You will also practice the music listening techniques at home two times per week for two weeks. These will last about 15 minutes each.

Study site:

How many people will be studied?

We expect about 42 people will be in this research study.

What happens if I say yes, I want to be in this research?

You will be assigned to one of two groups, a music listening group that will start as soon as a group has been formed, and a wait-listed music listening that will begin the study in about one month after the start of the first group. The group you are assigned will be chosen by chance, like flipping a coin. Neither you nor the study researcher will choose what group you get.

Here is a timeline your participation with estimated time for each step:

- Complete study measure, Positive and Negative Affect Schedule (PANAS) (10 minutes)
- Waitlist group participants will wait thirty days, then take the PANAS again (10 minutes)
- Participate in two weekly music listening groups (75 minutes each)
- Practice the music listening protocol at home, two times each week (15 minutes each)
- Complete electronic diary cards after each at-home music listening practice (10 minutes each)
- Complete PANAS again (10 minutes)

Appendix C, continued

At the conclusion of all of the treatment groups, you may be asked to participate in an interview with the researcher. The purpose of this interview is to learn more about your personal experience in the music listening groups and your private use of the music listening protocols. Participants will be chosen by the researcher based on their responses, and will have the choice whether or not to participate if asked.

What are my responsibilities if I take part in this research?

If you take part in this research, you will be responsible for

- Attending both music listening groups, each lasting about 75 minutes;
- Practicing the music listening protocols at home two times each week, each lasting about 15 minutes;
- Completing the electronic pre-test and post-test measuring your well-being;
- Completing the electronic diary cards for your home listening experiences.

What happens if I say no, I do not want to be in this research?

You may decide not to take part in the research and it will not be held against you. It will in no way affect your relationship with the study researcher.

What happens if I say yes, but I change my mind later?

You agree to take part in the research now and if you stop at any time, it will not be held against you. Again, it will in no way affect your relationship with the study researcher.

Is there any way being in this study could be bad for me?

Sometimes, listening to music can bring out emotional responses. If these responses are difficult for you to manage on your own, the study researcher will refer you to an appropriate professional to assist you.

Will being in this study help me any way?

We cannot promise any benefits to you or others from taking part in this research. However, possible benefits include a greater state of well-being, more positive emotions and less negative emotions. Participation in this study may also help you connect with and enjoy music in a deeper way.

What happens to the information we collect?

Efforts will be made to limit your personal information, including research study and records, to people who have a need to review this information. We cannot promise complete secrecy. For example, though the study team has put in safeguards to protect your information, there is always a potential risk of loss of confidentiality.

Appendix C, continued

Organizations that may inspect and copy your information include the IRB, Temple University, Temple University Health System, Inc. and its affiliates, and other representatives of these organizations, and the Office of Human Research Protections.

We may publish the results of this research. However, we will keep your name and other identifying information confidential.

Can I be removed from the research without my permission?

The person in charge of the research study or the sponsor can remove you from the research study without your approval. Possible reasons for removal include non-attendance of the music listening groups or diagnosis with a psychological or medical illness during the course of the study.

What else do I need to know?

If you are injured as a result of your participation in this research study, seek immediate medical care. However, there is no commitment by Temple University, Temple University Health System or its subsidiaries to provide monetary compensation or free medical care to you in the event of a study-related injury. By signing this consent form, you are not waiving any of the legal rights that you otherwise would have as a participant in a research study. If you have questions about the study or a research-related injury, please contact Heather Wagner at (860) 550-4884.

Participating in Future Research Studies

We may want to contact you in the future to see if you would be interested in participating in another research study and/or to obtain additional information related to your participation in this study. Please indicate by initialing on the line in the next paragraph below if you are willing to be contacted. Please know that you can amend your answer below at any time without prejudice to you or your relationship with the study, Temple University, or the study researcher and team.

Yes, I agree to be contacted about future research studies. _____

No, I do not want to be contacted about future research studies. _____

Yes, I agree to be contacted to obtain additional information related to my participation in this study. _____

No, I do not want to be contacted to obtain additional information related to my participation in this study. _____

Appendix C, continued

Your signature documents your permission to take part in this research.

DO NOT SIGN THIS FORM AFTER THIS DATE à

May 31, 2014

Signature of subject

Date

Printed name of subject

Signature of person obtaining consent

Printed name of person obtaining consent

APPENDIX D

AT-HOME LISTENING INSTRUCTIONS

Dear Participant,

Welcome and thank you for your participation in the Intentional Music Listening protocol. Here are instructions for your at-home music listening experiences. Each week following the music listening groups, you are requested to practice each of the listening experiences and to complete the diary cards after your listening. Here is an outline of how to complete the listening experiences.

Preliminary Guidelines

- Be sure your MP3 device has enough battery charge to remain functional for the duration of the playlist. Study devices use one AAA battery if needed.
- Set your environment so that you can be fully focused on the music. Find a quiet, uninterrupted space. Adjust the lighting as preferred to help you focus. Set the volume of the music to a comfortable volume. Get into a comfortable position, seated or reclined as preferred. Eyes can be open or closed, so long as you can maintain direct focus on the music.
- Listening can occur at any time of the day that is convenient for you.
- Complete each experience at least once throughout the week. You are welcome to engage in the experiences as often as you like.
- After each listening experience, complete and submit the electronic diary card.

Week 1 At-Home Listening

Experience 1: While listening, focus directly on the music and follow whatever musical element stands out the most to you. Suggested elements for focus include the lyrics, the melody, a specific instrument, the rhythm or the harmony. Your focus may switch to different music elements as the music plays.

Experience 2: Before you begin listening, choose an image (a picture, a feeling, a color, a memory, a place) that you find positive and gives you support and strength. During the music, allow yourself to experience that image as fully as you can.

Week 2 At-Home Listening

Experience 3: While listening, focus on how your body feels and responds to the music. For example, be aware of any tension, relaxation, warmth, cold, chills, or any other sensations you feel in your body.

Experience 4: While listening, stretch and/or move your body in any way that feels right to you. You are welcome to move freely or follow the stretches suggested on the following page (From: www.shelterpub.com).

Appendix D, continued

Please complete your diary cards immediately following each listening experience. If you have questions, please contact Heather at 860-550-4884 or intentionalmusiclistening@gmail.com.

Thank you again for participating in this study.

Stretching Protocol

DESK STRETCHES

These are stretches to do at your desk.
This program will take 2 1/2 - 3 min.

- Breathe easily
- No bouncing or forcing
- No pain!
- Feel the stretch
- Relax
- See Stretching Instructions, pp. 77-84

1
5 sec., 3 times
p. 82



2
5 sec., 2 times
p. 82



3
5 sec., 2 times
p. 81



4
5 sec., 2 times
p. 84



5
5 sec.
p. 84



6
5 sec.
each side
p. 84



7
5 sec.
p. 84



8
10 sec.
each arm
p. 81



9
10 sec.
p. 82



10
10 sec.
p. 81



11
9 sec.
each side
p. 82



12
10 sec.
p. 79



- Prolonged sitting at a desk or computer terminal can cause muscular tension and pain.
- Taking a few minutes to do a series of stretches can make your whole body feel better.
- Learn to stretch spontaneously throughout the day whenever you feel tense.
- Don't just do seated stretches, but do some standing stretches too. Good for circulation.

From the book:

34 *Getting in Shape* © 1994 Shodor Publications, Inc.

www.shodorpub.com

Photocopy this page and keep it in your desk drawer.

APPENDIX E

OUTLINE OF GROUP PROCEDURES

Prior to first group meeting*

- Assign study group and study identification number
- Send informed consent document, highlight exclusion criteria
- Administer pre-test PANAS electronically

*Typically these tasks were completed via email. For the two participants who did not use email, all information and study measures were sent via postal service., and a self-addressed stamped mailer was included. At the conclusion of the study, these participants mailed the completed forms to the researcher and the data were entered by a colleague of the researcher.

Week 1

- Introductions
 - Therapist – background, interest in and development of study topic
 - Participants – interest in participation, what they hope to get from participation
- Review and sign informed consent
- Review study protocol, including groups, at-home practice, and study measures
- Distribute study MP3 players and demonstrate usage
 - Give self-addressed stamped mailers for return of players at the completion of participation
- Introduce Listening Experience 1
 - Describe experience
 - Guide participants to choose one piece from their playlists
 - Participants practice the experience using headphones/earbuds
 - Discuss experience, answer questions
- Introduce Listening Experience 2, following the same procedures
- Final review of study measures, in particular the diary cards

Between Groups

- Email electronic links for diary cards
- Email a reminder to complete at-home listening experiences

*Appendix E, continued***Week 2**

- Address any questions or concerns about protocol
- Introduce Listening Experience 3, following same procedures as in week 1
- Introduce Listening Experience 4
 - For group participation, lead group in stretching sequence with relaxation music played over speakers
- Instruct how to complete at home
- Discuss study completion guidelines

After Group Completion

- Email electronic link for diary cards
- Email a reminder to complete at-home listening experiences
- Email the final PANAS link
- Email reminders to mail the MP3 players as needed

APPENDIX F

STRETCHING SEQUENCE

DESK STRETCHES

These are stretches to do at your desk.
This program will take 2 1/2 - 3 min.

- Breathe easily
- No bouncing or forcing
- No pain!
- Feel the stretch
- Relax
- See Stretching Instructions, pp. 77-84

1
5 sec., 3 times
p. 82



2
5 sec., 3 times
p. 82



3
5 sec., 2 times
p. 81



4
5 sec., 2 times
p. 84



5
3 sec.
p. 84



6
3 sec.
each side
p. 84



7
3 sec.
p. 84



8
10 sec.
each arm
p. 81



9
10 sec.
p. 82



10
10 sec.
p. 81



11
9 sec.
each side
p. 82



12
10 sec.
p. 79



- Prolonged sitting at a desk or computer terminal can cause muscular tension and pain.
- Taking a few minutes to do a series of stretches can make your whole body feel better.
- Learn to stretch spontaneously throughout the day whenever you feel tense.
- Don't just do seated stretches, but do some standing stretches too. Good for circulation.

From the book:

34 *Getting in Shape* © 1994 Shelter Publications, Inc.

www.shelterpub.com

Photocopy this page and keep it in your desk drawer.

APPENDIX G

PANAS QUESTIONNAIRE

This scale consists of a number of words that describe different feelings and emotions. Read each item and then choose the number from the scale that indicate the extent you have felt this way over the past week.

1 Very Slightly Or Not at All	2 A Little	3 Moderately	4 Quite a Bit	5 Extremely
1. Interested	_____		11. Irritable	_____
2. Distressed	_____		12. Alert	_____
3. Excited	_____		13. Ashamed	_____
4. Upset	_____		14. Inspired	_____
5. Strong	_____		15. Nervous	_____
6. Guilty	_____		16. Determined	_____
7. Scared	_____		17. Attentive	_____
8. Hostile	_____		18. Jittery	_____
9. Enthusiastic	_____		19. Active	_____
10. Proud	_____		20. Afraid	_____

Scoring Instructions:

Positive Affect Score: Add the scores on items 1, 3, 5, 9, 10, 12, 14, 16, 17, and 19. Scores can range from 10 – 50, with higher scores representing higher levels of positive affect. Mean scores: 33.3 (SD – 7.2)

Negative Affect Score: Add the score on items 2, 4, 6, 7, 8, 11, 13, 15, 18, and 20. Scores can range from 10 – 50, with lower scores representing lower levels of negative affect. Mean scores: 17.4 (SD – 6.2).

Adapted from Watson, Clark & Tellegen (1988). Used with permission.

APPENDIX H

ELECTRONIC PANAS QUESTIONNAIRE

**PANAS Questionnaire - 1st
**

*** 1. Please enter your study ID**

*** 2. Please indicate below the date on which you are completing this questionnaire.**

MM DD YYYY
Please indicate below / /

the date on which you are completing this questionnaire.

*** 3. This scale consists of a number of words that describe different feelings and emotions. Read each item and then choose the number from the scale that indicate the extent you have felt this way over the past week.**

	1 Slightly or not at all	2 A little	3 Moderately	4 Quite a bit	5 Extremely
Interested	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Distressed	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Excited	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Upset	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Strong	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Guilty	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Scared	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Hostile	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Enthusiastic	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>
Proud	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>	<input type="radio"/>

APPENDIX I**I-PANAS-SF****The International Positive and Negative Affect Schedule Short Form (I-PANAS-SF)
Question, Measure, and Item Order**

Question: Thinking about yourself and how you normally feel, to what extent do you generally feel:

Items in order:

Upset
Hostile
Alert
Ashamed
Inspired
Nervous
Determined
Attentive
Afraid
Active

Interval measure: *never* 1 2 3 4 5 *always*

Taken from Thompson, 2007, p. 240

APPENDIX J

DEMOGRAPHIC QUESTIONNAIRE

Intentional Music Listening Study Participant Demographics

1. Are you male or female?

- ☐ Male
- ☐ Female

2. Which category below includes your age?

- ☐ 18-20
- ☐ 21-29
- ☐ 30-39
- ☐ 40-49
- ☐ 50-59
- ☐ 60 or older

3. What is the highest level of school you have completed or the highest degree you have received?

- ☐ Less than high school degree
- ☐ High school degree or equivalent (e.g., GED)
- ☐ Some college but no degree
- ☐ Associate degree
- ☐ Bachelor degree
- ☐ Graduate degree

4. Which of the following categories best describes your employment status?

- ☐ Employed, working 1-39 hours per week
- ☐ Employed, working 40 or more hours per week
- ☐ Not employed, looking for work
- ☐ Not employed, NOT looking for work
- ☐ Retired
- ☐ Disabled, not able to work

*Appendix J, continued***Intentional Music Listening Study Participant Demographics
****5. Which of the following best describes your current occupation?**

- ☐ Management Occupations
- ☐ Business and Financial Operations Occupations
- ☐ Computer and Mathematical Occupations
- ☐ Architecture and Engineering Occupations
- ☐ Life, Physical, and Social Science Occupations
- ☐ Community and Social Service Occupations
- ☐ Legal Occupations
- ☐ Education, Training, and Library Occupations
- ☐ Arts, Design, Entertainment, Sports, and Media Occupations
- ☐ Healthcare Practitioners and Technical Occupations
- ☐ Healthcare Support Occupations
- ☐ Protective Service Occupations
- ☐ Food Preparation and Serving Related Occupations
- ☐ Building and Grounds Cleaning and Maintenance Occupations
- ☐ Personal Care and Service Occupations
- ☐ Sales and Related Occupations
- ☐ Office and Administrative Support Occupations
- ☐ Farming, Fishing, and Forestry Occupations
- ☐ Construction and Extraction Occupations
- ☐ Installation, Maintenance, and Repair Occupations
- ☐ Production Occupations
- ☐ Transportation and Materials Moving Occupations
- ☐ Other (please specify)

*Appendix J, continued***Intentional Music Listening Study Participant Demographics
**

6. How much total combined money did all members of your HOUSEHOLD earn in 2012 ? This includes money from jobs; net income from business, farm, or rent; pensions; dividends; interest; social security payments; and any other money income received by members of your HOUSEHOLD that are EIGHTEEN (18) years of age or older. Please report the total amount of money earned - do not subtract the amount you paid in taxes or any deductions listed on your tax return.

- ☐ Less than \$20,000
- ☐ \$20,000 to \$34,999
- ☐ \$35,000 to \$49,999
- ☐ \$50,000 to \$74,999
- ☐ \$75,000 to \$99,999
- ☐ \$100,000 to \$149,999
- ☐ \$150,000 or More

7. Are you White, Black or African-American, American Indian or Alaskan Native, Asian, Native Hawaiian or other Pacific islander, or some other race?

- ☐ White
- ☐ Black or African-American
- ☐ American Indian or Alaskan Native
- ☐ Asian
- ☐ Native Hawaiian or other Pacific Islander
- ☐ From multiple races

Some other race (please specify)

APPENDIX K

INTENTIONAL MUSIC LISTENING DIARY CARD

Intentional Music Listening Diary Card	
Please complete immediately following every at-home listening experience.	
*1. Participant Number <input type="text"/>	
*2. Date <div> <div>DD</div> <div>MM</div> <div>YYYY</div> </div> <div> Please enter the date of the listening experience. <input type="text"/> / <input type="text"/> / <input type="text"/> </div>	
*3. Please enter the approximate time of day you completed your listening experience. <input type="radio"/> Early morning <input type="radio"/> Morning <input type="radio"/> Early afternoon <input type="radio"/> Late afternoon <input type="radio"/> Evening <input type="radio"/> Night <input type="radio"/> Late night	
*4. Please enter the length of your listening experience. Minutes <input type="text"/>	
*5. Please write the music you chose, including title and artist. <input type="text"/>	
*6. Please check the listening experience you practiced. <input type="radio"/> Focus on musical elements <input type="radio"/> Focus on positive imagery <input type="radio"/> Body listening <input type="radio"/> Stretching	
7. What part of the music were you most aware of while listening? <input type="text"/>	

Appendix K, continued

8. What was the mood you experienced while listening?

9. How did your body feel while you were listening to the music?

*10. Please rate your sense of well-being before the listening experiences.

Very low

Very high

Well-being before listening experience

*11. Please rate your sense of well-being after the listening experience.

Very low

Very high

Well-being after the listening experience

APPENDIX L

APA PERMISSION



AMERICAN
PSYCHOLOGICAL
ASSOCIATION

Heather Wagner
Temple University
203 Circlewood Drive
Berlin, CT 06037

INVOICE NO. N/A
Federal Tax I.D. 53-0205890
Date: September 16, 2012

IN MAKING PAYMENT REFER TO THE ABOVE INVOICE NUMBER

APA Permissions Office
750 First Street, NE
Washington, DC 20002-4242
www.apa.org/about/copyright.html permissions@apa.org
202-336-5650 Fax: 202-336-5633

IF THE TERMS STATED BELOW ARE ACCEPTABLE, PLEASE SIGN AND RETURN ONE COPY TO APA. RETAIN ONE COPY FOR YOUR RECORDS. PLEASE NOTE THAT PERMISSION IS NOT OFFICIAL UNTIL APA RECEIVES THE COUNTERSIGNED FORM AND ANY APPLICABLE FEES.

Request is for the following APA-copyrighted material: Scale content:

- Appendix, p. 1070, from Watson, D., Clark, L. A., & Tellegen, A. (1988). Development and validation of brief measures of positive and negative affect: The PANAS scales. *Journal of Personality and Social Psychology*, 54(6), 1063-1070. doi:10.1037/0022-3514.54.6.1063

For the following use: **Non-Commercial Research or Educational Use in:** a) thesis or dissertation research (such as data collection or surveys) via an online password-protected web site and/or in hardcopy format; and b) print and/or digital versions of the final thesis or dissertation document provided that digital distribution is limited to non-commercial, secure and restricted web site(s).

File: Wagner, Heather (author)

Permission is granted for the nonexclusive use of APA-copyrighted material specified on the attached request contingent upon fulfillment of the conditions indicated below:

1. The fee is waived.
2. The reproduced material must include the following credit line: Copyright © 1988 by the American Psychological Association. Reproduced [or Adapted] with permission. The official citation that should be used in referencing this material is [list the original APA bibliographic citation].
3. **For all online use:** (a) The following notice must be added to the credit line: No further reproduction or distribution is permitted without written permission from the American Psychological Association; (b) the credit line must appear on the first screen on which the APA content appears; and (c) the APA content must be posted on a secure and restricted web site.

This agreement constitutes permission to reproduce only for the purposes specified on the attached request and does not extend to future editions or revisions, derivative works, translations, adaptations, promotional material, or any other formats or media. Permission applies solely to publication and distribution in the English language throughout the world, unless otherwise stated. No changes, additions, or deletions to the material other than any authorized in this correspondence shall be made without prior written consent by APA.

This permission does not include permission to use any copyrighted matter obtained by APA or the author(s) from other sources that may be incorporated in the material. It is the responsibility of the applicant to obtain permission from such other sources.

ACCEPTED AND AGREED TO BY:

Applicant

September 21, 2012

Date

PERMISSION GRANTED ON ABOVE TERMS:

for the American Psychological Association

September 16, 2012

Date

_____ I wish to cancel my request for permission at this time.

APPENDIX M

QUALITATIVE INTERVIEW OUTLINE

- Ask the participant about musical background, i.e. preferred music, listening habits, musical training.
- How did the listening experiences affect your mood?
- What was your experience of the group?
- What was your experience of the home practice?
- Which technique did you respond to the strongest?
- Which technique did you respond to the least?
- What did you notice about yourself and your music listening after participating the group?
- How did participating in the music listening protocol affect the way you listen to music?
- Was the length of the listening experiences sufficient?